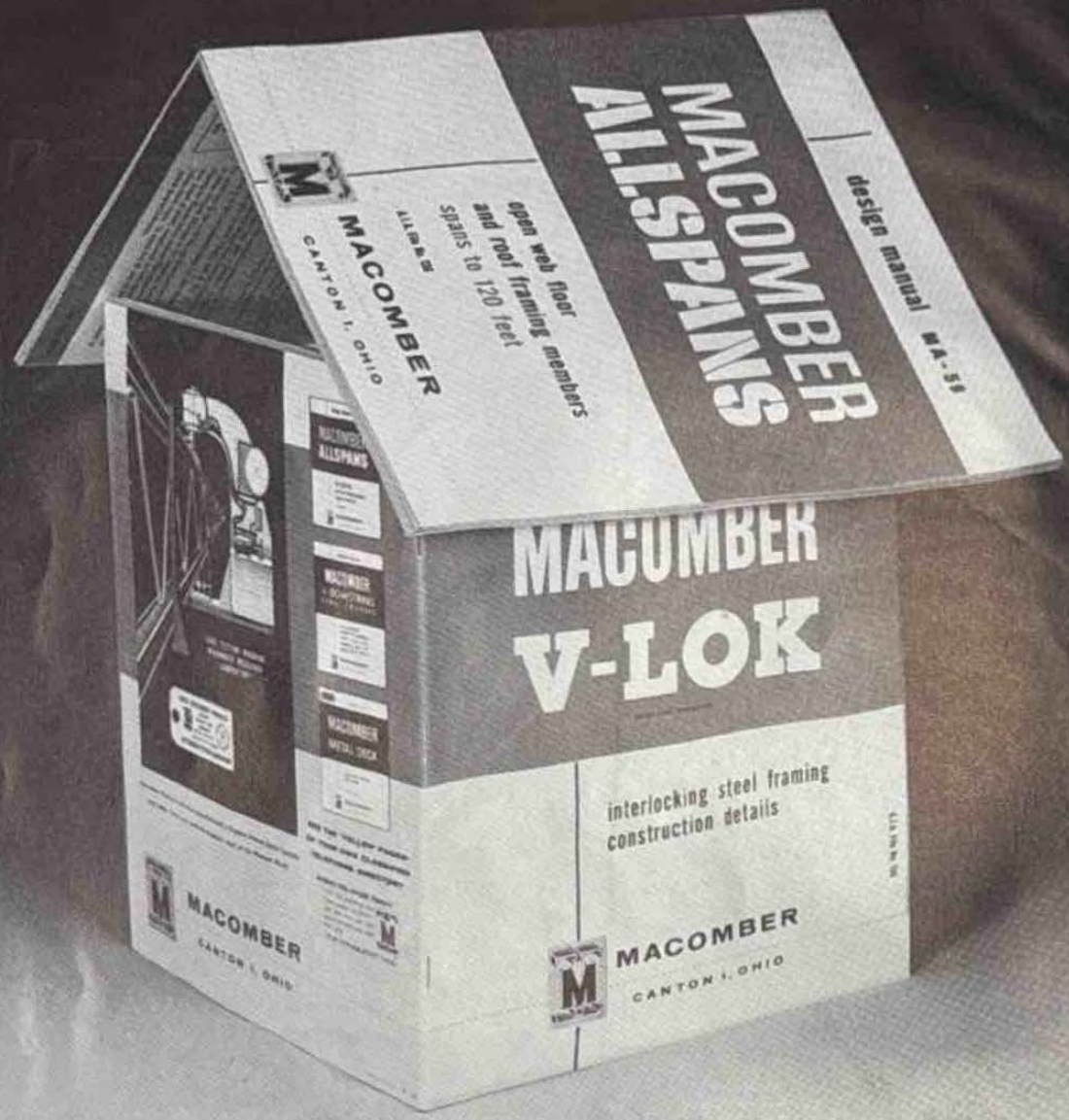
acific Architect & Builder

UNIV. OF OREGON
JAN 12 1961
LIBRARY

E MAGAZINE OF WESTERN ARCHITECTURE ◆ JANUARY 1961



YOUR SIMPLIFIED APPROACH TO STRUCTURAL DESIGN



SEND FOR YOUR CONSTRUCTION REFERENCE MANUALS...TODAY!

Send for these complete reference sources
for any steel framed project on your boards today
...dimensions, properties, load tables, deflection calculations, bridging details
wind forces and seismic data, typical framing plans and much more.
These professional manuals provide the exact information
for engineering the economies and high strength
of Macomber framing members into your projects.
Where do we send your copies?

PAB 61

MACOMBER
CANTON 1, OHIO

ALLSPANS • V-LOK • V-BEAMS • V-GIRDERS
BOWSTRING TRUSSES • ROOF DECK • STRUCTURAL STEEL

Find Your Local MACOMBER Representative in the Yellow Pages

SEE OUR CATALOG IN SWEET'S OR WRITE FOR COPY

dip 5.00 ed. 3 63 DE 26 61

Pacific Architect & Builder

January 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
WIN ROMTVEDT HOLMES
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

14 Publishing-Printing Plant, Seattle: A. O. Bumgardner & Partners, Architects

24 Fire Station No. 4, Berkeley: Ratcliff & Ratcliff, Architects

28 Norman G. Gottfredson Residence, Glendale, California: Walter H. Koziol, Designer

special features

27 AIED (American Institute of Exterior Decorators) Convention Report—By Donald J. Bergsma

30 Where Architects Hang Their Hats: Charles Luckman Associates, Los Angeles

methods and materials

31 Preframed Floor Panel Cuts Cost

32 Some Notes on San Francisco's Prestressed Concrete Conference

departments

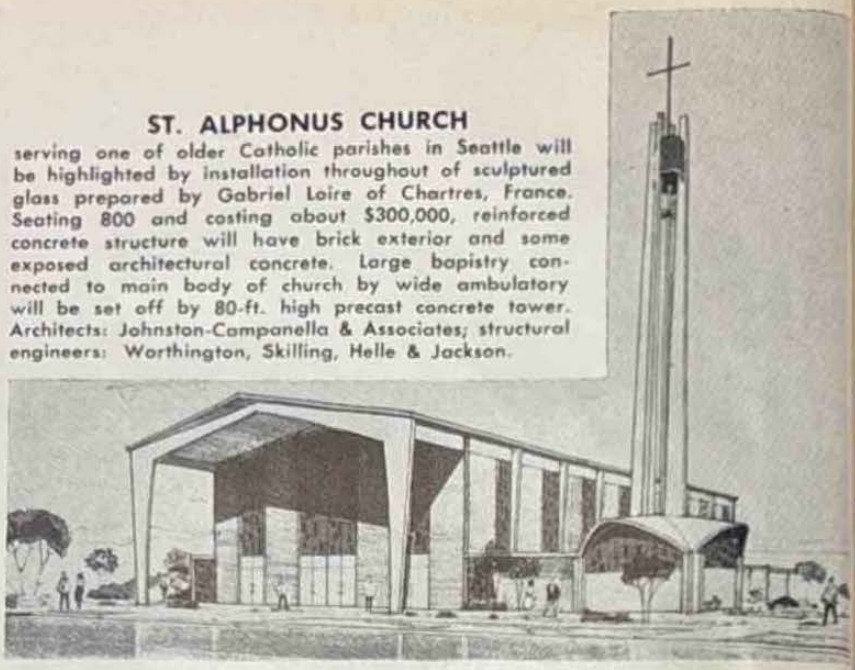
4 Project Preview
5 Building Permits
8 The Building Month
12 T-Square Talk
13 Job of the Month
33 PA&B Memo
34 Products
36 Literature
37 Books
38 Manufacturers/Suppliers
41 Points of View
42 Not Specified

VOLUME 67, NUMBER 1

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place N., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

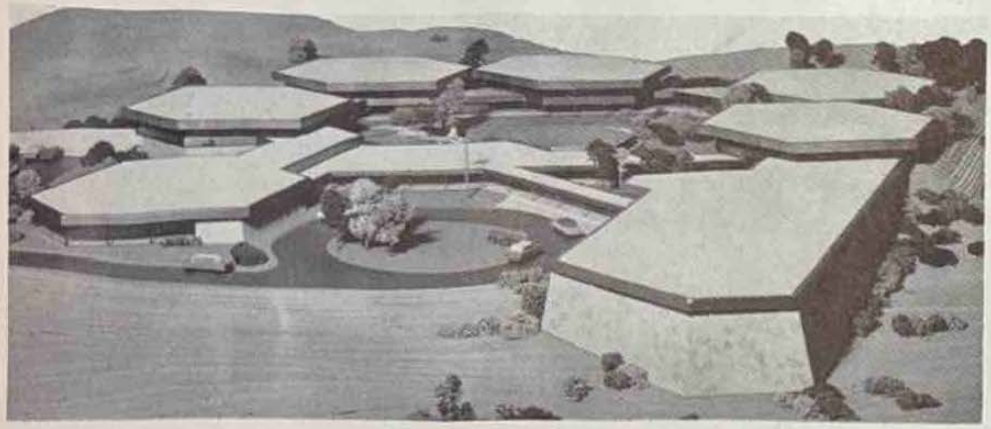
Full circulation and business data and advertisers' index on page 41

COVER: Publishing-Printing plant, Seattle (p. 14)—A. O. Bumgardner & Partners, Architects; Art Hupy photo.



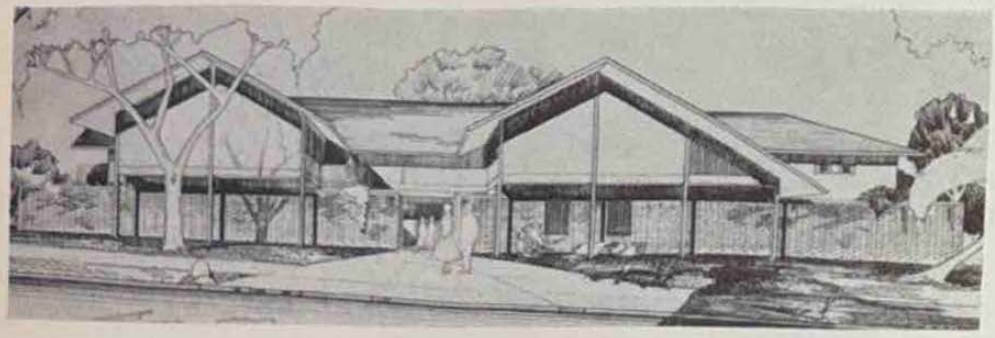
ST. ALPHONUS CHURCH

serving one of older Catholic parishes in Seattle will be highlighted by installation throughout of sculptured glass prepared by Gabriel Loire of Chartres, France. Seating 800 and costing about $300,000, reinforced concrete structure will have brick exterior and some exposed architectural concrete. Large baptistry connected to main body of church by wide ambulatory will be set off by 80-ft. high precast concrete tower. Architects: Johnston-Campanella & Associates; structural engineers: Worthington, Skilling, Helle & Jackson.



JUNIOR HIGH SCHOOL

in Casper, Wyo., will be composed of five identical hexagonal teaching units arranged around edge of bowl cut into hillside. They in turn will open with stairs to connecting corridor below that encloses self-contained courtyard and leads to library, cafeteria, administrative offices, gymnasium, music and choral rooms and shop areas. Estimated construction cost of plant, designed on 16-ft module, is $1,350,000 for 1,000-pupil capacity. Architects: Perkins & Will in association with Robert Wehrli of Architectural Guild.



SORORITY HOUSE

of Alpha Delta Pi on Washington State University campus in Pullman will consist of stucco and brick exterior, wood shingle roof and central entry into garden court. Remodeling and 5,000-sq. ft. addition to existing house built in 1929 (right rear) will cost $114,000. Architect: Warren Cummings Heylman.



YACHT CLUB RESTAURANT

now under construction on water's edge of California's Salton Sea will feature raised central cocktail lounge becoming two-level observation crow's nest lookout. Wood laminated beams support modular built-up folded plate roof of 12,000-sq. ft. structure. Terrace will overlook lagoon. Architects: Richard L. Dorman & Associates; structural engineer: Woodward Tom.

UNIVERSITY OF OREGON LIBRARY
EUGENE, OREGON

Western Building joins household

Pacific Architect & Builder's publisher, Pacific Builder & Engineer, Inc., has acquired Western Building magazine from Miller Freeman Publications.

The purchase enables the Seattle publisher to fulfill its objective in the western states—that of providing pinpoint regional coverage of each of the major segments of the construction industry.

Both magazines will work together to serve the two separate segments: Pacific Architect & Builder, the architects, building contractors and structural engineers in the custom and commercial-public fields; Western Building, the builders and suppliers in mass-market light building. Pacific Builder & Engineer continues its role of serving the field of heavy, engineered construction.

Robert E. Koehler remains as editor of Pacific Architect & Builder and Francis W. Brown of Western Building. Other editorial staffers will assist on both publications. Norman Erickson becomes advertising manager of Pacific Architect & Builder and Western Building; L. C. McDowell continues as advertising manager of the parent Pacific Builder & Engineer.

In announcing the purchase, Roscoe E. Laing, vice president and general manager of the publishing firm, comments: "By bringing editorial, production, sales and administrative staffs together under one roof, an effective union is made which will strengthen the positions of both magazines and eliminate overlapping functions." (For additional comments, see "Not Specified" on p. 42.)

Eight states contribute to November drop

Building starts in the 13 western states for November are $32.6 million below the dollar volume of a year ago, a tabulation of nearly 500 permit agencies shows. The November 1960 figure is $367,106,151 compared to $399,786,636 for last year. Number of permits, 48,544, also is down, by 5,429.

On a state-by-state basis, five state totals are above 1959: Nevada, by $1.7 million; Idaho, $1.6 million; Montana, $1.2 million; Colorado, $976,000; and New Mexico, $148,340. States recording decreases and the amount of drop are California, down $8.9 million; Washington, $7.6 million; Arizona, $7.2 million; Oregon, $7.1 million; Hawaii, $6 million; Utah, $676,000; Wyoming, $434,000; and Alaska, $32,672.

The total residential volume, $192,495,520, is $14.2 million below November 1959. Number of residential units begun, 16,480, also is down by 2,355. State-by-state analysis shows only four states with a higher dollar volume of residential permits and only three with a larger number of units compared to last year. Colorado residenital permits are up $3.2 million and number of units by 332; Nevada, $3.1 million and 263; Montana, $816,000 and 79; and Alaska, $58,591, but number of units down by 23.

Largest drop in residential permits is in California, $9.6 million and number of units, 1,619. Other states showing decreases in dollar volume and number of units are: Oregon, down $1.6 million and 151 fewer units; Washington, $1.3 million and 63; Hawaii, $5 million and 678; Arizona, $1 million and 216; Utah, $1.5 million and 119; New Mexico, $916,000 and 120; Wyoming, $398,000 and 18; Idaho, $1,000 and 2.

Of the 25 leading building permit agencies in November, 15 are in California, three in Arizona, two each in Washington and Colorado and one each in Hawaii, New Mexico and Utah.

For a complete tabulation of nearly 500 building permits issued in the 13 western states see the following two pages.

Top 25 agencies in West

	November 1960	November 1959
Los Angeles	$43,935,983	$42,300,322
Los Angeles County	14,678,256	12,970,968
Sacramento County	10,424,442	9,966,606
San Jose	9,624,605	4,634,745
Honolulu	8,779,208	15,283,579
San Francisco	7,713,287	5,342,552
Phoenix	7,208,836	5,097,493
Orange County	5,695,907	4,849,801
Palo Alto	5,577,011	2,962,227
San Diego	5,279,507	17,298,625
Seattle	5,268,990	6,831,034
Denver	5,078,329	5,204,402
Fresno	5,061,752	888,307
Maricopa County, Ariz.	4,707,652	14,708,974
King County, Wash.	4,442,187	4,991,784
San Diego County	4,433,900	10,444,600
Long Beach	4,224,615	3,078,280
Riverside County, Calif.	4,423,125	5,179,253
Alameda County, Calif.	4,222,150	1,112,650
Ventura County, Calif.	4,150,907	4,124,050
Jefferson County, Colo.	3,768,950	1,370,921
Pima County, Ariz.	3,696,250	4,436,952
Albuquerque	3,357,561	4,047,103
Salt Lake County	3,561,380	2,884,150
Sacramento	3,061,400	3,213,700

Building Permit Totals for

CALIFORNIA	Residential	Total
Alameda	$ 274,800	$ 450,989
Alameda County	3,811,800	4,222,150
Albany		113,884
Alhambra	249,900	372,275
Anaheim	888,521	2,800,404
Antioch	176,759	262,307
Arcadia	778,000	925,672
Arroyo-Grande	39,000	56,279
Artesia	22,000	48,600
Atherton	163,000	264,503
Atwater	101,119	102,119
Auburn	8,000	10,227
Avalon		11,950
Azusa	320,900	501,500
Bakersfield	1,083,650	1,491,801
Baldwin Park	127,100	221,690
Banning	176,633	198,499
Barstow		61,249
Bell	116,950	140,750
Bellflower	662,800	752,830
Belmont	229,000	362,550
Benicia	45,000	89,455
Berkeley	1,422,261	1,782,376
Beverly Hills	1,514,000	1,818,304
Bradbury		
Brawley	16,000	16,000
Brea		
Buena Park	1,589,679	1,674,005
Burbank	386,000	1,191,491
Burlingame	140,500	323,782
Butte County		77,000
Calexico	3,500	9,600
Campbell	139,680	172,670
Carlsbad	292,000	321,300
Carmel		21,285
Chico	143,054	175,572
Chino	38,244	58,354
Chula Vista		83,500
Claremont	734,500	1,626,010
Coalinga		3,810
Colton	19,784	50,632
Commerce	5,000	57,635
Compton	47,200	700,098
Concord		
Contra Costa Cty	1,391,605	2,110,353
Corona	90,690	125,642
Coronado		
Corte Madera	248,143	299,423
Costa Mesa	868,232	1,159,630
Covina	55,300	164,277
Cudahy		6,200
Culver City	28,000	254,833
Dairy Valley	35,100	42,035
Daly City	93,200	467,666
Davis	243,000	247,420
Delano	21,492	21,828
Downey	599,450	1,150,598
Duarte		54,250
El Cajon	127,000	218,400
El Centro	24,000	206,000
El Cerrito	178,183	245,964
El Dorado County	408,918	794,275
El Monte	157,000	210,332
El Segundo	114,300	180,645
Emeryville		33,745
Escondido	337,435	395,496
Eureka	113,990	197,008
Fairfield	94,700	117,953
Fillmore	8,960	13,754
Fontana	90,231	106,611
Fremont	1,298,000	1,374,557
Fresno	4,126,385	5,061,752
Fresno County	416,380	1,039,775
Fullerton	982,152	1,134,062
Glendale	608,310	1,063,179
Glendora	374,200	407,500
Half Moon Bay	8,000	11,400
Hanford	475,060	562,132
Hawthorne	339,550	866,902
Hayward	587,000	892,928
Hemet	61,000	47,020
Hermosa Beach	131,140	167,935
Hillsborough	156,000	220,600
Holtville		7,090
Humbold County*		216,680
Huntington Beach	188,288	476,393
Huntington Park	183,597	327,062
Imperial County*		83,000
Indio		38,004
Industry		137,410
Inglewood	1,267,000	2,180,153
Irwindale		200
Kern County*		1,055,385
Laguna Beach	493,800	531,549
La Habra	107,421	215,748
Lakewood	203,600	295,050
La Mesa	114,065	313,002
La Puente		154,175
La Verne		6,850
Lawndale	224,200	293,845
Lindsay	9,150	15,351
Livermore	252,511	340,625
Lodi	228,850	318,630
Lompoc	357,100	361,205
Long Beach	1,315,305	4,224,615
Los Altos	378,967	556,704
Los Angeles	10,517,828	43,935,983
Los Angeles Cty.	10,381,675	14,678,256
Los Gatos	276,000	1,527,100
Lynwood	132,678	185,714
Madera		
Madera County	80,000	102,580
Manhattan Beach	144,750	319,135
Manteca	99,000	123,425
Marin County	664,638	664,638
Martinez	26,796	157,096
Marysville	420,500	780,650
Maywood	24,000	66,662
Menlo Park	312,500	427,645
Merced	100,040	148,901
Merced County	269,629	303,204
Millbrae	186,000	237,550
Mill Valley	230,500	416,750
Mirada Hills	46,000	95,800
Modesto	543,700	851,012
Monrovia	137,129	264,460
Montclair	706,420	790,535
Montebello	1,935,564	2,405,639
Monterey	257,000	294,191
Monterey County	469,008	703,347
Monterey Park	332,350	561,999
Mountain View	482,154	633,271
Napa	219,111	279,973
Napa County	37,435	103,082
National City	36,345	141,642
Newport Beach	306,370	982,514
North Sacramento	37,911	123,827
Norwalk	149,200	380,000
Novato		
Oakdale	9,422	14,990
Oakland	1,222,600	2,831,692
Oceanside	39,900	205,533
Ojai		4,780
Ontario	495,166	566,513
Orange County	3,950,266	5,695,907
Orange	2,417,061	3,030,665
Oroville	18,102	1,191,953
Oxnard	343,200	1,433,023
Pacifica	371,400	471,800
Pacific Grove	35,500	105,395
Palm Spirngs	1,257,000	2,074,662
Palo Alto	201,475	5,557,011
Palo Verdes Estates	490,455	528,430
Paramount	237,700	317,605
Pasadena	359,679	1,288,978
Paso Robles	26,500	110,300
Piedmont	82,016	106,332
Pinole		
Pittsburg	246,762	270,845
Placentia	20,524	27,104
Placer County	531,720	672,260
Pleasanton	49,800	59,098
Pomona	267,360	522,953
Porterville		46,955
Port Hueneme	6,000	13,800
Red Bluff	81,639	101,039
Redding	32,000	46,050
Redlands	503,000	582,869
Redondo Beach	497,515	718,908
Redwood City	535,100	724,957
Richmond	286,200	501,243
Riverside	121,100	614,598
Riverside County	2,756,804	4,423,125
Rolling Hills	73,800	98,700
Rolling Hills Estate	27,000	188,550
Rosemead	39,300	79,370
Roseville	182,354	214,583
Sacramento	1,829,100	3,061,400
Sacramento Cty.	4,070,157	10,424,442
St. Helena	12,323	12,323
Salinas	185,500	299,400
San Bernardino	355,375	1,070,046
San Bernard. Cty.	1,725,198	2,715,207
San Bruno	229,000	274,145
San Carlos	178,000	363,255
San Clemente	96,072	106,897
San Diego	2,391,626	5,279,507
San Diego County	2,754,000	4,433,900
San Dimas	55,300	818,750
San Fernando	14,600	243,6
San Francisco	2,173,150	1,713,2
San Gabriel	47,200	100,4
Sanger	39,000	85,0
San Jacinto	21,000	23,3
San Joaquin Cty.	295,110	589,1
San Jose	8,241,300	9,624,6
San Leandro	209,210	429,0
San Luis Obispo	647,950	914,6
San Luis Obis. Cty.	287,271	546,8
San Marino	64,000	134,4
San Mateo	476,500	1,398,1
San Mateo County	604,000	1,043,0
San Pablo	26,600	47,6
San Rafael	1,459,001	1,536,9
Santa Ana	1,580,075	1,799,9
Santa Barbara	306,000	625,3
Santa Barbara Cty.	2,170,700	3,336,2
Santa Clara	1,073,200	1,363,0
Santa Clara Cty.	1,341,800	1,900,7
Santa Cruz	215,200	293,7
Santa Cruz County	864,870	1,327,4
Santa Fe Springs		148,2
Santa Maria		63,7
Santa Monica	629,439	988,0
Santa Paula	1,050,917	1,116,3
Santa Rosa	269,000	330,4
Sausalito	232,000	243,3
Seal Beach	17,700	23,7
Seaside	70,500	264,6
Selma	49,400	51,1
Shasta County	95,850	196,1
Sierra Madre	60,400	166,1
Solano County	65,746	90,8
Sonoma County	301,763	493,1
South El Monte	5,000	34,2
South Gate	208,950	323,8
South Pasadena	55,149	118,2
South San Fran.	67,875	276,3
Stanislaus County	378,756	624,8
Stockton	230,435	712,1
Sunnyvale	590,600	927,0
Temple City	219,900	380,2
Torrance	965,425	1,425,3
Tracy	63,719	68,5
Tulare	41,000	59,8
Tulare County	237,384	324,4
Turlock	61,426	169,0
Ukiah	16,000	33,4
Upland	152,000	192,5
Vacaville	181,600	198,5
Vallejo	119,500	463,3
Ventura	1,540,000	1,771,6
Ventura County	3,130,800	4,130,5
Vernon		1,407,5
Visalia	94,048	146,6
Walnut		3,3
Walnut Creek	74,100	156,4
Wasco	13,000	31,9
Watsonville		43,3
West Covina	32,840	385,1
Whittier	157,300	315,1
Woodland	371,620	424,4
Woodside	64,000	79,2
Yolo County	99,905	160,6
Yreka	14,800	24,4
Yuba City	28,000	175,6
Yuba County	112,000	140,1
TOTAL	**$131,469,140**	**$249,338,8**

OREGON	Residential	To
Albany	$ 51,000	$ 58,3
Ashland	63,000	206,7
Astoria		6,1
Baker	30,000	50,6
Beaverton	72,648	79,2
Bend	22,000	38,7
Central Point	65,000	66,2
Clackamas County	289,900	324,1
Coos Bay		15,8
Corvallis	133,000	201,7
Dallas		17,8
Douglas County	28,500	39,5
Eugene	325,235	593,1
Forest Grove		22,5
Gresham		60,5
Grants Pass	62,200	100,7
Hermiston		10,5
Hillsboro	83,500	88,1
Hood River		
Klamath Falls		14,6
La Grande	12,000	12,2
Lane County	439,321	1,116,3

*No breakdown of figures available

the purpose into an operations center, with the heirloom furnishings replaced by modern drafting tables and the old walls hung with maps and charts and dramatic sketches of things to come.

The Pereira plan, which its author emphasizes is still in its formative stage, divides the ranch into three general planning zones: the area extending from the ocean north to the proposed San Diego Freeway; that extending north from the freeway to the foothills; and the northernmost third of the ranch which continues into the Santa Ana Mountains to the boundary of Cleveland National Forest. In general, it is expected that the area to the northeast of Newport Beach will be the first to be intensively developed. The central section will be maintained as a predominantly agricultural area for many years to come and plans for the northern, more mountainous section will be given further study.

One of the great focal centers of the master plan is the proposed new University of California campus which will occupy a 1,000-acre site just northeast of Upper Newport Bay which has been given to the university by the Irvine interests. Mindful of the need for housing within the mass of students, faculty and university staff, the company has also set aside 660 acres more for this purpose adjacent to the campus. This additional acreage, in the planning of which the university will participate, will provide complete residential neighborhoods with their own schools, small shopping developments, churches, etc. The Irvine firm's contribution to the university includes a five-acre site at the terminus of a 2,000-meter rowing course which will extend from Upper Newport Bay and permit the addition of rowing and related sports to the university's athletic program.

Adjoining the campus on the north and covering some 130 acres there is contemplated a complete town center, patterned after the famous university towns of Europe. It will have its own civic center, shops, professional offices, banks, restaurants, hotel, theaters and other recreational facilities, as well as an area of high-density housing. Beyond this is planned a green belt with an 18-hole golf course and man-made lake bordered by single-family residences. The gently rolling foothills to the east and south of the university complex have also been allocated to residential use; altogether a population of approximately 100,000 can be eventually accommodated in the new university community. Another key area will be the Upper Bay itself.

Western Mountain AIA gives seven awards

When the Western Mountain District, AIA, met in Tucson late in October for its annual conference (PA&B, Dec. '60), it honored five buildings with Design Awards (a photo of the Carbon High School in Price, Utah, by Edwards & Daniels was not available at press time) and two Honorable Mentions.

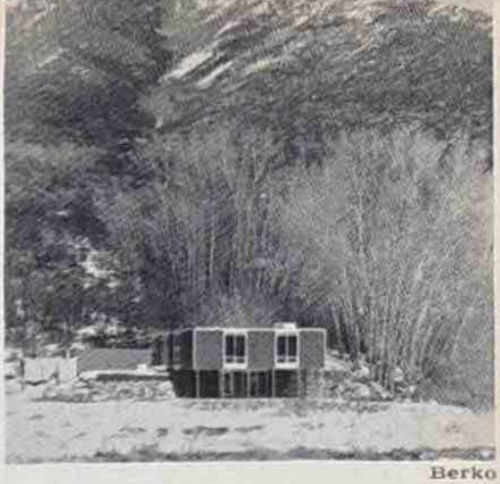
Design Awards



Guy Burgess

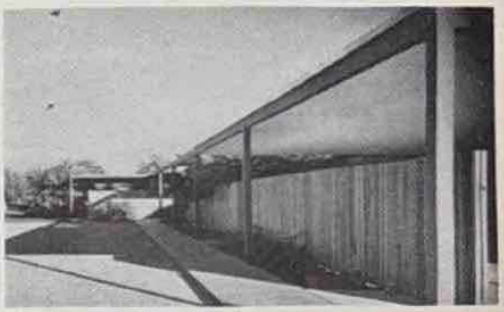


WASHINGTON PARK CONGREGATIONAL CHURCH (remodeling), Denver: W. C. Muchow & Associates, architects.



Berko

HOLTON RESIDENCE, Aspen, Colo.: Langdon Morris, architect.



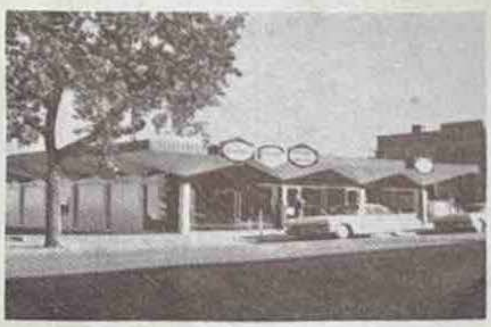
DR. FRERICHS RESIDENCE, Phoenix: Allan & Olsson, architects.

Stuart Weiner



MADISON JUNIOR HIGH SCHOOL, Albuquerque: Ferguson, Stevens, Mallory & Pearl, architects-engineers.

Honorable Mentions



FEDERAL SAVINGS AND LOAN ASSOCIATION BUILDING, Casper, Wyo.: Robert Wehrli of Architectural Guild.



IDEAL CEMENT CO. PLANT, Albuquerque: Ferguson, Stevens, Mallory & Pearl, architects-engineers.

DFPA pushes retirement housing at Tacoma conference

Much of the retirement housing now being built in the U. S. does not take into consideration the desire of older persons to remain in their communities near to the children and grandchildren. This was one of the major points brought out during a recent conference on retirement housing in Tacoma sponsored by the Douglas Fir Plywood Association.

Other aspects receiving considerable attention were the need for recreational and for imaginative designs that would meet the special needs of the aged without emphasizing them.

The conference was called as the first step in a projected promotion campaign similar to the DFPA's leisure cabins campaign.

Attending, in addition to DFPA representatives, were Professor Alexander Kira, assistant director, Housing Research Institute, Cornell University, a practicing architect, who recently collaborated on a study of retirement housing backed by the Ford Foundation; Eugene D. Sternberg, practicing architect, former professor of architecture at the University of Denver and at Cornell and designer of a retirement community in Denver which has gained national attention; Mrs. Mary Cleverley, assistant commissioner, housing for the elderly, U.S. Public Housing Administration; William C. Fitch, executive director, American Association of Retired Persons; Carl T. Mitnick, chairman, National Housing Center, and past president of the NAHB; James Rosati, builder of Florida Retirement Village; James M. Lange, editor of Practical Builder; Joseph B. Mason, editor of American Builder; and Carl Norcross, executive editor of House & Home. All will serve as a committee to assist DFPA in developing its program.

Conferees agreed that many older persons would prefer to remain in their communities if the right type of housing were available. "Let us not be sold too easily on the notion that all retired housing for the elderly must be in the form of complete communities, because these large complete communities will clearly mark them off from the rest of the communities, isolate them instead of integrate them," Sternberg said. He also called for a "pioneering approach to the design and construction of housing for the aged" and the "courage to use housing for the elderly as a good example to raise the standard of builders' housing."

Sternberg was particularly critical of rigid requirements for public housing. "In building large, monotonous projects, we have often created new slums. All too often we have isolated the residents of public housing into a type of ghetto that marks them off as different from, inferior to, the surrounding population."

He urged governmental agencies involved in processing applications for old age housing to view their role in a different light. "Could they not be guilty of suggesting new approaches, better design, more imaginative treatment? It is curious that America, which in so many areas of life has demonstrated a tremendous ability to simplify procedures, has made its regulations in the housing area so voluminous and so intricate as to frighten off altogether many interested groups."

Kira pointed out that while safety features are important, recent studies indicate that the aged themselves are more concerned about type of accommodation, ease of housekeeping relation to their families, remaining in existing neighborhoods and relation to community facilities.

While discussing safety features necessary for homes for the elderly Kira explained that many of these were equally desirable for other age groups. "In my opinion we are still continuing to build far too many houses which violate common sense and all principles of good planning and safety . . . We may find that paying attention to the needs of the elderly might result in good housing for all of us."

Some specific problems in designing for the aged discussed by Kira included gradual deterioration of visual ability, requiring generally higher levels of illumination, relatively uniform distribution of light and a system that can be easily lighted ahead of the person moving around in the dark.

Redevelopment plans aired as San Francisco honors agenc

San Francisco's three current redevelopment projects—the Golden Gateway, the Western Addition and Diamond Heights—are all proceeding according to expectations and hopes are high for their successful completion. Redevelopment experts expressed this optimism at a civic luncheon in the Sheraton Palace Hotel, sponsored by the Northern California Chapter, AIA, early in December.

The luncheon, held to honor the San Francisco Redevelopment Agency for its policies and procedures used in selecting the developer-architect team for the $60 million Golden Gateway project, drew an audience of more than 400 civic leaders, city officials, businessmen and architects.

Everett Griffin, agency chairman, recommended to the audence that all major public projects, wherever feasible, employ architectural competitions of the type used to select the winning Golden Gateway plan. "Competitions are costly," he said, "but they pay off."

Griffin particularly advocated an architectural competition for the three hilltop communities to be built in Diamond Heights, just south of Twin Peaks, on which developers will soon be invited to offer bids. Such a competition, he said, should be simple and inexpensive and should also give developers "maximum freedom to develop their own enterprise."

"In case you have any doubts," he continued, "there will be no punched out, duplicate cracker boxes, row on row, in Diamond Heights."

In the Western Addition, he said, the agency faced "another great need of our community—the creation close-in apartments for family livi at moderate cost. We could ha sacrificed everything to that unador ed objective of the lowest possib rentals for the dullest of apartmen But we insisted that people of mode ate means have their claims on go design in their homes and environ

Robert H. Ryan, executive preside of Perini Corp., developer for t winning Golden Gateway project, to the audience that the project is mo ing "very, very well" and that should be complete within five yea His firm's timetable for constructi begins in approximately 18 month after the land has all been purchas and cleared by the agency. Constru tion of the project will be in thr overlapping phases, Ryan said, wi the first residential sections schedul for completion by October 1963.

Construction itself will present unusual problems, he stated, exce possibly for the piling problem. "W are fully prepared to run into hul of old clipper ships and that sort thing."

In speaking of the significance the Golden Gateway project, Ry said that it is becoming clear that ban renewal is no longer merely sl clearance, but is a key to econon revitalization for any large city.

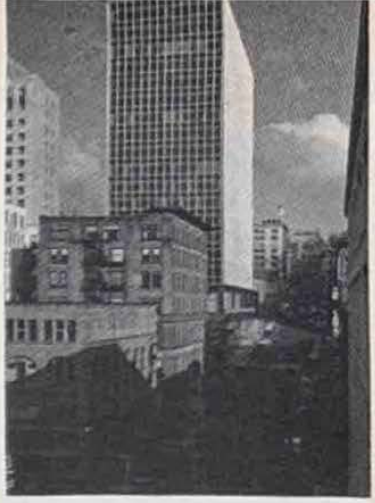
Other speakers at the luncheon cluded Mayor George Christoph Mario J. Ciampi, chairman of the chitectural advisory panel for Golden Gateway, and William Wurster and Vernon DeMars, prin pals in the architectural firms wh are designing the project.

Washington State AIA honors nine current projects

Nine buildings were premiated in the 10th annual Honor Awards competition of the Washington State Chapter AIA, last month. Citations for the architects and clients of the winning projects were presented at a reception in the Seattle Art Museum December 8, which also marked the formal opening of an exhibit of panels illustrating the 44 submissions.

The all-architect jury—foreman Lloyd J. Lovegren of Seattle, Alan C. Liddle of Tacoma and Kenneth E. Richardson of Portland—decided in advance that "only architectural design in its purest aspect could be considered, holding the architect responsible for all contributing factors such as landscaping, decorating, difficulty of clients or multiplicity of influences."

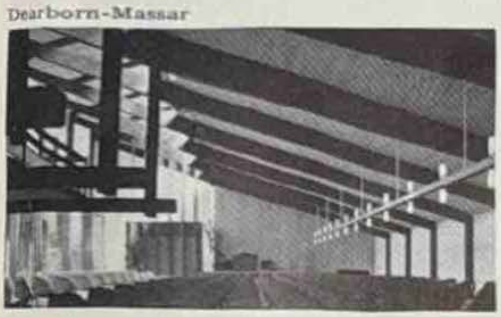
For the second year in a row, the chapter singled out an outstanding older building: the Elmer E. Todd House in the Highlands, which Andrew Willatsen, a onetime employee of Frank Lloyd Wright, had designed for construction in 1909. "A beautiful pattern and continuity of design make this well-kept home an architecture of enduring quality," said Victor Steinbrueck on behalf of the preservation of historic buildings committee. "The exterior of dark brown wood and light stucco with the long sweeping roof overhangs fits most gracefully and appropriately into the beautiful wooded landscape."



Art Hupy

NORTON BUILDING, Seattle (PA&B, Feb. '60): Bindon & Wright, architects; Skidmore, Owings & Merrill, consultants.

Dearborn-Massar



UNIVERSITY UNITARIAN CHURCH, Seattle: Paul Hayden Kirk & Associates.

Dearborn-Massar



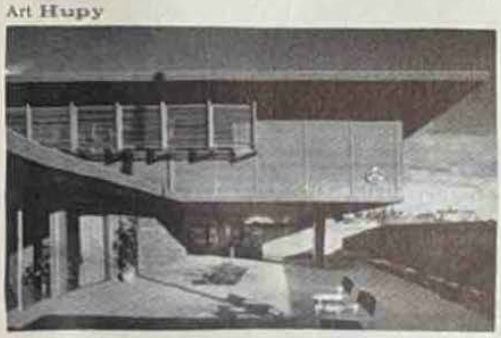
FACULTY CENTER BUILDING, Seattle: Paul Hayden Kirk & Associates and Victor Steinbrueck, architects.

Chas. R. Pearson



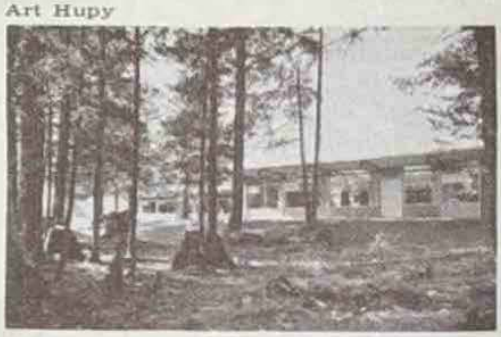
ALLISON APARTMENTS, Seattle: A. O. Bumgardner & Partners, architects.

Art Hupy



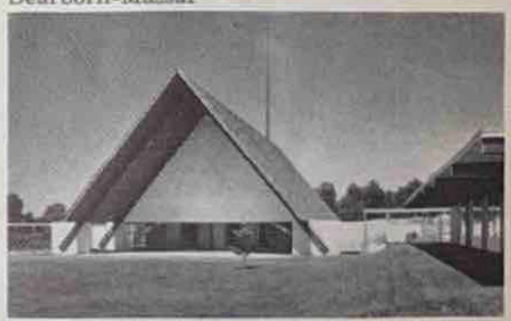
SCOUTING SERVICE CENTER, Seattle: Ibsen A. Nelson and Russell B. Sabin, architects.

Art Hupy



CEDAR WAY ELEMENTARY SCHOOL, Edmonds: Dan F. Miller, architect.

Dearborn-Massar



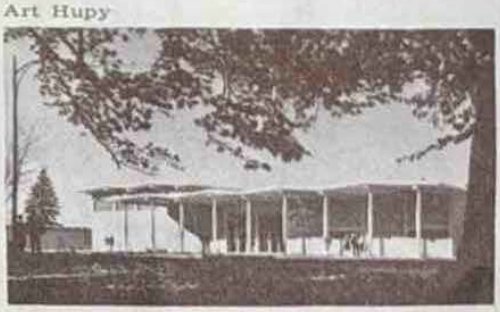
EMMANUEL EPISCOPAL CHURCH, Mercer Island: Waldron & Dietz, architects.

Chas. R. Pearson



UNITY CHURCH OF TRUTH, Seattle: Young, Richardson & Carleton, architects-engineers.

Art Hupy



STUDENT UNION BUILDING, Western Washington College of Education, Bellingham: Bassetti & Morse, architects.

Art Hupy



ELMER E. TODD HOUSE, Seattle (completed 1909): Andrew Willatsen, architect.

new offices, partnerships

J. Richard Jenkins has opened his own architectural office at 1405 S. 22nd East St., Salt Lake City. A graduate of the University of Utah, he has been affiliated with several local firms for the past eight years.

Marcel E. Sedletzky has opened his own office for the general practice of architecture and planning on Flanders Drive, Carmel-by-the-Sea, Calif. He served as an associate with the firm of Victor Gruen Associates of Beverly Hills and later with Robert R. Jones of Carmel.

John D. Anderson, formerly with the Denver architectural firm of Wheeler & Lewis, has opened his own office at 1477 Pennsylvania St., in that city. He holds a degree in architecture from the Harvard Graduate School of Design.

James A. Wares, chief architect for Marshall Field & Co., Chicago, for more than 22 years, has opened an office for the general practice of architecture in the Broadmoor Center Building, 151 S. Tucson Blvd., Tucson. As part of his new operation, he will provide a consultation and design service in shopping center development, store planning and merchandise engineering.

A. O. Bumgardner, Seattle architect, has established a partnership with Alvin Dreyer and Peter R. Parsons, known as A. O. Bumgardner & Partners. Both have been associated with Bumgardner since their graduation from the University of Washington in 1956.

Cartmell & Rossman is a new architectural firm in Phoenix with offices located at 2505 E. Thomas Road. Both men have had over 10 years in the field of design. Cartmell practiced in Lincoln, Neb., before moving to Scottsdale three years ago; Rossman in Edmonton, Alberta, where he was a member of the Royal Architectural Institute of Canada, before moving to Phoenix. The firm will offer consulting services in the field of acoustics.

new associates

John Sturgis has been advanced from architectural coordinator to an associate in the Los Angeles architectural-engineering firm of Leach, Cleveland & Associates.

Charles B. Ogden, who formerly maintained an architectural practice in Seattle, has joined the Everett, Wash., firm of Hall & Dykeman as an associate.

Robert Caudle, associated with Langdon Morris, Denver architect, for the last 2½ years, has joined Castle-West, interior design firm. A graduate of Texas Technological College with a degree in architecture, he will specialize in working with architects on interior design projects.

firm changes

Terence L. Whitington, formerly a partner in the architectural firm of Whitington & Hyde, now is practicing under his own name at 240 Professional Bldg., El Centro, Calif.

The Bellevue, Wash., architectural partnership of Mithun, Ridenour & Cochran has been dissolved. Omer Mithun continues to practice at 34 104th N.E. under the name of Mithun & Associates. William C. Ridenour and Donald C. Cochran continue their association at 850 106th N.E. under the name of Ridenour & Cochran.

The Las Vegas architectural firm of Marshak & Brandis has been dissolved. Ira C. Marshak continues to practice at 212 Las Vegas Blvd. S., while Howard Brandis is located at 900 W. Bonanza Road.

The architectural partnership of Rich and Trimble & Associates in Seattle has been dissolved. William A. Trimble remains in Room 6, Ives Building, 4507 University Way, and Merrill S. Rich has moved to Room 1 of the same building.

The Honolulu office of Bassetti & Morse, Seattle-based architectural firm, is now known as Bassetti, Morse & Tatom, with John Tatom as the third partner.

NORTHWEST COMPETITION

To encourage creative application of its Textolite laminated surfacing, the Northwest region of General electric Co. is sponsoring a competition for architects, designers and decorators who practice in Washington, Oregon, Idaho, western Montana and British Columbia. Applications must utilize at least 250 sq. ft. of the material. Contest period extends through September 30, 1961, with three cash prizes to be given: first, $500; second, $250; and third, $100. The all-Seattle jury will consist of Gerald Williams, architect, with Young, Richardson & Carleton; Douglas Bennett, interior decorator; and Jack Ballard, GE district sales manager.

new addreses

C. Cullimore Jr., architect, to 1616 36th St., Sacramento.

Marvin S. Knox to 166 Saratoga Ave., Los Gatos, Calif.

Wolff & Zimmer, architects, to 1919 S.W. 12th St., Portland.

Thomas J. Russell, architect, to 2292 Long Beach Blvd., Calif.

retirements

Robert Murray has retired as supervising architect with the California State Division of Architecture and is engaged in consulting and some architectural work at 370 Laguna Ave., Morro Bay, Calif.

deaths

Victor G. Anderson, 76, retired landscape architect who served as Stockton, Calif., park superintendent for 30 years, died November 9.

elections, appointments

Franklin A. Brown is the new city building official in San Jose, succeeding Robert V. Lotz who retired in October after extended illness kept him from his job since early spring.

Two Westerners—Fred Bassetti of Seattle and William L. Pereira of Los Angeles—have been named to serve on the national AIA Honor Awards jury for 1961. They will meet with Arthur Q. Davis of New Orleans, Richard D. Butterfield of West Hartford, Conn., and Morris Ketchum Jr. of New York January 18-20 in the Octagon, selecting their chairman at the beginning of the meeting.

Bellingham, Wash., has a new planning director, Victor Grimson of Burnaby, B.C., replacing Bruce Finke, who resigned to join the Seattle Planning Commission.

honors

Architect Ernest A. Born received the Honor Award at the "Men of the Year" banquet of the Building In-

dustry Conference Board in San Francisco. The top Achievement Award went to general contractor Guy F. Atkinson.

miscellany

✓ The Colorado State Board of Examiners of Architects has appropriated $1,000 to the Denver Public Library for purchase of technical books in the field of architectural design. Funds came from renewal fees of architects practicing in the state, according to Eugene D. Sternberg, board president.

✓ The University of California at Berkeley will participate in the fourth annual Koppers architectural student design competition. The student with the winning design at each of the seven schools involved will receive a $1,000 scholarship toward his final year tuition.

✓ The University of Washington's College of Architecture and Urban Planning has been authorized to offer the degree of bachelor of landscape architecture. For many years, degrees have been offered in architecture and urban planning. The college will now be able to provide complete professional training in environmental design, comments Dean Arthur P. Herrman. The landscape architecture curriculum will require a five-year training problem, similar in structure to the requirements for the other two degrees.

AIA chapters elect officers

Among the AIA chapters in the West which have elected new officers are five in California and one in Hawaii:

Northern California: George T. Rockrise, president; Cabell Gwathmey, vice president; Henry Schubart Jr., secretary; Alton S. Lee, treasurer.

East Bay: George P. Simonds, president; Mitchell Van Bourg, vice president; Frank Hunt, secretary; Lee Stuart Darrow, treasurer.

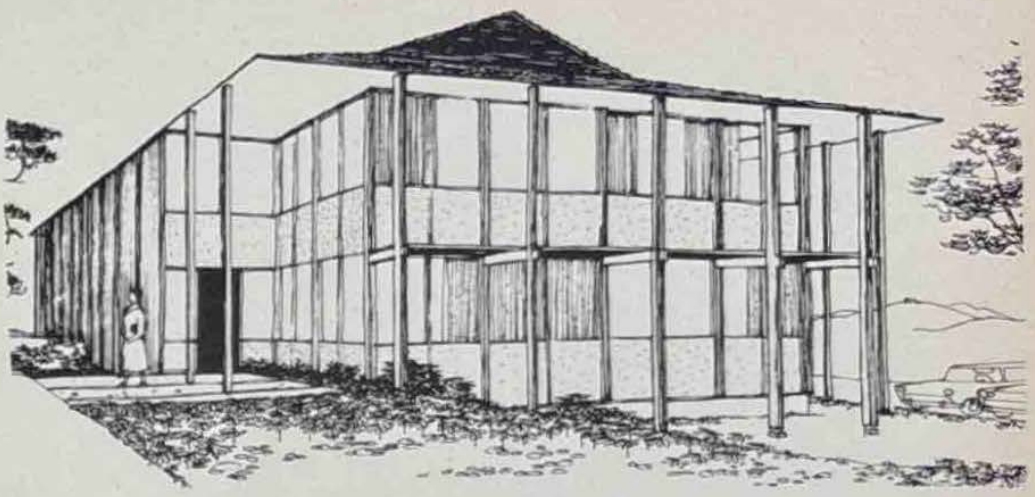
Monterey Bay: Fred Keeble, president; Jerome Kasavan, vice president; Edward Duerr, secretary; William Rickner, treasurer.

Coast Valleys: Allan Walter, president; David Potter, vice president; Peter Wuss, secretary; Russell Williams, treasurer.

Orange County: Ray Johnson, president; Kermit Dorius, vice president; Knowlton Fernald, secretary; Richard Tom, treasurer.

Hawaii: Clifford F. Young, president; Gordon A. Bradley, vice president; George V. Whisenand, secretary; Paul D. Jones, treasurer.

JOB OF THE MONTH



EIGHT OFFICE BUILDINGS identical to one above form campus-like development.

Campus type setting for suburban office complex

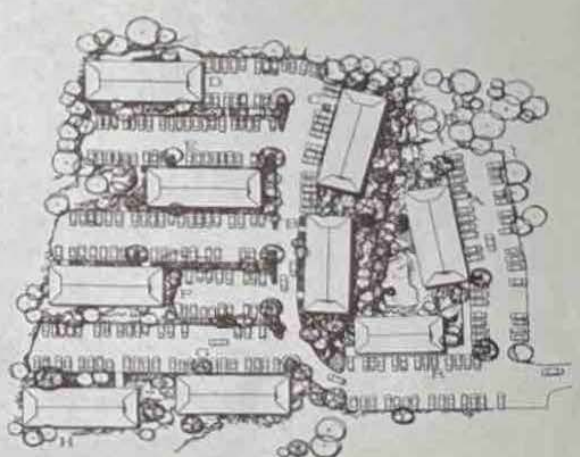
Eight 8,000-sq. ft., two-story buildings will be grouped in a campus type arrangement to form an office complex sited on 4¾ acres in Portland's west hills. Located in an area in an extreme state of flux at the present moment, the project was designed by Lewis Crutcher to blend with whatever future developments occur there. It is believed to be the first of its type in Oregon.

Individual office structures will be of post and beam construction with glued laminated beams and wood and glass curtain walls. Interiors will be clear span with movable partitions and suspended acoustical ceilings. Gas fired units will provide both heat and air conditioning from a perimeter system.

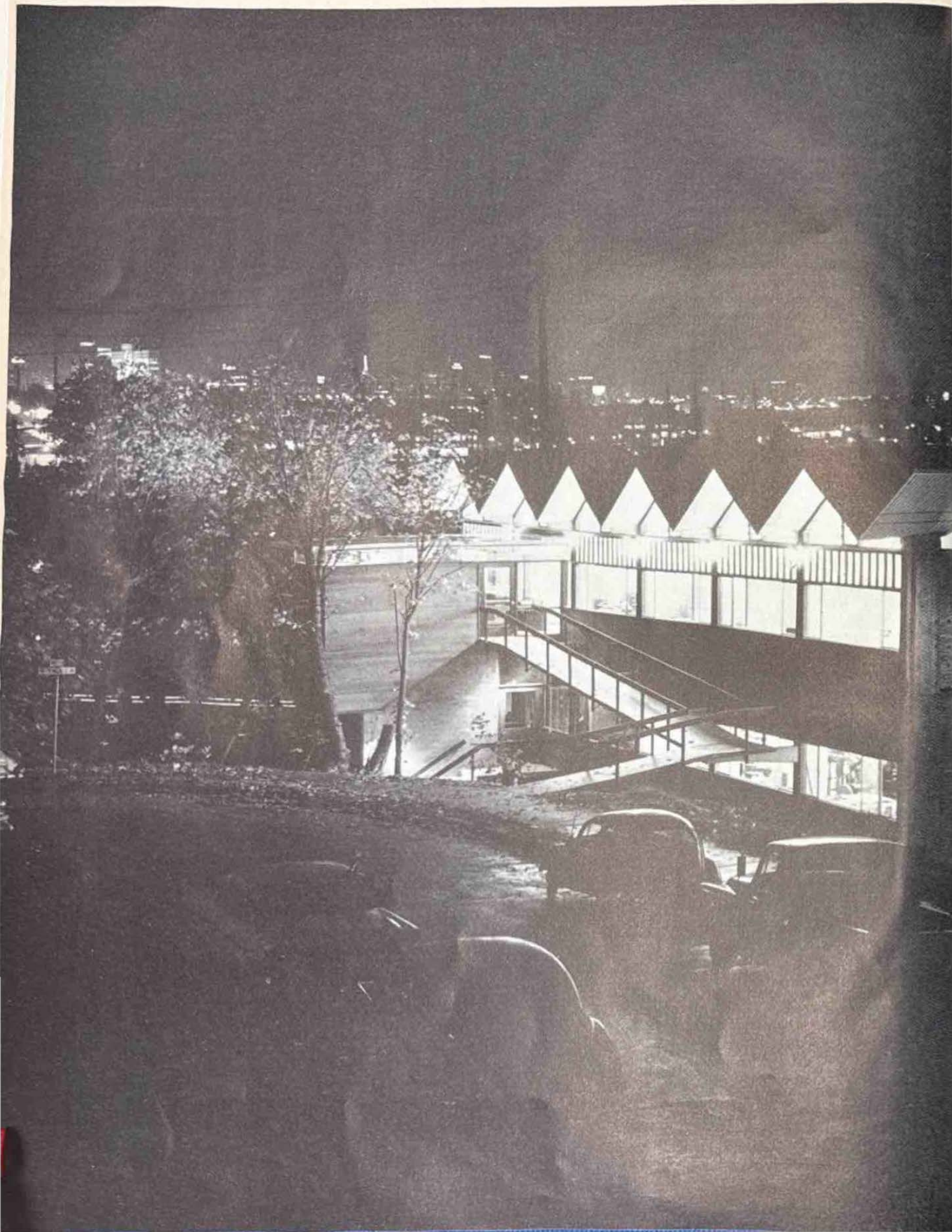
Plans include a two-story building to house a coffee shop, secretarial, bookkeeping and telephone answering services on the first floor and auditorium type conference rooms for sales meetings, banquets and the like on the second floor.

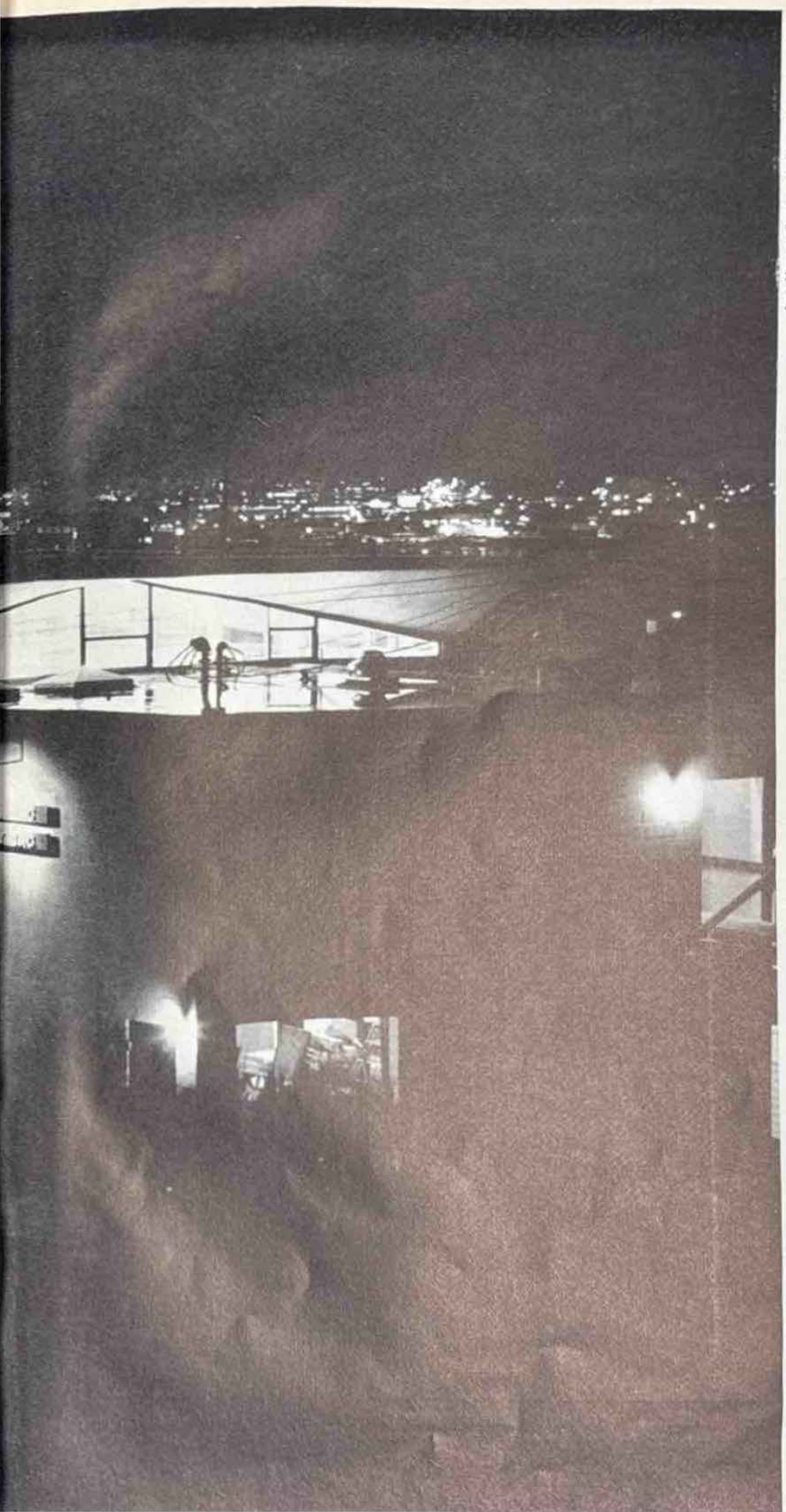
Pedestrian traffic area surrounding the buildings will be landscaped. All telephone and power lines will be underground. Off-street parking will provide for 300 cars.

The suburban project fronts on the Sunset Highway in an area known as Sylvan. It is being built by Construction, Inc., for Sylvan Park, Inc., which will own and operate it. The corporation also owns 11 acres nearby scheduled for future development. Present complex is slated for completion early in January. Estimated valuation is $2,500,000.



SMALLER STRUCTURE will house coffee shop, etc.





Art Hupy photos (unless otherwise noted)

A new roof over PA&B

PACIFIC ARCHITECT & BUILDER has the pleasant assignment this month of presenting the headquarters building which it shares with its publisher and printer on a site overlooking Lake Union one mile from downtown Seattle. The entire building process, with the normal architect-client-contractor relationship, has been an enlightening and gratifying experience that will stand us in good stead in the editorial future. As part of the client's family, we naturally see our new home from a very personal point of view. Be that as it may, we have come to know first hand what it means to be transplanted from a building that is simply a building to a structure that is indeed a piece of architecture—a structure that excites the senses, stimulates the imagination and warms the heart as we go about our day-to-day task of making a living.

—R.E.K.

A statement by the architect:

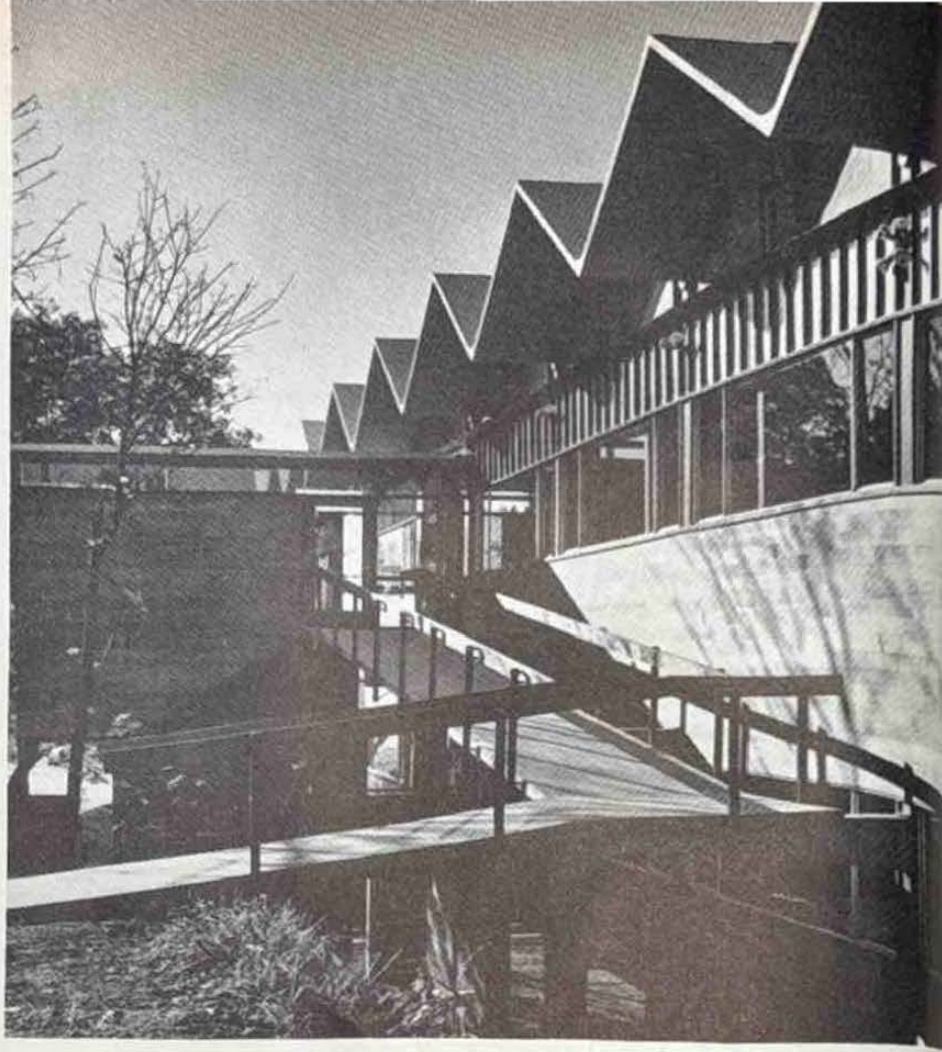
PACIFIC BUILDER & ENGINEER, INC., has two coordinate operations: a publishing company for its four magazines and one daily—PACIFIC BUILDER & ENGINEER, PACIFIC ARCHITECT & BUILDER, WESTERN BUILDING, CONSTRUCTION NEWS BULLETIN, PACIFIC CONSTRUCTION DAILY—and a printing plant for its own publications as well as commercial printing, principally for other organizational magazines.

Originally, an ideal plan combined both the publishing and printing operations on one floor, with parking, loading and storage underneath, on the ground level. But this required a freight elevator and, more importantly, the building area would have covered the entire site within setback lines with very restrictive spatial and structural possibilities.

A three-level scheme was adopted: publishing (office) space on the third, printing on the second and covered parking for 12 cars on the ground (see cross section on p. 19). Arranging the building functions on three floors achieved considerable economies in vertical construction, equalized cut and fill on the site and permitted the structure to freely develop an appropriate architectural expression.

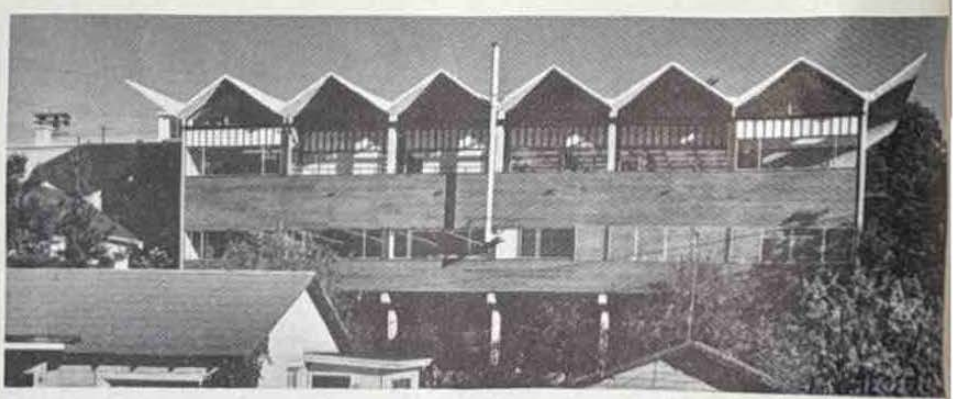
Certain limiting factors governed our design decisions:

- The printing floor demanded the most space and most inflexible arrangement. This determined the structural layout at the parking level and the gross area of the publishing level. The need for clear spans for parking and the design loads at the printing level determined the use of concrete for the structure.
- The vehicle ramp was located at the lowest street elevation adjacent to the site. This was the only workable access to parking under the building.
- We desired to place the building so as to command a good position from the major approach from Eastlake Avenue, i.e., to keep the upper floor height and the pedestrian ramp up to the main floor such as to be readily seen. The ramp and expressed stair tower make an important feature of the site slope





RAMP AND EXPRESSED STAIR TOWER: ". . . make an important feature of the site slope as well as easy access for visitors."



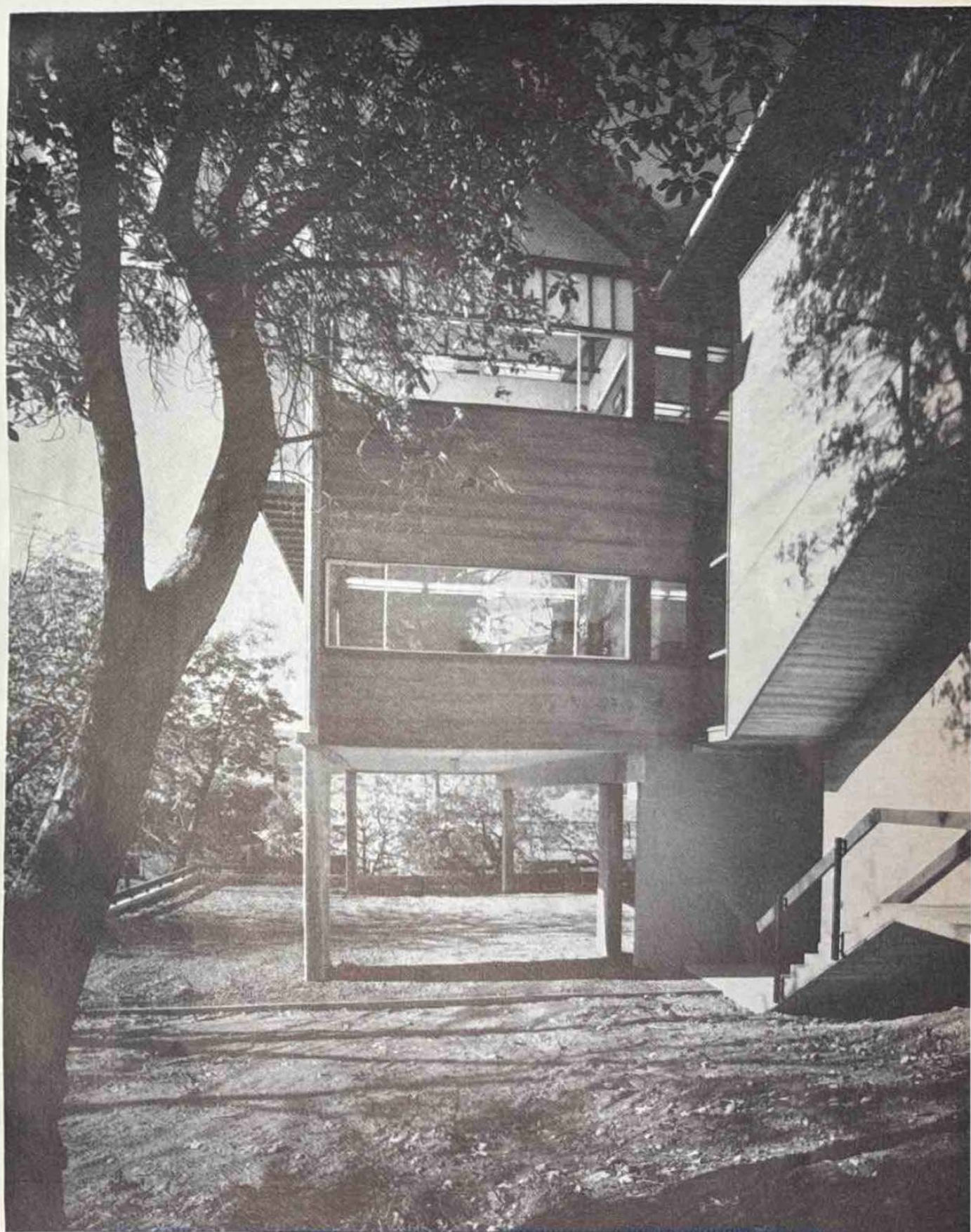
DOWNHILL ELEVATION WITH RECESSED BALCONY: ". . . a three-level scheme . . . publishing on the third, printing on the second and covered parking on the ground (photo across page

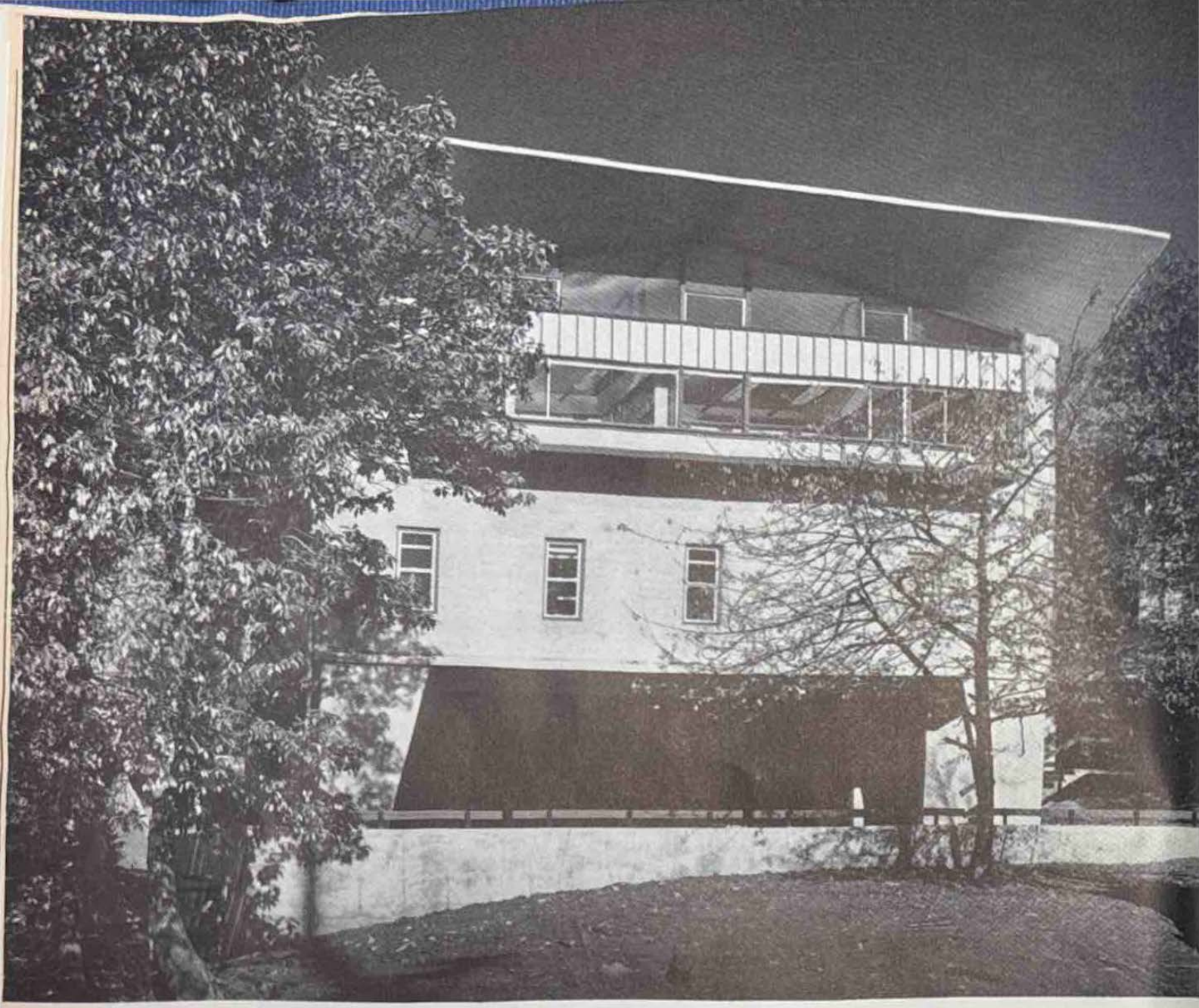
Publishing-Printing Plant
Seattle, Washington

A. O. BUMGARDNER & PARTNERS, Architects

WORTHINGTON, SKILLING, HELLE
& JACKSON, Structural Engineers

RILEY PLEAS, INC., General Contractor





SOUTH ELEVATION: ". . . a roof having a sense of hovering above the office partitions so as to reduce them to mere screen walls."

as well as easy access for visitors.

In addition to these limitations, the program for each floor showed a clear division between working space and servant storage—utility spaces. The three-dimensional building form is a logical extension of these plan requirements: there is a three-story service block on the north end including all the mechanical equipment, a stair tower on the east and the main two floors of work space under the hyperbolic paraboloid roof.

The upper publishing level is largely office space. Requirements varied as to size and functional relationships of separate offices. To achieve an order and overall unity for these diverse offices, a readily discernible sense of volume was necessary. This could be obtained only by the design of the roof: a roof having a sense of hovering above the office partitions so as to reduce them to mere screen walls. Considerable effort was made to prevent lighting fixtures and other interferences from destroying this sense of space. The underside of the roof is entirely free of protuberances other than the center rods to support the tie bars across the structure.

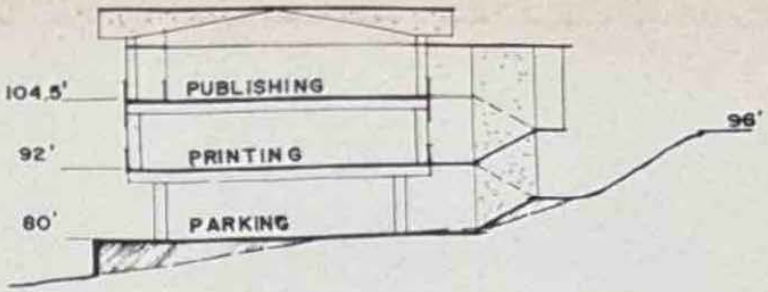
Because of its location and occupancy, the structure qualified as Type V under the Seattle building code—no fire rating required. Th permitted the use of a wood curta wall over the concrete frame.

Stern & Towne, mechanical eng neers, designed the gas fired boil installation with finned pipe co vectors for the hot water syste This is augmented by radiant co in the floor slab of the composi room. Humidity control is provide for paper stock and printing ope ations. Thomas E. Sparling was th electrical engineer.

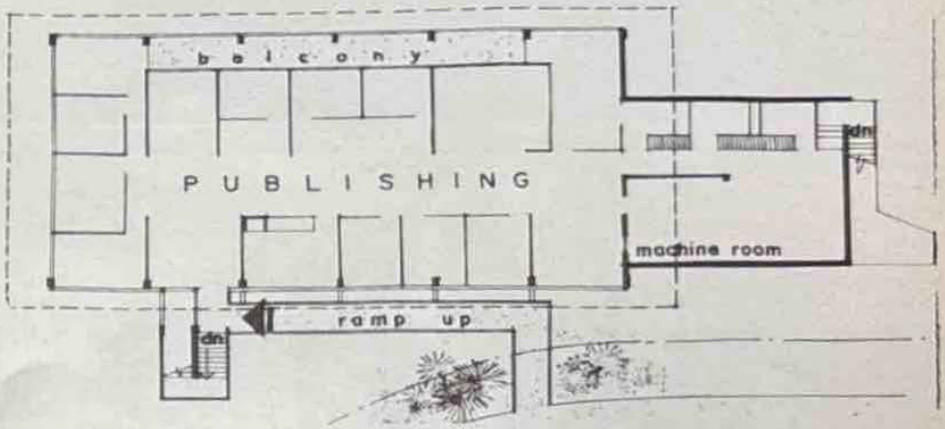
Exterior concrete has been le natural. However, considerable ca was taken in the selection of form ing materials in order to control su face textures. Columns, undersid

of slabs and precast elements have been formed with plywood to produce as smooth a finish as possible; retaining walls, end walls of the main block and other poured-in-place walls have been formed with 1x8 rough sawn, mill-run cedar to emphasize the difference in board thickness and grain. The latter is a bold texture at close hand. Seeing three 11-ton presses in action in the printing plant is impressive; we wanted the building to evidence the vigor and strength of such an operation. The service block was changed to concrete masonry units (for an estimated $3,200 saving) and painted a warm gray harmonious with the end wall of concrete (unpainted).

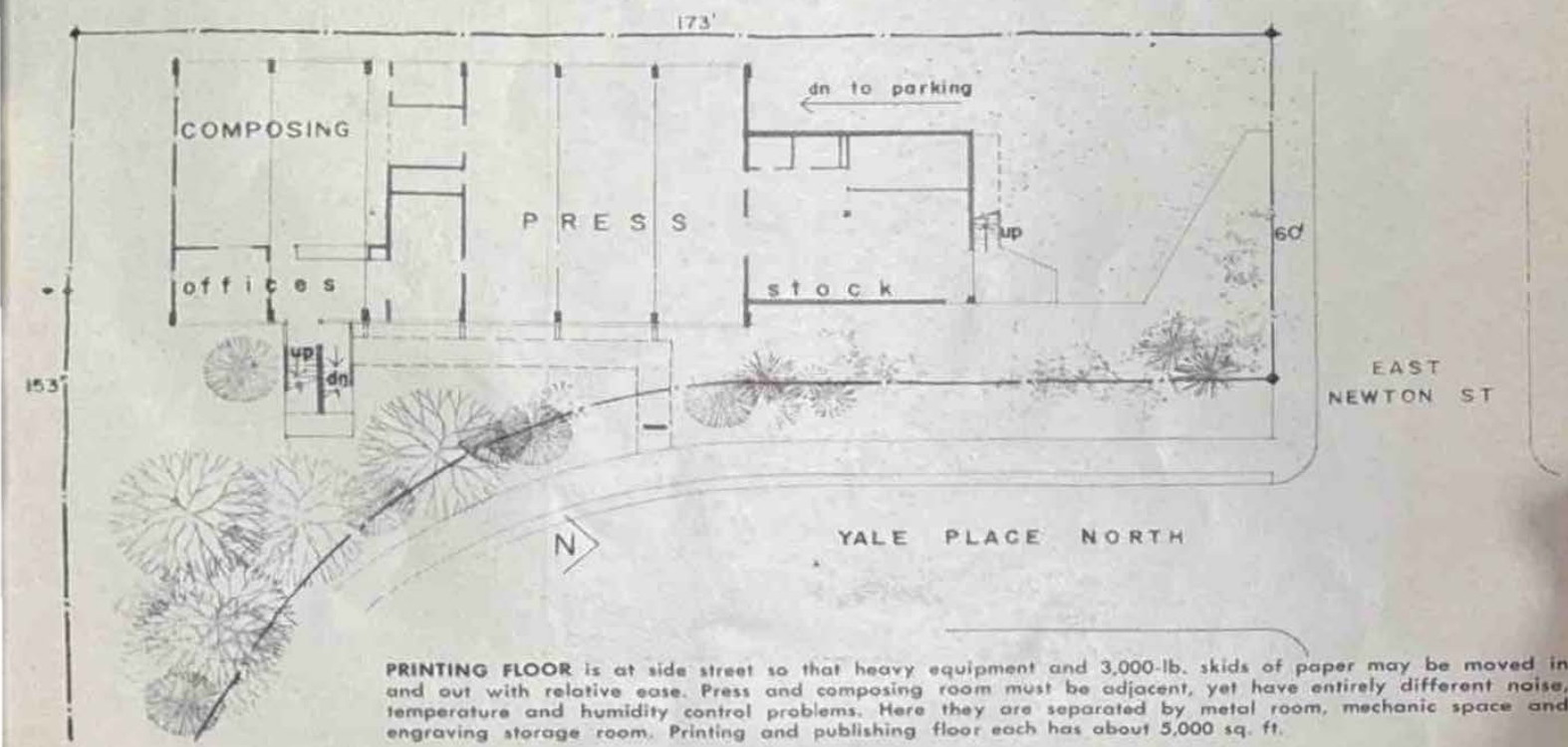
I should like to point out that the client was not building for architectural aggrandizement. Financial limitations required the most economical and functional plant. While the architectural considerations in the preliminary design proposals were enthusiastically received, the financial considerations were not so pleasant. It was not until after exhaustive studies of revising their existing plant or of remodeling other buildings then on the market that the



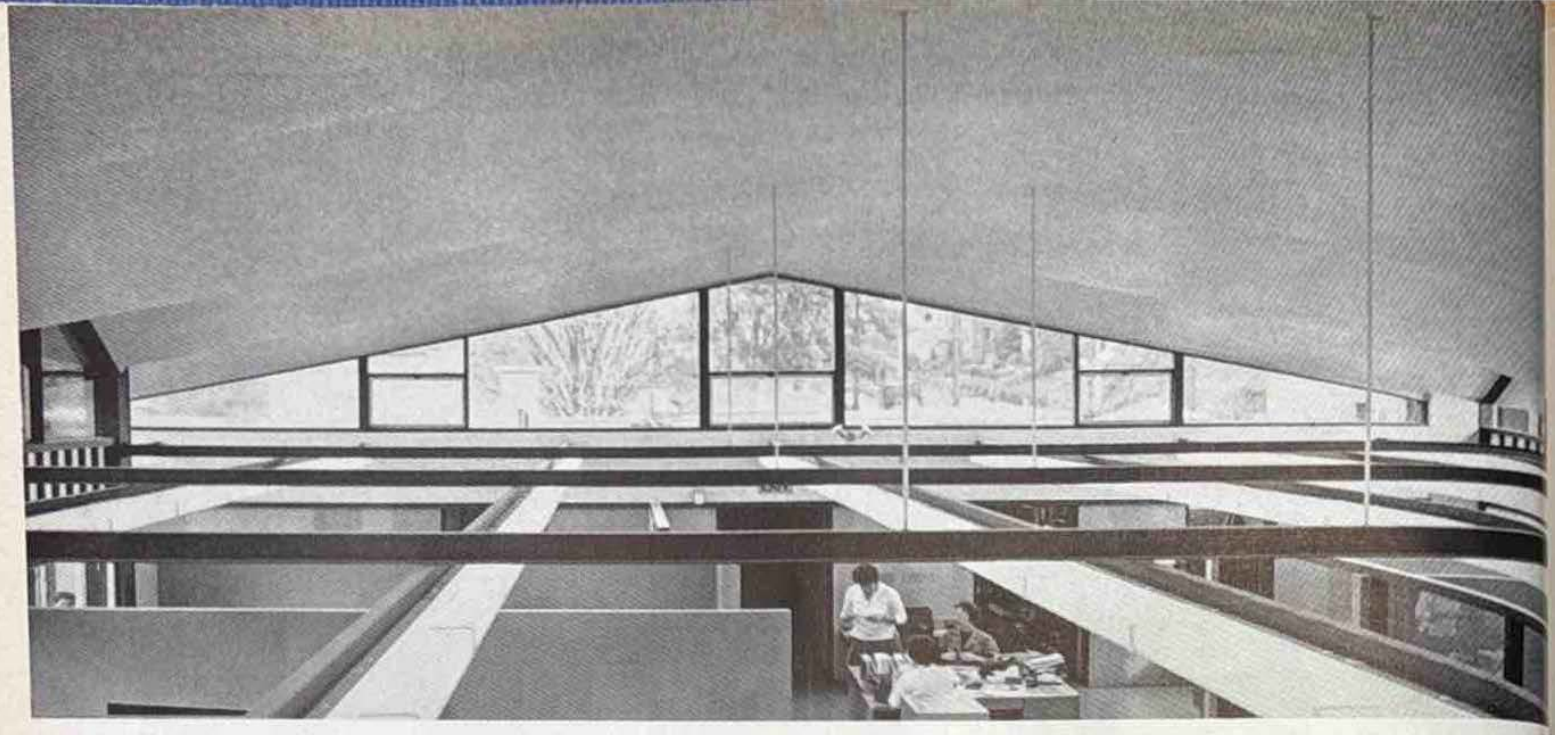
CROSS SECTION through stair tower. Site is utilized to maximum, with covered parking for dozen cars on lower level; factory space at level of egress from side street (92-ft. elevation); office space on top level accessible by pedestrian ramp from street level (96-ft. elevation).



AS OFFICE WORK GOES, producing daily, weekly and monthly publications is relatively noisy business. On this level, folding and stencil machines are confined to separate room; daily newsroom is next adjacent; editors and advertising personnel have semi-private spaces; management and bookkeeping are oriented to "quiet" end of building.



PRINTING FLOOR is at side street so that heavy equipment and 3,000-lb. skids of paper may be moved in and out with relative ease. Press and composing room must be adjacent, yet have entirely different noise, temperature and humidity control problems. Here they are separated by metal room, mechanic space and engraving storage room. Printing and publishing floor each has about 5,000 sq. ft.



PUBLISHING LEVEL: ". . . underside of the roof is entirely free of protuberances other than the center rods to support the tie bars across the structure."

ENTRY AND STAIRWELL: ". . . poured-in-place walls have been formed with 1x8 rough sawn, mill-run cedar to emphasize the difference in board thickness and grain . . . a bold texture."



board of directors ordered workin drawings to proceed.

Once the budget of $155,000 f the building, exclusive of land an fees, was adopted, it was clear understood that if the low bid, wi deductive alternates, was above th figure, there could be no new build ing! Low bid: $150,100; final co struction cost, with additions: $153 538.

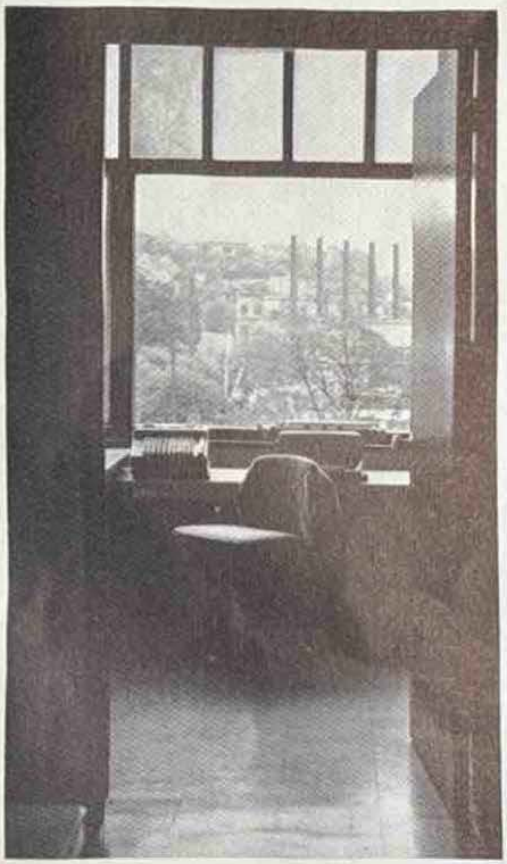
Everyone worked hard on th project, including the client. Fe analyze their operations so tho oughly as did Roscoe Laing and th entire staff. They continued to d so as questions arose and new ide came up. We found our client to b very receptive to new and sometime startling proposals. We found ou selves being startled in turn by som very good counterproposals made b the client.

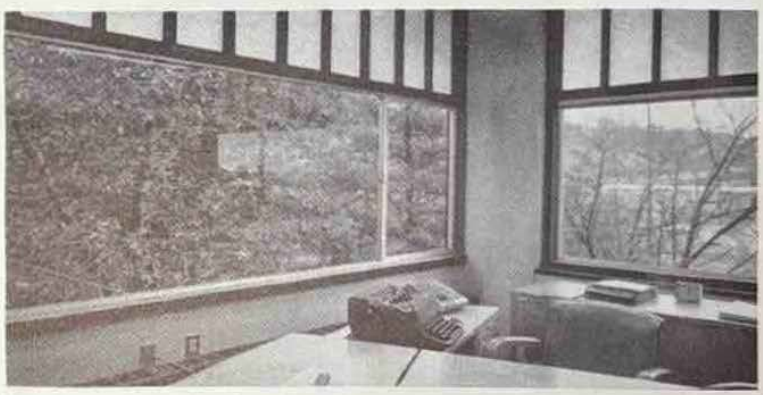
With our office only a few block up the hill from the building si (cranes used in pouring concre could be seen from the drafting roo windows), supervision was consta and continuous. Mel Wilson, th general contractor's capable fie superintendent, looked ahead in su ficient time to forestall most pro



OFFICE OF PRESIDENT N. B. CHAPIN: ". . . color and line and texture and detail."

PUBLISHING-PRINTING PLANT







lems. Likewise, relations with the consulting engineers were very harmonious. Long hours of supervision helped prevent any major crisis from developing during construction.

Special credit is due Alvin Dreyer of my office (and now a partner) who nursed the job through to completion and to Jack Christiansen, associate with the structural engineers.

A statement by Roscoe E. Laing, vice president and manager of Pacific Builder & Engineer, Inc.:

We suppose that every building—good or bad—starts the way ours did, with the handshake of a client who has relatively vague ideas about architecture and an architect who at best can have at the outset no more than a limited knowledge of the operational procedures and requirements of his client's business.

In our case, we retained A. O. Bumgardner because we had seen and liked his work and because we felt that he must be at least dimly aware of what goes on in our operation through his advisory contacts with the editor of PACIFIC ARCHITECT & BUILDER. We dumped our requirements in his lap: big ones, big ideas, big desires, big needs, *small budget*. The ideal architect-client relationship should have gone to pot right there, but it didn't.

The architect inspected many sites with us and at last concurred upon the final sidehill choice, probably because it presented a challenge and because the low land cost would leave a little money for the building.

We told him how much square foot area we wanted and we oriented the work flow through the publishing and printing areas. We told him our desires for as much natural light and natural ventilation as possible (but without the necessity for costly draperies and heat-resistant glass) and we explained the advantages of humidity control in the pressroom and paper storage areas. We wanted clear span areas throughout and flexibility in the office partitioning and the whole thing had to be architecturally pleasing—how he must have shuddered in private when he related some of these things to the budget.

But we got all of this, or a reasonable facsimile, and we got it within the final budget. The skill of the architect did it, but there is a lesson for all clients in this story: the architect could not have achieved our own goals for us if we had been stubborn or arbitrary about what we *thought* we wanted.

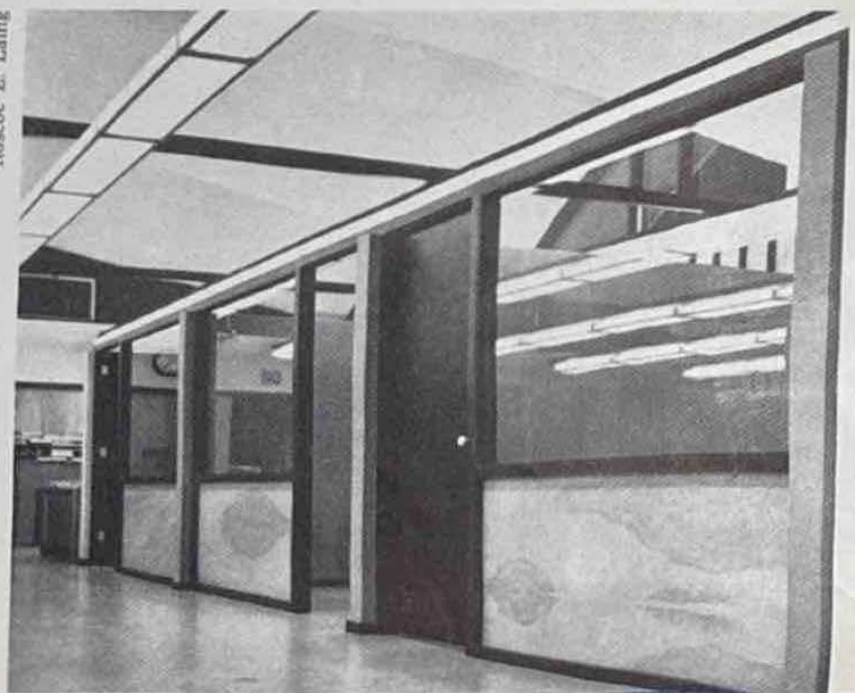
We were almost arbitrary about demanding a one-level structure. We ended up with two levels and now think it is better. The roof: We had pictured a flat or sloping roof; the hyperbolic parabloid proposal delighted many of us at first sight, dismayed a few of us, while others reserved judgment. We've been in the building a couple of months and now can't imagine having offices with other than a "parab" ceiling.

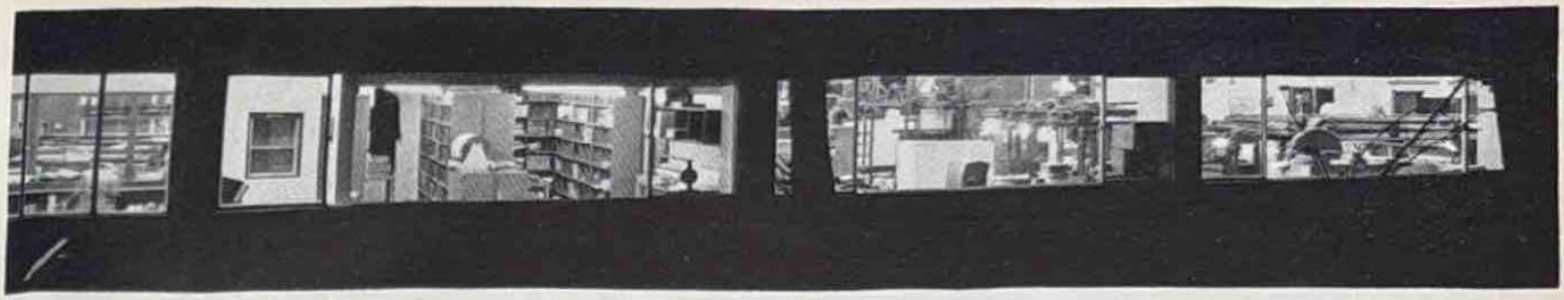
The budget: we were arbitrary about that two or three times and finally had to make it stick. We lost a few features to the budget that we might otherwise have been arbitrary about. Today we don't miss them. Even the office interiors have a richness in appearance created largely by the sparing use of only one non-spartan material, Cedawood core hardwood panelings in birch, walnut, oak and Seattle's native madrona.

In the final analysis, we find ourselves within a building that far exceeds our original dreams. We have the floor space we need, the work flow is oriented exactly as we desired—and on the publishing level it is even zoned into noisy, intermediate and quiet areas. We have the air and the light that we desired we are completely functional. And in addition, we have color and texture and line and detail that are bold, imaginative and stimulating to management and employees alike.

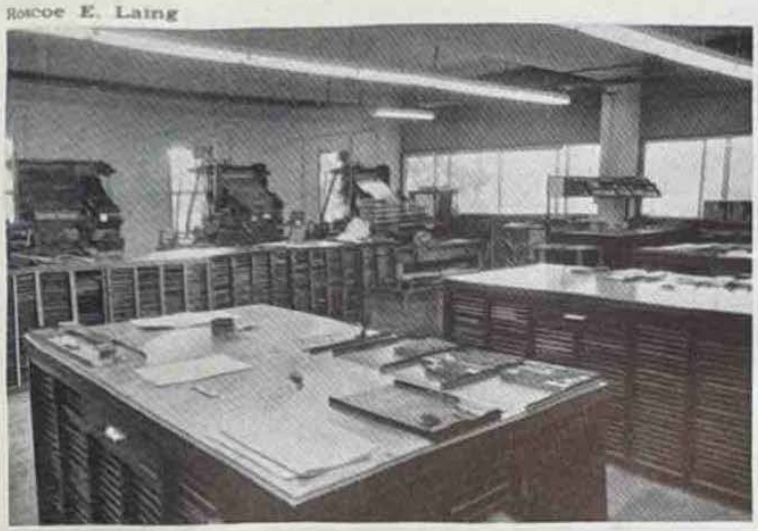
OFFICE INTERIORS: ". . . have a richness in appearance created largely by the sparing use of . . . Cedawood core hardwood panelings in birch."

Roscoe E. Laing





Roscoe E. Laing



Roscoe E. Laing



PRINTING LEVEL: "Seeing three presses in action is impressive; we wanted the building to evidence vigor and strength."

OUTLINE SPECIFICATIONS

Structure: footings: concrete pads for columns; frame: reinforced concrete; pre-stressed post-tensioned concrete beams—Graystone, Inc.; reinforcing steel—Northwest Steel Rolling Mills, Inc.; roof: 2½-in. thin shell concrete; steel I-beam tension ties—Northwest Steel Rolling Mills, Inc.; end walls: poured-in-place concrete; floors: reinforced concrete; all concrete—(Lone Star cement) Pioneer Sand & Gravel Co.

Exterior Finish: exposed rough-textured concrete; exposed concrete block; 1x6 flush cedar curtain wall; stain—Olympic Stained Products Co.; translucent white plastic trim—Everlite Corp.

Roof Surfacing: felt, asphalt and glass fabric—Pioneer Division, The Flintkote Co.

Windows: aluminum transom and sliding lights—Fentron Industries, Inc.; glass stopped in wood—(Lustraglass) American Window Glass Co.; wire plate glass at stairwell entry—(Misco) Mississippi Glass Co.

Doors: hollow core slab flush—Masonite Corp.; steel fire—Grand Metal Products Corp.; overhead for loading dock—Johnston Overhead Door Co.

Floor Surfacing: concrete slab hardener—(Tri-Kote) W. F. Macklin Co.; asphalt tile—(Hako) Mastic Tile Division, The Ruberoid Co.; deck covering—(Celastic) Wasco Products, Inc.

Insulation: roof and walls—Owens-Corning Fiberglas Corp.; floor—Insul-Foam Co.; formboard—Tectum Corp.

Interior Finish: painted wallboard—Bestwall Gypsum Co.; hardwood-surfaced flakeboard in oak, birch, walnut and madrona—(Cedawood) Columbia Hardbord Co.; painted exposed concrete; painted exposed block.

Ceilings: sprayed acoustical plaster—Zonolite Co.; painted exposed concrete.

Lighting: fluorescent—Globe Illumination Co.; recessed incandescent—Prescolite Manufacturing Corp.; reflectors—Smoot-Holman Co.; steel channels—Unistrut Products Co.; floor ducts—General Electric Co.; conduit and cables—Rome Cable Division, Aluminum Company of America.

Mechanical: gas fired hot water heating system—Laars Engineers, Inc.; floor coils and wall convectors—Sterling Radiator Co.; vacuum controls system—Powers Regulator Co.; gas fired hot water heater—A. O. Smith Corp.; automatic electric humidifier and gas hot air exchange—Research Products Corp.

Plumbing: fixtures—Kohler Co.; valves—Sloan Valve Co.; shower stall base—Fiat Metal Mfg. Co.; stainless steel kitchen sink—Elkay Mfg. Co.

Special Equipment: metal shelving and lockers—Equipto Division, Aurora Equipment Co.; intercom system—Electro-Vox Co., Inc.; dumbwaiter—Vincent Whitney Co.

Total Area: 10,200 sq. ft. (exclusive of covered parking).

Total Cost: $153,538 (exclusive of fees).

Cost per Square Foot: $12.20 (mechanical basement and covered parking at one-half).

Date of Completion: December 1960.

Fire Station No. 4
Berkeley, California

•

RATCLIFF & RATCLIFF, Architects
H. H. WANG, Structural Engineer
RALPH LARSEN & Son, General Contractors

Karl H. Riek photos



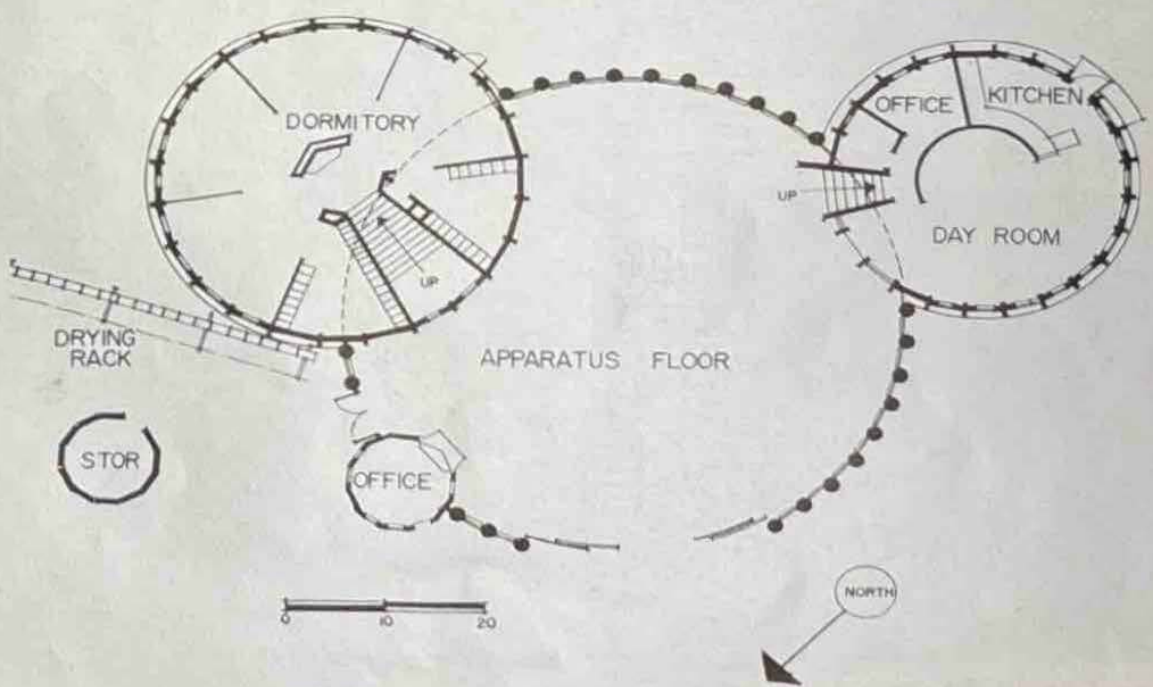


DOMED CENTRAL ROOM houses one fire engine and two cars, is flanked by two more circular units.

Pavilion type structure complements park site

SITE for this project is a small triangular park containing a number of large pines and redwoods. While it is not used to any great extent by the public, the neighbors objected to constructing a fire station there, so much so that the issue was carried to the State Supreme Court and finally placed before the voters. Needless to say, after seven years of public debate, the design problem became more crucial than ever.

"The challenge was to create a building which would enhance the parklike atmosphere, retaining all essential trees," the architects comment. "It had to fit gracefully in an area bounded by streets and had to be completely visible from all sides. After starting to work, we soon decided that the structure should be considered from the point of view of a park pavilion and that rectangular shapes on this triangular lot

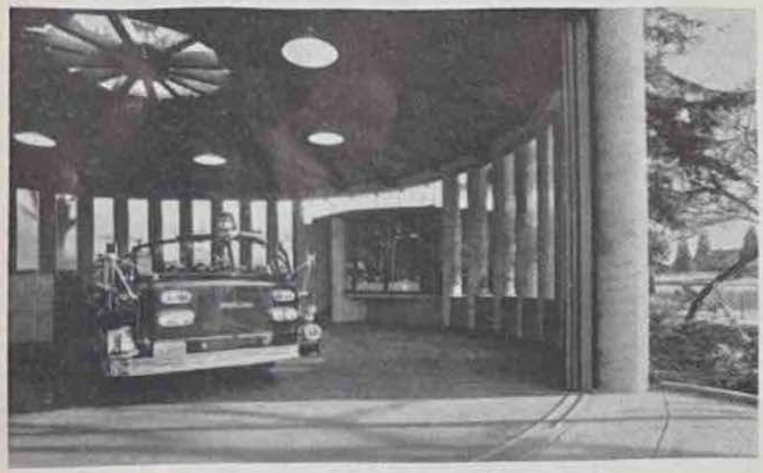


would create awkward visual relations. We further discovered that circular shapes were much easier to relate to the site and allowed most of the major trees to be saved."

The plan provides space for two fire trucks and a chief's car; sleeping, dayroom and living room accommodations, including a kitchen, for eight men; and locker space, storage and working facilities for the 24-man staff which operates in three shifts. In addition, there is a central office and a private office for the officers in charge. A drying rack and an area for washing equipment are provided under the trees.

The firehouse is actually divided into three elements. The central section, 57 ft. in diameter, for housing the equipment is constructed of 2-ft. diameter concrete columns 20 ft. 6 in. high, 4 ft. o.c. with glass between and a post-stressed concrete ring at the top. The wood roof system is surfaced with plastic. Doors are steel. Adjoining the central section are two other circular elements, 37 and 30 ft. in diameter, one containing the dayroom, kitchen and office unit and the other the dormitory, bath and utility unit. Exteriors are redwood; interiors, painted sheetrock. The hose rack is made from preformed plywood vaults.

Total area for all covered units, including a detached circular storage room, is 4,854 sq. ft. Mechanical engineer was Robert Montgomery; electrical engineer, Robert Z. Taylor.



COLUMNS rise 20 ft. 6 in. above apparatus room floor.



DAYROOM, kitchen and central office share one circular unit.

SQUARE FOOTAGE

Apparatus Room	2,077 sq. ft.
Dayroom	675
Dormitory	1,060
Washroom, Storage	842
Office	100
Exterior Storage	100
	4,854 sq. ft.
Exterior Paved Area	3,060 sq. ft.

AIED convention report

by DONALD J. BERGSMA



AIED DESIGN MEDAL was awarded to Mr. Hiawatha of Estes, Calif., for his latest residence design. Jury comment: "We like this plan because it has unity of form, clarity of expression and provides a laughter-provoking experience."

THE SEVENTH annual convention of the American Institute of Exterior Decorators met last month in Baxter Springs, Kan., for the purpose of electing new officers for the coming year and hearing the reports of the various committees established last year. The 1,600 delegates and alternates from 50 states were treated to six days of speeches, movies, tours and displays, and the merriment which prevailed marked this convention as their most successful to date.

The expected battle between the Northern Colonials and the Southern Victorians was abated before the start of the convention when the western delegates agreed in caucus to support for the vice presidency a Mission Style delegate from the East who was known to be sympathetic to any and all styles. It was on this note of harmony that the convention opened to write and approve the platform. After two days of lengthy debates, threatened walkouts and several floor fights, the platform was unanimously approved with the four major points as follows:

1) To continue the publicity drive in all communication media until national acceptance of the "Early Halloween Style" was realized, 2) to establish in the minds of the American public the importance of AIED as a deterrent to mental illness, 3) to gain complete control of Sweet's Catalogue by 1964, 4) to refrain from accepting as clients the owners of Chinese Ranch Style houses until Red China was seated in the United Nations.

The third day of the convention the keynote address was delivered by Mr. Grimm of Mother Goose Homes, Inc., who detailed how his interest in the AIED originated. He told the convention delegates that one day while on his rounds as a vacuum cleaner salesman he noticed the aesthetic beauty of a pink vacuum cleaner hose draped over a wrought iron porch railing and was converted to the noble cause of exterior decorating forthwith. Mr. Grimm spoke with great eloquence and with such sincere devotion the delegates cheered and paraded for 30 minutes. In the confusion, which at times reached near hysteria proportions, the delegates forgot that he was the keynoter and elected him president for the coming year.

This unexpected action put the convention two days ahead of schedule and the temporary chairman wisely used this time to allow lobbyists from the building trades to lecture on and display their new products developed since the last convention. This proved to be of immense interest and several products were received with standing ovations. Notable were prefab Gothic turrets, Dutch Colonial columns in polyethylene, reinforced concrete acanthus leaves and a do-it-yourself garden fountain water nymph carving set. However, the unquestionable attraction of the two days was the Porcelain Enamel Gazebo Corp. with its 21 styles in six sizes and 1,322 colorizer shades. At one point during the display of these gazebos, an ardent Elizabethan Half Timber proponent became so enthusiastic he dropped his state standard on a Creole Style delegate from Montana and lacerated her forehead.

The products display now completed, the convention was back on schedule once again and the delegates elected to the rigged vice presidential slot the previously mentioned candidate from the East. He pledged his support of the platform and promised an unrelenting campaign against the foul and rude work of the AIA and AID and further to raise the standards of American housing to equal that of the Detroit automobile designers. His state delegation, waving chromium mailboxes fashioned from old Buick grills, led a short and orderly parade.

The reports of the research committee and the legal committee consumed the fifth day. The research committee chairman, a Shingle Style delegate from Alabama, reported on the trend toward padded chintz facias and formica-ized marble. He stated that information from impartial surveys showed great potential for leaded glass downspouts. Mr. Miller of the legal department proudly proclaimed success in the two-year battle against the ordinance in San Francisco which required doves to be housed in all dovecotes, but warned the delegates that amusement parks such as Disneyland were copying the best work of the members of the AIED without due credit being given them.

On the final day of the convention a letter from the Honorable Senator from Ohio was read thanking the AIED for its support of his bill now in Congress to have the Capitol dome painted magenta. This was followed by a slide show of the work of Mr. Hiawatha, who was then installed as a Fellow of the AIED. Applause and laughter greeted each of his lovely new residences (see cut) and many wept. The convention then adjourned singing "We'll Build a Bungalow Big Enough for Two Spanish Balconies."

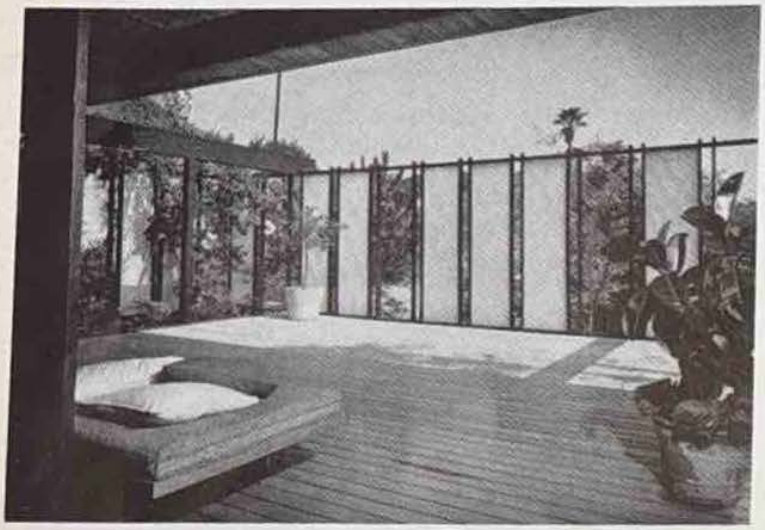
This article by Mr. Bergsma, assistant professor of architectural history at the University of Utah, is reprinted from the June-July 1960 edition of Architecture Utah, publication of the Utah Chapter, AIA, as is the sketch by Frank Ferguson.

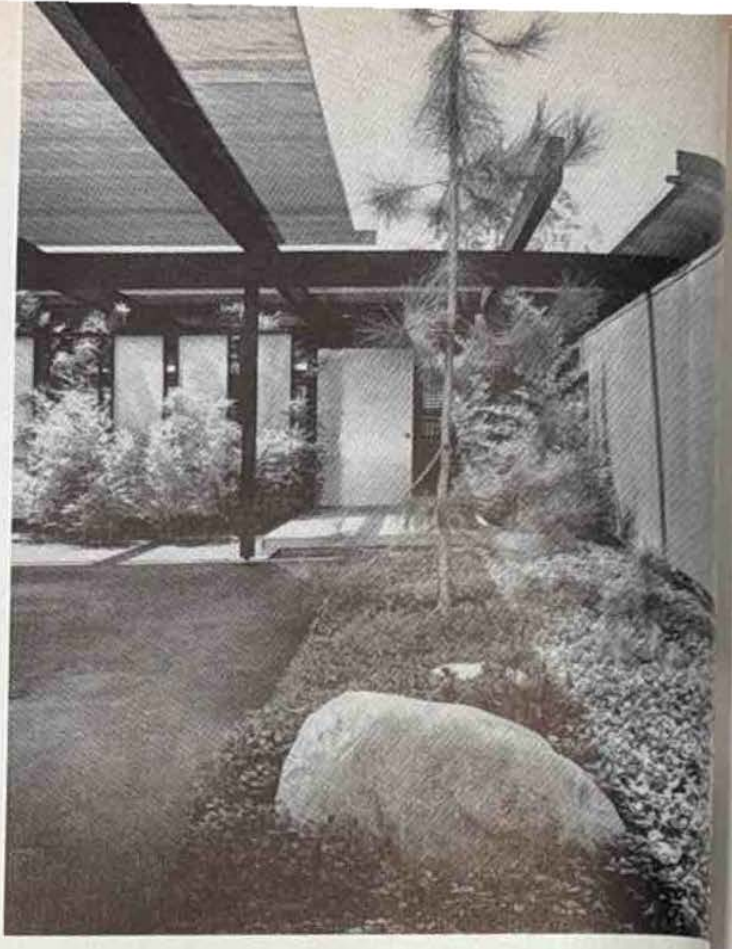
Norman G. Gottfredson Residence
Glendale, California

•

WALTER H. KOZIOL
Designer

REDWOOD DECKS and patios surfaced with exposed washed granite chips in concrete provide outdoor entertaining areas.

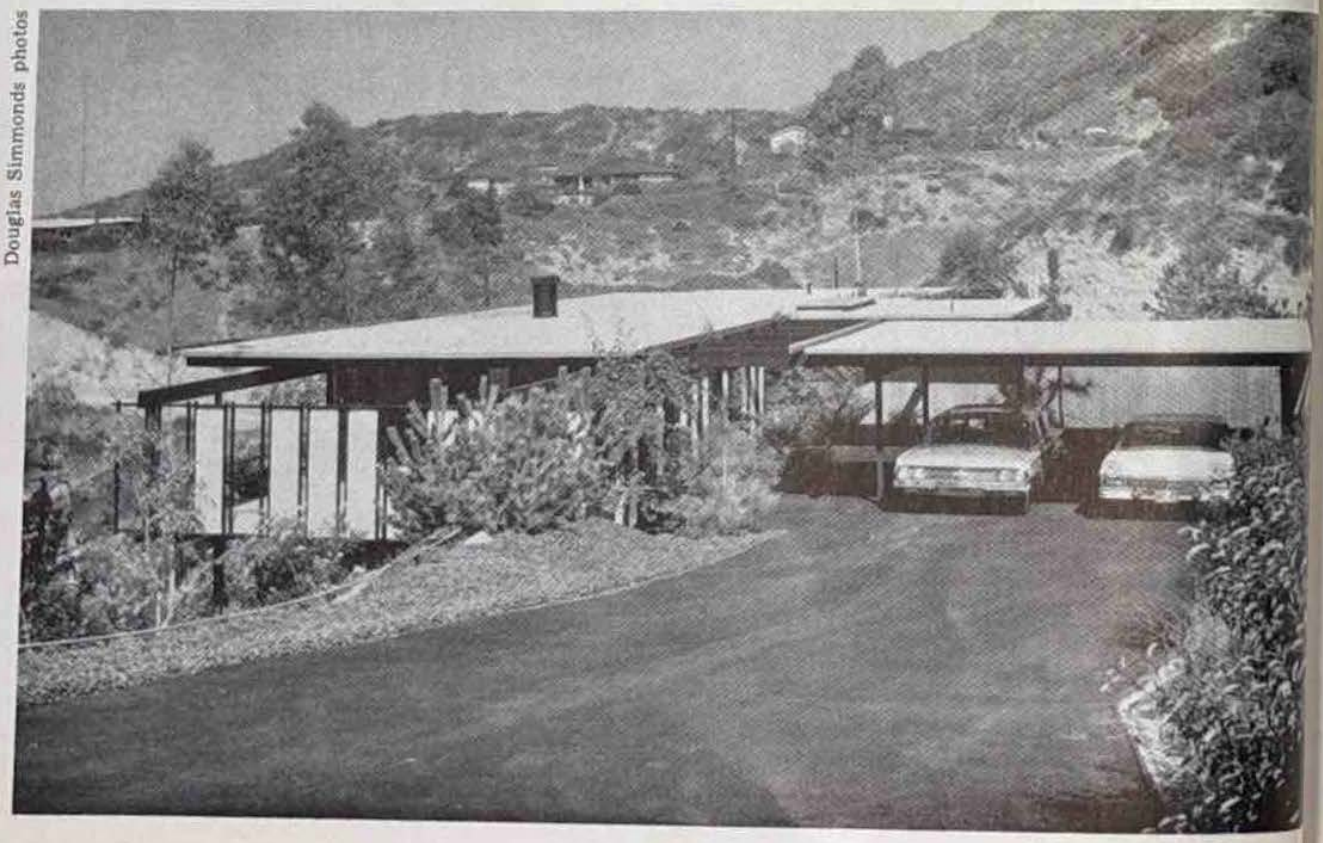




An appropriate backdrop for a busy professional coup

POST AND BEAM STRUCTURE is sited on shelf cut into southern slope of Verdugo Hills overlooking city.

Douglas Simmonds photos

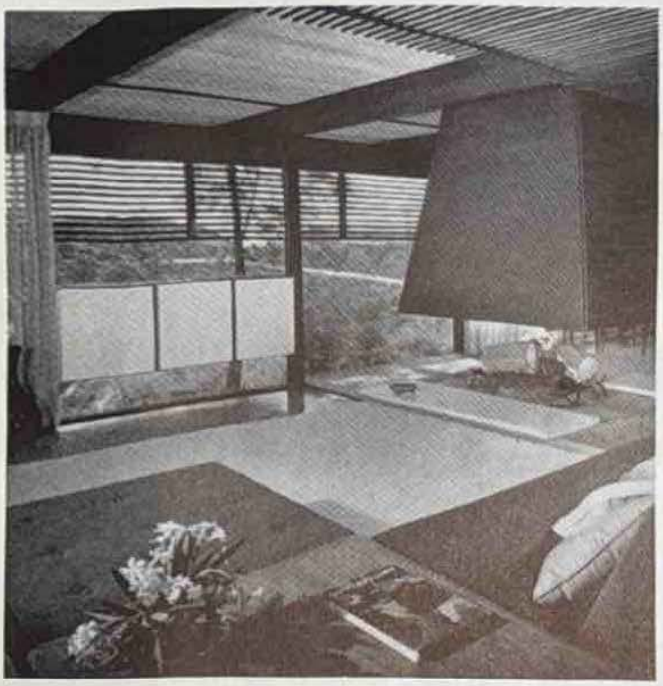


BASIC REQUIREMENTS for this home centered around the couple's busy and active life with the corollary need for a minimum of maintenance and upkeep. Mrs. Gottfredson is a psychologist for the Glendale schools and by nature of her profession needed space for continuing study in her field. Mr. Gottfredson is a professional artist and also needed areas and facilities to pursue his activities. "Mutual interest in music, entertaining and just living provided more than enough incentive for creating an environment which would enable these interests to grow," the designer points out.

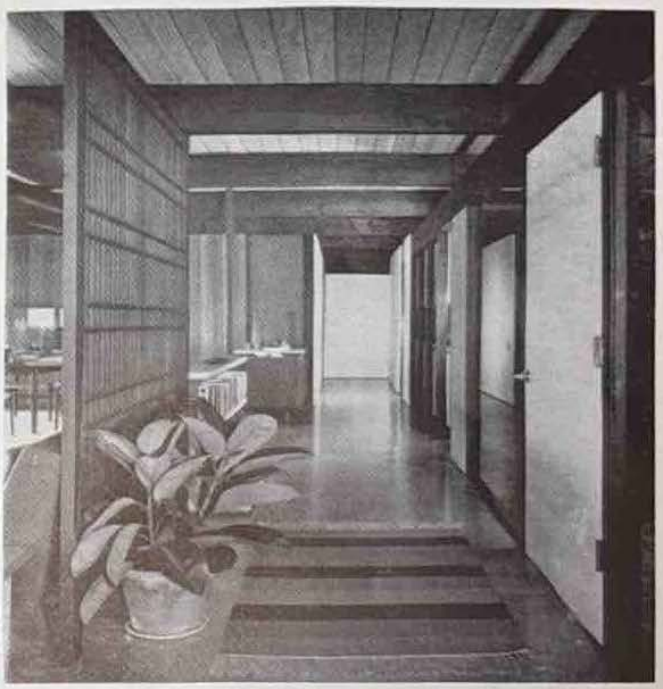
"Considering the varied interests and activities the couple are following, the general concept of living room, dining room, kitchen, master bedroom, guest bedroom, master bath, guest bath and possible future family room or studio addition adjoining the kitchen evolved."

The site is a hillside shelf overlooking the city. The house is built over filled earth which varies from 6 to 26 ft. in depth. This required a caisson system to support the structure. A post and beam framing system with a flat roof was selected as offering the greatest latitude in achieving the design goal.

The house is oriented to take advantage of the view and sunny climate. Natural elements are utilized wherever possible in an indoor-outdoor living plan. Among easy-maintenance features: a television and record player combination built into the glass wall, built-in lighting, built-in storage in bedroom wardrobes and outdoor storage.



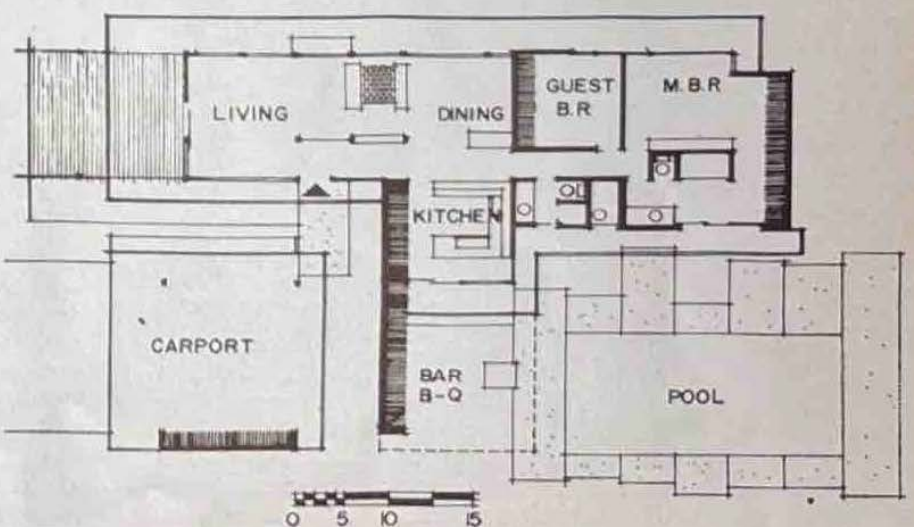
METAL HOOD FIREPLACE serves dining, living areas.



WOODEN SCREEN separates living room at entry.

OUTLINE SPECIFICATIONS

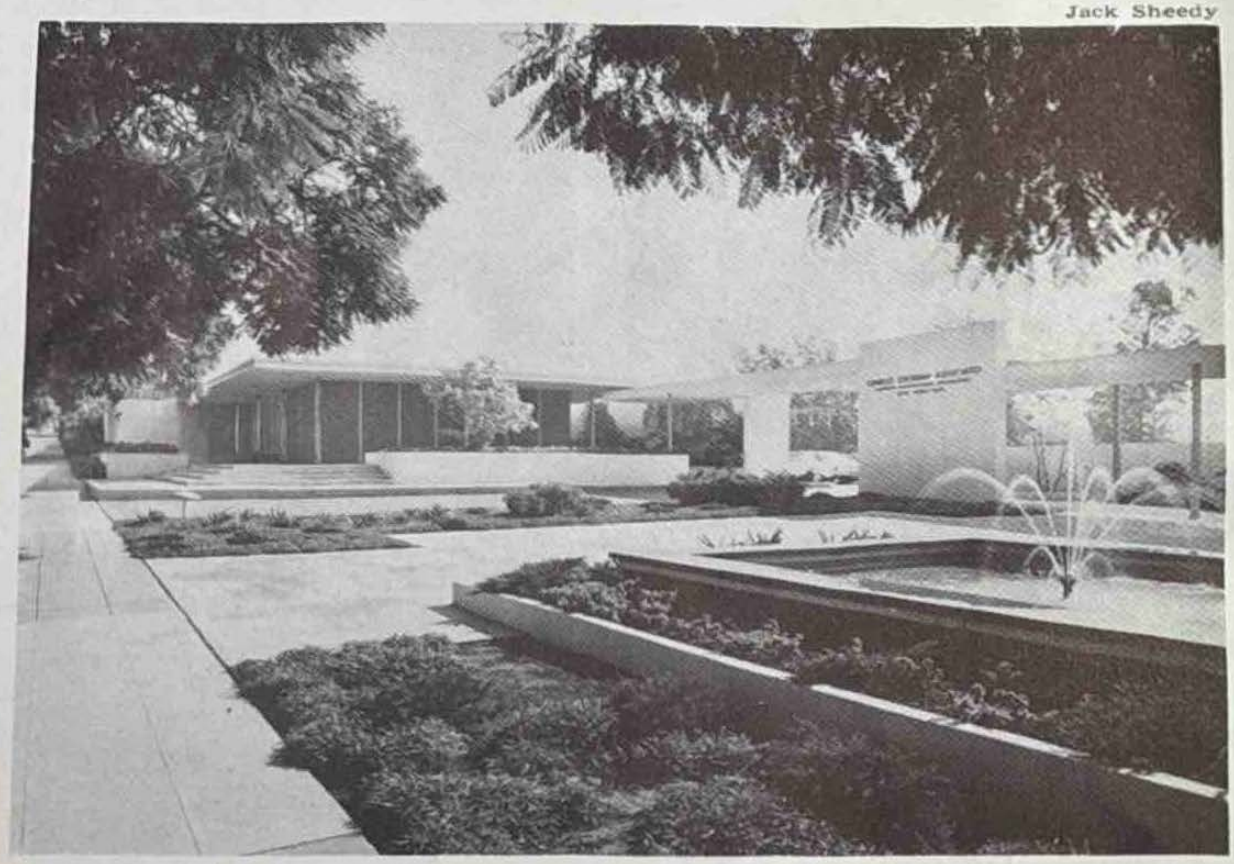
Structure: foundation and caissons: concrete; frame: post and beam.
Exterior Finish: stucco; 4-in. redwood siding.
Roof Surfacing: composition and gravel.
Windows: stainless steel—(Louvre Leader) Trinity Manufacturing Corp.
Doors: plastic covered hardwood slab; steel sliding—Arcadia Metal Products.
Floor Surfacing: cork—Armstrong Cork Co.
Insulation: ½-in. over sheathing—The Celotex Corp.
Interior Finish: painted plaster; 4-in. redwood siding.
Ceilings: 2x6 t&g Douglas fir.
Heating: forced air system—Day & Night Mfg. Co.
Plumbing Fixtures: Crane Co.
Total Area: 1,600 sq. ft.
Date of Completion: fall 1955.



Where architects hang their hats

Los Angeles, California
CHARLES LUCKMAN ASSOCIATES

Jack Sheedy

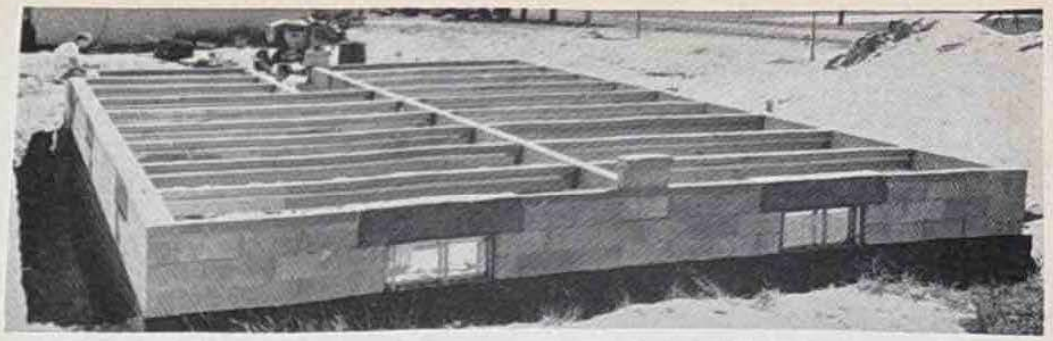


HEADQUARTERS of worldwide architectural practice is at west end of Sunset Strip.

THIS OFFICE BUILDING is an example of reuse of existing space in that two small structures on the site were remodeled and enlarged into the present headquarters. In contrast with the jumble of commercial structures immediately to the east, the CLA offices were designed with simplicity and dignity as a transition to the beginning of the Beverly Hills residential area to the west.

Building was planned to meet earthquake requirements, yet with maximum openness commensurate with seclusion from the street. A portion of the space was originally conceived as a showcase for the architectural firm: a display area for models, renderings and photographs visible from Sunset Boulevard via floor-to-ceiling windows. As the practice expanded, this space was deemed necessary for private offices, eight of which have flexible partitioning.

Construction consists of wood and steel framing, with the floor slab on grade. Stainless steel columns support the overhang. Building is fully air conditioned and two outdoor patios serve an employee lounge.



JOIST LAYOUT for one of first commercial installations of Insta-Floor in U.S. employs plywood box beams in this case, but solid or built-up beams also can be used. Ledger strip was applied to beams during fabrication, placed exact depth of panel stringers below top of beams.

Preframed floor panel cuts cost

A low cost floor system has been developed by Douglas Fir Plywood Association engineers and is now available to builders following successful field tests.

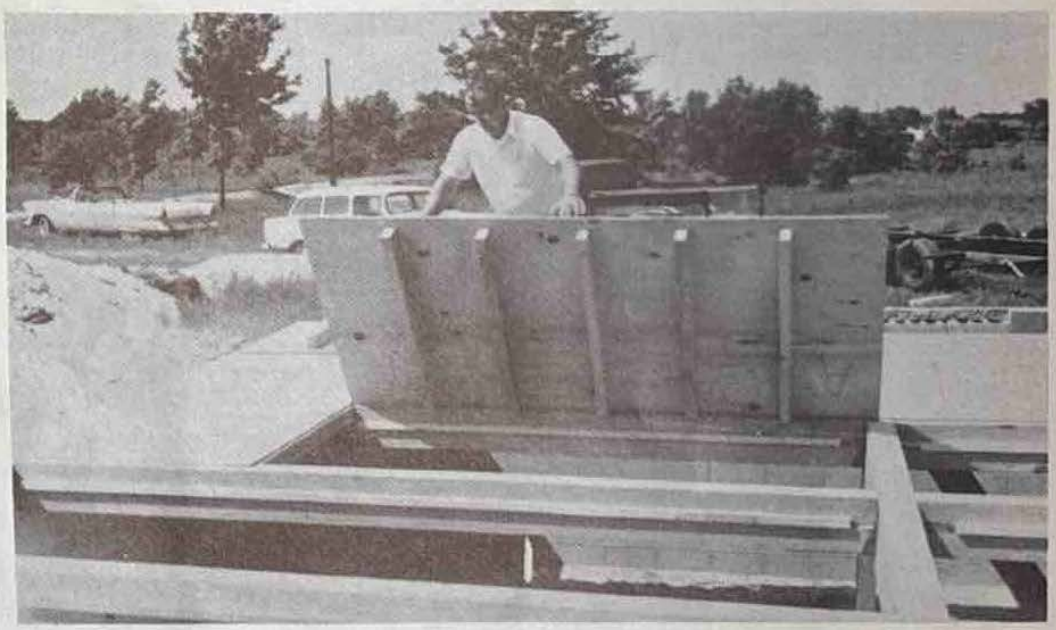
In experimental applications by builders of small homes, Insta-Floor costs ranged from 35 to 40 cents per square foot. With underlayment and finished flooring, the completed floor cost ranged from 80 cents to $1 per square foot.

The system requires a minimum of floor framing with girders set 4 ft. o.c. These can be of any conventional material suitable for the span, including solid beams, built-up beams or plywood box beams. However, where box beams are used, they must be fabricated to close specifications, the DFPA advises.

Insta-Floor is made up of ½-in. 4x8 fir plywood panels with stringers preattached 16 in o.c. across the panels. Panels are dropped in place and fastened to supporting beams set 4 ft. o.c., eliminating all cutting and fitting on the job and all nailing except that required to fasten the panels down from above. No cross blocking is required except that already in place on the panels.

In a timed test, George Osborne, a Chehalis, Wash, builder, laid 1,170 sq. ft. of Insta-Floor, including all supporting members, in less than 10 minutes. Although the speed was partially attributed to the fact that his six-man crew was familiar with the Lu-Re-Co component system, it is estimated that other builders could make proportional savings in time.

Another builder in Muskegon, Mich., estimates Insta-Floor saved $39.40 over the conventional system for each house the first time he tried



FULL-SIZE PANEL goes down over box beams. Resized 2x4 stringers were preattached to 4x4 and 4x8-ft. panels of ½-in. fir plywood, then dropped into place over joists. Ledger strips along joists act as support for stringers and panel edges are nailed to beams to complete floor.

it and believes that his savings will amount to about $75 for an average sized house once his crew is familiar with the system.

The method followed in the Chehalis homes employed a 10-in. deep plywood box beam with top and bottom 2x4 flanges, glue-nailed to ⅜-in. fir plywood webs. This beam was used over a crawl space and requires supports 14 ft. o.c. Beams are set into 8-in. deep pockets preformed in the foundation and rest on concrete footings at the center.

Ledger strips of 1x2 stock are shop-applied so that the resized stringers on the panels will rest on them. The floor panels overhang the stringers 2 in. and are joined and fastened by being power-stapled to the top flange of the beams. Ledger strips are used on the outside courses of panels and rest in preformed ledges on the foundation.

An alternate fastening method eliminates the ledger strips and adds a 2x4 spline on edge along the top of the beam. In this case, the stringers rest directly on top of the beam and are connected with nails at the common spline. The only difference is in the plywood overhang at the stringer ends.

Another feature of the floor is its dimensional stability. Manufacturing requirements for panels and box beams, where solid lumber is not used, call for resized, kiln-dried lumber. Where the floor is applied over a crawl space, the beams should be wrapped in polyethelyne film unless a moisture barrier is used below them, the DFPA suggests. Osborne, who used pockets preformed in the foundation and a moisture barrier over the crawl space, found he got satisfactory results where only the beam ends were wrapped.

Another advantage is that where access to the crawl space is desirable, any number of panels may be left unfastened until time to install underlayment. Where the beams are set in, the house is 4 in. closer to the ground than with the conventional construction, and one whole course of siding, extra porch flashing and other material is eliminated.

Components for the floor are available to builders from subscribers to Plywood Fabricator Service, Inc., an affiliate of the DFPA.

Architects, engineers look at prestressed concrete

Two general areas of agreement seemed to emerge from the two-day Western Conference on Prestressed Concrete Buildings held in San Francisco November 21-22: that more understanding and cooperation between architects and engineers is essential in this new type of construction and that prestressed concrete construction offers wide advantages and opens new avenues of design when used correctly and imaginatively.

The conference, sponsored by the University of California in conjunction with the Prestressed Concrete Manufacturers Association of California, was attended by over 300 architects, engineers, educators and manufacturers. T. Y. Lin, professor of civil engineering at the University of California, was chairman of the San Francisco meeting as well as an earlier one held in Los Angeles. In both cases the agenda was the same but the speakers were not.

John Lyon Reid opened the first session with a strong plea for more understanding between the architect and engineer. "In designing a building where prestressed concrete forms the structural system, architectural design cannot be considered apart from engineering design," the architect said. "Problems of architectural design make it necessary that the architect and engineer work closely together and that the architect handle this material with understanding and respect for its properties."

Paying a tribute to the testing laboratories for their role in this type of material, Reid continued: "There is a wide variation in the craftsmanship standards of the fabricators and it is hoped that the industry will take the initiative in the development of standards that can be used constructively and fairly by the architect and engineer."

Another San Francisco architect, Theodore C. Bernardi, declared that "we are clearly at the beginning in the development of a building technique, or group of building techniques, based on both the prefabrication and pretensioning of concrete elements that will probably have more effect on the appearance of our buildings, our cities and communities than any single method since the advent of the steel frame."

Other architects, engineers and manufacturers, speaking at the two-day sessions, continually emphasized that prestressed concrete is a new structural material with new characteristics, which should result in a new architectural expression.

Consulting engineer Robert Wildman of San Francisco listed some of the advantages of prestressed concrete: it is a relatively crack-free product capable of spanning up to ft. or more; deflections can be c trolled to any desired degree; precast prestressed members have advantage over conventional pre members in that they are much li er and therefore more easily hand Other speakers cited economy as added advantage.

Panelists generally agreed that Structural Engineers Association California's successful efforts to prestressed concrete included in Uniform Building Code will do m to advance this method of const tion.

They included Ray McCann, B Rock Co., Napa; Robert C. L superintendent of San Francisco reau of Building Inspection; Ro J. Lyman, Atlas Structural Conc El Paso, Texas; Daniel Shapiro, J Sardis & Associates, San Franc and Theodore C. York, Castro V consulting engineer.

Electronic computer adapte to building frame analysis

A method of using a small, speed computer to increase accu in engineering and architectural culations has been developed Moshe F. Rubinstein, staff eng for Victor Gruen Associates wh is working on his doctorate at the versity of California at Los An

Rubinstein recently described adaption of electronic computi the anaylsis of building frames paper presented before the Na Conference on Electronic Com tion sponsored by the ASCE in burgh.

He pointed out that conven methods of multistory frame an during the development of wo drawings requires an enormous ber of arithmetical calculations. is particularly true when latera flection or sidesway figures, c by wind or earthquake, is incl Usually, he said, it is only natur the structural engineer to use app mate methods and figures.

To solve this problem, Rubi adapted frame analysis to the tronic computer, using the ite method which depends on the nu of repetitions for its accuracy. puter frame analysis also can be during the design phase, Rubi explained. In this area the en needs to develop only a very mathematical approximation of ber sizes, load-carrying capacity bility and deflection. From thi the computer can determine w needed to carry the required tural loads in the building.

STEEL FRAME DESIGNS for supermarkets and shopping centers have given operators the advantages of clear span structures, but created a problem of their own, the slope of steel columns to the inside of the building that interrupts stacking of case goods to the roofline. Soule' Steel Co. has overcome this problem by reversing the slope of the columns, making a straight inside wall. This type of construction also provides an increased overhang, aiding in protection and appearance, and saves space by placing the columns in the wall.

—pa&b memo—

PRESTRESSED CONCRETE construction has been formally approved for inclusion in the Uniform Building Code by the International Conference of Building Officials. Provisions of the code, as approved by the Structural Engineers Association of California, were accepted at the building officials' recent convention in Colorado.

—pa&b memo—

CURTAIN WALLS, windows, shingles and other aluminum architectural products are undergoing hurricane force wind and rain tests at a test station established by Reynolds Metals Co. at the Richmond, Va., airport. The company is using a 1,200-hp. aircraft engine to whip up 120-mph. gales and a water spray system for simulating rainfall up to 20 in. per hour to study how the products react under high wind-stress conditions and to acquire information to aid in product development and improvement.

—pa&b memo—

FINGER-JOINTED framing lumber has been approved for use as vertical structural members on FHA insured projects. Finger-jointing provides a means to manufacture lumber to any desired lengths, says Carl A. Rasmussen, director of the Western Pine Association research laboratory which spearheaded efforts to gain official recognition for the product. The FHA action should create expanded markets and production of finger-jointed structural products and, in turn, will allow more complete utilization of raw material available to the sawmills, he added. The process involves machining of fingerlike tendons into the ends of lumber pieces. These mesh as short lengths are fitted together and large surface areas are brought into contact with wood-welding glues. The FHA announcements covers use of 2x4 and 2x6 lumber used primarily as studding up to 10 ft. in length, but also for cripples, floor plates and trimmers.

—pa&b memo—

FLOATING FLOOR is one answer to the need for easy access to wires and cables in computer and data processing rooms. In a test installation for the First National City Bank building in New York City, Floating Floors, Inc., designed a series of die cast aluminum plates, interlocked into and resting on cast aluminum pedestals with steel footings bonded to the subfloor with an adhesive made by Miracle Adhesives Corp. Face of each aluminum plate is covered by an 18x-18-in. vinyl tile surrounded by a metal or plastic lip or joint. Plates are removable from their place in the floor assembly by using a simple suction cup tool for inspection or repairs to the lines.

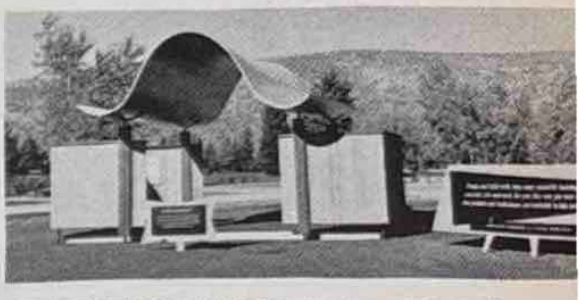
—pa&b memo—

NYLON AIR HOUSE enabled workmen to install sensitive electro-mechanical equipment for this country's first fully mechanized post office while construction of the permanent structure to house the equipment went on around and overhead. The project, about two city blocks long, is located in Providence, R. I. Air-supported house measured 200 ft. long, 80 ft. wide and 40 ft. high, was stabilized by anchors imbedded in the concrete floor and had air locks designed to permit trucks and machinery to enter, as well as smaller entrances for workmen. Contractor on the project estimated that cost of using the nylon structure was about 25% below what it would have been to use a wooden protective structure.

—pa&b memo—

LARGE STRUCTURAL PARTS made of plastic materials in many cases give much better performance than those made of metal, but there still is a big problem in gaining acceptance for this idea, according to John Heidacher, technical service representative of CTL Division, the Studebaker-Packard Corp. Speaking at a regional conference of the Society of Plastics Engineers in San Francisco, Heidacher said that while the cost of reinforced plastic structures may be higher, this can often be justified by superior properties. One of the advantages he emphasized was resistance to corrosion.

SHAPELY LUMBER can be achieved without costly lamination processes with a system developed by Boise Cascade Corp. and called, for the present, post-tensioned thin shell system. The method pulls lumber permanently into convolutes, paraboloids or other curved structural frameworks. Key to the new method is a slip joint



PRIZE-WINNING DISPLAY in Producers' Council exhibit at Northwest regional AIA conference in Sun Valley is built around post-tensioned thin shell roof structure developed by Boise Cascade Corp.

that permits the lumber to be twisted and pulled into the desired shape, then grabs at the proper stage under final pressure and engages permanently. Pressure is applied with stressed metal wires strung through the wood. The material will be marketed in blanket form with the slip joint and wire inserted and a code system attached showing how to apply tension to make the desired shapes.

—pa&b memo—

MODULAR CONSTRUCTION even when used in only a small proportion of a house can produce benefits, in the opinion of Ralph J. Johnson, director of NAHB's research and technology division. Speaking at the National Conference on Standards in New York City, Johnson said use of modular standard windows in construction of a typical house will result in costs savings between $75 and $100. One builder, he pointed out, saves between $300 to $400 on an average house of 1,000 sq. ft. by using storage walls fabricated on the basis of modular coordinates in place of regular stud walls. The modular concept does not eliminate or restrict design flexibility, as some people believe, Johnson declared. "As a matter of fact, all essential home design flexibility can be incorporated in multiples of 4 ft." The speaker indicated that manufacturers are not progressing rapidly enough to meet the demand for modular construction in the home building industry. The big void, he said, occurs in glazed wall tile, doors and flexible floor tile, kitchen and laundry appliances and, to some extent, windows.

suspended acoustical ceiling

Armstrong has combined its acoustical Fire Guard ceiling with exposed suspended grids to produce a system that costs no more to install than ordinary plaster and lath, while it carries a three-hour protection rating by the Underwriters' Laboratories and sound absorption qualities. Known as the Fire Guard Lay-in system, it employs 2x4-ft. panels able to withstand exposure to direct flames and 2,000-deg. heat and supporting metal grids specially designed to prevent buckling or twisting. Ceiling requires no additional fire-proofing above it and there are no wet installation operations to delay construction programs. Material has a noise reduction coefficient of .75.—Armstrong Cork Co., Lancaster, Pa. (No. 1)

wide flange sections

Bethlehem Steel has added 11 lighter weight flange sections available from regular rolling schedules. Sections, along with new design techniques, are expected to provide substantial construction economies. They should have application to composite construction and to structures using new plastic design techniques. Items include seven lighter weight wide flange sections ranging from 18 to 36 in. in depth and averaging 8 to 11% less weight per foot than the present lightest depths, averaging 14 to 27% lighter than those previously available.—Bethlehem Steel Co. (No. 2)

prefab fireplaces

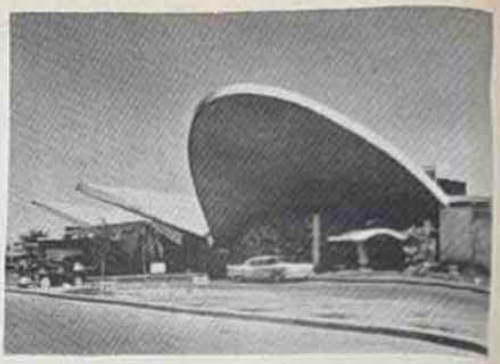
Uni-built fireplace line is not only ideal for camps and cottages but is varied enough to serve many areas of the home. Five factory-built models are finished in vitreous enamel with a choice of colors or prime coated for



painting to suit individual tastes. Fluted aluminum or stainless steel trim contrasts with the black mesh of the fireplace screen. Model 4700 pictured here is easily installed by placing the heavy-gage steel inserts in the base of the firebox opening and setting the firebrick therein. Fireplace is then connected to a chimney with a 7-in. diameter smokepipe, as are three of the other models. The fifth is complete with chimney and exterior housing.—Vega Industries, Inc. (No. 3)

solar-earth heat pump

A heat pump system that stores rejected heat or cold in the earth for later use has been developed by a midwestern firm and is being marketed as the Wether-Bee. Two heat collecting and dissipating coils are used, one in the earth and the other exposed to the air. During the summer, heat removed from the occupied space is rejected into the ground where it is stored until needed during colder weather. The same process applies for winter, with cold air stored for summer use. Heat is also extracted from the sun during the day. Unit can be installed in upright, counterflow or horizontal position in a crawl space, utility room, closet or basement.—Heat Pump Systems. (No. 4)



elastic roof coating

Developed primarily for contour roofs of concrete or plywood is a coating system made from synthetic rubbers that provides a skinlike surface and at the same time has the elasticity to give with minor working of the roof surface. Called Caram Elastomeric roofing, it is compounded from DuPont Neoprene and Hypalon and is applied cold without special heating equipment. Coating effectively bridges small hairline cracks, eliminates edges or valleys that encourage water seepage, will not run or chip in normal usage, is fire-resistant and weighs 1/25th as much as conventional roofing. Wide variety of colors are available. Accompanying photo shows installation of the material on the roof of a California bowling alley.—Caram Manufacturing Co. (No. 5)

translucent curtain-wall

Condo-lux, a prefabricated, translucent, insulating curtain wall panel, is designed for use in conjunction with the metal Condo-wall panel introduced a few months ago. Panel consists of fiberglass reinforced skins with an air insulating core. Fiberglass boards are used as structural shear members between the skins. Ribs in exterior skins are a fluted type; in interior ribs, a V-type. Installation employs a preengineered system of flashing and joint covers which allow vertical and lateral adjustment. Panels are available in a variety of sizes and colors.—Dresser-Ideco Co. (No. 6)

long-span fiberglass panels

Prestressed, long-span fiberglass reinforced panels have been introduced by Architectural Plastics as part of its comprehensive program in developing structural shapes. Translucent panels are critically engineered and are offerred for spans 4 to 30 ft. in single thickness. Prestressing fibers are employed in critical tensile areas.—Architectural Plastics Corp. (No. 7)

Reader Service

Pacific Architect & Builder
1945 Yale Place N., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

JANUARY 1961

1 2 3 4 5 6 7
8 9 10 11 12 13

Name

Title

Firm

Address

City Zone State

dual-height faucet

A wall mounted electric water cooler of standard size with a low-level attachment for children is being marketed by Haws. Slender, compact cabinets are of hammertone gray enameled steel, have shielded, push-button type chrome-plated brass bubblers and stainless steel tops.—Haws Drinking Faucet Co. **(No. 8)**

interior shoring system

Savings in lumber and man-hours are possible with Scaffold-Truss, a system for shoring interior and spandrel beams and open slabs. System incorporates a weight-bearing truss permitting use of fewer frames because of efficient distribution of shoring weight. Truss design allows for precise placement of standard jack screws under ledgers, substantially reducing cutting, wedging and fitting of stub lumber, spandrel beam T-heads and short soffit headers.—Automatic Devices, Inc. **(No. 9)**

drywall decorative finishing

For applying textured or acoustic finishes, Glover is offering the Finish Master, a self-contained unit with 105-gal. hopper capacity, 18-hp. Wisconsin engine and its own air compressor. Texturing materials can be poured through more than 250 ft. of hose so that the operator can work from room to room without moving the machine. Type or style of texturing is selected by adjustment at the nozzle. With some finishes, sanding is completely eliminated; in others, it is considerably reduced.—Glover Manufacturing Co. **(No. 10)**

rolled fiberglass paneling

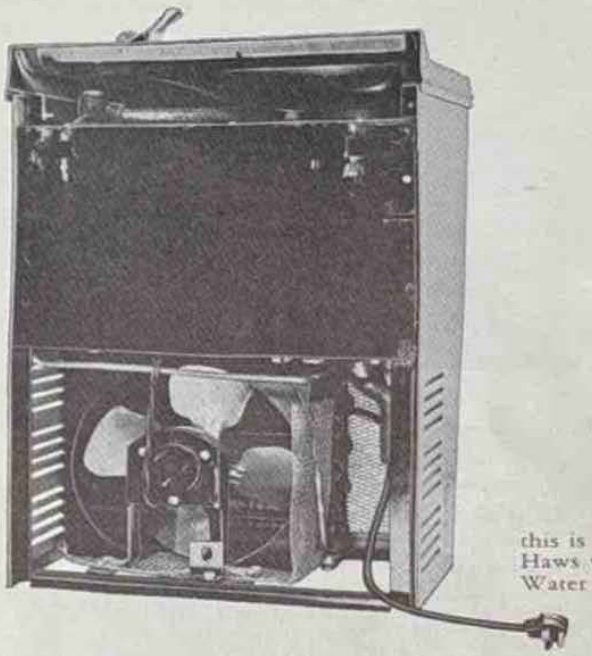
For long industrial skylights, sidelights and awnings, Filon is now offering a cross-corrugated, translucent fiberglass reinforced plastic paneling in roll form. Rololite is expected to improve and speed installation by eliminating individual installation and overlapping of panels. It will be stocked in two weights and seven colors in 50-ft. rolls.—Filon Plastics Corp. **(No. 11)**

aluminum structural system

Giving a boost to the use of aluminum on construction is the development of a structural aluminum closure system for one-story buildings by Functional Structures, a subsidiary of a Chicago contracting firm, in cooperation with Reynolds Metals. System allows a great deal of design flexibility while providing the economies of standardized components. It consists of an assembled load-bearing frame fabricated from 6063-T6 alloy aluminum extrusions on a 4-ft. module. The frame, joined to standard roof beams, will accept the total loads imposed on a one-story building of any size, including dead, live and wind loads. Any type of glazing or decorative spandrel panels can be used in the frames and the aluminum mullions also can be changed or reorganized to suit design needs.—Functional Structures, Inc. **(No. 12)**

masonry coating

For concrete, stucco, cement, cinder block or other masonry surfaces, a weather-resistant coating is available in a variety of colors and textures. Special equipment mixes a sand aggregate with polyurethane as it is sprayed, resulting in a surface that bridges across small cracks and other imperfections. Finish can be varied from a smooth, glossy surface to a pebbly, rough texture by varying size and type of aggregate.—B. B. Chemical Co. **(No. 13)**



take a last look!



this is the back of Haws wall-hung Electric Water Cooler. HWT-13

When this compact Haws Water Cooler is mounted, it'll hug the wall—off the floor!—and you'll never see this view again. As craftsmen, though, we're proud of the quiet cooling unit, the heavy-gauge steel panels, the leak-preventing silver soldered fittings, and (above all) the built-to-last craftsmanship. It's a sturdy, compact cooler with all plumbing and electrical connections concealed. Efficient!

And let's face it.....



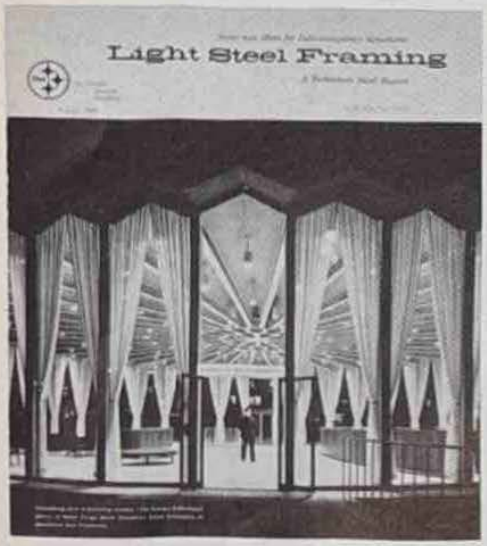
The slim-design cabinet, finished in hammertone grey enamel and crowned with gleaming, contoured stainless steel, makes this cooler a beauty. A **practical** beauty with enough pre-cooled water to serve 155 persons an hour. And we have money-saving low capacity models, too!



Write for detailed specs! Ask for your copy of HAWS complete catalog and see our data in Sweet's File.

Since 1909 HAWS **WATER COOLERS**

Products of **HAWS DRINKING FAUCET COMPANY**
1441 Fourth Street, Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California



pa&b pick of the month

Latest in Bethlehem Steel's design brochures (AIA 13-G) features several homes, a recreation center, restaurant, duplex and the now well-known circular bank in the Crown Zellerbach plaza in San Francisco. Like others in the "Light Steel Framing" series, this one includes excellent photographs, information on the design problems and solution and construction details. In addition to the bank, designed by Skidmore, Owings & Merrill, other western architects whose work is shown in the 16-page brochure are Gromme, Mulvin & Priestley, a hillside duplex in Sausalito, Calif.; Dreyfuss & Blackford, Nut Tree Restaurant in Vacaville, Calif.; Norris M. Gaddis, Diamond Park Recreation Center in Oakland; and Howard W. Frank, dairy store in Montebello, Calif. — Bethlehem Steel Co., Pacific Coast Division, San Francisco, Calif.

Ornamental Metalwork: depicts in scale drawings suggested designs from stock with illustrations of typical applications; 20 pp.—Julius Blum & Co., Carlstadt, N.J.

Industrial Sound Systems by Norelco: introduces systems designed for auditoriums, sports arenas, schools, hospitals, etc.; 4 pp.—North American Philips Co., Inc., 230 Duffy Ave., Hicksville, Long Island, N.Y.

Vinyl Wallcoverings: provides guide for selecting and installing with suggested specifications; 12 pp.—L. E. Carpenter & Co., Inc., Empire State Bldg., New York 1, N.Y.

Pressure Treated Forest Products: describes products, poles, piling, lumber, prefabricated structural materials and manufacturing facilities; 12 pp.—Baxter-Wyckoff Co., 411 Seneca St., Seattle 1, Wash.

Welded Lamella Roof Dome (AIA 13C-2): discusses design and gives detailed construction information on Memorial Arena at Green Bay, Wis., in which arc welding was used throughout to create a dome 270 ft. in diameter, 75 ft. high; 4 pp.—The Lincoln Electric Co., Cleveland 17, Ohio.

PC Glass Blocks and Sculptured Glass Modules (AIA 10-F): describes different types with technical data on light transmission, etc., detail drawings of typical sections and installation tips; 20 pp.—Pittsburgh Corning Corp., Gateway Center, Pittsburgh 22, Pa.

Grillewall (AIA 35-P-2): introduces non-modular, aluminum grills made up of rings assembled to custom specifications; 8 pp.—Integrated Ceilings & Grilleworks, Inc., 11766 W. Pico Blvd., Los Angeles 64, Calif.

Visqueen Polyethylene Film: describes uses in building trades as water vapor barrier under slabs, etc.; 8 pp.—Visking Co., 6733 W. 65th St., Chicago 38, Ill.

Marble Cleaning Methods and Materials (AIA 22-A): discusses proper care, including specific remedies for a variety of stains, with pictures; 10 pp. —Vermont Marble Co., Proctor, Vt.

Vermiculite (AIA 37-B-2): gives data and short form specifications for vermiculite concrete over prestressed concrete double-T or channel roof slabs and load tables for galvanized corrugated steel roof units in three technical sheets.—Vermiculite Institute, 208 S. LaSalle St., Chicago 4, Ill.

Exterior Paint: provides detailed information on results of a seven-year study of applications and exposure tests on exterior paints made with an acrylic resin emulsion, with photographs; 64 pp.—Rohm & Haas Co., Washington Square, Philadelphia 5, Pa.

Heat Exchangers (AIA 29-D-2): catalogs complete line with engineering data and comprehensive selection charts; 24 pp.—Old Dominion Iron & Steel Corp., Belle Isle, Richmond 3, Va.

Mineral Wool Insulation: outlines best installation procedures in home construction, well illustrated; 32 pp.— National Wool Association, Rockefeller Center, 1270 Sixth Ave., New York 20, N.Y.

Why Wood Is Best: answers the question in four pamphlets covering flooring, siding, paneling and framing and sheathing in the first of a series of brochures to be aimed primarily at the consumer; well illustrated; 4 pp. each. — National Lumber Manufacturers Association, 1319 18th St. N.W., Washington 6, D.C.

Interlocking Steel Framing (AIA 13-G): describes the V-Lok system and gives comprehensive design information with typical details and numerous load tables; 48 pp.—Macomber, Inc., Canton 1, Ohio.

Metal Curtain Wall Manual: revises material previously published and adds four new sections for holders of the 1959 edition; individual sheets for loose-leaf binder.—National Association of Architectural Metal Manufacturers, 228 N. LaSalle St., Chicago 1, Ill.

OFFICE AID

A calculator determines coverage in square feet of a standard bundle of 16-, 18- or 24-in. shingles when applied at various weather exposures for roofs and walls.—Red Cedar Shingle Bureau, 5510 White Bldg., Seattle 1, Wash.

Masters of World Architecture (five books). Under general editorship of William Alex. George Braziller, Inc., 215 Fourth Ave., New York 3, N.Y. 1960. 128 pp. $4.95 each.

With the publication of five new volumes, George Braziller rounds out the project launched in March of last year when he published the first six books in this series. Of particular interest to the West is Esther McCoy's work on Richard Neutra. Subjects of the other four newly published monographs are Louis Sullivan by Albert Bush-Brown, Eric Mendelsohn by Wolf Von Eckardt, Oscar Niemeyer by Stamo Papadaki and Walter Gropius by James M. Fitch.

The six earlier books consisted of Frank Lloyd Wright by Vincent Scully Jr., Le Corbusier by Francoise Choay, Pier Luigi Nervi by Ada Louise Huxtable, Antonio Gaudi by George R. Collins, Ludwig Mies Van Der Rohe by Arthur Drexler and Alvar Aalto by Frederick Gutheim.

Taken together, the 11 monographs, each illustrated with 80 pages of photographs, plans and drawings, present a comprehensive picture of the imagination and vitality displayed by the world's master builders of our time.

Architectural Rendering. By Albert O. Halse. F. W. Dodge Corp., 119 W. 40th St., New York 18, N.Y. 1960. 277 pp. $15.75.

Only comprehensive manual to cover in one volume all the media and techniques of delineation, this masterful treatise serves as a practical guide for the beginner as well as a standard reference for the professional. Eight chapters on using the media cover graphite pencil, carbon pencil, lithograph pencil, pen and ink, smudge charcoal, Chinese ink, water colors, tempera, airbrush, pastels and combinations of media. Numerous examples of work in each medium add graphic significance to the text. A practicing New Jersey architect, the author has taught delineation at Columbia University's School of Architecture for 13 years.

The Golden House of Nero. By Axel Boethius. University of Michigan Press, Ann Arbor, Mich. 1960. 195 pp. $15.

Subtitled "Some Aspects of Roman Architecture," this book tells the story of town planning and design in Rome from the primitive huts of the eighth century B.C. to the brick-faced tenements of 1,000 years later. Over 100 illustrations accompany the text, based on a revised edition of a series of lectures delivered by the author at the American Academy of Rome in 1953 and later on the Michigan campus.

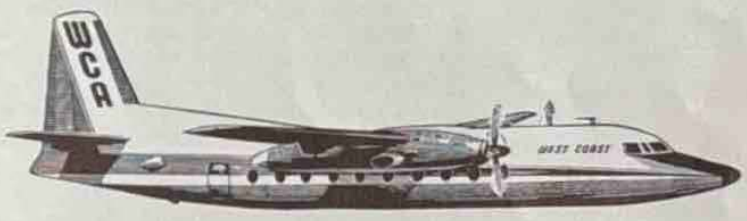
Manual of Lathing and Plastering. By John R. Diehl. National Bureau for Lathing and Plastering, 2000 K St. N.W., Washington 6, D.C. 1960. 366 pp. $7.50 (some no-charge distribution has been arranged).

Hailed as the first collection of widespread knowledge of the age-old crafts and products of the plastering industry, this manual was written by an architect after several years of research and evaluation of material supplied by all segments of the industry. It is an effort to treat the aesthetic and the practical aspects of uses and applications of materials, techniques and manpower. Project was sponsored by five associations: Gypsum Association, Metal Lath Manufacturers Association, Finishing Lime Association of Ohio, Perlite Institute and Vermiculite Institute.

Construction Contracting. By Richard H. Clough. John Wiley & Sons, Inc., 440 Fourth Ave., New York 16, N.Y. 1960. 382 pp. $9.75.

In essence this is a primer on how to organize and operate a successful contracting business. It was written to assist the man planning to launch his own business or wishing to qualify for a management position with a contracting firm. Ably drawing on his

Where in the West



are you going?

Wherever in the West your travel takes you—for business or pleasure, seeing sights or seeking sales—a West Coast Airlines Spectator flight will smooth the miles into short, swift minutes. More than 60 cities in six great states and now Canada lie along these scenic routes, with matchless views to delight your eye and fast, frequent daily service to ease your travel schedule.

WEST COAST AIRLINES

Call your travel agent
or nearest West Coast ticket office

experiences as a professional engineer with a general contracting firm and as a teacher, the author explores basic organization, drawings and specifications, estimating and bidding, cost control, labor legislation and many other facets of the contracting business that are of prime importance. Appendices provide a typical specification outline for building or engineering construction, instructions to bidders, subcontract forms, etc. Author is dean of the College of Engineering at the University of New Mexico.

Simplified Design of Reinforced Concrete. By Harry Parker. John Wiley & Sons, Inc., 440 Fourth Ave., New York 16, N.Y. 1960. 303 pp. $6.50.

The author has completely revised his book, originally published in 1943, to conform to current practices. Primary purpose remains the same, to serve as an introductory text and home study tool in the design of elementary reinforced concrete structural members for those having a minimum of preparation in the subject. Familiarity with the elementary principles of mechanics and high school algebra are all the preparation needed. Author is emeritus professor of architectural construction, University of Pennsylvania, and the author of six other books in the "Simplified Series."

Concrete Engineering Handbook. Prepared by a staff of specialists headed by Editor-in-Chief William S. La Londe Jr. McGraw-Hill, 327 W. 41st St., New York 36, N.Y. 1960. 1,216 pp. $25.

Presents a wide range of material, including design methods for various types of structures and special resumes on structural theory, torsion, materials and construction methods. Makes extensive use of diagrams, tables and other design aids.

Construction Estimates and Costs. By H. E. Pulver. McGraw-Hill, 327 W. 41st St., New York 36, N.Y. 1960. 640 pp. $12.

Presents each phase of construction work separately, accompanied by simple arithmetical methods. Author has taught civil and structural engineering at the University of Wisconsin for 30 years and has served as a consultant both here and abroad.

It's the Law: Recognizing and Handling the Legal Problems of Private and Public Construction. By Bernard Tomson, edited by Norman A. Coplan. Channel Press, Inc., 159 Northern Blvd., Great Neck 3, N.Y. 1960. 436 pp. $7.50.

Based on the column which has appeared in Progressive Architecture over the past 11 years, dealing with the legal complexities of construction in language that can be understood by non-lawyers.

MANUFACTURERS/SUPPLIERS

• **Gladding, McBean & Co.** has named C. A. (Pete) Hussey as manufacturer's representative for the company's ceramic masonry products in Colorado, New Mexico, Wyoming and the Texas Panhandle. Hussey, who is president of Lakewood Construction Supply Co., will make his headquarters in Denver.

• **Kaiser Steel Corp.** has promoted Thomas H. Wakeman from mid-continent district sales manager in Tulsa, Okla., to manager of plate, structural and bar sales in the general sales offices in Oakland.

• **Architectural Plastics Corp.** has transferred Robert Phelps, former manager of the Los Angeles office, to the Eugene home office where he will serve as sales manger of the architectural division. Ray Arnold has been named manager of the newly formed consumer and industrial sales division.

• **Typhoon Air Conditioning Co.,** a subsidiary of Hupp Corp., has named Air Engineering Co., Honolulu, as a franchised distributor in the state of Hawaii and the central Pacific territory.

• **Semco Sales & Service, Inc.,** will be represented exclusively in Hawaii and the western Pacific by Vermiculite of Hawaii, Inc. Semco manufactures equipment for mixing and applying sealants and adhesives.

• **Ridley & Co., Inc.,** Los Angeles, manufacturer of concrete guns and gunning rigs, has named Jack Thomas as sales manager. He formerly was with Ingersoll-Rand in Southern California.

• **Trane Co.** is building an 84,000-sq. ft. plant in Kearns, Utah, a suburb of Salt Lake City, for the manufacture of air conditioners and allied equipment and final assembly of refrigeration compressors. The $1.5 million plant was designed by Deseret Architects and Engineers and is being constructed by Dorland Construction Co. It is slated for completion in February.

• **Lehigh Fan and Blower Division** of Fuller Co. has appointed Harley Yake, Spokane, as Inland Empire sales engineering and customer service representative. Yake has been an independent sales representative for two years after serving with Worthington Corp. for 12 years.

• **Permanente Cement Co.** has begun production at its new $13 million plant at Waianae, Oahu, one of the few cement plants in the world using coral limerock as its basic raw material. The facility's rated annual productive capacity is 1,700,000 bbl. of cement. The plant replaces Permanente's 20-year old system of transporting bulk cement to the Islands from California.

• **Tuck-Aire Furnace Co.,** San Francisco, has formed Global Air Conditioning Corp. as a wholly owned subsidiary to take over all manufacturing and sales functions for the firm's air conditioning equipment.

• **Ender - Monarch Corp.,** lighting equipment subsidiary of Acoustica Associates, Inc., has established a West Coast sales office at the Acoustica headquarters in Los Angeles. The office will serve California, Arizona and Nevada.

• **Kawneer Co.,** Niles, Mich., has purchased the sales and manufacturing facilities of the Sun Valley Industries, Inc., complete line of sliding door products. Kawneer has organized a sales subsidiary to handle the line under direction of David S. Miller, Kawneer marketing vice president. Distribution for the most part will continue through the Sun Valley sales organization. The manufacturing facility in Sun Valley, Calif., has been discontinued and all production will be centered in Michigan.

• **Cole Engineering, Inc.,** has completed a new steel fabricating plant in Hayward, Calif., capable of handling weldments up to 60 tons. New offices and engineering facilities are also part of the 40,000-ft. plant.

• **American Glass Tinting Corp.** has named a newly formed San Diego firm to serve as exclusive distributor of Sun-X glass tinting in Southern California. The company, headed by Fred Wheeler, president, and Edward P. Scott, vice president and general manager, will be called Sun-X Glass Tinting Corp. of Southern California.

• **Pomona Tile Manufacturing Co.** has promoted Lane Pierce from office manager of the San Francisco sales office to sales representative for the San Jose, Calif. territory.

• **The Fluor Corp., Ltd.**, has named Robert W. Kerr as president of Fluor Products Co., a division which manufactures glued laminated roof structures, air conditioning towers, etc. Kerr resigned as president and director of Fairbanks, Morse & Co. to accept the post.

• **Mercer Steel Co., Inc.**, Portland, has appointed R. E. (Ron) Mohr as sales engineer in the structural products division. Mohr will work with architects, engineers and contractors in Oregon, Washington and Idaho. He previously was district sales manager in the Pacific Northwest for the Truscon Division of Republic Steel Corp.

• **Formica Corp.** has named Robert H. Cottle, former Los Angeles district manager, as the new western sales manager, succeeding S. J. Cartier, who has been transferred to the Cincinnati headquarters and the post of industrial sales manager. Succeeding Cottle in Los Angeles is Edward P. Borchers, formerly district manager in Tampa, Fla. Gerald L. Mechlenborg has been named Portland district manager, succeeding Robert N. Power, who has been transferred to the Denver office as manager. Robert K. Hudson, former Denver manager, has been moved to an eastern office.

• **Macomber, Inc.**, will open a West Coast plant next spring to manufacture Allspan steel joists used for the framing of doors and roofs over clear spans of 120 ft. President Robert Macomber says that the new production facilities will be located at Kaiser Steel Corp.'s fabricating plant in Montebello, Calif. Kaiser will handle the manufacturing; Macomber, which has two plants in Canton, Ohio, and a third in Rock Island, Ill., will be in charge of distribution and engineering.

• **Glacier Sand & Gravel Co.** has begun operations at a new, $250,000 plant in Seattle, first multi-formula, fully automatic ready-mix concrete plant in the Pacific Northwest and the third of its kind in the nation. One man can control all phases of the operation with a flick of a switch. Capacity is 180 yd. of concrete an hour.

• **Filon Plastics Corp.** has appointed American Distributing Co., Modesto, Calif., as distributor.

• **Simpson Timber Co.** operating throughout Washington, Oregon and California have been consolidated and reorganized. Under the new arrangement, operating companies formerly known as Simpson Redwood Co., Simpson Logging Co. and Simpson Engineered Wood Products Co. will all be known as Simpson Timber Co. Manufacturing, marketing and timber management operations will be classified by departments administered in Seattle and by product divisions administered in the operating areas. Personnel realignment includes appointment of Gilbert L. Oswald, vice president and general manager of Simpson Redwood Co., to the new post of vice president, manufacturing; John L. Robins, director of administration, to general manager of the marketing department; and Starr W. Reed as general manager of the timberland department.

• **Lockwood Hardware Manufacturing Co.** has created a contract distributor's council to improve manufacturer-distributor relations and, in turn, improve services to architects and builders. Named to serve on the council as a representative of the West was James O. McAleer, vice president of Builders Hardware and Supply Co., Los Angeles.

• **Westinghouse Electric Corp.** has named John E. Noren Jr., former regional service manager, to the newly created post of San Francisco

5025 ARCHITECTS

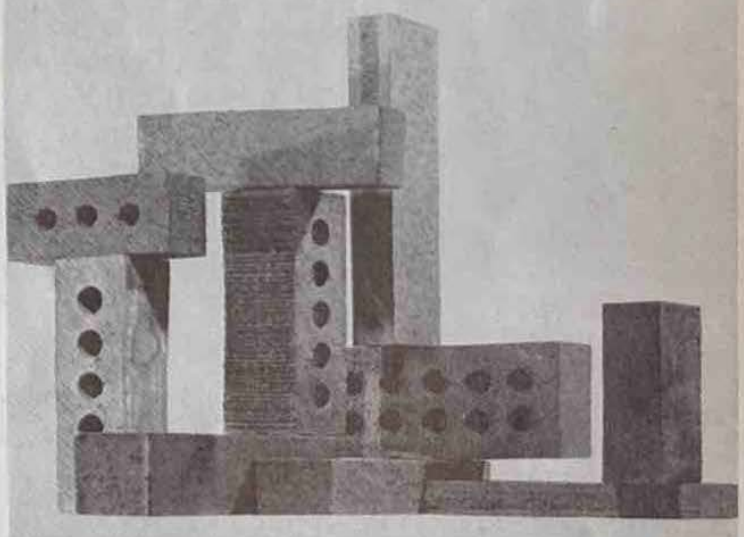
3452 CONTRACTORS

pacific architect & builder

"Magazine of Western Architecture"

Classroom frill? Hardly, when it takes only 1200 Clay City Norman Brick to build an attractive, indestructible, soundproof partition. Made only by

builders brick co. Seattle *Distributors... VANCOUVER, B. C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co. • Oregon: PORTLAND, Columbia Brick Works; SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.*



district manager for the elevator division. He will be responsible for activities in the San Francisco and Pacific Northwest areas.

• **Norris-Thermador Corp.** has purchased the assets of U. S. Porcelain Enamel Co., Vernon, Calif., and will operate it as a division.

• **Schurs Oil Burner Co.,** heating equipment manufacturer, has been sold to John J. Pivovaroff, former plant manager of Pioneer Aluminum Co. The firm, to be known as Schurs Burner & Equipment, Inc., has been moved to new facilities in South Gate, Calif.

• **Arcadia Metal Products** has appointed George W. Steward as operations manager in charge of all manufacturing and customer service activities. He moves to Arcadia from Thompson Ramo Wooldridge, Inc., where he was general manager of the West Coast division.

• **Koppers Co., Inc.,** has promoted Glen J. Chasteen from manager of the Wood Preserving Division's Wilmington, Calif., plant to assistant to the western district manager for the division. He will be in charge of operations and sales in California, Arizona and Nevada.

• **Nudor Manufacturing Corp.** plans to expand and modernize its main factory at North Hollywood, Calif., as part of an expansion program that will also include four new buildings at the Geneva, Ind., plant.

• **Olympic Stained Products Co.** has appointed American Factors, Ltd. as exclusive distributor in Hawaii. Moreire, Inc., will continue as sales representative for Olympic on the Islands.

• **E. I. du Pont de Nemours & Co.'s** Sun-X glass will be distributed in King County, Wash., and north to Canada by a new Seattle firm, Sun-X Glass Tinting, Inc., headed by Fred B. Collins.

• **Kaiser Gypsum Co.** has appointed Stan Marks as sales representative in southeastern Idaho.

• **American Gypsum Co.** recently held an open house to show off its new plant near San Mateo, Calif.

• **Desco International Association** has selected Warren Painting Co., Inc., Anchorage, as its franchised applicator in Alaska.

• **Hilts Laboratories, Ltd.,** has appointed American Factors, Ltd., as wholesale distributor for its roof coatings in Hawaii. Hilts is operating out of a new plant.

• **Featherock Co.** has named General Concrete Products, Inc., as exclusive distributor for a new lightweight stone called Featherock Veneer in California, Arizona and Nevada.

• **Permanente Cement Co.** has added A. J. Showalter to the Seattle office as a technical consultant serving customers in Washington, Oregon and Alaska. He has been chief engineer for San Gabriel Ready Mix Co. in California the past four years.

• **United Lighting & Ceiling Co.** has appointed William C. Nanny, formerly president of Cepco, Inc., as marketing director.

• **Bethlehem Steel Co.** has moved its Seattle plant offices and district sales office to a new building at 4045 Delridge Way.

• **Graystone, Inc.,** has named John James to head all ready-mix concrete plant operations in western Washington. He will also continue as manager of the Tacoma and Olympia branch plants.

ASSOCIATIONS

• **National Building Material Distributors Association** has elected Palmer G. Lewis of Seattle to a three-year term as director.

• **Prestressed Concrete Institute** has elected Robert H. Singer of Ben C. Gerwick, Inc., San Francisco, and Elmer D. Clark of Superior Sand & Gravel, Phoenix, to the board of directors. Jacob O. Whitlock, president of Midwest Prestressed Concrete Co., Springfield, Ill., was elected president at the convention held recently in New York.

• **Structural Clay Products Institute** elected these new directors from the West at its recent annual convention in Hollywood, Fla.: William F. Grabe, Grabe Brick Co., Tucson; L. P. McNear, L. P. McNear Brick Co., San Rafael, Calif.; Oscar F. Person, United Materials & Richmond Brick Co., Ltd., Point Richmond, Calif.; W. Rice Jr., Union Brick Co., San Diego; William J. Geddes, Denver Brick & Pipe Co., Denver; F. George Robinson, Robinson Brick & Tile Co., Denver; Ralph J. Welte, Summit Pressed Brick & Tile Co., Pueblo, Colo.; Chester P. Cahoon, Interstate Brick Co., Salt Lake City; and Carleton E. Goudge, Gladding, McBean & Co., Seattle. Paul B. Belden Jr. of Canton, Ohio, was reelected to serve a second term as president.

• **Portland Cement Association** has established a Hawaii district and named Joe V. Williams Jr. as district engineer with headquarters in Honolulu. Williams previously was a structural engineer in the Texas district.



Whether national or regional Convention — Association, Club or Business Group

Successful Meetings begin at a

HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

- SAN FRANCISCO — The Alexander Hamilton, Hotel Stewart, Hotel Don
- FRESNO — Hotel Californian
- SAN DIEGO — The El Cortez Motel, Travelodge Motor Hotel, Stardust Motor Hotel, El Cortez Motel
- MONTEREY — Hotel San Carlos
- OAKLAND — Lake Merritt Hotel
- OROVILLE — Oroville Inn
- RICHMOND — Hotel Don
- VALLEJO — Casa de Vallejo Hotel
- BAKERSFIELD — Hotel El Tejon

THE ALEXANDER HAMILTON San Francisco

a Handlery Hotel

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

Better design in the '60s: clients are people too

In an address before the Building Industry Conference Board in San Francisco, Elmer A. Lundberg, national president of the Producers' Council, listed five main factors which will make it easier for good architecture to be commissioned in the '60s.

• Improvement in communications. Through the power of the daily press and picture magazines and the universality of television, no age like the present has been afforded an opportunity like our own to see and study good architecture in use. When the celebration of the Pittsburgh Pirates' victory, for example, flashed across the land, your prospective clients not only saw Gateway Center, but saw it as a successful building group that has become the nerve center of our city. The centuries-old relationship of buildings and squares and parks to people that distinguishes the European city appears today in almost any issue of Holiday, the National Geographic or McCall's. Through the growth of communications, good architecture and good building are no longer a mystery. They are available at the flick of a TV dial or for 50 cents on any newsstand.

• The influence of travel. It is now a question in many minds as to which land mass will sink first under the weight of tourist traffic: California, Florida or all of Europe. Among those travelers are your clients. Eastern tourists, for example, brought back more from California 15 years ago than memories of their visit to Hollywood and a meal at Trader Vic's. They saw the California ranch house and patio; they wanted it; and in patio design and patio housekeeping accessories alone an entire new industry has sprung up in less than a decade. Your prospective clients have seen, first hand, the effects of Egyptian mass and Grecian grace and Baroque and Romanesque. And they want to talk about it with their architect.

• The level of taste is rising in America. Thousands of reproductions of Van Gogh paintings are being sold in the five-and-ten-cent stores—of all places. Sale of dry table wines has jumped 64% in the last 10 years. Thanks to art education, good buildings are being appreciated by the rank and file. The employer, your client, knows that a better building gives him better people for his jobs.

• The ability of architects to explain what they are trying to do and why has risen sharply in recent years. Architecture, thank goodness, is no longer one of the mysterious professions in which only a few of the high priests—the Louis Sullivans and the Frank Lloyd Wrights—do all the speaking for the profession. At the recent national convention of the Producers' Council, for example, AIA President Philip Will Jr. gave a brilliant address on the goals and responsibilities of the architectural profession. In my own professional work, I am impressed, constantly impressed, by the ability of the younger architects to represent their work to clients.

• If I may be permitted one plug for the producers, we too are doing a far better job. In some of our companies, new product research and development are up by as much as 30% and almost all are 10% higher than a year ago. We are doing a better job of presenting those products to you architects and builders and we are giving you better visual materials and product descriptions which you can discuss with your clients. We too in the building supplies industry believe that the pursuit of excellence must be one of our principal manufacturing and marketing goals.

And so I close this meeting with you by giving the first element last, namely, the title of these remarks—"Reception: Excellent." For I believe that clients are ready—really ready—to receive the best that our respective professions can give in vision, talent, new materials, new ideas. More and more clients would agree with the recent comment of Architectural Forum that "a wonderful building environment, believe it or not, draws to it all healthy, normal dignified people striving to spend their short life on earth as complete human beings."

I submit, therefore, that in the pursuit of excellence in our work we will not find the pleasure of work well done. We may even—as one of the soap operas promises its heroines—become rich and famous beyond our wildest dreams.

ADVERTISERS

Builders Brick Co.	39
Flintkote Co., Pioneer Division	III Cover
Genie-Air Products	42
Handlery Hotel	40
Haws Drinking Faucet Company	35
Macomber, Inc.	II Cover
Mahon, R. C. Co.	IV Cover
Pioneer Division, The Flintkote Co.	III Cover
West Coast Airlines	37

pacific architect & builder

Published by PACIFIC BUILDER & ENGINEER, INC.
1945 Yale Place N., Seattle 2, Wash., EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design and the men who construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

BUSINESS STAFF

Advertising: (Seattle) Norman Erickson, advertising manager; (Los Angeles) William G. Quinn, Box 36, Laguna Beach, Calif., HYatt 4-7912.

Production: Phyllis E. Forth, production manager.

Circulation: Frances S. Eggan, circulation manager.

EDITORIAL BRANCHES

Los Angeles: William G. Quinn, Box 36, Laguna Beach, Calif., HYatt 4-7912.

Portland: Win Romtvedt Holmes, 12440 S.W. Douglas, MItchell 4-8038.

Salt Lake City: Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606.

Honolulu: Beatrice M. Howell, Box 8048.

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

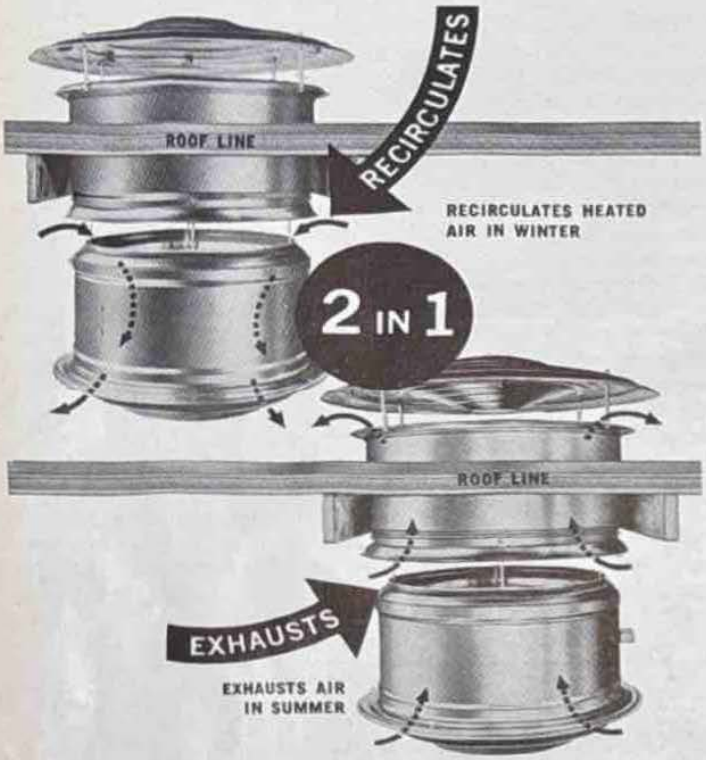
NEW PROVEN

Genie-Air Industrial Ventilating Unit

REDUCES HEATING COSTS UP TO 45%

Unique New Engineering Principle

PROVIDES YEAR 'ROUND CONTROLLED VENTILATION



The GENIE-AIR INDUSTRIAL VENTILATING UNIT materially reduces initial equipment and operating costs by driving the wasted heat under the roof line back to the floor area. MODEL ER is a dual purpose, power-driven ventilator that provides either recirculation of air within the building or exhaust. A 3 position reversing switch controls the direction of the fan. On the RECIRCULATING CYCLE, the fan blows the air downward. An exclusive DIVERTCO-DAMPER seals the top of the unit to prevent winter heat loss. Heat trapped under the roof line is pulled into the fan and blown out the diffuser openings at the bottom carrying it back to the floor area. This movement of air keeps temperature more uniform at all levels and improves the efficiency of your heating system. On the EXHAUST CYCLE the fan blows the air upward, pulling hot air into its path and exhausting it outside the building. The exclusive DIVERTCO-DAMPER is lifted up by the air column and its conical shape directs the air movement so that it is easily exhausted without back pressure. The GENIE-AIR DUAL EXHAUSTER-RECIRCULATOR has been proven in industrial installations for over 5 years.

Some exclusive territories open to qualified distributors.

For Engineering Data & Complete Specifications Write Dept. C-1

Genie-Air PRODUCTS

A Division of the N. T. W. Corporation

3001 East 11th Street
Los Angeles 23, California

not specified

and now we are five

With the announcement on page 5 of Western Building joining our family of publications, this seems like an appropriate time to present all the members of the clan. The others are Pacific Builder & Engineer, Construction News Bulletin and Pacific Construction Daily. All are published by Pacific Builder & Engineer, Inc., founded in 1902 and serving various segments of the construction industry in various sections of the West ever since that date.

Each covers a specialized portion of the industry, with editorial emphasis on timeliness and usefulness, with news value at the grassroots regional level. Nearly 70 people have a hand in producing these five publications.

Pacific Architect & Builder, of course, serves the architectural profession and the field of contract building from permit tabulations through design, methods, materials and men. Western Building plays a similar role in the light building industry—its suppliers of building products and the 15,000 speculative, improvement, tract and light commercial builders. Pacific Builder & Engineer does the same for the heavy construction industry. Construction News Bulletin (a weekly) and Pacific Construction Daily are bid call and contract award news publications serving both the engineering and building industries.

Acquisition of Western Building is a demonstration of our faith in the immediate and long-range futures of the West. We point to a future that will far outstrip the growth of the decade and a half since the end of World War II.

Joint agreement with Canada has paved the way for the firming up of hydroelectric power development in four Pacific Northwest states. This power will industrialize that area and, in turn, through the Bonneville intertie will be available for further industrialization in California. The recent voter-approved California Water Plan will make that state a still more desirable growth area. Freight rates are being adjusted and thus the stage is set for an even better economy—the basis for population explosions and building.

* * *

Along with the presentation of our own publishing and printing plant, January seems like a good time to make some changes in format, principally the cover. Credit for its design including the new PA&B symbol, goes to James E. Peck, Seattle artist who, by the way, as a member of the Municipal Art Commission is chairman of the city's current fountain competition (see p. 8).

Likewise, the content will keep pace with the improvements in layout, etc., in the coming months. Starting with this issue, for example, we have almost tripled the number of permit-issuing agencies participating in our monthly tabulation and have added a residential breakdown in answer to many requests for that information.

Our popular profile series (Richard Neutra, May '60; John Carl Warnecke, July '59) will have its third installment next month when Paul Thiry reviews the philosophy behind his design—a design approach that has a definite regional stamp upon it, but whose influence goes far beyond the Pacific Northwest.

From now on, this particular column will treat a single topic and when the subject matter warrants it, we will devote an entire page to editorial comment. All in all, it looks like an exciting year as PA&B continues to grow with the West.

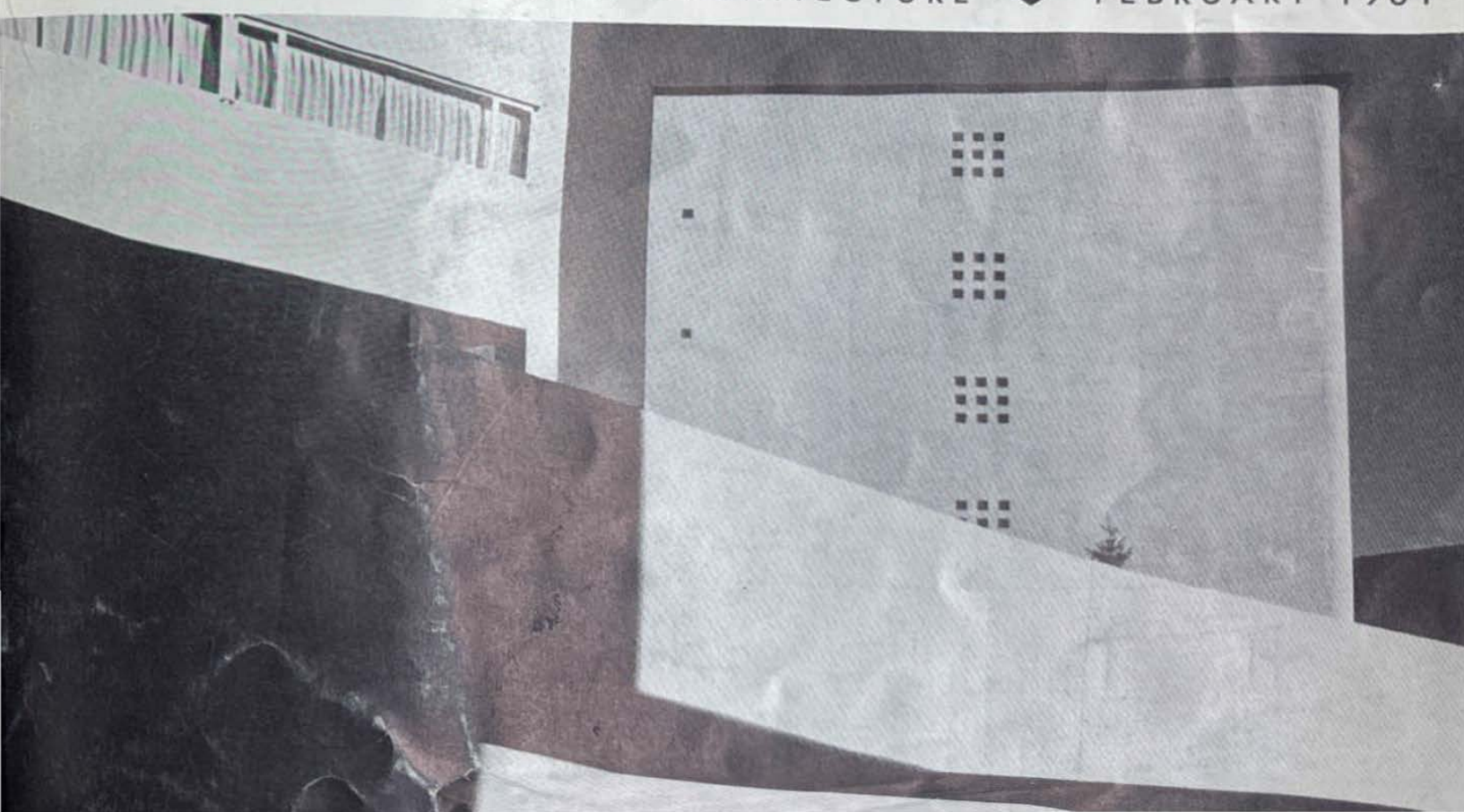
—R.E.K.

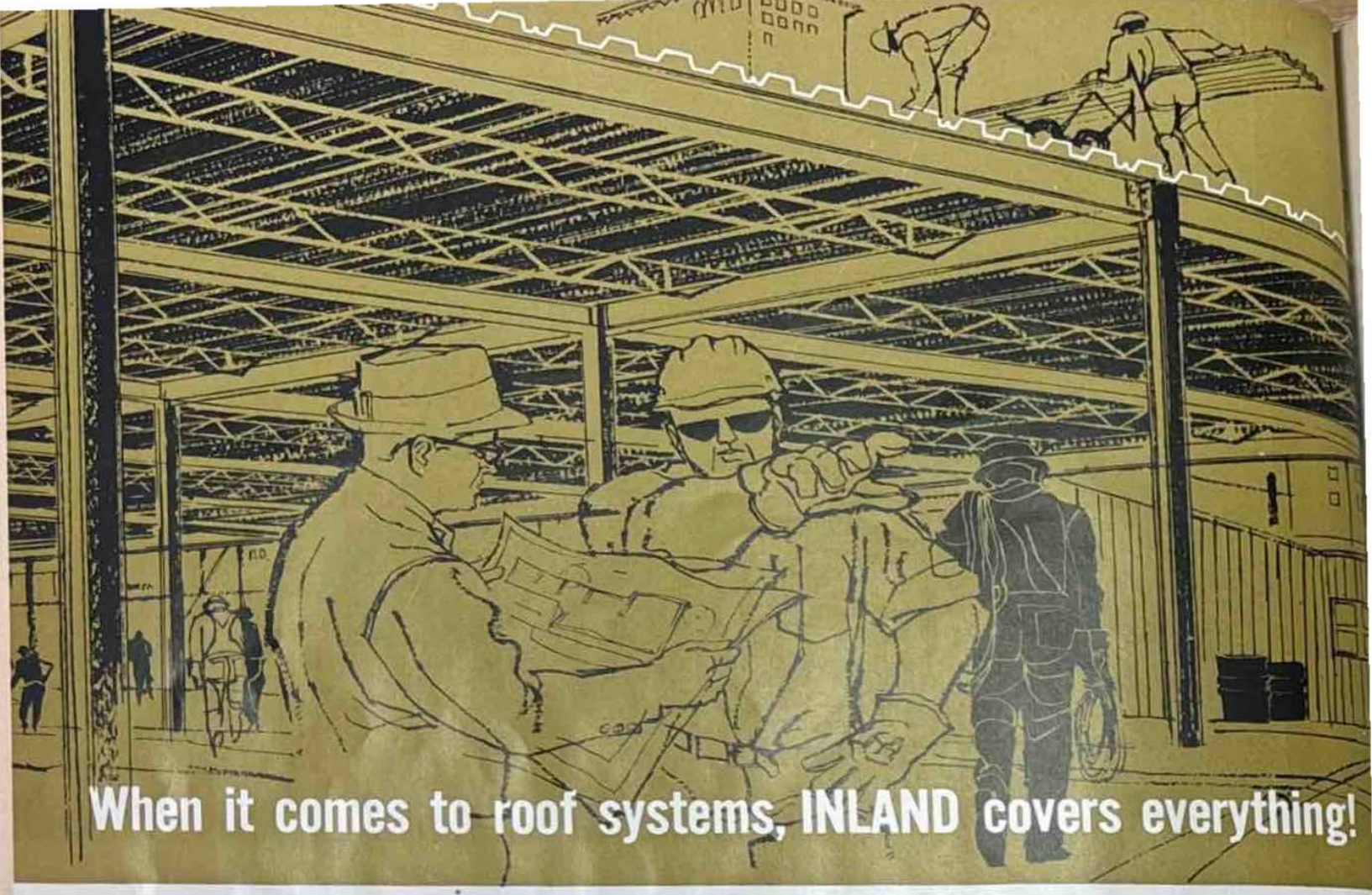
Pacific Architect & Builder

LIBRARY
SCHOOL OF ARCHITECTURE & ALLIED ARTS
UNIVERSITY OF OREGON
FEB 24 19

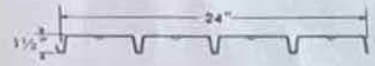
P A
& B

E MAGAZINE OF WESTERN ARCHITECTURE ◆ FEBRUARY 1961





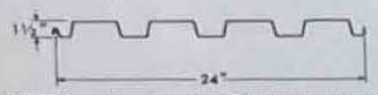
When it comes to roof systems, INLAND covers everything!



A-DECK — For purlin spacings not exceeding 8'4". Narrow ribs provide deck surface that supports the thinnest or softest type of insulation.



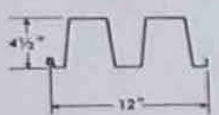
H-DECK — New! For simple spans from 10'0" to 20'0" — 3 and 4½" depths. Especially practical to cover walkways in shopping centers, schools, other installations.



B-DECK — For spans to 10'0". Wide rib distributes metal for greater structural efficiency — gives higher section properties per pound of steel — well suited for use as side wall panels.



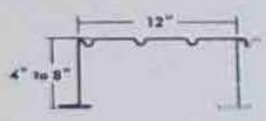
B-ACOUSTIDECK — Two-in-one panel combines steel roof deck with acoustical ceiling having Noise-Reduction Coefficient of .70 — used for spans to 10'0".



C-DECK—Carries normal roof loads over spans up to 24'0". Used extensively in canopies.



C-ACOUSTIDECK — Offers same Noise-Reduction Coefficient as B-Acoustideck. Can be used for spans to 24'0".



T-STEEL — New! Galvanized only — for clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to transmit seismic and wind loads.



RIBFORM — High tensile galvanized steel form for concrete slabs over spans up to 8'0". Three types: Standard, Heavy-Duty, Super-Duty.

Whether your design calls for a dry insulation board roof or for wet-fill, there's an Inland roof system for the job — by the makers of famous Milcor steel building products.

Inland steel deck weighs less than half as much as poured-in-place or pre-cast construction. You can space joists wider and use lighter framework to save both time and money. Panels are easy to handle and weld in place — in any weather that a man can work.

Types A, B, C, and H decks have the addition advantage of a Bonderized, baked-enamel prim finish that resists on-the-job damage. One fie coat of paint on these Inland decks usually cove

Write for catalogs 240, 241, and 245 — or s Sweet's sections 2c/Inl, 11a/In, and 2a/In.

member of the INLAND® steel fam

ENGINEERED PRODUCTS DIVISI

INLAND STEEL PRODUCTS COMPAN

Dept. B, 4045 West Burnham Stree
Milwaukee 1, Wisconsin

ATLANTA, BALTIMORE, BUFFALO, CHICAGO, CINCINNATI, CLEVELAND, DALLAS, DENVER, DETROIT, KANSAS CITY, LOS ANGELES, MILWAUKEE, MINNEAPOLIS, NEW ORLEANS, NEW YORK, ST.

Pacific Architect & Builder February 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

24 John Robertson Residence, Laguna Beach, Calif.: Killingsworth, Brady, Smith & Associates, Architects

26 Distributing Station Office, Tidewater Oil Co., Oakland: Albert Hunter Jr., Architect; Shig. Iyama, Associate

special feature

12 PA&B Profile: Paul Thiry, Seattle

methods & materials

29 For Honolulu Diners: Steel Framed Pie in the Sky

departments

4 Project Preview

5 Building Permits

8 The Building Month

10 T-Square Talk

30 Products

32 Books

35 Manufacturers/Suppliers

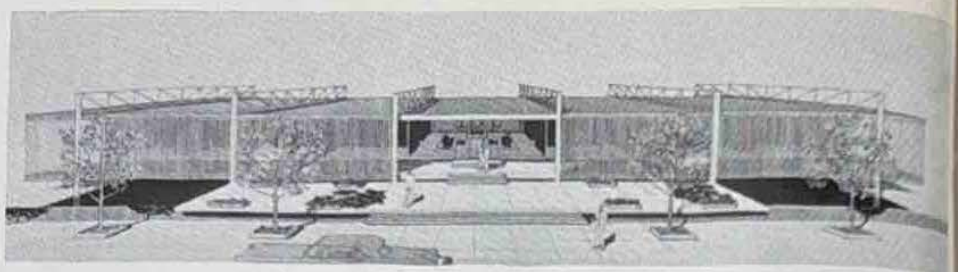
36 Not Specified

VOLUME 67, NUMBER 2

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place N., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertiser's index on page 36

COVER: Women's Residence Buildings, Washington State University, Pullman (profile, p. 12)—Paul Thiry, Architect.



ALL-ALUMINUM OFFICE STRUCTURE

for Acme Metal Molding Co. in Los Angeles will employ extruded columns with trusses on 30-ft. module. Beams will span truss to truss and high-strength panels will span beam to beam. A similar system has been proposed for floor construction. Projecting 9 ft. beyond front and back walls and 6 ft. beyond end walls, screen of 3-in. I-beams will be changed from time to time to show architectural aluminum trends. Designers: Craig Ellwood Associates; consulting architect: Norm Rosen; consulting engineers: Mackintosh & Mackintosh.



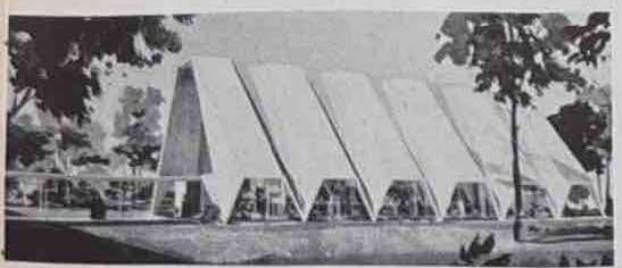
STATE OFFICE BUILDING

is one of two under construction in Olympia, Wash., each anchoring a long-range development which will eventually include seven structures flanking landscaped malls. Both buildings are designed on 6x6-ft. modular grid system with lighting fixtures, ceiling diffusers, underfloor duct system, windows and wall air diffusers coordinated to module, making possible movable partitions on any grid line. Both have quartz aggregate cast stone exteriors, aluminum windows glazed with heat-absorbent glass where necessary and porcelain enamel or structural glass between. Costing $3.2 million, seven-story structure will house the Washington State Highway Department and State Department of Licenses. Four-story companion building will house Employment Security Department. Architects-engineers: Harmon, Pray & Detrich.



EAST-WEST CENTER

at University of Hawaii in Honolulu, which now has both Congress' approval for funds and Board of Regents' blessing, will occupy 15-acre site on east boundary of campus, following general trace of Manoa Stream. Group of structures will provide housing for 2,000 students in residence (12-story dormitory block and three-story walk-up units), accommodations for 200 visiting scholars and their families (high-rise apartment tower), 120 transient quarters, food service facilities, administrative offices, seminar and conference rooms and 750-seat auditorium. Entire center, set apart as entity in itself, will be integrated by connecting walkways and terraced planes. Architects: McAuliffe, Young & Associates and I. M. Pei & Associates.



140-SEAT CHAPEL

of precast concrete folded plate design will be constructed on grounds of St. Joseph Hospital in Burbank, Calif. Entrance will be through oak doors set in travertine marble end panel. Exterior gravel pad will continue indoors. Fully air conditioned structure will have indirect lighting originating at floor level. Architects-engineers: Welton Becket & Associates.



OUTPATIENT BUILDING

at Los Angeles General Hospital will be windowless, air conditioned four-story and basement structure, designed to care for 3,000 patients per day in 220 treatment rooms. Plastic bubbles on roof will provide natural daylight for dermatology department. Estimated cost is $5.8 million. Architects: Arthur Froehlich, Douglas Honnold and John Rex.

Nonresidential construction in '60 is up $62 million

Nonresidential construction in the 13 western states for 1960 totals $2,515,860,000, an increase of $62.7 million. This bright spot in the construction picture is not bright enough, however, to overcome a $379.5 million decrease in residential construction.

A tabulation of reports from nearly 500 permit agencies puts the total volume for 1960 for the 13 states at $5,348,690,000, a decrease of $316.8 million from 1959 figures.

Six states record an increase in total volume for the year. Hawaii is up $35.1 million; Nevada, $22.2 million Arizona, $17 million; Alaska, $11.6 million; Montana, $530,000; and Wyoming, $410,000. States reporting decreases for the year and amounts are California, down $248.7 million; Washington, $70.9 million; New Mexico, $33.6 million; Colorado, $32.4 million; Utah, $12.5 million; Idaho, $6.3 million; and Oregon, a bare $20,000.

Number of permits issued in 1960, a total of 680,236, show a drop of 56,618 compared to 1959 figures. Number of residential units started (which covers number of living units in apartment houses, duplexes, single family residences, etc.) drop 66,406 to a total of 229,332.

The decrease in residential construction was widespread throughout the area with only three states recording increases for the year. These were Nevada, up $15.6 million in value and 1,260 in number of units; Alaska, $2.3 million, and 49; Wyoming up $160,000 and 116.

States showing decreases in residential construction are California, down $284.3 million and 57,929 in number of units; Washington, $40.1 million and 2,870; New Mexico, $26.4 million and 2,822; Utah, $13.1 million and 1,208; Oregon, $11.1 million and 1,017; Arizona, $8.4 million and 1,172; Idaho, $4.78 million and 306; Hawaii, $4.8 million and 1,356; Colorado, $3.5 million and 842; Montana, $1.1 million and 25.

For the month of December, total dollar volume in the West is $384,665,927, a decline of $33.82 million from 1959. Number of permits issued drop by 10,637. While the decrease is fairly widespread, two states record increases: California, up $2.2 million, and Nevada, $1.3 million.

Decreases are reported in New Mexico, down $9.7 million for the month; Oregon, $8.9 million; Colorado, $7.3 million; Arizona, $4.6 million; Hawaii, $2.3 million; Utah, $1.4 million; Washington, $1.2 million; Idaho, $1 million; Wyoming, $336,000; Montana, $154,000 and Alaska, $75,000.

Again, residential construction is responsible. While residential construction drops $43.12 million, nonresidential construction picks up $9.3 million over December 1959 figures. On a statewide basis, only one state shows an increase in residential construction for December—Nevada, up $1.2 million. All other states record decreases ranging from $175,205 in Alaska to $28.4 million in California.

San Francisco booms up to second place in the top 25 ratings for December, aided by permits issued for the new Hilton Hotel, $15 million; two apartment buildings totaling $8.3 million; and a federal housing project, $2.5 million. Its increase: $13.8 million. Six other agencies, all in California, which chalk up big gains over the same month in 1959 are San Luis Obispo County, up $5.9 million; Beverly Hills, $4.5 million; Marysville, $3 million; Bakersfield, $2.9 million; Ventura County, $2.5 million; and Palo Alto, $2.4 million.

Top 25 agencies for December

1.	Los Angeles	$39,485,990
2.	San Francisco	30,887,735
3.	San Diego	16,245,835
4.	Los Angeles County	11,961,490
5.	Sacramento County	9,911,127
6.	Honolulu	8,838,011
7.	San Diego County	7,649,200
8.	Anaheim, Calif.	7,303,514
9.	King County, Wash.	6,728,730
10.	San Luis Obispo County	6,700,834
11.	Maricopa County, Ariz.	6,573,459
12.	Orange County	6,339,665
13.	Ventura County, Calif.	6,039,753
14.	Beverly Hills	5,775,789
15.	San Jose	5,480,859
16.	Tucson	5,448,069
17.	Phoenix	4,923,701
18.	Denver	4,712,675
19.	Bakersfield, Calif.	4,296,674
20.	Seattle	4,250,610
21.	Riverside County, Calif.	3,348,669
22.	Palo Alto	3,301,296
23.	Santa Barbara	3,092,100
24.	Marysville, Calif.	3,066,968
25.	Costa Mesa, Calif.	2,764,964

For a complete tabulation of nearly 500 building permit agencies in the 13 western states for December see the following two pages.

1960 AND 1959 COMPARATIVE TOTALS FOR THE 13 WESTERN STATES

State	1960 Residential Only	1959 Residential Only	1960 Res. Units	1959 Res. Units	1960 Total $ Volume	1959 Total $ Volume	1960 No. Permits	1959 No. Permits
California	$1,978,210,000	$2,262,480,000	150,133	208,062	$3,579,680,000	$3,828,430,000	427,101	472,841
Oregon	105,950,000	117,090,000	8,319	9,336	239,760,000	239,780,000	29,095	30,088
Washington	149,980,000	190,040,000	11,310	14,180	333,370,000	404,290,000	42,356	48,213
Alaska	7,010,000	4,750,000	271	222	26,440,000	14,850,000	1,242	1,205
Idaho	12,090,000	16,870,000	930	1,236	31,040,000	37,390,000	5,656	7,233
Montana	17,120,000	18,210,000	1,541	1,516	40,440,000	39,910,000	3,924	4,156
Wyoming	15,790,000	15,630,000	1,264	1,148	26,070,000	25,660,000	2,928	2,955
Colorado	146,480,000	150,000,000	14,427	13,603	278,980,000	311,430,000	70,970	73,379
Utah	50,680,000	63,840,000	4,191	5,399	104,400,000	116,920,000	9,864	11,210
Nevada	53,230,000	37,640,000	4,438	3,178	93,360,000	71,180,000	9,651	7,554
Arizona	172,900,000	181,330,000	20,329	21,501	337,430,000	319,540,000	43,677	40,440
New Mexico	45,510,000	71,960,000	4,498	7,320	86,200,000	119,880,000	18,862	24,740
Hawaii	77,880,000	82,650,000	7,681	9,037	171,520,000	136,420,000	14,910	12,840
Total	$2,832,830,000	$3,212,400,000	229,332	295,738	$5,348,690,000	$5,665,590,000	680,236	736,854

Building Permit Totals for

CALIFORNIA	Residential	Total
Alameda	$ 49,335	$ 237,632
Alameda County	1,915,150	2,127,050
Albany	17,000	90,204
Alhambra	309,500	376,595
Anaheim	2,733,720	7,303,514
Antioch	103,648	145,981
Arcadia	1,017,685	1,262,423
Arroyo Grande	Nil	818
Artesia	37,300	50,400
Atherton	73,500	99,021
Atwater	23,157	24,432
Auburn	16,000	84,470
Avalon		Nil
Azusa	294,900	720,650
Bakersfield	791,448	4,296,674
Baldwin Park	1,060,190	1,145,900
Banning	205,655	221,876
Barstow	63,000	118,852
Bell	13,000	62,195
Bellflower	720,000	1,002,260
Belmont	184,000	241,800
Benicia	13,608	23,009
Berkeley	12,000	907,393
Beverly Hills	1,217,000	5,775,789
Bradbury	30,000	32,000
Brawley	114,000	143,400
Brea	268,491	281,079
Buena Park	95,656	2,670,666
Burbank	228,000	652,748
Burlingame	22,000	272,364
Butte County	Nil	325,800
Calexico	6,000	69,200
Campbell	Nil	58,278
Carlsbad	316,000	815,950
Carmel	19,000	99,660
Chico	24,711	223,556
Chino	39,327	72,123
Chula Vista	88,000	1,379,487
Claremont	149,900	173,600
Coalinga	17,500	20,370
Colton	17,176	64,071
Commerce	136,500	565,250
Compton	85,600	252,834
Concord	No reply	No reply
Contra Costa Cty.	1,070,771	1,933,639
Corona	35,036	84,151
Coronado	Nil	9,046
Corte Madera	52,380	56,420
Costa Mesa	2,321,753	2,764,964
Covina	347,075	470,955
Cudahy	106,500	123,100
Culver City	29,500	907,676
Dairy Valley	38,400	55,590
Daly City	115,453	281,803
Davis	167,000	177,650
Delano	27,851	37,411
Downey	361,150	716,444
Duarte	15,000	46,050
El Cajon	92,500	300,950
El Centro	48,000	90,140
El Cerrito	81,971	201,988
El Dorado County	328,504	566,850
El Monte	71,250	138,047
El Segundo	28,000	148,334
Emeryville	Nil	43,050
Escondido	53,007	88,248
Eureka	42,000	396,325
Fairfield	236,095	245,682
Fillmore	Nil	2,388
Fontana	88,980	473,576
Fremont	1,238,400	1,358,851
Fresno	491,084	1,169,882
Fresno County	934,656	1,451,423
Fullerton	716,124	1,034,379
Glendale	767,218	1,705,413
Glendora	513,300	568,200
Half Moon Bay	Nil	36,800
Hanford	210,710	231,295
Hawthorne	218,950	456,875
Hayward	372,100	582,525
Hemet	125,600	131,573
Hermosa Beach	82,902	121,003
Hillsborough	73,000	89,000
Holtville	11,700	30,650
Humboldt County*		341,275
Huntington Beach	869,337	1,064,101
Huntington Park	123,195	225,570
Imperial County	Nil	6,000
Indio	38,000	122,407
Industry	Nil	7,700
Inglewood	886,350	1,183,999
Irwindale	Nil	72,080
Kern County*		1,223,293
Laguna Beach	177,500	225,304
La Habra	456,613	562,495
Lakewood	95,000	404,060
La Mesa	60,485	101,679
La Puente	Nil	23,162
La Verne	10,000	37,150
Lawndale	367,000	451,439
Lindsay	Nil	4,843
Livermore	175,314	192,439
Lodi	221,100	275,350
Lompoc	142,950	190,532
Long Beach	515,290	2,026,585
Los Altos*		941,579
Los Angeles	13,035,098	39,485,990
Los Angeles Cty.	6,998,875	11,961,490
Los Gatos	104,000	311,025
Lynwood	121,500	413,500
Madera	29,000	63,335
Madera County	42,000	103,500
Manhattan Beach	80,950	221,205
Manteca	97,200	170,630
Marin County	687,955	980,656
Martinez	Nil	173,058
Marysville	Nil	3,066,968
Maywood	47,600	142,940
Menlo Park	168,000	277,315
Merced	176,497	199,671
Merced County	128,000	361,660
Millbrae	529,000	567,100
Mill Valley	86,000	113,457
Mirada Hills	650,000	753,800
Modesto	367,700	608,673
Monrovia	232,634	599,378
Montclair	801,530	841,905
Montebello	1,008,053	1,578,475
Monterey	205,900	501,052
Monterey County	439,000	846,180
Monterey Park	55,710	129,999
Mountain View	264,000	950,680
Napa	196,988	237,330
Napa County	92,099	172,679
National City	71,452	381,005
Newport Beach	1,212,900	1,487,690
North Sacramento	101,380	504,616
Norwalk	255,000	389,075
Novato	317,600	406,000
Oakdale	20,109	66,794
Oakland	1,104,950	2,661,062
Oceanside	15,000	863,779
Ojai	45,000	87,750
Ontario	75,080	276,328
Orange	1,752,976	1,838,563
Orange County	4,582,781	6,339,665
Oroville	21,647	64,864
Oxnard	234,850	1,513,911
Pacifica	24,000	76,335
Pacific Grove	130,500	437,000
Palm Springs	383,000	843,953
Palo Alto	238,300	3,301,296
Palos Verdes Est.	No reply	No reply
Paramount	224,500	532,325
Pasadena	463,078	1,647,797
Paso Robles	30,000	32,700
Piedmont	80,000	105,264
Pinole	No reply	No reply
Pittsburg	52,756	58,981
Placentia	Nil	29,644
Placer County	400,800	462,992
Pleasanton	49,000	91,911
Pomona	117,200	415,648
Porterville	21,500	43,350
Port Hueneme	Nil	11,100
Red Bluff	10,530	20,189
Redding	57,000	119,300
Redlands	248,000	334,676
Redondo Beach	180,987	424,365
Redwood City	353,500	421,249
Richmond	347,633	689,794
Riverside	581,400	801,335
Riverside County	1,607,495	3,348,869
Rolling Hills	45,300	70,300
Rolling Hills Est.	35,450	51,525
Rosemead	Nil	32,850
Roseville	34,874	117,014
Sacramento	1,403,525	1,626,200
Sacramento Cty.	4,563,344	9,911,127
St. Helena	25,915	49,915
Salinas	247,000	696,348
San Bernardino	427,635	1,290,569
San Bernardino Co.	1,544,619	2,605,688
San Bruno	80,500	208,378
San Carlos	143,000	240,790
San Clemente	98,417	176
San Diego	5,866,317	16,345
San Diego County	3,503,000	7,645
San Dimas	69,900	72
San Fernando	54,400	187
San Francisco	12,475,261	30,887
San Gabriel	289,100	344
Sanger	42,000	71
San Jacinto	33,180	36
San Joaquin Co.	188,535	341
San Jose	4,301,900	5,48
San Leandro	120,000	33
San Luis Obispo	82,000	174
San Luis Obis. Cty.	232,081	6,76
San Marino	64,000	12
San Mateo	452,800	71
San Mateo County	476,400	79
San Pablo	88,025	9
San Rafael	849,295	91
Santa Ana	1,034,571	2,61
Santa Barbara	412,600	66
Santa Barbara Cty.	2,901,000	3,09
Santa Clara	805,000	1,33
Santa Clara Cty.	1,115,900	1,95
Santa Cruz	422,092	52
Santa Cruz County	1,034,057	1,74
Santa Fe Springs	11,800	32
Santa Maria	526,580	64
Santa Monica	339,770	1,18
Santa Paula	30,112	6
Santa Rosa	399,000	80
Sausalito	85,500	12
Seal Beach	36,086	4
Seaside	151,652	18
Selma	43,750	14
Shasta County	57,200	56
Sierra Madre	88,675	11
Solano County	44,100	7
Sonoma County	362,338	1,10
South Gate	465,814	62
South El Monte	38,000	8
South Pasadena	185,730	21
South San Fran.	82,900	23
Stanislaus County	302,244	61
Stockton	406,450	90
Sunnyvale	1,140,819	1,80
Temple City	104,100	15
Torrance	370,125	64
Tracy	Nil	3
Tulare	20,000	3
Tulare County	152,889	22
Turlock	163,664	17
Ukiah	Nil	1
Upland	215,250	25
Vacaville	No reply	No r
Vallejo	230,000	32
Ventura	18,000	7
Ventura County	5,050,000	6,03
Visalia	540,359	62
Walnut	Nil	
Walnut Creek	No reply	No r
Wasco	11,000	1
Watsonville	41,500	8
West Covina	402,051	59
Whittier	284,500	36
Woodland	53,000	6
Woodside	41,000	1
Yolo County	98,375	23
Yreka	No reply	No r
Yuba City	93,500	21
Yuba County	63,400	8
TOTAL	**$128,613,040**	**$280,65**

OREGON	Residential	T
Albany	$ 36,000	$ 8
Ashland	12,500	1
Astoria	Nil	
Baker	34,000	6
Beaverton	97,187	11
Bend	14,000	6
Central Point	29,000	4
Clackamas Cty.	257,200	27
Coos Bay	49,000	11
Corvallis	53,000	21
Dallas	27,000	3
Douglas County*		27
Eugene	160,330	34
Forest Grove	32,500	5
Grants Pass	13,000	3
Gresham	18,000	3
Hermiston	10,289	1

*No breakdown of figures available

3 Western States for December

Hillsboro	137,960	150,710
Hood River	Nil	7,138
Klamath Falls	26,000	107,200
La Grande	Nil	1,500
Lane County	566,125	881,444
Lebanon	12,000	15,590
Marion County	554,824	717,574
McMinnville	37,000	44,950
Medford	148,650	963,910
Milton-Freewater	Nil	1,650
Multnomah County	1,003,299	1,258,019
Newberg	10,000	10,000
Newport	10,280	15,030
North Bend	Nil	7,689
Ontario	11,000	25,000
Oregon City	30,000	209,962
Oswego	227,500	280,550
Pendleton	20,800	95,535
Portland	584,900	2,453,065
Prineville	Nil	Nil
Roseburg	8,910	528,694
St. Helena	Nil	Nil
Salem	71,250	140,675
Seaside	Nil	3,700
Springfield	35,950	41,841
The Dalles	128,000	145,865
Washington Cty.	859,800	986,286
TOTAL	**$ 5,327,254**	**$ 10,865,679**

WASHINGTON	Residential	Total
Aberdeen	$ 11,950	$ 38,572
Anacortes	Nil	70,020
Auburn	220,000	2,231,750
Bellevue	14,000	140,800
Bellingham	50,000	672,014
Bremerton	Nil	148,855
Camas	10,500	11,870
Centralia	Nil	34,133
Chehalis	24,000	40,949
Clark County	577,500	721,275
Clarkston	Nil	2,675
Ellensburg	Nil	14,725
Enumclaw	12,000	12,500
Ephrata	Nil	8,565
Everett	43,225	659,620
Grays Harbor Cty.	14,000	58,250
Hoquiam	Nil	30,040
Island County	28,000	49,900
Kelso	31,000	33,701
Kennewick	35,000	41,400
Kent	115,500	159,000
King County	3,645,025	6,728,730
Kirkland	30,000	122,600
Longview	16,000	602,018
Montesano	No reply	No reply
Moses Lake	Nil	23,400
Olympia	59,500	139,310
Pasco	50,000	82,100
Pierce County	850,250	1,000,310
Port Angeles	8,500	12,500
Port Orchard*		12,150
Pullman	26,477	55,277
Puyallup	25,000	25,250
Renton	89,450	147,900
Seattle	872,750	4,250,610
Shelton	Nil	4,700
Spokane	183,000	894,159
Spokane County	560,700	637,623
Sunnyside	29,000	37,000
Tacoma	428,600	1,569,374
Vancouver	101,350	745,572
Walla Walla	12,000	56,810
Walla Walla Cty.	30,000	31,200
Wenatchee	40,000	124,690
Yakima	71,000	220,385
TOTAL	**$ 8,315,277**	**$ 22,677,282**

ALASKA	Residential	Total
Anchorage	$ 41,420	$ 172,430
Fairbanks	No reply	No reply
Juneau	Nil	500
Ketchikan	2,500	30,300
Sitka	No reply	No reply
TOTAL	**$ 43,920**	**$ 203,230**

IDAHO	Residential	Total
Alameda	$ 82,500	$ 84,500
Blackfoot	51,300	105,400
Boise	37,500	187,725
Caldwell	15,000	29,350
Coeur d'Alene	Nil	2,100
Idaho Falls	142,490	340,705
Jerome	22,500	23,915
Lewiston	41,000	182,103
Moscow	76,819	101,819
Nampa	37,000	103,200
Payette	15,000	16,500
Pocatello	108,000	124,983
Sandpoint	24,000	24,200
St. Maries	Nil	Nil
Twin Falls	74,000	79,350
TOTAL	**$ 727,109**	**$ 1,405,850**

MONTANA	Residential	Total
Anaconda	$ Nil	$ 14,200
Billings	337,800	568,350
Bozeman	27,000	28,200
Butte	Nil	500
Cut Bank	13,000	13,000
Glasgow	60,000	439,990
Glendive	Nil	74,200
Great Falls	403,272	457,568
Havre	31,900	32,100
Helena	53,000	74,550
Kalispell	33,500	36,900
Lewistown	34,000	102,875
Livingston	Nil	1,400
Malta	Nil	Nil
Miles City	14,000	15,475
Missoula	Nil	187,277
TOTAL	**$ 1,007,472**	**$ 2,046,585**

WYOMING	Residential	Total
Casper	$ 294,500	$ 337,585
Cheyenne	215,500	411,707
Cody	394,300	958,130
Laramie	Nil	2,517
Rawlins	Nil	233,200
Riverton	31,000	38,200
Rock Springs*	Nil	Nil
Sheridan	32,000	76,718
TOTAL	**$ 967,300**	**$ 2,058,057**

COLORADO	Residential	Total
Adams County	$ 455,500	$ 517,789
Alamosa	13,500	21,900
Arapahoe County	No reply	No reply
Arvada	446,000	554,391
Aspen	Nil	1,600
Aurora	228,990	283,801
Boulder	686,850	1,174,356
Boulder County	215,900	272,685
Canon City	No reply	No reply
Colo. Springs	350,626	589,152
Cortez	10,500	11,200
Denver	1,159,450	4,712,675
Durango	29,560	44,960
El Paso County	180,900	270,985
Englewood	162,200	617,550
Estes Park	Nil	Nil
Fort Collins	331,100	343,000
Fort Morgan	11,632	14,737
Golden	13,250	13,425
Grand Junction	19,500	118,780
Greeley	369,800	419,098
Jefferson Cty.	1,835,756	2,423,106
La Junta	38,000	38,200
Lamar	Nil	Nil
Littleton*		494,600
Longmont	112,000	210,986
Loveland	Nil	9,700
Monte Vista	3,300	12,000
Montrose	Nil	10,704
Pueblo	353,382	433,777
Pueblo County	64,000	64,600
Sterling	35,000	37,925
Trinidad	8,000	14,290
Walsenburg	Nil	Nil
Westminster	22,300	592,483
TOTAL	**$ 7,156,996**	**$ 14,324,455**

UTAH	Residential	Total
American Fork	$ 40,000	$ 45,100
Bountiful	213,000	263,095
Brigham City	257,800	257,800
Cedar City	Nil	3,300
Clearfield	Nil	2,000
Davis County	47,840	651,152
Kaysville	15,390	16,390
Layton	124,000	139,000
Logan	78,075	98,075
Murray	108,000	289,100
Ogden	246,300	301,100
Orem	50,000	53,300
Price	No reply	No reply
Provo	160,000	184,750
Salt Lake City	305,250	2,222,079
Salt Lake County	1,172,600	1,409,350
So. Salt Lake City	Nil	18,800
Spanish Fork	33,000	36,450
Tooele	23,967	27,160
Utah County	64,044	2,073,431
Weber County	40,000	46,000
TOTAL	**$ 2,980,266**	**$ 8,137,432**

NEVADA	Residential	Total
Boulder City	$ Nil	$ 6,525
Clark County	192,756	1,278,009
Elko	10,620	15,160
Las Vegas	2,204,350	2,429,746
North Las Vegas	362,691	424,233
Reno	609,000	1,186,462
Sparks	365,000	543,987
Washoe County	218,690	309,460
TOTAL	**$ 3,963,107**	**$ 6,193,582**

ARIZONA	Residential	Total
Buckeye	$ Nil	$ 4,900
Casa Grande	5,000	7,650
Chandler	113,125	120,719
Douglas	46,400	63,850
Flagstaff	4,133	12,103
Florence	Nil	Nil
Glendale	53,400	93,075
Maricopa County	4,982,625	6,573,459
Mesa	348,210	871,593
Miami	No reply	No reply
Phoenix	2,064,889	4,923,701
Pima County	628,400	1,774,876
Prescott	51,500	468,145
Scottsdale*		144,480
Tempe	855,700	931,720
Tucson*		5,448,069
Wickenburg	3,500	17,400
Winslow	No reply	No reply
Yuma	17,740	129,375
TOTAL	**$ 9,174,622**	**$ 21,585,115**

NEW MEXICO	Residential	Total
Alamogordo	$ Nil	$ 40,397
Albuquerque	969,689	2,093,723
Artesia	48,000	64,250
Carlsbad	79,000	87,500
Clovis	132,683	1,321,739
Deming	30,000	33,500
Farmington	33,782	76,432
Gallup	295,500	319,143
Hobbs	18,000	39,900
Las Cruces	156,500	231,300
Las Vegas	12,000	31,000
Lovington	31,000	33,000
Raton	No reply	No reply
Roswell	233,500	290,532
Santa Fe	92,100	98,950
Silver City	38,000	39,058
Truth or Cons.	3,500	9,100
Tucumcari	16,000	44,300
Tularosa	Nil	23,000
TOTAL	**$ 2,189,234**	**$ 4,887,824**

HAWAII	Residential	Total
Hawaii County	$ 164,950	$ 357,310
Honolulu	4,490,425	8,838,011
Maui County	242,450	435,314
TOTAL	**$ 4,897,825**	**$ 9,630,635**
GRAND TOTAL	**$175,363,422**	**$384,665,927**

Southwestern Oregon AIA inaugurates awards program

In its initial competition for architectural excellence, the Southwestern Oregon Chapter, AIA, gave a First Honor Award to the Lane County Courthouse from a field of more than 20 entries. Four other structures, all in the Eugene-Springfield area, received Awards of Merit at a presentation in the Village Green Motel, just north of Cottage Grove, January 21.

The all-architect jury consisted of Victor Steinbrueck of Seattle, Alan Liddle of Tacoma and Herman Brookman of Portland. Paul V. Edlund was awards chairman for the chapter, which encompasses an area generally south of Albany and from the Cascades to the coast. He said that buildings of all classifications, erected anywhere in the U.S. or abroad, were eligible. There was no limit on their age; however, each had to be completed and occupied.

First Honor Award

Tom Burns photos (except bottom right)



LANE COUNTY COURTHOUSE (PA&B, April '60): Wilmsen, Endicott & Unthank, architects.

Awards of Merit



OUR SAVIOR'S LUTHERAN CHURCH: Lutes & Amundson, architects.



RIVER ROAD BRANCH, United States National Bank of Portland (PA&B, Jan. '60): Wilmsen, Endicott & Unthank, architects.



SPRINGFIELD PUBLIC LIBRARY (PA&B, June '58): Lutes & Amundson, architects.



EUGENE PUBLIC LIBRARY: Clare K. Hamlin and B. King Martin, architects.

Rental housing industry sets exhibition in Los Angeles

The second Multiple Dwelling Show, a trade exposition of goods and services directed to the needs of the multi-unit rental housing industry, will be held at the Great Western Exhibit Center in Los Angeles March 8-12.

The show will feature manufacturer's exhibits and panel discussions by architects, decorators, landscape architects, mortgage bankers and trade associations.

Participating on the daily 5 p.m. panels centered around the topic "What Is Tenant Appeal?" will be Don Parks, architect; Clarence Karowski, decorator; Owen H. Peters, landscape architect; and Bert J. Finburgh, investor and member of the Mortgage Bankers Association.

Product clinics on "Techniques in Tenant Appeal" will be held twice daily. Among the participants will be Frank W. Daluiso, Southern California Association of Cabinet Manufacturers; Donald Hassis, Sliding Glass Door and Window Institute; Phil Jacks, Southern California Plastering Institute; Bob Gamm, Wholesale Plumbing Institute; Henry B. Ely, Refrigeration and Air Conditioning Contractors Association; John Kent Harris, Painting and Decorating Contractors Association; and Bob Hammill, Tile Council and Ceramic Tile Institute.

A twofold increase over last year's 5,028 attendance is expected.

San Francisco gives green light to Hilton in permit dispute

The $27 million, 1,000-room Hilton Hotel, long rumored for San Francisco and bogged down for more than four years by disputes over the building code, has finally been issued a building permit. The controversy over building plans, particularly those bearing on fire prevention and controls, was ultimately resolved by the State Supreme Court late in December.

Main issue involved in the Hilton case was that part of the code requiring smokeproof towers for fire protection. Because the Hilton plans did not meet this requirement, the San Francisco Central Permit Bureau refused to give them a building permit; and the Department of Public Works and the Bureau of Building Inspectors concurred.

The controversy has raged verbally and in print and was twice carried into the Board of Permit Appeals and once into the District Court of Appeals. The five-man Board of Permit

Appeals overruled the Central Permit Bureau, declaring that the building code was antiquated and unrealistic and that the Hilton plans, as presented, did not involve safety risks.

City officials, still adamant, referred the case to the State Supreme Court to test whether the Board of Permit Appeals has the legal authority to overrule the Central Permit Bureau. When the Supreme Court upheld the authority of the Board of Appeals, the city had no alternative but to issue the long-disputed permit.

In city departments, however, the controversy continues, for they feel that the Supreme Court decision has endowed the Board of Permit Appeals with "powers of supergovernment." City Attorney Dion Holm has urged that the city charter be amended to define more sharply the powers of the board. "As it stands now," he said, "it can do almost anything."

Various reviews and revisions of the building code are also being considered, with the primary question seeming to be: is San Francisco's building code outmoded and antiquated or is it among the most modern in the land, as its supporters claim?

Southern California architect cites trends in plant design

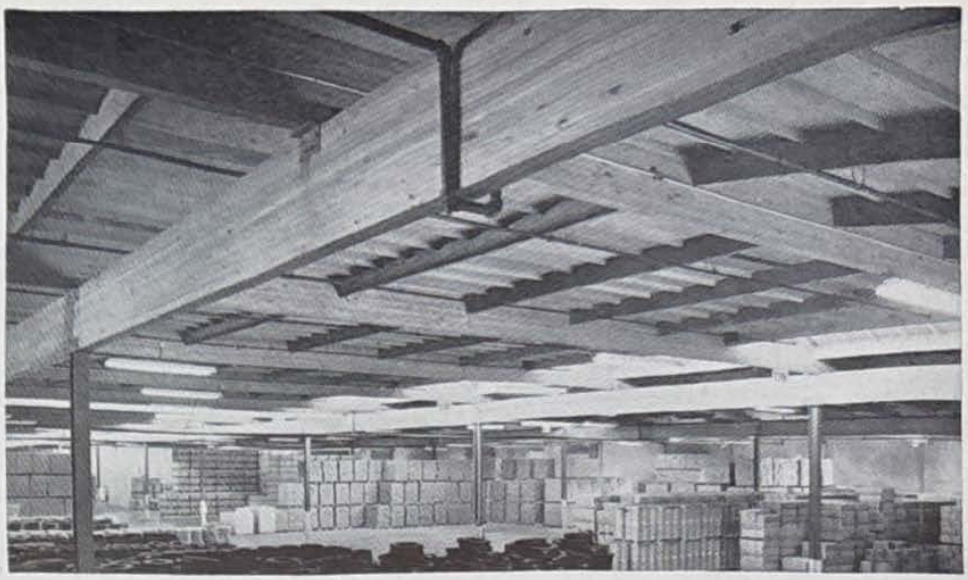
New dimensions in plant design are derived neither from mathematics nor geometry but from human use of human beings.

As co-chairman of the Industrial Building Exposition and Congress in New York City in mid-December, Los Angeles architect Albert C. Martin Jr. had ample opportunity to speak on behalf of his profession.

"Man and not his machines must become the prime concern of the architect and builder. Future plant architecture must more than ever conform to dimensions of sociology, psychology, economics and public relations."

Such design and overall social consciousness are demanded if architecture is to humanistically and productively meet the demands of the expanding American economy without contributing to future chaos in overall or community development, the architect added.

Pointing to unusual requirements in flexibility and adaptability, Martin said that the short-term nature of research and development contracts and the dynamic character of scientific investigation itself force the designer to recognize the inevitability of change. It has been found, for example, that a fourth of the partitions in a typical laboratory are likely to be moved within a year.



Initial Cost of Rilco Beams—
"REASONABLE"
Cost of Handling and Erection—
"FAVORABLE"

"Both the customer and ourselves are well pleased with the installation," states Grif S. Pharo, Wm. P. Neil Co., Los Angeles, contractor for the new Daetwyler Warehouse, Los Angeles. "We found the initial cost of Rilco laminated wood beams very reasonable . . . the cost of handling and erection very favorable."

Rilco laminated wood beams, arches and purlins cost less to buy, less to erect, less to maintain. Each has a high strength to weight ratio, plus offering the superior fire resistance qualities of glued laminated wood. Members are shipped to job site on time for fast erection by regular work crews—building goes up quicker, is ready for use sooner.



Rilco field sales engineers will be happy to consult with you, without obligation.

Write for free construction catalog



Daetwyler Warehouse, Los Angeles, Calif., constructed with 129 Rilco laminated wood beams. Contractor: Wm. P. Neil Co., Ltd., Los Angeles.

Weyerhaeuser Company
Rilco Laminated Products Division
618 Professional Bldg.
Tacoma 5, Wash. • BRoadway 2-2249

new offices, partnerships

Prescott W. Coleman has established his own architectural practice at 15633 S.E. Orville Ave., Milwaukie, Ore.

Alfred H. Piel, Seymour M. Slater, John I. Small and A. Aubrey Spenst have opened architectural offices at 5650 E. Evans Ave., Denver, under the name of Piel, Slater, Small & Spenst.

Oliver J. Bryan Jr. and William C. Haldeman have formed the architectural partnership of Bryan & Haldeman, with offices at 525 E. Ohio Ave., Denver. Both have been associates in the firm of Alfred Watts Grant & Associates for the past several years. Bryan was graduated from the University of Kansas in 1948 and Haldeman from the University of Pennsylvania in 1949.

Curtis Engineers is a new firm established at 10 W. First South, Salt Lake City, to engage in structural and civil engineering. The principal, David H. Curtis, formerly was president of Thomas & Curtis, Inc., design engineers.

Tor Westgaard has joined the architectural firm of Joseph T. Wilson, practicing under the name of Wilson & Westgaard in Denver and in Alamosa, Colo.

William H. Hawes, former district engineer for the American Institute of Steel Construction, has joined Rhuel A. Andersen and Lavern C. Koerwitz, Denver consulting engineers, as a partner. The firm continues to practice at 655 Broadway under the name of Andersen, Koerwitz & Hawes.

new partners, associates

Victor Gruen Associates, Los Angeles architects-engineers, have named three new associates: Aaron Coh, architect; Andrew Hughes, specifications department head; and William T. Dreiss, landscape architect.

Seattle architects Naramore, Bain, Brady & Johanson have named three new partners, all with the firm for 10 years or more: A. Ernest Hennessy, Eric C. Rising and William M. Svensson. In other appointments, Harry G. Widener has been named as business manager. New senior associates include William J. Bain Jr., James W. Evans, Robert A. Floren, Robert A. Hanson, Dean E. Hardy, Melvin J. Larson, William R. Pickens, Robert J. Pope and W. Redmond Stout. New associates are Robert D. Bell, Bert J. Bruce, John D. Finnegan, Franklin J. Gribble, Gunnar R. Lie, Robert E. Messer and Vincent L. Oredson.

new addresses

Robert E. Alexander & Associates, architects-planning consultants, to the Mobil Building, 612 S. Flower St., Los Angeles.

Raymond Nordquist, architect, to 211 S. Broadway, Red Lodge, Mont.

Richard Leitch, architect, to 1730 West Coast Highway, Newport Beach, Calif.

Frederick Wallis Whittlesey, architect, to 211 Sutter St., San Francisco.

Jay Robinson Jr., architect, to 1006 Dexter Horton Bldg., Seattle.

R. Neil Manos, architect, to 2540 Huntington Drive, San Marino, Calif.

More AIA chapter elections

AIA chapters in the West continue to elect new slates of officers. Among the results:

Southern California: C. Day Woodford, president, Edward Fickett, vice president; Clinton Ternstrom, secretary; MacDonald Becket, treasurer.

District officers of the Southern California Chapter:

Inland: E. Stewart Williams, president; Jack Burg, vice president; Donald Wexler, secretary.

Long Beach: Louis Shoall Miller, president; Hugh Gibbs, vice president; William Lockett, secretary; John Duffy, treasurer.

San Fernando Valley: Joe Jordan, president; Howard Mielke, vice president; John J. Stockemers, secretary; Kenneth Epperson, treasurer.

Pasadena: Roland Logan Russell, president; Robert E. Tryon, vice president; Mrs. Jean Driskel, secretary; Richard W. Rose, treasurer.

Central Arizona: Kemper Goodwin, president; Lester Laraway, vice president; Charles Hickman, secretary; John Schotanus, treasurer.

Southern Arizona: David S. Swanson, president; Bernard J. Friedman, first vice president; Robert J. Ambrose, second vice president; Carl LeMar John, secretary; Arthur Darton, treasurer.

Colorado: F. Lamar Kelsey has been installed as president to succeed Robert Berne, who has joined the Octagon staff as head of its architectural information services.

firm changes

The Seattle architectural partnership of Terry & Moore has been terminated. Roland Terry continues to practice at 803 E. Prospect St.; Philip Moore has opened an office in 570 Skinner Bldg.

Harry Loners and Francis C. Stroebe have resumed their architectural partnership in Billings, Mont., under the name of Loners & Stroebe. Successor to Loners, Stroebe & Johnson, the firm continues to maintain its offices at 201 N. 24th St.

The Portland architectural firm of Potter & Robinson has been dissolved. Thomas I. Potter remains at 1920 S.W. 57th Ave. DeWitt C. Robinson has opened a new office at 1333 S.W. 13th Ave.

deaths

Robert Oliver Thompson, 65, who was associated with his wife Catherine in the Honolulu firm of Thompson & Thompson, landscape architects, died December 30. A fellow of the American Society of Landscape Architects, he was a native of Ypsilanti, Mich., and had lived in the Islands for 32 years. Among his projects: Thomas Square, Board of Water Supply installations, Tripler Army Hospital and the National Memorial Cemetery of the Pacific.

Don Carlos Young Jr., 78, Salt Lake City architect who was associated with a number of projects for the Church of Jesus Christ Latter-day Saints, died December 6 of natural causes. He worked with his father in the firm of Young & Son for several years and, as a principal in the partnership of Young & Hansen, helped design the Old Federal Reserve Bank Building.

elections, appointments

Structural Engineers Association of Northern California have elected these officers: John M. Sardis, president; James L. Stratta, vice president; Thomas D. Wosser, secretary; Jason Bloom, assistant secretary; and William K. Cloud, treasurer.

Hawaii's State Capitol Architect Advisory Committee has named three architects to act as critics on plans for the proposed capitol building being designed by John Carl Warnecke & Associates of San Francisco in association with Belt, Lemmon & Lo of Honolulu. They are Pietro Belluschi, dean of the School of Architecture and Planning, Massachusetts Institute of Technology; Leonard L. Hunter, assistant commissioner for design and

construction with the GSA in Washington, D.C.; and George J. Wimberly, partner of Wimberly & Cook, named by the Hawaii Chapter, AIA, as its representative.

New executive secretary of the Coast Valleys Chapter, AIA, is Mrs. Marion Winberry, who for some years was with the office of the State Board of Examiners in San Francisco. She maintains a part-time office at 1760 The Alameda, San Jose.

Robert P. Darlington, on leave from his post as assistant professor, department of architectural engineering, Washington State University, has been named chief editor for manuscript preparation of a guide on modular dimensioning by the Modular Building Standards Association in Washington, D.C.

Wilsey, Ham & Blair, planning and engineering firm which headquarters in Millbrae, Calif., has made these two staff appointments: Charles E. Woodward as planning consultant and William H. Gropp as chief mechanical-electrical engineer.

Portland architect Robert B. Martin has been elected president of the Oregon Technical Council, coordinating agency for 11 professional engineering and architectural societies.

Neptune and Thomas & Associates, Pasadena architects-engineers, have named John T. Cashion Jr. as a vice president in charge of coordination and expediting between office and field.

Architect Hobart Wagener has been elected second vice president of the Boulder (Colo.) Chamber of Commerce.

William Paynter, Bakersfield, Calif., architect, has been appointed to the Kern County Planning Commission.

The Springfield, Ore., firm of Lutes & Amundson, architects-community planners, has named James R. Bell as director of planning. He most recently was with Leo A. Daly & Associates in San Francisco.

Architect Graham Latta has been appointed to the Glendale (Calif.) Building Commission.

honors

Structural Engineers Association of Southern California has presented honorary memberships to David Lee Narver, chairman of the board, Holmes & Narver, Inc., and Dr. George Housner, professor of engineering, California Institute of Technology. Narver was cited for his many activities in the design of major structures in Los Angeles and other parts of the world and for his work in advancing structural engineering standards. Dr. Housner, whose publications include earthquake-resistant design studies, was honored as an engineer and a scientist.

Two West Coast architectural photographers have been named winners in the annual AIA-sponsored competition. Julius Shulman of Los Angeles won first prize in the color section for a house designed by Pierre Koenig and George Knight of San Francisco won second prize in the black and white section for the John Hancock Building by Skidmore, Owings & Merrill. Altogether, the jury picked 32 photographs which will be circulated nationally by the traveling exhibition service of the Smithsonian Institution.

Walter Dorwin Teague, who died in December at 76 following a heart attack, will be memorialized at Seattle's Century 21 Exposition for his work in designing the U.S.-sponsored science exhibit. Senior partner in the nation's oldest industrial design firm, he planned the interior of the five-building Federal Science Pavilion, which will hold the most extensive science exhibit ever assembled.



Bumgardner wins Seattle's Home of Month competition

A house designed by A. O. Bumgardner for a family of four in Seattle's Seahurst area and oriented to the trees and Puget Sound is the 1960 winner of the AIA-Seattle Times House of the Month competition.

The architect was presented a sculpture executed in brass by Glen Alps, associate professor at the University of Washington, at a banquet in the Olympic Hotel January 5. The owners, Mr. and Mrs. Chester S. Bartholomew, received $500 from the Seattle Times. Builders Perrault & Hansen also were cited for their contribution to the project.

The jurors — architects Wendell Lovett of Seattle and Lewis Crutcher of Portland and landscape architect Francis Dean of Seattle—referred to the house as "possessing great warmth and charm. We especially liked the large well-proportioned living-dining-kitchen space disposed about the central fireplace element. In addition, a logical sense of the site in its relation to the house, with articulated views through the trees, and the relation of the deck under the trees to the spaces within, made the entire development add up to more than the sum of its parts."

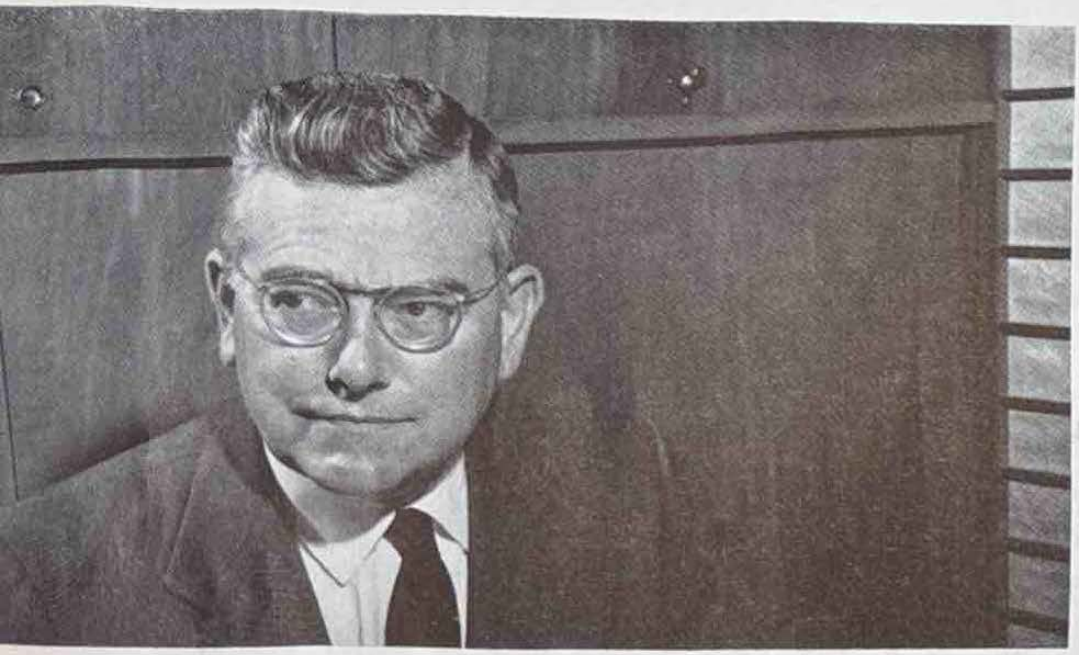
The 10 other homes (only one was chosen for March and April) entered in the 1960 competition were designed by Jack N. Bryant, Thomas Albert Smith, Lawrence & Hazen, Seth McCallen Fulcher, Albert W. Nelson, Charles A. Metcalf, Gene Zema, Durham, Anderson & Freed, Benjamin F. McAdoo and Mithun, Ridenour & Cochran.

TROPHY WINNER A. O. Bumgardner receives sculpture designed by Glen Alps (center) as AIA President John M. Morse looks on. Sited on steep lot overlooking Puget Sound, house has 1,255 sq. ft. on upper level and 1,050 sq. ft. on lower level. It features native woods.



3. PA&B profile: Paul Thiry

Seattle, Washington



The name of Paul Thiry is synonymous with Northwest architecture, although his influence on the field of design is far more than a regional matter. Born in Nome, Alaska, he is a graduate of the University of Washington, where he won the AIA Medal, and the Ecole des Beaux Arts in Fontainebleau, France.

In practice since 1929, Thiry maintains a hard-driving office in his own building overlooking downtown Seattle, supplemented by engineering, landscaping and interior consultants selected to complement the commission at hand. These commissions have varied from residential to Army, Navy and governmental projects; from churches, museums, schools and libraries to a dam powerhouse. He currently is primary architect for the Century 21 Exposition and the Seattle Civic Center; architect for the Century 21 Coliseum and the U. S. Embassy Residence in Santiago, Chile; and master planner for the University of Washington and Western Washington College of Education.

Over the years Thiry has matched his contributions to design with those to his profession and his community. Vice chancellor of the College of Fellows, to which he was elected in 1951, he also is chairman of the Institute's committee on the National Capital. He has been a member of the Seattle Planning Commission since 1952, just one of his numerous activities in that field.

An articulate speaker, Thiry is equally adroit with the brush or the pen. His thoughts on design are summarized in the statement that begins on the next page; and just for good measure, the cover shot is a reproduction of one of his slides.



BEACH HOUSE 1930
Mr. & Mrs. John Dunn
Bainbridge Island, Wash.

"At Christmas I no more desire a rose
Than wish a snow in May's new fangled mirth;
But like of each thing that in season grows."
—SHAKESPEARE

Paul Thiry

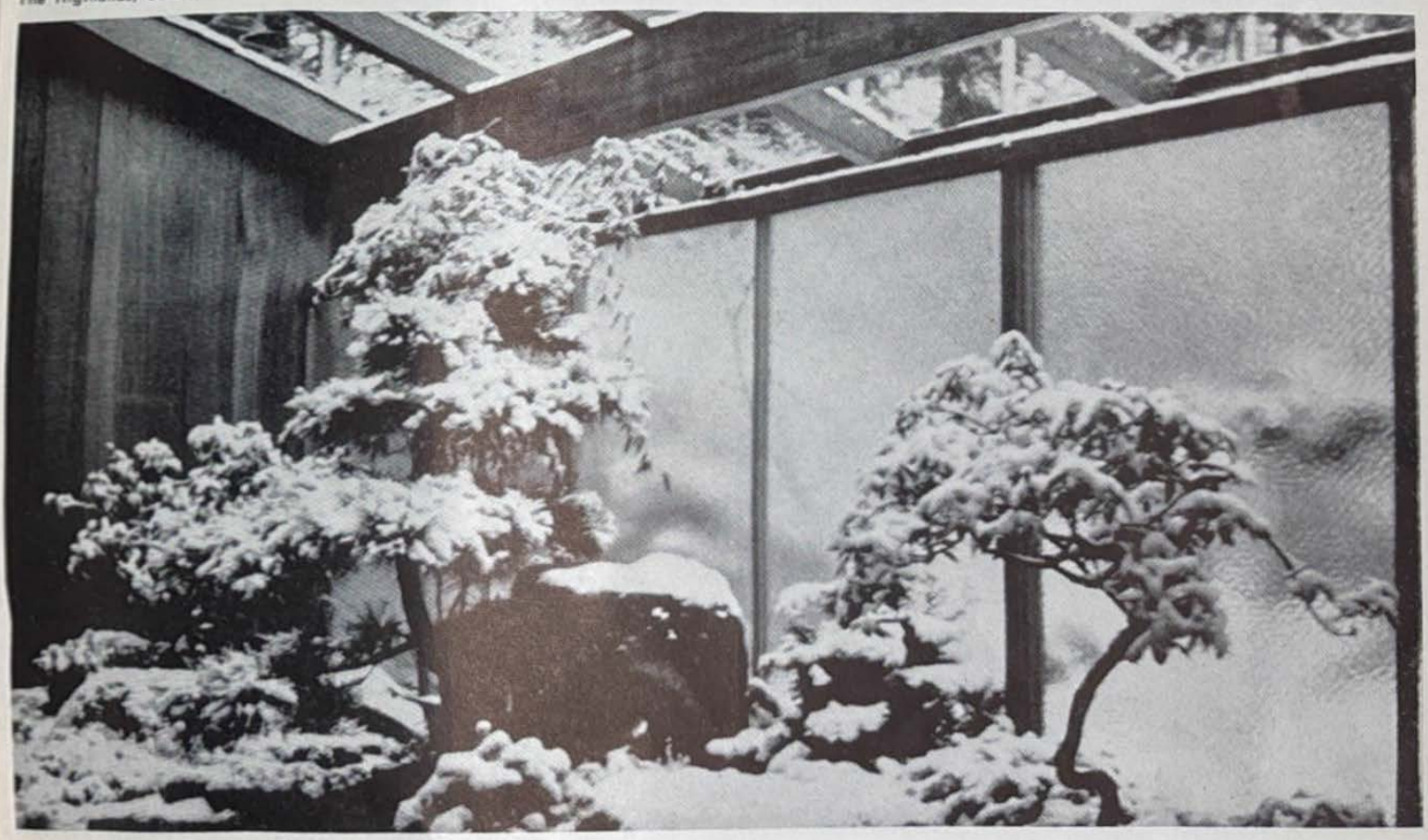
ON DESIGN

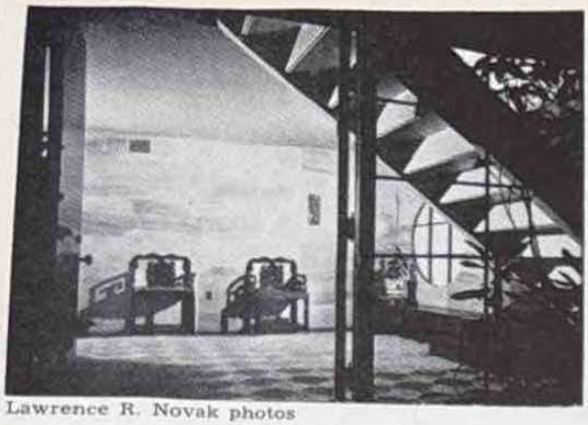
TO MAKE A STATEMENT to the effect a building is an enclosure of space for use seems academic, yet this is one of the hardest and least understood facts.

In architecture opinions vary, but fundamentally we must accept a simple question: what is a building and, coincidentally, what is it for, how will we build it and what will it look like.

The design solution, like a mathematical equation, is the result of using the known to probe for the unknown by way of reasoning and conclusions.

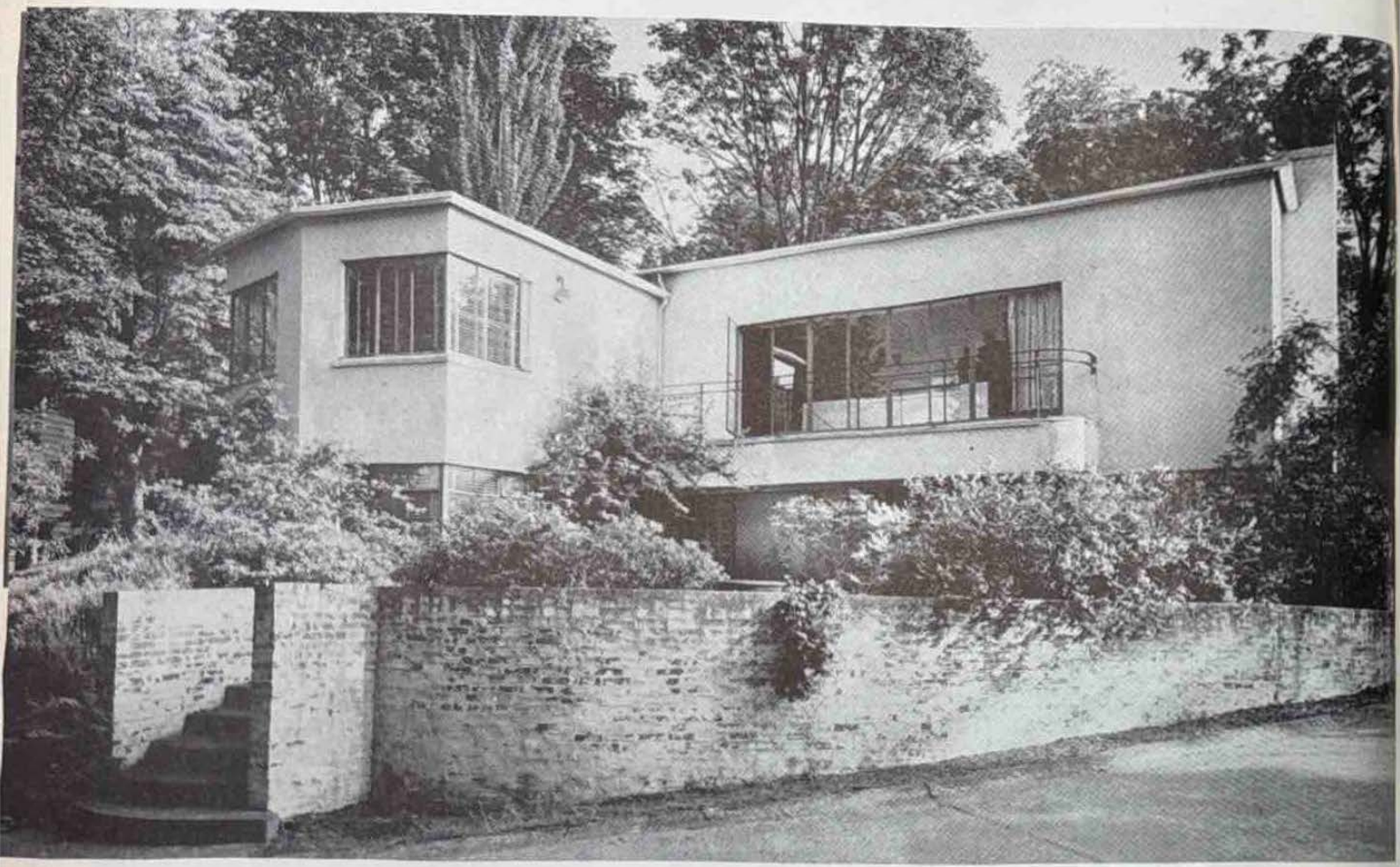
RESIDENCE 1954
Mr. & Mrs. Francis Brownell Jr.
The Highlands, Seattle

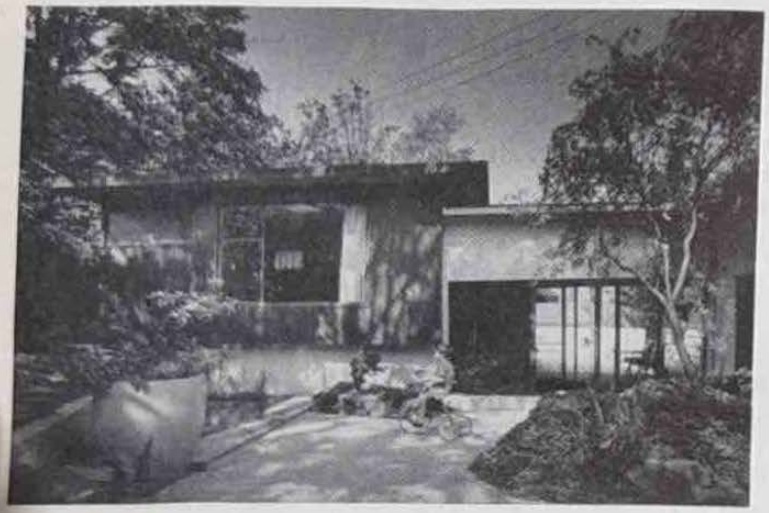




Lawrence R. Novak photos

TOWN RESIDENCE 19
Mr. & Mrs. Paul Thiry





ADDITION **1947**



P. A. Dearborn photos

What the building is to be used for is necessarily the basis for the plan which will indicate directions for structure, volume and appearance.

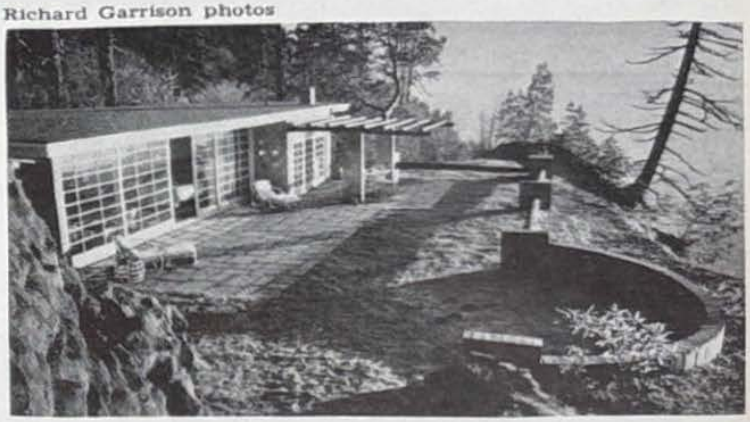
Within a given volume of enclosure, planning may be developed to conform to a structural system; however, in general the requirements of large and small areas do not lend themselves to a module either in horizontal or vertical dimension. Because of this, a preconceived or fixed system for construction does not universally apply to the solution of problems.

It is safe to say that every problem is different. While it is possible to place each in a category, each has its unique solution. Problems vary according to site, orientation and outlook.

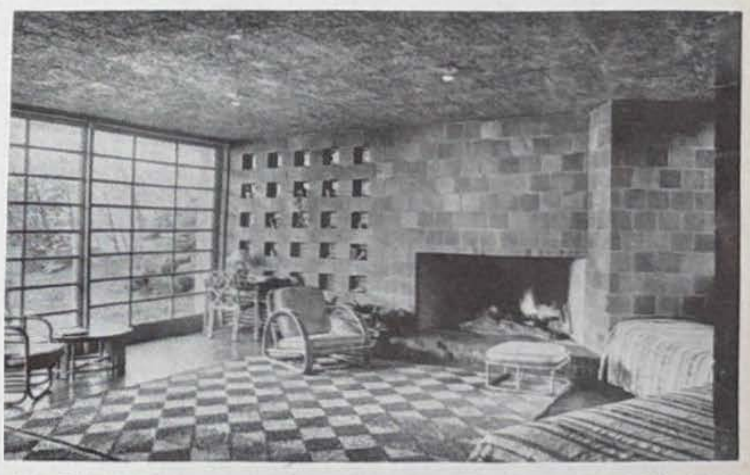
SUMMER HOUSES 1939
Mr. & Mrs. Albert S. Kerry
Miss Olive Kerry
Des Moines, Wash.

Richard Garrison photos









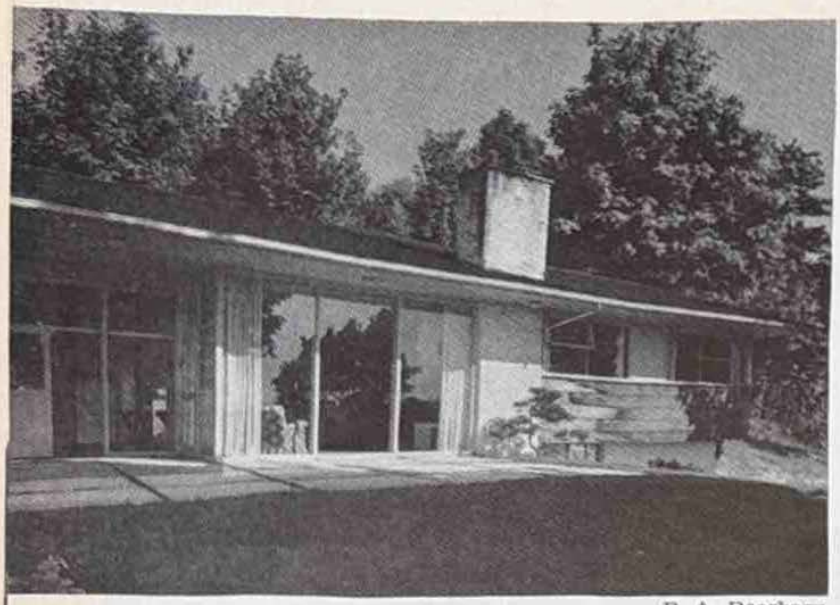
FREE-STANDING STORAGE WALL (left)

CLAY UNIT BLOCK WALL CONSTRUCTION (right)

In conceiving a structure we should ask ourselves: what are our surroundings—are they buildings, open land, or wooded hillside; are we on a country road, a city street or a highway? What are our environmental characteristics—are we building a unit or a community? What is our pattern of movement—are we constructing a building for masses of people or a place apart, or a combination of both?

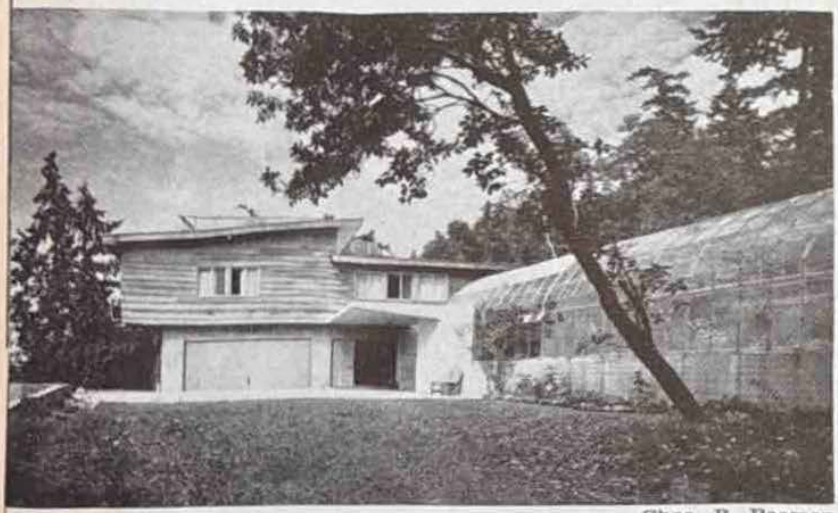
A building's form and relationship to its neighbor's not only affects the visual aspects of the whole, but the ensemble reflects on the quality of the individual unit. Too often a nonconformance not only detracts from itself but disfigures the total scene.

Buildings by their nature must express their pur-



P. A. Dearborn

RESIDENCE 1940
Mr. & Mrs. Howard O. Wallace
Blue Ridge, Seattle

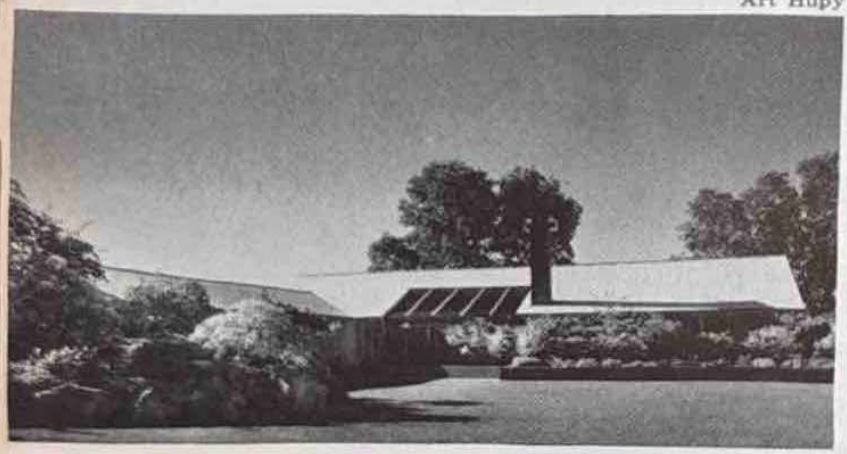


Chas. R. Pearson

RESIDENCE 1947
Mr. & Mrs. J. F. Laucks
Orcas Island, Wash.

RESIDENCE 1954
Mr. & Mrs. Francis Brownell Jr.
The Highlands, Seattle

Art Hupy



pose. Some are monumental, some are destined for excitement and movement, others are set aside for quiet and escape. Some are important, some unimportant, but their relative stature should not detract from the quality of their architectural concept.

Every structure could have a quality of greatness without itself being the great in the general agglomeration. Not all buildings are or should be destined for full attention. There is a quality too often neglected in the ability to compliment rather than to command—to sit by the road without being in it.

This ability to know the difference is found in many places and was in the mind of men like L'Enfant. It is necessary to understand the difference between the important and the unimportant, of grand statement and understatement, of the role of position.

It is impossible to make a single building all things to all people. The urban, the suburban, the rural, the wilderness by their nature are different. What is found in one has no logical place in the other.

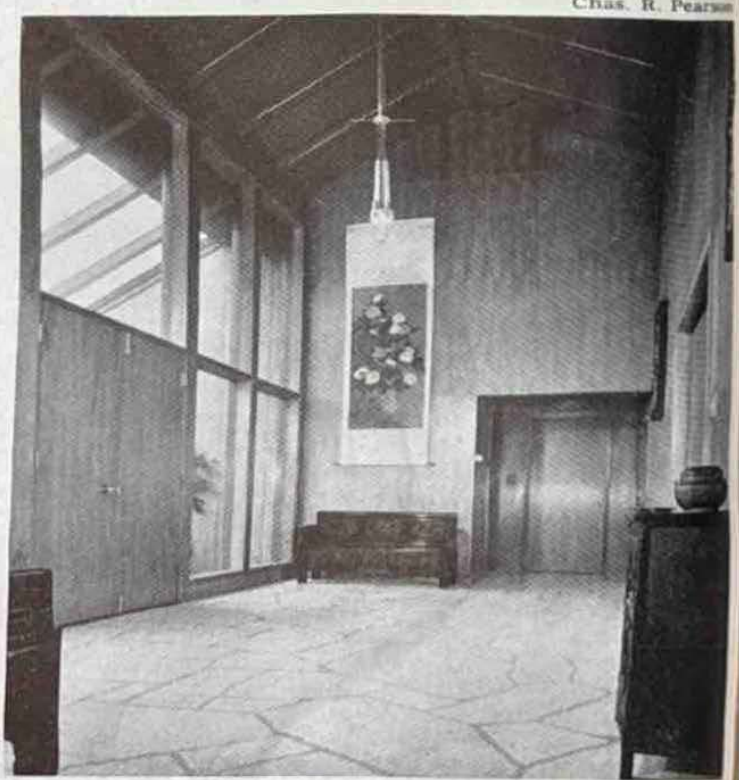
The scope of the work and its relationship to its external conditions form the basis for design. The vertical projections of the plan form the enclosing walls. The enclosing walls and the use of inner spaces dictate the roof.

Of the three—the plan, the walls and the roof—it is difficult to know which is the most important. Without the plan, figuratively there is no wall and without support there is no roof. Each is an ingredient and must perform its function in harmony with the others.

Ideally the roof should come first because what is

RESIDENCE 1947
Mr. & Mrs. David Thomas Stimson
Edmonds, Wash.

Chas. R. Pearson



RURAL ARCHITECTURE
Kittitas Valley, Wash.



Chas. R. Pearson

RANCH HOUSE 1947
Mr. & Mrs. Alan Rogers

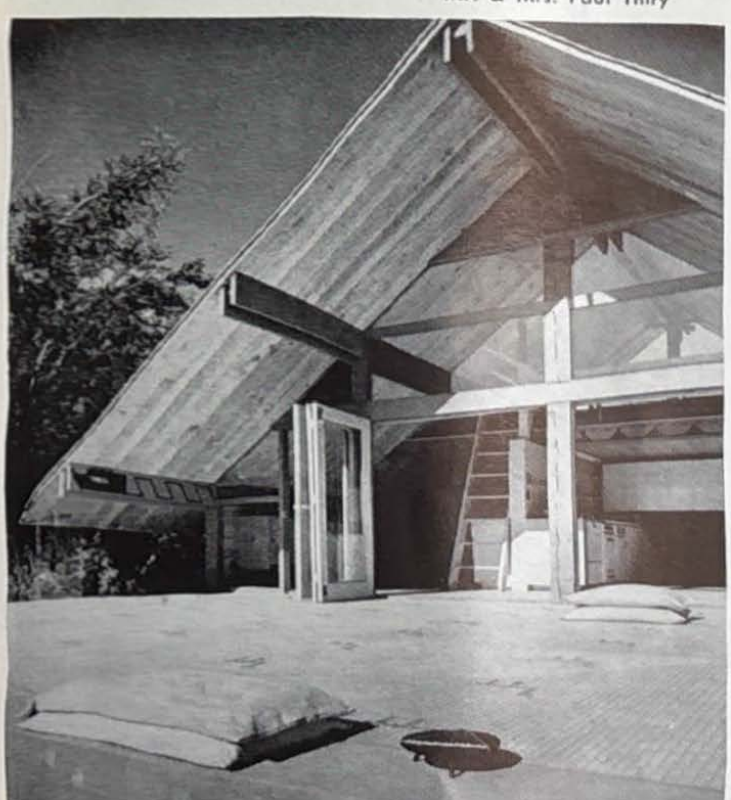
RANCH HOUSE 1953
Mr. & Mrs. Eric Moe

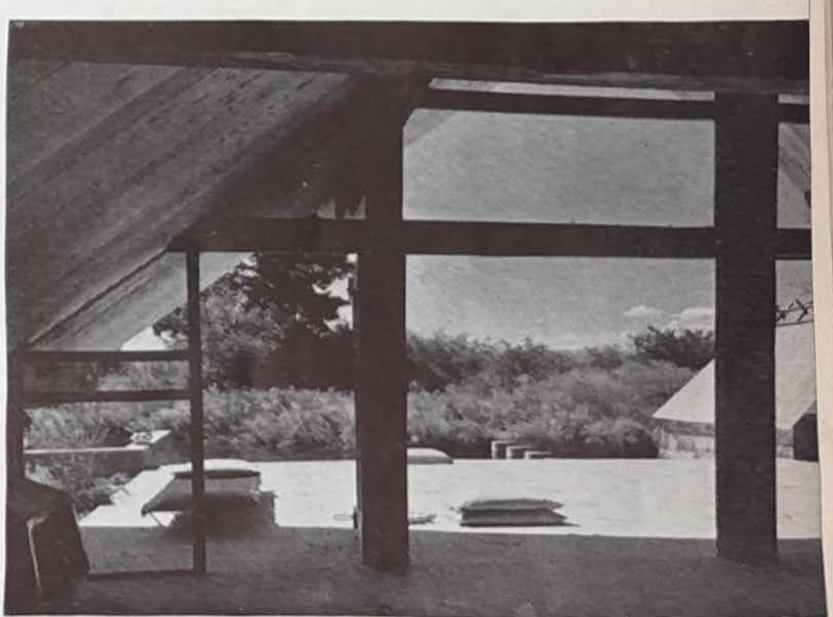


Art Hupy photos

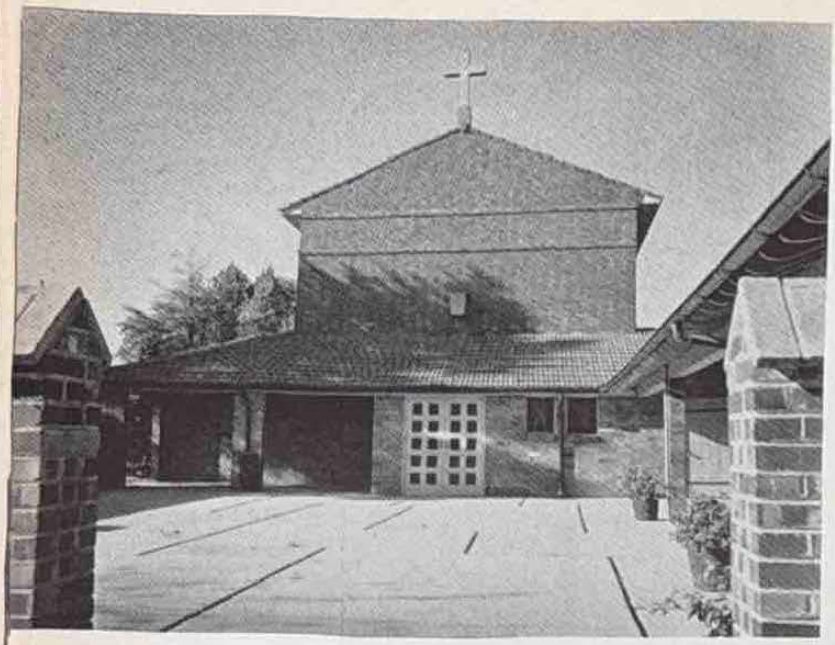
"Let us a little permit Nature to take her own way;
She better understands her own affairs than we." —MONTAIGNE

WEEKEND CABIN 1956
Mr. & Mrs. Paul Thiry





UNIVERSITY OF OREGON LIBRARY



PARISH CHURCH 1940
Our Lady of the Lake, Seattle

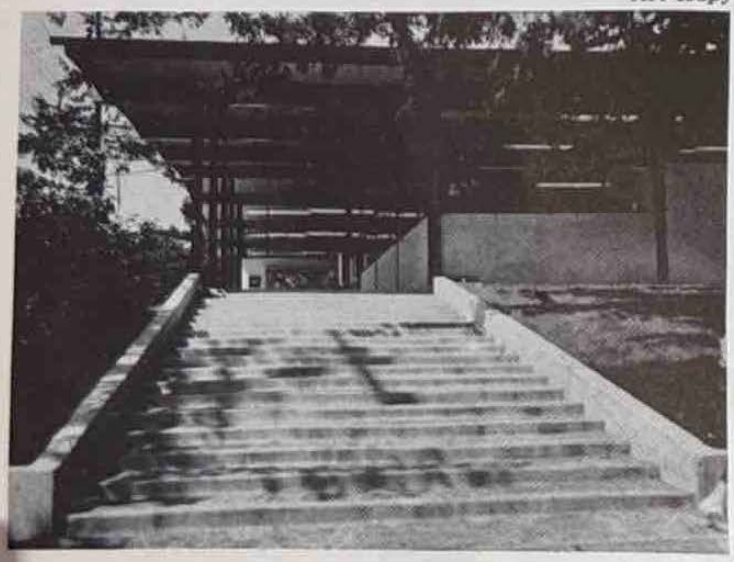


Art Hupy

CHURCH AND FRIARY 1953
St. George's, Seattle

LIBRARY 1953
Northeast Branch, Seattle

Art Hupy



below cannot be out of the weather without it. A roo which allows a maximum of freedom for arrangeme is the best. Possibly a roof independent of the wal and the partitioning of inner spaces is the solution look for. Enclosures and confinement of space witho structural incumberances give maximum flexibili within which to work.

The covering of space and even of urban are allows for ingenious use of nonweather-resistant ma terials for divisioning. In light structures which hav no ready reference to shapes and which can be em ployed against nature, sun, rain, wind and regiona characteristics lie our future reference for building The potentialities of canopies are increasingly evide with the introduction of air-entrained coverings o cable structures which can span great distances an carry plasticized, aluminum and lightweight thermall practical materials.

The roof being the barrier between the ground an the sky has its function of protection. Obviously i must protect to fulfill its mission. Protection does no start at the exterior wall line but should go beyond t keep off rain and excess sunlight, to keep a buildin clean, to direct water away and to insulate agains snow and ice.

The size of the roof and how it's held up depend on what is below and what is below is dictated by use Protection against the adverse and inclusion of bene fits are directives.

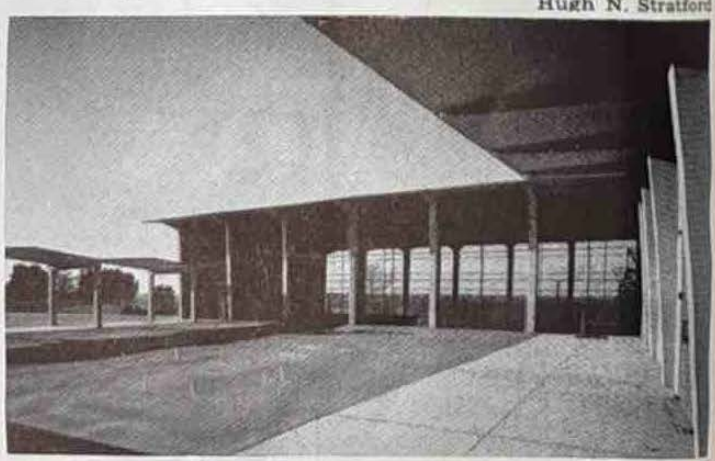
Internal conditions should be within our control How we adapt to external conditions more often will be the criteria of success. With internal environment can be created an atmosphere directed either by com plete enclosure or by the introduction of exterior fea tures within surrounding spaces or walls.

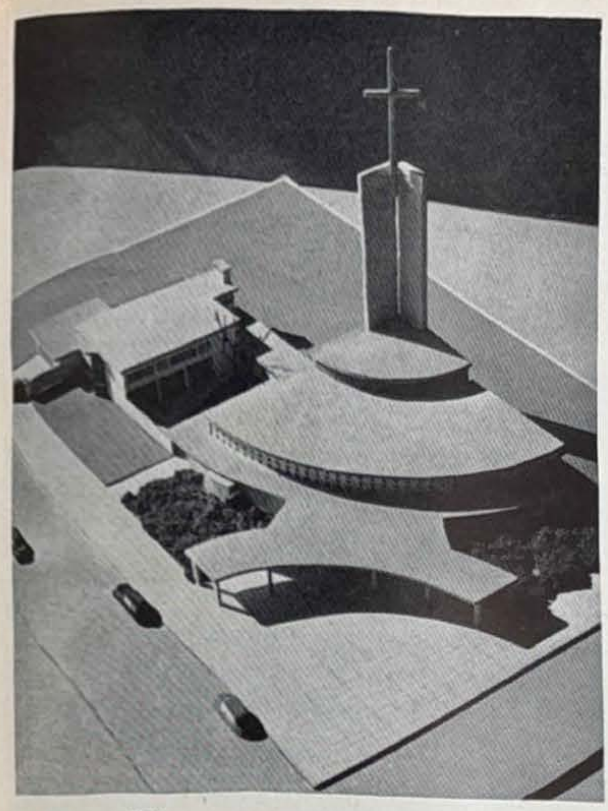
A controlled environment divorces itself from nature to a great extent and produces a nature of its own. Urban society depends to a large extent on this inner world, looking out only now and then to the community spaces beyond.

However, by and large the assimilation of a build ing into its surroundings is a more thoughtful and critical approach because in this way it does not detach

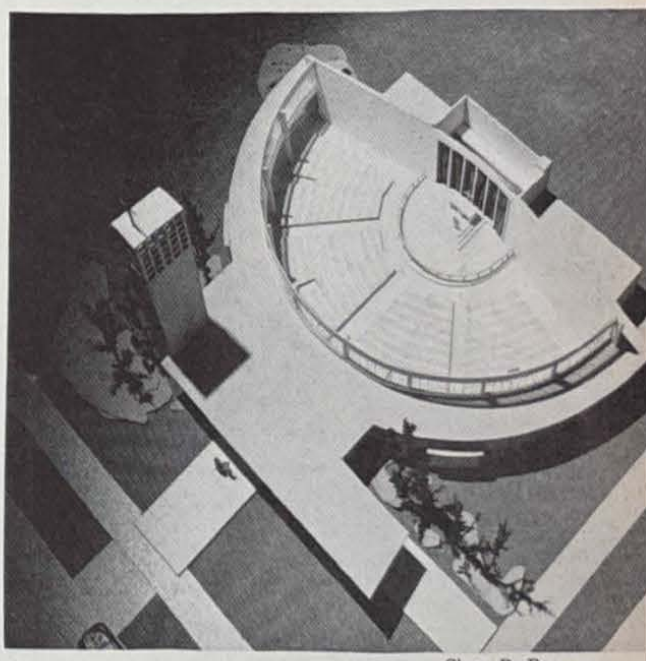
ELEMENTARY SCHOOL 1958
Cedar Park, Seattle

Hugh N. Stratford





CHURCH 1949
St. Anthony's, Missoula, Mont.



Chas. R. Pearson

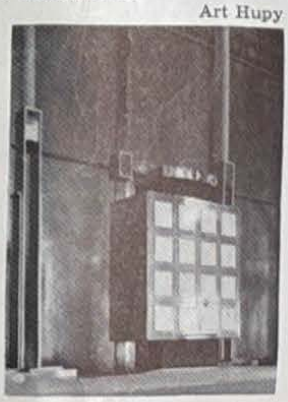
CHURCH 1948
Christ the King, Seattle

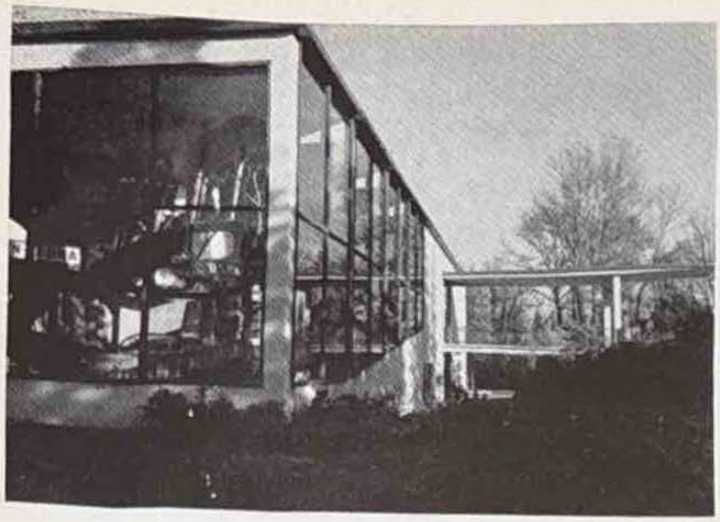
ARCHITECT-DESIGNED TABERNACLES

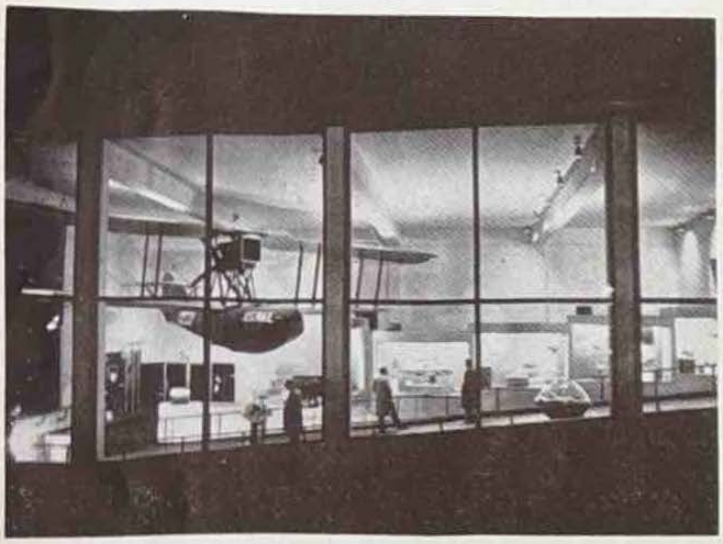
Novak



Art Hupy







MUSEUM 1950
History and Industry, Seattle

WOMEN'S RESIDENCE BUILDINGS 1950
Washington State University
Pullman



itself from either the urban or the rural scene but becomes a contributing part of it.

A successful building is the summation of the plan, the subdivisions and the roof. The exploration of unfamiliar forms and new visual understanding inevitably leads to broader interrelations and solutions.

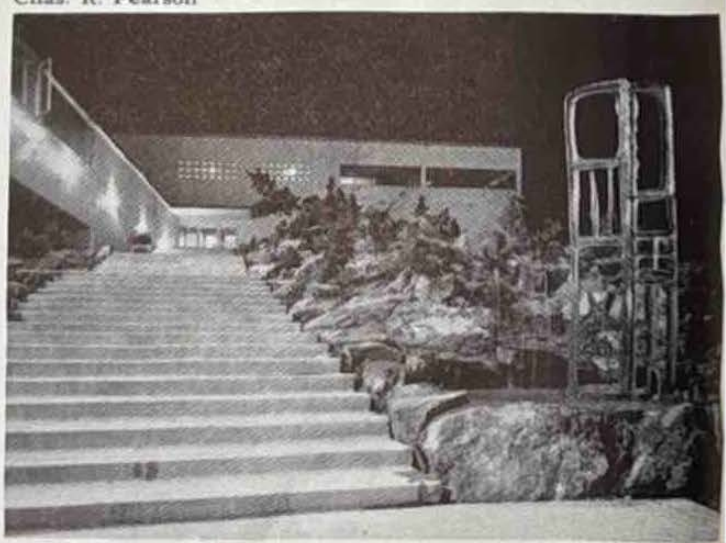
FORM FOLLOWS FUNCTION. This is hard to deny. It is equally hard to deny that if a building is properly planned for its use, if it suits its primary function of privacy and shelter, if it withstands the elements without fault, if its structure is sound and sensible and its material substance well conceived, it will be a good building—and that it will have come a long way in its fulfillment of purpose. If it has these inherent qualities, it will give a sense of pleasure to its user and generally to those who behold it. But in so declaring let us not underestimate the function of that intangible thing called beauty—that essence construed by so many and achieved by so few.

But what is this beauty we all talk about? Is it different things to different people; is it also a world? The stars, the moon, the movement of the tides, the eruption of mountains all are functional parts of our surrounding. These and the trees, the rolling land, the vast plains provide the beauty of our natural environment. Perhaps all things beautiful have some relationship to nature. Lace can be found in plants, painting and color in the autumn leaves and what greater sculpture can we find than in wind-swept rocks. Perhaps all that we aspire to is akin to nature molded and constructed to our own pattern.

Beauty is a functional necessity. I would like to dissipate the idea that it is something apart. Architecturally speaking, beauty can be many things: a dancing shadow of a tree branch on a wall, maybe a stream of sunlight, a curve, a contrast of surfaces, a texture, perhaps a reflection in the water. Sometimes it is achieved by a fresco or a mosaic. Somehow, beauty is not something acquired but it is inbred. It is woven into the fabric of a building; it is not divisible.

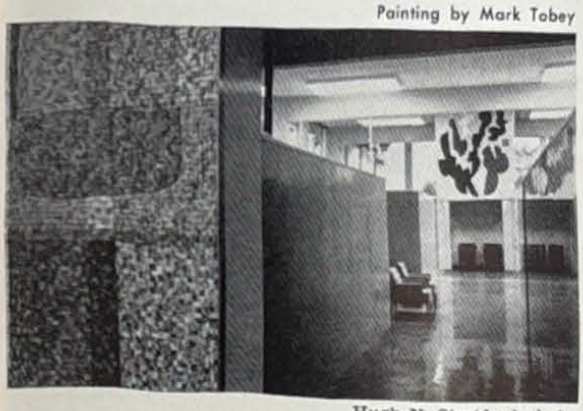
The architect borrows from all sources for his subtleties: in the orientation of structures, in facing

Chas. R. Pearson





Painting by Mark Tobey

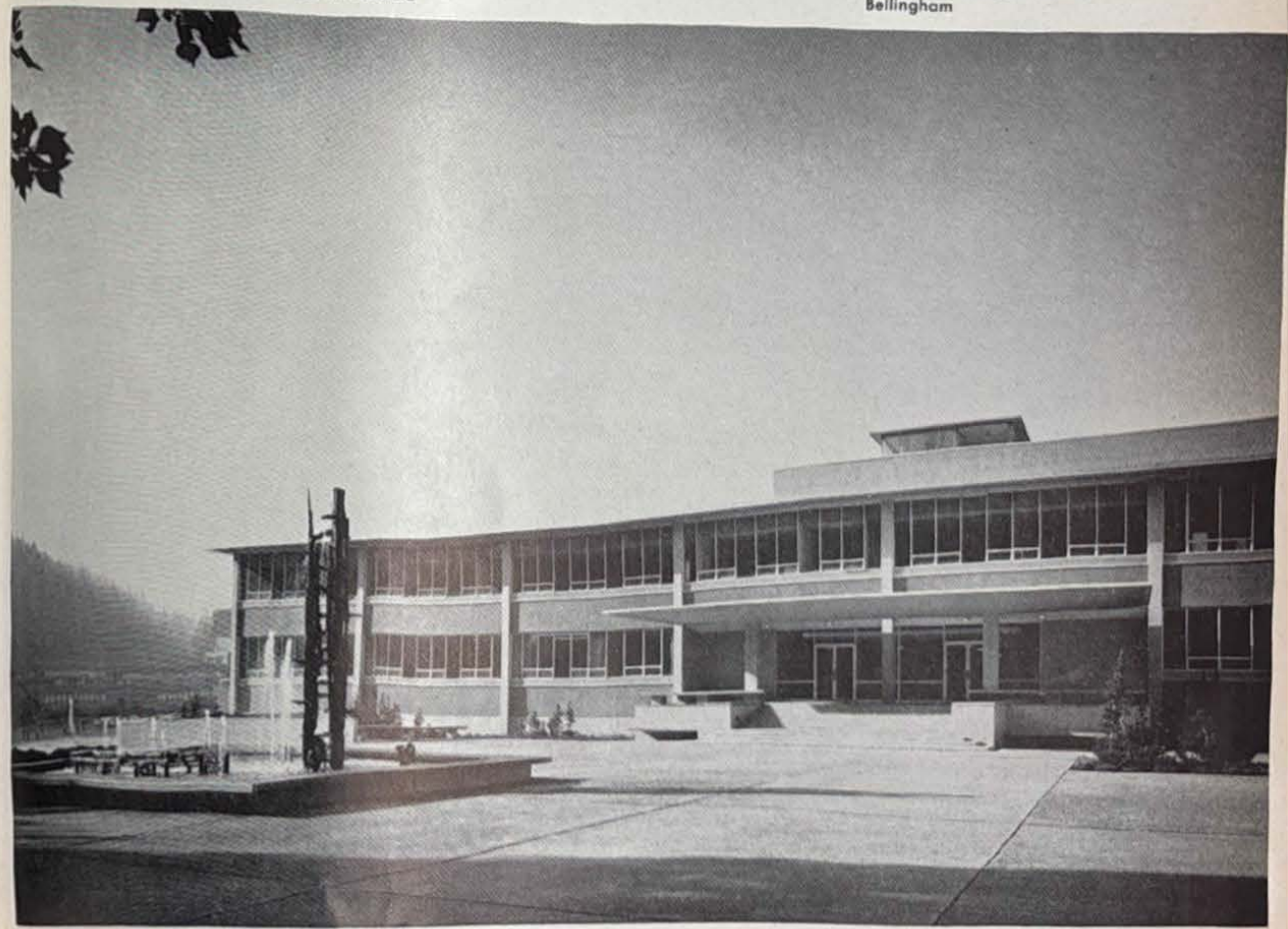


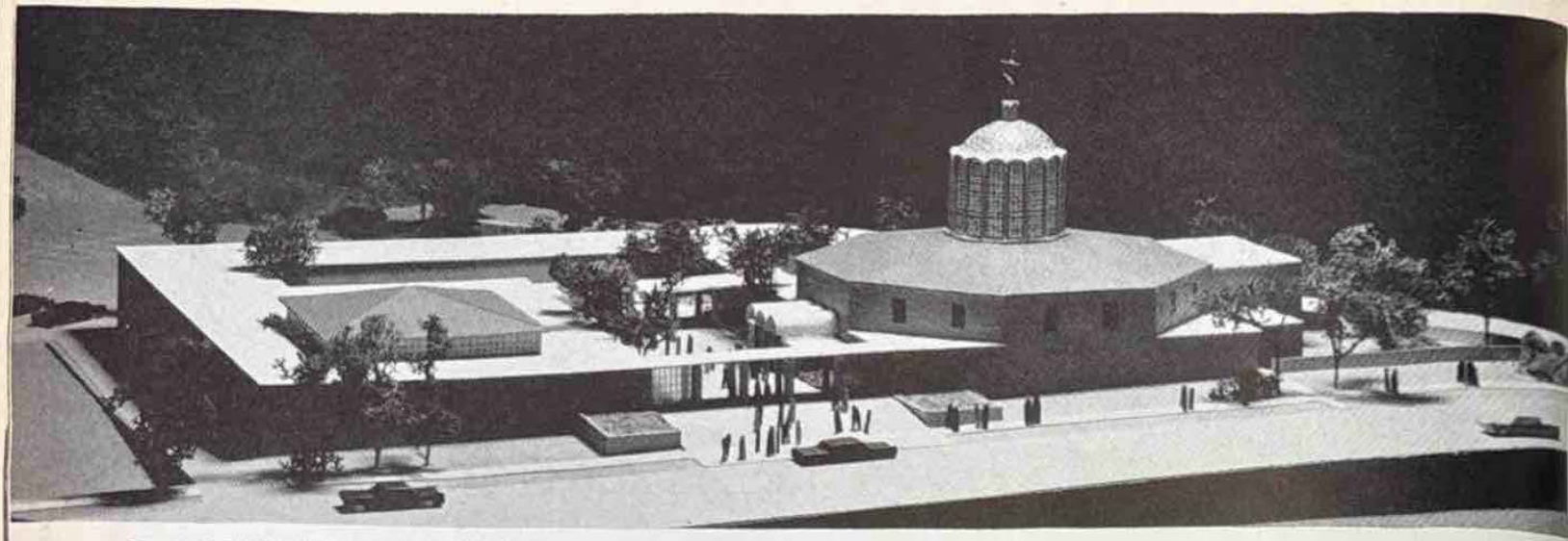
Hugh N. Stratford photos

LIBRARY 1957
Washington State Capitol
Olympia

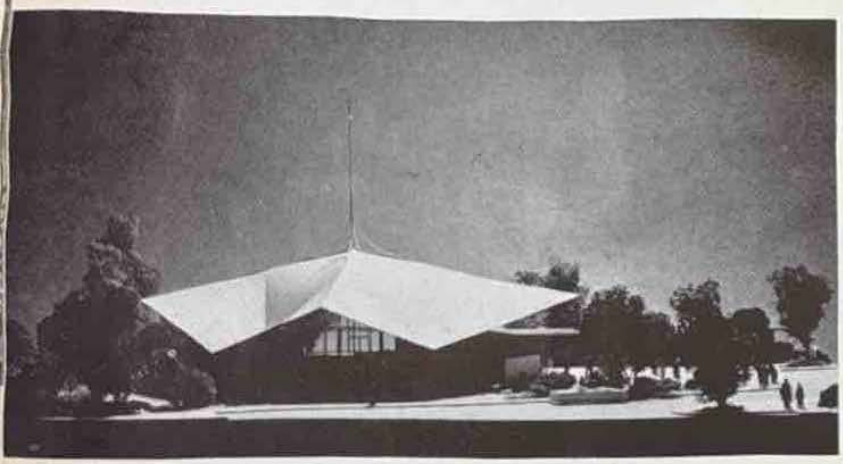
Mosaic and bronze sculptures by James FitzGerald

SCIENCE BUILDING 1958
Western Washington College of Education
Bellingham





GREEK ORTHODOX COMMUNITY CHURCH
St. Demetrios, Seattle
(scheduled for construction)



PRESBYTERIAN CHURCH
Mercer Island, Wash.
(scheduled for construction)

SEATTLE-FIRST NATIONAL BANK
West Seattle Branch
(under construction)

Hugh N. Stratford photos



up to the wind or away from it, in ways of protection in exploiting outlook, in relation with a garden or even with a rock in a garden, in systems of enclosures and of inner spaces, in communion with the city or in isolation. He calls upon nature and looks to the stars and passing clouds for strange light. At high noon the sun may look through into one of his rooms. In countless ways, the conscious architect can decorate and give life to his creations without painful effort.

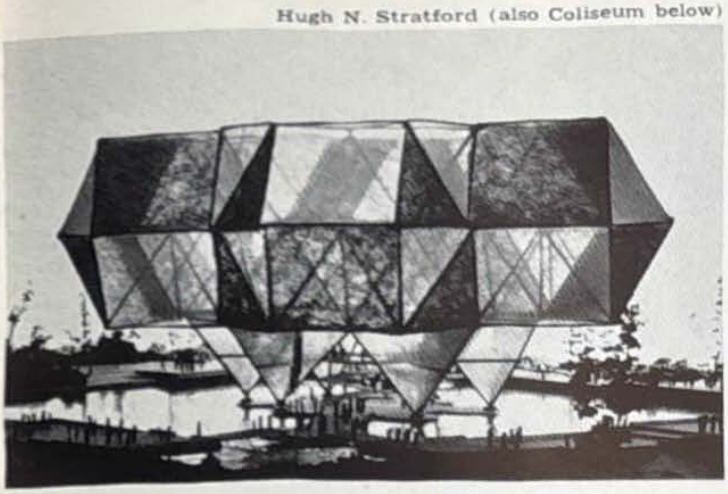
Proportion and form and line are not something we prescribe. They too are the result of design. They too must be inbred factors, not struggled for but easy and concise; not compromising in that they steal from the practical but rather that they complement the practical.

The architect must differentiate between the forms that present themselves for use. He must be a connoisseur with an awareness of their suitability. Structural elements too must have refinement. It is necessary that particular forms be selected for particular usages. Often new forms must be devised to fit the problem of spanning and enclosing space. Fabrication methods are also a matter of selectivity and discrimination. We can be sure it is not all nuts and bolts as some of our good engineer friends would like us to believe.

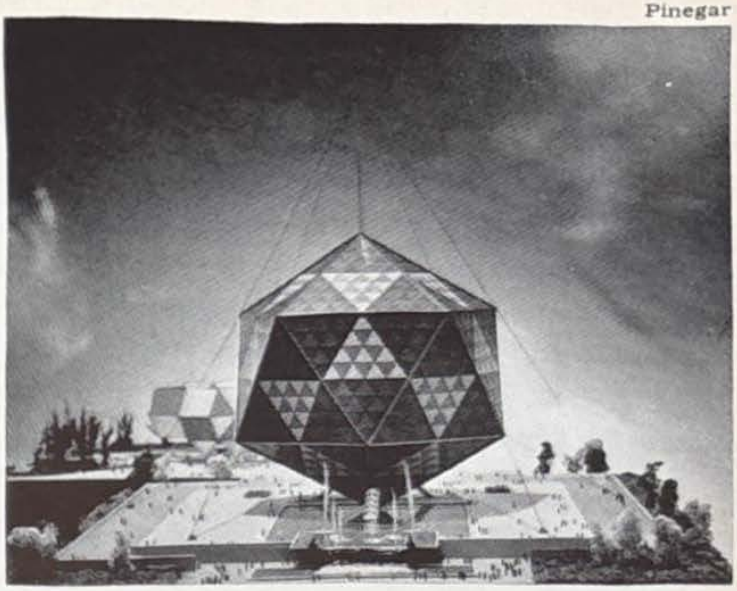
Primarily it is the architect's mission to understand the life of the people he serves and to weave into his structures the framework for living. The complexities of their enterprises should find simple direction through his rational thinking.

The world of architecture is a world of practice and of fancy, a world of function and of ideals. It is a world of building and of planning. It is the privilege of the architect to provide man with environment. It is singularly his duty to look at things objectively. He is partner with the scientist and the inventor. He can, like a doctor, write the prescription; and he can, like the pharmacist, fill it. Mankind is his client. He engineers the movements of man though man may not be conscious that he does.

Hugh N. Stratford (also Coliseum below)



Pinegar

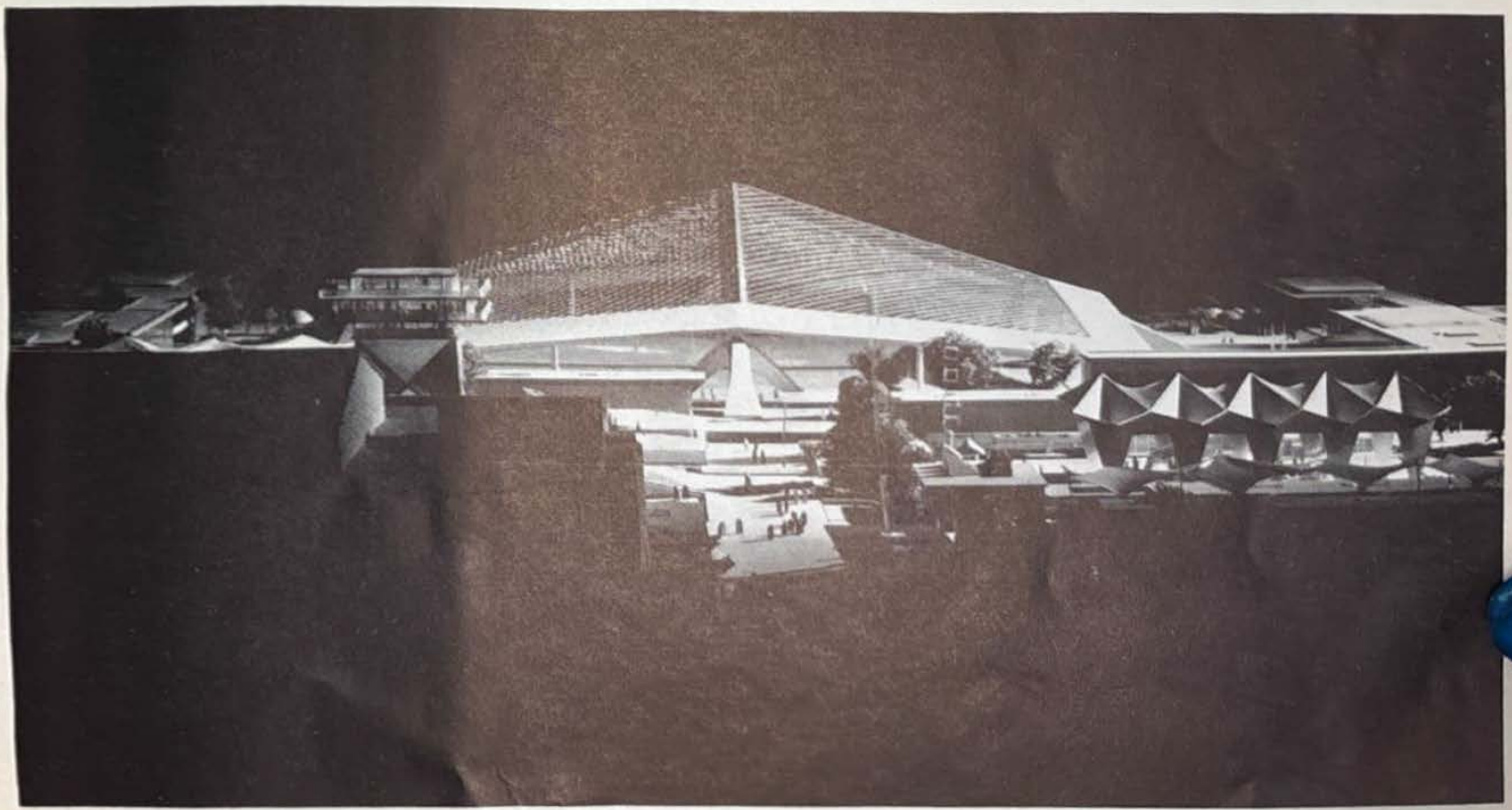


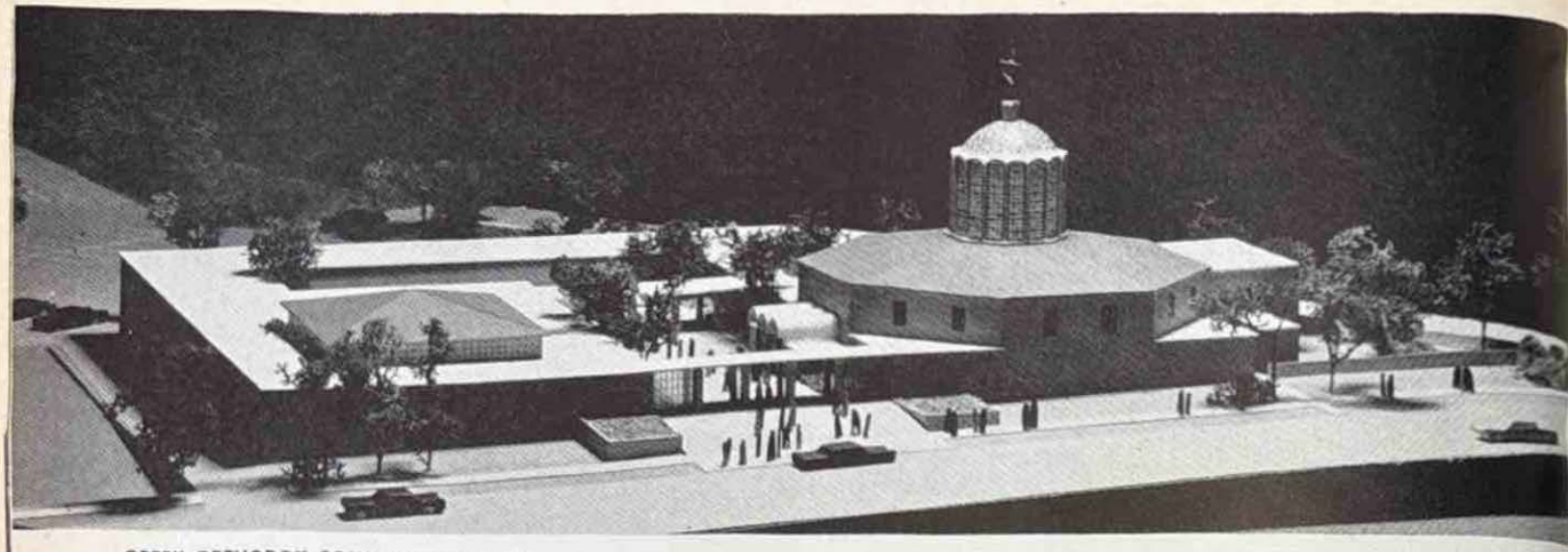
EARLY DESIGNS FOR CENTURY 21 EXPOSITION: aerial structures which leave ground level open for gardens, fountains and free movement of people.

"Only beauty, in the largest sense of the word, the yearning for it, the contemplation of it, has civilized mankind."

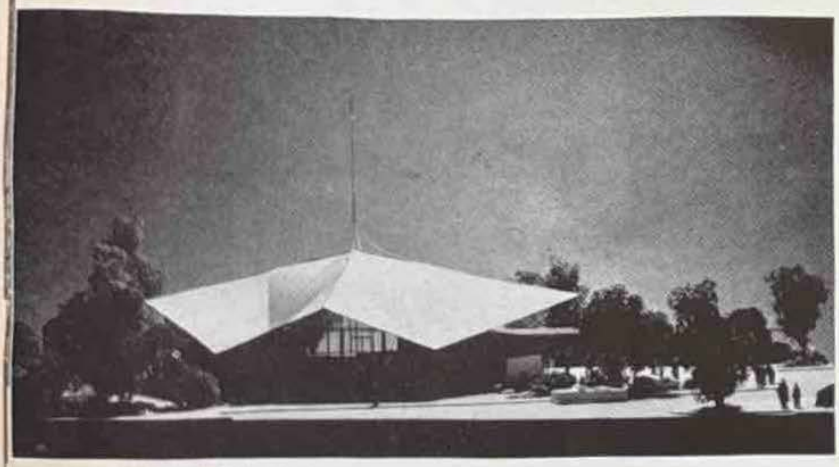
—JOHN GALSWORTHY

CENTURY 21 EXPOSITION **CENTURY 21 COLISEUM** (under construction) **SEATTLE**





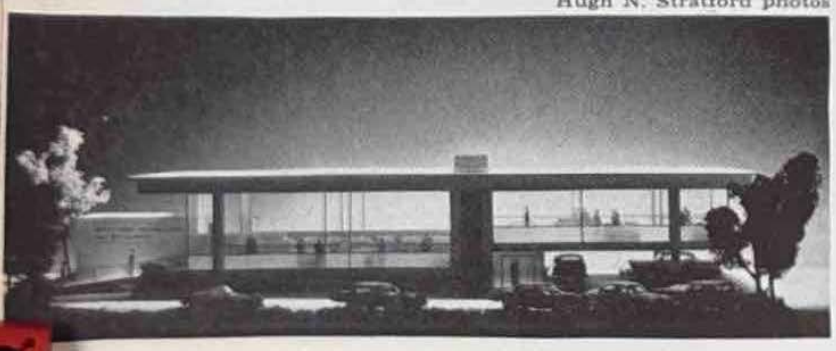
GREEK ORTHODOX COMMUNITY CHURCH
St. Demetrios, Seattle
(scheduled for construction)



PRESBYTERIAN CHURCH
Mercer Island, Wash.
(scheduled for construction)

SEATTLE-FIRST NATIONAL BANK
West Seattle Branch
(under construction)

Hugh N. Stratford photos



up to the wind or away from it, in ways of protection, in exploiting outlook, in relation with a garden or even with a rock in a garden, in systems of enclosures and of inner spaces, in communion with the city or in isolation. He calls upon nature and looks to the stars and passing clouds for strange light. At high noon the sun may look through into one of his rooms. In countless ways, the conscious architect can decorate and give life to his creations without painful effort.

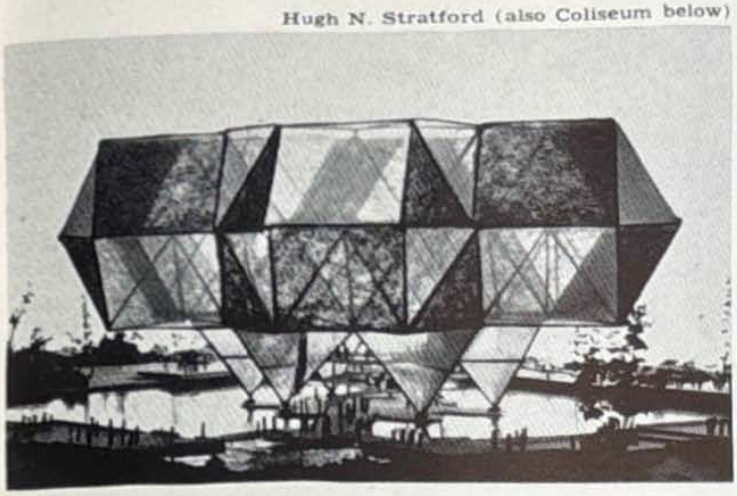
Proportion and form and line are not something we prescribe. They too are the result of design. They too must be inbred factors, not struggled for but easy and concise; not compromising in that they steal from the practical but rather that they complement the practical.

The architect must differentiate between the forms that present themselves for use. He must be a connoisseur with an awareness of their suitability. Structural elements too must have refinement. It is necessary that particular forms be selected for particular usages. Often new forms must be devised to fit the problem of spanning and enclosing space. Fabrication methods are also a matter of selectivity and discrimination. We can be sure it is not all nuts and bolts as some of our good engineer friends would like us to believe.

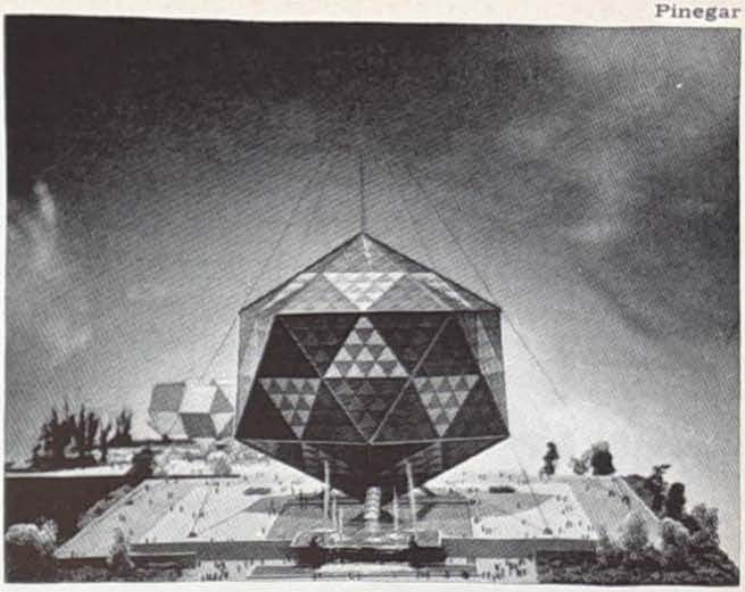
Primarily it is the architect's mission to understand the life of the people he serves and to weave into his structures the framework for living. The complexities of their enterprises should find simple direction through his rational thinking.

The world of architecture is a world of practice and of fancy, a world of function and of ideals. It is a world of building and of planning. It is the privilege of the architect to provide man with environment. It is singularly his duty to look at things objectively. He is partner with the scientist and the inventor. He can, like a doctor, write the prescription; and he can, like the pharmacist, fill it. Mankind is his client. He engineers the movements of man though man may not be conscious that he does.

Hugh N. Stratford (also Coliseum below)



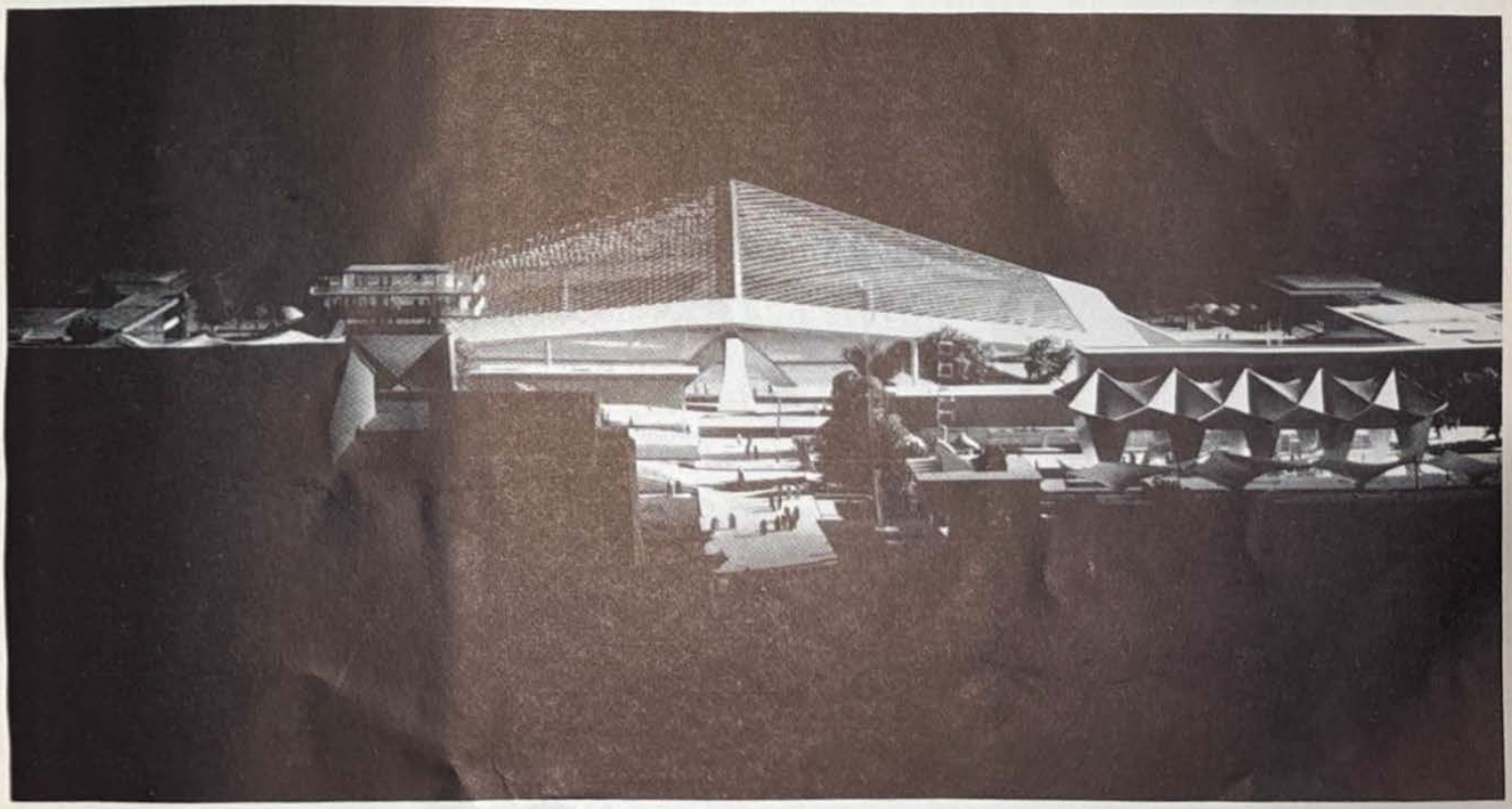
Pinegar



EARLY DESIGNS FOR CENTURY 21 EXPOSITION: aerial structures which leave ground level open for gardens, fountains and free movement of people.

"Only beauty, in the largest sense of the word, the yearning for it, the contemplation of it, has civilized mankind."
—JOHN GALSWORTHY

CENTURY 21 EXPOSITION **CENTURY 21 COLISEUM** (under construction) **SEATTLE**



Nature defines the melody in composer's home

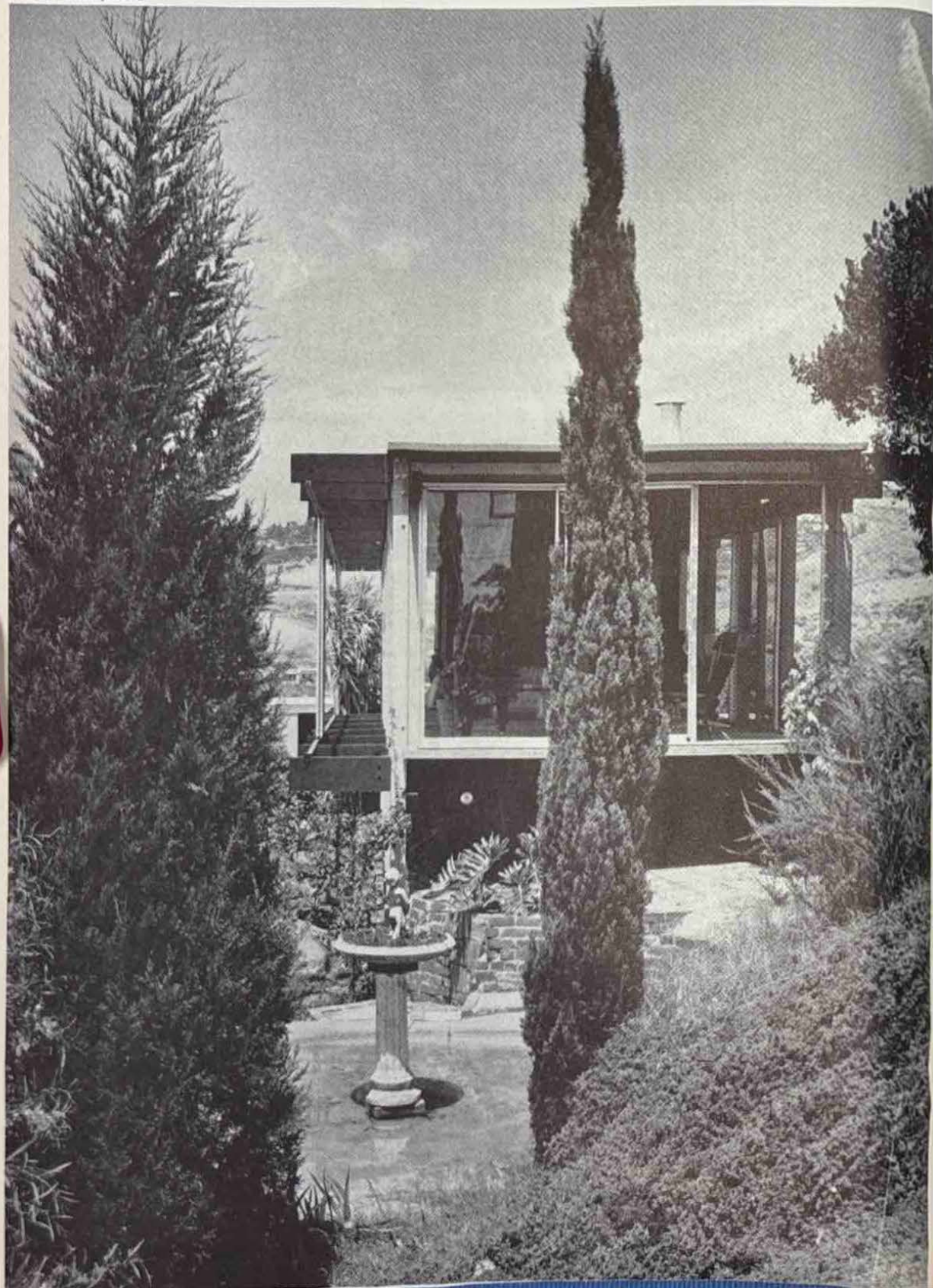
John Robertson Residence
Laguna Beach, California

•

KILLINGSWORTH, BRADY, SMITH
& ASSOCIATES, Architects

JOHN HALAS, Contractor

Marvin Rand photos



"SUCCESSFUL ARCHITECTURE should set the environment but not be the environment." The architects' philosophy is well defined in this home for a composer and concert pianist who needed a secluded, but not confining, environment for practice and composition.

Site was fully landscaped before the home was designed. It had a pool, steps, retaining walls and many fine cypress and pittosporums. The problem was to slip in a house without disturbing the site any more than was absolutely necessary. The solution is, in effect, a platform suspended above the garden.

No walls were required for seismic considerations, allowing complete latitude in interior arrangement and exterior openings. Sliding glass is used for nearly all the exterior and nonbearing walls for the bare minimum of interior partitions. Structural system utilizes nine rigid bents in wood, laced with girders to make the total frame stable as soon as erected. All joints are made rigid, north-south and east-west, with steel plates and bolts. While it could have been prefabricated and assembled on the site, the contractor decided to build in place. The system allowed him to frame with two men in two weeks and to complete, frame and all, in six weeks.

Commenting on the design, the architects say: "Architecture is more than the assembly of materials and structure; there is a matter of environment. This is where architects are most concerned and least able to explain. In this case there was a fine view and a solution might be deemed successful if it succeeded in no more than not destroying what already existed.

"We lighted the garden rather than the house because interior lights reflect on glass. Even the music on the piano is picked up by a spot behind a beam on the outside.

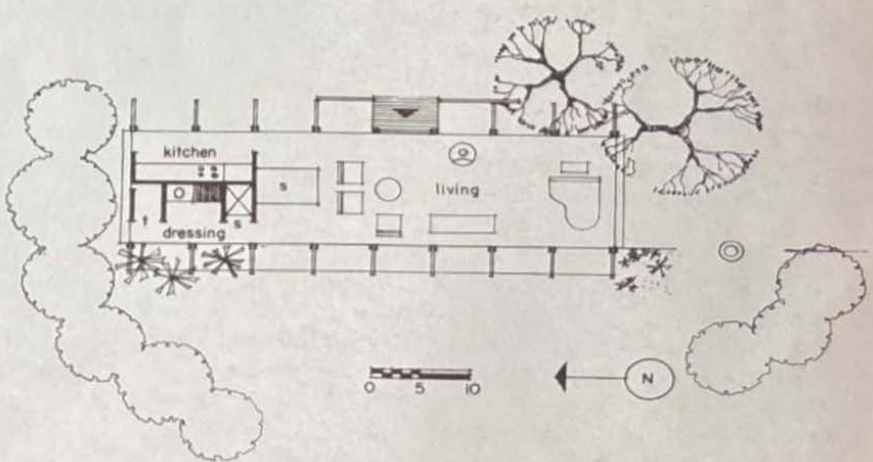
"The building itself is an understatement and meant to be inconspicuous. You see through it, under it, out of it; it is seldom your eye stops on a solid plane. Even where a solid wall became necessary on the north end of the living room, it is negated by the sight lines at either end of it. From the south end by the pool, one still sees through the wall on the far north end."



"THERE WAS A FINE VIEW and a solution might be deemed successful if it succeeded in no more than not destroying what already existed."



"THE BUILDING ITSELF is an understatement and meant to be inconspicuous. You see through it, under it, out of it; it is seldom your eye stops on a solid plane."



Distributing Station Office
Tidewater Oil Co.
Alameda, California

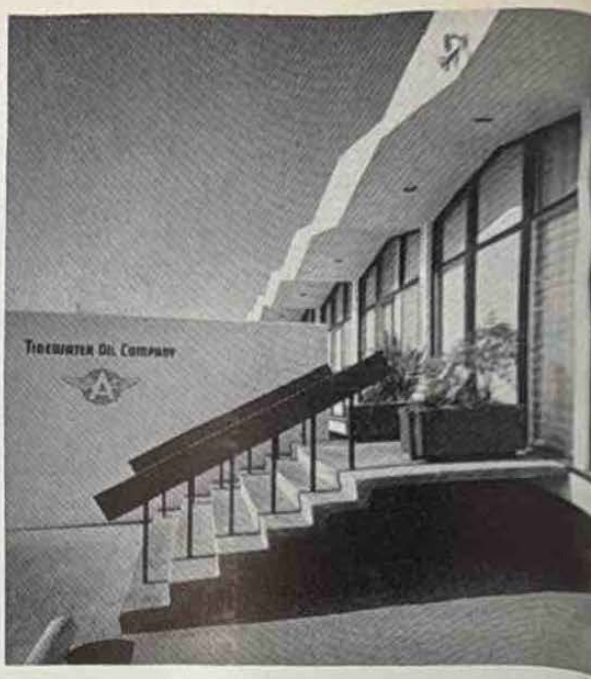
•

ALBERT HUNTER
SHIG. IYAMA
Architects

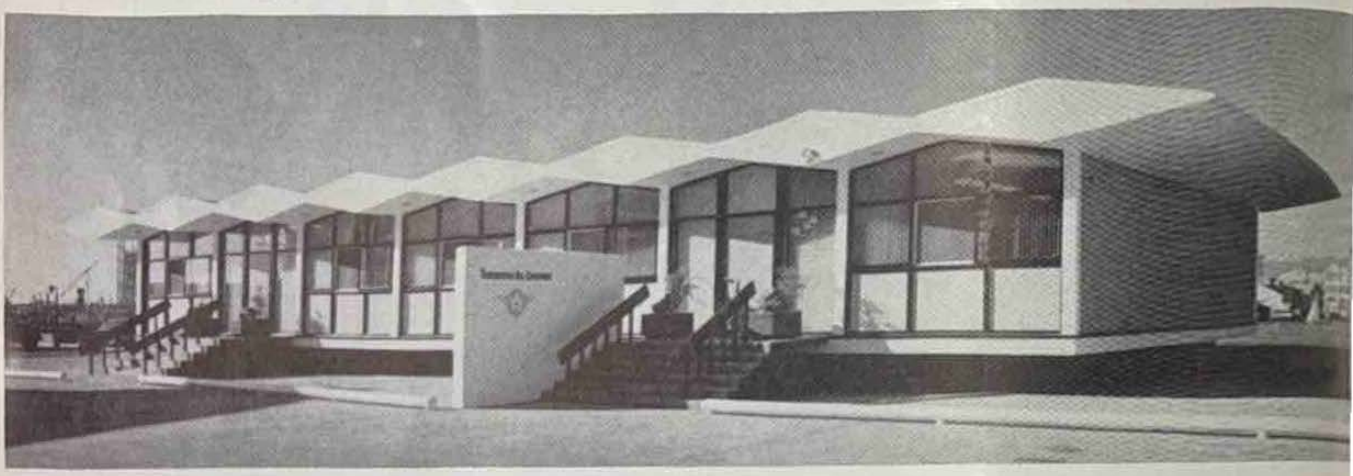
DALTON & DALTON
Structural Engineers

R. C. LEWIS CONSTRUCTION, INC.
General Contractor

Barry Evans photos



PUBLIC ENTRYWAY is at right. Sales conference room is beyond reception area. Entry at left leads to lockers for truck drivers, with lunchroom adjacent. Cantilevered floor is raised 3 ft. from grade.



Floating quality symbolizes company trademark

DESIGN of this small waterfront office utilizes a low-pitched folded plate roof with a deep horizontal recess and a cantilevered floor on all sides to achieve a floating effect in keeping with the company's "Flying A" symbol.

The building, located on the Oakland-Alameda Estuary across from Jack London Square, serves as headquarters for the traveling salesmen as well as an operational office for the truck drivers. By raising the floor 3 ft. from grade, supervisory personnel in the building can visually observe and maintain better control of various yard activities.

Roof is constructed from a central glued-laminated beam to take the span and 2x4 rafters crossing at inte mediate centers to form the roof and the ceiling, whi is finished in acoustical plaster. Exterior consists window wall panels and plaster sections. Painted g sum board is used inside. Color scheme incorpora white, black and mustard.

Supported by reinforced concrete grade beams piles, the 3,400-sq. ft. structure has 2-in. rock wool sulation, an oil-fired warm air perimeter heating syst adaptable for future natural gas and fluorescent lighti It was constructed in 1959 for $65,000, or $19 per squ foot. Robert Z. Taylor was the mechanical and elec cal engineer.

ULTIPLE DWELLING SHOW

M D S

A TRADE EXPOSITION

SEE ALL THE LATEST CHNIQUES IN TENANT APPEAL PRODUCTS ROFESSIONAL SERVICES

GREAT WESTERN EXHIBIT CENTER
Where Santa Ana Freeway crosses Atlantic Blvd.
MARCH 8-12, 1961
1:00 TO 10:30 PM DAILY

featuring

"TECHNIQUES IN TENANT APPEAL"

	DAILY	
SHOW OPENS 1:00 PM	First Session	Second Session
. Cabinet Manufacturers Assn.	1:30	7:00
Glass Door & Window Institute	2:00	7:30
. Plastering Institute	2:30	8:00
ale Plumbing Institute	3:00	8:30
& Air Conditioning Contractors Assn.	3:30	9:00
g & Decorating Contractors Assn.	4:00	9:30
uncil & Ceramic Tile Institute	4:30	10:00
SHOW CLOSES 10:30 PM		

"WHAT IS TENANT APPEAL?"

ers from such groups as the American Institute of cts, American Society of Landscape Architects, n Institute of Decorators and the Mortgage Bankers ion. Daily 5:00 to 7:00 pm.

"ARCHITECTURAL CONCEPTS IN TENANT APPEAL"

mentary Design Success Story presented by the California Chapter of A.I.A.

MULTIPLE DWELLING SHOW

OSIT COMPLETED STUB AT SHOW

E:

PANY:

ESS:

WNER ARCHITECT DESIGNER
ILDER DEVELOPER MANAGER

CIATION AFFILIATION:

ANY POSITION:

(DO NOT) DESIRE TO BE CIRCULARIZED BY THE EXHIBITORS.

IONAL CREDENTIALS AVAILABLE FROM OUR ASSOCIATION OR AT SHOW

MULTIPLE DWELLING SHOW

M D S

...A TRADE EXPOSITION

SEE ALL THE LATEST TECHNIQUES IN TENANT APPEAL PRODUCTS & PROFESSIONAL SERVICES

GREAT WESTERN EXHIBIT CENTER
Where Santa Ana Freeway crosses Atlantic Blvd.
MARCH 8-12, 1961
1:00 TO 10:30 PM DAILY

featuring

"TECHNIQUES IN TENANT APPEAL"

	DAILY	
SHOW OPENS 1:00 PM	First Session	Second Session
So. Cal. Cabinet Manufacturers Assn.	1:30	7:00
Sliding Glass Door & Window Institute	2:00	7:30
So. Cal. Plastering Institute	2:30	8:00
Wholesale Plumbing Institute	3:00	8:30
Refrig. & Air Conditioning Contractors Assn.	3:30	9:00
Painting & Decorating Contractors Assn.	4:00	9:30
Tile Council & Ceramic Tile Institute	4:30	10:00
SHOW CLOSES 10:30 PM		

"WHAT IS TENANT APPEAL?"

By leaders from such groups as the American Institute of Architects, American Society of Landscape Architects, American Institute of Decorators and the Mortgage Bankers Association. Daily 5:00 to 7:00 pm.

"ARCHITECTURAL CONCEPTS IN TENANT APPEAL"

A Documentary Design Success Story presented by the Southern California Chapter of A.I.A.

MULTIPLE DWELLING SHOW

DEPOSIT COMPLETED STUB AT SHOW

NAME:

COMPANY:

ADDRESS:

CITY:

OWNER ARCHITECT DESIGNER
BUILDER DEVELOPER MANAGER

ASSOCIATION AFFILIATION:

COMPANY POSITION:

I (DO) (DO NOT) DESIRE TO BE CIRCULARIZED BY THE EXHIBITORS.

ADDITIONAL CREDENTIALS AVAILABLE FROM YOUR ASSOCIATION OR AT SHOW

THE

TREND

IS TO

MULTIPLE HOUSING

LOS ANGELES CITY
1958-1959

Single Units	56,701
Multiple Units	71,031

MEET
THE
HARD-TO-MEET:

Apartment Developer
Architect
Builder
Owner
Manager
Contract Buyer

(FOR THE TRADE ONLY)

5028 ATTENDED LAST YEAR

Contact:

Mr. Jerry Hanes
MULTIPLE DWELLING SHOW
9889 Santa Monica Boulevard
Beverly Hills, Calif.

Distributing Station Office
Tidewater Oil Co.
Alameda, California

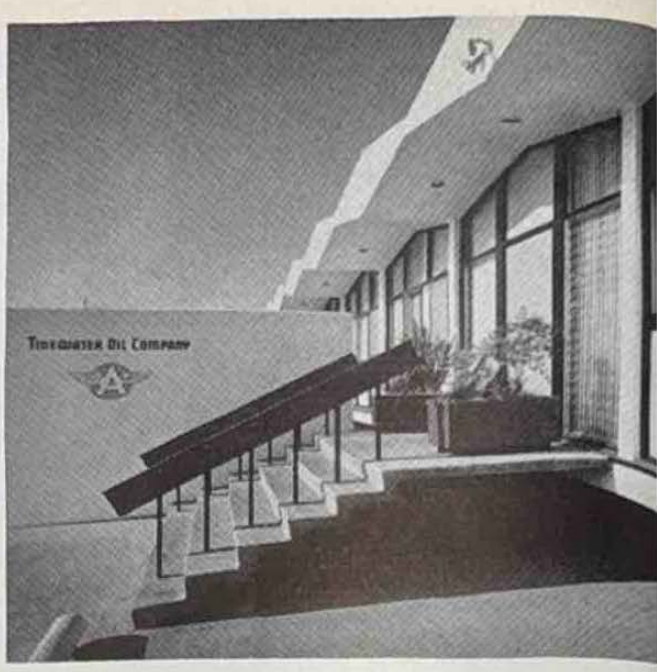
•

ALBERT HUNTER
SHIG. IYAMA
Architects

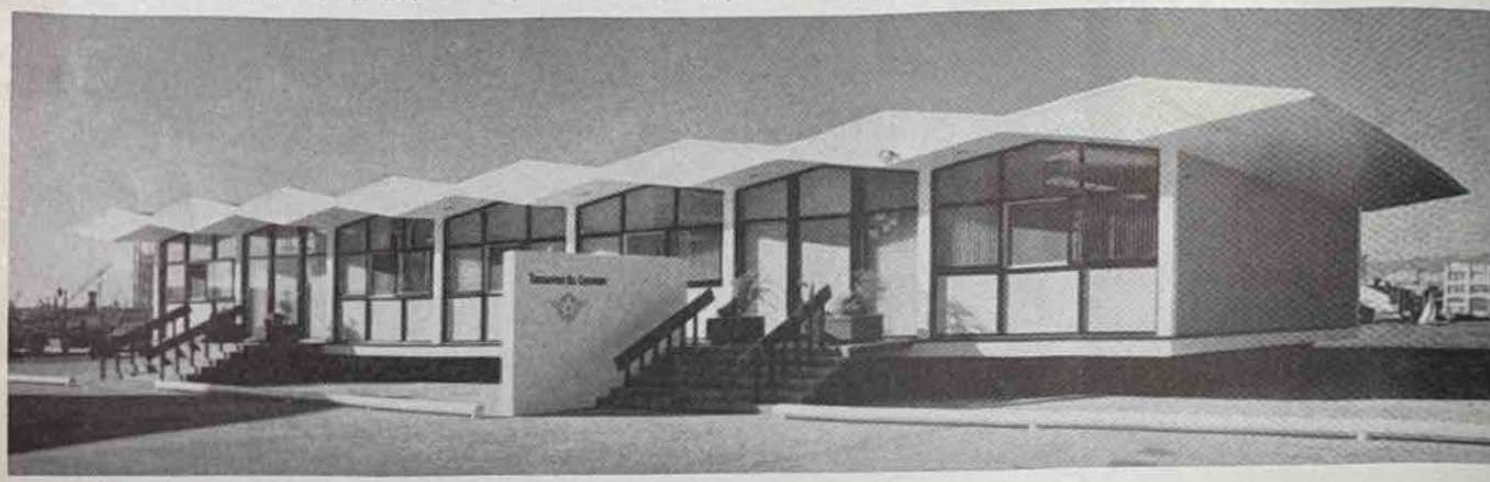
DALTON & DALTON
Structural Engineers

R. C. LEWIS CONSTRUCTION, INC.
General Contractor

Barry Evans photos



PUBLIC ENTRYWAY is at right. Sales conference room is beyond reception area. Entry at left leads to lockers for truck drivers, with lunchroom adjacent. Cantilevered floor is raised 3 ft. from grade.



Floating quality symbolizes company trademark

DESIGN of this small waterfront office utilizes a low-pitched folded plate roof with a deep horizontal recess and a cantilevered floor on all sides to achieve a floating effect in keeping with the company's "Flying A" symbol.

The building, located on the Oakland-Alameda Estuary across from Jack London Square, serves as headquarters for the traveling salesmen as well as an operational office for the truck drivers. By raising the floor 3 ft. from grade, supervisory personnel in the building can visually observe and maintain better control of various yard activities.

Roof is constructed from a central glued-laminated beam to take the span and 2x4 rafters crossing at intermediate centers to form the roof and the ceiling, which is finished in acoustical plaster. Exterior consists of window wall panels and plaster sections. Painted gypsum board is used inside. Color scheme incorporates white, black and mustard.

Supported by reinforced concrete grade beams on piles, the 3,400-sq. ft. structure has 2-in. rock wool insulation, an oil-fired warm air perimeter heating system adaptable for future natural gas and fluorescent lighting. It was constructed in 1959 for $65,000, or $19 per square foot. Robert Z. Taylor was the mechanical and electrical engineer.

ULTIPLE DWELLING SHOW

M D S

..A TRADE EXPOSITION

SEE ALL THE LATEST CHNIQUES IN TENANT APPEAL

PRODUCTS PROFESSIONAL SERVICES

GREAT WESTERN EXHIBIT CENTER
Where Santa Ana Freeway crosses Atlantic Blvd.
MARCH 8-12, 1961
1:00 TO 10:30 PM DAILY

featuring

"TECHNIQUES IN TENANT APPEAL"

SHOW OPENS 1:00 PM	DAILY First Session	Second Session
al. Cabinet Manufacturers Assn.	1:30	7:00
g Glass Door & Window Institute	2:00	7:30
al. Plastering Institute	2:30	8:00
esale Plumbing Institute	3:00	8:30
g. & Air Conditioning Contractors Assn.	3:30	9:00
ting & Decorating Contractors Assn.	4:00	9:30
Council & Ceramic Tile Institute	4:30	10:00
SHOW CLOSES 10:30 PM		

"WHAT IS TENANT APPEAL?"

aders from such groups as the American Institute of tects, American Society of Landscape Architects, ican Institute of Decorators and the Mortgage Bankers iation. Daily 5:00 to 7:00 pm.

"ARCHITECTURAL CONCEPTS IN TENANT APPEAL"

cumentary Design Success Story presented by the ern California Chapter of A.I.A.

MULTIPLE DWELLING SHOW

POSIT COMPLETED STUB AT SHOW

ME:

MPANY:

DRESS:

Y:

OWNER ARCHITECT DESIGNER
BUILDER DEVELOPER MANAGER

SOCIATION AFFILIATION:

MPANY POSITION:

OO) (DO NOT) DESIRE TO BE CIRCULARIZED BY THE EXHIBITORS.

DITIONAL CREDENTIALS AVAILABLE FROM YOUR ASSOCIATION OR AT SHOW

MULTIPLE DWELLING SHOW

M D S

...A TRADE EXPOSITION

SEE ALL THE LATEST TECHNIQUES IN TENANT APPEAL

PRODUCTS & PROFESSIONAL SERVICES

GREAT WESTERN EXHIBIT CENTER
Where Santa Ana Freeway crosses Atlantic Blvd.
MARCH 8-12, 1961
1:00 TO 10:30 PM DAILY

featuring

"TECHNIQUES IN TENANT APPEAL"

SHOW OPENS 1:00 PM	DAILY First Session	Second Session
So. Cal. Cabinet Manufacturers Assn.	1:30	7:00
Sliding Glass Door & Window Institute	2:00	7:30
So. Cal. Plastering Institute	2:30	8:00
Wholesale Plumbing Institute	3:00	8:30
Refrig. & Air Conditioning Contractors Assn.	3:30	9:00
Painting & Decorating Contractors Assn.	4:00	9:30
Tile Council & Ceramic Tile Institute	4:30	10:00
SHOW CLOSES 10:30 PM		

"WHAT IS TENANT APPEAL?"

By leaders from such groups as the American Institute of Architects, American Society of Landscape Architects, American Institute of Decorators and the Mortgage Bankers Association. Daily 5:00 to 7:00 pm.

"ARCHITECTURAL CONCEPTS IN TENANT APPEAL"

A Documentary Design Success Story presented by the Southern California Chapter of A.I.A.

MULTIPLE DWELLING SHOW

DEPOSIT COMPLETED STUB AT SHOW

NAME:

COMPANY:

ADDRESS:

CITY:

OWNER ARCHITECT DESIGNER
BUILDER DEVELOPER MANAGER

ASSOCIATION AFFILIATION:

COMPANY POSITION:

I (DO) (DO NOT) DESIRE TO BE CIRCULARIZED BY THE EXHIBITORS.

ADDITIONAL CREDENTIALS AVAILABLE FROM YOUR ASSOCIATION OR AT SHOW

THE

TREND

IS TO

MULTIPLE HOUSING

LOS ANGELES CITY
1958-1959

Single Units	56,701
Multiple Units	71,031

MEET
THE
HARD-TO-MEET:

Apartment Developer
Architect
Builder
Owner
Manager
Contract Buyer

(FOR THE TRADE ONLY)

5028 ATTENDED LAST YEAR

Contact:

Mr. Jerry Hanes
MULTIPLE DWELLING SHOW
9889 Santa Monica Boulevard
Beverly Hills, Calif.



DIAMOND HEAD and Honolulu form background as workman puts finishing touches to framework of revolving 98-ton restaurant.



For Honolulu diners: steel framed pie in the sky

Rotating a full 360 deg. hourly around a stationary center core, free of noise or any perceptible feeling of motion, Honolulu's "sky restaurant" is scheduled to open in July on the 23rd floor of the new Ala Moana Building.

Structurally, the project can be classified as two sections: the revolving portion, best described as a steel framed pie, and its circular supporting steel and concrete base.

The base, beginning at the 22nd floor, consists of a structure with radiating, cantilevered steel trusses, bolted and welded to steel plates in the core. It will house the lobby, serving facilities and the elevator entrance. The kitchen, located on the 20th floor, will service the restaurant via a dumbwaiter.

The 175-ton revolving portion will turn on two tracks welded to the steel trusses. Majority of the structural steel shapes used on the job were supplied by Bethlehem Steel Co. and fabricated by Terminal Steel Co., Ltd.

Copper facing will complete the exterior paneling of an observation platform at the 25th floor. A steel roof deck will cover the restaurant, designed by John Graham & Co., architects-engineers. Hawaiian Land Co., Ltd., is the general contractor.

Method adopted to continuously revolve a load of 175 tons is not too complex. Three 3-hp. motors provide the drive mechanism and the event that one fails to function, the remaining two will continue to turn the restaurant. Forty-eight wheels, 12 in. in diameter, mounted on the base of the restaurant floor, will follow the two circular tracks on the trusses below.

A chain of forged steel links, also mounted on the floor base, will mesh with pusher type dogs on the drives of the motors to provide traction for the revolving platform. A set of eight horizontal wheels following a circular I-beam track erected on the concrete base will keep the floor level.

RESTAURANT RIM will extend beyond limits of building, with slanted plate glass windows set in 7-ft. wide bays. Client says there will be no feeling of queasiness often associated with tall structures since converging lines of building on which restaurant is perched will not be visible.



protective film

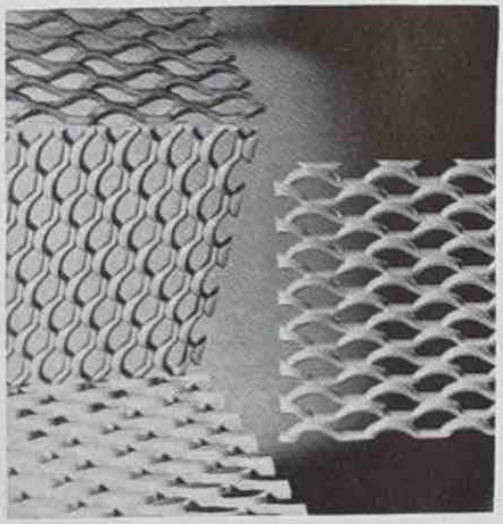
DuPont has developed an industrial film made of polyvinyl fluoride said to have outstanding weatherability and abrasion resistance and expected to have wide application in the construction field. Teslar can be made either clear and transparent or in opaque, pigmented form with glossy or satin surface. It can be vacuum-formed, drawn, metalized, heat-sealed and adhered to other materials. Some possibilities are surfacing for prefabricated panels, siding and roofing, as a glazing material or laminated to glass fiber reinforced panels as a protective surface. Production is now on a limited basis with full-scale operations at a new plant scheduled to begin in 1962.—E. I. duPont de Nemours & Co. **(No. 1)**

slab floor forming

Southern California builders are trying out a procedure for residential slab floor foundations that eliminates wood forming and is said to speed completion by a day and a half. Procedure involves special foundation blocks, 8 in. high on the inside, 12 in. high on the outside, set in wet concrete footings. Area inside the foundation is filled to the 8-in. level and slab is poured. The developers say the amount of concrete saved in the foundation pays for the blocks. In addition, setting and removing forms is eliminated and the finished foundation is truer, with no voids.—Tru-Bloc Concrete Products Co. **(No. 2)**

aluminum grills

Porcelain enameled aluminum expanded metal grills designed for such applications as louvers, room dividers and other architectural and decorating treatments are now available on a stock or special order basis. Grills come in full sheet sizes of 4x8 ft. in a wide range of colors and in aperture sizes varying from ¼ to 1½ in. A number of stock designs are available. Erie Enameling Co. **(No. 3)**



custom ceiling design

Clubs, commercial institutions and others wishing to stamp their emblem or trademark on the ceiling may now do so. Kaiser Gypsum has developed a process for producing almost any design specified by an architect or builder on Fir-Tex acoustical or insulating wood-fibered tiles. Ceilings otherwise are the same as standard cellulose fiber tiles.—Kaiser Gypsum Co. **(No. 4)**

sound control doors

For schools, churches and other installations where sound is a problem, Curtition is marketing a folding door especially designed to reduce sound transmission. Inner construction of Sound Control VL-2 and VL-23 doors utilize a lead-filled vinyl material, similar to the type employed successfully for the same purpose in jet aircraft. Line is available in custom sizes and choice of colors.—Curtition Corp. **(No. 5)**



modular bank counters

Remington Rand has unveiled a l of modular financial counter fur ture designed specifically for ba and other institutions where tell counter service is required. The s tem offers cost savings, is easy install and flexible enough to s both small community and bran banks or large financial institutio Six separate components make up t basic design. A companion line undercounter equipment has 12 ba units. The furniture is available over 100 color variations in bo grained and solid color finishes, in mar- and stain-resistant high pr sure plastic laminate. Special finis es, such a marble and mosaic tile a are available.—Remington Rand Sy tems. **(No.**

incombustible sandwich

A fire wall panel meeting all bui ing codes was the goal in the develo ment of Pyro-Wal, a sandwich ma up of cement-asbestos boards bond to a perlite core and with a steel me at the center. For use with the pan the manufacturer also has develop a low density cement-asbestos k stock to serve as a perimeter join Panels can be faced with vario materials. When specified as a fi wall, they are grooved at the edg and shipped with the key stock an components.—Mirawal Division Birdsboro Corp. **(No.**

honeycomb light diffuser

Uniform light transmission with high coefficient of utilization claimed for the honeycomb surfac pattern of the Honeyglo light diffuse Panels are vacuum formed from ther moplastic rigid vinyl sheeting to com bine both functional and decorativ requirements into a single, low co unit. Standard 2x2-ft. panels permi simple installation with a T-bar gri suspension system and the 2-to- mounting ratio makes them well suit ed to installations where ceiling depth is limited. Honeyglo panels can b custom formed with company name trademark or symbol molded into the surface.—Hexcel Products, Inc. **(No.**

Reader Service

Pacific Architect & Builder
1945 Yale Place N., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

FEBRUARY 1961

1	2	3	4	5	6	7
8	9	10	11	12	13	

Name

Title

Firm

Address

Zone State

movable partitions

A versatile movable partition is billed by its manufacturer as providing wide enough latitude in choice of materials and fittings that it can be used to create a luxurious executive suite or a simple space separator in a factory. Developed as part of the WeberWall line and marketed under the name Concept, it is offered in standard baked enamel finish with plastic laminates and grains offered as custom finishes. All units are interchangeable. Same panels, for example, are used with a conventional or recessed base. Number of pieces required has been kept to a minimum and joining has been simplified, thus speeding erection.—Weber Showcase & Fixture Co., Inc. **(No. 9)**

construction hoist

Jumbo, a hydraulically controlled construction hoist with 3,000-lb. capacity, will be introduced this month. Basic unit unloads at a maximum of 25½ ft., with extra sections permitting up to 170 ft. Platform automatically stops at any preset level. Precision balancing and rigidity of the tower, which allows it to ride without swaying, make it possible to shift from jobsite to jobsite without dismantling the hoist. Unit is powered by a 30-hp. Wisconsin air-cooled engine.—Tubular Structures Corp. of America. **(No. 10)**

thin shell weatherproofing

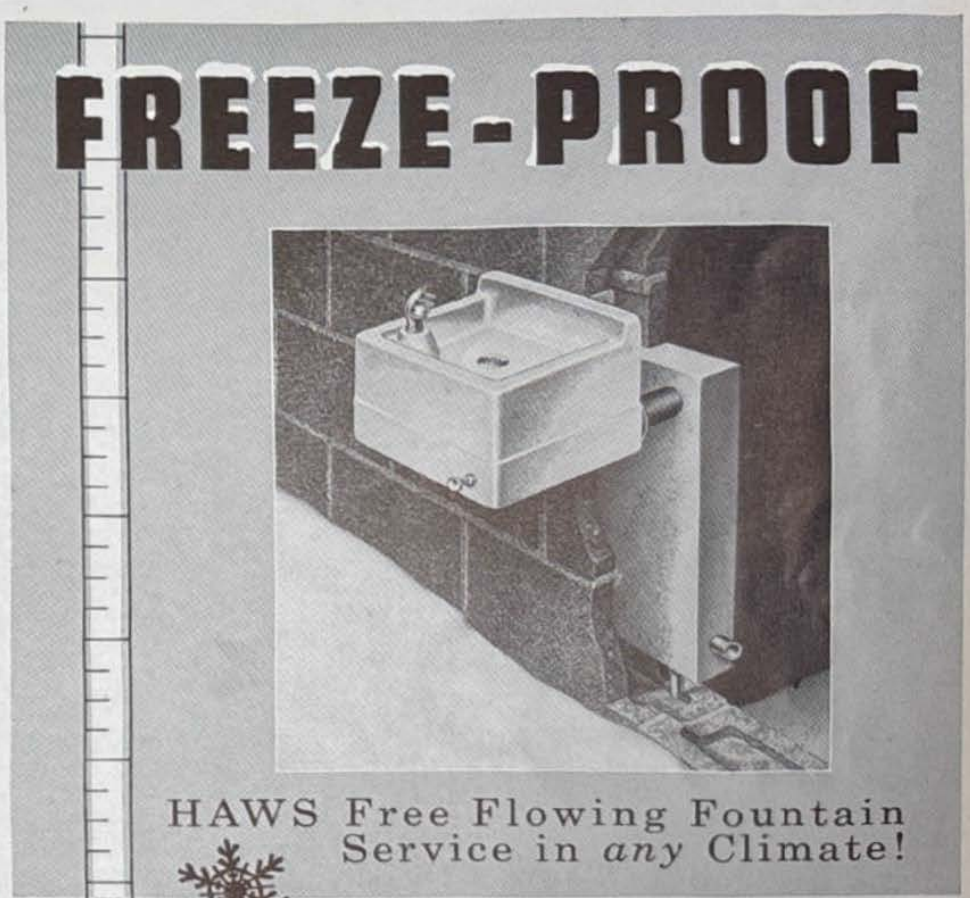
For thin shell concrete and plywood roofs of curved, angular or undulating slope, Armstrong is marketing a fluid-applied material that cures rapidly to form a protective elastic membrane. F/A roofing weighs less than 20 lb. per 100 sq. ft. in most applications, thus reducing structural dead loads. Two compounds are employed, based on neoprene for the primer and Hypalon for the second coat. Product remains stable and will not soften with heat or become brittle with colder weather. Application is by roller or spraying equipment, depending upon the pitch and form of the roof. It is available in white and may be pigmented in other colors upon request.—Armstrong Cork Co. **(No. 11)**

aluminum structural panel

Two flat sheets of aluminum bonded to a core of either corrugated or delta-formed aluminum sheets produce a high-strength load-bearing panel being marketed under the trade name Reynocore. Expected to have wide application in many types of construction, the panel provides durable exterior facing and finished interior surface in one step, combined with good structural strength supplied by the core. Interior surface, when perforated, functions as an acoustical panel. Air pockets in the core provide insulation. Panels will be offered in range of colors or embossed design in variety of sizes. First installation will be in the roof for the Century 21 Exposition Coliseum in Seattle, which will utilize 39,000 panels in a sweep over more than three acres.—Reynolds Metals Co. **(No. 12)**

simulated stone panels

Plastic building panels reinforced by Fiberglas and molded to resemble stone veneer have been developed by an Illinois firm to provide the effect of stone in a product that is light in weight and can be nailed in place. The panels are made of polyester-acrylic resin reinforced with Owens-Corning Fiberglas mat and formed under high pressure on molds. They can be used in both exterior and interior applications.—Terox Corporation of America. **(No. 13)**



For positive Winter Protection against costly "freeze-ups" and excessive maintenance of outdoor fountains ...specify HAWS Freeze-Proof Units! Get year 'round drinking service. The choice of style is yours! Freeze-Proof Units are available with virtually any style fountain from HAWS' complete line—wall or pedestal, single or multiple bubbler. For details on model selection and installation . . . see SWEETS Architectural File, or write today for catalog.

HAWS **FREEZE-PROOF DRINKING FOUNTAINS**

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street • Berkeley 10, California
Export Dept.: 19 Columbus Ave. • San Francisco 11, California

Rebuilding our cities to man's measure: an appraisal

In a recent issue of The Reporter, Albert Bush-Brown, associate professor of architectural history at Massachusetts Institute of Technology, reviewed* The Image of the City. *By Kevin Lynch. Technology Press and Harvard University Press. 1960. 195 pp. $5.50.*

The American industrial city has generally failed to inspire poets, novelists and artists as an appropriate setting for heroic action. The pathos of Jack Levine's gluttons, the brassy vanities of Reginald Marsh and Paul Cadmus, the empty darkened streets of Edward Hopper are but pictorial counterparts to the headlines about trivia, lurid sensationalism and violence. The urban novel—of Dreiser, of Anderson, of Wharton, Wolfe and Dos Passos—displays the American city's turmoil, its people's compulsions, their crudities. Our cities today are not organized to nurture ideals about place and history that can stimulate and dignify.

And yet we Americans are not congenitally lacking in the sense of urban aesthetics. There was a time, not two centuries ago, when societies settled nobly at Annapolis, Georgetown, Beacon Hill and Savannah, respected distinctive topography, augmented it by their avenues and parks, sited communal institutions on principal promontories, apportioned private lands generously and built connections to the public spaces — so that private wealth bolstered commonwealth. Americans then knew how to build and sustain a society; a fine city was their ideal.

It was technology—or rather man's abuse of it—that enabled Americans to destroy the ideal. Machines removed the natural impetus to the Georgian pattern of settlement, unleashed the urge to level and canalize, littered the ground and catapulted above the mess by mechanical conquests over height, defied the rhythm of night and day by permitting man to burn lamps continuously, bought his way to all-weather, controlled climate so that the sun neither menaced nor the winds chilled, bridged congested miles by wires and waves so that information, much of it trivial, was broadcast instantly. Technology, up to now, has seldom been aesthetically beneficial.

The human consequences could be ignored, for a bountiful technology leapt each obstacle and colossal wealth preserved retreats; besides, there was occasional majesty in the turreted mass of lower Manhattan, a curious beauty in the sludge and oil slicks of the Mississippi at New Orleans. But most of all, especially in small cities, urban thought enjoyed a duality—the farm, the city—and outside the metropolis an agricultural frontier beckoned even as early as 1870, when railroads, indulging in land speculation, promoted suburban refuge, abetting the American tendency to separate place of work from place of residence. Eventually the separation became an economic and technological necessity.

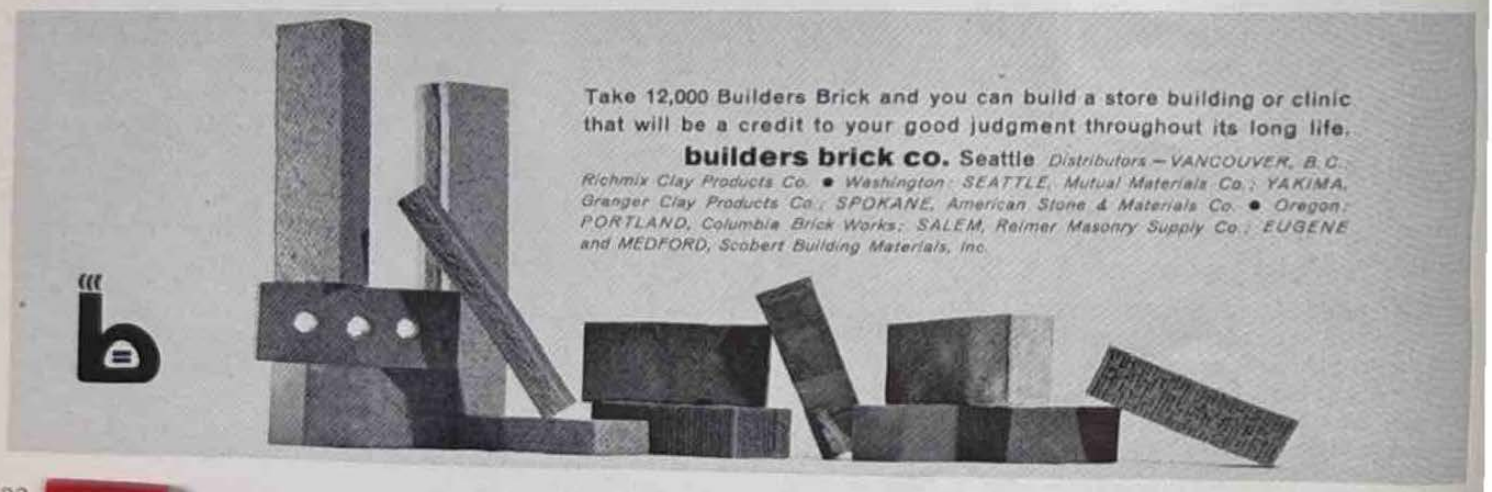
The pastoral did not move into the city, except as yokels gawked at the carnival on Broadway or a rustic artifice was contrived for Central Park; rather, downtown was abandoned by residents and a tawdry enclave moved to the countryside, sprawled outward, stretched along the arteries until the city itself, but particularly its institutional working units, rotted, and country and city converged upon one u differentiated experience, suburbia. is Professor Lynch's belief that unle the whole metropolitan region is give a new and clear shape, there will b no way to understand or to manag the new Gargantua.

Professor Lynch's book represent the third of the periods of criticism the modern city has undergone. Th first was leveled at the industrial cit during the Age of Reform, when cla sic white facades, inspired by Chica go's Columbian Exposition of 1893 were made to stand upon broad boule vards, as at Washington. Such formal planning ignored the social condition of the city, which became the subject for the second period of criticism during the New Deal, when attention turned to housing, recreation and public buildings.

In the third (and current) period of criticism, both formal and social objectives are sought and the art of city planning, meanwhile, has attracted many practitioners with professional knowledge of legal restraints, economic analyses, traffic information and social surveys. It would seem propitious, therefore, that the greatest powers ever created for changing the urban scene—the federal highway and urban renewal programs—should arrive at this moment.

But lamentably, neither planners nor the public seem to be as ready as they were even in 1930. Planners are uncertain about their aesthetic objectives. Pittsburgh's bold and wonderful Chatham Village of 1927 has not been succeeded by residential neighborhoods of comparable quality; early Rockefeller Center, as approached from Fifth Avenue, suggests a thrilling urban image, but its promise is belied westward where slabs no longer define exterior spaces but stand as massive blocks, like the new Time-Life Building, crowding leftover spaces. The disappointment is con-

*All rights reserved under Pan-American Copyright Convention.



firmed elsewhere: in the ugly but modern Penn Center at Philadelphia; in Boston, where the Central Artery ripped through downtown and provided an ugly barrier and hazardous passageway. Proposals for Boston's Prudential Center, for Pittsburgh's Golden Triangle and for San Francisco's Gateway force the sensitive to raise their voices in concert with those, including Alfred Kazin, Lewis Mumford and William Whyte, who look upon recent urban remodeling as a gigantic bore.

For the most part, the remodeling reflects an appalling paucity of imagination, stupid adherence to the rigid formalities of a few inflexible ideas. Thus far, few imaginations have exceeded the forceful visions of Le Corbusier, the Swiss-French architect who in 1945 proposed to reconstruct bombed-out Saint-Die in France: swift highways served minor routes that led past tall slabs and towers set at wide intervals in pedestrian parks; one large area was to be developed as a cultural and civic center where uniquely shaped buildings would symbolize the governmental, artistic, commercial, scholarly, theatrical and musical functions they housed. As a general scheme it was not intended to be a panacea, as Le Corbusier insisted when he developed a better plan for Chandigarh; nor did it have the rich detail a city requires. But approximations of it appeared internationally and wide areas of cities were swept clean to make room for it.

The results of such wholesale demolition and rebuilding to a single pattern resemble the Cartesian and Kantian gods created by logical metaphysicians; as Santayana has said, such synthetic deities are always offensive to the devout, whose religious personages have been developed by many people and by history. And so with cities. They attain richness of experience and diversity of possibility for action not from one individual's fiat but from centuries of sensitivity to form and to the urgencies of place and time. What is needed today is a way to evoke organization from existing urban functions and institutions—not carving new Brasilias from the jungle, for few men do that well, but stimulating better growth in older cities.

On this question, Kevin Lynch now offers a rewarding analysis in his modest and artful book. Reflecting today's concern for aesthetics, taking liberal social goals for granted, he does not discuss low cost housing or schools or zoning. Rather, he suggests the most viable theory about city form since the proposals Camillo Sitte made in Vienna about 1890.

Professor Lynch's book developed from studies at the Massachusetts In-



6690-A

The CF&I image protects your property

... with a Realock Fence

This giant steelman is a symbol of dependability for CF&I steel products. Here, his strength and reliance is reflected in REALOCK FENCE — the safe, sure way to protect schools and other municipal buildings from vandals, arson and prowlers.

The tough, strong fabric of a Realock Fence will withstand decades of rough weather conditions. That's because the full-weight steel is heavily galvanized *after* weaving to make it corrosion-resistant. And the sturdy posts are set in concrete for extra-long, durable service.

Realock's neat, chain-link construction adds beauty and dignity to the area it protects. Available in a variety of types — with or without barbed wire tops, in heavy steel construction. Realock erection service is available for fast, professional installation.

For a free estimate and complete information, contact our nearest sales office.

Los Angeles • Oakland • Portland • San Francisco
San Leandro • Seattle • Spokane • Denver
Salt Lake City • Phoenix

CF&I STEEL **REALOCK FENCE**

THE COLORADO FUEL AND IRON CORPORATION

6609A

stitute of Technology's Center for Urban and Regional Studies, which was generously supported by funds from the Rockefeller Foundation. The chief material comes from his scrutiny of Boston, Los Angeles and Jersey City, whose central areas were inspected to gain opinions about the significant perceptual features of urban form. Then interviews were conducted with small numbers of urban residents to determine their ideas of each city. They were encouraged to evoke their images of the city, stimulated by requests for descriptions, sketches, maps, performances of imaginary trips, questions about directions and descriptions of locations. One of the assets of Professor Lynch's book is the ingenious graphic compilation of the evidence, notably a map of Boston, which summarizes the major obstacles people encounter in finding their way and in forming mental pictures of their city.

After studying the ways in which we perceive our urban environment, Lynch concludes that the city, as it now stands, is the map of our confusions and the source of many frustrations. The vast and complex pattern is now being reshaped, but not in a way that will produce the securities, the symbols and the collective memories that might adapt the city to man's needs.

It is Lynch's thesis that a vivid and integrated environment heightens the depth and intensity of human experience. And he finds that "legibility," a clear image of the environment, depends upon an observer's ease in finding many clues, including visual sensations of color, shape, size and pattern, motion and concentrations of light, sound, texture and even smell.

The people of Boston share an awareness of most of the city's shore line, its traffic arteries, its Back Bay residential pattern, its public institutions on Copley Square, its Public Garden and Common, which are dominated by the golden dome of the Statehouse on Beacon Hill. But much of Boston, like most of Jersey City and Los Angeles, contains critical ambiguities of shape, flaws in orientation, a lack of distinctive elements, boundaries and pathways. Even in the Los Angeles grid, elements could not be located with confidence and where perceptual form weakened, conceptual devices failed to prevent locations from floating in an undifferentiated matrix where the observer seemed lost.

From his surveys, which are aptly illustrated by fine photographs, drawings and maps, Professor Lynch isolated five principal conditions for legibility. **Paths,** the channels for movement, are dominant elements in the image and where streets, walkways, and transit lines clearly announce their directional character, they serve as indices and signals. **Edges** are linear elements — a shoreline, railroad cut or wall—which may be felt either as barriers or as connectors, what Professor Lynch calls "seams." The edges may help to define **districts,** those sections which have recognizable individuality, as do Chinatowns and Nob Hills. Often, districts may cluster about strategic points, or **nodes,** where an intensively used junction or break in means of transportation brings many people to a convergence of paths. Finally, there are **landmarks**, a physical object, building, sign, store, mountain or patch of grass, signifying something personal or communal. These terms offer a general language for describing urban forms and in generalizing, it may free the urban designer from the cliches of recent fad designs.

In a short chapter, Professor Lynch applies what he has learned about perception to the problem of obtaining a city that is a multipurpose, shifting organization, plastic to the purposes and perceptions of its citizens, expressive of the urban functions of circulation, major land uses and key focal points. He explains how paths, for example, might receive continuity, become arranged in a visual hierarchy, declare their direction and support strong termini. And he suggests how an environment might require a strong visible framework that will hold together and yet expose many highly characteristic parts, each with its own individuality.

In criticism, I would only say that a good beginning has not gone far enough. Too much of the book is occupied with explaining and reviewing the method of investigation; I find no reason for dwelling upon machinery, as if scholars should describe their trips through the library. This burdensome exposition, I feel, might better have been replaced by more suggestions about fashioning cities, including illustrations of the brilliant plans that Professor Lynch himself has helped to develop for parts of Cleveland and Boston. As I meant to indicate by the example of Le Corbusier's plan for Saint-Die, history, including urban history, seems to prove that no partial analysis, surely no purely conceptual analysis, has the power of an image. If urban chaos is to be reformed, we need to be shown a vision, based on the aesthetic Kevin Lynch has outlined, of the complexly organized, legible city where, as he writes, ". . . fear and confusion might be replaced with delight in the richness and power of the scene."

Structural Engineering. By N. S. Glassman and Harry S. Graef. International Publications, 1026 20th St. N.W., Washington 6, D.C. 1960. 96 pp. $7.50.

Authored by an architect and an engineer, this handbook of problems, solutions and data sheets is designed for use in the office and in preparing to pass state boards.

Building with Steel. By Don A. Haperin. American Technical Society, 858 E. 58th St., Chicago 37, Ill. 1960. 255 pp. $6.

Covers all phases of steel construction from initial design through shop fabrication, including detailing and erection procedure of components.



Whether national or regional Convention — Association, Club or Business Group

Successful Meetings
begin at a
HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

- SAN FRANCISCO — The Alexander Hamilton, Hotel Stewart, Hotel Don
- FRESNO — Hotel Californian
- SAN DIEGO — The El Cortez Motel, Travelodge Motor Hotel, Stardust Motor Hotel, El Cortez Motel
- MONTEREY — Hotel San Carlos
- OAKLAND — Lake Merritt Hotel
- OROVILLE — Oroville Inn
- RICHMOND — Hotel Don
- VALLEJO — Casa de Vallejo Hotel
- BAKERSFIELD — Hotel El Tejon

THE ALEXANDER HAMILTON
San Francisco
a Handlery Hotel

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

• **Formica Corp.** recently opened a district warehouse in Los Angeles which will serve the nine western states. This is the first time Formica has established a master distributing point away from the main plant in Cincinnati. It occupies 15,000 sq. ft. of a warehouse built in the City of Industry by American Cyanamid, Formica's parent company.

• **American Gypsum Co.** has begun production at its new $3 million plant just northeast of Albuquerque. Capacity of the almost entirely automated plant is 400,000 sq. ft. of finished gypsum board daily. Initial sales plans call for distribution throughout New Mexico, Colorado, southern Wyoming, eastern Arizona and part of West Texas.

• **Architectural Plastics Corp.** has appointed Gary Sem as architectural salesman for the Portland office, replacing Fred Neill.

• **Ender-Monarch Corp.** has opened a West Coast office, display room and warehouse in Los Angeles under the management of Irving Beber, a 12-year veteran in the lighting field. The firm will be located with Acoustica Associates, its parent company, near the International Airport.

• **Dow Chemical Co.** is expanding its technical service facilities in Torrance, Calif., in a program which will include construction of a polypropylene plant costing several million dollars. Additions in Torrance will make it possible to study and develop various techniques of using polypropylene-based plastics for molding, coating, film and foam applications, the company says.

• **Filon Plastics Corp.** has promoted Frank Malone from industrial sales manager for Southern California to the newly created post of regional sales manager in that territory.

• **Gladding, McBean & Co.** has promoted H. L. Kolberg to product manager of masonry sales in its Los Angeles headquarters.

• **Owens-Corning Fiberglas Corp.** has appointed Kaiser Gypsum Co. as distributor for its screening in a 14-state marketing territory.

• **Reynolds Metals Co.** has transferred Richard W. Jackstadt from Seattle to Portland where he will serve as sales representative for the aluminum architectural and building products line in the Oregon and southwest Washington area.

• **Graystone, Inc.,** has opened a sales and service outlet between Renton and Kent to serve the southern portion of Seattle and King County. Manager is James C. Bailey who has been with the firm the past 14 years. Building was designed by Ralph H. Burkhard.

• **Fibreboard Paper Products Corp.** has combined its Portland packaging and building materials division sales units into a single office at a new address, 3717 S.E. 39th Ave.

• **EJS Lighting Corp.** has named John F. Helms as salesman for the northern California area. He previously was assistant to the president of Incandescent Supply Co.

• **Robertshaw-Fulton Controls Co.** will construct a headquarters office building in Richmond, Va., where it has been located since 1957, rather than in Richmond, Calif., as was erroneously reported in the December issue. Robertshaw does have three facilities in California: Grayson Controls Division in Long Beach and aeronautical and instrument division and western research center, both in Anaheim.

• **Hawaiian Cement Corp.** has elected Walter C. Russell as president and chief executive officer and Robert D. Fisher as board chairman. Russell is president of American Cement Corp. and will continue in that post, dividing his time between Honolulu and Detroit. Fisher, president of Hawaiian Cement since its organization in April 1959, replaces Garner A. Beckett, who resigned as chairman but continues as a board member.

• **Pacific Lumber Co.** has named Lawrence H. Price to manage market research and new product development for Palco lines. Price joins the firm after 14 years with Timber Structures, Inc.

• **John Hassall, Inc.,** manufacturer of fasteners and cold headed specialties, has appointed Western Empire, Inc., Englewood, Colo., as sales representatives for Colorado, New Mexico, Utah and Wyoming; and Les Sachs Associates, Los Angeles, for California, Arizona and Nevada.

EFCO
FLEXIBLE
Form
Panels



Round concrete tanks or curved walls may be quickly formed by combining EFCO Flexible Steel Form Panels with regular EFCO Steel Forms.

For angles of any degree, EFCO Flexible Angle Form Panels make the job easy.

ASK FOR COMPLETE INFORMATION

ECONOMY FORMS CORP.
Home Office: Des Moines, Iowa
EFCO ECONOMY FORMS

Nearby Sales Offices:

DENVER, COLO., 2425 Walnut
KENT, WASH., 721 Meeker
LOS ANGELES, CAL., 5718 Long Beach Ave.
OAKLAND, CAL., 321 E. 12th
PORTLAND, O., 208 N. E. Oregon St.

Classified Advertising

RATES

Regular Classified: $6 per column inch. **Classified Display** (based upon number of insertions during any 12-month period): 1 time, $9; 6 times, $8; 12 times, $7.

FOR SALE

Nearly new Leroy printing set. $35.00.

ERNEST FORSELL

16702 10th West Alderwood Manor, Wn.
Phone: PRospect 8-7384

ARCHITECTURAL DRAFTSMAN

Architectural draftsman wanted by office doing variety of work in Oregon and California. Write Morrison & Howard, Architects, Starbuck, Engineer, 203 Williams Bldg., Klamath Falls, Ore. (or call TUxedo 4-7462) with resume of experience.

Moving?

For uninterrupted service please send old and new address to

Pacific Architect & Builder
1945 Yale Place N., Seattle 2, Wash.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place N., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 202 Green St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Builders Brick Co.	32
Colorado Fuel & Iron Co.	33
Economy Forms Corp.	35
Handlery Hotel	34
Haws Drinking Faucet Company	31
Inland Steel Products Company	II Cover
Macomber, Inc.	III Cover
Multiple Dwelling Show	27
Portland Cement Association	IV Cover
Rilco Laminated Products, Inc.	9

not specified

form givers: a lesson in p

As her initial assignment, Isabella N. Foster, our new appointed Oregon editor, reports on how the Oreg Chapter, AIA, cooperated with the Portland Art Muse in making the Time-organized "Form Givers at Mid Century" an important educational event in the com munity. Conceived as a public service project to impro the architects' relationship with the museum, the AI members found that they received more publicity an reached more laymen than ever before with any oth promotion. The moral: real public relations is whe you find it.

Here's how the joint effort worked. A schedule of ga lery conversations with local architects in conjunctio with the exhibition was arranged by Mrs. Norman Zimmer, program chairman of the Women's Architectura League. There had been little public interest in previou showings and the museum was not clamoring for th next AIA Honor Awards display. The attendance an the enthusiastic response to the conversations astounde both the museum and the architects.

The architects participated in pairs, informally passing the discussion back and forth and making personal com ments on the show. There was an interesting differenc of approach that prompted viewers—or listeners—t come back to hear another team and it was noted tha museum staff members heard almost every talk. Sched uled for Friday evenings and Sunday afternoons, th tours were supposed to last an hour. Every one ran wel over the allocated time without losing a single member o the audience and some lasted almost two hours.

Much credit goes to the museum for an outstanding publicity job in getting the project into the press. There were photographs and biographical material on each ar chitect preceding his first gallery talk as well as exten sive coverage of the exhibition. All this seemed to draw a cross section of the general public. There was a sprink ling of clients, ex-clients, friends and regular museum goers, to be sure, but the majority of the faces were un familiar. It was not obvious to most why the architect represented in the exhibition were form givers; archi tecture as a creative art was a new idea.

Majority of the questions were quite elementary and general. The most frequent, "What's good around here?" was answered in part by the museum building itself, de signed in 1932 by Pietro Belluschi, a former Museum Art School student. Then in this country only 10 years, h gained wide reknown from this timeless structure, select ed by the AIA as one of the best 100 buildings constructe in the U.S. from 1920-40. Visitors received a guide, "Ar chitecture, Portland, Oregon," compiled for the Orego Centennial.

The architects thoroughly enjoyed themselves an enthusiastically answered requests for student tours dur ing the week at both the high school and college leve Everyone had so much fun, in fact, that Mrs. Zimme came to refer to the project as "a public service progra that backfired." As her architect husband and fello conversationists agreed: "It was good for the museum an better for the architects."

The Northern California Chapter, AIA, was arrangin a similar program of tours for afternoons of the fo weekends of the exhibition's stay in San Francisco our February issue goes to press.

This kind of thing, originating with the profession, public relations at its best and is far superior to t promotional schemes advanced by the PR practitione themselves.

R.E.

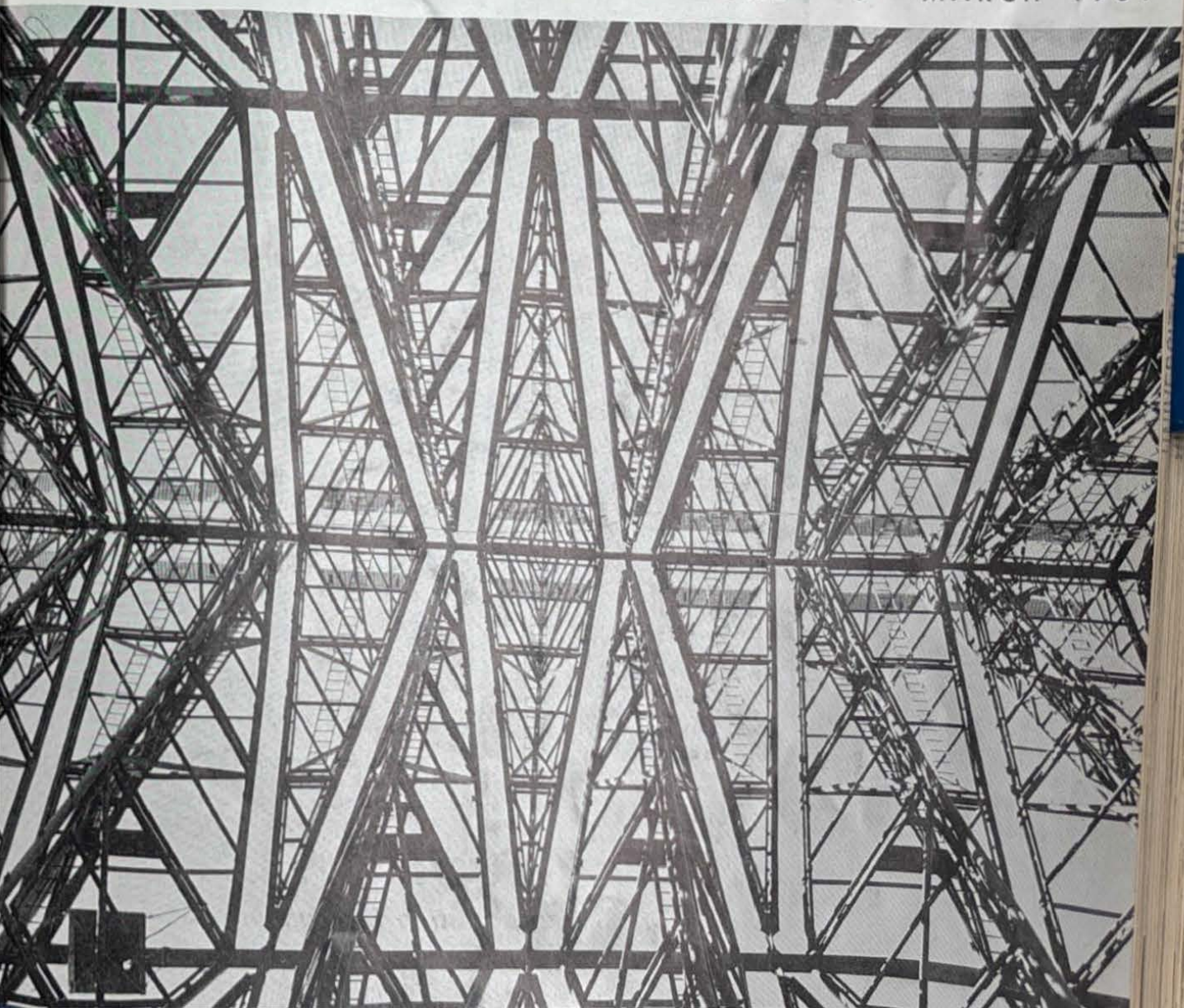
Pacific Architect & Builder

Architecture Library

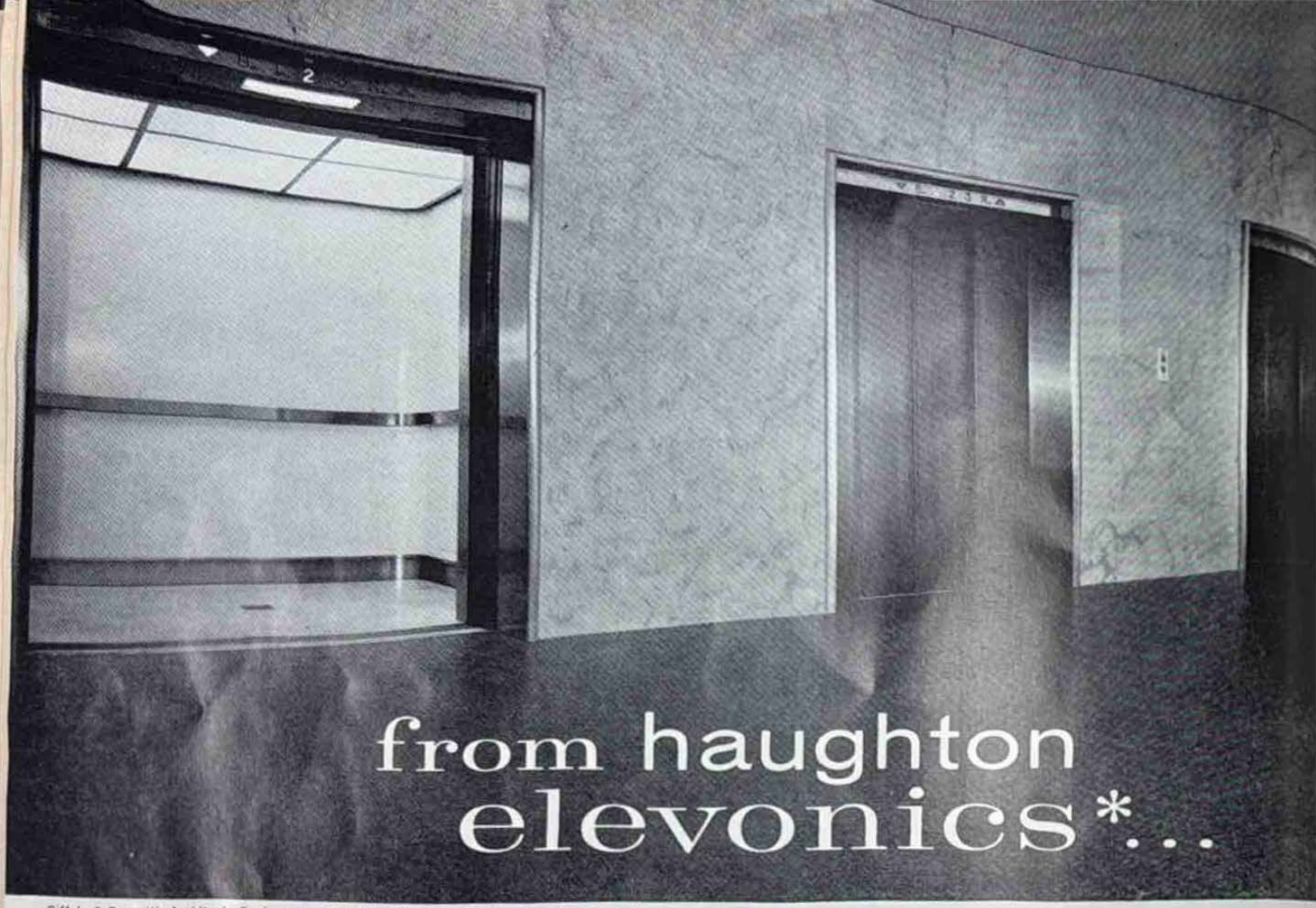
UNIVERSITY OF OREGON
MAR 9 1961
LIBRARY

P A
& B

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ MARCH 1961



OREGON LIBRARY



from haughton elevonics*...

Giffels & Rossetti, Architects-Engineers The O. W. Burke Company, General Contractor

a new concept of convention center elevatoring for magnificent COBO HALL



Convention hall elevatoring has its own special problems. And for Detroit's vast new Cobo Hall, where it is said no foreseen convention is too large to handle, there were some special *special* problems.

Here's how they were solved by a specialized system of Haughton electronically controlled elevators.

Designers knew that before and after scheduled events, building traffic would mean a heavy demand for elevator service between parking areas (basement, first and roof floors) and second floor. At other times, comparatively light traffic could be expected between all floors.

Five Haughton automatic units were installed. Cars are big—six feet deep and eight feet wide. A bank of three serves basement, first, second and roof levels. Two cars serve first, second and third floors for lesser traffic needs. All units are motivated by an amazing "electronic brain" that anticipates service needs and dispatches cars at proper time and in proper sequence.

The complete reliability of Haughton vertical transportation is thoroughly recognized by building professionals and owners. We will be glad to provide you with complete information on Haughton design, modernization and maintenance capabilities.

EMBLEM OF EXCELLENCE IN VERTICAL TRANSPORTATION

**Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative application of electronic devices and instrumentation for betterment of systems design and performance.*

from

haughton... *new concepts in vertical transportation for buildings of every type*

HAUGHTON ELEVATOR COMPANY • Division of Toledo Scale Corporation, Toledo 9, Ohio

offices in principal cities | PASSENGER AND FREIGHT ELEVATORS • ESCALATORS DUMBWAITERS • SPECIALIZED LIFT EQUIPMENT

Pacific Architect & Builder March 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

12 Cerritos Junior College, Norwalk, Calif.: Kistner, Wright & Wright, Architects-Engineers

17 Always Beach Cabin, Northern California: Johnson-Hawley & Associates, Architectural Firm

18 Guaranty Federal Savings and Loan Association Building, Casper, Wyo.: Robert Wehrli of Architectural Guild, Architect

20 Homer T. Delawie Residence, San Diego: Homer T. Delawie, Architect

22 Totem Pole Marina, Portland: John Storrs, Architect

methods & materials

23 Air Force Academy's Steel Skeleton Awaits Aluminum Skin

26 Imaginative Engineering Roofs Tacoma Plant of Prestressed Concrete Manufacturer

departments

4 Project Preview

5 Building Permits

8 The Building Month

10 T-Square Talk

27 PA&B Memo

28 Products

30 Literature

32 Manufacturers/Suppliers

33 Contractors' Corner

34 Not Specified

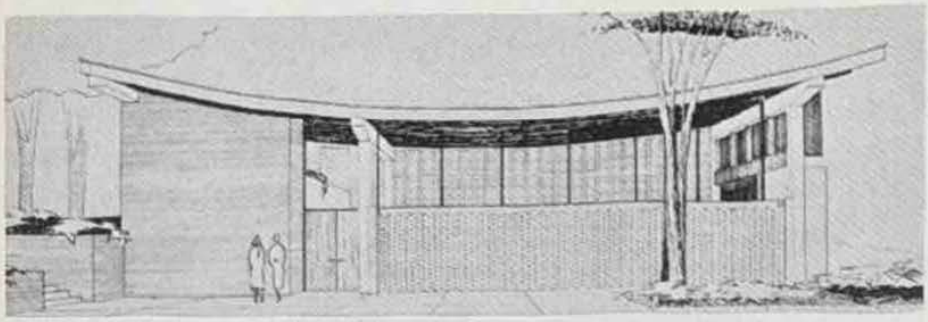
VOLUME 67, NUMBER 3

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place N., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Steelwork of U.S. Air Force Academy Chapel, Colorado Springs, Colo. (p. 23)—Skidmore, Owings & Merrill, Architects-Engineers; Stewart's photo.

PROJECT PREVIEW



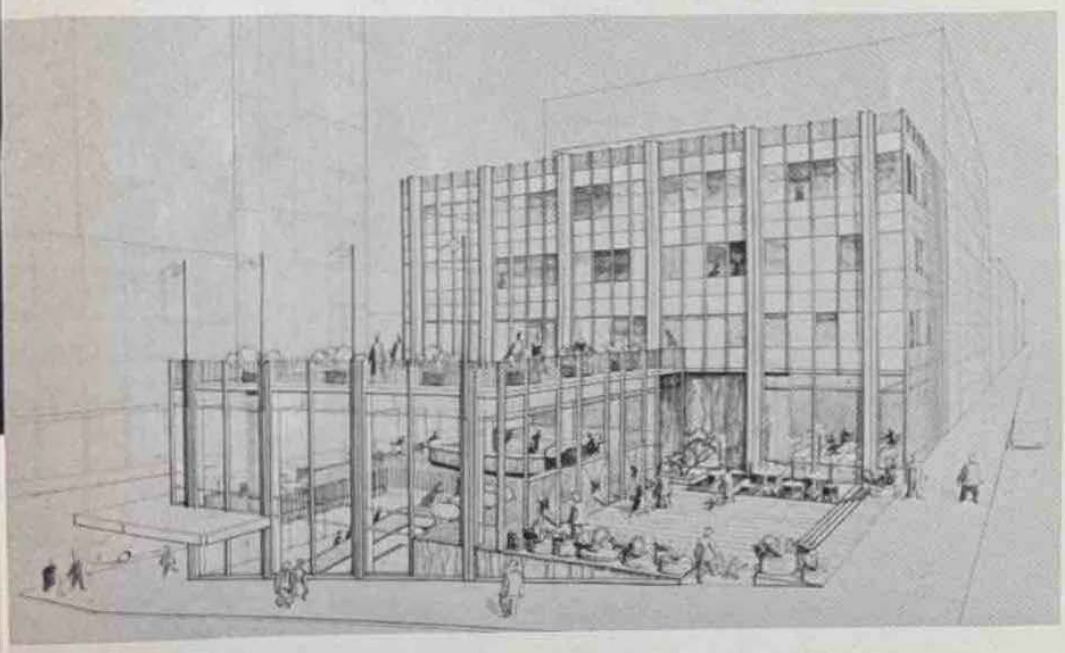
WOMEN'S CLUB

of Denver, well-established and highly regarded organization, will move to new location in reinforced concrete structure with laminated beams and t&g roof deck. Plan consists of auditorium with stage, kitchen facilities, office and storage space and meeting lounge. Architects: W. C. Muchow & Associates.



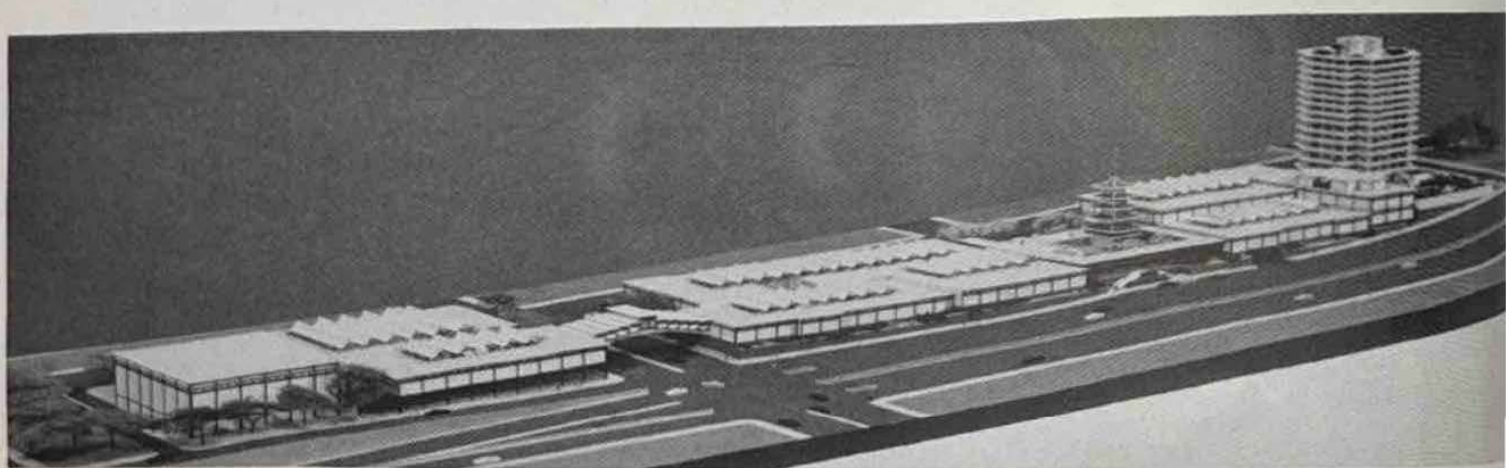
BUILDING COMPLEX

for Occidental Life Insurance Co. in Los Angeles include initial construction of nine-story service five-story parking structure and later erection of story office tower. Remodeling of existing nine-s building also will be part of $25 million progr Architects: William L. Pereira & Associates; struc al engineers: Brandow & Johnson.



HOME OFFICE

for Pacific First Federal Savings & Loan Associa in downtown Tacoma will have five stories basement, containing 35,000 sq. ft. Estimated to $1.5 million, structure will be designed to four additional floors. Aluminum curtain wall terior will incorporate glass and insulated pan Architects: Lea, Pearson & Richards; structural gineers: Smith & Murray.



JAPANESE CULTURAL AND COMMERCIAL CENTER

shown in preliminary model will occupy 1½ blocks in San Francisco's Western Addition redevelopment area. Costing $7 million, it will include 100-room eight-story hotel, $1 million Peace Pagoda to be backed by Japanese government, theater, restaurant and shops. Architects: Minoru Yamasaki & Associates.

As We Go To Press

. . . Highlights & Sidelights

PEACE ON THE PACIFIC—In an obvious gesture to help calm the turbulent waters which the Octagon has stirred up the past few years on the West Coast, the newly appointed AIA executive director, William H. Scheick, made a flying trip in January to meet with members in Los Angeles and Seattle; and just for good measure, he stopped off in Montana to be principal speaker when the Great Falls Society of Architects received the first "Outstanding Industry of the Year" plaque from the local Exchange Club.



IN LOS ANGELES: William H. Scheick (right) executive director of AIA, installs C. Day Woodford as head of Southern California Chapter.

COMING COMPETITION—Details on a national architectural competition being co-soponsored by the San Francisco Redevelopment Agency and the Northern California Chapter, AIA, for the Red Rock Hill development in Diamond Heights were scheduled to be released late in February.

HIGH-RISE IN HONOLULU—An ordinance to regulate building heights and density in hotel-apartment areas is again before the Honolulu City Council. Previously submitted proposals were opposed by spokesmen for small property owners on Waikiki. This time the City Planning Department is expected to sell the revised ordinance on the basis of features designed to protect smaller structures from being hemmed in by skyscrapers.

RESTORING THE RUINS—Machinery for the permanent restoration of San Francisco's Palace of Fine Arts, a hotly disputed project among architects and laymen as well, has been set in motion with the signing of an agreement covering its operation as a city-operated state park and the appointment of architects for the work: William Gladstone Merchant & Associates and Welton Becket & Associates. Merchant, who was one of the original designers of the building on Bernard R. Maybeck's staff in 1915, will work primarily with the exterior, while the Becket firm will concentrate on the interior.

January shows healthy $74 million gain

Building permit volume in the 13 western states for January totals $418,762,191, a welcome $74.5 million increase over the same period a year ago, divided almost equally between new housing starts and nonresidential construction. Number of permits also show an increase, up 2,033 to a total of 48,087.

Pickup in construction starts is widespread throughout the West. Only two states report decreases for January and these by slim margins. Largest increase on a statewide basis is in California, up $50 million. Other states, with amounts of increase, are Colorado, $8.2 million; Arizona, $5.5 million; Nevada, $2.8 million; Utah, $2.7 million; Washington, $2.1 million; Hawaii, $1.7 million; Idaho, $1 million; Montana, $637,000; Oregon, $99,999; and Alaska, $5,000. New Mexico's total dips $441,000 and Wyoming, $27,000.

In 10 states, number of permits issued also are up, ranging from a bare two in Alaska to an increase of 967 in Arizona. Wyoming and New Mexico both report decreases in number of permits issued, as well as California.

The residential picture closely follows the pattern for all types of construction. Total dollar volume for January is $217,785,236, an increase of $35.2 million over January 1960, and the number of family units started shows an increase of 2,330 for a total of 19,479. Again, in the state tabulations California leads the way with a $22 million increase over a year ago and number of units up 1,008.

Among the top 25 building permit agencies for January, 15 are in California, three in Washington, three in Arizona, two in Colorado and one each in Hawaii and Nevada. The appearance of Walla Walla County, Wash., in the list is due to a $6.5 million permit issued to Boise-Cascade Corp. for enlargements and additions to the firm's pulp mill and paper mill installation in the Burbank-Wallula area.

Top 25 agencies

		January 1961	January 1960
1.	Los Angeles	$52,811,653	$44,064,350
2.	Los Angeles County	19,076,145	16,728,924
3.	Sacramento	11,686,620	2,747,357
4.	San Francisco	11,132,884	3,727,872
5.	San Diego	9,475,600	11,700,478
6.	Honolulu	9,466,000	7,735,520
7.	San Jose	8,683,285	5,144,995
8.	Phoenix	8,280,030	6,135,228
9.	Sacramento County	7,697,957	7,818,163
10.	Maricopa County, Ariz.	7,286,301	None
11.	Walla Walla County, Wash.	6,570,585	6,360
12.	San Diego County	6,397,700	9,492,400
13.	Seattle	6,252,020	7,294,517
14.	Ventura County, Calif.	6,242,129	5,130,420
15.	Denver	5,824,436	4,139,450
16.	King County, Wash.	5,641,737	8,929,500
17.	Orange County	5,551,539	1,679,027
18.	Long Beach	4,865,930	4,552,750
19.	Oakland	4,805,786	2,727,975
20.	Tucson	4,603,093	3,222,452
21.	Huntington Beach, Calif.	4,597,587	218,414
22.	Las Vegas	4,176,116	2,582,302
23.	Riverside County, Calif.	4,096,239	3,374,368
24.	Jefferson County, Colo.	3,904,366	2,260,900
25.	San Bernardino County	3,806,430	2,872,699

For a complete tabulation of nearly 500 building permit agencies in the 13 western states for January, see the following two pages.

Building Permit Totals for

CALIFORNIA	Residential	Total
Alameda	$ 553,200	$ 1,076,184
Alameda County	1,823,550	2,556,400
Albany	56,000	79,610
Alhambra	240,000	719,151
Anaheim	1,476,500	2,514,092
Antioch	79,699	188,176
Arcadia	404,244	626,643
Arroyo Grande	48,000	73,240
Artesia	141,900	159,400
Atherton	177,075	226,999
Atwater	35,157	62,951
Auburn	90,145	114,044
Avalon	38,600	41,700
Azusa	255,500	332,295
Bakersfield	1,139,796	1,799,011
Baldwin Park	350,170	444,175
Banning	190,575	230,549
Barstow	Nil	52,071
Bell	132,500	169,140
Bellflower	157,400	261,690
Belmont	402,000	585,000
Benicia	No reply	No reply
Berkeley	55,000	1,019,309
Beverly Hills	1,844,000	3,087,300
Bradbury	31,000	35,200
Brawley	371,900	445,700
Brea	34,715	162,363
Buena Park	1,002,335	1,464,031
Burbank	138,000	534,168
Burlingame	88,000	719,664
Butte County	Nil	146,300
Calexico	Nil	7,570
Campbell	730,196	781,162
Carlsbad	34,000	86,000
Carmel	Nil	484,100
Chico	112,512	155,587
Chino	544,522	562,222
Chula Vista	61,000	142,815
Claremont	247,200	270,310
Coalinga	Nil	7,050
Colton	28,636	97,646
Commerce	Nil	62,025
Compton	15,000	209,333
Concord*		2,439,770
Contra Costa Co.	2,035,650	2,691,387
Corona	402,916	531,699
Coronado	No reply	No reply
Corte Madera	308,696	460,746
Costa Mesa	1,899,191	2,278,290
Covina	78,050	122,886
Cudahy	280,500	294,300
Culver City	8,000	133,087
Dairy Valley	24,000	86,100
Daly City	445,003	516,178
Davis	298,000	307,570
Delano	50,136	84,836
Downey	1,175,450	1,608,005
Duarte	Nil	23,750
El Cajon	18,000	866,721
El Centro	121,500	216,387
El Cerrito	134,535	189,199
El Dorado County	219,808	866,596
El Monte		136,045
El Segundo	95,800	889,953
Emeryville	Nil	500
Escondido	71,778	221,430
Eureka	155,700	288,976
Fairfield	82,332	214,221
Fillmore	8,160	39,173
Fontana	67,954	313,706
Fremont	1,420,790	1,508,685
Fresno	1,585,824	2,466,448
Fresno County	529,886	1,002,732
Fullerton	333,688	1,876,515
Glendale	855,035	1,215,780
Glendora	958,300	1,071,400
Half Moon Bay	34,000	34,300
Hanford	345,930	414,375
Hawthorne	424,450	732,647
Hayward	625,000	1,209,298
Hemet	91,000	143,606
Hermosa Beach	54,332	82,977
Hillsborough	107,000	166,110
Holtville	Nil	89,888
Humboldt County*		67,850
Huntington Beach	4,469,483	4,597,587
Huntington Park	29,000	169,763
Imperial County	Nil	13,000
Indio	19,160	231,564
Industry	Nil	364,950
Inglewood	850,300	1,204,796
Irwindale	Nil	18,480
Kern County	863,254	1,397,518
Laguna Beach	279,000	1,289,445
La Habra	108,296	159,047
Lakewood	64,000	172,100
La Mesa	275,860	583,548
La Puente	74,800	98,450
La Verne	10,000	191,425
Lawndale	232,100	322,830
Lindsay	10,000	13,476
Livermore	280,459	313,034
Lodi	183,450	211,300
Lompoc	906,360	993,024
Long Beach	2,636,945	4,865,930
Los Altos	253,522	283,522
Los Angeles		52,811,653
Los Angeles Co.	15,541,650	19,076,145
Los Gatos	653,000	708,040
Lynwood	58,500	125,201
Madera	No reply	No reply
Madera County	43,000	435,635
Manhattan Beach	160,650	244,223
Manteca	146,870	166,870
Marin County	875,393	951,813
Martinez	537,620	1,970,840
Marysville	170,000	204,415
Maywood	18,000	42,648
Menlo Park	134,500	442,515
Merced	121,539	294,326
Merced County	213,686	712,286
Millbrae	225,000	317,800
Mill Valley	171,500	304,620
Mirada Hills	Nil	41,600
Modesto	421,000	604,556
Monrovia	47,770	79,311
Montclair	295,115	408,150
Montebello	127,243	324,442
Monterey	120,950	477,326
Monterey County	610,960	891,475
Monterey Park	502,930	562,496
Mountain View	390,963	557,053
Napa	194,885	373,302
Napa County	92,365	668,006
National City	58,705	368,105
Newport Beach	1,021,340	2,921,459
North Sacramento	391,202	402,150
Norwalk	640,900	812,640
Novato	240,400	240,400
Oakdale	87,959	118,474
Oakland	2,061,640	4,805,786
Oceanside	559,500	595,165
Ojai	5,000	93,625
Ontario	88,950	382,875
Orange	1,291,086	1,489,967
Orange County	5,194,541	5,551,539
Oroville	12,807	30,954
Oxnard	137,000	335,020
Pacifica	153,700	234,550
Pacific Grove	167,000	209,243
Palm Springs	60,800	1,396,365
Palo Alto	162,000	1,924,635
Palos Verdes Est.	491,088	636,043
Paramount	285,100	341,800
Pasadena	515,228	1,385,335
Paso Robles	13,800	30,120
Pico Rivera	69,700	465,280
Piedmont	20,000	70,356
Pinole	185,867	236,712
Pittsburg	42,334	79,505
Placentia	Nil	24,400
Placer County	384,074	506,674
Pleasanton*		119,247
Pomona	528,980	2,413,628
Porterville	20,000	57,795
Port Hueneme	18,000	53,650
Red Bluff	12,000	21,200
Redding	11,000	141,959
Redlands	374,900	1,059,313
Redondo Beach	237,204	371,574
Redwood City	911,970	1,148,680
Richmond	375,743	647,275
Riverside	298,500	902,730
Riversdie County	2,577,371	4,096,239
Rolling Hills	27,000	32,300
Rolling Hills Est.	156,300	176,650
Rosemead	14,000	45,530
Roseville	39,500	45,109
Sacramento	2,246,500	11,686,620
Sacramento Co.	4,176,494	7,697,957
St. Helena	53,946	53,946
Salinas	188,000	323,075
San Bernardino	505,665	1,817,737
San Bernardino Co.	2,368,614	3,806,430
San Bruno	163,500	332,300
San Carlos	104,500	217,455
San Clemente	255,685	
San Diego	5,270,079	
San Diego County	2,759,500	
San Dimas	106,000	
San Fernando	40,750	
San Francisco	1,954,400	
San Gabriel	16,700	
Sanger	23,000	
San Jacinto	7,680	
San Joaquin Co.	434,595	
San Jose	6,167,100	
San Leandro	262,000	
San Luis Obispo	548,800	
San Luis Obis. Co.	344,197	
San Marino	31,216	
San Mateo	60,750	
San Mateo County	482,500	
San Pablo	240,535	
San Rafael	206,175	
Santa Ana	1,160,900	
Santa Barbara	969,200	
Santa Barbara Co.	1,502,600	
Santa Clara	1,002,500	
Santa Clara County	864,600	
Santa Cruz	208,718	
Santa Cruz County	744,080	
Santa Fe Springs		
Santa Maria	2,040,120	
Santa Monica	898,841	
Santa Paula	25,486	
Santa Rosa	669,150	
Sausalito	180,000	
Seal Beach	167,651	
Seaside	262,000	
Selma	5,000	
Shasta County	64,275	
Sierra Madre	163,200	
Solano County	53,600	
Sonoma County	589,595	
South Gate	164,200	
South El Monte	Nil	
South Pasadena	117,515	
So. San Francisco	108,575	
Stanislaus County	802,350	
Stockton	788,309	
Sunnyvale	795,500	
Temple City	109,800	
Torrance	1,927,550	
Tracy	12,000	
Tulare	51,300	
Tulare County	265,495	
Turlock	53,309	
Ukiah	30,200	
Upland	458,350	
Vacaville	Nil	
Vallejo	371,200	
Ventura	381,458	
Ventura County	5,559,685	
Visalia	225,159	
Walnut	24,200	
Walnut Creek	168,500	
Wasco	18,500	
Watsonville	52,300	
West Covina	308,660	
Whittier	309,700	
Woodland	228,580	
Woodside	86,500	
Yolo County	120,325	
Yreka	36,500	
Yuba City	308,600	
Yuba County	No replay	No rep
TOTAL	$157,616,627	$293,854,2

*No breakdown of figures available

OREGON	Residential	Tot
Albany	$ 114,000	$ 138,5
Ashland	50,500	60,2
Astoria	8,000	10,4
Baker	12,500	16,4
Beaverton	201,127	212,1
Bend	16,000	55,2
Central Point	30,000	30,8
Clackamas County	241,100	322,8
Coos Bay	44,500	71,7
Corvallis	103,500	282,6
Dallas	20,000	34,0
Douglas County*		55,8
Eugene	298,025	635,7
Forest Grove	35,000	47,8
Grants Pass	77,000	82,9
Gresham	25,000	34,7
Hermiston	63,130	185,2

3 Western States for January

Hillsboro	279,100	292,200
Hood River	Nil	7,421
Klamath Falls	38,000	82,200
La Grande	30,708	111,258
Lane County	630,407	1,009,496
Lebanon	Nil	1,250
Marion County	544,400	593,425
McMinnville	15,000	18,600
Medford	159,500	1,362,279
Milton-Freewater	Nil	5,878
Multnomah County	1,212,225	2,710,984
Newburg	13,000	20,500
Newport	12,500	23,000
North Bend	Nil	24,829
Ontario	4,500	5,500
Oregon City	35,000	95,724
Oswego	106,730	164,870
Pendleton	Nil	132,175
Portland	345,750	2,144,590
Prineville*		5,100
Roseburg	29,215	454,979
St. Helens	12,000	12,000
Salem	135,575	336,385
Seaside	51,757	54,321
Springfield	53,968	161,455
The Dalles	12,000	27,880
Washington County	616,345	968,559
TOTAL	**$ 5,677,062**	**$ 13,104,474**

WASHINGTON	Residential	Total
Aberdeen	$ 21,000	$ 41,450
Anacortes	34,000	221,378
Auburn	92,000	109,200
Bellevue	302,150	340,925
Bellingham	41,000	227,480
Bremerton	Nil	43,675
Camas	Nil	7,285
Centralia	60,362	78,701
Chehalis	10,000	27,325
Clark County	275,400	317,800
Clarkston	Nil	3,000
Ellensburg	Nil	11,350
Enumclaw	24,000	24,100
Ephrata	Nil	3,770
Everett	72,966	103,378
Grays Harbor Co.	28,500	32,500
Hoquiam	Nil	Nil
Island County	68,500	103,350
Kelso	22,500	68,017
Kennewick	12,000	35,100
Kent	83,400	185,100
King County	4,890,440	5,641,737
Kirkland	48,000	49,100
Longview	127,000	294,574
Mercer Island	236,500	253,350
Montesano	No reply	No reply
Moses Lake	160,921	175,648
Olympia	58,000	204,917
Pasco	205,250	242,230
Pierce County	1,659,500	1,947,995
Port Angeles	Nil	3,700
Port Orchard	Nil	Nil
Pullman	53,466	55,216
Puyallup	No reply	No reply
Renton	118,000	273,452
Seattle	1,003,500	6,252,020
Shelton	11,000	59,500
Spokane	296,800	648,364
Spokane County	253,980	472,141
Sunnyside	27,000	32,550
Tacoma	524,885	991,610
Vancouver	218,550	505,647
Walla Walla	37,000	65,171
Walla Walla Co.	46,000	6,570,585
Wenatchee	12,500	42,078
Yakima	62,700	129,050
TOTAL	**$ 11,198,770**	**$ 26,895,519**

ALASKA	Residential	Total
Anchorage	$ Nil	$ 58,178
Fairbanks	No reply	No reply
Juneau	Nil	8,750
Ketchikan	Nil	57,000
Sitka	No reply	No reply
TOTAL	**$ Nil**	**$ 123,928**

IDAHO	Residential	Total
Alameda	$ 145,500	$ 159,900
Blackfoot	Nil	5,700
Boise	88,600	1,242,117
Caldwell	16,500	35,020
Coeur d'Alene	Nil	6,600
Idaho Falls	161,602	219,687
Jerome	No reply	No reply
Lewiston	20,000	47,208
Moscow	29,500	40,500
Nampa	61,000	78,355
Payette	24,000	25,500
Pocatello	62,500	84,585
Sandpoint	Nil	Nil
St. Maries	8,500	8,500
Twin Falls	7,000	21,100
TOTAL	**$ 624,702**	**$ 1,974,772**

MONTANA	Residential	Total
Anaconda	$ 51,500	$ 55,900
Billings	494,400	783,709
Bozeman	Nil	37,145
Butte	Nil	22,500
Cut Bank	Nil	3,000
Glasgow	96,500	112,500
Glendive	Nil	2,000
Great Falls	628,881	674,553
Havre	75,000	76,900
Helena	34,500	77,280
Kalispell	Nil	15,400
Lewistown	20,000	23,500
Livingston	11,000	11,500
Malta	Nil	Nil
Miles City	Nil	7,147
Missoula	Nil	31,197
TOTAL	**$ 1,411,781**	**$ 1,934,231**

WYOMING	Residential	Total
Casper	$ 92,000	$ 176,975
Cheyenne	192,000	328,733
Cody	28,200	44,300
Laramie	18,000	251,500
Rawlins	14,000	24,600
Riverton	106,050	300,040
Rock Springs	38,000	58,000
Sheridan	67,000	97,630
TOTAL	**$ 555,250**	**$ 1,281,778**

COLORADO	Residential	Total
Adams County	$ 1,659,000	$ 1,904,120
Alamosa	Nil	600
Arapahoe County	801,190	1,238,279
Arvada	No reply	No reply
Aspen	Nil	5,550
Aurora	988,552	1,222,044
Boulder	299,300	1,360,365
Boulder County	194,000	469,394
Canon City	No reply	No reply
Colorado Springs	533,763	954,046
Cortez	Nil	500
Denver	1,675,080	5,824,436
Durango	52,060	60,560
El Paso County	317,500	498,445
Englewood	54,200	181,026
Estes Park	10,250	36,750
Fort Collins	331,500	484,915
Fort Morgan	32,282	38,682
Golden	41,120	152,060
Grand Junction	20,950	83,650
Greeley	220,300	1,594,334
Jefferson County	3,041,157	3,904,366
La Junta	15,000	405,000
Lamar	13,000	61,000
Littleton	559,850	665,755
Longmont	103,900	330,009
Loveland	67,575	153,675
Monte Vista	14,000	14,000
Montrose	11,000	18,174
Pueblo	156,860	479,298
Pueblo County	51,000	92,000
Sterling	Nil	345,000
Trinidad	10,617	13,400
Walsenburg	8,000	11,250
Westminster	86,485	277,022
TOTAL	**$ 11,369,491**	**$ 22,879,705**

UTAH	Residential	Total
American Fork	$ 9,000	$ 115,250
Bountiful	221,900	232,400
Brigham City	371,500	459,800
Cedar City	35,000	42,900
Clearfield	53,000	264,000
Davis County	2,796	1,138,866
Kaysville	16,700	28,600
Layton	255,888	263,888
Logan	28,400	40,100
Murray	60,000	78,300
Ogden	238,575	1,549,575
Orem	196,000	206,425
Price	Nil	8,000
Provo	90,000	321,350
Salt Lake City	437,900	1,247,238
Salt Lake County	1,767,900	1,952,000
So. Salt Lake City	Nil	75,100
Spanish Fork	Nil	10,650
Tooele	130,000	145,210
Utah County	77,100	382,776
Weber County	18,000	20,000
TOTAL	**$ 4,009,659**	**$ 8,582,428**

NEVADA	Residential	Total
Boulder City	$ 11,000	$ 5,845
Clark County	No reply	No reply
Elko	No reply	No reply
Las Vegas	2,391,237	4,176,116
North Las Vegas	601,498	929,690
Reno	729,820	1,459,854
Sparks	8,000	30,626
Washoe County	297,338	427,146
TOTAL	**$ 4,038,893**	**$ 9,187,988**

ARIZONA	Residential	Total
Buckeye	$ 10,000	$ 35,150
Casa Grande	No reply	No reply
Chandler	37,379	93,584
Douglas	47,225	60,739
Flagstaff	21,416	44,704
Florence	Nil	Nil
Glendale	125,425	170,075
Maricopa County	5,460,653	7,286,301
Mesa	515,870	697,966
Miami	No reply	No reply
Phoenix	3,905,690	8,280,030
Pima County	1,662,500	1,896,856
Prescott	43,600	97,850
Scottsdale	No reply	No reply
Tempe	532,500	579,639
Tucson*		4,603,093
Wickenburg	10,900	23,200
Winslow	111,300	143,900
Yuma	42,800	60,165
TOTAL	**$ 12,527,258**	**$ 24,073,252**

NEW MEXICO	Residential	Total
Alamogordo	$ Nil	$ 258,502
Albuquerque	1,321,292	2,675,729
Artesia	65,500	80,105
Carlsbad	102,600	282,300
Clovis	219,865	262,237
Deming	95,500	122,300
Farmington	117,000	203,564
Gallup	18,458	82,271
Hobbs	17,000	38,300
Las Cruces	136,900	169,300
Las Vegas	8,000	11,100
Lovington	69,000	70,030
Raton	No reply	No reply
Roswell	651,200	725,400
Santa Fe	36,100	86,770
Silver City	20,553	23,053
Truth or Cons.	8,000	10,275
Tucumcari	20,000	20,600
Tularosa	12,096	33,096
TOTAL	**$ 2,919,064**	**$ 5,154,932**

HAWAII	Residential	Total
Hawaii County	$ 222,318	$ 630,522
Honolulu	5,458,065	9,466,000
Maui County	176,296	418,069
TOTAL	**$ 5,856,679**	**$ 10,514,591**
GRAND TOTAL	**$217,785,236**	**$418,762,191**

CCAIA leads private architects in battle against state

California architects are currently arming for battle against a quartet of measures already in the legislative mill which, if passed, would virtually eliminate the use of private architects in all public work.

Two of the measures—Senate Bill 191 and Senate Bill 328—were introduced late in January by Sen. Virgil O'Sullivan, an attorney from Colusa County. SB 191 would enable the Department of Public Works (of which the State Division of Architecture is a part) to perform architectural and related services for any school district; its companion bill would allow the department to perfom similar services for "any county, district or subdivision of the state."

Further restrictions on the use of private architects are contained in Senate Bill 70 and AB 771, an assembly counterpart. These bills would repeal the authority of the newly created Board of State College Trustees to use either the State Division of Architecture or private architects and engineers for campus planning and building design and would limit it strictly to the former. (Prior to the formation of this new board of trustees, all state college architecture was allocated to the Division of Architecture, with the result that state campuses so designed have been highly deplored as both sterile visually and wasteful economically.)

Viewing these bills as a very real threat to the private practice of architecture, Californa architects, led by the California Council, AIA, are preparing facts and figures on the relative merits of private vs. division architects with which to bombard legislators.

Investigation at the state capitol, according to the CCAIA, has revealed that SB 191 and 328 were introduced by O'Sullivan at the direct behest of the Division of Architecture, which has long been accused of trying to build up an empire. (O'Sullivan, Californians remember, was also the author of a bill introduced in 1959 which would have established a confiscatory pool of duplicate school plans. The CCAIA successfully prevented the measure from getting out of committee.)

Involved in the impending legislative battle will be all of the factors which have made the State Division of Architecture the center of growing controversy: the question as to whether the state belongs in the practice of architecture and engineering at all; the effect of state involvement on the normal relationship between architect and client; the relative cost of projects designed by the division and by private firms; and the overall quality of work which the division has produced.

In the center of the controversy is State Architect Anson P. Boyd. Most recent attack on him came, not from architects, but from the Government Organization Committee, which charged him with favoritism in awarding state architectural contracts to private firms, which is now permissable under state law when the division's workload makes it necessary for it to farm out certain projects. The committee charged that within the past five years, four firms have allegedly received the lion's share of state architectural contracts. It is interesting to note that one of these firms is headed by Harold P. Norton, former legislative lobbyist for the State Department of Public Works.

Another powerful opponent which the CCAIA faces is the California State Employee Association. A highly vocal, if often highly inaccurate body, the CSEA is already calling the authority of the Board of State College Trustees to make its own selection of architects "a return of the spoils system" and has issued a report which in essence attacks private architects as irresponsible, profit-hungry and wasteful practitioners.

Latest word indicates that AB 771 will be heard on March 20 before the Assembly Education Committee. Apparently the senate, using the assembly hearings as a trial balloon, will delay hearings on its own trio of anti-private architect bills until some time after the March 20 date.

Queen Emma controversy continues in Honolulu

Queen Emma undoubtedly has turned over in her grave more than once as a result of the hassle which has developed over the project named after her by the Honolulu Redevelopment Agency.

Fireworks started as soon as the HRA gave a tentative nod, from a field of six bidders, to Queen Emma Associates, a combine of Honolulu and Beverly Hills, Calif., developers, with Adrian Wilson of Los Angeles as architect.

George V. Whisenand, architectural consultant to the HRA, issued a statement rapping the choice as a "serious mistake." The Hawaii Chapter, AIA, which termed the decision "ill co ered" and urged that it "be care reconsidered," followed up by o ing its services in selecting a p to review the proposals.

Plans prepared by Queen E Associates, which bid $1,254,140 $3.50 per square foot for 8.3 acre central Honolulu, call for 560 u mainly contained in three high structures.

Proceedings became more com cated when the HRA invited the bidders to resubmit their propos although one combine, Queen E Gardens, Ltd., said it would not d

"Your reopening of submittals this time can only aid those who mitted faulty or careless proposals letter to the HRA declared. "Th proposals which were intellige and carefully made cannot be ju fiably changed at this time inasm as there has been no change in co tions or requirements for the proj We therefore leave our proposal cisely as it was originally submitte

The project became front page n in mid-February when Mayor Blaisdell, defending an unpublic trip to Las Vegas with one of Queen Emma participants, accu disgruntled bidders of stirring u "needless controversy" and called a public hearing on the whole aff

Whisenand's complete statement

"As long as the Honolulu Redev opment Agency had the matter selecting a sponsor for the Qu Emma project under advisement, would have been unfair both to t city and to the various sponsors me to have commented publicly the proposals. Now that a decis has been announced, however, and t HRA is using my status as a consu ant to the agency to support its d cision, I feel that the record must clarified.

"The HRA (in its letter quoted Honolulu Advertiser, January 1961) infers that as its architectu consultant, I concur in the selecti for the Queen Emma project sponso ship. I can now emphatically sta that I do not concur and that recommendation to the HRA ma that position very clear.

"The HRA has made a serious m take in its action. At least four of t six proposals were architecturally s perior to the selected proposal. Whi my instructions from the HRA we to avoid in my report direct compar sons between the projects or n merical 'ratings,' my reports to t HRA, both oral and in writing, poin ed out design defects of such seriou magnitude as to make this selecti incomprehensible.

"Sponsors for projects of this ty must invest many thousands of do



lars in design studies, plans and models. Unless they are convinced that the HRA's decisions are made on a basis of technical merit, future projects will attract neither capable designers nor qualified sponsors.

"The HRA lists a number of factors to be considered in evaluating the proposals submitted. Contrary to the idea expressed by the HRA, architecture is not limited to the exterior appearance of a building and its quality is not determined solely by one's 'taste in architecture.' Of the factors it lists, architectural design has a direct bearing on the economic feasibility, the rent levels, the size of the apartments, the marketability and the livability. The only factors it does not influence are the experience and financial responsibility of the sponsor and the price offered for the land.

"The HRA has chosen to disregard the advice of its architectural consultant and to rely solely on its own untrained 'taste in architecture.'

"The Federal Housing and Home Finance Agency must still approve the HRA selection. It is to be hoped that it will review the technical reports and refuse to accept anything less than the best possible proposal for the Queen Emma project."

Seven buildings in West win AIA design awards

One of the seven Honor Award buildings in the 1961 National AIA competition is the Fernando Rivera Elementary School, in San Francisco designed by Mario J. Ciampi and Paul Reiter, associate.

Of the 11 Awards of Merit, five are projects located in California and one in Colorado: Ivory Tower Restaurant, Santa Monica, Richard Dorman & Associates; Marin Bay Display Pavilion, San Rafael, Bay Group Associates (Daniel H. Bushnell, Lun Chan, Ichiro Sasaki, Camiel Van De Weghe); Cambirdge Investments Office Building, Long Beach, Killingsworth, Brady, Smith & Associates; Crown Zellerbach Building, San Francisco, Hertzka & Knowles and Skidmore, Owings & Merrill; Willow Creek Apartments, Palo Alto, John Carl Warnecke & Associates; and Denver Hilton Hotel, Denver, I. M. Pei & Associates.

Goff addresses architects in Southern California

One of architecture's most controversial figures commanded the attention of more than 300 of his colleagues when the Southern California Chapter, AIA, held its February meeting in the new Los Angeles office building of Welton Becket & Associates.

It is difficult to say who stole the show: the handsome structure housing one of the nation's largest architectural-engineering firms or Bruce Goff, a voice to be reckoned with out of Bartlesville, Okla.

"Architects should be tolerant of other architects," he said, "because there SHOULD be many kinds of architecture."

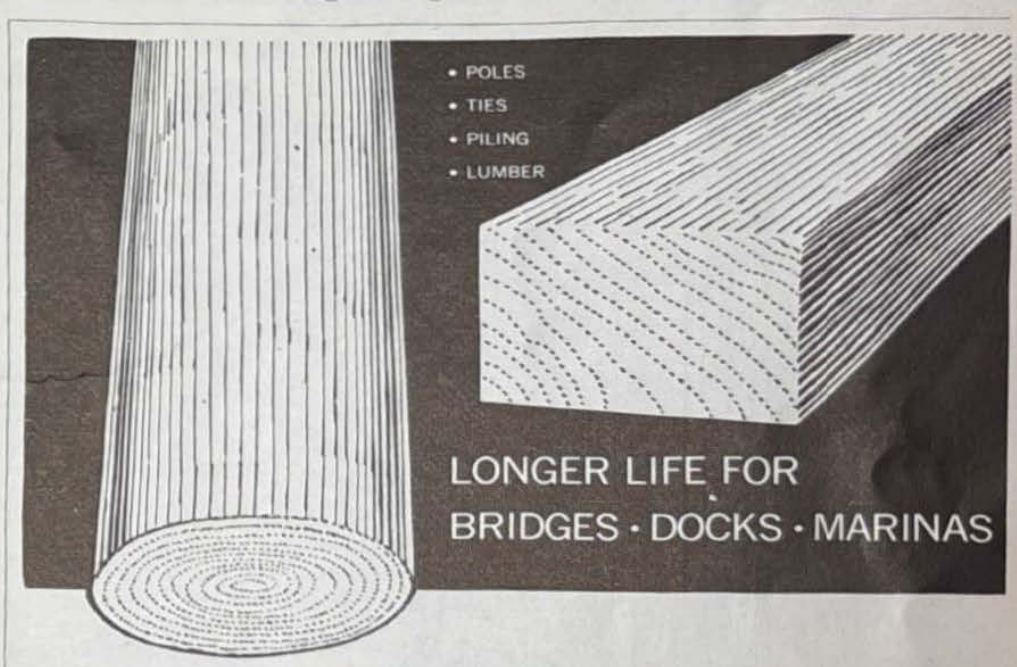
Goff said he believes that architecture should work for an effect since that is what distinguishes the architect from the builder. He added this point of emphasis: "A good building is not necessarily good architecture, but good architecture always is a good building."

The Oklahoman started his architectural training at the age of 12 in the Tulsa office of Rush, Endacott & Rush. Endacott, an engineer, gave him encouragement and advised the young man that "the way you're headed, you had better get an iron helmet because you're going to be in no-man's land all your life." This prophecy held true when he became one of the first admirers of Frank Lloyd Wright.

Goff explained that every architect must find his own way and should not worry about having his own style; instead, every building should have its own style.

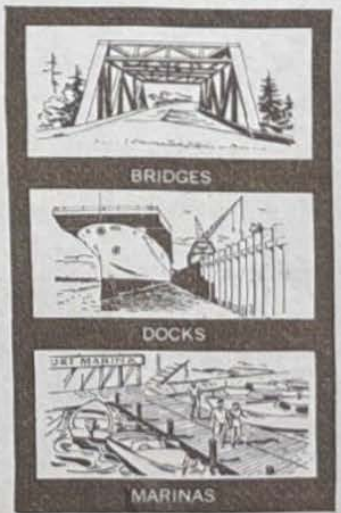
"Rhythm is important to beauty and should never be forgotten in design," he said. "The architect must keep searching for what beauty really is."

Goff was brought to Los Angeles by the Architectural Guild. During his stay he conducted two seminars at the University of Southern California's School of Architecture.



WITH **McCORMICK & BAXTER**

PRESSURE-TREATED PILING & TIMBER



Build for permanence and economy with pressure-treated wood that protects against insects, marine borers, decay, splintering and checking for up to seven times as long as untreated wood. Ideal for construction of pleasure craft marinas.

McCormick & Baxter offers pressure-treatment with—
• Coal tar creosote • Penta and paintable water-repellent Penta • Boliden Salts and Copperized Boliden Salt.

COMPLETE TIMBER PREFABRICATING FACILITIES

McCORMICK & BAXTER
CREOSOTING COMPANY
P. O. Box 3344, PORTLAND, ORE.
485 California St., SAN FRANCISCO, CALIF.
110 W. Ocean Blvd., LONG BEACH, CALIF.

new offices, partnerships

Willard D. Johnson has opened his own office for the practice of architecture at 16th and Grand Avenue, Billings, Mont. He had been a partner in the firm of Loners, Stroebe & Johnson.

The Los Angeles architecural firm of Caughey & Ternstrom has been succeeded by Ternstrom & Skinner. Principals are Clinton Ternstrom and Robert H. Skinner, who formerly maintained his own office in Beverly Hills.

Don Hatch has become associated with Bolton White, Jack Hermann and Allan Steinau in the San Francisco architectural firm of Hatch, White Hermann & Steinau.

new addresses

Chopas & Starkovich, architects, to 4747 N. 16th St., Phoenix.

Mario Gaidano, architect, to 2134 Van Ness Ave., San Francisco.

Design Associates, Ltd. (Frank Slavsky, architect, and L. Harold Whitaker, designer) to 201 Halau Bldg., International Market Place, Honolulu.

R. Lindsey Lamberson, architect, to 70 Rio Serena Ave., Campbell, Calif.

James Longwood, architect, to 2505 Capital Drive, Eugene.

Donald Campbell, architect, to 7529 Girard Ave., La Jolla, Calif.

Percy George Ball, architect, to Busch's Professional Building, 616 S. Orchard St., Tacoma.

Manuel P. Mendez, architect, to 900 N. Broadway, Santa Ana, Calif.

Frank Shell and Charles Hoyt, architects, to 3607 S.W. Corbett St., Portland.

C. Neal Carpenter, architect, to 911 16th St., Greeley, Colo.

Lutes & Amundson, architects-community planners, to 200 S. Mill St., Springfield, Ore.

deaths

R. W. Bradley, who retired from the practice of architecture in Cheyenne, Wyo., three years ago, died December 14 in Sarasota, Fla., at the age of 79. For a number of years he was a partner in the firm of Porter & Bradley, now Porter & Porter.

elections, appointments

California State Board of Architectural Examiners has elected Howard Friedman of San Francisco as president and Joseph Johnson of Los Angeles as secretary. C. J. Paderewski of San Diego retired from the board in January, following 12 years of continuous service. He served as secretary of the six-man body in 1951, as president in 1953 and again three years later.

San Diego Chapter, AIA, has named this slate of officers: Robert E. Des Lauriers, president; Richard Lareau, vice president; Daniel A. Perkins, secretary; and James W. Bird, treasurer.

Reno Chapter, AIA, has elected Graham Erskine as president; John Calef, vice president; Edward Parsons, secretary; and Theodore Selden, treasurer.

Oregon Chapter, AIA, has picked Everett B. Franks to head its officers for 1961. Others are Robert B. Martin, vice president; John Foster, secretary; and Neil Farnham, treasurer.

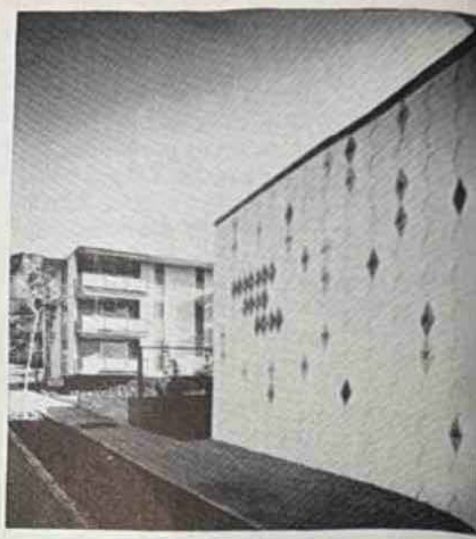
Los Angeles architect Charles Luckman, recently named to the Board of Trustees of the California State Colleges, has been elected chairman of the planning, buildings and grounds committee and a member of the educational policy committee.

The San Francisco Art Commission has named Burton L. Rockwell to replace Clarence O. Peterson as architect member.

Ben H. O'Connor has joined Charles Luckman Associates, Los Angeles architects-engineers, as a project architect. Formerly a partner in the firm of Lunden, Hayward & O'Connor, he has had 39 years of professional experience.

congratulations

George W. Bird, pioneer Montana architect, celebrated his 100th birthday February 3 in Great Falls. He was employed by Paris Gibson, founder of the city, to lay out streets, parks and boulevards and was a member of the firm of Bird & Van Teylingen, which planned many schools and churches in the area.



APARTMENT BUILDINGS (Diamond Head G dens, Diamond Head Alii and Diamond He Surf), Kapiolani Park: Lemmon, Freeth, Hai & Jones, architects.

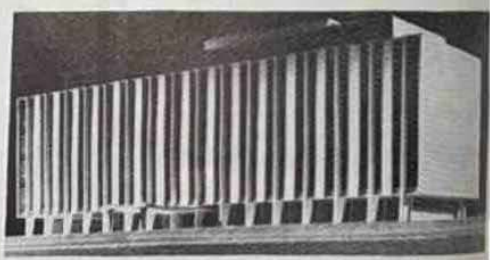
Hawaii AIA Honor Award shared by four firms

Seven projects on Oahu won recog nition—six Honor Awards and on Honorable Mention—for four archi tectural firms in the 1960 competitio of the Hawaii Chapter, AIA. Manil architect Leandro V. Locsin also re ceived the Pan-Pacific Architectura Citation at the annual dinner in th Reef Hotel January 27.

A special award to the allied art went to artist Ben Norris for his col lages in the First National Ban Branch on Kapiolani Boulevard, i the Royal Hawaiian Hotel and at th University of Hawaii.

A certificate of appreciation wa presented to William Furer, a founde of the local AIA chapter, who recentl retired as head of the Hawaii Boar of Registration for Professional Engi neers, Architects and Surveyors.

The citation to 32-year-old Locsi was based on his "consistent excel lence in design" for commercial build ings, churches, residences, etc.



HOUSE OF INVESTMENTS BUILDING in Manila is among projects designed by Leandro V. Locsin, winner of Pan-Pacific Architectural Ci tation. Built of reinforced concrete, it has flexible, columnless interior space.

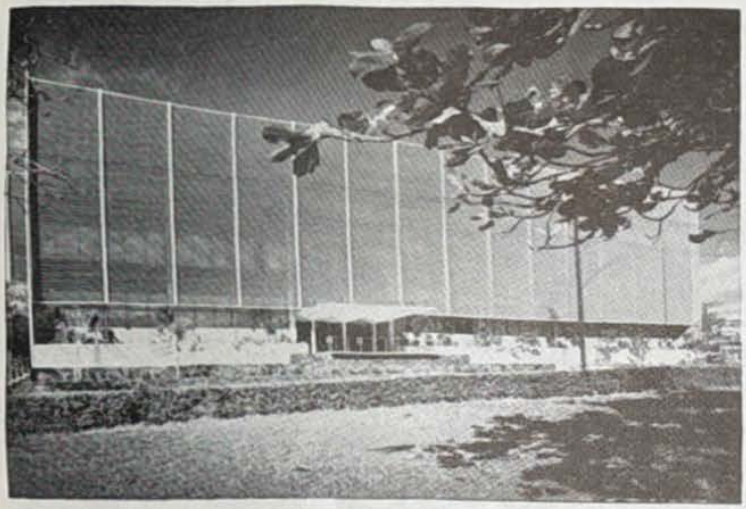
R. Wenkam photos (except as noted)



WINDWARD CITY SHOPPING CENTER, Kaneohe (PA&B, Nov. '59): Wimberly & Cook Ltd., architects.



MRS. KATHARINE CALDWELL RESIDENCE, Laie: Johnson & Perkins, architects.

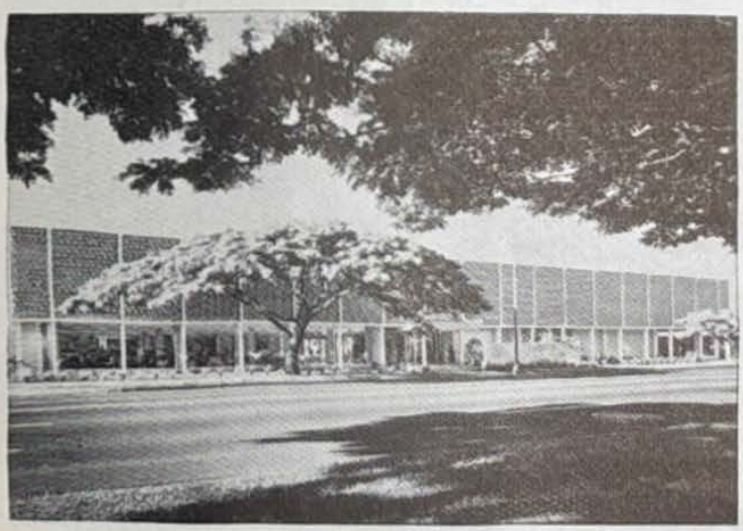


HOME INSURANCE CO. BUILDING, Honolulu: Wimberly & Cook, Ltd., architects.



HAROLD L. WHITAKER RESIDENCE, Waialae-Kahala: Design Associates (Frank Slavsky, architect, and Harold L. Whitaker, designer).

Camera Hawaii



FIRST NATIONAL BANK BRANCH, Honolulu (PA&B, March '60): Wimberly & Cook, Ltd., architects.

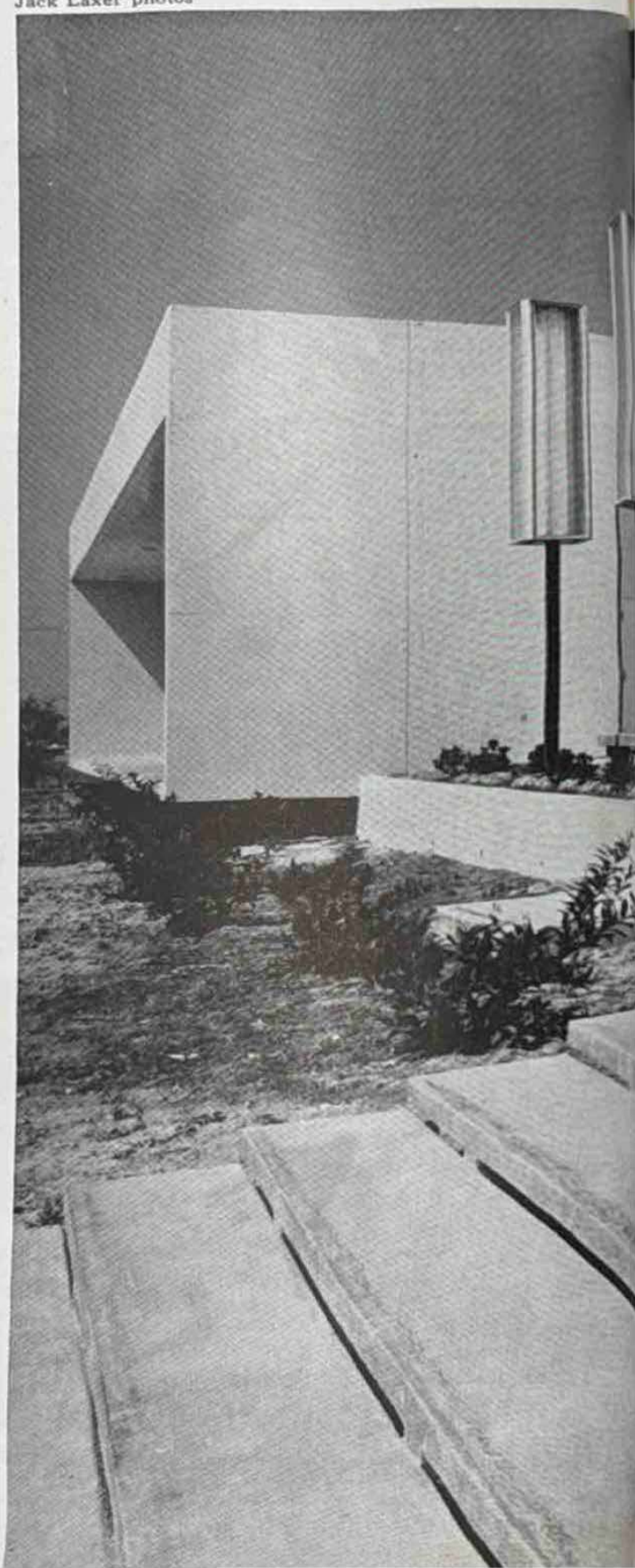


FRANK SLAVSKY RESIDENCE, Waialae-Kahala: Design Associates (Frank Slavsky, architect, and Harold L. Whitaker, designer).

Pacific Architect & Builder
March 1961

Order on the campus: a lesson well prepared

Jack Laxer photos



CERRITOS JUNIOR COLLEGE was established in June 1955 by the citizens of the suburban Los Angeles communities of Norwalk, Bellflower, Carmenita and Bloomfield. Three months later they voted a $14 million bond issue to provide funds with which to build.

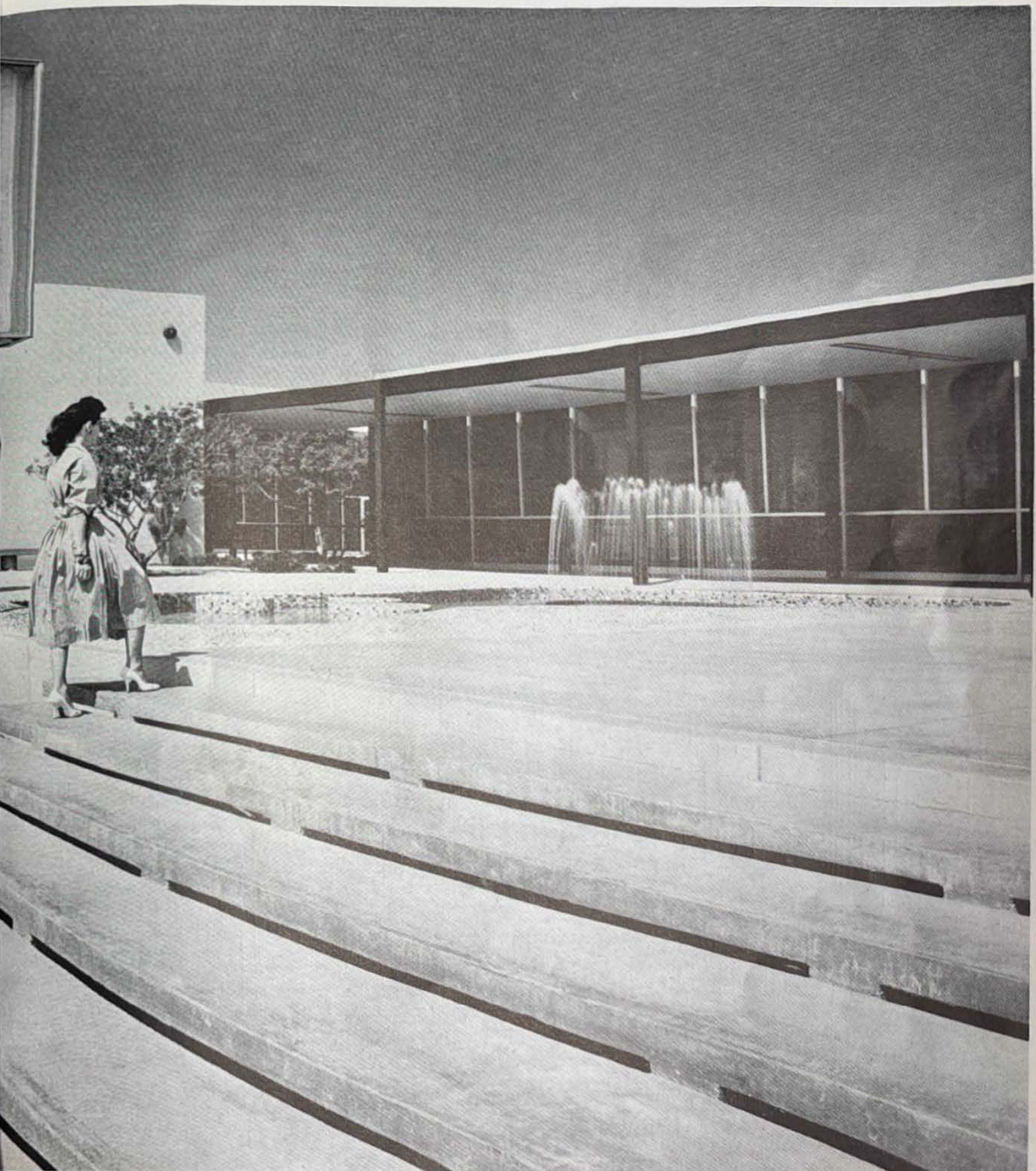
The campus site selected measured 85 acres in an area formerly occupied by several dairy farms, the very center of the population of the junior college district. Master planned for 4,000 full-time day students, it was decided the buildings should be simple in design, to be developed in an orderly, harmonious manner. Materials such as porcelain, brick and glass were chosen because they permitted cheerful colors—yellow, blue, green, orange, etc.—and were still functionally economical, keeping maintenance costs to a minimum.

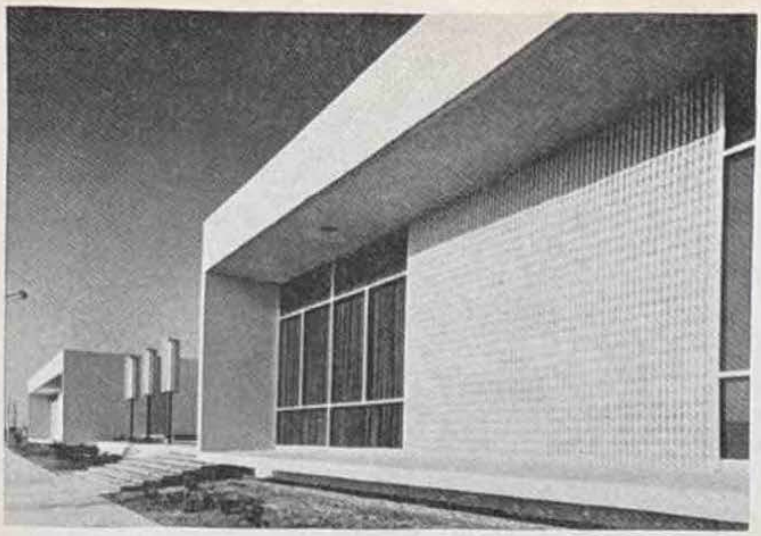
Furthermore, since a portion of the students would complete their formal education with the two-year program offered, while others would continue on to higher institutions of learning, it was deemed the Cerritos campus should have a major college atmosphere. There would be no covered corridors leading from building to building, no drab structures stretching row after row in the much-viewed finger plan so characteristic of California schools.





STUDENT CENTER MAIN ENTRANCE: light fixtures designed by Jen Lew.





CERAMIC TILE with architect-designed pattern faces west elevation.

Cerritos Junior College
Norwalk, California

•

KISTNER, WRIGHT & WRIGHT
Architects-Engineers

EARL FREELS
Project Architect

JEN LEW
Project Designer

KEY: AD.—Administration; ART—Arts & Crafts; ATH—Fieldhouse; BUS.—Business Education; COS.—Cosmethology; ELEC.—Electronics; GYM.—Men's Gynasium; L.A.—Liberal Arts; LEC.—Lecture Hall; L.A. LEC.—Liberal Arts Lecture; LIB.—Library; SCI.—Life Science (now Physical Science); M.S.—Metal Shop; MUS.—Music, Drama & TV; N. SCI.—Natural Science; P.E.—Physical Education; S.C.—Student Center; TECH.—Technology; W. GYM.—Women's Gymnasium; MA.—Maintenance.

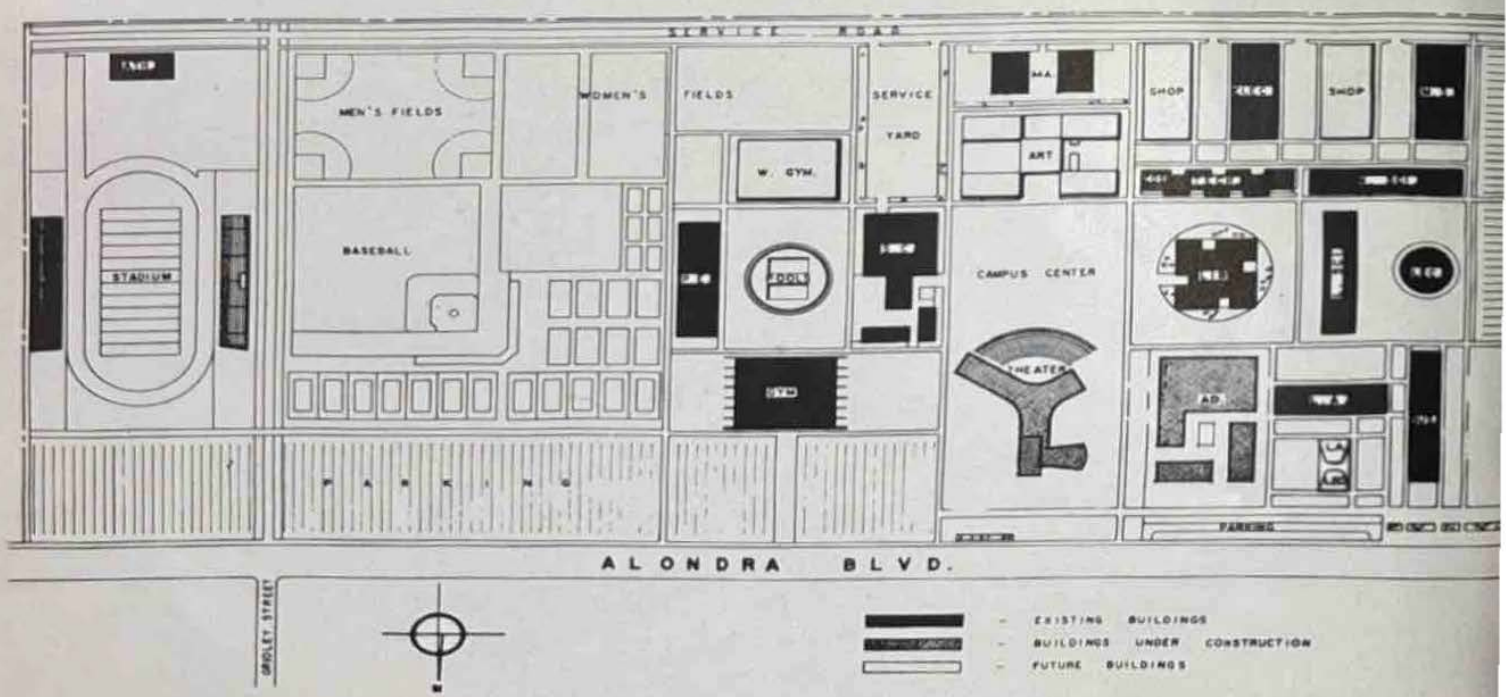
When the School Executive magazine gave Cerr top award for design, the jury said: "The arch have created a simple, gay and energizing environ for higher education. There is a careful attenti inner relationships, facilities and spaces on the ca An orderliness appears in the rectangles flankin central space."

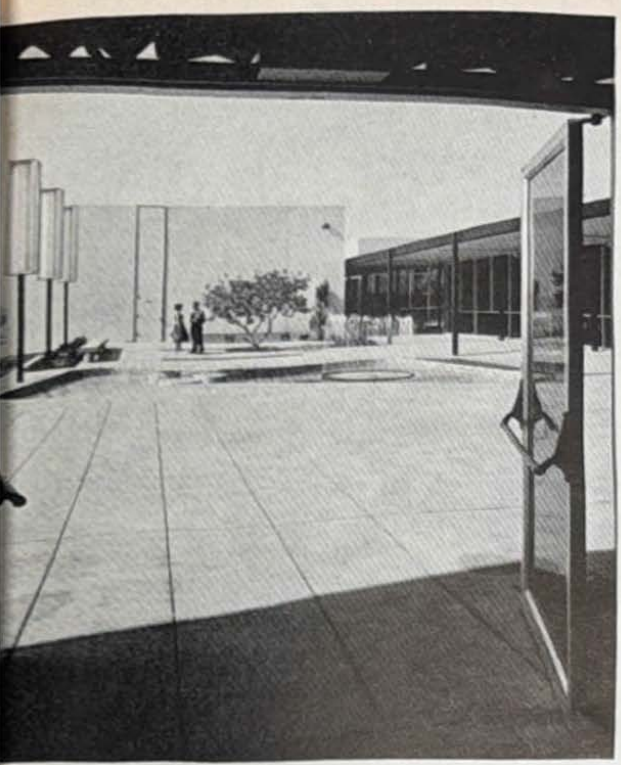
Master plan below indicates the buildings v have been completed, those under construction those about to be built. Site development work—w roadways, parking lots, landscaping—has been ca on concurrently, on an incremental basis, as the va structures have been erected. Entire campus la is due for completion within three years.

Heart of the plan is the Student Center (ge contractor: J. A. Campbell, Inc.) which in this instance consists of three separate buildings tied gether by covered walkways. Its facilities inc student and faculty dining rooms, a snack bar, a b store and offices to house the deans of men and wo and student body officers.

Only round building planned for the campus is Lecture Hall (general contractor: Nylin Hurd C struction Co.), circular because this shape proved be the most efficient and economical use of the site contains six lecture rooms—two seating 120 stud each, four seating 60 each. Service core is in the cen

Other completed structures shown are the Tech ogy Building and the Humanities Building (gen contractors for both: Diverco Constructors, Inc.) the Physical Science Building (general contract Deck & Moody). Landscape architects for the cam are Armstrong & Sharfman.

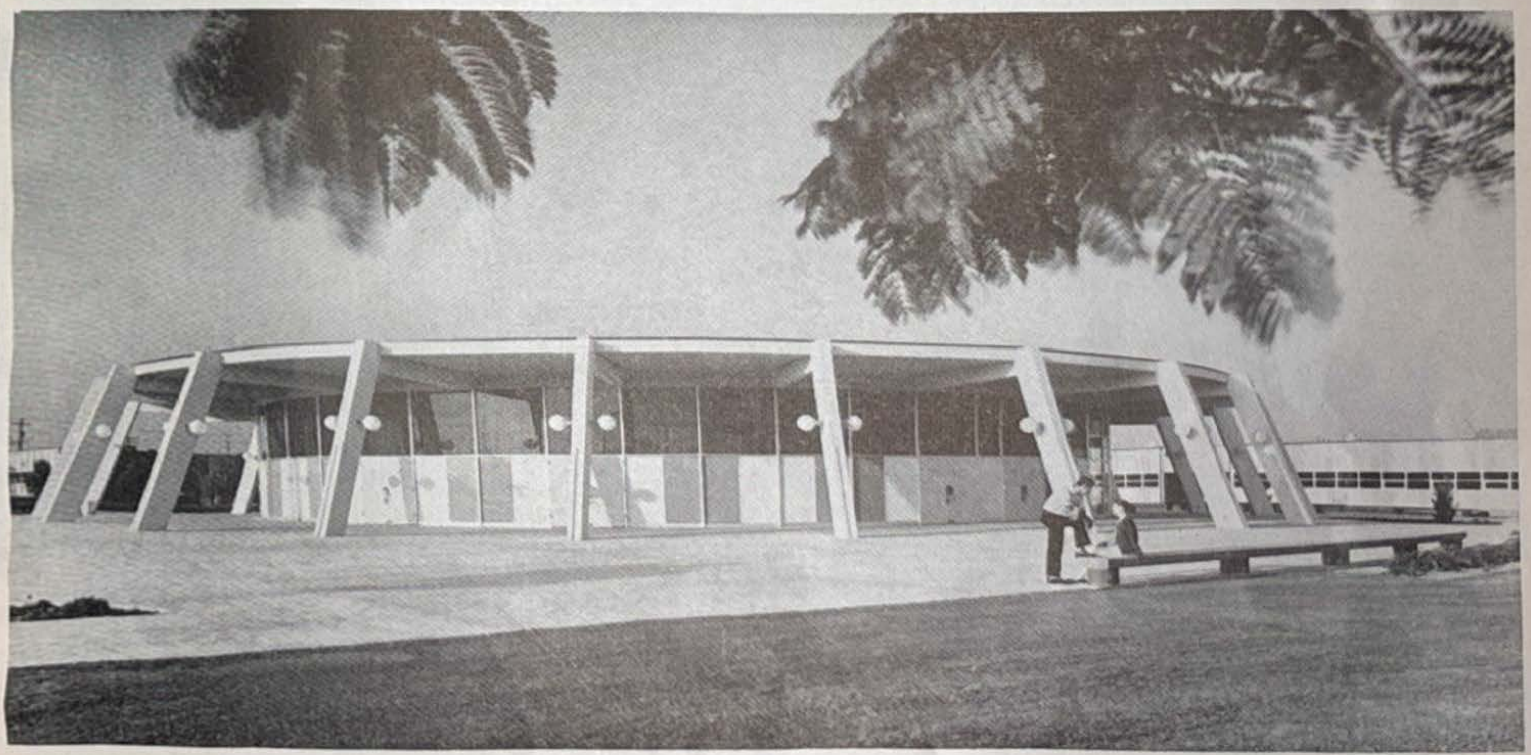




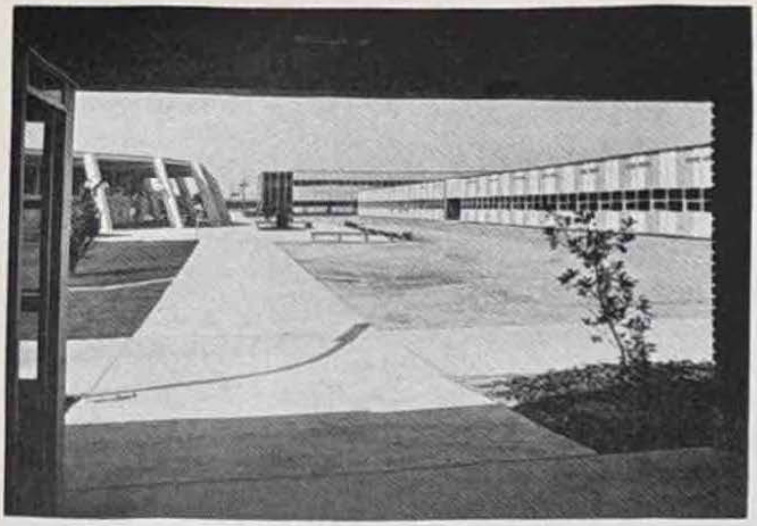
FOUNTAIN BASE is ceramic mosaic tile lighted to make reflection pool at night. Patio area is concrete surfaced.



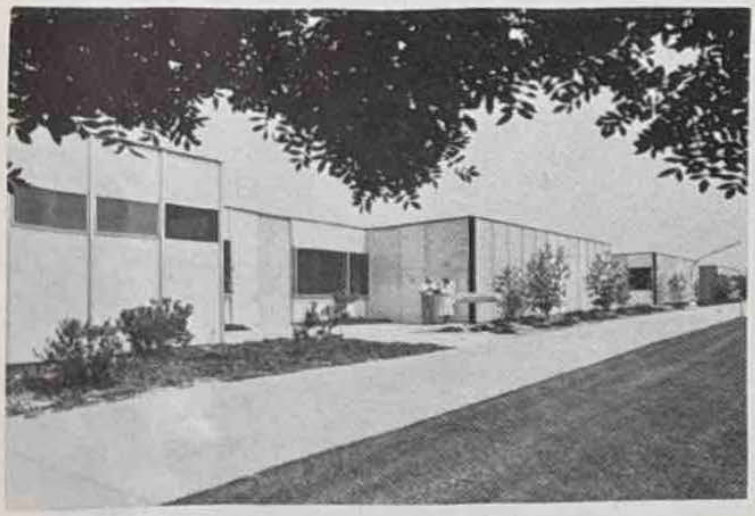
SCIENCE LECTURE HALL, cited in recent design competition of Southern California Chapter, AIA, is cut into six pie-shaped rooms, with mechanical core in center.



CERRITOS JUNIOR COLLEGE



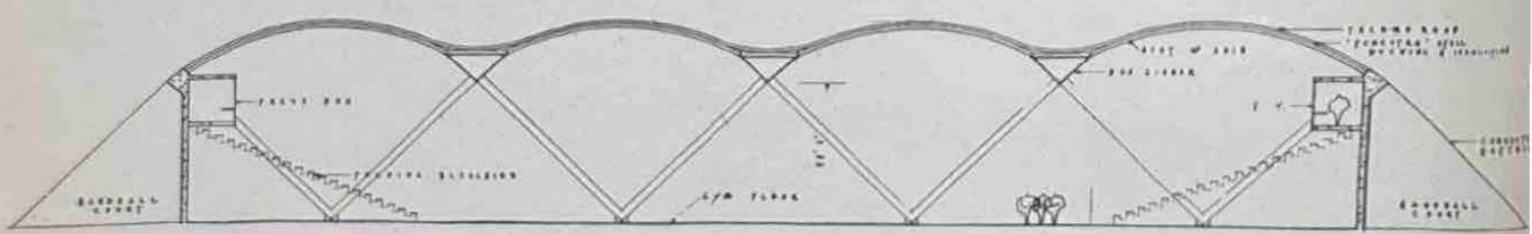
PHYSICAL SCIENCE BUILDING includes dental technician laboratory; Humanities Building has 18 classrooms.



TECHNOLOGY BUILDING houses cosmetology department, five drafting rooms and two classrooms.



GYMNASIUM now being built (general contractor: Fryar Construction Co.) utilizes steel roof and end wall framing system, tilt-up concrete side walls and acoustical metal roof decking.



Alway Cabin
Northern California

•

JOHNSON, HAWLEY & ASSOCIATES
Architectural Firm

WARREN & SIEBERT
Structural Engineers

DAN DANA
Contractor



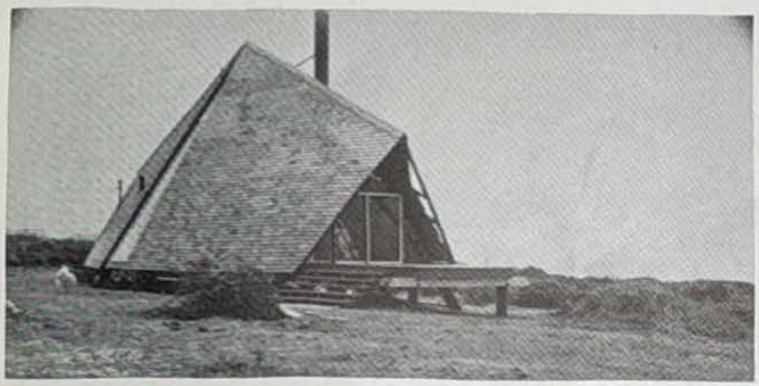
Shelter matches rugged shoreline

A SIMPLE STRUCTURE, easy to maintain, with only the basic amenities for living functions was the client's request for this weekend retreat perched on the windswept, rugged ocean shoreline midway between Santa Cruz and San Francisco.

Pressure treated utility poles were used for foundation piers and the structural frame, selected both for their inherent advantages and because the nearest concrete batch plant is 35 miles away. Lateral forces were resolved transversely within four A-frames with typical bolted timbers and conventional floor framing and longitudinally by 3x6-in. double t&g sheathing for the roof diaphragm, which also forms the interior walls and ceiling. Cedar roof decking was left exposed and unfinished inside. Stripping was applied to receive heavy cedar shingles which form the combined exterior walls and roof. All floors and vertical walls (interior partitions and end walls) are of phenolic-bound particleboard either painted or left natural with a clear sealer.

Loft bedroom above the galley and bath overlooks main living area. At opposite end is a bunkroom for the family's five children. Fireplace, incorporating a sheet-metal hood suspended from the roof structure over an inverted steel boiler head firebox supported on pipe legs, afford ample space heating under average conditions. An electric baseboard system is provided for colder weather.

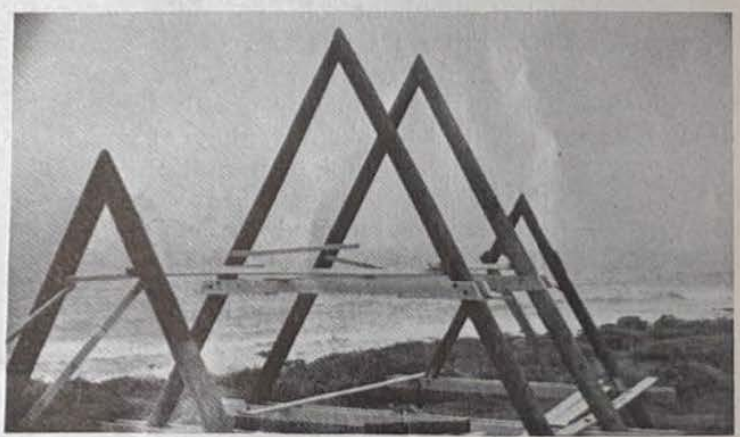
Cost, excluding land, road and utilities, was $9.25 per square foot. Enclosed space: 1,000 sq. ft.



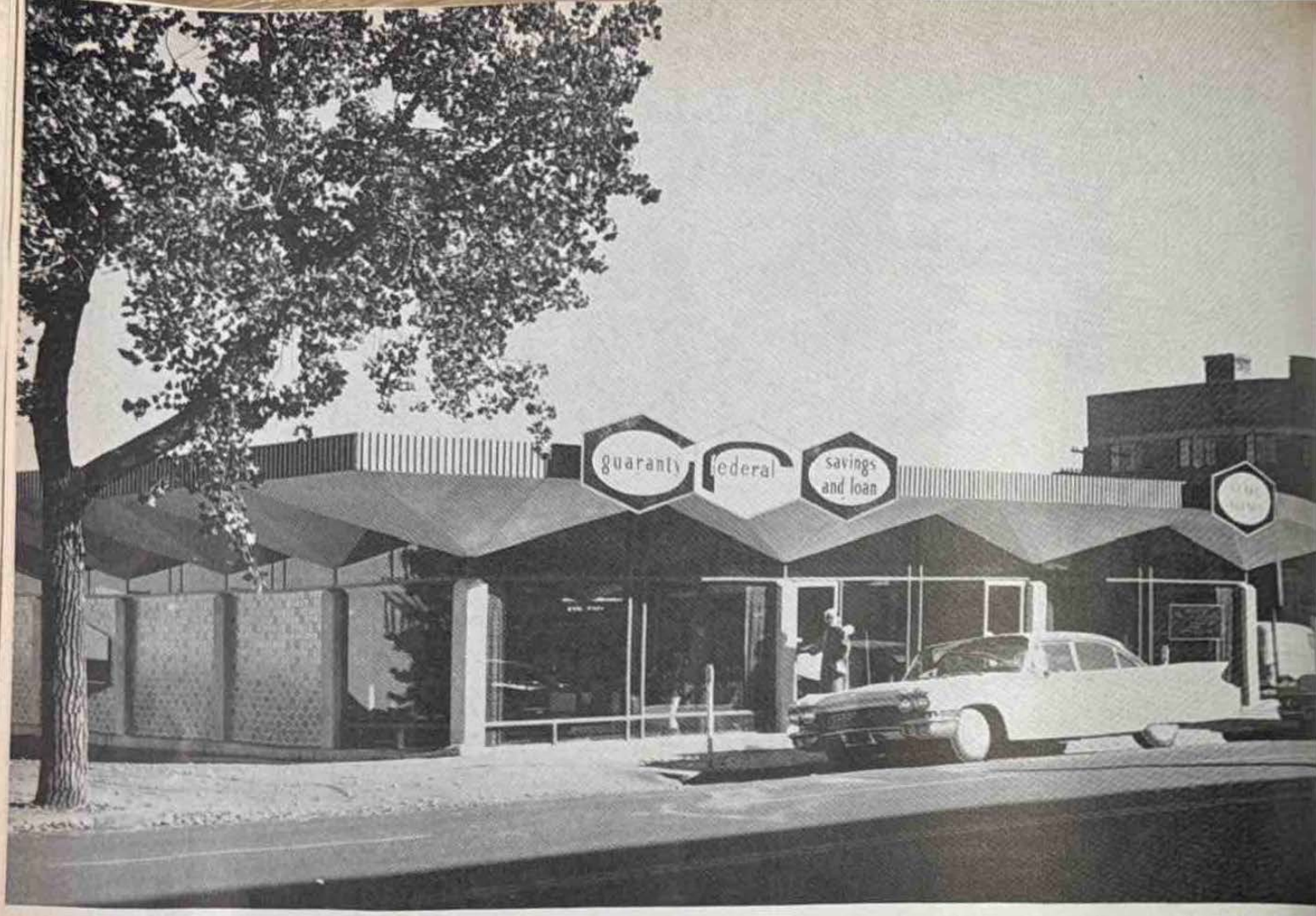
OPERABLE OPENINGS, other than doors at either end of shelter, have been avoided since exposed location requires careful weatherstripping.



FIXED PLASTIC PANELS introduce natural light at waist of structure. Ventilation and fresh air are provided through adjustable registers set in floor at exterior perimeter of all spaces.



TREATED UTILITY POLES used for foundation piers and structural frame will also support future flat-top carport and storage room.



BUILDING FORM suggests flattened hexagon which was adopted as design feature in exterior signs, door pulls, hardware, teller stations, e

Tetrapods add visual interest to small structure

THIS NEAT LITTLE BUILDING fulfills its function of serving both pedestrians and drive-in customers and allowing for projected expansion. It could have been just a run-of-the-mill structure, but an interesting roof system which employs tetrapods lifts it out of the ordinary class.

The tetrapod system was developed to solve a primary design problem: the need to provide free space in the interior without columns and a maximum of light and air. From a series of roof scale models, the four-sided inverted pyramid evolved, both a visually exciting solution and an eminently practical one since it enabled the architect to take advantage of a cheaper structure where interior design permitted columns and to create the flexible open space in the center bays.

More concretely, the tetrapod technique resulted in a sculptured ceiling countering the otherwise necessarily functional flatness of the building; a wide overhang to serve as shelter for pedestrians and for cars traveling to the drive-in window; a 50x80-ft. working area uncluttered by columns and open to the skies, yet essentially free of direct sunlight.

At both east and west ends, tetrapods are balance on two rows of four columns. Similar tetrapods a used along the north and south walls in the nine-ba building to receive stresses from interior space fram and transfer these stresses to the columns. Tetrapod and space frames are of custom-fabricated steel.

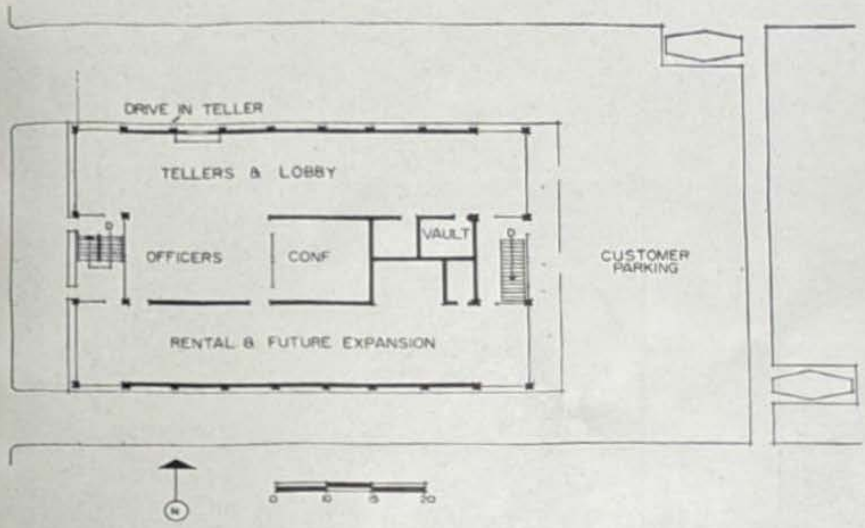
To give a floating appearance to the entire roo structure, the tetrapods are suspended above concret columns on thin steel struts which extend well dow into the columns and transfer axial loads to the co crete by a set of leaflike steel plates welded to th struts.

For future expansion, there is a part of the buildin now rented, and the basement, specifically designe for this purpose, which now houses utilities, employe services and a hospitality room. Circular ducts whic supply hot and cold air to both floors are part of th floor beams supporting the building, a device to kee the basement ceiling free of the usual pipes and ducts Basement walls are offset to permit a 10-in. skyligh on the entire perimeter. Two open staircases provid additional light and air to the lower floor.

Guaranty Federal Savings
and Loan Association Building
Casper, Wyoming

ROBERT WEHRLI
of Architectural Guild
Architect

L. D. LIESINGER
General Contractor



OUTLINE SPECIFICATIONS

Structure: footings and foundation: reinforced concrete; frame: reinforced concrete; roof: steel with 2-in. wood deck; floors: reinforced concrete.

Exterior Finish: aluminum fascia; ceramic tile panels between columns.

Roof Surfacing: built-up on flat areas; mineral topping on slopes.

Windows: gray glass stopped in steel sections.

Doors: entrance: aluminum with custom walnut and porcelain on copper pulls; interior: birch.

Floor Surfacing: vinyl tile.

Insulation: blanket in roof and exterior walls.

Interior Finish: painted plaster; birch plywood paneling.

Ceilings: acoustical plaster.

Heating System: gas fired package warm and cool air conditioners.

Total Area: 8,360 sq. ft. (both floors).

Total Cost: $164,330.

Cost per Square Foot: $19.65.

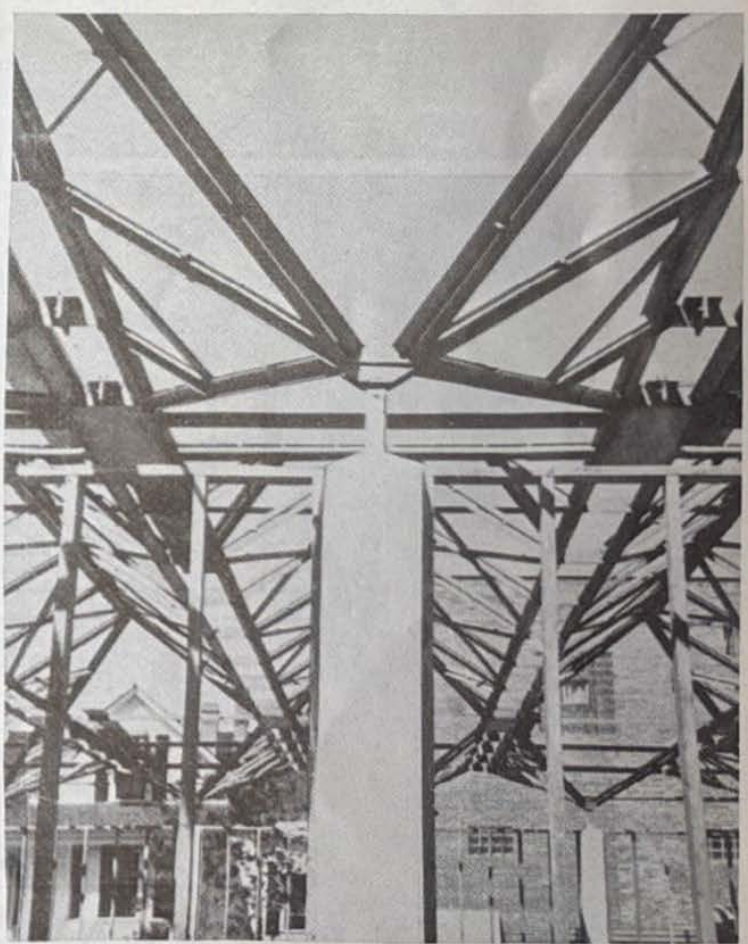
Date of Completion: September 1960.

ROOF affords unobstructed floor area cleared of non-bearing partitions.



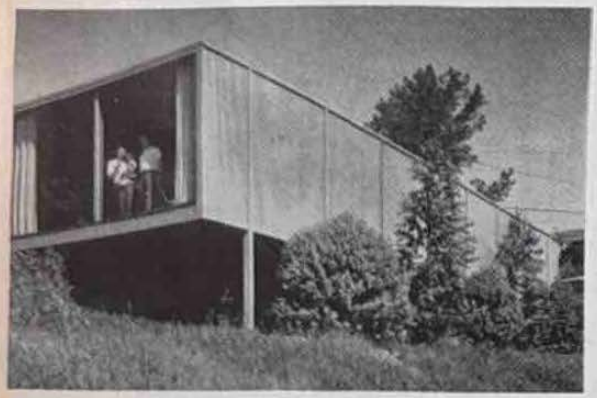


TETRAPODS and space frames are of steel, custom made in Casper.



Douglas Simmonds photos

Imaginative answer to 'primitive zoning'



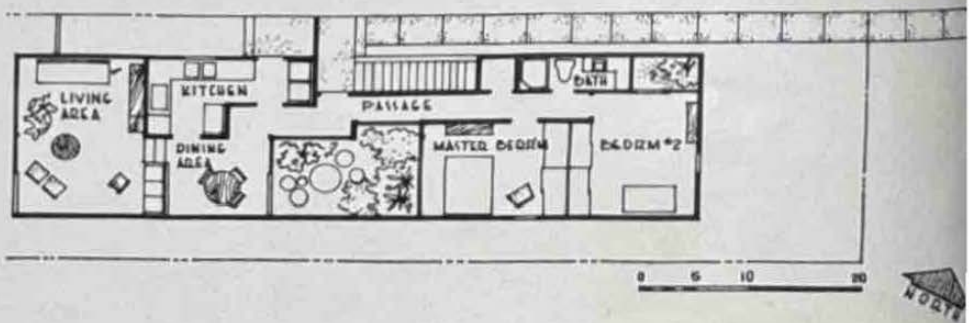
JURY COMMENT in presenting house with Award of Excellence from San Diego Chapter, AIA: "A small lot has been used under limitations of a primitive zoning law in the best way possible. Environmental controls are exercised with imagination, proving that the architect can meet the challenge of a difficult site."

Homer T. Delawie Residence
San Diego, California

•

HOMER T. DELAWIE
Architect

BACH CONSTRUCTION CO.
Contractor



RESTRICTED BUDGET and a steep, difficult site were the prime considerations facing the architect in designing his own home overlooking the San Diego harbor. Despite, or more accurately because of, these considerations, he has created a small gem of wood and glass at a cost of only $10.70 per square foot.

The well-located 25-ft.x100-ft. lot with a 28% gradient had been by-passed by others because building on it presented quite a challenge. City building restrictions require 4-ft. side yards, leaving only 17 ft. in width for the house, and restrict coverage to 40% of the lot. The design solution was to place the carport and storage room below, with living areas and gardens above.

Because apartments will be built down the slope, the architect closed off the south side of the house except for one vertical strip window for ventilation. The entire west wall, however, is glassed to take advantage of the view. Small interior gardens provide added light and make the house appear more spacious from within.

The lower level has a concrete slab floor, concrete block walls and a redwood lath ceiling. The upper level, which provides 900 sq. ft. of living space, is wood post and beam construction with a 2-in. acoustically grooved wood deck, a flat roof, sliding doors in wood frames and the fixed glass wall.

Access to the front entrance is by a walkway from the street or by a covered stairwell from the carport. Furnishings have been kept light in scale so as to avoid overcrowding the limited spaces. Interiors were executed by the Design Center and landscaping by Joseph Brazil.





TEXTURED PLYWOOD in natural finish is continuous from front wall of living room through dining area, patio and on into bedroom. Interior garden provides secondary view when vista to west is closed off by drapes during part of day for sun control.

OUTLINE SPECIFICATIONS

Structure: foundation: concrete and concrete block; frame: wood post and beam; roof: 2x8 t&g acoustically grooved deck.

Exterior Finish: painted plywood—(Texture One-11) Douglas Fir Plywood Association.

Roof Surfacing: built-up three-ply and gravel.

Windows: stainless steel jalousies—Cal-State Louvre Mfg., Inc.; aluminum sliding in kitchen—Reynolds Aluminum Co.

Doors: exterior: custom wood sliding glass; interior: painted hollow core flush.

Floor Surfacing: vinyl cork—Dodge Cork Co.

Insulation: 1-in. rigid asphalt impregnated—Celotex Corp.

Interior Finish: natural finish plywood with clear sealer—(Texture One-11) Douglas Fir Plywood Association; painted plasterboard.

Ceilings: exposed 2x8 acoustically grooved roof deck with clear sealer.

Heating System: forced air perimeter type—Frazer & Johnston Co.

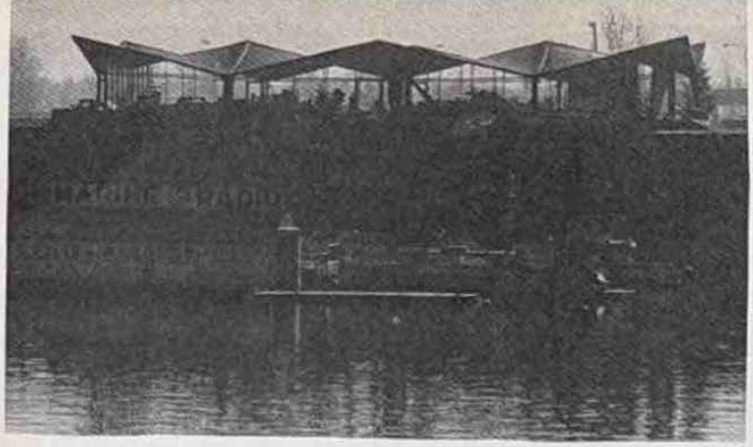
Plumbing Fixtures: Crane Co.

Total Area: house proper: 920 sq. ft.; stairs: 52 sq. ft.; patios: 130 sq. ft.; carport and storage: 288 sq. ft.

Total Cost: $12,700.

Cost per Square Foot: $10.70.

Date of Completion: July 1958.



HYPERBOLIC PARABOLOID STRUCTURE is showcase night or day for Oregon-Washington Interstate Bridge traffic passing along U.S. 99 beside Columbia River on city's far north limits.

Totem Pole Marina
Portland, Oregon

•

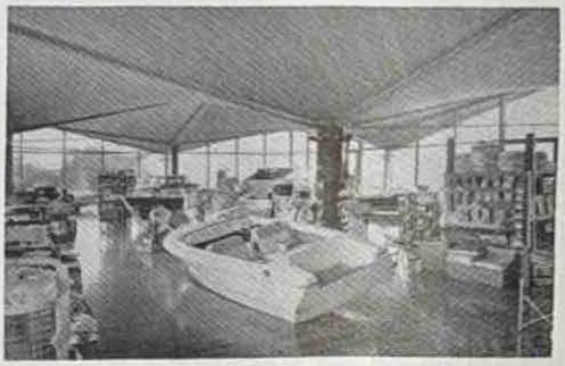
JOHN STORRS
Architect

SIMON STANICH
Associate Architect

JAMES PIERSON
Structural Engineer

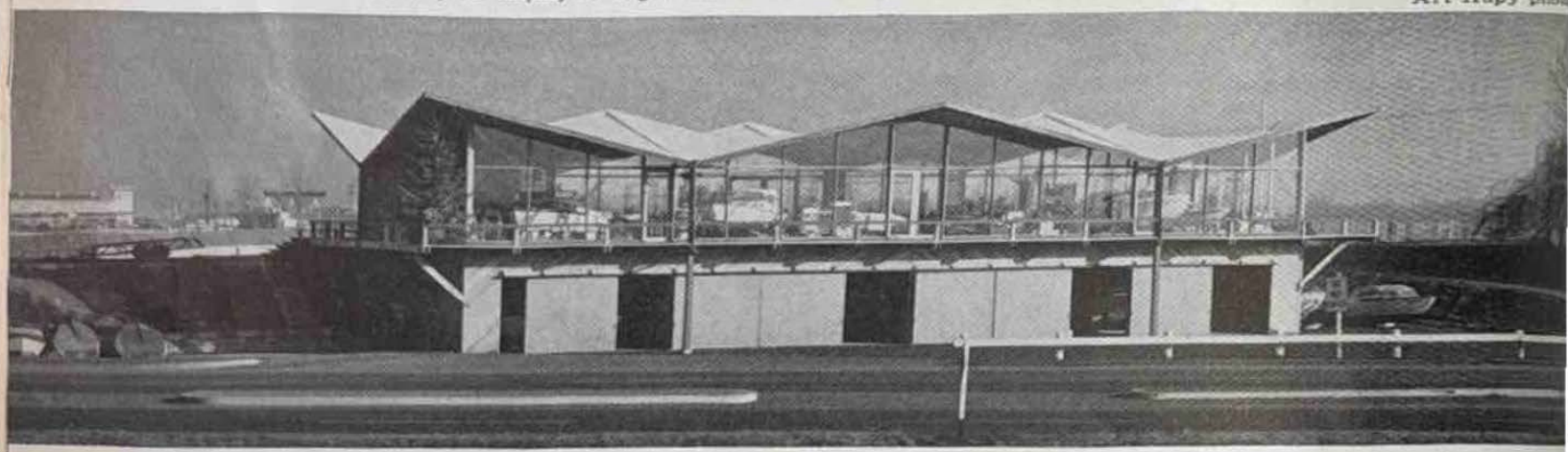
GEORGE A. MOORE & ASSOCIATE
General Contractors

Eight parabolic shells accent boat display



FROM VISUAL STANDPOINT, building form suggests nature of business; from economic standpoint, it provides, at relatively moderate cost, unobstructed floor area so necessary for display of larger boats.

Art Hupy photo



EMPLOYING a hyperbolic paraboloid roof for this marina made it possible to cover 7,200 sq. ft. of area, unobstructed except for a single, central interior column, a definite advantage in the placement of large boats and cruisers on display. The roof also emphasized the nautical character of the business and is in itself an advertising eye-catcher.

Believed to be the first commercial use of this type of design in Oregon, it is the work of the same architect-engineer-contractor team responsible for the much-talked-about Forest Products Building at the 1959 Oregon Centennial Exposition. While similar in basic design, the marina has a central support column with perimetric tie rods, differing from the pavilion which has concrete buttress supports to the floor.

Marina's roof is made of eight parabolic shells, 30x30 ft., arranged in a rectangular manner. Each shell consists of two skins of 1x4 Douglas fir stretched under tension, with the direction of one skin diagonal to that of the other. Exterior walls are set back 6 ft., creating a covered deck space for nighttime viewing of boat displays or daytime viewing of water activities.

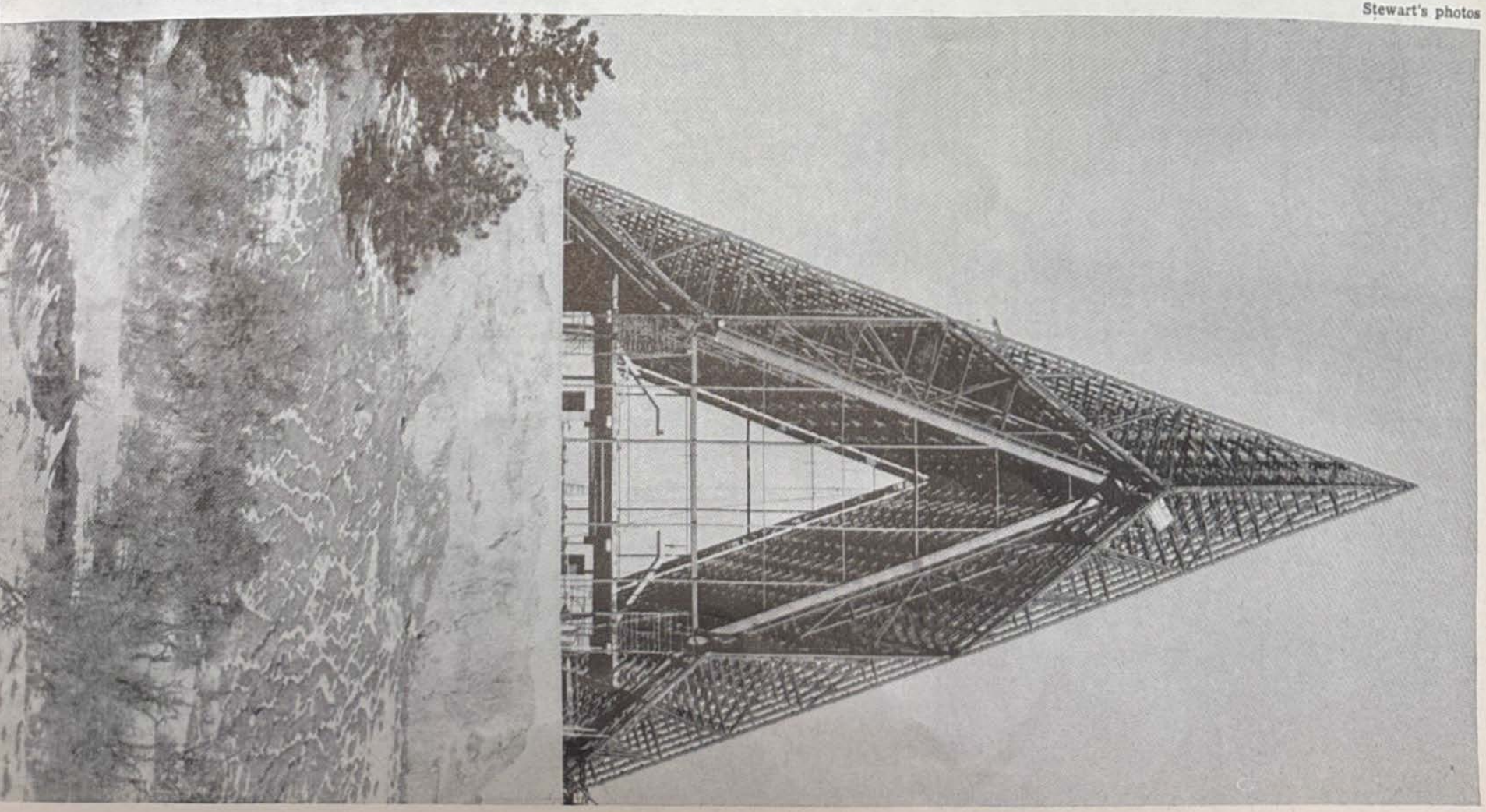
Inside, custom-designed island display units, constructed of naturally finished Douglas fir combined with pegboard, also serve as storage for stock on display. Units are mounted on rollers to give flexibility.

Below the main displays, a large area provides additional covered storage for boats.

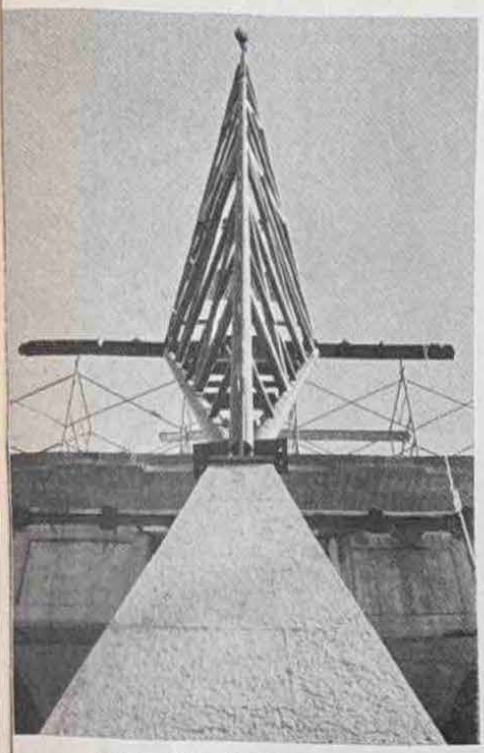
methods & materials

AIR FORCE ACADEMY CHAPEL (see next page).

Stewart's photos



Steel skeleton awaits aluminum skin



SANDBLASTED CONCRETE ABUTMENT provides dramatic support for tetrahedron, shown here looking along edge as it rests in place. Adjacent walls will have diamond patterns of hand-set random sized stones.

An imposing skelton rising in the foothills of the Colorado Rockies, steelwork for the U.S. Air Force Academy Chapel was topped out last month, ready to receive its aluminum cladding. Robert E. McKee Construction Co., general contractor, expects to complete the project by next fall.

One-hundred tetrahedral shaped supports made of steel pipe were erected by F. B. McIntire Construction Co. to form the 17-spire chapel, which will provide separate places of worship for Protestants, Catholics and Jews—all within one building.

Believed to be the first support structure of its kind, the 75-ft. long tetrahedrons were fabricated from Republic Steel Corp.'s 6- and 4-in. diameter pipe. The large size was employed as primary structural members while the smaller was used as cross members in support. Architects Skidmore, Owings & Merrill nominated pipe for the job to meet the precision fabrication required to make the unusual shapes and to provide high strength.

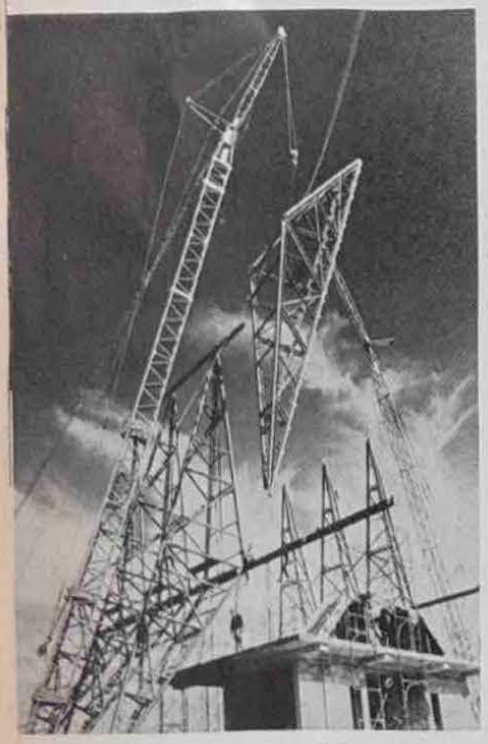
Each spire is designed by joining four of the tetrahedrons to form an inverted V-shape. Two of the four units in each V-shaped section, meeting the top, form the spire point. The remaining tetrahedrons are inserted wedge fashion between the edge of the spires to complete the design and help form the shape of the building.

The tetrahedrons were in-plant fabricated by Mississippi Valley Structural Steel Co. and shipped by ra and truck to the 17,500-acre camp which skirts the base of the Rampa Range seven miles north of Colorad Springs. Unlike most conventiona structural forms that can be put to gether from I- or H-shaped beam the tetrahedrons called for fabricatio of complicated miter joints.

The pipe was cut to proper lengt and welded into shape with the aid of special welding patterns for th torches and special jigs for holding and turning the pieces during assem bly. Despite the unusual angles formed by the multiconvergence—as many a eight pipe sections—at termina points, the combination of tubula steel and the unique jigs did the jo rapidly at low cost, comments a spokesman for the architectural firm

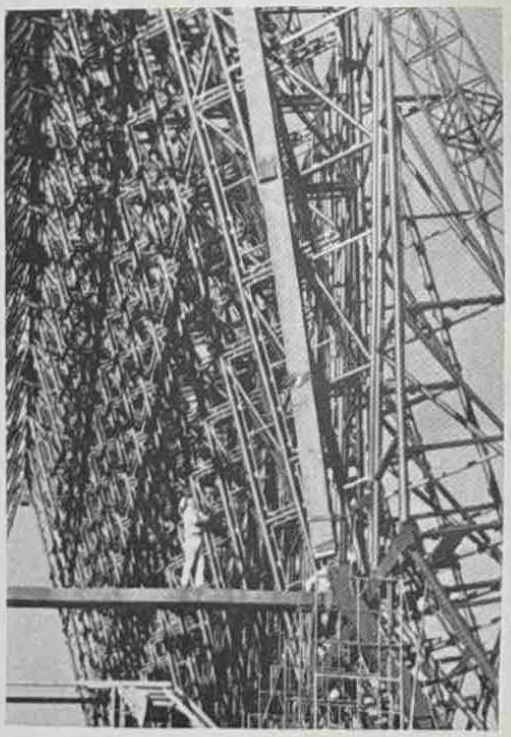
To each tetrahedron, frame stee angles have been welded on to hol the chapel's skin in position. The attachments are less complex with the cylindrical surface than would b possible with the ordinary structura forms. The curtain wall type panel will be fitted on to the pipe skeleton and hoisted into position. Remaining elements in this roof-wall are the narrow ribbons of stained glass rising from floor to ceiling between the spires.

Shipping the tetrahedrons from the fabricator's plant in St. Louis to Colorado Springs called for a number of material handling innovations. The odd shaped structurals had to be sea



TETRAHEDRON is hoisted into place, then bolted. When all 17 spires are assembled, joints are welded.

STEEL PIPE, 6 and 4 in. diameter, forms intricate pattern.



on three-car assemblies, each made up of a flat car between two gondolas. Three of the tetrahedrons were shipped to each three-car grouping. As many as nine assemblies, or 27 tetrahedrons, were shipped on each train. The parts were held in position and kept from shifting during transit with the aid of reusable bolsters designed by the fabricator.

The structure for the upper Protestant level is separate from that of the tetrahedrons. It consists of cast-in-place reinforced concrete columns with prestressed and precast concrete box girders. Spanning between the box girders are precast floor slabs. In order to achieve acoustical isolation between the Protestant and the lower Catholic and Jewish levels, a raised floor was placed above the precast floor slabs. This space also provides for mechanical distribution.

Extrusions enclosing the pipe structure are acid etched and anodized. The sheet aluminum panels have a milled finish and in time will turn dark in contrast with the silver of the pipe covering. Separating the tetrahedrons in 1-ft. bands are 1-in. thick cast-stained dalles in various tints of blue set in aluminum frames. At the intersection of two tetrahedron points are brilliant bursts of primary colors in faceted and unfaceted dalles.

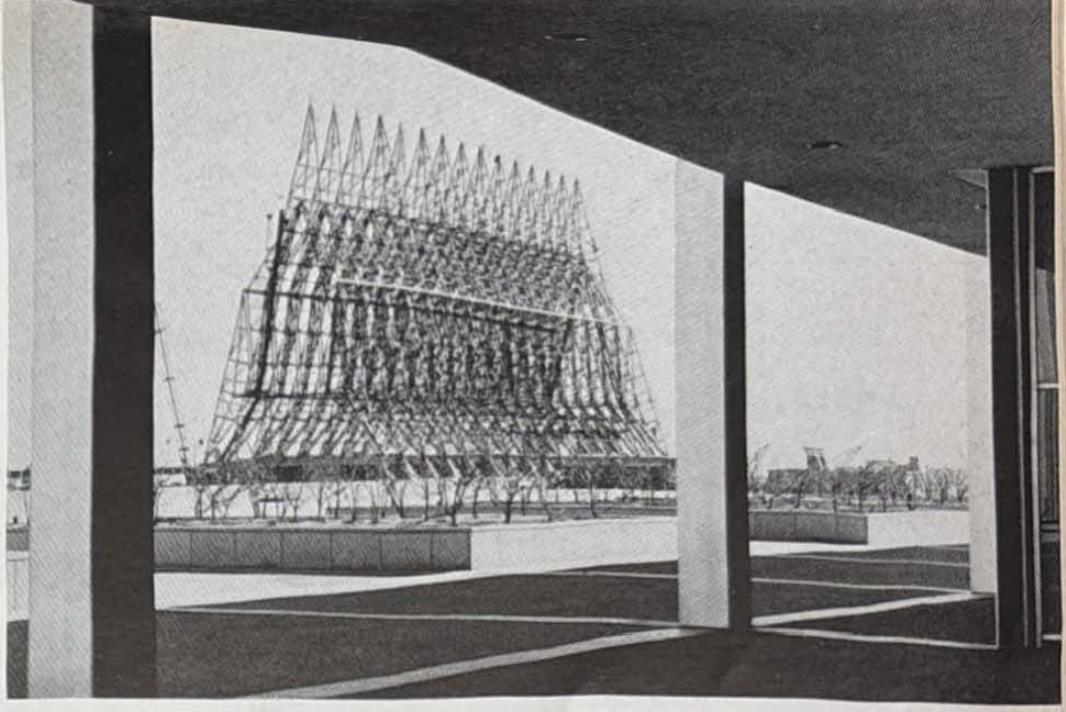
Playing against the black painted steel mullions at the narrow end of the building is aluminum sash glazed with a special glass, two sheets of which sandwich a silver coated layer of plastic transmitting only 3% of the light. This same glass located behind the organ is 1-in. thick to act as a sounding board.

At the terrace level the Catholic chapel has aluminum sash glazed with seeded amber dalles in three tints and precast concrete panels incorporating 1-in. faceted dalle glass in five colors. The glass at the Jewish vestibule has seeded purple dalles in three tints. At the north and south ends, the opaque walls are faced with light gray precast concrete panels.

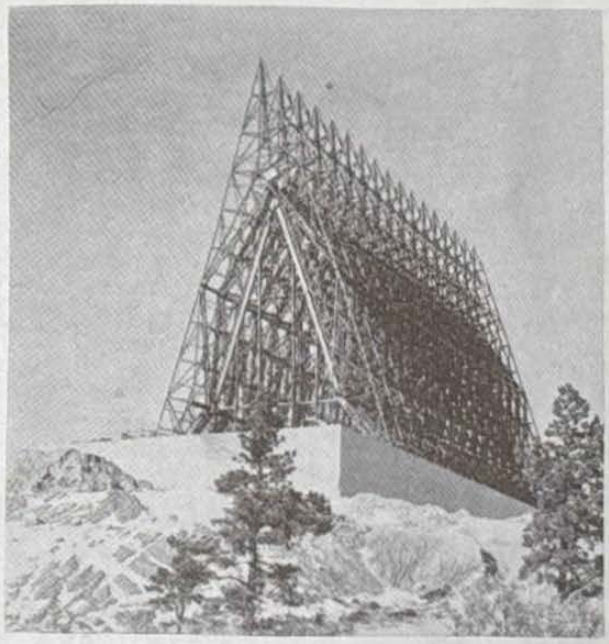
The terrace level sloped walls adjacent to the abutments have diamond patterns of hand-set random sized stones. This heavy texture is relieved by the fine exposed aggregate plaza and granite faced retaining wall.

Rising 150 ft. above the campus, the chapel presents a commanding face. All other structures, such as the Cadet Quarters whose overall length is 1,337 ft. 9 in., are but 32 ft. 10 in. above the campus level. (For a pictorial report on the Air Force Academy, see PA&B for Nov. '60.)

The completed chapel, exclusive of paving and other secondaries, will represent an investment exceeding $3.2 million.



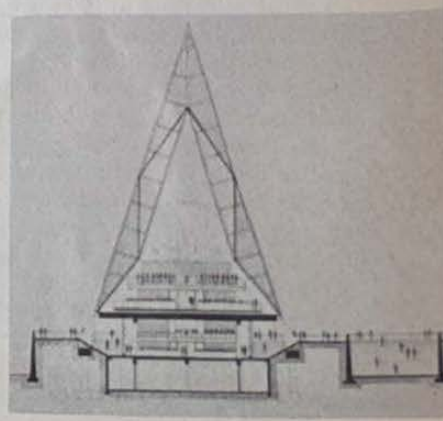
EXPOSING 17 SPIRES to high-velocity winds that whip in from Rampart Range, design of structure is tested in place. Chapel rests on separate podium at same level as Court of Honor.

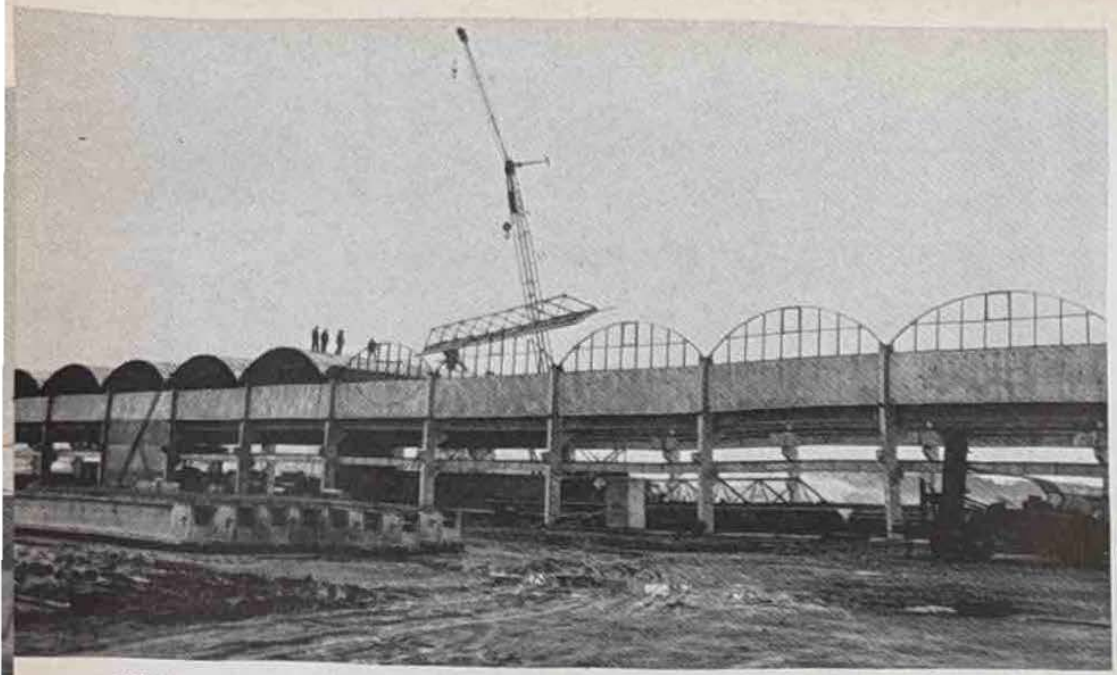


TRANSVERSE SECTION shows upper Protestant chapel (900 seats) and lower Catholic chapel (500). Beyond latter is circular Jewish worship center (100).

Modules and Structure

Building size—84x224 ft.
Tetrahedron bay—14x84 ft.
Tetrahedron length—75x69 ft.
Terrace level bay—21x47 ft.
Terrace level floor to floor height—22 ft.
Terrace level floor to ceiling height—17 ft. 6 in.
Upper level floor to peak height—93 ft.
Terrace level to top of building—151 ft.





CURVED CONCRETE SLAB, one of three used for each thin shell unit, is lowered into place to roof 480-ft. long structure. Each slab is 9x72 ft., weighs about 11 tons.

Imaginative engineering roofs prestressed concrete plant

Concrete Technology, Inc., the Tacoma firm which has pioneered in the production of prestressed concrete, has come up with a unique roof for its new long bed plant.

The firm was the first in the Pacific Northwest to produce hollow cylindrical piling 36 in. in diameter in lengths up to 90 ft. and also the first to produce prestressed concrete beams for building construction. The latter, 238 in all, were employed in Seattle's Norton Building (PA&B, Feb. '60).

Now Concrete Technology is building a precast, multiple-barrel, thin shell roof system for its own plant. The building, now under construction, will have a center bay 72 by 480 ft. with lower bays, each the same size, to be added later on each side. The engineering firm of Anderson, Birkeland & Anderson, working closely with Concrete Technology, has designed the plant and thin shell roof.

The basic roof unit is a barrel shell 30x72 ft., with a 19-ft. 3-in. radius of curvature, which gives a rise of about 7 ft. to the shell. Each unit is composed of three slabs 9 ft. wide by 3 in. thick and a V-shaped edge beam in the valley. The slabs and edge beam are precast with Haydite concrete, prestressed in the long direction and reinforced with mild steel bars in the transverse direction.

The shell elements weigh 35 psf., or about 11 tons for each slab, and offer the higher insulative qualities of Haydite concrete. Special purpose triangular steel trusses are used to facilitate handling, transporting and erecting the roof slabs. In addition, the truss supports the slabs until the shell is integrated, eliminating the need for shoring under the roof.

After a slab is set in place with a truck crane, the protruding rebars are welded to the adjoining slab or edge beam, and the 6-in. wide joints are filled with pea gravel concrete. Carefully phased work and the use of high-early strength concrete in the joints permits removal of the support trusses the following morning and continuation of the erection cycle of two bays per day or 4,200 sq. ft.

The final surface requires no built-up roofing. A specially developed screeding system produces a smooth top surface with a minimum of voids and a properly constructed grout slot at the slab joints can eliminate leakage. Sealing and surface protection is obtained with a light, brush-on sealer which protects the surface from freezing and thawing damage.

The firm's engineers point out that the important property of a shell is its ability to act as a very large deep beam in the long direction. In the case of this roof, the beam can be thought of as a T-beam with a curved top flange, which is 30 ft. wide and 7 ft. deep.

When a multiple-barrel design is used, each barrel effectively prevents the edge of the adjacent barrel from pulling in. Because of this stiffening of the edge, the difference between actual stresses and simple beam-theory stresses is greatly reduced, amounting to about 10% for the proportions used in this design.

The design stresses for the shells are so low that, through use of high-strength concrete, stresses four times as great could easily be tolerated. In other words, this 3-in. shell would be capable of spans well in excess of 100 ft. The company believes that precasting, transporting and erecting the shell elements and V-beams are feasible to lengths as great as 120 ft.

Concrete Technology expects to be able to market the roof system elements for a price (average of shell elements and V-beam) ranging from $1.10 to $1.25 per square foot of roof surface. The cost of erection on the building now under construction will run about 25 cents per square foot, including write-off of the six erection trusses.

In addition to low construction cost, a concrete roof also gives substantial savings in maintenance and insurance.

Precasting the roof system offers tremendous time savings. Production of the pieces can be concurrent with other construction, so that once roof erection commences, it can proceed at several thousand square feet per day.

Since it was formed nine years ago, Concrete Technology has several other structural achievements to its credit, including the 5,500-seat Cheney Grandstand in Tacoma, which was designed, fabricated and erected in three months.



SPECIAL TRIANGULAR TRUSS bolted to top stiffens shell elements during erection, allowing them to be supported solely by welded steel window frames at each end.

THE TERM "PLUMBING" should be replaced in all segments of the industry "because it has become associated in the public mind with an outdated, incorrect and in some respects unfavorable picture of the industry." So says Zurn Industries, Inc., manufacturer of drainage systems equipment in announcing that henceforth its plumbing division will be named the hydromechanics division, a title which the company feels more closely portrays industry functions and the professional status of the contractor. (Hydromechanics is defined as that branch of physics which treats of the mechanics or laws of equilibrium and motion of liquids.) Zurn intends to mount a comprehensive public relations program to persuade the industry and the public to accept the term hydromechanics in place of plumbing.

—pa&b memo—

FIRE-RESISTANCE RATINGS for prestressed concrete construction have been established by the San Francisco Board of Examiners. The board voted to recognize prestressed concrete construction on the basis of specifications outlined in the Uniform Building Code, the one primarily used in the western states.

—pa&b memo—

EMBOSSED EFFECT on porcelain enameled steel veneer panels can be achieved by superimposing a gloss finish design over a matte finish background under a process developed by The Erie Enameling Co. The process achieves the embossed look without cost of expensive dies. One of the first uses of the dual finish panels was in a recently completed apartment building in downtown Fairbanks, Alaska, designed by Gray, Rogers, Graham & Osborne.

—pa&b memo—

CLAY MASONRY WALLS could be reduced to half their current thickness and still provide even greater structural strength with a new high-bond mortar now under development by the Structural Clay Products Research Foundation and Dow Chemical Co. Preliminary tests indicate the new mortar increases mortar-brick bond strength more than five times, according to a report made at the recent SCPI convention. Some potential costs savings cited in the report were use of 4-in. clay masonry curtain walls without structural backup materials in multistory buildings; use of 4-in. load-bearing brick walls without structural wood studs or backup masonry partitions in place of 8-in. thick partitions. A full-scale program of field testing is now underway.

—pa&b memo—

EFFECTS OF SUNLIGHT on house comfort, durability and economy are being studied in research projects in Washington, California, Arizona and Colorado as part of an 11-state regional project. At Washington State University two wood and glass cubicles have been constructed on concrete, circular tracks so they may be rotated and oriented in relation to the sun. They contain recording equipment and will be modified to study various designs and structural controls. Objective of the research is to determine the effects of orientation of house openings on interior thermal and visual environment and to develop house planning guides based on the data obtained. Cooperating in the study at WSU are the Agricultural Experiment Station, the Industrial Research Division's Engineering Experiment Station and the architectural research section.

—pa&b memo—

PARTICLEBOARD has been approved by the FHA as floor underlayment in above-ground wood frame construction. Announcement of the approval, incorporating National Particleboard Association standards, is made in "Use of Materials Bulletin No. UM-28" issued by the agency.

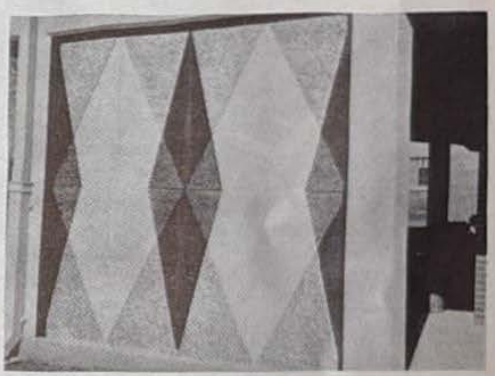
—pa&b memo—

SANDWICH PANEL expected to have wide application in both military and civilian use is being demonstrated via an army recruiting booth recently erected in downtown Brooklyn. The panel consists of an exterior surface of textured and baked enameled aluminum sheets, a core of foam polystyrene plastic insulation and an interior surface of tempered hardboard. Panel, structural frame and all other components can be fabricated on an assembly line, shipped directly to the building site and the structure erected in a day or two. Of special interest to the military is the fact that the buildings can also be easily disassembled and moved to another site. The recruiting booth has floor-to-ceiling glass windows at each end. Laminated panels also form its floor and roof. Panels, developed by International Structures, Inc., can be used either as curtain walls or as load bearing members. Aluminum is supplied by Olin Mathieson Chemical Corp.

FIR PLYWOOD INDUSTRY in the West sets its 13th consecutive annual sales record in 1960, according to figures released by the Douglas Fir Plywood Association. Total production of approximately eight billion square feet is reported, an increase of 3%. While this was far below the 19% increase for 1959, it came in a year of semi-depression for the industry and in the face of an estimated 20% drop in housing starts, indicating that plywood's share in the housing market has been considerably increased, the DFPA points out.

—pa&b memo—

TILT-UP WALL PANELS with decorative patterns are possible with a relatively new technique utilizing Rugasol F and Plastiment retarding densifier produced by Sika Chemical Corp. Wall panels are made face down on concrete forms coated with Rugasol F. Design effects are achieved by varying textures, and colors separated by wood strips. After the facing is poured, a 2-in. thick covering is cast over the first part, binding



together the entire panel. Plastiment is used in the concrete to keep it plastic long enough so that all parts can be readily joined together and to assure good bond between the segments. After casting, panels are left in forms for approximately 1½ days, tilted and lifted out. Surface mortar is brushed and hosed off, exposing the aggregate. Rugasol F is used to retard surface mortar.

—pa&b memo—

STANDARD SPECIFICATIONS for architecturally exposed structural steel have been adopted by the American Institute of Steel Construction to meet the growing popularity of this type of construction. The standard sets closer dimensional tolerances and smoother finished surfaces than required for ordinary structural framing. Copies of the specification may be obtained from the AISC at 101 Park Ave., New York 17, N.Y.

aluminum window

An aluminum top-hung, in-swing window has been designed primarily for use in multistoried air conditioned buildings where a minimum of air infiltration is required. Both sides of the glass may be washed easily from the inside without interference from blinds, drapes or curtains. Ventilators are held in an open position by a removable stay bar placed at the center of the vent sill, eliminating hold-open arms at each jamb. Series 900-TH also is supplied with a hopper vent at the sill for buildings where emergency ventilation is required. Special key and removable stay bar allows the window to be operated by authorized persons only. — Truscon Division, Republic Steel Corp. (No. 1)

insulating plastic foams

Dow Chemical has developed two insulating plastic foams, a rigid urethane foam board with high solvent resistance and heat distortion and low thermal conductivity called Thurane and a new Styrofoam brand insulation board with flame-retardant properties. Thurane was developed for such applications as roof insulation, sandwich panels, low temperature space insulation, pipe and refrigerator truck insulation. Its low thermal conductivity will permit designers to use thinner sections to provide the same thermal insulation as greater thicknesses of conventional insulation. Another advantage is that hot asphalt can be mopped directly onto the foam board. The new product will replace Styrofoam 33, having better light stability and higher heat distortion. It is also expected to replace Styrofoam 22 in most construction applications. Dow will use the blue flame-retardant foam in Scorboard, a perimeter insulation board that is prescored.— Dow Chemical Co. (No. 2)



outdoor residential lights

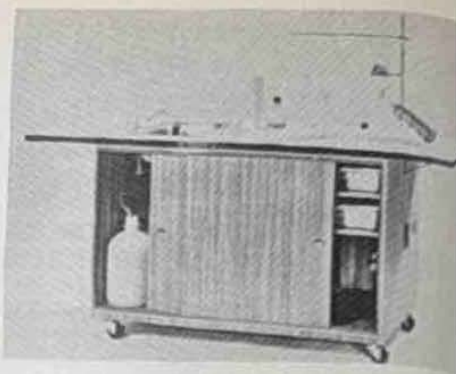
For patios, gardens, entryways and other outside residential and commercial areas, Nessen has introduced a collection of portable lighting units designed to harmonize with contemporary interior decoration. Scaling and dark bronze finish give the lamps a definite outdoor appearance. All are fully weatherproofed for year-around durability. Line, designed by George Nelson & Co., includes a hanging model with honeycomb diffuser pattern, low, hooded pathlighter, spotlights and an entrance way torch.— Nessen Studio, Inc. (No. 3)

decorative entry doors

Decorative hardwood blocks and strips are used to dress up a series of six Bellwood entry doors designed primarily for custom homes and top priced tract homes. The hardwood pieces are applied to the face of the company's solid core doors. Each is primed and individually cartoned for protection.—Bellwood Co. (No. 4)

stain-resistant floor tile

A competitively priced floor tile that is resistant to grease, stains and household bleaches has been introduced under the trade name Polymerite. The tile, based on a new resin developed jointly by Ruberoid and Air Reduction Corp., is said to have excellent wearing qualities and flame-retardance characteristics.—Mastic Tile Division, The Ruberoid Co. (No. 5)



science laboratory unit

A mobile science laboratory unit h been added to National School's li of plastic surfaced classroom cabin The unit is fully equipped for cla room demonstrations with a stainl steel sink, pump and faucet, h grounded electrical outlets, a Gre law arm and propane bunsen burn with holder. It is completely surfac on the interior and exterior with V vamar plastic laminates and has lar swivel type locking casters.—Natio School Furniture Co. (No.

fabric ceilings

A method of using Fiberglas decor tive fabrics for ceiling applicatio has been introduced by Owens-Cor ing Fiberglas, opening up a wi range of design possibilities in su applications as schools or commerci installations. Fabric is tightly te sioned over rigid metal frames f ting standard 24x48-in. exposed suspension systems. Effective sou absorption and thermal resistance obtained by using building insulati above the panels in the plenum. Pain ing costs are eliminated as the pan can be lifted from the grid, rinsed a replaced. Material is incombustib will not stretch or sag.—Owens-Cor ing Fiberglas Corp. (No.

sandwich panels

Clark Industries is in the process setting up marketing outlets for stressed skin sandwich panel co structed with rigid Dylite expand polystyrene cores (a Koppers C product) made by a foam-in-pla technique. Panels are available in a size and thickness up to 8 ft.x20 ft 10 in. and in a variety of surface The core may be varied in densit from 1 to 10 lb. per cubic foot to pr vide required strength, insulation an rigidity. Panels can be manufactur to provide either structural or non structural components or units an can be easily modified with han tools.—Clark Industries, Inc. (No.

Reader Service

Pacific Architect & Builder
1945 Yale Place N., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

MARCH 1961

1 2 3 4 5 6 7
8 9 10 11 12 13

Name

Title

Firm

Address

City Zone State

plywood decking clip

A supporting clip for plywood decking designed to provide a tight, snug fit and to insure easy installation has been developed by Timber Engineering. Called Teco H-Clip, it is manufactured from 18-gage galvanized sheet steel. Snug fit lessens possibility of clips falling off during installation. Leveling arm facilitates installation regardless of variations in plywood thicknesses. Edges are smooth and rounded to eliminate snagging on the plywood. Clips are available for ⅜-, ½-, ⅝- and ¾-in. thicknesses.—Timber Engineering Co. **(No. 9)**

colored asbestos-cement board

Pabco's latest entry in the construction market is a colored flat asbestos-cement board in smooth or textured surface. Pab-Flex will be offered in nine shades. Matching paints for battens and trim also have been developed and will be distributed by the firm's paint division.—Pabco Roofing Division, Fibreboard Paper Products Corp. **(No. 10)**

decorative shower doors

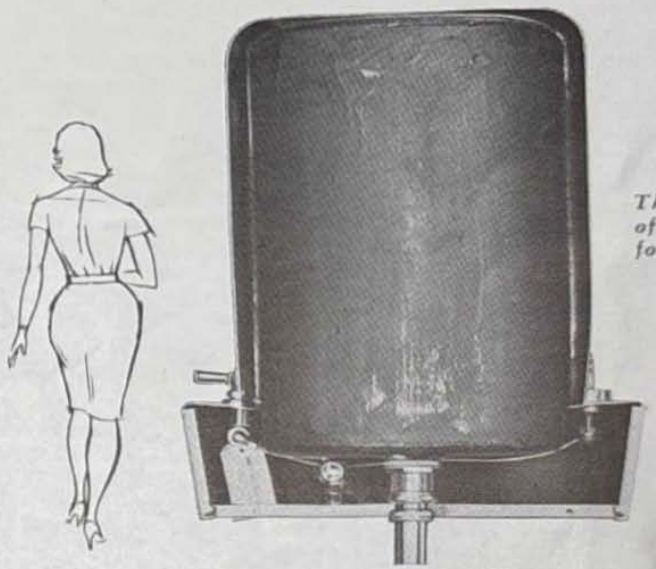
Growing popularity of decorative screens utilizing natural foliage or butterflies to create the patterns has prompted a similar line of tub and shower enclosures. Called the Omega line, the enclosures consist of safety glass into which leaves, ferns or butterflies are laminated and aluminum framing in gold, satin or black finish. Doors operate on nylon rollers. Vinyl moldings seal against moisture leakage and permit easy cleaning.—Loup Engineering Co. **(No. 11)**

electroluminescent panels

Westinghouse's electroluminescent panels have passed from the development to the marketing stage and are now available for architectural and interior designer specification. First extensive use of this new light source is scheduled for the Rice Hotel in Houston, now being remodeled where the Rayescent lamps will cover a 521-sq. ft. ceiling in the new lobby. The lamps are flat panels of glass with an electrical conductive film and coated with a special phosphor. When electricity is applied the panels glow. There are no filaments, tubes or vapors and the company says practically no heat is produced and the current drain is almost negligible. The two-dimensional light panels should open up all sorts of imaginative uses in restaurants, lobbies, public buildings and even homes. They will be available in sizes up to 30 in. square in a variety of colors and can be made in practically any two-dimensional shape. In the Houston application the Rayescent ceiling will be in the shape of a perfect ellipse colored blue to simulate the sky. Decals or silk screenings can be applied to the surface to produce a design. Aluminum fixtures for mounting are being produced by Kliegl Brothers Co., Inc.—Westinghouse Electric Corp. **(No. 12)**

ceramic-like wall finish

Glaz-Tile, a polyester plastic that can be applied with spray, brush or roller, provides a smooth, tough finish comparable to tile in appearance and durability for wallboards, masonry, concrete, wood, metal or plaster. The finish becomes an integral component of porous materials and will not chip or flake off. Wide color range is offered. Distribution is planned in Arizona, New Mexico and Colorado this year and on the West Coast in 1962.—Plastic Kolor, Inc. **(No. 13)**



This is the back of Haws drinking fountain model 73

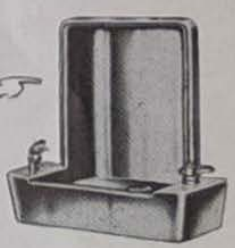
Look at the Back for a change!

Even our competitors' fountains look good from the front, but *Haws* models back up their good looks! This semi-recessed Model 73, for instance, is a beauty in 18 gauge, 304 stainless steel — and the craftsmanship goes *all the way around!* Careful quality is the standard at Haws — even on features you can't see. This fountain gives you automatic stream control; even has its head *locked* to the bowl for vandal-proof service.

And let's face it



This handsome Model 73 adds built-in class to hallways, lobbies—anywhere you choose to specify its beauty. You can't miss! Write for Haws comprehensive 1961 catalog and see. Write now!

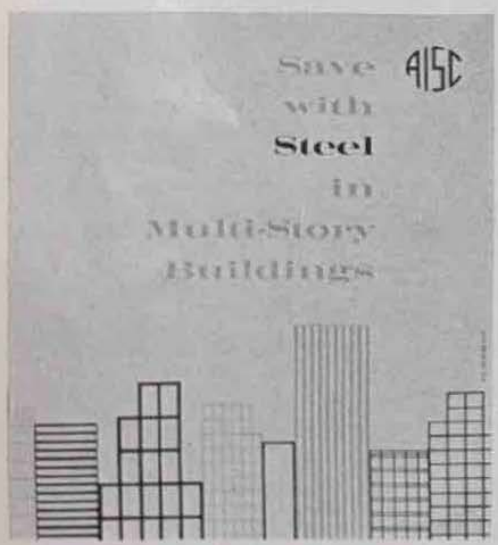


Since 1909 HAWS **DRINKING FOUNTAINS**

a product of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street — Berkeley 10, California
Export Dept: 19 Columbus Ave., San Francisco 11, California

pa&b pick of the month

Fifteen case histories are used to illustrate the title of "Save with Steel in Multi-Story Buildings" (AIA 17-A), a 48-page brochure. The buildings reviewed range from luxury apartments to hospitals and office structures. For each there is brief description of the design problem, data sheets, typical framing plans and, in most cases, cost figures. Three of the featured buildings are in the West: First Federal Savings & Loan Association, Hollywood, Calif., designed by Austin, Field & Fry; Harvest House Motor Hotel near Boulder, Colo., by Ralph D. Peterson & Associates; and California State Compensation Insurance Fund Home Office Building in San Francisco, by the California State Division of Architecture.—The American Institute of Steel Construction, Inc., 101 Park Ave., New York 17, N. Y.



Translucent Building Panels (AIA 17-A): presents complete line of Sanpan panels, window walls and curtain wall systems with detail drawings; 8 pp.—Panel Structures, Inc., 45 Greenwood Ave., East Orange, N. J.

Luminous Ceilings (AIA 31-F): catalogs plastic and aluminum ceiling panels and correlated fixtures; 8 pp.—Luminous Ceilings, Inc., 3701 N. Ravenswood Ave., Chicago 13, Ill.

Curtain Wall Panels: describes four basic panels and the many combinations possible by varying skin materials, colors, finishes, etc.; 8 pp.—Erie Enameling Co., Erie, Pa.

Monolithic Lightweight Concrete Joist Construction (AIA 4-E-6): outlines advantages and new design techniques with isometric details, cross section drawings, numerous on-the-job construction photos and technical data on steel domes; manual 4002-C; 68 pp.—Ceco Steel Products Corp., 5601 W. 26th St., Chicago 50, Ill.

Ply-Veneer Panels: describes utility panels of douglas fir core with kraft overlaid linings; outlines working and finishing techniques; 8 pp.—Silvatek Division, Weyerhaeuser Co., Tacoma 1, Wash.

The Simpson Redwood Story: handsomely illustrates exterior and interior applications of redwood with pattern and dimension data; 32 pp. Company also is offering a brochure on its 1961 line of doors (AIA 19-E-1), 8 pp. and movable partition panels (AIA 35-6), 8 pp.—Simpson Timber Co., 2039 Washington Bldg., Seattle 1, Wash.

Ceramic Tile Installation: describes the Thin-Set adhesive method with illustrated application data;—Miracle Adhesives Corp., 250 Pettit Ave., Bellmore, Long Island, N.Y.

Thermopane Insulating Glass: combines ordering and installation information in one publication; 8 pp.—Libbey-Owens-Ford Glass Co., 811 Madison Ave., Toledo 3, Ohio.

Fresh Air Electric Heating: discusses benefits of ducted systems and includes six pages of floor plans with recommended duct layouts; 40 pp.—Lennox Industries Inc., Marshalltown, Iowa.

Drafting Machine: gives complete details on Paragon Auto-Flow that maintains perfect balance at any boom angle; 4 pp.—Keuffel & Esser Co., Adams and Third Sts., Hoboken, N.J.

Ualco Aluminum Sliding Door: depicts new line with installation details; 4 pp.—Southern Sash Sales Supply Co., Inc., 818 20th St., Sheffield, Ala.

Gratings, Flooring and Treads: describes products with dimension drawings, safe load and other tables; 16 pp.—Borden Metal Products Co., Elizabeth, N.J.

Movable Partitions: emphasizes flexibility in size, surface and colors of the system; 4 pp.—Modern Partitions, Inc., 339 E. 16th St., Holland, Mich.

Plaster-Weld (AIA 21-F): describes bonding agent for plaster with application specifications; 4 pp.—Larsen Products Corp., Bethesda 14, Md.

Formica Doors (AIA 19-E-13): describes Formica faced doors with brief specifications; 4 pp.—Formica Corp., 4614 Spring Grove Ave., Cincinnati 32, Ohio.

Specifications for Metal Lathing and Furring (AIA 20-B-1): offers revised and updated specifications, including new rib metal lath with portland cement plaster, in 1961 edition; 20 pp.—Metal Lath Manufacturers Association, Engineers Bldg., Cleveland 1, Ohio.

Vinyl Asbestos and Asphalt Tile (AIA 23-G): depicts complete line in colors with abridged installation specifications; catalog LC-201; 12 pp.—Azrock Floor Products Division, Uvalde Rock Asphalt Co., Box 531, San Antonio 6, Texas.

OFFICE AID

For figuring siding costs and quantities, a slide rule estimator covers four standard redwood patterns. Pocket - size device computes amounts of siding in various nominal widths needed for each square of wall coverage, along with the quantity of nails required. Suggested nailing methods are shown.—California Redwood Association, 576 Sacramento St., San Francisco 11, Calif.

Forest Products (AIA 23-L): highlights Georgia-Pacific 1961 line in four publications covering decorative paneling, siding, fir plywoods, hardboard, etc.; 40 pp. in all.—Georgia-Pacific Corp., Equitable Bldg., Portland 4, Ore.

Weatherstripping (AIA 35-P-6): uses full size detail drawings to demonstate line of extruded aluminum bronze weatherstripping for doors, windows, saddles, etc., including new special door top protectors against water seepage in curtain wall construction; 28 pp.—Zero Weather Stripping Co., Inc., 453 E. 136th St., New York 54, N.Y.

The Stronghold Line of Nails in Schools: presents drawings of modern school and auxiliary buildings with accompanying detail drawings of various components showing the proper nail for each; 12 pp.—Independent Nail & Packing Co., Bridgewater, Mass.

Glass for Construction (AIA 26-A-1961): outlines features and specifications for the company's flat glass products with special emphasis on Thermopane insulating glass; 32 pp.—Libbey-Owens-Ford Glass Co., 811 Madison Ave., Toledo 1, Ohio.

Shallow Line Troffers: lists manufacturers and various suspended ceiling systems with a Benjamin troffer applicable to each system; describes units designed to allow plenum depth to be reduced; Bulletin A—Benjamin Division, Thomas Industries Inc., 207 E. Broadway, Louisville, Ky.

Architectural Anodized Aluminum Grills (AIA 14-P): depicts variety of design uses, includes detail drawings for various applications and complete specifications for Anotec grills.—Klemp International, 1132 W. Blackhawk St., Chicago 22, Ill.

Air Conditioning Units: introduces new line of Kennard/Nelson packaged central station units featuring both unit and automatic air filter matched components, with comprehensive selection charts; bulletin AC-100; 60 pp.—American Air Filter Co., Inc., 215 Central Ave., Louisville 8, Ky.

Translucent Fiberglass Panels (AIA 26-A-9): provides data on Filoplate, now structurally guaranteed for the life of the installation, and Rololite, a cross-corrugated panel in roll form; folder 144; 8 pp.—Filon Plastics Corp., 333 N. Van Ness Ave., Hawthorne, Calif.



The CF&I giant protects "Freeways"

...with Realock Fence

The CF&I giant stands for many dependable steel products used in the construction industry. One of them — Realock Fence — is the proven way to assure positive freeway protection.

The chain-link fabric of steel in a Realock Fence makes it attractive and durable. Sturdy posts are anchored in concrete. And the steel fabric is galvanized after weaving for maximum resistance to corrosion.

Choose the Realock Fence that best meets your needs... in light or heavy construction... with barbed or knuckled selvages... with or without barbed wire tops. Realock's professional crews will erect your fence.

Ask for a free estimate today. Consult your nearest CF&I office.

Los Angeles • Oakland • Portland • San Francisco
San Leandro • Seattle • Spokane • Denver
Salt Lake City • Phoenix

CF&I STEEL

REALOCK FENCE

THE COLORADO FUEL AND IRON CORPORATION

• **Timber Structures, Inc.**, has opened a district office at 2757 S. Harrison St. in Denver under the management of Gerald C. Doblie. The office will cover all of Colorado, most of Wyoming and part of Nebraska. Doblie has been employed at the company's Portland plant since his graduation from Oregon State College.

• **W. P. Fuller & Co.** has elected E. R. MacMillan to the new post of vice president, operations, and John M. Fuller, great grandson of the founder, treasurer. MacMillan has been serving as assistant to the president in the San Francisco headquarters. Fuller has been manager of the central region since January 1959.

• **Genie-Air Products** of Los Angeles plans to expand its distributorship area to nationwide coverage and has appointed W. C. Walter to head the new national sales program as marketing manager. Walter formerly was with Borg Warner Corp.

• **National Gypsum Co.** has appointed Fred A. Manske to the newly created post of Los Angeles district sales manager. He has been a salesman for the company in the San Francisco area since 1957.

• **California Metal Enameling Co.**, Los Angeles, has elected Standish K. Penton as chairman of the board, secretary and treasurer. His brother, Hugh, is the firm's new president. The new officers were named following the death of their father, J. T. Penton, in December. Named executive vice president was Nelson W. Niece.

• **The Celotex Corp.** has named Thomas M. Durham as architectural sales representative for northern California. He will headquarter in San Francisco.

• **Pacific Fasteners Corp.** has promoted Donald Nofziger to regional sales manager in the Southern California area.

• **Kaiser Steel Corp.** has appointed B. E. Olsen as assistant manager of sheet and strip sales. He formerly was a sales representative with central district sales in Oakland.

• **H & S Metal Products,** Los Angeles, producer of castings for the aircraft and space industries for 20 years, has announced its entry into custom metal castings for the architectural field. New division will produce a solar screen system and other decorative items under the name of Hands.

• **Reynolds Metals Co.** has appointed Wallbestos, Inc., of Seattle and Spokane as distributor for aluminum residential shingles in Washington.

• **Utah Prestressed Concrete Co.**, Salt Lake City, founded six years ago as a division of Utah Sand & Gravel Products Corp., has been organized as a separate firm. J. Eastman Hatch c tinues as president of both firms.

• **Superior Scaffold Co.**, Culver C Calif., has been appointed natio distributor for a line of scaff clamps manufactured by Boulton T ular Structures, Ltd., of England.

ASSOCIATIONS

• **Western Red Cedar Lumber As ciation** kicked off its 1961 promot campaign with a meeting attended some 200 U. S. and Canadian indus representatives in Bellingham, Wa in January. Presented in clinic for the program was a preview of sessio which will be held for wholesale retailers, builders and archite throughout the country during t year. Speakers included Wil Chaus of Chaussee Siding Co., Bellev Wash., who discussed advertis techniques and procedures; James Porter of Archer-Daniels-Midla Minneapolis, painting; and John A derson, Olympic Stained Products C Seattle, staining western red ced

• **Arizona Chapter,** Producers' Cou cil, was formally inaugurated as t 46th local unit at a dinner meeting Scottsdale November 18. Some architects and producers were on ha for the chartering ceremony. Office of the group are Robert J. McMulla Executone, Inc., president; Dea Huckaba, United States Plywo Corp., vice president; Harold F. Smit Gladding, McBean & Co., secretar and Milton J. Merrick, Owens-Cor ing-Fiberglas Corp., treasurer. Elm A. Lundberg, president of the nation council, presented the charter to t new chapter. Field director Willia Bullough and executive assista Keith Belch also attended the cer mony.

• **Portland Cement Association** h reelected one western director to two-year term: Richard A. Gra Arizona Portland Cement Co. an California Portland Cement Co., L Angeles. Chairman of the board H. A. Sawyer of Lone Star Cemen Co., succeeding Cris Dobbins of Ide Cement Co.

• **Red Cedar Shingle Bureau** mem bers have reelected Russell H. Fa rington of Everett, Wash., to serve second term as president. Selected fo vice president at the recent annua meeting in Seattle was C. G. Watso of New Westminster, B.C. Dr. Donal H. Clark, who retired recently fro his post as director of the Washingto State Institute of Forest Products, ha



The
ALEXANDER
HAMILTON
San Francisco

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

Whether national or regional Convention—Association, Club or Business Group . . . Successful

Meetings
begin at a
HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

- SAN FRANCISCO
  The Alexander Hamilton
  Hotel Stewart
  Hotel Don
- FRESNO
  Hotel Californian
- SAN DIEGO
  The El Cortez Hotel
  El Cortez Motel
- BAKERSFIELD
  Hotel El Tejon
- MONTEREY
  Hotel San Carlos
- ALAMEDA
  Hotel Alameda
- OAKLAND
  Lake Merritt Hotel
- RICHMOND
  Hotel Don
- VALLEJO
  Casa de Vallejo Hotel
- WOODLAND
  Hotel Woodland
- OROVILLE
  Oroville Inn
- GRASS VALLEY
  Bret Harte Inn

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

joined the staff as promotion director on a part-time basis so that he can continue as an industry consultant.

• **Handsplit Red Cedar Shake Association** has elected Frank W. Schafer of Aberdeen, Wash., as president for 1961. New vice president is James Jackson of Moclips, Wash.

• **Insulation Board Institute** has elected S. M. Lewis vice president for 1961. He is building materials division sales manager for the Pioneer Division, The Flinkote Co., in Los Angeles. New president of the organization is J. W. Brown, senior vice president, National Gypsum Co., Buffalo, N. Y.

• **National Oak Flooring Manufacturers Association** is opening an office at 292 S. La Cienega Blvd., Los Angeles, which will serve as a prototype for a series of regional offices across the country. Fred H. Comstock will be regional manager.

• **Western Pine Association** has picked David Lucas to fill the newly created post of field supervisor. He has served as a district field manager for the organization the past nine years.

• **Southern California Plastering Institute** has awarded four $1,200 scholarships to students at the University of Southern California School of Architecture. Winners, all third- and fourth-year students, are Michael Goodwin, Gary Call, Eugene Flores and Claflin Ballance. Selection of award winners was made by AIA chapter representatives C. Day Woodford, Southern California; Roland Russell, Pasadena; and J. Herbert Brownell, Orange County.

• **Structural Clay Products Research Foundation** has reelected all top officers, including its treasurer, William G. Temple, president of Denver Brick & Pipe Co., Denver. Three westerners in addition to Temple, were named to serve on the board of management: James B. Crawford, Kraftile Co., Niles, Calif.; John W. Rice Jr., Union Brick Co., San Diego; Ralph J. Welte, Summit Pressed Brick Co., Pueblo.

• **Refrigeration and Air Conditioning Contractors Association of Southern California** at its recent annual convention elected these officers for 1961: L. P. Jacobsen, regional construction and service manager for York Corp. in Los Angeles, president; Albert Hanson, National Refrigeration Sales, vice president; and Robert L. Heisler, Key Air Conditioning Co., Inc., secretary-treasurer.

Colorado engineering students to get aid from contractors

The University of Colorado has received $5,000 from state contractors as an emergency loan fund for engineering students.

The money, given for five years, will be known as the Bate-Petry-Associated Building Contractors of Colorado Emergency Loan Fund. It will replace the Bate-Petry Memorial Award presented annually by the association to the Colorado contractor "who contributed most to the industry in the last year."

Both the original award, a plaque provided by a $3,000 endowment, and the loan fund, created by a $2,000 addition this year to the initial amount, memorialize the late Thomas Bate and Nicholas G. Petry of Denver, charter members of the ABCC. The award was established after their deaths about 10 years ago.

The association has taken an increased interest in the university since starting a yearly building industry conference on the Boulder campus in the early 1950s. The 10th such meeting was held in Denver's Albany Hotel February 14, with William Zeckendorf, president of Webb & Knapp, Inc., New York City, as the guest speaker.

• **Associated Building Contractors of Colorado** has named John N. Johansson of Olson Construction Co., Denver, as president. Other new officers: Vincent K. Jones Jr., vice president; Ralph A. Mitchell, secretary; John D. Lonergan, treasurer.

• **Northern and Central California Chapter, AGC,** has elected J. P. Silvestri of San Francisco as president. The three vice presidents are Donald K. Grant of South San Francisco, Bud O. Stevenson of Redwood City and William H. Baldwin of Marysville. Completing the slate are San Franciscans Paul A. Elsner, treasurer, and Bruce McKenzie, manager.

• **Tucson Chapter, Arizona Building Contractors,** has elected this slate of officers: Wilbur F. Connelly, president; M. P. Craven, vice president; William F. Grabe, treasurer; H. L. Burke, executive secretary.

• **Eastern Washington Builders Chapter, AGC,** has named U. D. Powell of P & B Co., Inc., as president; Paul Sceva, vice president; and C. E. Hively, reappointed executive secretary.

• **Seattle Construction Council** has picked Fred Frodesen, a partner in the firm of F. Frodesen Masonry, as its new president. Other officers are John Ford, first vice president; Lynn Miller, second vice president; B. A. Taft, secretary; and Donald W. Close, treasurer.

• **Youel & Huffman,** general contracting firm in Eugene, is now known as W. E. Youel Construction Co. with a new address, 2875 Cheshire St. The firm was organized 13 years ago by Gerald Huffman, who retired January 1, and Wayne E. Youel, who has purchased the former's interest.

• **Robert Rothschild,** president of Rothschild, Raffin & Weirick, general contractors, has been appointed chairman of the Building Industry Conference in San Francisco for 1961. Vincent Raney, architect, has been named vice chairman.

• **The Austin Co.** has named Raymond F. Rowan as district construction superintendent of its Northwest district with headquarters in Seattle.



INCREASED PROFITS
with EFCO FORMS

- Save time, material, money.
- Steel faces assure lifetime service.
- Easy to handle and assemble.
- Available with return option.
- Free form erection drawings.

ECONOMY FORMS CORP.
Home Office: Des Moines, Iowa
EFCO ECONOMY FORMS

Nearby Sales Offices:

DENVER, COLO., 2425 Walnut
KENT, WASH., 721 Meeker
LOS ANGELES, CAL., 5718 Long Beach Ave.
OAKLAND, CAL., 321 E. 12th
PORTLAND, O., 208 N.E. Oregon St.

Other offices coast to coast

not specified

a most-welcomed matchmaker

With little ado or fanfare, a most important volume—and a first in its field—made its appearance in the Northwest a few months ago; in fact, the compiler has not even identified herself in the work. Yet Anne Todd deserves special recognition for a good job done in assembling an illustrated directory of more than 70 craftsmen living in Washington, Oregon, Idaho, Montana and Alaska.

As regional representative for the American Craftsmen's Council, Mrs. Todd, who doubles as art critic for the Seattle Times, has prepared the directory in ring-binder form so that pages may be removed and returned to it and so that supplemental data can be added without disturbing the alphabetical order in which the craftsmen are presented. For each artist represented there is such information as media employed, a concise but clear description of the craft (Sculpture: commissions portraits, designs for decoration; particularly likes animals and life forms.), method of selling, training, commissions, exhibitions and awards. This work should prove invaluable to architects, landscape architects, interior designers and city planners and it is hoped that similar directories will be assembled in other regions. It should stimulate a real integration of art in the design process.

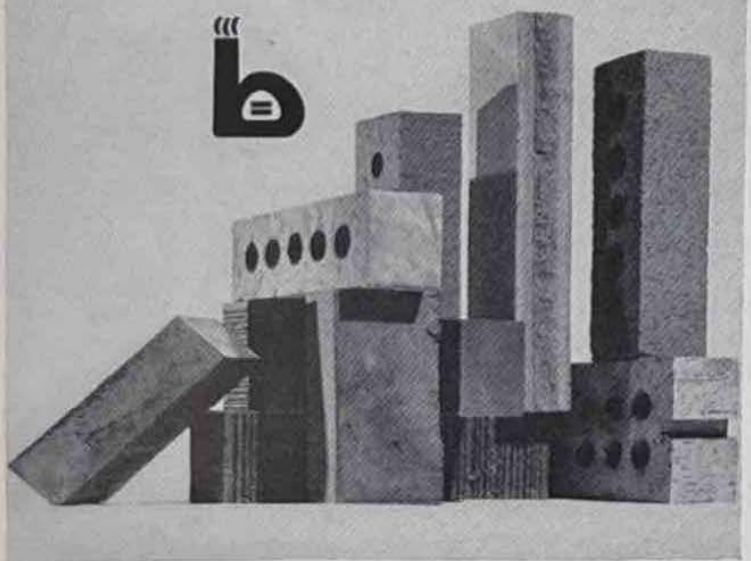
Supplements will be issued from time to time, with a four-man jury reviewing proposed additions. "Charges for the supplements will vary with the amount of material, but will be held close to production cost," Mrs. Todd explains. Copies of the directory can be obtained at $10 each by writing "Architectural Craftsmen," 300 Columbia St., Seattle.

R.E.K.

That screen wall in your clinic will give privacy, be permanent, and look elegant. Only 800 Clay City Norman Brick should do the job.

Made only by **builders brick co.** Seattle

Distributors: VANCOUVER, B.C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co. • Oregon: PORTLAND, Columbia Brick Works; SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.



Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place N., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13 state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 202 Green St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

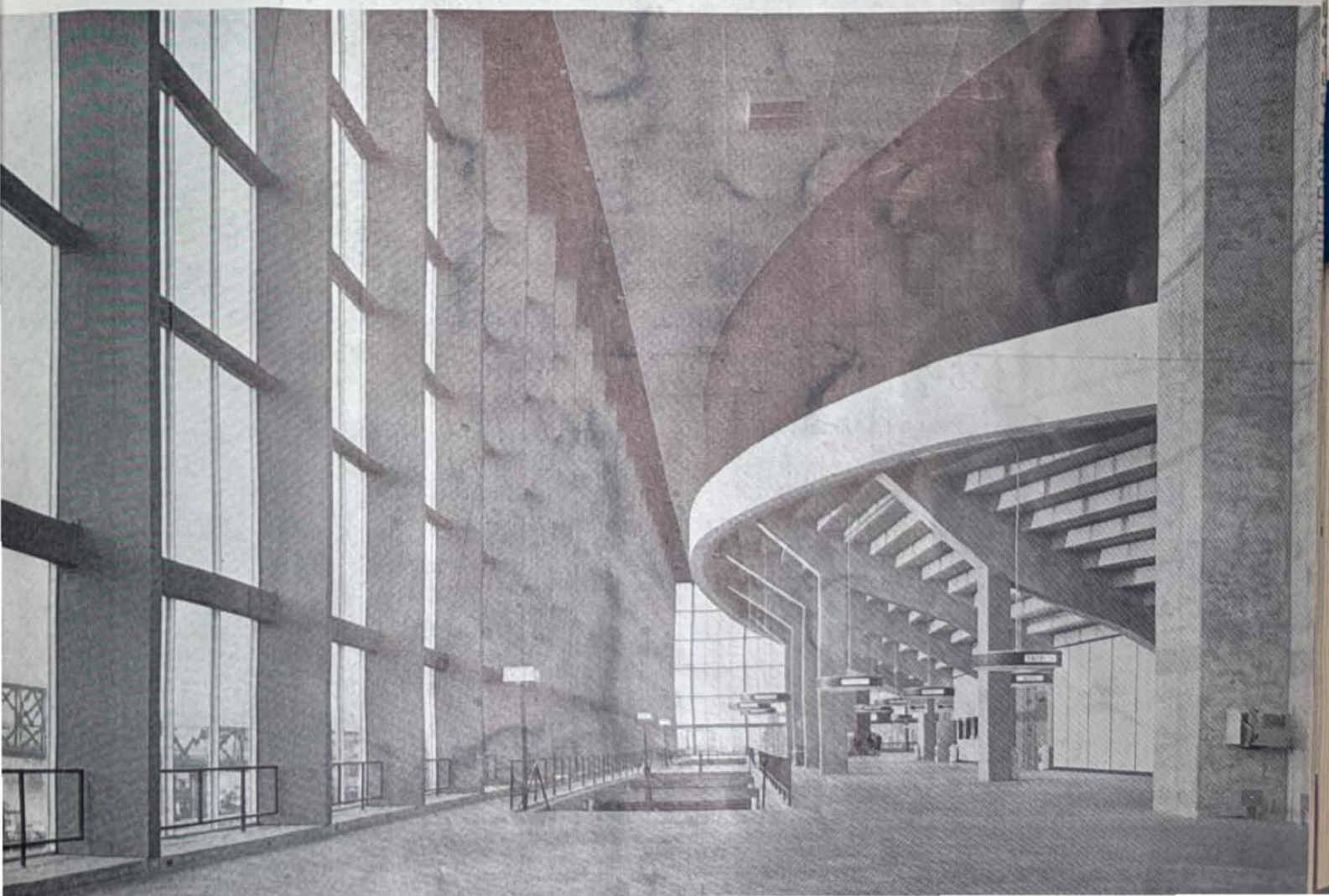
ADVERTISERS

Builders Brick Company	34
Colorado Fuel and Iron Corporation	31
Economy Forms Corporation	33
Handlery Hotels	32
Haughton Elevator Company	II cover
Haws Drinking Faucet Company	29
Macomber, Inc.	III cover
Mahon, R. C. Company	IV cover
McCormick & Baxter Creosoting Company	9

Pacific Architect & Builder

LIBRARY
SCHOOL OF ARCHITECTURE & ALLIED ARTS
UNIVERSITY OF OREGON

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ APRIL 1961





don't let price BLIND you to the real cost!

Buying merchandise on the basis of a price tag warrants examination of all the economic "facts of life". For example: is the first cost the total cost....or will extra handling and "call-backs" change the price?...is the manufacturer known so he can be reached in the event there is a complaint?...does his advertising expenditure assist you in selling your product on the market?... AND MOST IMPORTANT OF ALL....does he guarantee his product to your customer for 50 years?

Before you make your next purchase of soil pipe and fittings get the full story of this "guaranteed difference"....write to:



The 50 year written guarantee is issued by the Cast Iron Soil Pipe Foundation to the home owner.

All are members of the Cast Iron Soil Pipe Institute

CAST IRON SOIL PIPE FOUNDATION

Alabama Pipe Company • The American Brass & Iron Foundry • Rich Manufacturing Company

6723 SOUTH WESTERN AVENUE • LOS ANGELES 47, CALIFORNIA

Pacific Architect & Builder April 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

20 Portland Memorial Coliseum, Portland: Skidmore, Owings & Merrill, Architects

26 Beach Shelter, Newport Beach, California: Blurock, Ellerbroek & Associates, Architects — design

27 La Jolla Fashion Center, La Jolla, Calif.: Edward H. Fickett, Architect

29 Precast Columns Speed Garage Construction in Beverly Hills — methods & materials

4 Project Preview

5 Building Permits

8 The Building Month

18 T-Square Talk

departments

30 Products

31 Literature

33 Manufacturers/Suppliers

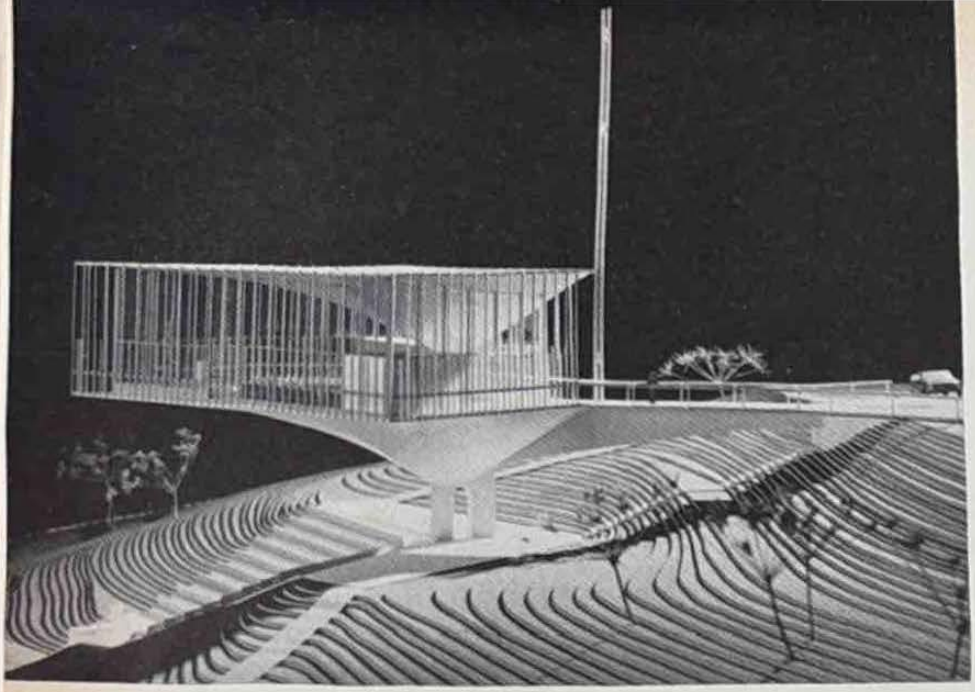
34 Not Specified

VOLUME 67, NUMBER 4

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Portland Memorial Coliseum, Portland (p. 20)—Skidmore, Owings & Merrill, Architects; Art Hupy photo.



NEIGHBORHOOD CHAPEL

in Bellevue, Wash., for Church of Good Shepherd, liber
Protestant sect, will be singularly supported by rei
forced concerte hyperbolic paraboloid base. Glass an
wood rails will make up rest of 3,000-sq. ft. structur
Building on lower slope will house church school, soci
hall and administration facilities. Architects: Kir
Wallace, McKinley & Associates.



SKYLINE SENIOR HIGH SCHOOL

to be built in highly developed residential area in Salt Lake City will provide for community participation in all group and, in some cases, educational functions. Reinforced concrete complex will consist of four structures: academic unit, gymnasium, auditorium, industrial arts and boiler building. Plan calls for small landscaped courts interspersed between classrooms and along corridors to provide natural light and break long corridors; large enclosed central court with small amphitheater; and still another court serving library. Architects: Dean L. Gustavson Associates.



INDUSTRIAL COMPLEX

to incorporate research, development and test activities
Nortronics, subsidiary of Northrup Corp., in Anaheim, C
expresses trend in this type of project where landscaping
parking are considered integral part of design. Separate recep
lobby with floating plane roof, glass walls and original art
will be provided to meet security regulations. Building ser
will be grouped in central core. Construction cost is estimate
$16 psf. Architects-engineers: Daniel, Mann, Johnson & Mendenh



15-UNIT HOTEL

now underway in Waikiki is scheduled for completion by July. Costing $130,000, it will consist of precast column trees, precast joists, concrete slabs and block walls, with undercover parking. Architects: Bassetti & Morse; associate: John Tatom.

As We Go To Press

. . . Highlights & Sidelights

COLISEUM AFTERMATH—When the PA&B editors selected the Portland Memorial Coliseum for its cover feature this month, they had no idea it would be making the news simultaneously—in one instance a happy event; in the other, a tragedy. It was no surprise, of course, that the Oregon Chapter, AIA, gave the project a top award in its 1961 competition (see p. 13); but the next piece of news was indeed a blow when it was learned that Andre L. Lamoreux, in charge of all phases of designing and building the coliseum for Skidmore, Owings & Merrill, had been killed in an automobile accident March 17. The 34-year-old architect had been a member of SOM's Portland staff since 1953, was made a participating associate in 1958. Upon receiving his degree from Cornell University in 1950, Lamoreux was employed by Faragher & Macomber in Rochester, N.Y., and later by Whitehouse & Price in Spokane.

MONITORING THE MONORAIL—No sooner had the managing director of Sweden's Alweg International unveiled details of its monorail train, which will travel the 5,200 ft. between downtown Seattle and the Century 21 Exposition grounds in 95 seconds, than the Municipal Art Commission rapped the design of the Westlake station and ramp, declaring it out of step with the mall proposed at that terminus. The Los Angeles firm of Adrian Wilson & Associates is the architectural consultant on the project.



CONSTRUCTION of monorail, superimposed on photo as it leaves downtown terminal in Seattle, will get underway this month by Howard S. Wright Construction Co. Two trains will operate on separate precast concrete tracks, reversing their direction on same beamway. Completion date is set for November.

QUEEN EMMA ENCORE—Following several months of bitter dispute among the Honolulu Redevelopment Agency, the Hawaii Chapter, AIA, and the city government officials, as well as the public at large, the Queen Emma project for three high-rise structures in central Honolulu has been awarded to Queen Emma Gardens, whose principals include E. E. Black, Ltd., and Castle & Cooke, with Minoru Yamasaki of Birmingham, Mich., as architect. This reverses the original decision which drew sharp criticism.

BUILDING PERMITS

Volume goes up for second month in row

Building starts in the 13 western states for February total $416,570,031, an increase of $14.9 million over the same month in 1960. Nine states share in the increase, leading off with Arizona which is up $13.4 million for the month. Other states, with rates of increases, are Colorado, $6.4 million; Washington, $2.3 million; New Mexico, $1.7 million; Nevada, $1.6 million; Utah, $907,000; Montana, $284,000; Alaska, $87,000; and Idaho, $20,000. Largest decrease is in California, down $8.1 million. Other states showing decreases, with rate of drop, are: Oregon, $2.5 million; Hawaii, $713,000; and Wyoming, $432,000.

At the same time, number of permits issued declined 704 to 50,885 for February. By states, decrease in number of project starts ranges from 6 in Washington to 1,650 in California. Increased activity is noted in seven states, ranging from a rise of 3 in Idaho to 943 in Arizona.

Residential dollar volume is almost exactly half of the overall total. The figure is $209,731,714, an increase of $2.4 million over the February 1960 amount. At the same time, the number of residential units started shows a drop of 770.

For the first two months of 1961, permits issued by nearly 500 agencies in the 13-state area total $835,315,722, an increase of $89.3 million over the first two months of 1960. Nearly all the states share in the increases, ranging from a $92,000 rise in Alaska to a $41.9 million boost in California. Only Oregon, down $2.4 million, and Wyoming, down $705,000, show decreases for the period.

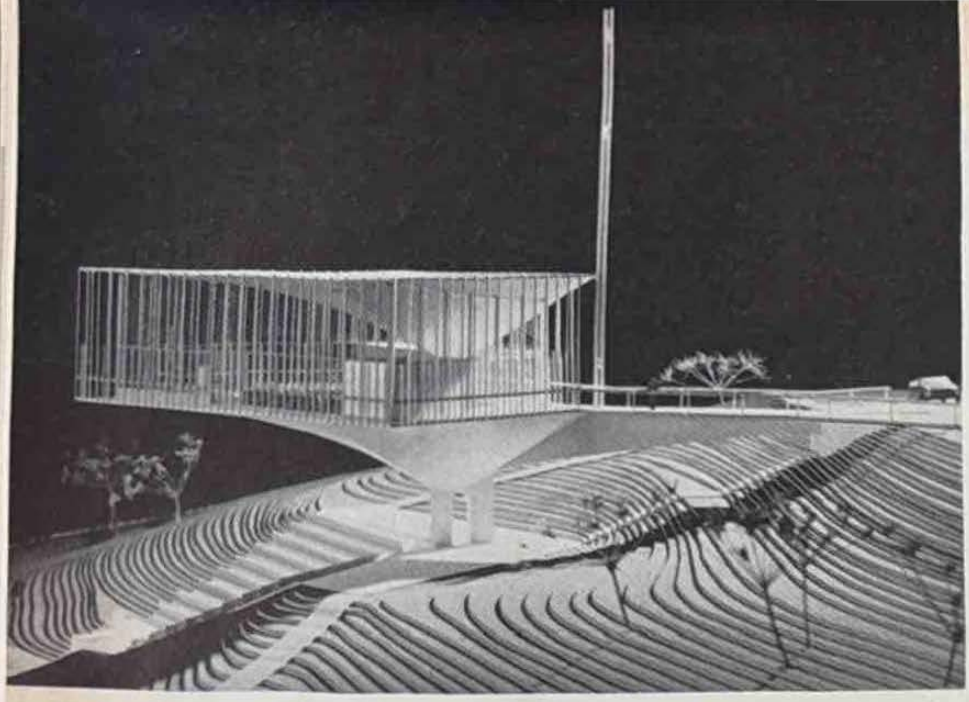
Again the residential figures indicate housing has not picked up as strongly as other types of construction. Two-month total for residential is $427,297,450, up $37.7 million, spread through nine states.

In the top 25 agencies for February are 14 from California, four from Arizona, two each from Colorado and Washington and one each from Utah, New Mexico and Hawaii. Unusually high total for Martinez, Calif., which puts it in the top group reflects a permit for a $9.9 million veterans hospital.

Top 25 agencies

	February 1961	February 1960
1. Los Angeles	$56,006,574	$56,480,162
2. Los Angeles Co.	19,007,448	25,738,156
3. Honolulu	13,334,634	15,254,495
4. Denver	10,411,019	4,898,070
5. Martinez, Calif.	19,001,794	389,460
6. San Diego	9,102,465	10,717,670
7. King Co., Wash.	8,569,880	5,371,585
8. Phoenix	8,466,947	4,419,386
9. San Jose	8,204,005	7,006,815
10. Seattle	7,164,607	6,490,638
11. San Francisco	6,974,527	11,785,725
12. Sunnyvale, Calif.	6,000,256	1,235,620
13. Maricopa Co., Ariz.	5,124,690	Nil
14. Tucson	5,059,965	4,170,283
15. San Diego Co.	4,947,500	9,299,900
16. Riverside Co., Calif.	4,861,861	5,483,119
17. Salt Lake Co.	4,582,547	1,778,940
18. Pima Co., Ariz.	4,559,814	2,284,174
19. Sacramento Co.	4,324,124	9,049,831
20. Orange, Calif.	4,088,939	1,105,652
21. Huntington Beach, Calif.	4,032,484	1,498,593
22. Albuquerque	3,702,924	3,601,597
23. Adams Co., Colo.	3,494,995	1,008,905
24. San Bernardino Co., Calif.	3,461,058	3,503,324
25. Oakland	3,435,060	3,850,219

For a complete tabulation of permits issued by the nearly 500 agencies surveyed, see the following two pages.



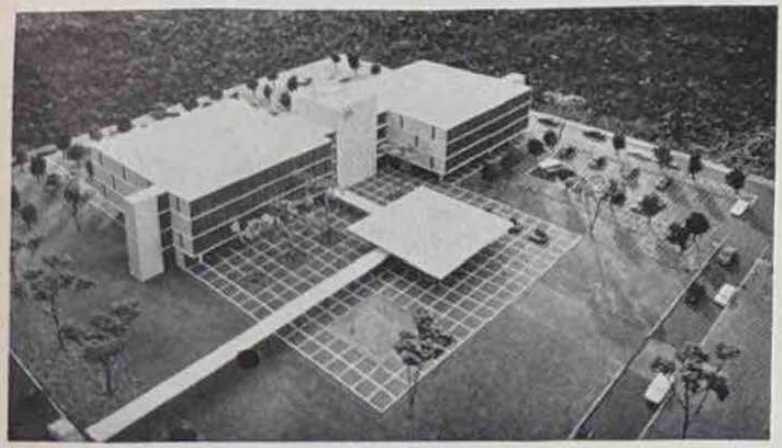
NEIGHBORHOOD CHAPEL

in Bellevue, Wash., for Church of Good Shepherd, liberal Protestant sect, will be singularly supported by reinforced concrete hyperbolic paraboloid base. Glass and wood rails will make up rest of 3,000-sq. ft. structure. Building on lower slope will house church school, social hall and administration facilities. Architects: Kirk, Wallace, McKinley & Associates.



SKYLINE SENIOR HIGH SCHOOL

to be built in highly developed residential area in Salt Lake City will provide for community participation in all group and, in some cases, educational functions. Reinforced concrete complex will consist of four structures: academic unit, gymnasium, auditorium, industrial arts and boiler building. Plan calls for small landscaped courts interspersed between classrooms and along corridors to provide natural light and break long corridors; large enclosed central court with small amphitheater; and still another court serving library. Architects: Dean L. Gustavson Associates.



INDUSTRIAL COMPLEX

to incorporate research, development and test activities of Nortronics, subsidiary of Northrup Corp., in Anaheim, Calif., expresses trend in this type of project where landscaping and parking are considered integral part of design. Separate reception lobby with floating plane roof, glass walls and original artwork will be provided to meet security regulations. Building services will be grouped in central core. Construction cost is estimated at $16 psf. Architects-engineers: Daniel, Mann, Johnson & Mendenhall.



15-UNIT HOTEL

now underway in Waikiki is scheduled for completion by July. Costing $130,000, it will consist of precast column trees, precast joists, concrete slabs and block walls, with undercover parking. Architects: Bassetti & Morse; associate: John Tatom.

As We Go To Press

. . . Highlights & Sidelights

COLISEUM AFTERMATH—When the PA&B editors selected the Portland Memorial Coliseum for its cover feature this month, they had no idea it would be making the news simultaneously—in one instance a happy event; in the other, a tragedy. It was no surprise, of course, that the Oregon Chapter, AIA, gave the project a top award in its 1961 competition (see p. 13); but the next piece of news was indeed a blow when it was learned that Andre L. Lamoreux, in charge of all phases of designing and building the coliseum for Skidmore, Owings & Merrill, had been killed in an automobile accident March 17. The 34-year-old architect had been a member of SOM's Portland staff since 1953, was made a participating associate in 1958. Upon receiving his degree from Cornell University in 1950, Lamoreux was employed by Faragher & Macomber in Rochester, N.Y., and later by Whitehouse & Price in Spokane.

MONITORING THE MONORAIL—No sooner had the managing director of Sweden's Alweg International unveiled details of its monorail train, which will travel the 5,200 ft. between downtown Seattle and the Century 21 Exposition grounds in 95 seconds, than the Municipal Art Commission rapped the design of the Westlake station and ramp, declaring it out of step with the mall proposed at that terminus. The Los Angeles firm of Adrian Wilson & Associates is the architectural consultant on the project.



CONSTRUCTION of monorail, superimposed on photo as it leaves downtown terminal in Seattle, will get underway this month by Howard S. Wright Construction Co. Two trains will operate on separate precast concrete tracks, reversing their direction on some beamway. Completion date is set for November.

QUEEN EMMA ENCORE—Following several months of bitter dispute among the Honolulu Redevelopment Agency, the Hawaii Chapter, AIA, and the city government officials, as well as the public at large, the Queen Emma project for three high-rise structures in central Honolulu has been awarded to Queen Emma Gardens, whose principals include E. E. Black, Ltd., and Castle & Cooke, with Minoru Yamasaki of Birmingham, Mich., as architect. This reverses the original decision which drew sharp criticism.

BUILDING PERMITS

Volume goes up for second month in row

Building starts in the 13 western states for February total $416,570,031, an increase of $14.9 million over the same month in 1960. Nine states share in the increase, leading off with Arizona which is up $13.4 million for the month. Other states, with rates of increases, are Colorado, $6.4 million; Washington, $2.3 million; New Mexico, $1.7 million; Nevada, $1.6 million; Utah, $907,000; Montana, $284,000; Alaska, $87,000; and Idaho, $20,000. Largest decrease is in California, down $8.1 million. Other states showing decreases, with rate of drop, are: Oregon, $2.5 million; Hawaii, $713,000; and Wyoming, $432,000.

At the same time, number of permits issued declined 704 to 50,885 for February. By states, decrease in number of project starts ranges from 6 in Washington to 1,650 in California. Increased activity is noted in seven states, ranging from a rise of 3 in Idaho to 943 in Arizona.

Residential dollar volume is almost exactly half of the overall total. The figure is $209,731,714, an increase of $2.4 million over the February 1960 amount. At the same time, the number of residential units started shows a drop of 770.

For the first two months of 1961, permits issued by nearly 500 agencies in the 13-state area total $835,315,722, an increase of $89.3 million over the first two months of 1960. Nearly all the states share in the increases, ranging from a $92,000 rise in Alaska to a $41.9 million boost in California. Only Oregon, down $2.4 million, and Wyoming, down $705,000, show decreases for the period.

Again the residential figures indicate housing has not picked up as strongly as other types of construction. Two-month total for residential is $427,297,450, up $37.7 million, spread through nine states.

In the top 25 agencies for February are 14 from California, four from Arizona, two each from Colorado and Washington and one each from Utah, New Mexico and Hawaii. Unusually high total for Martinez, Calif., which puts it in the top group reflects a permit for a $9.9 million veterans hospital.

Top 25 agencies

	February 1961	February 1960
1. Los Angeles	$56,006,574	$56,480,162
2. Los Angeles Co.	19,007,448	25,738,156
3. Honolulu	13,334,634	15,254,495
4. Denver	10,411,019	4,898,070
5. Martinez, Calif.	19,001,794	389,460
6. San Diego	9,102,465	10,717,670
7. King Co., Wash.	8,569,880	5,371,585
8. Phoenix	8,466,947	4,419,386
9. San Jose	8,204,005	7,006,815
10. Seattle	7,164,607	6,490,638
11. San Francisco	6,974,527	11,785,725
12. Sunnyvale, Calif.	6,000,256	1,235,620
13. Maricopa Co., Ariz.	5,124,690	Nil
14. Tucson	5,059,965	4,170,283
15. San Diego Co.	4,947,500	9,299,900
16. Riverside Co., Calif.	4,861,861	5,483,119
17. Salt Lake Co.	4,582,547	1,778,940
18. Pima Co., Ariz.	4,559,814	2,284,174
19. Sacramento Co.	4,324,124	9,049,831
20. Orange, Calif.	4,088,939	1,105,652
21. Huntington Beach, Calif.	4,032,484	1,498,593
22. Albuquerque	3,702,924	3,601,597
23. Adams Co., Colo.	3,494,995	1,008,905
24. San Bernardino Co., Calif.	3,461,058	3,503,324
25. Oakland	3,435,060	3,850,219

For a complete tabulation of permits issued by the nearly 500 agencies surveyed, see the following two pages.

Building Permit Totals f

First Column Figures in Parentheses are Number of Residential Units • Second Column is Do

CALIFORNIA	Res.	$ Value	Total $
Alameda	(56)	$ 478,745	$ 736,146
Alameda Co.	(32)	376,250	597,700
Albany	(32)	194,233	208,560
Alhambra	(46)	685,900	784,990
Anaheim	(172)	1,936,800	3,316,526
Antioch	(4)	56,036	94,495
Arcadia	(59)	565,674	729,428
Arroyo Grande	(6)	69,000	80,260
Artesia	(5)	60,700	123,160
Atherton	(1)	40,000	103,616
Atwater	(11)	118,515	147,965
Auburn	(4)	54,740	95,485
Avalon		Nil	15,600
Azusa		Nil	22,475
Bakersfield	(67)	845,600	1,214,774
Baldwin Park	(106)	1,129,750	1,262,225
Banning	(21)	201,608	279,133
Barstow	(18)	128,650	548,574
Bell	(2)	15,500	45,360
Bellflower	(54)	471,400	581,870
Belmont	(11)	218,000	249,250
Benicia	(1)	10,000	21,847
Berkeley	(3)	55,500	501,490
Beverly Hills	(46)	1,512,000	3,159,114
Bradbury		Nil	900
Brawley	(26)	335,000	344,925
Brea	(11)	140,700	155,034
Buena Park	(4)	65,025	1,603,537
Burbank	(4)	45,700	560,861
Burlingame	(3)	66,500	407,407
Butte Co.		Nil	151,200
Calexico	(1)	4,000	15,965
Campbell	(20)	135,879	185,842
Carlsbad	(14)	157,000	185,900
Carmel	(3)	45,000	58,940
Chico	(3)	57,400	256,008
Chino	(6)	85,280	157,952
Chula Vista	(20)	101,735	232,076
Claremont	(14)	175,800	210,550
Coalinga		Nil	6,100
Colton	(3)	29,728	43,945
Commerce	(2)	17,700	211,425
Compton	(9)	77,710	442,515
Concord	(101)	1,215,146	1,356,281
Cntra. Csta. Co.	(117)	1,813,212	3,039,776
Corona	(2)	25,014	71,837
Coronado		No reply	No reply
Corte Madera	(10)	183,604	184,704
Costa Mesa	(108)	1,310,503	1,593,797
Covina	(102)	1,063,000	1,316,317
Cudahy	(5)	45,800	114,200
Culver City	(8)	150,900	558,688
Dairy Valley		Nil	2,250
Daly City	(9)	119,623	204,323
Davis	(11)	107,000	168,250
Delano	(21)	250,016	281,809
Downey	(71)	577,200	1,254,435
Duarte		Nil	22,950
El Cajon	(2)	25,800	389,200
El Centro	(1)	6,500	35,325
El Cerrito	(39)	303,542	353,742
El Dorado Co.	(28)	285,832	561,937
El Monte	(9)	56,000	186,740
El Segundo	(12)	119,500	1,098,118
Emeryville		Nil	49,166
Escondido	(5)	90,520	839,982
Eureka	(17)	257,305	336,663
Fairfield	(6)	52,338	131,838
Fillmore		Nil	1,988
Fontana	(2)	31,371	460,134
Fremont	(66)	906,740	944,859
Fresno	(141)	1,198,761	2,013,874
Fresno Co.	(127)	1,012,791	1,381,412
Fullerton	(28)	623,592	3,342,059
Glendale	(49)	474,650	1,223,059
Glendora	(78)	1,188,700	1,227,585
Half Moon Bay	(1)	14,400	17,800
Hanford	(46)	574,900	745,399
Hawthorne	(17)	171,750	380,451
Hayward	(199)	1,392,190	1,610,801
Hemet	(10)	99,000	127,820
Hermosa Bch.	(5)	70,622	108,506
Hillsborough	(6)	259,000	281,400
Holtville		Nil	2,200
Humboldt Co.*			127,000
Hntingtn. Bch.	(306)	3,815,913	4,032,484
Huntington Pk.	(21)	124,250	229,050
Imperial Co.		Nil	58,975
Indio	(27)	420,000	563,994
Industry		Nil	21,100

*Breakdown not available

Inglewood	(104)	850,800	1,168,909
Irwindale		Nil	79,400
Kern Co.	(86)	1,062,761	1,618,074
Laguna Beach	(10)	218,000	292,486
La Habra		Nil	156,054
Lakewood	(26)	206,000	345,850
La Mesa	(8)	176,225	284,680
La Mirada	(7)	77,000	165,700
La Puente	(1)	65,000	509,940
La Verne	(7)	96,600	102,350
Lawndale	(11)	77,600	161,685
Lindsay	(1)	2,000	26,027
Livermore	(4)	53,561	98,756
Lodi	(21)	238,500	350,325
Lompoc	(87)	1,063,990	3,295,855
Long Beach	(95)	961,075	3,255,635
Los Altos	(27)	428,804	494,228
Los Angeles	(1998)	27,926,549	56,006,574
Ls. Angeles Co.	(810)	10,976,000	19,007,448
Los Gatos	(18)	265,000	310,100
Lynwood	(19)	125,588	204,771
Madera	(7)	73,400	83,797
Madera Co.	(10)	88,500	160,300
Manhattn. Bch.	(8)	135,150	213,704
Manteca	(7)	56,500	187,120
Marin Co.	(45)	635,581	714,871
Martinez	(9)	87,704	10,001,794
Marysville		Nil	67,027
Maywood	(4)	31,000	51,390
Menlo Park	(24)	214,000	1,062,605
Merced	(4)	60,117	109,201
Merced Co.	(76)	430,100	530,617
Millbrae	(5)	93,000	108,850
Mill Valley	(5)	96,900	131,425
Mirada Hills		No reply	No reply
Modesto	(71)	860,600	1,568,521
Monrovia	(45)	319,649	582,196
Montclair	(11)	236,160	252,480
Montebello	(36)	333,097	416,670
Monterey	(10)	147,500	340,270
Monterey Co.	(34)	331,870	1,008,956
Monterey Pk.	(126)	1,658,050	1,731,080
Mountain View	(44)	290,358	579,604
Napa	(9)	122,315	147,566
Napa Co.	(7)	99,270	304,445
National City	(5)	77,463	124,786
Newport Bch.	(60)	614,710	985,065
N. Sacramento	(12)	108,264	208,258
Norwalk	(4)	23,800	449,300
Novato	(14)	301,300	322,750
Oakdale	(7)	68,032	83,837
Oakland	(223)	1,716,655	3,435,060
Oceanside	(159)	1,763,000	1,863,299
Ojai	(13)	176,320	188,009
Ontario	(38)	351,600	653,678
Orange	(278)	3,951,889	4,088,939
Orange Co.	(139)	2,401,864	3,360,156
Oroville	(22)	191,010	212,640
Oxnard	(6)	101,500	691,670
Pacifica	(15)	164,500	381,248
Pacific Grove	(11)	110,540	139,036
Palm Springs	(7)	116,000	209,120
Palo Alto	(19)	247,200	1,253,928
Pals. Vrds. Est	(13)	504,125	522,615
Paramount	(63)	398,300	498,100
Pasadena	(62)	604,392	2,383,153
Paso Robles	(2)	21,300	28,500
Rico Rivera	(50)	60,700	261,455
Piedmont	(3)	141,500	169,615
Pinole		No reply	No reply
Pittsburg	(10)	140,778	435,636
Placentia	(8)	46,600	58,127
Placer Co.	(42)	468,137	644,502
Pleasanton	(3)	49,700	51,750
Pomona	(119)	955,616	1,382,740
Porterville	(1)	9,500	23,870
Port Hueneme	(55)	568,250	613,697
Red Bluff	(4)	43,294	67,214
Redding	(2)	27,000	85,950
Redlands	(51)	590,000	623,648
Redondo Beach	(25)	225,758	519,951
Redwood City	(91)	593,460	873,916
Richmond	(54)	416,600	532,125
Riverside	(13)	222,700	1,512,618
Riverside Co.	(254)	2,714,354	4,861,861
Rolling Hills		Nil	14,300
Rlg. Hills Est.	(2)	54,300	309,075
Rosemead	(4)	36,800	86,650
Roseville	(20)	324,935	337,385
Sacramento	(97)	1,134,025	2,114,130
Sacramnto. Co.	(189)	2,346,768	4,324,124
St. Helena	(2)	34,175	63,875
Salinas	(14)	203,000	514,490
San Bernrdino.	(67)	608,799	1,802,246
S. Brnrdno. Co.	(275)	2,004,552	3,461,058
San Bruno	(15)	128,300	526,637
San Carlos	(9)	149,000	339,329
San Clemente	(37)	447,869	
San Diego	(309)	4,359,268	
San Diego Co.	(159)	2,818,700	
San Dimas	(1)	13,000	
San Fernando	(2)	13,400	
San Francisco	(176)	1,714,492	
San Gabriel	(12)	118,200	
Sanger	(19)	85,000	
San Jacinto	(5)	32,600	
S. Joaquin Co.	(29)	288,108	
San Jose	(538)	5,046,700	
San Leandro	(58)	389,000	
S. Luis Obispo	(75)	1,082,993	
S. L. Obsp. Co.	(32)	394,842	
San Marino	(3)	154,000	
San Mateo	(75)	713,250	
San Mateo Co.	(53)	866,850	
San Pablo	(3)	38,060	
San Rafael	(30)	395,007	
Santa Ana	(98)	1,164,050	
Santa Barbara	(25)	349,000	
S. Barbara Co.	(183)	2,856,600	
Santa Clara	(95)	752,000	
S. Clara Co.	(86)	1,251,000	
Santa Cruz	(27)	311,985	
San Cruz Co.	(71)	823,537	
Santa Fe Spgs.		Nil	
Santa Maria	(64)	653,659	
Santa Monica	(31)	312,300	
Santa Paula	(4)	89,884	
Santa Rosa	(21)	227,700	
Sausalito	(3)	85,000	
Seal Beach	(8)	79,966	
Seaside	(6)	72,000	
Selma	(6)	63,462	
Shasta Co.	(6)	86,610	
Sierra Madre	(1)	19,600	
Solano Co.	(4)	40,673	
Sonoma Co.	(80)	585,750	
South Gate	(38)	193,265	
South El Monte		Nil	
S. Pasadena	(32)	466,501	
S. Sn. Francisco		Nil	
Stanislaus Co.	(65)	649,312	
Stockton	(13)	142,030	
Sunnyvale	(181)	1,622,804	
Temple City	(25)	258,200	
Torrance	(65)	629,700	
Tracy	(1)	14,000	
Tulare	(1)	34,500	
Tulare Co.	(30)	167,627	
Turlock	(2)	27,605	
Ukiah		Nil	
Upland	(19)	287,400	
Vacaville	(9)	86,350	
Vallejo	(16)	166,500	
Ventura	(5)	107,970	
Ventura Co.	(88)	1,034,200	
Visalia	(23)	308,819	
Walnut	(1)	8,800	
Walnut Creek	(17)	263,598	
Wasco	(19)	200,150	
Watsonville	(3)	44,000	
West Covina	(18)	266,821	
Whittier	(31)	680,420	
Woodland	(15)	198,947	
Woodside	(1)	24,000	
Yolo Co.	(10)	132,115	
Yreka	(4)	54,000	
Yuba City	(4)	44,200	
Yuba Co.	(38)	385,800	
TOTAL	**(12,519)**	**$148,082,859**	**$280,122,**

OREGON	Res.	$ Value	Total
Albany	(7)	$ 86,100	$
Ashland	(5)	53,000	
Astoria		Nil	
Baker	(1)	10,900	
Beaverton	(3)	52,332	
Bend	(6)	83,000	
Central Point	(4)	35,000	
Clackamas Co.	(36)	458,850	
Coos Bay	(2)	17,000	
Corvallis	(3)	45,000	
Dallas	(3)	25,000	
Douglas Co.	(5)	51,410	
Eugene	(20)	235,545	
Forest Grove	(3)	41,700	
Grants Pass	(4)	45,000	
Gresham		Nil	
Hermiston	(2)	22,540	

Western States for February

sidential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

Hillsboro	(17)	177,250	210,490
Hood River	(1)	12,000	23,750
Klamath Falls	(2)	30,000	37,249
La Grande	(3)	35,480	69,396
Lane Co	(53)	576,809	781,847
Lebanon		Nil	550
Marion Co.	(45)	577,500	1,021,015
McMinnville	(4)	31,000	33,375
Medford	(5)	58,000	329,850
Milton-Frwtr.	(1)	4,000	11,082
Multnomah Co.	(84)	1,339,475	3,236,442
Newberg		Nil	10,025
Newport		Nil	4,300
North Bend	(1)	14,950	22,167
Ontario		Nil	6,800
Oregon City	(3)	23,500	29,706
Oswego	(9)	147,100	152,850
Pendleton	(2)	27,000	85,575
Portland	(61)	693,790	1,971,230
Prineville		No reply	No reply
Roseburg	(3)	28,072	302,189
St. Helens	(1)	7,500	12,225
Salem	(15)	117,145	153,357
Seaside	(1)	10,000	64,692
Springfield	(6)	65,652	97,734
The Dalles	(3)	24,000	180,185
Washington Co.	(63)	1,167,200	2,401,880
TOTAL	**(487)**	**$ 6,429,800**	**$ 14,108,793**

WASHINGTON	**Res.**	**$ Value**	**Total $**
Aberdeen	(2)	$ 20,238	$ 52,898
Anacortes		Nil	15,610
Auburn	(6)	60,500	154,475
Bellevue	(1)	13,800	101,550
Bellingham	(3)	43,000	119,385
Bremerton		Nil	34,360
Camas		Nil	6,900
Centralia		Nil	18,388
Chehalis		Nil	11,869
Clark Co.	(58)	860,100	890,200
Clarkston		Nil	121,620
Ellensburg	(3)	40,500	54,888
Enumclaw	(1)	8,000	53,000
Ephrata		Nil	3,595
Everett	(7)	85,090	331,250
Grays Hbr. Co.	(8)	61,000	70,600
Hoquiam		Nil	7,830
Island Co.	(5)	32,500	50,050
Kelso	(1)	12,000	29,200
Kennewick	(6)	96,400	155,875
Kent	(5)	108,600	384,550
King Co.	(375)	5,432,855	8,569,880
Kirkland	(12)	139,600	142,350
Longview	(11)	154,500	643,477
Mercer Island	(8)	193,600	402,025
Montesano		No reply	No reply
Moses Lake	(3)	45,560	151,296
Olympia	(2)	37,000	131,870
Pasco	(4)	46,800	74,545
Pierce Co.	(85)	1,245,650	1,357,509
Port Angeles	(1)	8,000	58,900
Port Orchard		No reply	No reply
Pullman	(2)	25,344	39,754
Puyallup	(2)	19,500	26,350
Renton	(1)	15,000	45,884
Seattle	(46)	802,250	7,164,607
Shelton	(1)	11,000	11,000
Spokane	(42)	585,000	889,536
Spokane Co.	(36)	644,410	2,152,056
Sunnyside	(1)	12,000	103,000
Tacoma	(39)	511,850	958,368
Vancouver	(10)	127,700	371,739
Walla Walla	(3)	41,000	87,283
Walla Wlla Co.	(2)	25,000	40,650
Wenatchee	(1)	12,500	150,710
Yakima	(9)	113,000	208,725
TOTAL	**(802)**	**$ 11,690,847**	**$ 26,449,607**

ALASKA	**Res.**	**$ Value**	**Total $**
Anchorage	(1)	$ 19,354	$ 127,020
Fairbanks		No reply	No reply
Juneau		Nil	250
Ketchikan		Nil	57,500
Sitka		No reply	No reply
TOTAL	**(1)**	**$ 19,354**	**$ 184,770**

IDAHO	**Res.**	**$ Value**	**Total $**
Alameda	(7)	$ 86,000	$ 181,600
Blackfoot	(7)	92,500	96,450
Boise	(11)	132,300	475,823
Caldwell	(6)	63,500	95,460
Coeur d'Alene		Nil	42,875
Idaho Falls	(3)	47,235	341,040
Jerome		Nil	4,750
Lewiston	(1)	26,000	170,503
Moscow	(1)	14,000	27,400
Nampa	(3)	30,000	57,175
Payette		Nil	200
Pocatello	(6)	92,000	216,615
Sandpoint		Nil	Nil
St. Maries		Nil	Nil
Twin Falls	(5)	57,000	67,700
TOTAL	**(50)**	**$ 640,535**	**$ 1,777,591**

MONTANA	**Res.**	**$ Value**	**Total $**
Anaconda		$ Nil	$ 2,000
Billings	(35)	483,000	536,175
Bozeman	(2)	39,200	42,700
Butte		Nil	8,750
Cut Bank		Nil	2,800
Glasgow		Nil	1,000
Glendive		Nil	2,000
Great Falls	(65)	565,061	616,614
Havre	(4)	45,000	50,750
Helena	(3)	42,000	93,863
Kalispell	(1)	12,000	37,300
Lewistown	(5)	46,000	50,000
Livingston	(1)	14,000	20,000
Malta		Nil	Nil
Miles City	(3)	44,500	92,475
Missoula	(2)	15,000	117,663
TOTAL	**(121)**	**$ 1,305,761**	**$ 1,674,090**

WYOMING	**Res.**	**$ Value**	**Total $**
Casper	(12)	$ 187,000	$ 309,485
Cheyenne	(25)	342,000	393,516
Cody	(1)	22,000	28,300
Laramie	(1)	22,000	61,625
Rawlins	(1)	18,000	47,200
Riverton*	(2)	28,000	196,800
Rock Springs		No reply	No reply
Sheridan	(1)	13,000	19,107
TOTAL	**(43)**	**$ 632,000**	**$ 1,056,033**

COLORADO	**Res.**	**$ Value**	**Total $**
Adams Co.	(188)	$ 2,254,500	$ 3,494,995
Alamosa	(2)	24,000	33,300
Arapahoe Co.		No reply	No reply
Arvada	(72)	759,000	759,000
Aspen		Nil	5,800
Aurora	(63)	839,811	929,114
Boulder	(62)	664,750	1,055,555
Boulder Co.	(49)	552,600	778,580
Canon City		No reply	No reply
Colorado Sprg.	(30)	396,721	577,355
Cortez		Nil	5,500
Denver	(158)	1,274,711	10,411,019
Durango	(2)	27,500	36,100
El Paso Co.	(18)	304,300	539,487
Englewood	(7)	77,800	190,851
Estes Park	(3)	18,500	33,650
Fort Collins	(15)	189,500	271,103
Fort Morgan	(2)	22,600	98,500
Golden	(9)	128,507	143,147
Grnd. Junction	(2)	24,000	117,820
Greeley	(47)	368,100	619,495
Jefferson Co.	(277)	2,323,162	2,914,432
La Junta	(3)	51,985	216,438
Lamar		Nil	4,000
Littleton	(7)	102,500	386,973
Longmont	(8)	87,000	132,682
Loveland	(20)	236,155	245,305
Monte Vista		Nil	1,400
Montrose	(2)	24,030	83,835
Pueblo	(38)	321,372	450,857
Pueblo Co.	(8)	62,600	142,400
Sterling	(3)	27,000	35,000
Trinidad		Nil	865
Walsenburg		Nil	Nil
Westminster	(15)	132,048	158,524
TOTAL	**(1,110)**	**$ 11,294,752**	**$ 23,873,082**

UTAH	**Res.**	**$ Value**	**Total $**
American Frk.	(3)	$ 24,000	$ 26,000
Bountiful		No reply	No reply
Brigham City	(28)	329,500	353,431
Cedar City		Nil	52,500
Clearfield	(1)	10,000	28,000
Davis Co.	(3)	27,178	41,450
Kaysville	(6)	42,950	45,950
Layton	(8)	115,000	122,200
Logan	(3)	37,000	44,700
Murray	(10)	80,000	96,550
Ogden	(10)	171,800	282,000
Orem	(8)	105,650	124,000
Price		Nil	2,000
Provo	(11)	119,700	167,080
Salt Lake City*	(15)	200,500	697,595
Salt Lake Co.	(166)	1,890,700	4,582,547
S. Slt. Lk. City	(2)	28,200	231,950
Spanish Fork	(1)	9,000	14,000
Tooele	(2)	22,060	23,629
Utah Co.	(4)	49,790	165,365
Weber Co.	(3)	47,000	85,000
TOTAL	**(284)**	**$ 3,300,028**	**$ 7,185,947**

NEVADA	**Res.**	**$ Value**	**Total $**
Boulder City		$ Nil	$ 2,493
Clark Co.	(18)	255,265	1,937,631
Elko		No reply	No reply
Las Vegas	(222)	2,588,000	3,181,681
N. Las Vegas	(24)	217,065	611,291
Reno	(125)	954,600	1,329,366
Sparks	(2)	28,150	115,328
Washoe Co.	(19)	372,546	599,933
TOTAL	**(410)**	**$ 4,415,626**	**$ 7,777,723**

ARIZONA	**Res.**	**$ Value**	**Total $**
Buckeye	(1)	$ 15,000	$ 16,725
Casa Grande	(4)	44,000	52,350
Chandler	(6)	50,894	116,959
Douglas	(11)	68,100	82,518
Flagstaff	(15)	6,969	54,059
Florence	(3)	21,675	21,675
Glendale	(7)	63,500	118,450
Maricopa Co.	(424)	4,223,755	5,124,690
Mesa	(71)	608,245	801,430
Miami		No reply	No reply
Phoenix	(218)	1,845,400	8,466,947
Pima Co.	(244)	2,323,730	4,559,814
Prescott	(7)	76,230	88,985
Scottsdale	(185)	1,578,238	1,675,070
Tempe	(23)	182,300	1,234,482
Tucson	(81)	975,839	5,059,965
Wickenburg	(1)	3,750	37,770
Winslow		No reply	No reply
Yuma	(6)	45,000	359,930
TOTAL	**(1,307)**	**$ 12,132,625**	**$ 27,911,819**

NEW MEXICO	**Res.**	**$ Value**	**Total $**
Alamogordo		$ Nil	$ 35,624
Albuquerque	(151)	1,728,669	3,702,924
Artesia		No reply	No reply
Carlsbad	(11)	119,000	1,562,100
Clovis	(11)	124,859	470,509
Deming	(8)	65,500	74,200
Farmington	(2)	32,845	113,956
Gallup	(12)	163,630	211,015
Hobbs	(18)	156,000	340,000
Las Cruces	(16)	126,800	544,928
Las Vegas	(8)	50,400	58,932
Lovington	(5)	64,000	145,450
Raton		No reply	No reply
Roswell	(70)	699,500	1,146,480
Santa Fe	(27)	209,350	516,800
Silver City	(3)	46,000	52,594
Trth/Cnsqncs	(3)	27,000	27,600
Tucumcari	(6)	53,000	93,800
Tularosa		Nil	2,280
TOTAL	**(351)**	**$ 3,666,553**	**$ 9,099,282**

HAWAII	**Res.**	**$ Value**	**Total $**
Hawaii Co.	(27)	$ 343,122	$ 1,226,631
Honolulu	(463)	5,121,987	13,334,634
Maui Co.	(99)	655,865	787,743
TOTAL	**(589)**	**$ 6,120,974**	**$ 15,349,008**
GRAND TOTAL	**(18,074)**	**$209,731,714**	**$416,570,031**

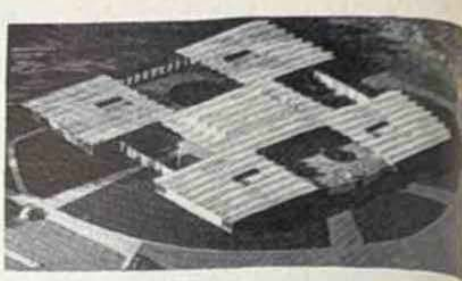
*Breakdown not available

Six buildings in California, one in Colorado win AIA awards

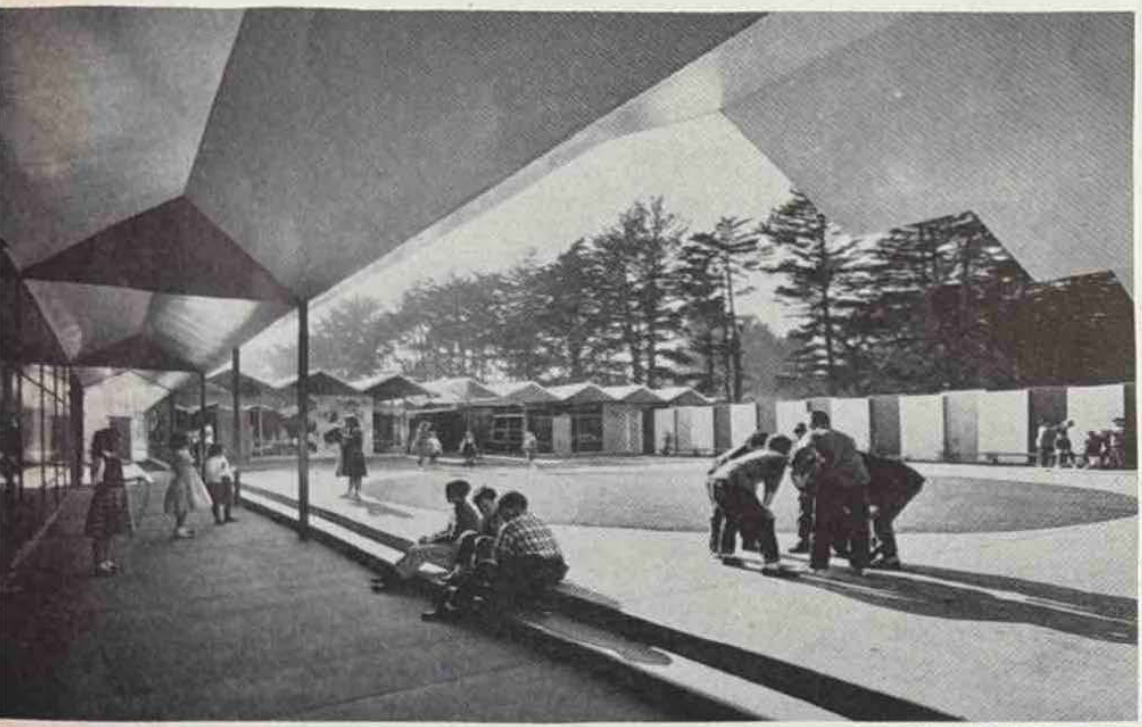
Fernando Rivera Elementary School in Daly City, Calif., designed by Mario J. Ciampi, architect, and Paul Reiter, associate, to create the impression of a small village, was one of seven recently completed buildings cited for a First Honor Award in the 1961 AIA competition. Isadore Thompson was structural engineer; Daniel Vandament, mechanical engineer; Harold Wright, electrical engineer; and Midstate Construction Co., general contractor.

Basic philosophy of the community was to construct an elementary school (12 classrooms, kindergarten, library, administrative section, multipurpose room) which could be utilized for educational activities and also be incorporated into the total recreational program since it is an integral part of the city park. Design intent was to create small clusters of classroom units around intimate courts and then to relate the four-room clusters around larger courts.

The multipurpose unit was placed in a central position so that it would serve as a common meeting area, ce tral to all facilities and suitable f both indoor and outdoor activit

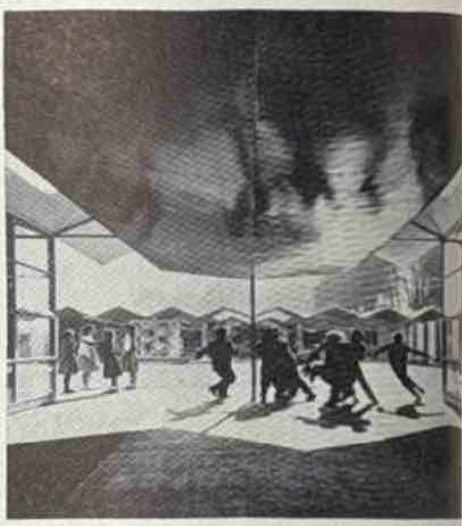


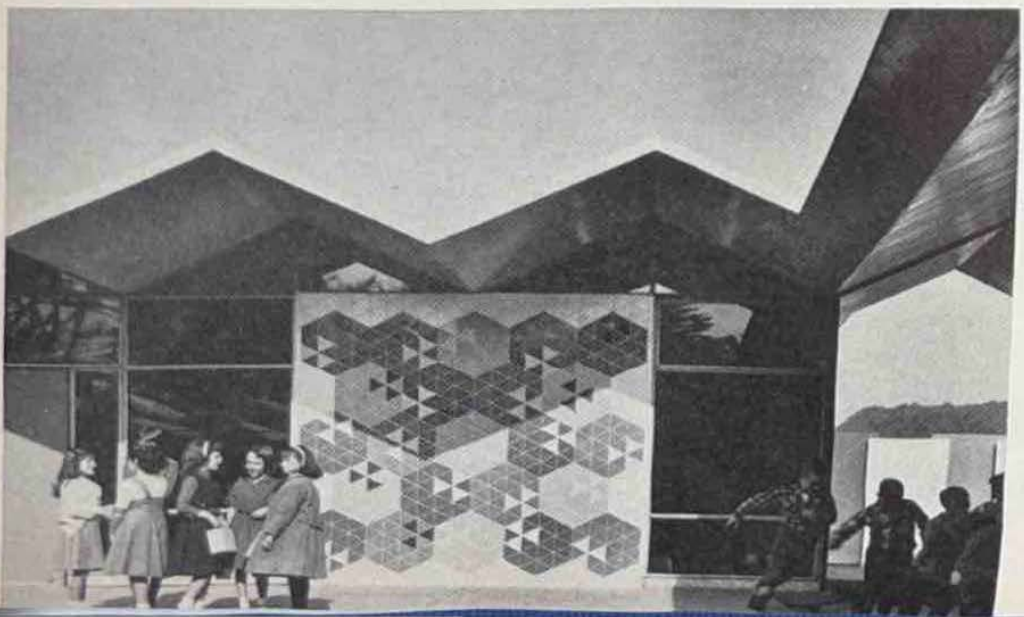
ENGINEERED EARTHFILL is constructed in f of raised circular mound which will be la scaped and defined with railing at its ed to protect school plant from adjoining p area, to be developed as part of park pl



Karl H. Riek photos

PLYWOOD FOLDED PLATE ROOF, supported large part by tubular mullions, is promin structural feature, lends itself to light, s garden pavilion atmosphere.







MURAL is work of architect Allyn C. Mart sculpture, Leonard Stanley.

AWARDS OF MERIT

Six of the 11 Awards of Merit went to buildings in the West: five in California and one in Colorado.

The all-architect jury—chairman Morris Ketchum Jr., New York; Fred Bassetti, Seattle; William L. Pereira, Los Angeles; Richard D. Butterfield, West Hartford, Conn.; Arthur Q. Davis, New Orleans — reviewed 270 submissions from every region of the U.S.

"Today's architecture after a hundred years of progress," said the jurors, "is still vigorously explaining new materials, new structural methods and aesthetic solutions in every field of building. The jury hopes and believes that the projects selected for awards exemplify some of the best results of this imaginative progress toward architectural maturity."

Certificates will go to both the architects and the clients.

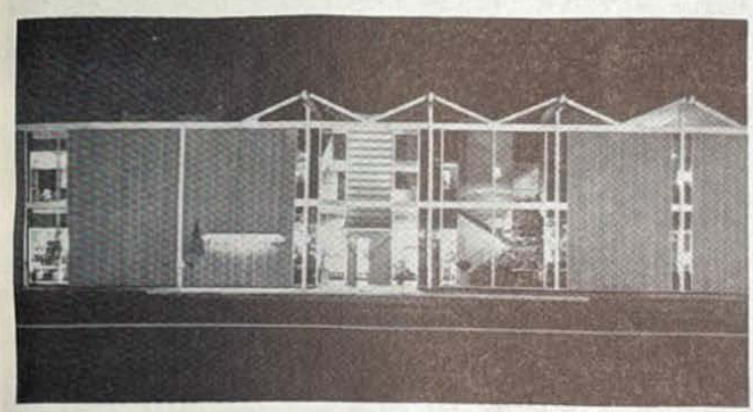
Photo credits: Marvin Rand, Morley Baer, Larry Frost, Dandelet, Guy Burgess.



OFFICE BUILDING FOR DEVELOPMENT FIRM (Cambridge Investments, Inc.), Long Beach: Killingsworth, Brady, Smith & Associates, architects; John Halas, general contractor.



CROWN ZELLERBACH BUILDING, San Francisco: Hertzka & Knowles and Skidmore, Owings & Merrill, associated architects; H. J. Brunnier, structural engineer; Haas & Haynie, general contractors.



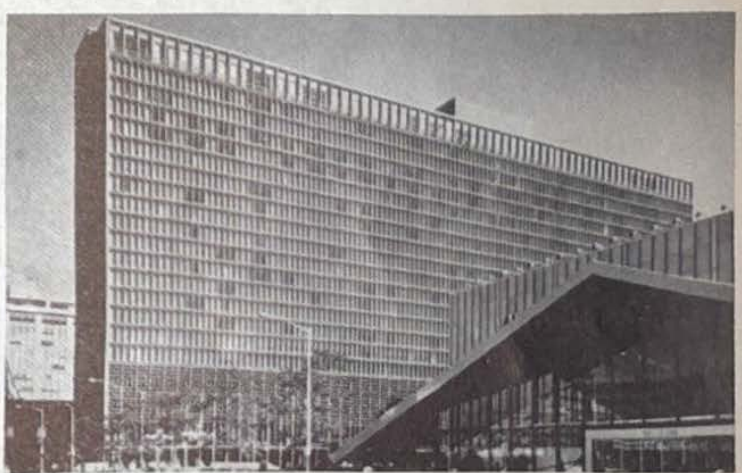
IVORY TOWER RESTAURANT, Santa Monica: Richard Dorman & Associates, architects; Albert E. Erkel & Associates, structural engineers; Jack McDonald, general contractor.



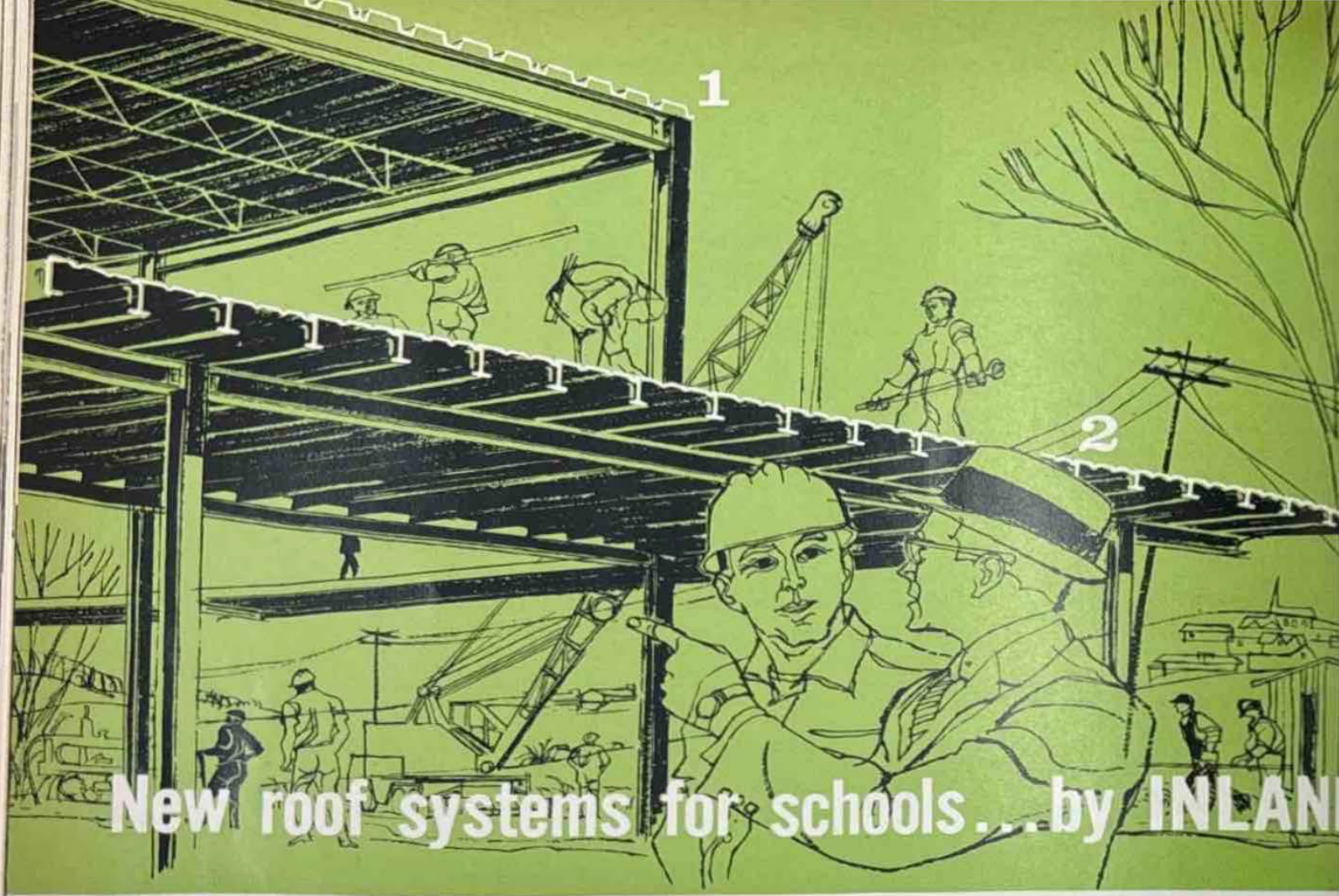
WILLOW CREEK APARTMENTS, Palo Alto: John Carl Warnecke & Associates, architects; Lawrence Halprin, landscape architect; Howard J. White, Inc., general contractor.



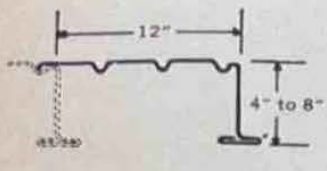
MARIN BAY DISPLAY PAVILION, San Rafael: Bay Group Associates (Daniel H. Bushnell, Lun Chan, Ichiro Sasaki, Camile Van De Weghe), architects; Chin & Hensolt, structural engineers; Eckbo, Dean & Williams, landscape architects; Latipac-Perini Co., general contractor.



DENVER HILTON HOTEL, Denver: I. M. Pei & Associates, architects; Weiskopf & Pickworth, structural engineers; Jaros, Baum & Bolles, mechanical engineers; Webb & Knapp Construction Co., general contractor.

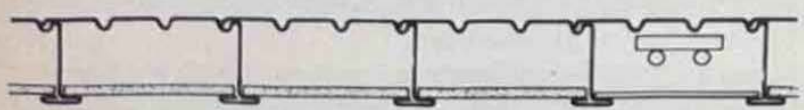


New roof systems for schools . . . by INLAND

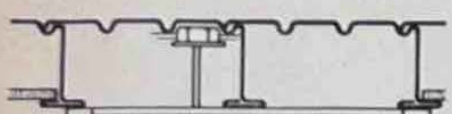


T-STEEL — New! Galvanized. For clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to transmit seismic and wind loads.

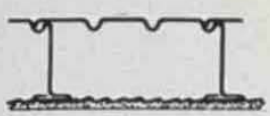
Ceiling Treatments with T-Steel Deck



Standard Tile or Board — Light Diffuser



Surface-Mounted Fixture



Lath-and-Plaster Fireproofing

Complete structural systems that broaden y latitude in planning ceilings, lighting, acous —within realistic budget boundaries

1. Acoustideck for gymnasiums, other activity areas

Combines steel roof deck and acoustical ceiling v Noise Reduction Coefficient of .70.

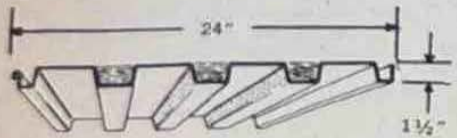
Erected fast in any weather that a man can work. teresting ribbed underside provides an attractive ceil

2. New Inland T-Steel Roof Deck for clear-ceiling classrooms

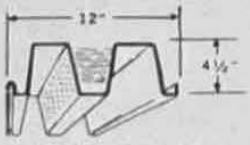
Especially suitable over classrooms of 26' to 32' sp —or other areas where you want an attractive unbro ceiling surface.

You can use various types of acoustical tile — prov a flush, luminous ceiling — or leave the underside posed and painted.

Write for catalog 248 or see Sweet's, sections 2i/I Inland Steel Products Company has trained sales e ineers capable of giving you the benefit of their dive fied experience on specific problems. Write or call y nearest Inland office.



TYPE B ACOUSTIDECK — For purlin spacings from 6' to 10'. Uses minimum of 1" rigid insulation board.



TYPE C ACOUSTIDECK — For purlin spacings from 10' to 20'. Uses minimum of 1½" rigid insulation board.

member of the INLAND steel family

ENGINEERED PRODUCTS DIVISION

INLAND STEEL PRODUCTS COMPANY

Dept. D, 4045 West Burnham Street, Milwaukee 1, Wiscon

EP-2A

ATLANTA, BALTIMORE, BUFFALO, CHICAGO, CINCINNATI, CLEVELAND, DALLAS, DENVER, DETROIT, KANSAS CITY, LOS ANGELES, MILWAUKEE, MINNEAPOLIS, NEW ORLEANS, NEW YORK, ST. LOUI

'Sculptural landscape' wins for Japanese architects

Heaping high praise on the overall quality of the entries and on the City of Seattle for sponsoring such a program, a four-man jury in March named two Tokyo architects as winners of the $250,000 international competition for design of a fountain to be built in the Civic Center.

Hideki Shimizu and Kazuvuki Matsushita, both members of the design section of Taisei Construction Co., won out from a field of five finalist teams composed of architects, landscape architects and sculptors. The others came from Pomona, Calif., Birmingham, Mich. (two), and Paris.

The simple design calls for a ceramic object, very much like a sunflower, in the center of a pool, about 100 ft. in diameter, in which the water plays the part of sculpture. The surrounding plaza, which the jurors recommended be made of granite blocks, will consist of varying steps and could very easily serve for outdoor sculpture or garden exhibits.

Two qualities were sought especially in the selection of the winning design: an emphasis on the use of water and a scheme which would effect a marriage of the total Civic Center-Century 21 Exposition site with the landscaped fountain area.

The winners receive $5,000, will proceed to develop complete plans and specifications and will supervise the construction of the fountain. As work progresses, additional payments will be made up to $15,000.

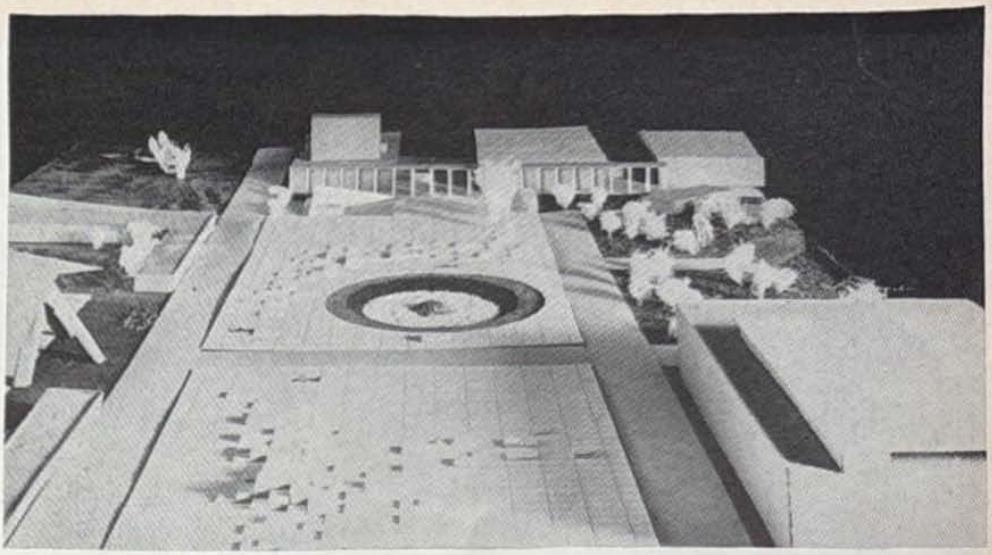
Each of the jurors, who were unanimous in their choice, was equally enthusiastic about the winning design. Typical comments:

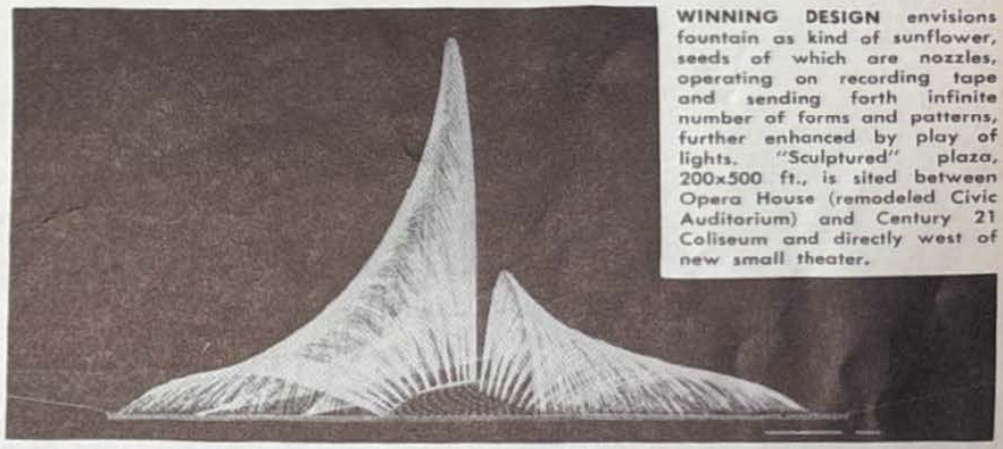
Nathaniel A. Owings, architect, San Francisco: "A big simple bold statement to attract people, but on a scale which will not tire over the years."

Garrett Eckbo, landscape architect, South Pasadena, Calif.: "An imaginative frontier of using water."

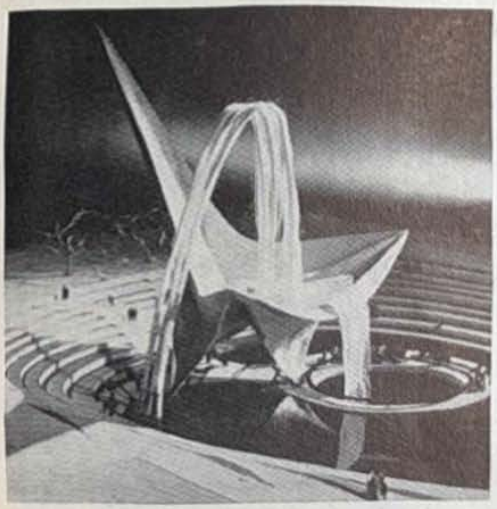
H. Peter Oberlander, professor, School of Architecture, University of British Columbia, Vancouver: "Will unify a group of buildings by its simplicity, give these buildings a chance to speak for themselves . . . a sculptural landscape."

Bernard Rosenthal, sculptor, New York: "Superior to anything which exists today . . . will become well known."





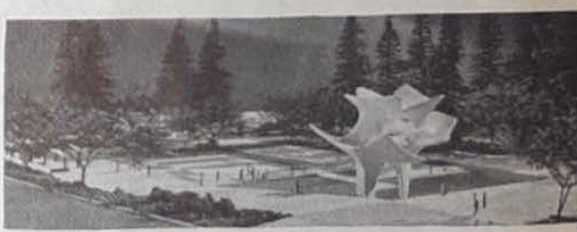
WINNING DESIGN envisions fountain as kind of sunflower, seeds of which are nozzles, operating on recording tape and sending forth infinite number of forms and patterns, further enhanced by play of lights. "Sculptured" plaza, 200x500 ft., is sited between Opera House (remodeled Civic Auditorium) and Century 21 Coliseum and directly west of new small theater.



PARIS: Alain Le Normand, architect; Adam, sculptor.



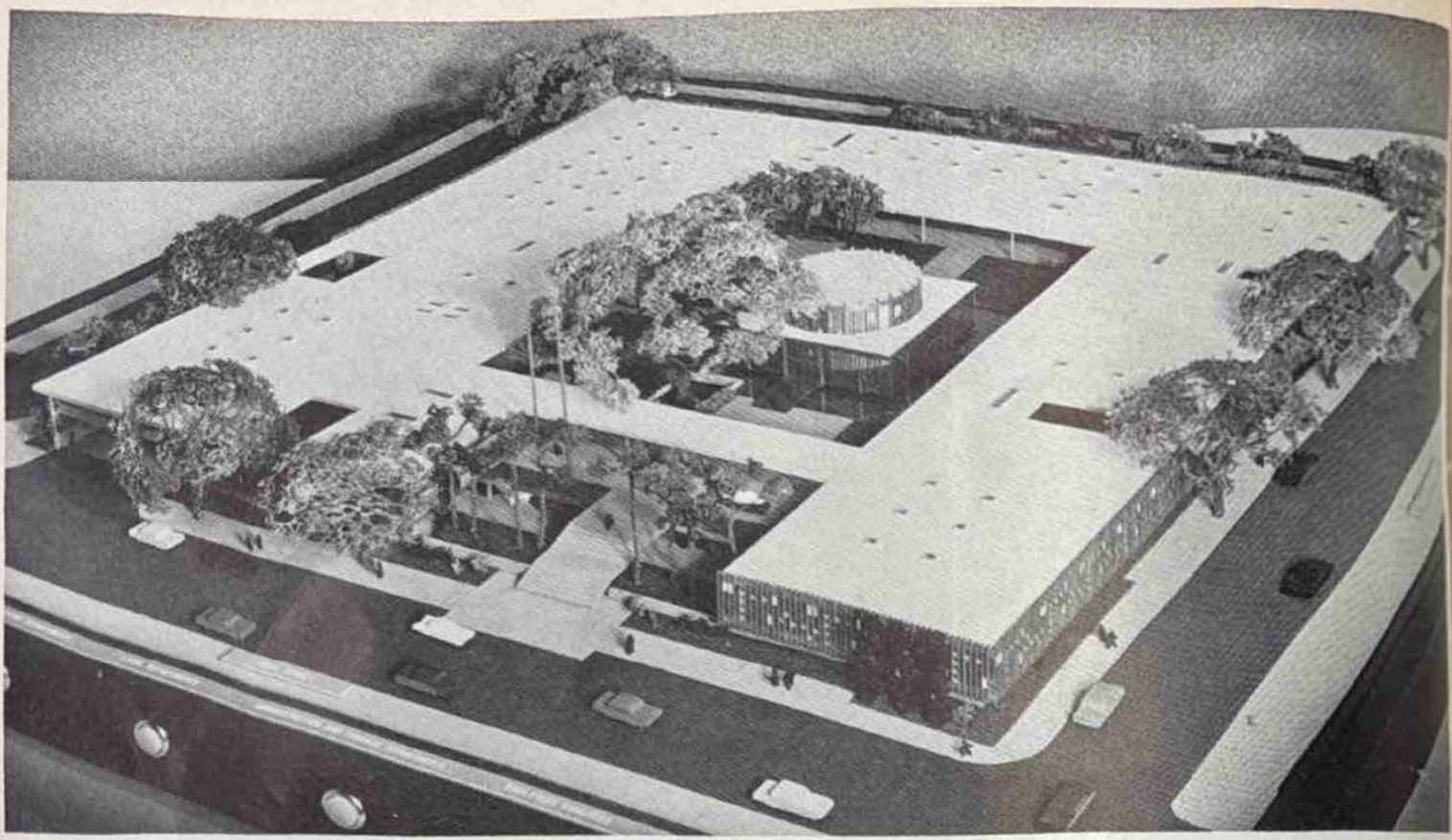
BIRMINGHAM, MICH.: W. Bryon Ireland, architect; Rotislav George Spacek, sculptor.



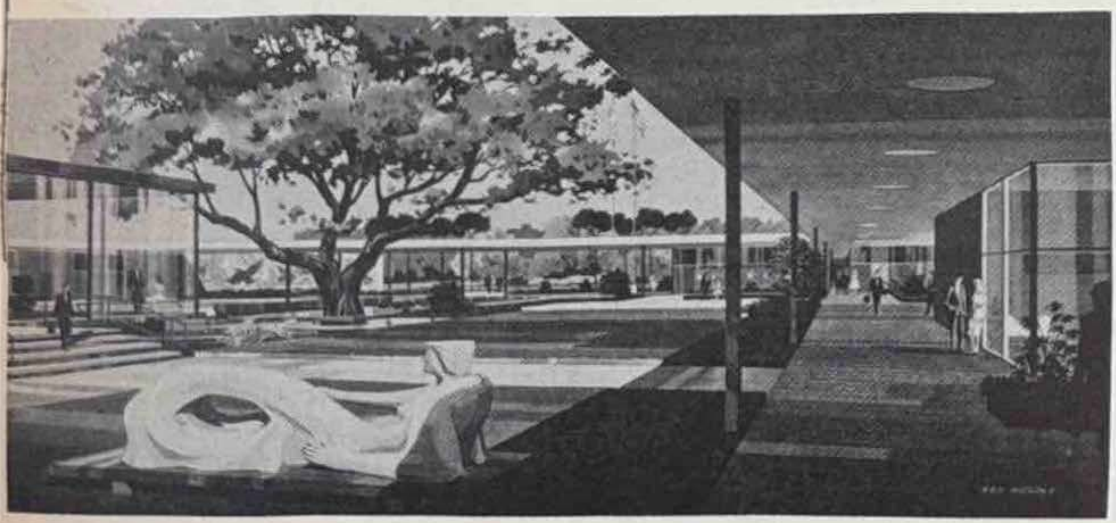
POMONA, CALIF.: Richard A. Moore, landscape architect; George Washington Hall, sculptor.



BIRMINGHAM, MICH.: Alan Hamilton Rider, architect; Glen Michaels, sculptor.



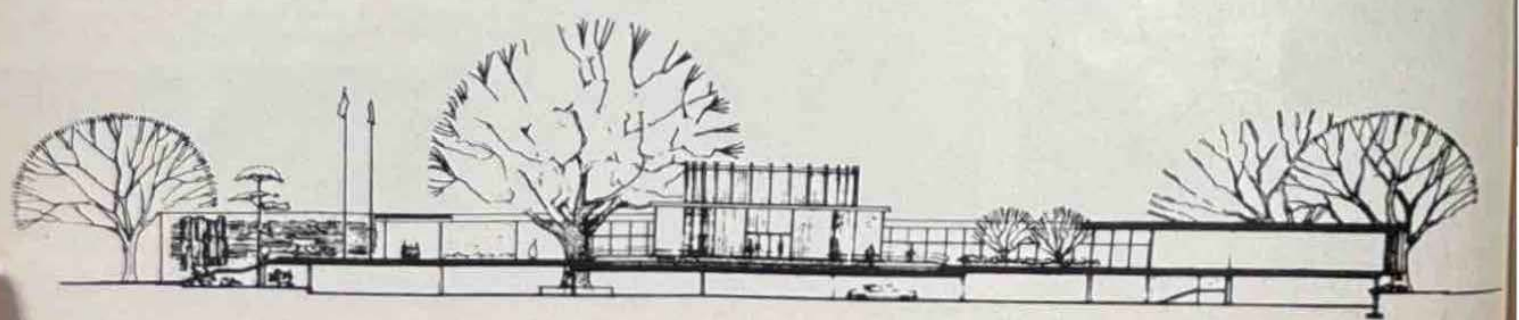
JURY COMMENTS ON WINNING DESIGN: "It is simple and unpretentious, economical and flexible, with a friendly, inviting atmosphere. Of all the solutions, this was most in scale with Eugene. . . . It has a good relationship to the Civic Center. . . . It incorporates the walnut tree successfully. . . . City hall departments are disposed around a plaza, linking spaces together functionally. . . . Exterior recognizes native materials; the wood screen is a handsome indigenous element. Sensitive use of art and sculpture in the total concept."



Stafford, Morin, Longwood to design Eugene City Hall

Praised as "a fine, creative concept," the scheme of local associated architects Stafford & Morin and James Longwood was named winner in the final design competition for Eugene's new city hall. Credits also go to W. W. Wilson, structural engineer; Bob Marquess, mechanical engineer; Lloyd M. Bond, landscape architect; Jan Zach, sculptor; and Andrew Vincent, muralist and color consultant.

In making its choice from four finalists which had been picked from an original group of 25 statewide entries, the five-member jury said the building "will undoubtedly be the most distinctive city hall in the U.S. attracting visitors from all over the country."



John E. Stafford, Kenneth L. Morin and James Longwood will be awarded a $2,500 prize and a contract to design the new city hall, provided voters approve a $2.4 million bond issue May 11 to finance the project. The contract will be signed after the election.

The winning entry shows a building occupying the full perimeter of its block-square site. An entrance court would provide a landscaped open area. Separate city hall chambers with seating for up to 200 persons are located within the court. Parking for 250 cars would be available on the ground level of the main structure. Offices would be located on the second floor.

Structure will consist of reinforced concrete walls, earth-supported slabs and columns and waffle floor and roof slabs. Main floor will have a metal window wall and wood veneer sectional office partitions on a 5-ft. module; vinyl tile and ceramic tile floor surfacing; luminous ceilings; wood paneling and gypsum plaster on permanent walls.

Total floor area is 80,029 sq. ft. Cost estimates are within the $2,660,000 which the city hopes to acquire for purchasing the site and constructing the building.

Each of the other three finalists (see adjacent models), two from Eugene and one from Portland, in the competition will receive a $2,000 award.

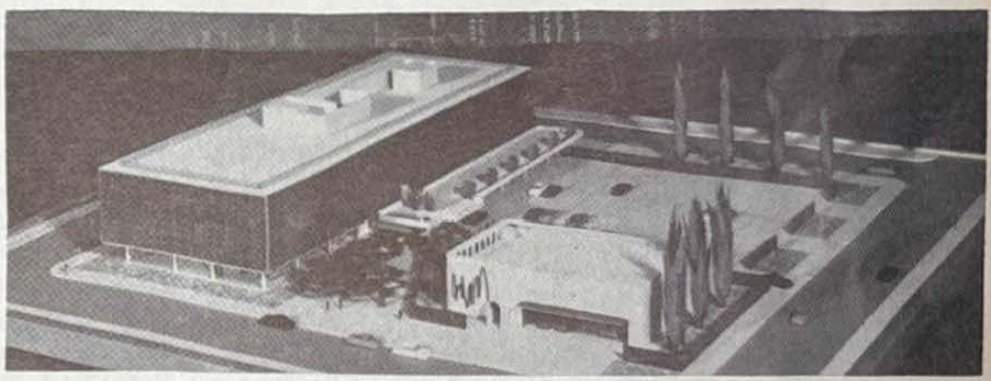
Jurors were architects Paul Hayden Kirk of Seattle, Francis Joseph McCarthy of San Francisco and Robert B. Price of Tacoma; Eugene Mayor Edwin E. Cone; and Councilwoman Catherine Lauris.



WILMSEN, ENDICOTT & UNTHANK, ARCHITECTS



BALZHISER, SEDER & RHODES, ARCHITECTS



STEWART & RICHARDSON, ARCHITECTS

Oregon AIA cites coliseum, three other buildings

From a field of 44 entries, the Oregon Chapter, AIA, gave an Honor Award to the Portland Memorial Coliseum (see cover and p. 20) and Awards of Merit to the three buildings shown here. Presentations were made to the architects and clients at the annual awards banquet in the Benson Hotel March 10, which also commemorated the chapter's 50th year.

The all-architect jury consisted of Bruce Walker, Spokane; Prof. Marion D. Ross, University of Oregon, Eugene; and Norman C. Zimmer, Portland.

In addition to the design citations for current work, the chapter presented the Citizens Award to Jonathan Whitman Edwards, superintendent of Portland public schools; the Fine Arts Award to Manuel Isquierdo, sculptor; and a Special Award to the Oregon Ceramic Studio in memory of Lydia Herrick Hodge.



Dearborn-Massar

TED KELLER RESIDENCE: Donald S. Blair, architect.



METZGER METHODIST CHURCH: John Storrs, architect.



NEWPORT BRANCH, EQUITABLE SAVINGS & LOAN ASSOCIATION: Lewis P. Crutcher, architect.



CORONA DEL MAR HIGH SCHOOL, Corona del Mar, Calif.: Blurock, Ellerbroek & Associates, architects. "A realistic approach to flexible design through modular construction in this compressed campus type plan. Instructional units designed for adaptation to new methods of instruction. Arrangement of units around open courts adds a sense of spaciousness and relieves noise and congestion. Good relationships between the different units."



LOMPOC SENIOR HIGH SCHOOL, Lompoc, Calif.: Pierre Claeyssens, architect. "Commendable approach to translating a comprehensive program for a large school into a functional plant. The exterior biology court, instructional resource unit, flexible instructional spaces and centrally located library are notable features of the plan."



WILLIAM G. DANA ELEMENTARY SCHOOL, Nipomo, Calif.: Robert Trask Cox, architect. "A delightful school with homelike atmosphere. Facilities scaled to a child's interests and behavior. Pleasant surroundings with attractive garden corridors. Excellent adaptation to site."



WEST HIGH SCHOOL, Torrance, Calif.: Roy Donley & Associates, architects. "Careful planning, creative design and excellent site treatment have added a distinctive quality to a relatively low cost school. Notable features of this plan are outdoor eating patio, indoor dining space, cubicles for individual study, comprehensive library facilities, faculty work space and flexible assembly area."



MONTAIR ELEMENTARY SCHOOL, Danville, Calif.: Falk & Booth, architects. "Good architectural detailing. Variation in classroom clusters, attractively designed and well-located kindergarten area, good use of trees and well-planned play areas have led to a pleasant total environment. This plant, scaled to the ages and interests of elementary school children, blends nicely into the site."

West wins 11 of 21 citations from school administrators

When the American Association of School Administrators tallied up the citations presented in its annual architectural exhibit, it discovered that 11 out of the 21 went to school building plants in the West, nine in California and one each in Washington and Oregon.

Serving on the exhibit jury were architects Leslie N. Boney of Wilmington, N.C., Richard D. Butterfield of West Hartford, Conn., and Linn Smith of Birmingham, Mich.; school superintendents William M. Brish of Hagerstown, Md. (Washington County), and E. W. Rushton of Roanoke, Va.; and John H. Herrick, executive director of campus planning, Ohio State University, Columbus.

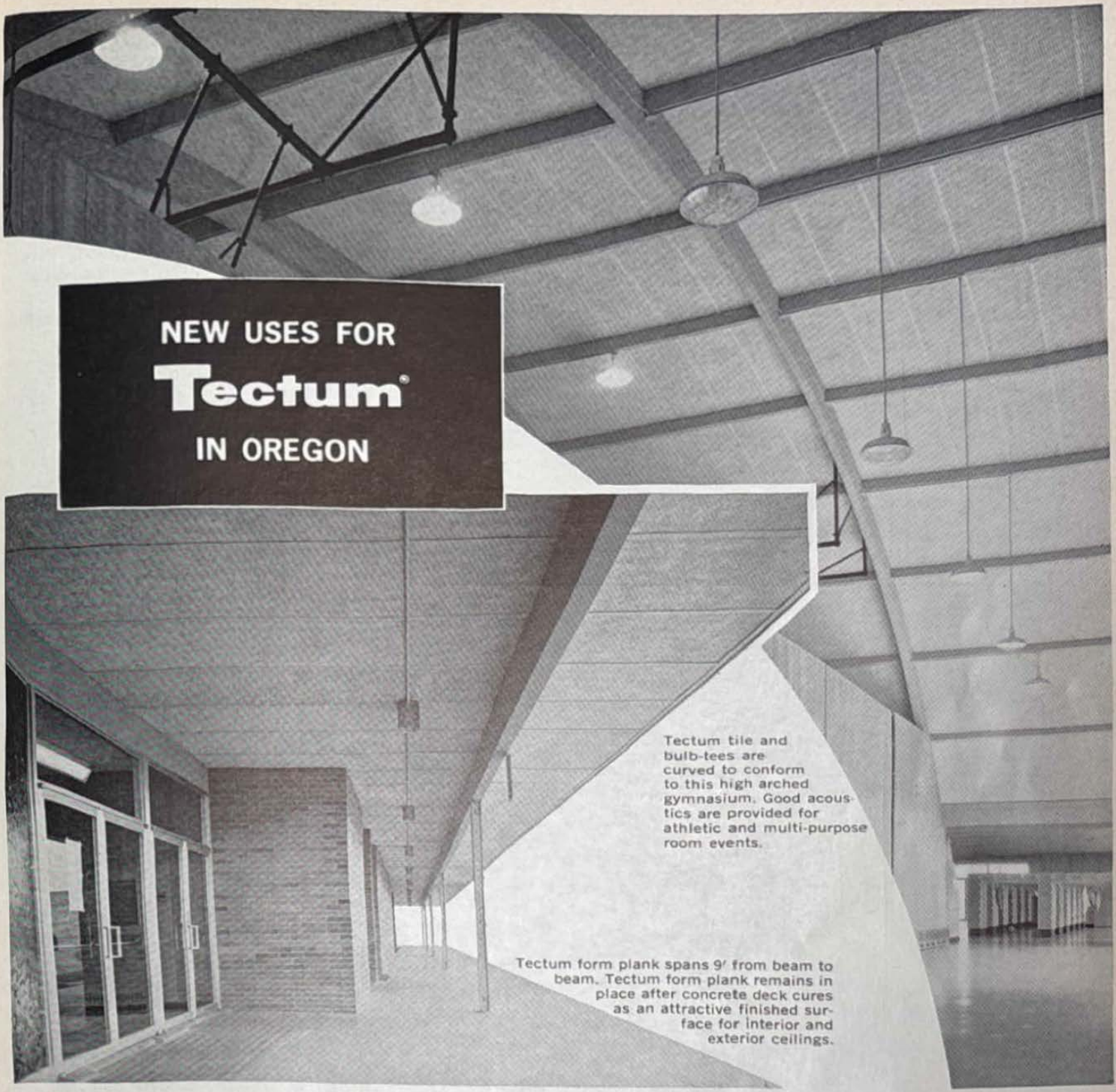
Excerpts from the AASA report:

"While the school building architectural exhibit in the three AASA conventions (San Francisco, St. Louis, Philadelphia) does not in any sense of the word reflect all that is taking place in school building construction in this country, it does give us as good a panoramic view of what is happening as is likely to be found in any other single place. Even a casual review of these 250 school building plans reveals innovations and new developments in the allocation and use of space, in the artistic elements of design, in the use of materials, in mechanical equipment, in relationships between units and in the overall structure.

"Among the distinctive features of these buildings that claim attention, not because they are striking departures from past practice, but because they are carefully thought-through approaches to meeting particular school building problems, are the geodesic dome; planetariums; use of signal lights instead of bells; air conditioning; inside classrooms; more extensive use of modules in construction; growing awareness that schools need a general area like a commons as well as more conventional instructional space; movable storage facilities; replacement of clerestory lighting with skylight bubbles; a move away from flat roofs; fewer separate auditoriums and more cafetoriums (not good in the opinion of the jury, but it is happening); library-cafeterias; and increased attention to outdoor space with more courts and less 'stay-off-the-grass' decorative space.

"While the traditional classroom is predominant in most school buildings, the growing edges of instructional methods and teaching procedures are reflected in many of the plans on display. Efforts have been made in a variety of ways to provide for flexibility. Space appears to be more fluid and less restrictive. The tunnel-like appearance of the traditional corridor has been improved by the handling of space, the use of materials and new

Continued on page 16



This school utilizes 2″ Tectum Form Plank, 2½″ Tectum Roof Deck Tile and 2½″ and 1″ Tectum Acoustical Panels in an area where seismic requirements must be fulfilled. Of outstanding interest is the curved Tectum and bulb-tee roof deck over gymnasium and multi-purpose room.

Tectum form plank with beveled ends spans 9′ from beam to beam. Its acoustical properties are effectively used throughout the building with 1″ panels used for furred mechanical spaces. Good looks, good acoustics, good insulation and good construction are evident in this attractive low cost high school.

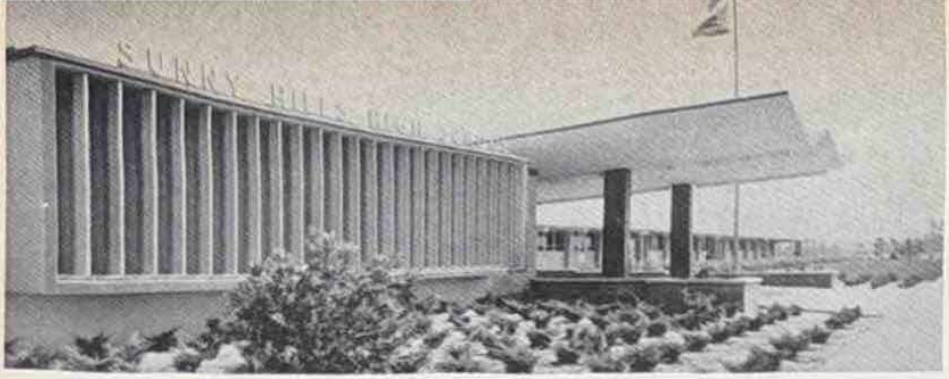
Have you investigated what Tectum can do for your next building project? Send today for complete catalog information.

Building: Central Linn High School, Halsey, Oregon; **Architect:** Howard Glazer & Dougan & Heims, Portland; **Contractor:** Todd Building Company, Roseburg; **Tectum Erector:** Portland Wire & Iron Works, Portland.

PLUS *Values for West Coast Construction*

Tectum CORPORATION

535 East Broad Street, Columbus 15, Ohio



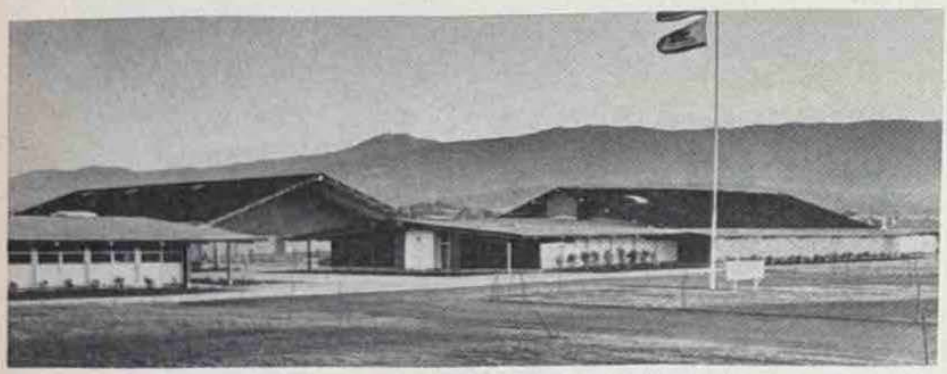
SUNNY HILLS HIGH SCHOOL, Fullerton, Calif. William H. Harrison, architect. "A school plant that reflects an educational philosophy. Simple design and flexibility in individual units in the overall arrangement in this campus type plan are commendable."



SAN CARLOS HIGH SCHOOL, San Carlos, Calif.: Delp W. Johnson, Poole & Storm, architects. "An ingenious solution to a difficult site problem. Especially noteworthy is the manner in which outdoor areas have been developed into attractive and useful activity space."



MAY ROBERTS ELEMENTARY SCHOOL, Ontario, Ore.: Johnston & Smith, architects. "City officials and school board are to be commended for cooperation in developing a sub-standard area into a neighborhood school site. This simple design with each classroom opening onto an outdoor corridor provides real opportunity for future expansion."



PIONEER HIGH SCHOOL, San Jose, Calif.: Office of Ernest J. Kump and Kress & Winston, architects. "Effective use of space modules in a comprehensive high school plant. Good grouping of areas around major traffic lanes. Informality and simple beauty are added by the pitched shake-covered roofs with wide overhangs and exposed wood beams."



H. F. HUNT JUNIOR HIGH SCHOOL, Tacoma: Robert Billsbrough Price, architect. "Building masses well handled. Excellent adaptation to a sloping site. Good relationships between cafetorium, gymnasium and academic unit."

AASA citations (cont'd. from p. 14)

design. Clusters of classrooms interspersed with open courts provide for easy flow of traffic.

"Movable partitions permit ready conversion of space into larger or smaller units. Teaching spaces are provided for groups of students varying from 10 or less to as many as 300. Guidance units, electronics laboratories, food laboratories, shops and student lounges serve special features of this program. In some schools, alcoves off the classrooms are being developed for conference purposes and special work areas for students as well as teachers.

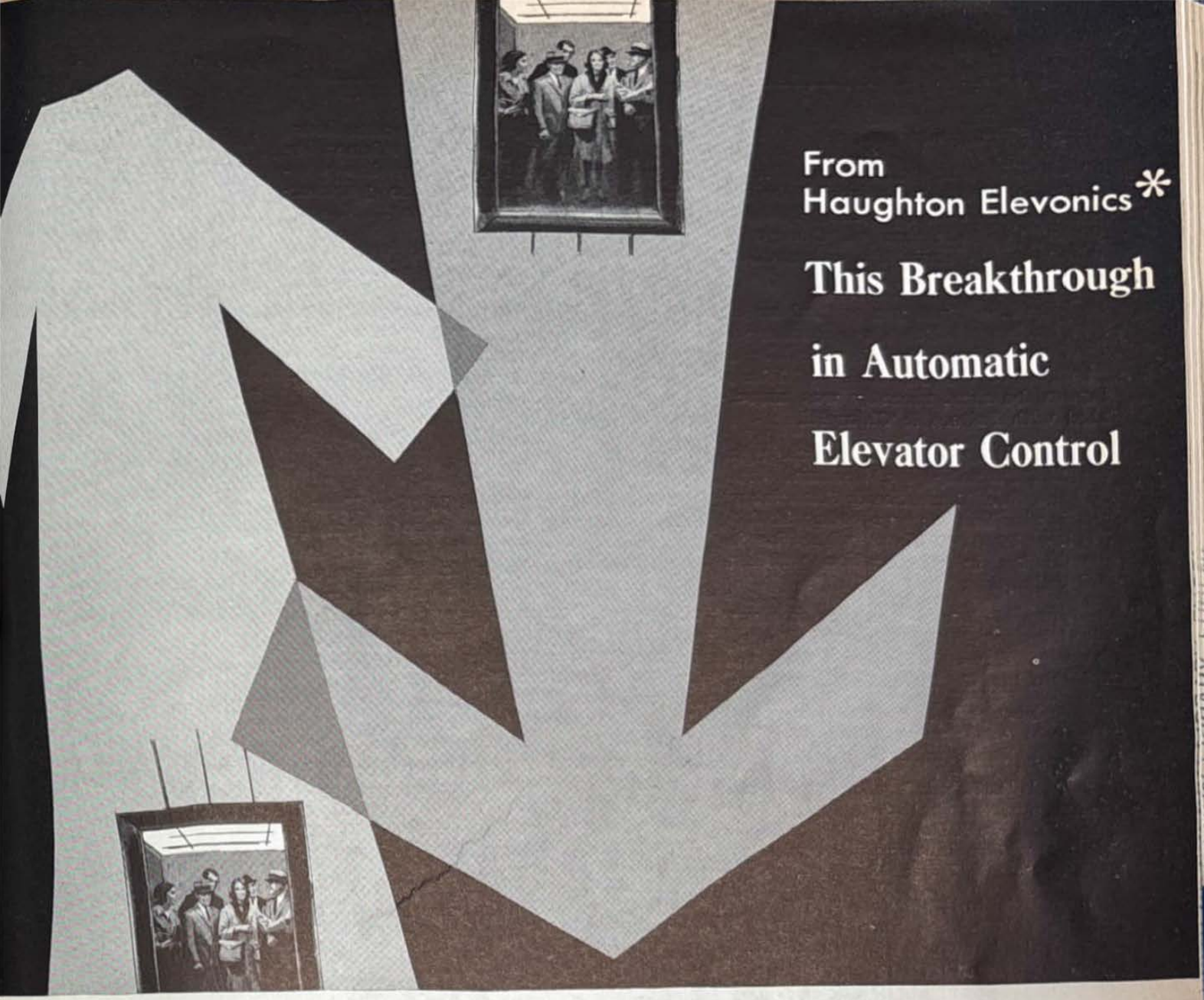
"The problem of getting teaching materials and equipment into the hands of students and teachers readily at the time when they are needed most has been given serious attention. The library facility is broadening and becoming more functional.

"The junior high school continues to be a challenging school building problem. Superintendents and architects are torn between trying to make the junior high school an imitation of the senior high school on the one hand and a sophisticated version of an elementary school on the other. The physical and psychological characteristics of adolescents—and they insist on being grown up one minute and wanting to make mud pies the next—with an urge for independence and an overwhelming desire for identity with a group, is recognized by teachers, administrators and parents. But to project a program and design a building adapted to these fluid changing characteristics continues to be a perplexing problem. In the junior high schools in this exhibit, concern is reflected for the individual in this transitory stage from an elementary pupil to a high school student, from a child to a young adult."

Photo credits: Rondal Partridge, Karl H. Riek, Dearborn-Massar, Julius Shulman.

GRANDVIEW SCHOOL, La Puente, Calif.: Lee & Kline, Inc., architects. "Outdoor and indoor spaces well blended together. Outdoor classrooms under roof overhangs, indoor-outdoor stage and in-and-out library are noteworthy features of this plan. Work alcoves separated from general classroom areas with folding doors contribute flexibility."





From
Haughton Elevonics*

This Breakthrough
in Automatic
Elevator Control

DYNAFLITE

Now every trip can be incredibly fast and smooth . . . *for unparalleled service*

Imagine floor-to-floor travel so smooth you can barely sense acceleration and deceleration . . . and faster than engineers thought possible a few years ago. It's a practical reality today, with Haughton Dynaflite . . . bold new concept of operatorless elevator control for new buildings and old.

The Dynaflite System is fully automatic . . . thoroughly reliable. Every run is as precisely controlled as those that preceded it, and those that will follow.

Dynaflite is but one result of the magic of Elevonics* . . . which, today, is shaping the new technology in vertical transportation. Get all the facts on Dynaflite, as well as Haughton's complete design, modernization and maintenance capabilities. The Haughton representative in your area will gladly consult with you—no obligation, of course. Or, write today.

EMBLEM OF EXCELLENCE IN VERTICAL TRANSPORTATION

Haughton Elevator Company

DIVISION of TOLEDO SCALE CORPORATION • Toledo 9, Ohio

OFFICES IN PRINCIPAL CITIES

• PASSENGER AND FREIGHT ELEVATORS • ESCALATORS
• DUMBWAITERS • SPECIALIZED LIFT EQUIPMENT

* Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative application of electronic devices and instrumentation for betterment of systems design and performance.

new offices, partnerships

The Phoenix architectural firm of Allan & Olsson has opened a branch office in the Union Building, Prescott, under the direction of George R. Allan Jr., to serve the communities of northern Arizona.

John Lee Ryan has opened an office for the practice of architecture in the Joshua Green Building, Seattle. A graduate of the University of Washington, he most recently was associated with Priteca & Chiarelli.

Uno Odman, former associate in the San Francisco architectural firm of John Carl Warnecke & Associates, has established his own office at 669 Oakland Blvd., Oakland, where he is specializing in specification writing and estimating.

Henry M. Hesse, architect, is now practicing at 45221 Nohonani Place, Kaneohe, Hawaii. He continues to maintain his Glendale, Calif., office.

Eric Elsesser has opened his own structural engineering office at 737 Beach St., San Francisco.

Francis A. Schulz has been placed in charge of the Scottsdale, Ariz., office of Norman J. Hamill & Associates, architectural-engineering firm which headquarters in Butte, Mont.

John Brisbin Rutherford and Constantine C. Chekene have formed a partnership known as Rutherford & Chekene, consulting engineers, with offices at 259 Gerry St., San Francisco, and 160 Main St., Los Altos, Calif.

firm changes

The Portland architectural firm of Jacobberger, Stanton, Franks & Norman has been succeeded by Jacobberger, Franks & Norman. Principals are Francis B. Jacobberger, Everett B. Franks and Richard W. Norman.

Architect Robert E. Lane of Bellflower, Calif., has changed the name of his firm to Lane & Brodie, with Ernest L. Brodie as the other principal.

new associates

Dion Neutra has been named an associate in the Los Angeles architectural firm of Robert E. Alexander. Formerly with the firm of Neutra & Alexander, he has managed such projects as the U. S. Embassy in Karachi, the Gettysburg Memorial and Adelphi College. He will continue to handle these commissions, among others, as the Alexander organization will complete the contracts entered into by the partnership prior to its dissolution in 1959.

Johnston-Campanella & Associates, Renton, Wash., architects-engineers, have named two new associates: Terry T. Murakami, chief designer, and Robert S. Burns, chief draftsman and manager of production activity. Both attended the University of Washington.

deaths

Frederick H. Meyer, 85, San Francisco architect whose career dated from the time when there were no architectural schools in California, died March 6. A principal in the firm of Ashley, Keyser & Runge, he was a member of the State Board of Architecture for many years, a member of the San Francisco Civic Center Commission from 1913-15 and co-architect of the Civic Auditorium. He was an originator in the development of large glass areas and modern store fronts at a time when heavy masonry masking steel construction with relatively small windows in the tradition of European Renaissance architecture was universally accepted.

John J. Gould, San Francisco structural engineer, died January 30 at the age of 63. A member of the firm of Gould & Degenkolb, he came to the U.S. from Switzerland in the early '20s. He was a charter member of the Structural Engineers Association of Northern California.

new addresses

Wurster, Bernardi & Emmons, architects, to 1620 Montgomery St., San Francisco.

Raymond R. Franceschi, architect, to 2636 Fulton Ave., Sacramento.

Robert D. Haugaard, architect, to 127 S. Los Robles, Pasadena.

Eugene D. Sternberg & Associates, architects, to 492 Littleton Bldg., Littleton, Colo.

Malone & Hooper, architects, to 150 Green St., San Francisco.

Rifat Parug and Jane Parug, architects, to 1637 Walnut St., Berkeley.

Norman Engineering Co., consulting engineers, to 5899 Venice Blvd., Los Angeles.

honors

Architect Welton D. Becket, whose firm is the designer of the new Southland Music Center complex, the Memorial Sports Arena and many other notable civic and business structures in the Los Angeles area, was named "Man of the Year" at the construction industries annual Gridiron Banquet at the Hollywood Palladium. Presentation of the Achievement Award plaque before a gathering of nearly 1,000 climaxed an evening of traditional lampooning of local government leaders. The citation read in part: "The pressure of our fast-moving construction industry has not forced Welton Becket to lower his exacting standards. The high quality of design flowing from his office has maintained a pattern of sound, contemporary quality, free from the deadening drag of the ultraconservative on one hand and the pitfalls of the extreme experimentalist on the other."

retirements

William K. Bartges and William A. Blair, supervising architect and architectural associate respectively, have retired from the California State Division of Architecture in Sacramento. Bartges intends to return to private practice on a limited basis.

Tacoma architect E. J. Bresemann is in semiretirement after 52 years of practice and now operates from his residence on Military Road out of Spanaway, Wash.

miscellany

For his efforts in heading the United Fund Drive in Denver, Henry Baume has received a "community service" plaque from the Colorado Chapter, AIA.

Tacoma architect Nelson J. Morrison had a one-man show of his water colors and pen-and-inks at the Washington State Historical Society Galleries during March.

Nathan Wilkinson Jr., architect and president of Allied Arts of Seattle, is serving as moderator on alternate programs of a 13-week series on KCTS-TV devoted to the cultural needs and shortcomings of the Queen City.

Among the participants in the 21st National Conference on Church Building and Architecture in Pittsburgh April 18-20 will be Seattle architect Robert L. Durham, whose collection of colored slides for the Church Architectural Guild of America is the largest in the U.S.

AIA nominates current slate; names 9 fellows from West

As architects and their wives were making final plans to travel to Philadelphia for the national AIA convention in Philadelphia April 23-28, the Institute announced that the complete slate of officers had been nominated for reelection and issued the list of newly elected fellows, including nine from the West.

Among the present officers are Henry L. Wright of Los Angeles, first vice president, and James M. Hunter of Boulder, Colo., second vice president.

R. Lloyd Snedaker of Salt Lake City also has been nominated as director of the Western Mountain District.

The new western fellows, along with their chapters and fields of recognition, are Arthur T. Brown, Southern Arizona, design; Cornelius M. Deasy, Southern California, service to the Institute; Donn Emmons, Northern California, design and service to the Institute; Charles F. Hummel, Idaho, public service; John L. King, Northern California, design and public service; Roland L. Linder, Colorado, service to the Institute; William Mooser Sr., Northern California, service to the Institute; Frederic H. Porter Sr., Wyoming, service to the Institute; and Worley K. Wong, Northern California, design.

CCAIA, four chapters elect

A statewide organization and four chapters have added their slates of AIA officers for 1961. Most recent results in the West:

California Council: Frank L. Hope, San Diego, president; W. Stephen Allen, San Francisco, vice president; Donald E. Neptune, Pasadena, secretary; Joseph J. Jozens, Sacramento, treasurer; C. Day Woodford, Los Angeles, member-at-large.

Orange County: Ray Johnson, president; Kermit Dorius, vice president; Knowlton Fernald Jr., secretary; Richard Layne Tom, treasurer.

Utah: M. E. Harris Jr., president; Nathan Woolley, vice president; Bruce Dixon, secretary; Peter M. A. Moyes, treasurer.

Colorado: F. Lamar Kelsey, president; Jerome K. Nagal, vice president; T. J. Moore Jr., secretary; Rodney Davis, treasurer.

Southwest Oregon: Donald H. Lutes, president; R. E. Ellis, vice president; Kenneth Wollenweber, secretary; DeNorval Unthank, treasurer.



The CF&I giant protects "Freeways"

...*with* Realock Fence

The CF&I giant stands for many dependable steel products used in the construction industry. One of them — Realock Fence — is the proven way to assure positive freeway protection.

The chain-link fabric of steel in a Realock Fence makes it attractive and durable. Sturdy posts are anchored in concrete. And the steel fabric is galvanized after weaving for maximum resistance to corrosion.

Choose the Realock Fence that best meets your needs... in light or heavy construction... with barbed or knuckled selvages... with or without barbed wire tops. Realock's professional crews will erect your fence.

Ask for a free estimate today. Consult your nearest CF&I *office.*

Los Angeles • Oakland • Portland • San Francisco
San Leandro • Seattle • Spokane • Denver
Salt Lake City • Phoenix

CF&I STEEL

REALOCK FENCE

THE COLORADO FUEL AND IRON CORPORATION

Portland's glass palace

A statement by the architects:

MANY COLISEUMS, because of their solid enclosures, give no hint of the activities going on within. We desired to develop a scheme for the Portland Memorial Coliseum that would provide visual excitement and a sense of action from both inside and outside the building. The structure viewed from Interstate Avenue at night with the lighting of the seat bowl and the people and activities on the concourse level is the best illustration of this concept.

While some arena activities require light control, most do not. It was felt that the ability to vary the visual environment from within the seat bowl would lend drama and versatility to the space. The curtain concept was developed to permit spectators within the arena to have the benefit of the feeling of the total space and volume during events where light control was not required.

The coliseum management required that circulation patterns permit the simultaneous use of both arena and exhibit halls for separated events or their joint use for a single activity.

Furthermore, it was desired to employ a structural system having simplicity and yet visual impact. Many solutions were studied, including a circular form

G/H Studio



WHITE FASCIA, 22-ft. high strip of new acrylic-surfaced exterior plywood in ½-in. thick panels, around top of main building is clearly evident in daytime shot from northeast. Coliseum becomes alive at night, sharply defining 129,000-sq. ft. roof structure with its four supporting reinforced concrete columns, 96 laminated wooden mullions and concrete seating form (photo across page).

Art Hupy photos (except as noted)





Portland Memorial Coliseum
Portland, Oregon

•

SKIDMORE, OWINGS & MERRILL
Architects

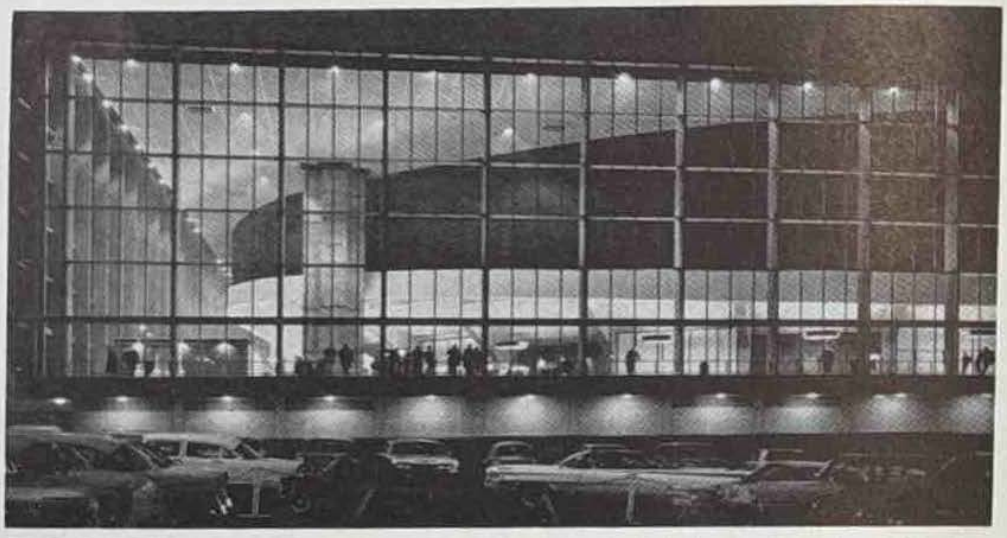
MOFFATT, NICHOL & TAYLOR
Structural Engineers

HOFFMAN CONSTRUCTION CO.
General Contractor



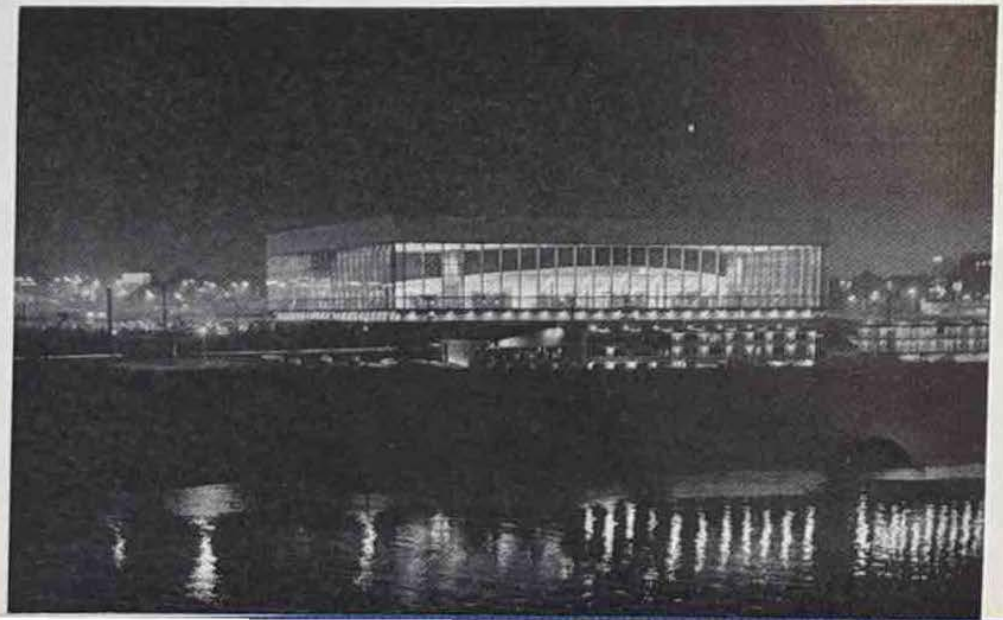
G/H Studio

GRACEFUL CONCRETE CANOPY contributes to visual excitement as patrons enter building.



PARKING AREA (on-site facilities for 1,700 automobiles) is close by main entrance, but since structure is elevated about ground on north, west and south sides, coliseum can be seen from highway and bridge, principal viewpoints, without being distracted by sea of cars.

WILLAMETTE RIVER flows by west elevation, providing dramatic view from downtown.



with a suspended roof system. The square enclosure was selected as it combined economy and simplicity and provided adequate concourse level area for spectator use between periods of arena activity. Seating form was developed from sight line studies and the desire to create a graceful and aesthetically satisfying expression when viewed from outside of the arena itself.

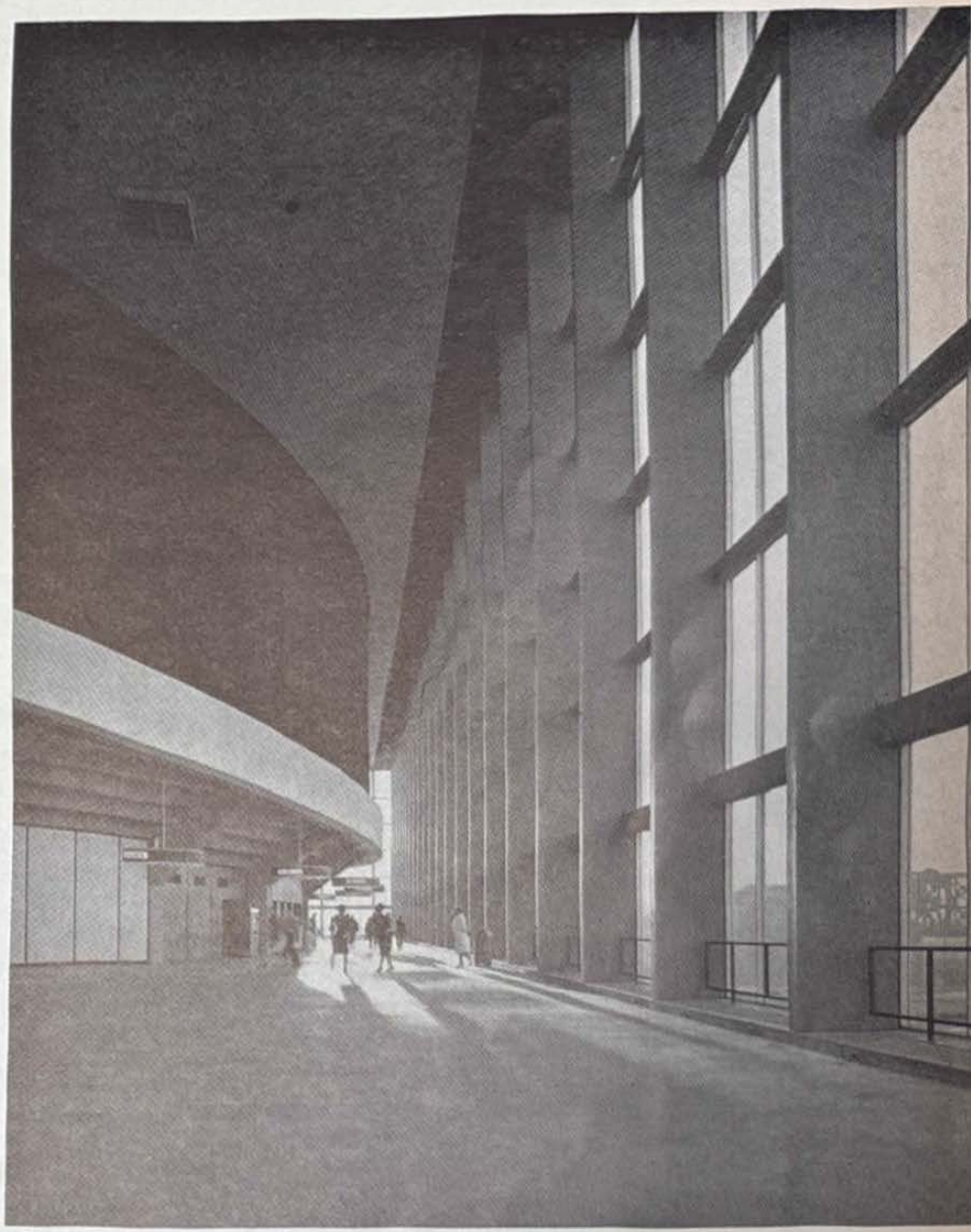
The absolute limitation on available funds, coupled with a specific program of facilities required by the enabling charter amendment, dictated the use in most areas of simple and durable materials as did, in some instances, the influence of local industries. The broad concept of the building is designed to act as a unifying element for the many uses and other factors which influenced the project.

Principal building elements

Main elements of the facility are the multipurpose arena, exhibition hall, meeting and assembly rooms, including a War Memorial Room and Chapel, and on-site parking for 1,700 automobiles.

The 360-ft. square multipurpose arena is designed for a variety of events requiring large seating capacities. Its 120x248-ft. floor provides an underfloor freezing system for ice hockey and recreational skating. Nine-thousand theater type permanent seats with an unobstructed view are contained in the concrete form, with portable ramp and riser structures available for temporary installation to reach a capacity of more than 13,000 for boxing matches. One large mechanically operated curtain encircles the entire 1,050-ft. perimeter, enclosing the arena as events within require. Open concept created by the glazed curtain wall provides a dramatic view and invites patronage by exposing activities within. Service functions, including locker and team rooms, kitchen and commissary, engineering and storage areas, are within the base of this building at the arena floor level.

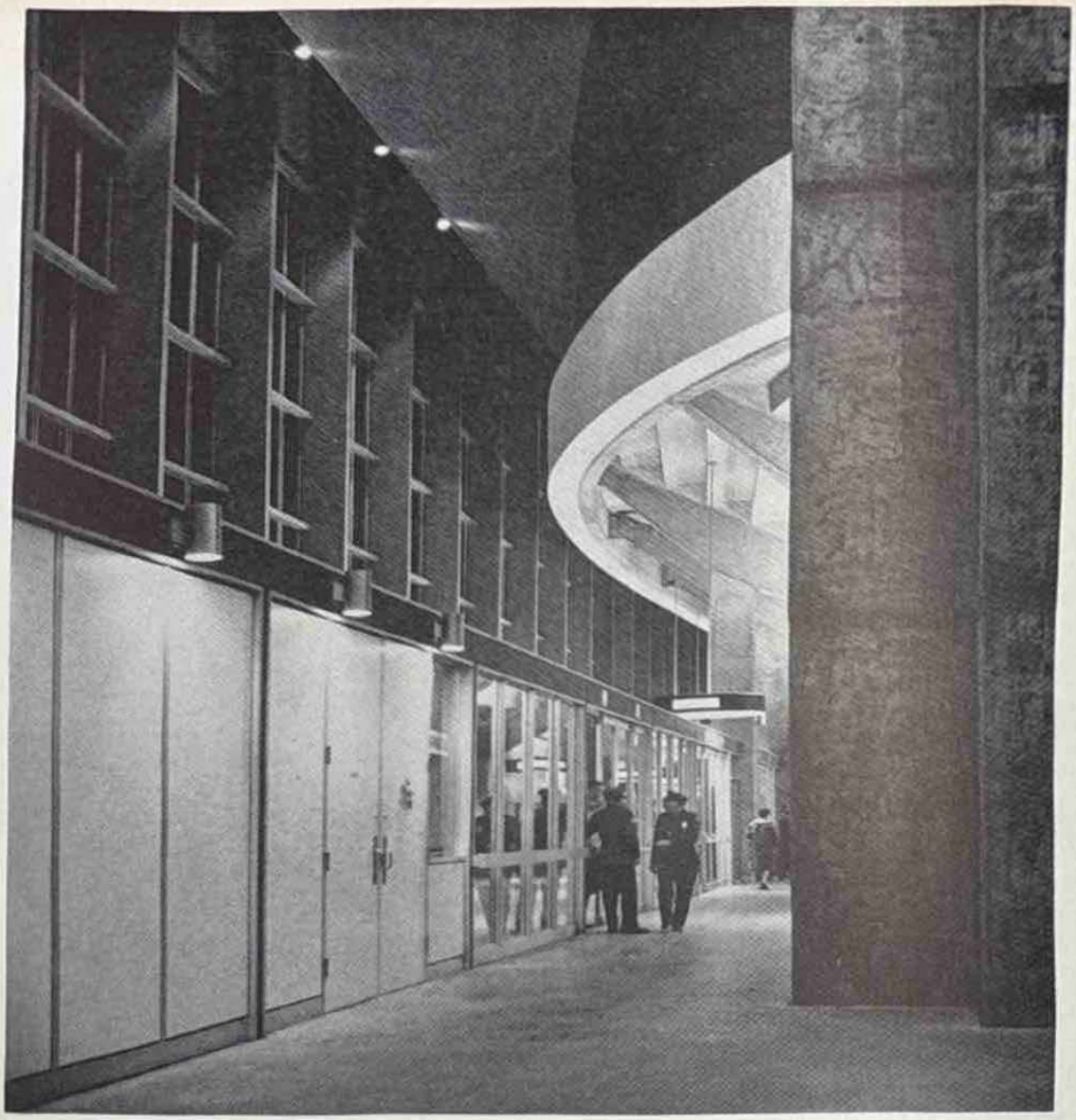
The 52,650-sq. ft. exhibition hall has 30x30-ft. bays to accommodate about 300 10x10-ft. standard display



GRAND CONCOURSE which circles arena is one of coliseum's notable features from spectators' standpoint. Wooden mullions, 9 in. thick, 36 in. wide and 78 ft. high, provide intimate areas for conversation and viewing city, river and mountains.

COST ANALYSIS SUMMARY

General construction contract:	$5,650,000
Gross floor area	341,300 sq. ft.
Total gross volume	13,340,700 cu. ft.
Cost per square foot	$16.60
Cost per cubic foot	$ 0.42
Other costs:	
Equipment	$ 600,000
Land	$1,900,000
Fees and operating costs	$ 600,000

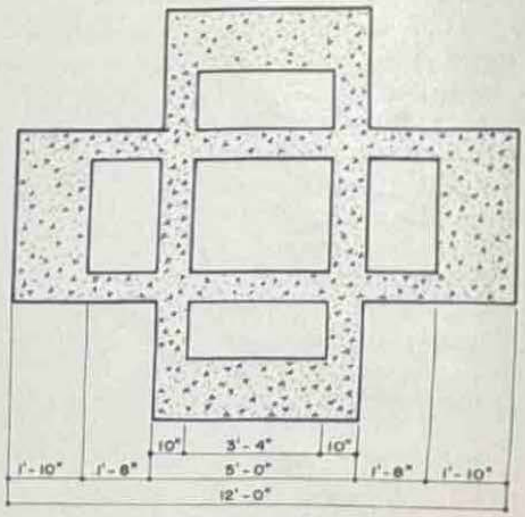


SIMPLE AND BOLD FINISHES, such as exposed concrete column at right, give vigor and character to coliseum and are balanced by careful detailing and colorful panel accents.

booths. Entrances to this unit are planned so that it may be used jointly or separately with the arena. Utility connections for gas, air, hot and cold water, waste, telephone, television and public address are provided throughout this entire area.

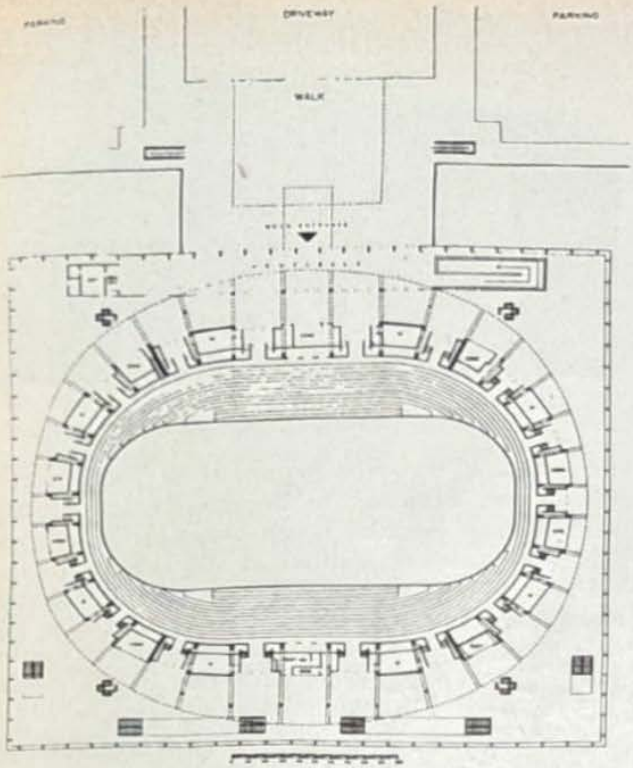
Eight meeting and assembly rooms can handle up to 2,700 persons, with individual capacities varying from 100 to 1,100. Here again, rooms are located to afford separate or joint use with other arena functions.

J. Donald Kroeker & Associates were the mechanical engineers; Grant Kelley & Associates, electrical engineers.



COLUMN SECTION

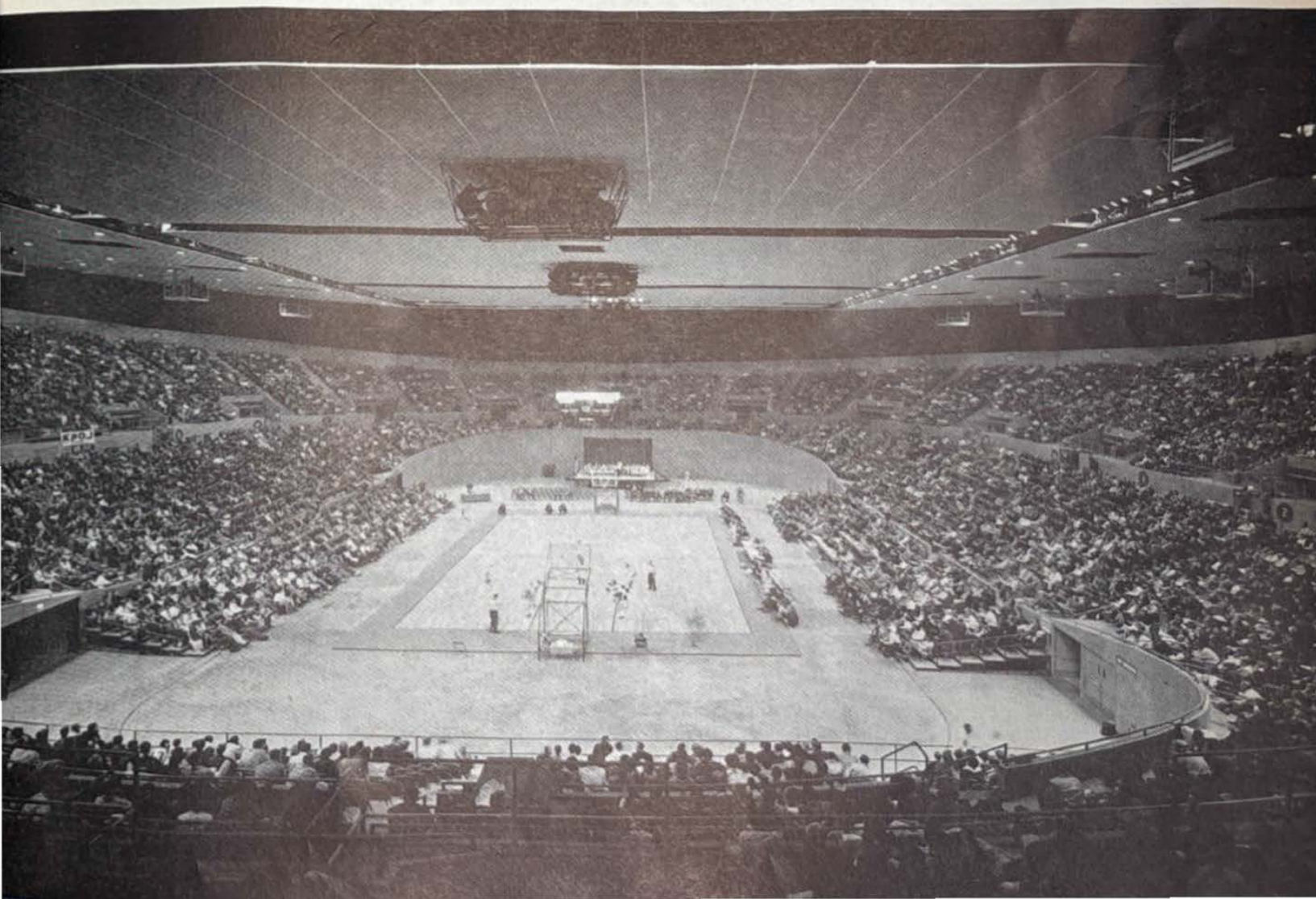
PORTLAND MEMORIAL COLISEUM



CONCOURSE LEVEL



ARENA CEILING is remarkably clean; even central scoreboard is in good taste. Jury for Oregon Chapter, AIA, in Honor Award citation praised structure for "excellent solutions to sight lines, lighting and technical requirements."



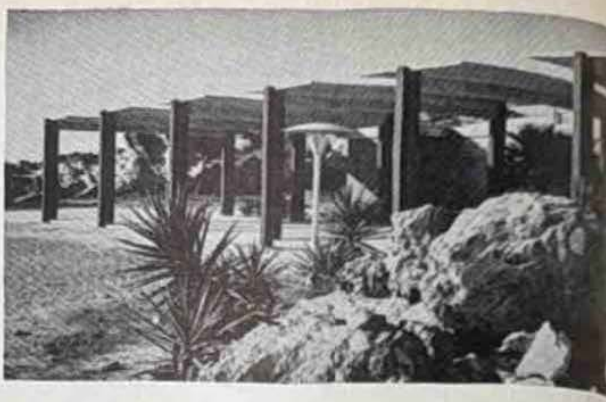
Beach Shelter
Newport Beach, California

•

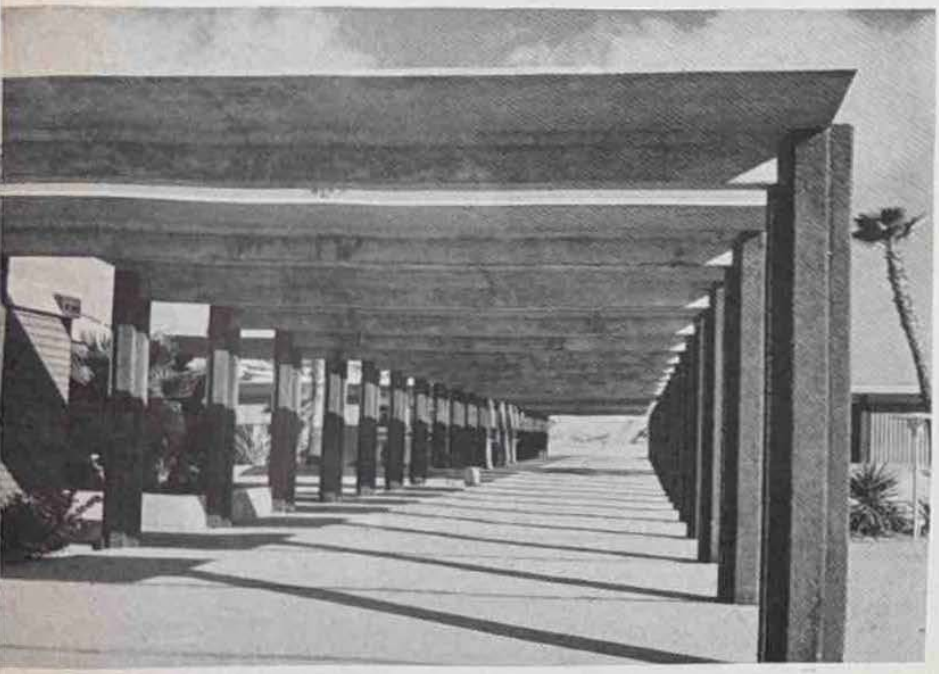
BLUROCK, ELLERBROEK & ASSOCIATES
Architects

JOHN A. MARTIN
Structural Engineer

DAVID YOUNG
General Contractor



Redevelopment transforms beach



LIGHTWEIGHT COLUMNS are maintenance-free dark brown exposed aggregate, forms having been coated to keep cement from hardening on surface.

ORIGINALLY the city requested a design for concession building to be constructed at one of the most popular beach areas in the Corona del Mar section, spotted at the time with the usual hot dog joints. Architects did a thorough study of the area, made a presentation to the city and won approval for a 10-year master plan for development, with the beach shelter as the first step. Public response has exceeded expectations to such an extent that the plan has been telescoped into five years.

Most noteworthy feature of the present construction is a concourse roofed by a series of prestressed concrete T-slabs placed on exposed aggregate lightweight columns, leading past the buildings to the beach area.

The building itself is on a concrete foundation, with glass and wood walls, expandable for future needs. Roofing is gravel and blue plastic; windows, aluminum; floors, concrete. Interior finish is tempered hardboard and exposed concrete. Total cost of this first stage (10,000 sq. ft.) was $58,000, including site development.

Robin S. Mackay photos



Interesting patterns and smart colors accent specialty shops

COMBINATION of California redwood, heavy-textured brick and contemporary colors set the scene for this series of high fashion shops built in an H-shape around twin patios.

Charcoal, beige, pumpkin and black are utilized to play against the expansive panels of resawn redwood and to highlight the extended beams beneath the wide eaves of the mildly pitched roof, as well as the mustard yellow spandrels used under large glass areas. The same colors are carried into the interior of the stores, which include women's and men's furnishings, beauty, sportswear and delicatessen - bakery shops, professional offices and a restaurant.

The Honker Restaurant is designed to provide expanded capacity during the resort season while not destroying an intimate dining atmosphere. Accommodating 400 patrons all told, it has a main dining room, the Gander Room for men only, a lounge, a second floor banquet room, patio facilities and the Wine Cellar for parties of 20 guests.

La Jolla Fashion Center
La Jolla, California

•

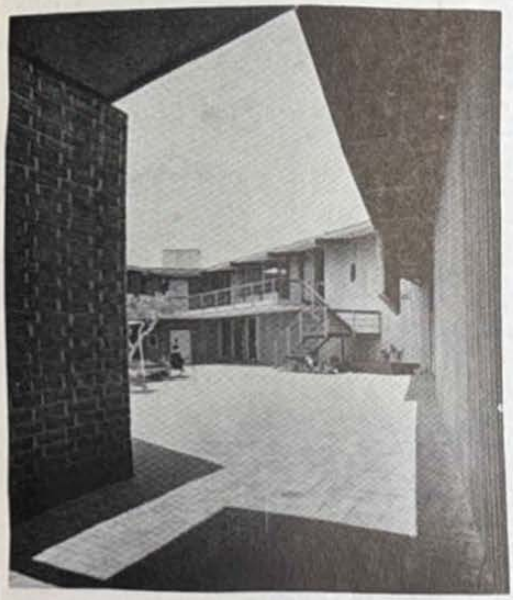
EDWARD H. FICKETT
Architect

RICHARD BRADSHAW
Structural Engineer

BURGENER & TAVARES
General Contractors



Marvin Rand photos



WIDE EAVES and extended beams create patterns of interest, contrasting with sections of cedar paneling, brick and glass. Total cost was $900,000.



HEAVY-TEXTURED BRICK is one of several materials used throughout complex and becomes dominant design feature in restaurant's Wine Cellar, capturing early California theme.



Republic Savings and Loan Association Building, Dallas, Texas. Architects: Fisher & Jarvis, AIA, Dallas. Engineer: Edward L. Wilson, Dallas

Cited for design excellence by the Texas Society of Architects . . .

modern concrete building blends spectacular beauty with practical economies

Selected as an outstanding example of contemporary Texas architecture, the new Republic Savings and Loan Association Building was chosen for exhibition during the State Fair of Texas.

Among many interesting features, the 4-story structure with lower-level parking is distinguished for its graceful honeycomb cast concrete solar screen. It shields the massive southern exposure against peak solar heat loads—yet admits plenty of daylight. Its design reduced air-conditioning requirements by 10 tons, saving $6,000 in equipment plus continuing savings in operating costs.

Fashioned with white portland cement, the lacy solar screen provides a pleasing contrast with adjacent precast concrete panels of brown and cork-colored marble aggregates. Even the concrete terrace steps and floors add dec orative interest with their exposed aggregate surfaces

Structural strength, fire-safe qualities and construction economies were important factors in the choice of con crete for this building. Time, labor and money were saved with the multiple use of forms in the building of concrete frames and pan joist floors. And because of concrete's ready availability, there was no time lost in scheduling

From every point of view — construction efficiency beauty, durability and low maintenance costs—modern concrete delivers more for the money!

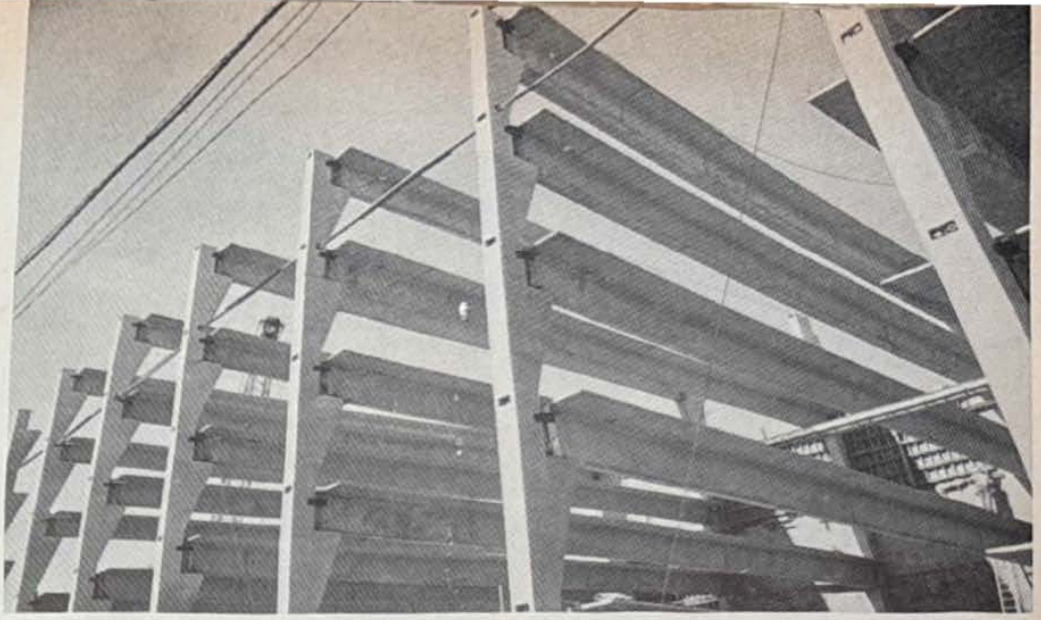
PORTLAND CEMENT ASSOCIATION

- 816 West Fifth Street, Los Angeles 17, Calif.
- 903 Seaboard Bldg., Seattle 1, Wash.
- 721 Boston Bldg., Denver 2, Colo.
- 2727 North Central Avenue, Phoenix, Arizona
- 425 Newhouse Bldg., Salt Lake City 11, Utah
- Mezzanine-Placer Hotel, Helena, Mont.
- 120 Madeira Drive, N.E., Albuquerque, New Mexico

A national organization to improve and extend the uses of concrete

FOR STRUCTURES... MODERN

concrete



GIRDERS are stacked between interior and exterior column progressing from back of structure to front. Metal tubular shores act as temporary bracing between columns.

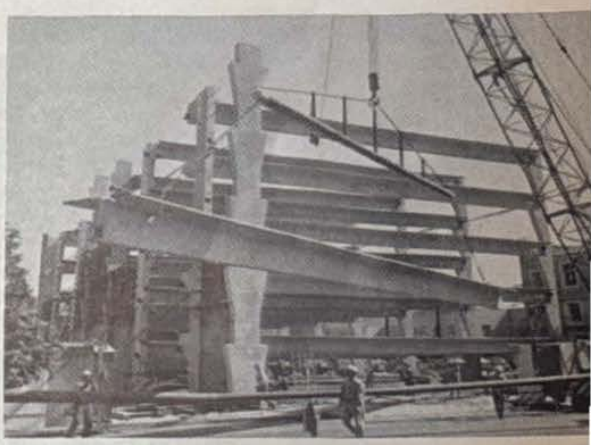
Precast columns speed garage erection

Precasting, prestressing and precision prescheduling were the key factors in saving erection costs in construction of a six-level concrete parking garage in Beverly Hills. The city-owned structure was designed by Welton Becket & Associates. Structural engineers were T. Y. Lin & Associates and general contractors, C. L. Peck and Ellis E. White.

The precast, one-piece columns, 64 ft. high, were prefabricated and trucked to the site on an assembly line basis, providing the further advantage of keeping the area, a congested business district, relatively uncluttered and minimizing interference to neighboring establishments.

The 150-ft. square building is supported on three rows of eight precast columns each. These in turn support 77 prestressed and post-tensioned concrete single T-girders of 75-ft. span, each on a skew. Girders contain the post-tensioning conduits and strands that tie the structure laterally.

While girders were set from the bottom up the spiral of the helix, tensioning experts tied on the structure and crews did the forming work on the shear wall. Actual erection took less than one week.



PRESTRESSED-T is lifted by crane with 100-ft. boom from truck into position.

Prestressed and post-tensioned concrete ramp decks were formed after several of the 75-ft. square quandrants were placed and initially tensioned. Decks vary from 4 to 9½ in. thick, averaging 6 in.

The garage accommodates 400 cars. It has a continuous ramp to facilitate straight-in self-parking. Pitch of the ramp is slight to permit more comfortable parking and secure more efficient utilization of space. Structure has clear spans of 75 ft., with no interior columns or obstructions except for a center longitudinal shear wall, the only piece of reinforced concrete to be cast on the job.

Large prestressed and precast units were manufactured by Wailes Precast Concrete Corp., who also handled the erection and post-tensioning on the job. Cost was $550,000.



STARKNESS has been modified on east side by natural anodized aluminum screen consisting of short cylinders cut at angle. North side is covered with blue metal panels, creased to provide three-dimensional effect.

single package water system

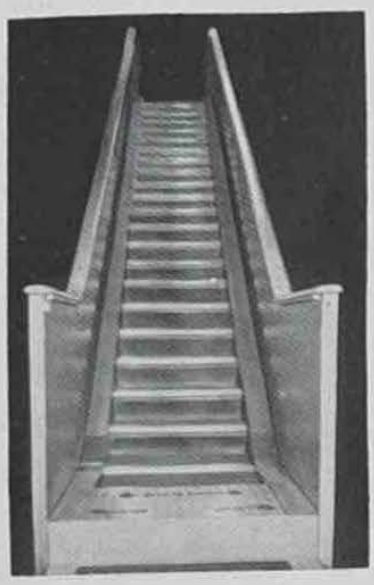
A packaged unit that furnishes hot water for domestic use, central heating and pool water heating is designed to save space, piping and venting and heating costs. Developed especially for apartment houses and motels, the system utilizes the Raypak indirect heating principle in which water to be heated does not run through the boiler. Thus lime deposits in the boiler coils are eliminated, cutting maintenance costs. Package is offered in a wide variety of heating and hot water capacity sizes. — Raypak Co., Inc. **(No. 1)**

vinyl surfaced wallboard

For motel, commercial installations and such home applications as an accent wall, Bestwall has developed a decorative, vinyl surfaced gypsum wallboard designated Eternawall. The product will be manufactured in ⅜-in. thickness with a slightly textured linen weave vinyl finish in pastel colors. The finish is scuff resistant. Grease, crayon and oil stains can be removed with a damp cloth.—Bestwall Gypsum Co. **(No. 2)**

door threshold

Sun Screen Products is introducing a combination wood core, vinyl and aluminum threshold called Seal-Draft. It consists of an inner core of redwood to insulate against cold or frost creeping through, cover plate of scored aluminum to prevent foot slippage and wear of wooden core and a curved vinyl section which arcs underneath the bottom of the door to seal out drafts and dirt. Entire assembly is fastened to the subfloor with screws. — Seal-Draft Division, Sun Screen Products, Inc. **(No. 3)**

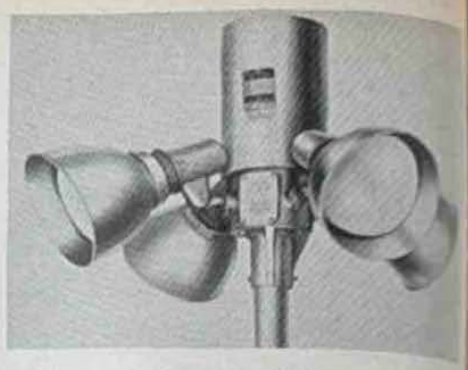


reversible escalator

For factories, offices, clubs, nursing homes and other installations where floor-to-floor traffic is intermittent, Autostair is offering a reversible escalator. In addition to the obvious economical benefits of having one stairway in place of two, initial cost has been further reduced by offering the Autostair in packaged units ready for installation. Since it works on a demand basis (passenger steps on buttons to start or stop the mechanism), operating costs also are reduced. Escalator is designed to handle an average load of 450 persons a day. Cost is about the same as a medium-priced car.—Autostair Corp. **(No. 4)**

reinforced plastic panel

Butler is introducing a fiberglass-reinforced plastic panel made from a newly developed formula making it possible for the product to carry a 20-year guarantee that it will retain uniform surface condition with no blooming of fibers, erosion or surface failure and no loss of shatterproof, color or light transmission properties. Called Stylux 20, the panel is offered in wide range of colors. —Butler Manufacturing Co. **(No. 5)**



outdoor light assemblies

For shopping centers, parking lots, industrial sites and other installations requiring highly efficient illumination, Shalda is offering a line of outdoor type mercury vapor pole top assemblies utilizing maintenance-free reflector lamps. These assemblies are said to provide more light per watt, a high maintained light output regardless of weather and lamp age and constant foot-candle level. Assembly comes complete with lampholders, ballast, glare tubes or shields and with or without lamps as the customer desires. — Shalda Manufacturing Co., Inc. **(No. 6)**

acoustical ceiling tile

For commercial and institutional areas where a distinctive appearance is desired, Armstrong is marketing a wood fiber decorative acoustical ceiling tile which the company reports is considerably less expensive than other types of materials with similar surface designs. Called Golden Cushiontone, the tile has golden metallic flecks inlaid in its fissures. It is finished with a flat white washable vinyl paint, can be cemented directly to plaster, concrete or gypsum board surfaces or be mechanically suspended—Armstrong Cork Co. **(No. 7)**

curtain wall panel

Decorative effects of Soule' Steel's Mosaica finish can now be utilized in curtain and window wall construction. The firm is introducing an insulated panel faced with glass chips of random sizes and shapes set in an inorganic matrix and laminated to cement-asbestos board. Panel has a fiberglass insulating core backed with aluminum foil, inner facing of cement-asbestos board and aluminum surround. Use of fiberglass and aluminum keep the panel light in weight without reducing strength or rigidity. Four thicknesses and sizes to meet architects' specifications are available. Mosaica is offered in 17 different colors in facet or matte finish.—Soule Steel Co. **(No. 8)**

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

APRIL 1961

1 2 3 4 5 6 7
8 9 10 11

Name

Title

Firm

Address

City Zone State

decorative hardboard

A decorative hardboard panel featuring colored particles scattered over a light background offers a wide variety of design possibilities. Called Sandalite, the product is expected to find application in such uses as wainscoting in schools or offices, as a feature wall or a room divider and in cabinet doors. It has a factory-sealed face which produces a stain- and abrasion-resistant surface and needs no further finishing, with the exception of extreme use applications like countertops. A grainless wood product, Sandalite can be worked and fabricated with ordinary hand woodworking tools or power equipment. Product is being offered in plain panels, in Forall (Sandalite faces laminated to a hardboard core), as a random plank with a V-groove, in t&g panels and punched panels. Color particles are white, gray and blue.—Forest Fiber Products Co. **(No. 9)**

spectator seating

Contoured individual tilt-up plastic chairs for stadium and auditorium are described by the manufacturer as being more comfortable than traditional spectator seating, while costing less and requiring less maintenance. Called Contours, the seats are molded of rigid one-piece fiberglass and nylon plastic. They are available with or without arms, with padded seats (seats and backs if required) and in a number of colors. Slight pressure tilts up seats. Molded-in colors eliminate frequent paint jobs. Cleaning time also is reduced.—Pacific Seating Corp. **(No. 10)**

wall mounted heat pump

Westinghouse has introduced a heat pump that attaches directly to the outside wall of the building, a feature expected to considerably reduce time and cost of installation. Unit is 6 ft. high, 2 ft. wide and 1 ft. deep and projects about the same distance from the wall as the overhang of the average roof. For a home of block construction, only two blocks are removed for installation. Similar installation can be made with wood frame, brick veneer or other forms of construction. Unit is rated at 18,000 Btu's and will serve a house with 1,000 sq. ft. of area. Larger homes or buildings would require additional units. While designed especially for the mass housing market, the heat pump also is suited to other applications, such as motels, offices, gas stations, apartments, etc.—Westinghouse Electric Corp. **(No. 11)**

LITERATURE

Improved Sound Barriers Employing Lead (AIA 39): presents engineering report by Bolt, Beranek & Newman, acoustical consultants, recommending lead for effective sound control; 12 pp.—Lead Industries Association, 292 Madison Ave., New York 17, N.Y.

Twin-Duct Air Blender: describes operation of new ceiling and underwindow air blenders which don't use motors, piston operators or mechanical linkage; catalog 1100-B107; Worthington Corp., Ampere Station, East Station, East Orange, N.J.

The Electronic Handbook: covers application of electric and electronic controls in commercial and industrial air conditioning installations; 18 pp.—Barber-Colman Co., 1300 Rock St., Rockford, Ill.

Firehearth Divider Wall (AIA 14-E-S): illustrates decorator uses of a fireplace and shelving combination that can serve as a room divider; 4 pp.—Condon-King Co., Inc., 1247 Rainier Ave., Seattle 44, Wash.

Fire Insurance Savings: estimates savings in insurance costs with fire-resistive roof deck construction; 16 pp.—The Flexicore Co., Inc., 1932 E. Monument Ave., Dayton 1, Ohio.

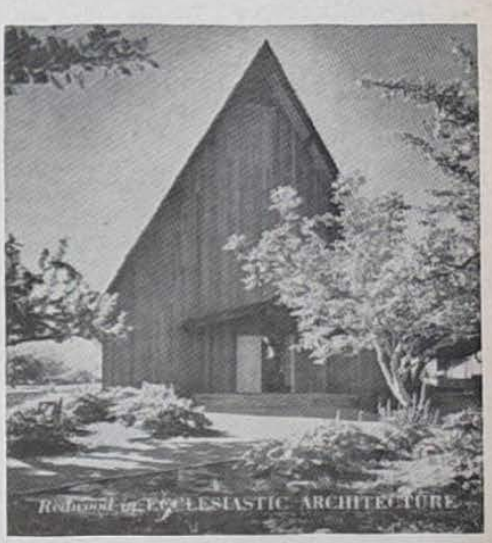
Design of Floating Structures with Styrofoam (AIA 32-B-NN): summarizes advantages, gives field performance reports, design and application data; 24 pp.—The Dow Chemical Co., Midland, Mich.

Perlite Lightweight Plaster Aggregate (AIA 21-A-5 and 21-C-1): gives specifications, fire ratings, sound reduction tables, etc.; 4 pp.—Perlite Institute, Inc., 45 W. 45th St., New York 36, N.Y.

Promenade Tile: illustrates uses and advantages of this traffic-bearing, fireproof roof tile of asbestos-cement; folder BM-243; 4 pp.—Keasbey & Mattison Co., Butler Ave., Ambler, Pa.

Cutler Compartments: catalogs line of toilet compartments, hospital cubicles, dressing enclosures and urinal screens, with separate color chart; catalog TC-61; 16 pp.—Cutler Metal Products Co., Camden 3, N.J.

West Coast Lumber Guide: lists mills and products in 1961 edition of "Where to Buy"; 52 pp.—West Coast Lumbermen's Association, 1410 S.W. Morrison St., Portland 5, Ore.



pa&b pick of the month

Designed for the use of church building boards and their architects, "Redwood in Ecclesiastic Architecture" is certainly one of the handsomest pieces of literature produced in recent months. Part of its visual excellence comes from its 11x14-in. format, lavishly illustrated with first-rate photographs. It is in essence an idea book which shows the uses of redwood from a wide range of styles and locations, although California projects dominate the 24 pages. Among them: Christ Church Episcopal in Portola Valley, designed by Hervey Parke Clark and John F. Beuttler; Neighborhood Church, Pasadena, Smith & Williams; First Congregational Church, Palo Alto, Bolton White, Jack Hermann and Allan Steinau; First Church of Christ, Scientist, Belvedere, Charles Warren Callister; Methodist Community Church, Los Altos, Inwood, Power & Daniel; First Congregational Church, Redwood City, Kingsford Jones; Hollypark Methodist Church, Gardena, Hal C. Whittemore; First Presbyterian Church, Concord, Donald Powers Smith; Plymouth Congregational Church, Oakland, Carlton A. Steiner. The West also is represented by Danforth Chapel on the Colorado State University campus in Fort Collins by James M. Hunter & Associates and the Kailua Chapel of the Church of Jesus Christ of Latter Day Saints on Oahu by Harold W. Burton. — California Redwood Association, 576 Sacramento St., San Francisco 11, Calif.

• **W. P. Fuller & Co.** has transferred L. R. Templeton from Idaho where he was manager of the Boise district to Union City, Calif., where he will direct operations of the new northern California glass depot to be opened there in mid-year. The $500,000 depot will warehouse all types of glass products handled by Fuller. Office and warehouse will total 73,000 sq. ft. Templeton's appointment resulted in several auxiliary changes in Idaho. R. Gentry, manager of the Nampa store, has been named Boise district manager and R. E. Lindbloom, manager of a store in Boise, has moved up to Gentry's old post.

• **Pittsburgh-Corning Corp.** has appointed Dwight F. Partell as district manager of the San Francisco office. He formerly was a sales representative in the western sales area.

• **Far Eastern Enterprises** has been formed in Honolulu to market mon-

keypod laminated wood paneling duced by Asahi Plywood Co. of Ja President is John W. Driver; se tary, H. C. Patterson; and vice pr dent, Jack M. Philpott. Distribu on the mainland will be through L Paskill Corp., Portland lum merchant.

• **Westinghouse Electric Corp.** selected Honus W. Hofeditz to residential sales manager for ap ance sales in the Seattle area. formerly held the title of dist contract sales manager. The comp has formed a new residential s department to work with builde

• **Owens-Corning Fiberglas Corp.** appointed Kaiser Gypsum Co. a national distributor for Fiber screening in the firm's 14-state m keting area in the West.

• **Dyna-Therm Chemical Corp.**, C ver City, Calif., has acquired assets and business of Mathews Pa Co., Los Angeles, and will operate as a division under present mana ment headed by Richard W. Janes and Wilford J. Merrill.

• **Genie-Air Products** has appoin two wholesale distributors. Southw Supply Co., San Diego, will han San Diego and Imperial Count Yuma County, Ariz., and Baja C fornia, Mexico. Slakey Brothers Inc., will cover northern Califor and part of Nevada.

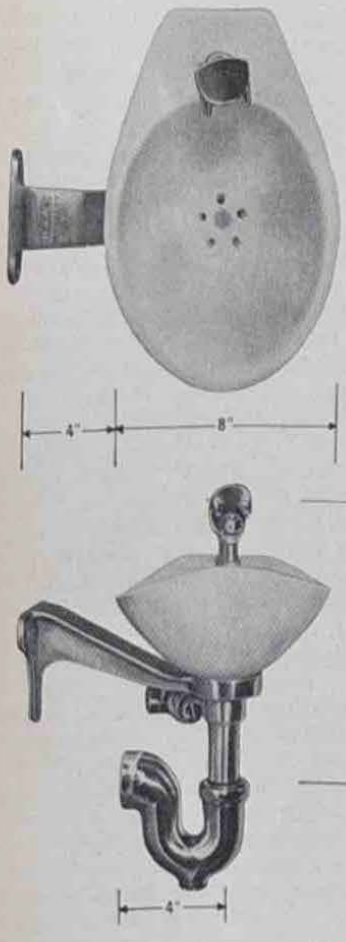
• **Desert Ceramic Corp.**, Albuqu que, N. M., has been acquired Texstar Corp., San Antonio.

• **Kaiser Aluminum & Chemi Corp.** and **Kawneer Co.** officers ha agreed on merger plans that wo make Kawneer a division of Kais The plan, as approved by the board directors, will be submitted to sto holders in the near future. Lawre J. Plym, president of Kawneer, w continue as head of the division a will also become a member of t Kaiser Aluminum board of directo The firm manufacturers alumin architectural products at eight plan including Richmond, Calif.

• **Vaughan Interior Walls, Inc.**, h its first conference for licensed co tractors in Los Angeles early in Fe ruary. Attending were represent tives of 32 independent contracti firms from the U. S. and Canada, well as manufacturers and supplie associated with the gypsum movab wall system, who discussed all aspec of installation, marketing and prom tion.

ANOTHER HAWS PROJECTION OF STYLE

HAWS MODEL 1505



This aristocratic Haws fountain is the *practical* choice of professionals who specify for *economy* as well as beauty. Channing Wallace Gilson designed it. Haws Craftsmen shaped it in gleaming vitreous china. The *Triennale Internazionale* of Milano, Italy, selected it for exhibition as superior international design. That was in 1957. Today, you can get this Haws exclusive in polished aluminum, or with your choice of colors in vitreous china and enameled iron. Wall or pedestal mounted. Specify superior design at a popular price! Write for detailed specifications—today!

Write for our comprehensive catalog! (We're in SWEET'S File, too.)

Since 1909 HAWS DRINKING FOUNTAINS

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street • Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California



HOUSE OF FREEDOM

perimental demonstration project for the lerly is viewed by the nation's most promi- nt citizen of retirement age, Dwight D. enhower, as C. Henry Bacon Jr., executive e president of Simpson Timber Co., Seattle, d president of Douglas Fir Plywood Asso- tion, lifts roof off model. Looking on are E. Difford, executive vice president of PA; Ethel Percy Andrus, president of Ameri- Association of Retired Persons; and William Fitch, executive director of AARP, which sponsored house with DFPA.

U. S. Industries has established a waii-Pacific division in Honolulu.

Marwais Steel Co. has formed an uminum division and will establish mplete warehousing facilities for uminum mill products used in con- ruction at both the Los Angeles and ay area facilities of the company. In harge of the division will be G. ourtney Yager. Marwais handles eynolds Metals Co. products.

Provincia Aluminum Structures, nc., has moved its main office and lant from San Francisco to Daly City, alif. The firm plans national mar- eting of its modular prefabricated uildings.

The Flintkote Co. has added Rob- rt D. Schmid to its flooring and ad- esive division and will cover eastern Wyoming as part of his territory.

The Pacific Lumber Co. has elected Stanwood A. Murphy as president, succeeding his father, A. S. Murphy, who is now chairman of the board of directors. The firm also has named William G. Van Beckum as vice presi- dent for research and development and Edward M. Carpenter as vice president for operations.

The Republic Supply Co. of Cali- fornia has appointed Thomas P. Pike president, succeeding John J. Pike. The new president will continue as chairman of the board, a post he has held since December 1960.

Hubb Corp. has named Sydney Anderson to the post of vice president in charge of West Coast operations for the Typhoon Air Conditioning Division. He will supervise operations in California, Arizona and Nevada, working from the factory branch in Los Angeles. Previously he was regional manager in Atlanta, Ga.

ASSOCIATIONS

Institute of Heating and Air Conditioning Industries has elected Arthur Horn of La Puente, Calif., as president. He is sales manager for the heating and air conditioning division of Payne-Day & Night Manufacturing Co.

Gypsum Drywall Contractors International picked five men from the West as officers during its annual convention in Las Vegas in February. They are John Cather of Salt Lake City, M. L. Scott of Seattle, and W. J. Thompson of San Francisco, regional vice presidents; Edward J. Fliegle of Stanton, Calif., secretary; and Jack Moss of San Diego, treasurer. New head of the organization is a Chicagoan, George Newman. Edward J. Fliegle is executive director, with headquarters in Los Angeles.

Aluminum Association has named D. A. Rhoades, president of Kaiser Aluminum and Chemical Corp., Oakland, as a director-at-large and John W. Watson, vice president of the Kaiser firm, to serve another term as chairman of the aluminum extruded products division. Elected to head the association at its annual meeting in Cleveland in February was John H. Douglas of Republic Foil, Inc., Danbury, Conn.

Classified Advertising

RATES

Regular Classified: $6 per column inch. **Classified Display** (based upon number of insertions during any 12-month period): 1 time, $9; 6 times, $8; 12 times, $7.

FOR LEASE

Will lease to architect or engineer separate office space in new building with general contractor. Private restroom and entrance. North End.

Call DAVIS CONSTRUCTION
9039 Greenwood
SU 3-5959, Seattle, Washington

ARCHITECT for varied and responsible state position. Bachelor's degree plus three years experience required, registration desirable. Civil service benefits, salary $561-$668 per month. Inquire: Personnel Officer, State Health Department, 1309 Smith Tower, Seattle.

We've a new roof
over our heads . . .
At a new address:

1945 Yale Place E.
Seattle 2

where we have increased facilities to print your company newsletter, brochure, stationery . . . estimates gladly.

PACIFIC PRINTING CO.
EAst 3-7007



THE **ALEXANDER HAMILTON**
San Francisco

a Handlery Hotel

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

Whether national or regional Convention — Association, Club or Business Group

Successful Meetings
begin at a
HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

- SAN FRANCISCO — The Alexander Hamilton, Hotel Stewart, Hotel Don
- FRESNO — Hotel Californian
- SAN DIEGO — The El Cortez Motel, Travelator Motor Hotel, Stardust Motor Hotel, El Cortez Motel
- MONTEREY — Hotel San Carlos
- OAKLAND — Lake Merritt Hotel
- OROVILLE — Oroville Inn
- RICHMOND — Hotel Don
- VALLEJO — Casa de Vallejo Hotel
- BAKERSFIELD — Hotel El Tejon

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

● **W. P. Fuller & Co.** has transferred L. R. Templeton from Idaho where he was manager of the Boise district to Union City, Calif., where he will direct operations of the new northern California glass depot to be opened there in mid-year. The $500,000 depot will warehouse all types of glass products handled by Fuller. Office and warehouse will total 73,000 sq. ft. Templeton's appointment resulted in several auxiliary changes in Idaho. R. Gentry, manager of the Nampa store, has been named Boise district manager and R. E. Lindbloom, manager of a store in Boise, has moved up to Gentry's old post.

● **Pittsburgh-Corning Corp.** has appointed Dwight F. Partell as district manager of the San Francisco office. He formerly was a sales representative in the western sales area.

● **Far Eastern Enterprises** has been formed in Honolulu to market monkeypod laminated wood paneling produced by Asahi Plywood Co. of Japan. President is John W. Driver; secretary, H. C. Patterson; and vice president, Jack M. Philpott. Distribution on the mainland will be through Lane Paskill Corp., Portland lumber merchant.

● **Westinghouse Electric Corp.** has selected Honus W. Hofeditz to be residential sales manager for appliance sales in the Seattle area. He formerly held the title of district contract sales manager. The company has formed a new residential sales department to work with builders.

● **Owens-Corning Fiberglas Corp.** has appointed Kaiser Gypsum Co. as a national distributor for Fiberglas screening in the firm's 14-state marketing area in the West.

● **Dyna-Therm Chemical Corp.**, Culver City, Calif., has acquired the assets and business of Mathews Paint Co., Los Angeles, and will operate it as a division under present management headed by Richard W. Janeway and Wilford J. Merrill.

● **Genie-Air Products** has appointed two wholesale distributors. Southwest Supply Co., San Diego, will handle San Diego and Imperial Counties, Yuma County, Ariz., and Baja California, Mexico. Slakey Brothers Co., Inc., will cover northern California and part of Nevada.

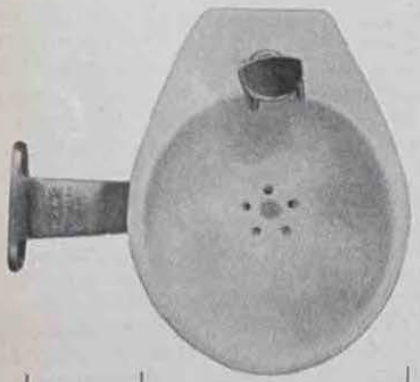
● **Desert Ceramic Corp.**, Albuquerque, N. M., has been acquired by Texstar Corp., San Antonio.

● **Kaiser Aluminum & Chemical Corp.** and **Kawneer Co.** officers have agreed on merger plans that would make Kawneer a division of Kaiser. The plan, as approved by the board of directors, will be submitted to stockholders in the near future. Lawrence J. Plym, president of Kawneer, will continue as head of the division and will also become a member of the Kaiser Aluminum board of directors. The firm manufacturers aluminum architectural products at eight plants, including Richmond, Calif.

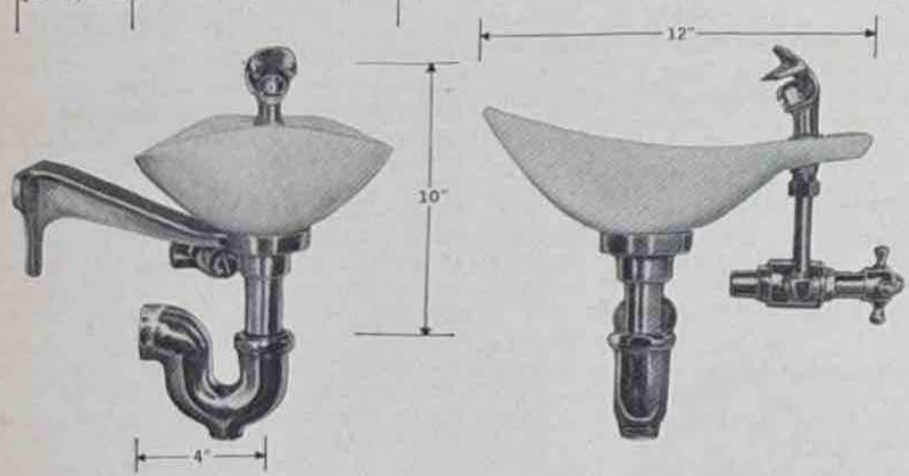
● **Vaughan Interior Walls, Inc.**, held its first conference for licensed contractors in Los Angeles early in February. Attending were representatives of 32 independent contracting firms from the U. S. and Canada, as well as manufacturers and suppliers associated with the gypsum movable wall system, who discussed all aspects of installation, marketing and promotion.

ANOTHER *Haws* PROJECTION OF STYLE

HAWS MODEL 1505



This aristocratic Haws fountain is the *practical* choice of professionals who specify for *economy* as well as beauty. Channing Wallace Gilson designed it. Haws Craftsmen shaped it in gleaming vitreous china. The *Triennale Internazionale* of Milano, Italy, selected it for exhibition as superior international design. That was in 1957. Today, you can get this Haws exclusive in polished aluminum, or with your choice of colors in vitreous china and enameled iron. Wall or pedestal mounted. Specify superior design at a popular price! Write for detailed specifications—today!



Write for our comprehensive catalog! (We're in SWEET'S File, too.)

Since 1909 HAWS **DRINKING FOUNTAINS**

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street • Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California



HOUSE OF FREEDOM

xperimental demonstration project for the lderly is viewed by the nation's most promi-ent citizen of retirement age, Dwight D. isenhower, as C. Henry Bacon Jr., executive ice president of Simpson Timber Co., Seattle, nd president of Douglas Fir Plywood Asso-iation, lifts roof off model. Looking on are /. E. Difford, executive vice president of FPA; Ethel Percy Andrus, president of Ameri-an Association of Retired Persons; and William . Fitch, executive director of AARP, which o-sponsored house with DFPA.

• **U. S. Industries** has established a Hawaii-Pacific division in Honolulu.

• **Marwais Steel Co.** has formed an luminum division and will establish omplete warehousing facilities for luminum mill products used in con-truction at both the Los Angeles and ay area facilities of the company. In harge of the division will be G. Courtney Yager. Marwais handles eynolds Metals Co. products.

• **Provincia Aluminum Structures, nc.,** has moved its main office and lant from San Francisco to Daly City, alif. The firm plans national mar-eting of its modular prefabricated uildings.

• **The Flintkote Co.** has added Rob-rt D. Schmid to its flooring and ad-esive division and will cover eastern Vyoming as part of his territory.

• **The Pacific Lumber Co.** has elected tanwood A. Murphy as president, ucceeding his father, A. S. Murphy, who is now chairman of the board of irectors. The firm also has named Villiam G. Van Beckum as vice presi-ent for research and development nd Edward M. Carpenter as vice resident for operations.

• **The Republic Supply Co. of Cali-ornia** has appointed Thomas P. Pike resident, succeeding John J. Pike. The new president will continue as hairman of the board, a post he has eld since December 1960.

• **Hubb Corp.** has named Sydney nderson to the post of vice president n charge of West Coast operations for the Typhoon Air Conditioning Division. He will supervise operations in California, Arizona and Nevada, working from the factory branch in Los Angeles. Previously he was regional manager in Atlanta, Ga.

ASSOCIATIONS

• **Institute of Heating and Air Conditioning Industries** has elected Arthur Horn of La Puente, Calif., as president. He is sales manager for the heating and air conditioning division of Payne-Day & Night Manufacturing Co.

• **Gypsum Drywall Contractors International** picked five men from the West as officers during its annual convention in Las Vegas in February. They are John Cather of Salt Lake City, M. L. Scott of Seattle, and W. J. Thompson of San Francisco, regional vice presidents; Edward J. Fliegle of Stanton, Calif., secretary; and Jack Moss of San Diego, treasurer. New head of the organization is a Chicagoan, George Newman. Edward J. Fliegle is executive director, with headquarters in Los Angeles.

• **Aluminum Association** has named D. A. Rhoades, president of Kaiser Aluminum and Chemical Corp., Oakland, as a director-at-large and John W. Watson, vice president of the Kaiser firm, to serve another term as chairman of the aluminum extruded products division. Elected to head the association at its annual meeting in Cleveland in February was John H. Douglas of Republic Foil, Inc., Danbury, Conn.

Classified Advertising

RATES

Regular Classified: $6 per column inch. **Classified Display** (based upon number of insertions during any 12-month period): 1 time, $9; 6 times, $8; 12 times, $7.

FOR LEASE

Will lease to architect or engineer separate office space in new building with general contractor. Private restroom and entrance. North End.

Call DAVIS CONSTRUCTION
9039 Greenwood
SU 3-5959, Seattle, Washington

ARCHITECT for varied and responsible state position. Bachelor's degree plus three years experience required, registration desirable. Civil service benefits, salary $561-$668 per month. Inquire: Personnel Officer, State Health Department, 1309 Smith Tower, Seattle.

We've a new roof over our heads . . .

At a new address:

1945 Yale Place E.
Seattle 2

where we have increased facilities to print your company newsletter, brochure, stationery . . . estimates gladly.

PACIFIC PRINTING CO.
EAst 3-7007



Whether national or regional Convention — Association, Club or Business Group

Successful Meetings
begin at a
HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

THE ALEXANDER HAMILTON
San Francisco
a Handlery Hotel

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

- SAN FRANCISCO — The Alexander Hamilton, Hotel Stewart, Hotel Don
- FRESNO — Hotel Californian
- SAN DIEGO — The El Cortez Motel, Travelator Motor Hotel, Stardust Motor Hotel, El Cortez Motel
- MONTEREY — Hotel San Carlos
- OAKLAND — Lake Merritt Hotel
- OROVILLE — Oroville Inn
- RICHMOND — Hotel Don
- VALLEJO — Casa de Vallejo Hotel
- BAKERSFIELD — Hotel El Tejon

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

not specified

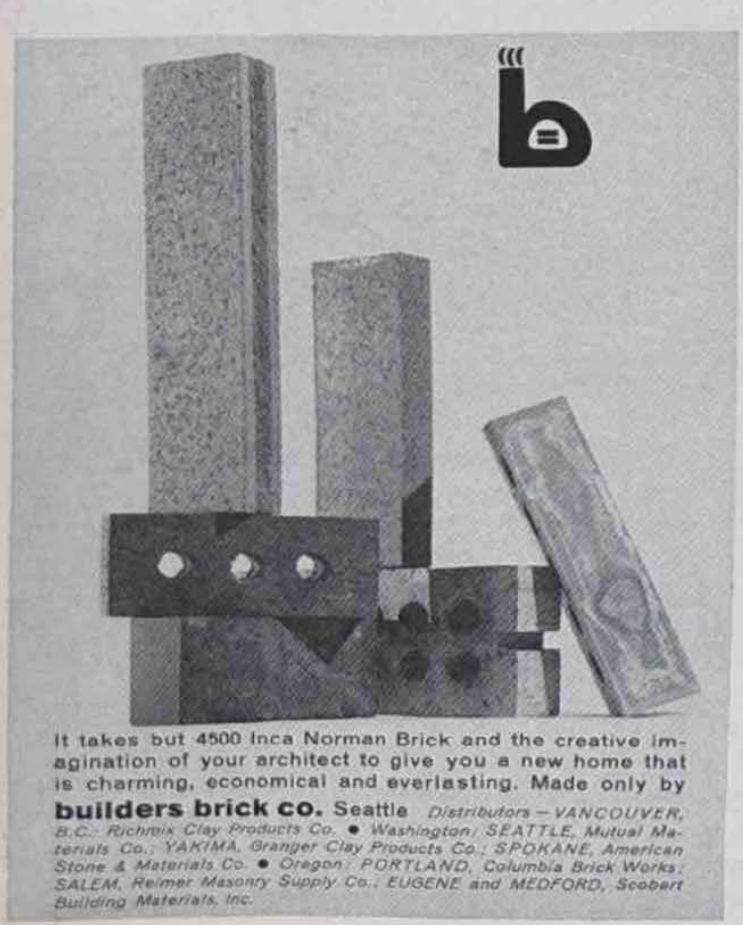
why and wherefore of water

For a city government to sponsor a worldwide $250,000 fountain competition is indeed an extraordinary occurrence (see p. 11 for the results); but significant too is the impact which this event may very well have in giving the fountain its due place in our American heritage. We liked the remarks made by Norman Davis, director of the Century 21 fine arts exhibition, in conjunction with the award announcement. To quote in part:

"Thrilling, inspiring and stimulating as painting and sculpture can be, we still react only in proportion to our knowledge and understanding of what is a special part of our civilized life. The idea of painting for the sake of a picture, of carving for the sake of a statue, is comparatively recent in the history of man. The work is a still life, always still despite every effort to create movement, whether abstract or portrait, whether battle scene or seascape, always frozen, always an illusion.

"But a fountain! A fountain is alive, a moving play of one of the prime forces of nature. The first fire created by man, the first well dug by man, were the basics of life long before the wheel and the plough, the first uses of nature, man's first conquests. And to everyone, young and old alike, the play of water in sunlight, water ascending and descending, the music of water, is a joy, a response to nature we give without thought, fully and freely.

"A fountain springs to heaven. This fountain, ever rising upward freely and beautifully, will fittingly stand at the focal point of our Civic Center, the hub around which the Seattle of the future will revolve." R.E.K.



It takes but 4500 Inca Norman Brick and the creative imagination of your architect to give you a new home that is charming, economical and everlasting. Made only by **builders brick co.** Seattle *Distributors—VANCOUVER, B.C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co. • Oregon: PORTLAND, Columbia Brick Works; SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.*

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13 state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Builders Brick Co.	34
Cast Iron Soil Pipe Foundation	II Cover
Classified Advertising	33
Colorado Fuel & Iron Co.	19
Handlery Hotel	33
Haughton Elevator Company	17
Haws Drinking Faucet Company	32
Inland Steel Products Company	10
Macomber, Inc.	III Cover
Portland Cement Association	28
Rilco Laminated Products, Inc.	IV Cover
Tectum Corporation	15

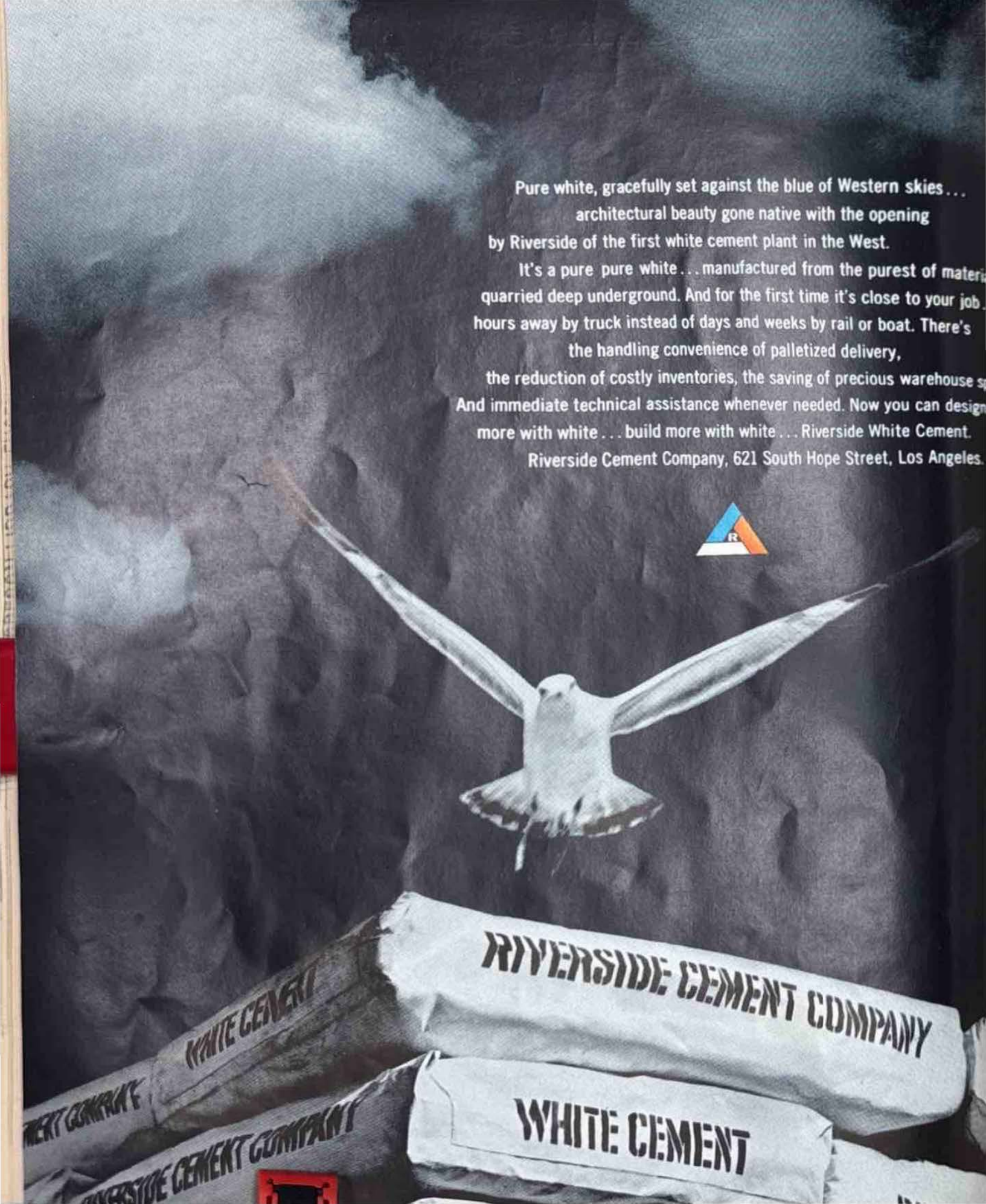
Pacific Architect & Builder

Architecture Library

UNIVERSITY OF OREGON
MAY 5 1961
LIBRARY

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ MAY 1961




Pure white, gracefully set against the blue of Western skies . . .
architectural beauty gone native with the opening
by Riverside of the first white cement plant in the West.
It's a pure pure white . . . manufactured from the purest of materi
quarried deep underground. And for the first time it's close to your job
hours away by truck instead of days and weeks by rail or boat. There's
the handling convenience of palletized delivery,
the reduction of costly inventories, the saving of precious warehouse s
And immediate technical assistance whenever needed. Now you can design
more with white . . . build more with white . . . Riverside White Cement.
Riverside Cement Company, 621 South Hope Street, Los Angeles.
R
RIVERSIDE CEMENT COMPANY
WHITE CEMENT

Pacific Architect & Builder May 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

13 Three Restaurants Designed in Good Taste
13 1. The Galleon Restaurant, Alameda, Calif.: Campbell & Wong, Architects
16 2. Dublin House, Seattle: Terry & Moore—Architects-Interior Decorators — design
18 3. Stuft Shirt Restaurant, Newport Beach, Calif.: Ladd & Kelsey, Architects
22 Project Roundup: Designed for a Society on Wheels
20 Where Architects Hang Their Hats: Knorr & Elliott, San Francisco — special feature
23 A Lively Concrete Neighbor for Whilshire
25 What You Need to Know About Paint—S. O. Jones — methods & materials
27 Hollow Floor System Serves Dual Purpose in Tacoma Bank Project
4 Project Preview
5 Building Permits
8 The Building Month
10 T-Square Talk
28 Products — departments
30 Books
32 Manufacturers/Suppliers
33 Contractors' Corner
34 Not Specified

VOLUME 67, NUMBER 5

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: American Cement Corp. Building, Los Angeles (p. 23)—Daniel, Mann, Johnson & Mendenhall, Architects-Engineers; Jason Hailey photo.

As We Go To Press

. . . Highlights & Sidelights

AN APOLOGY TO MR. ESTES—The publishers of Pacific Architect & Builder have been informed that certain wording in the humorous article "AIED Convention Report," appearing on page 27 of the January 1961 issue, might be misconstrued as injurious to Hiawatha Estes. There certainly was no intent to make light of any real person but only to poke fun at some of the more stuffy aspects of the all-too-typical professional convention. The author, Donald J. Bergsma, and Pacific Architect & Builder wish to apologize to Hiawatha Estes for the unfortunate play on words involving his name. No slight was intended.

THE WRIGHT THING—A $100,000 house, designed by Frank Lloyd Wright at 5808 San Miguel Drive N., has been donated to the Phoenix Art Museum, which will use it presently as a director's and guest house. Donor is Mrs. Lucius Beebe, widow of the builder of New York's Waldorf Astoria Hotel.

BUILDERS BLASTED, ARCHITECTS ASSAILED—In his typical outspoken manner, San Francisco architect Henry Hill went across the Bay to Oakland to tell 300 conferees of the Western Regional Conference that builders are constructing monstrosities of the future, but they do not do so deliberately. And they do "a better job than the incompetent architect could do." As far as Hill is concerned, only 200 of the nation's 22,000 architects are competent.

BUILDING PERMITS

Quarterly volume makes 4% gain over '60

First-quarter figures for building permits in the 13 western states show a slight pickup, 4%, over the January-through-March total for 1960. In terms of dollar volume, some 500 individual permit agencies report $1,362,032,061 for the first quarter, an increase of $53.9 million, fairly widespread throughout the area. As the table below indicates, only four state totals are below quarterly figures for last year, the largest Hawaii which has dropped $7.5 million. Nine state totals show increases for the period, led by Colorado with a $23.3 million rise in building activity.

At the same time, number of building starts has dropped by 7,069. The picture here is so varied as to be almost meaningless with six states falling behind last year in number of building starts and seven states ahead of 1960 figures. The chart reveals that Nevada has the biggest gain with a 472 increase. California shows the largest decerase with a drop of 4,232.

Residential construction is lagging behind other building starts. The three-month total for housing is $694,563,274, a decrease of $5.1 million from the 1960 figure. And number of new residential units started is down by 2,783. However, five states do show increases in residential construction, led by Colorado with a $12.5 million gain and a 1,353 jump in number of units. Largest drop is in California, down $17.9 million with 3,756 fewer units begun.

After two good months in January and February, building activity reveals a slowdown in March. Dollar volume totals $526,716,339, a drop of $35.6 million from the same month last year plus a decrease of 8,398 in number of permits issued. Six states show increases for the month and seven show decreases. Those with higher dollar volume compared to March 1960, with amounts of increase, are Colorado, $8.6 million; Nevada, $3.9 million; Washington, $5.3 million; Alaska, $2.5 million; Utah, $802,000; and Montana, $690,000. Those with lower dollar volume, with amounts of decrease, are California, $34.5 million; Arizona, $9.5 million; Hawaii, $8.5 million; Oregon, $2.8 million; Idaho, $1.6 million; Wyoming, $401,000;

continued on page 9

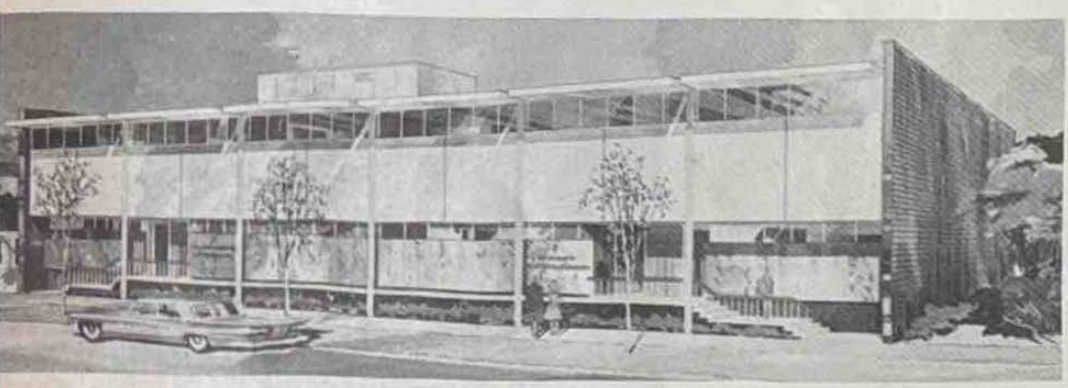
FIRST-QUARTER COMPARATIVE TOTALS FOR 13 WESTERN STATES

1961 Residential Only	1960 Residential Only	1961 Res. Units	1960 Res. Units	1961 Total $ Volume	1960 Total $ Volume	1961 No. Permits	1960 No. Permits
$484,594,860	$502,504,300	41,667	45,423	$922,067,054	$914,660,149	107,239	111,471
21,253,129	22,375,195	1,688	1,728	45,365,270	50,665,157	5,616	5,471
39,070,493	39,865,454	2,751	2,832	97,557,430	87,694,300	9,838	9,839
72,330	152,546	4	7	3,012,974	395,430	139	139
2,099,973	2,654,282	175	203	6,405,628	6,913,930	1,189	1,120
4,734,341	3,283,047	419	285	6,969,091	5,357,009	813	682
2,160,750	3,680,700	152	276	4,558,718	5,666,363	478	600
43,347,642	30,767,956	4,456	3,103	78,969,248	55,617,194	15,521	18,419
13,529,740	13,013,959	1,203	1,112	27,153,633	22,651,437	2,241	2,142
15,772,490	10,508,912	1,381	907	28,583,508	20,331,254	2,705	2,233
41,671,127	40,553,399	4,571	4,790	81,125,446	71,731,201	10,876	10,525
10,583,794	12,739,384	1,022	1,160	22,440,342	21,108,467	4,419	4,936
15,672,605	17,616,215	1,402	1,848	37,823,719	45,328,372	3,567	4,133
$694,563,274	**$699,715,349**	**60,891**	**63,674**	**$1,362,032,061**	**$1,308,120,263**	**164,641**	**171,710**



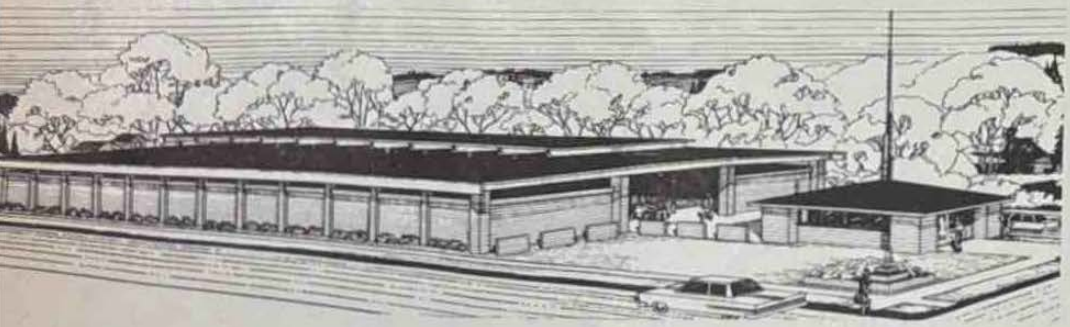
MOTEL AND RESTAURANT

will replace existing buildings on Seattle's Pier 67 at foot of Wall Street. Extending almost 500 ft. out over Elliott Bay, $1.8 million project will be sited on reinforced concrete piling and deck. Motel will contain 105 units, each with outside apartment for view of Puget Sound and Olympic Mountains. Second-story restaurant will occupy circular outer end of pier, with dining room seating 150; banquet room seating 175 and three smaller rooms. Architects-engineers: John Graham & Co.



OFFICE BUILDING

for Pardee Construction Co. in Los Angeles will be two-story, 16,000-sq. ft. structure resting on 2-ft. high podium and faced with gold colored travertine. Mullions and all exposed metal trim will be gold anodized aluminum. Stepped concrete block wall will enclose parking area. One-story executive wing at rear of building will house offices of three Pardee brothers. Estimated cost is $500,000. Architects: John C. Lindsay Associates, Inc.



WAREHOUSE AND OFFICE

will be built in three stages for Reimer Masonry and Supply Co. in Salem, Ore. Project will consist of concrete floors, concrete block walls and pilasters and glued-laminated roof beams. Architect: J. Warren Carkin.



GENERAL OFFICES

of Los Angeles' Department of Water and Power will cover four city blocks and form western terminus of Civic Center mall, making it one of the largest structures of its kind in world and costing $26.7 million. Two lower levels, surrounded on three sides by parking garage and surmounted by reflecting pool, will serve as podium for 15-story glass tower, shaded by projecting canopies. Tower itself will be of steel with exposed vertical members, fireproofed in concrete and finished in olive-black granite veneer. Architects-engineers: Albert C. Martin & Associates; consulting architects: Ladd & Kelsey.

As We Go To Press

. . . Highlights & Sidelights

AN APOLOGY TO MR. ESTES—The publishers of Pacific Architect & Builder have been informed that certain wording in the humorous article "AIED Convention Report," appearing on page 27 of the January 1961 issue, might be misconstrued as injurious to Hiawatha Estes. There certainly was no intent to make light of any real person but only to poke fun at some of the more stuffy aspects of the all-too-typical professional convention. The author, Donald J. Bergsma, and Pacific Architect & Builder wish to apologize to Hiawatha Estes for the unfortunate play on words involving his name. No slight was intended.

THE WRIGHT THING—A $100,000 house, designed by Frank Lloyd Wright at 5808 San Miguel Drive N., has been donated to the Phoenix Art Museum, which will use it presently as a director's and guest house. Donor is Mrs. Lucius Boomer, widow of the builder of New York's Waldorf Astoria Hotel.

BUILDERS BLASTED, ARCHITECTS ASSAILED—In his typical outspoken manner, San Francisco architect Henry Hill went across the Bay to Oakland to tell 300 conferees of the Western Rental Conference that builders are constructing the slums of the future, but they do not do so deliberately. And they do "a better job than the incompetent architect could do." As far as Hill is concerned, only 200 of the nation's 22,000 architects are competent.

BUILDING PERMITS

Quarterly volume makes 4% gain over '60

First-quarter figures for building permits in the 13 western states show a slight pickup, 4%, over the January-through-March total for 1960. In terms of dollar volume, some 500 individual permit agencies report $1,362,032,061 for the first quarter, an increase of $53.9 million, fairly widespread throughout the area. As the table below indicates, only four state totals are below quarterly figures for last year, the largest Hawaii which has dropped $7.5 million. Nine state totals show increases for the period, led by Colorado with a $23.3 million rise in building activity.

At the same time, number of building starts has dropped by 7,069. The picture here is so varied as to be almost meaningless with six states falling behind last year in number of building starts and seven states ahead of 1960 figures. The chart reveals that Nevada has the biggest gain with a 472 increase. California shows the largest decerase with a drop of 4,232.

Residential construction is lagging behind other building starts. The three-month total for housing is $694,563,274, a decrease of $5.1 million from the 1960 figure. And number of new residential units started is down by 2,783. However, five states do show increases in residential construction, led by Colorado with a $12.5 million gain and a 1,353 jump in number of units. Largest drop is in California, down $17.9 million with 3,756 fewer units begun.

After two good months in January and February, building activity reveals a slowdown in March. Dollar volume totals $526,716,339, a drop of $35.6 million from the same month last year plus a decrease of 8,398 in number of permits issued. Six states show increases for the month and seven show decreases. Those with higher dollar volume compared to March 1960, with amounts of increase, are Colorado, $8.6 million; Nevada, $3.9 million; Washington, $5.3 million; Alaska, $2.5 million; Utah, $802,000; and Montana, $690,000. Those with lower dollar volume, with amounts of decrease, are California, $34.5 million; Arizona, $9.5 million; Hawaii, $8.5 million; Oregon, $2.8 million; Idaho, $1.6 million; Wyoming, $401,000;

continued on page 9

FIRST-QUARTER COMPARATIVE TOTALS FOR 13 WESTERN STATES

State	1961 Residential Only	1960 Residential Only	1961 Res. Units	1960 Res. Units	1961 Total $ Volume	1960 Total $ Volume	1961 No. Permits	1960 No. Permits
California	$484,594,860	$502,504,300	41,667	45,423	$922,067,054	$914,660,149	107,239	111,471
Oregon	21,253,129	22,375,195	1,688	1,728	45,365,270	50,665,157	5,616	5,471
Washington	39,070,493	39,865,454	2,751	2,832	97,557,430	87,694,300	9,838	9,839
Alaska	72,330	152,546	4	7	3,012,974	395,430	139	139
Idaho	2,099,973	2,654,282	175	203	6,405,628	6,913,930	1,189	1,120
Montana	4,734,341	3,283,047	419	285	6,969,091	5,357,009	813	682
Wyoming	2,160,750	3,680,700	152	276	4,558,718	5,666,363	478	600
Colorado	43,347,642	30,767,956	4,456	3,103	78,969,248	55,617,194	15,521	18,419
Utah	13,529,740	13,013,959	1,203	1,112	27,153,633	22,651,437	2,241	2,142
Nevada	15,772,490	10,508,912	1,381	907	28,583,508	20,331,254	2,705	2,233
Arizona	41,671,127	40,553,399	4,571	4,790	81,125,446	71,731,201	10,876	10,525
New Mexico	10,583,794	12,739,384	1,022	1,160	22,440,342	21,108,467	4,419	4,936
Hawaii	15,672,605	17,616,215	1,402	1,848	37,823,719	45,328,372	3,567	4,133
Total	$694,563,274	$699,715,349	60,891	63,674	$1,362,032,061	$1,308,120,263	164,641	171,710

Building Permit Totals fo

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dolla

CALIFORNIA	Res.	$ Value	Total $
Alameda	(117)	$ 723,381	$ 832,437
Alameda Co.	(74)	783,700	2,708,619
Albany	(8)	51,233	103,343
Alhambra	(3)	30,400	171,399
Anaheim	(238)	1,688,000	5,873,939
Antioch	(17)	120,510	345,472
Arcadia	(34)	496,390	979,289
Arroyo Grande	(8)	93,000	397,000
Artesia	(11)	112,600	185,460
Atherton	(3)	174,500	258,083
Atwater	(8)	30,000	161,000
Auburn	(4)	42,804	73,170
Avalon		Nil	14,200
Azusa	(20)	159,300	234,855
Bakersfield	(112)	1,207,846	1,716,071
Baldwin Park	(83)	999,350	1,092,845
Banning	(15)	174,514	229,380
Barstow	(1)	8,450	45,081
Bell	(19)	116,500	140,490
Bellflower	(12)	146,300	294,285
Belmont	(80)	1,076,000	1,351,080
Benicia		Nil	22,163
Berkeley	(6)	117,000	1,142,458
Beverly Hills	(249)	4,741,000	17,459,243
Bradbury		Nil	10,675
Brawley	(2)	21,000	78,800
Brea	(2)	48,244	70,055
Buena Park	(10)	87,915	900,265
Burbank	(38)	272,000	1,840,062
Burlingame	(4)	85,000	2,327,183
Butte Co.		Nil	809,700
Calexico	(6)	146,700	164,150
Campbell	(78)	640,900	803,476
Carlsbad	(2)	26,500	89,500
Carmel	(1)	19,000	349,600
Chico	(7)	121,804	2,672,856
Chino		Nil	69,660
Chula Vista	(110)	474,000	681,298
Claremont	(132)	821,600	990,075
Coalinga	(1)	9,000	50,750
Colton	(2)	22,036	35,617
Commerce		Nil	383,270
Compton	(28)	173,200	481,977
Concord	(91)	1,026,498	1,297,031
Cntra Csta Co.	(176)	2,508,904	3,688,692
Corona	(5)	66,220	115,415
Coronada		No Reply	No Reply
Corte Madera	(10)	165,780	950,488
Costa Mesa	(291)	3,908,342	4,173,271
Covina	(36)	329,050	417,145
Cudahy	(48)	381,800	401,180
Culver City	(9)	126,000	616,308
Dairy Valley	(2)	34,800	47,800
Daly City	(11)	123,210	204,322
Davis	(36)	390,000	391,390
Delano	(25)	251,836	271,011
Downey	(47)	373,370	1,201,890
Duarte		Nil	68,769
El Cajon	(6)	110,600	1,040,400
El Centro	(6)	64,000	130,815
El Cerrito	(19)	249,420	327,926
El Dorado Co.	(48)	493,929	1,057,392
El Monte	(13)	73,100	168,352
El Segundo	(28)	141,000	724,717
Emeryville	(1)	6,000	64,820
Escondido	(1)	17,042	261,927
Eureka	(7)	97,737	404,147
Fairfield	(52)	671,432	723,917
Fillmore		Nil	42,888
Fontana	(7)	98,149	172,698
Fremont	(164)	2,165,886	2,723,551
Fresno	(170)	1,744,197	3,204,887
Fresno Co.	(92)	881,262	1,326,496
Fullerton	(82)	1,753,843	4,144,920
Glendale	(58)	7,394,546	1,442,469
Glendora	(30)	503,700	572,800
Half Moon Bay	(3)	37,500	39,500
Hanford	(40)	542,470	1,098,106
Hawthorne	(167)	833,760	1,474,173
Hayward	(71)	453,725	721,510
Hemet	(10)	70,000	202,208
Hrmsa Beach	(15)	188,626	230,685
Hillsborough	(8)	361,000	421,100
Holtville	(1)	11,700	14,950
Humboldt Co.*			165,905
Hntngtn Bch.*		2,247,708	2,755,143
Hntngtn Prk.	(17)	104,940	158,235
Imperial Co.		Nil	166,500
Indio	(3)	21,385	74,662
Industry		Nil	75,700
Inglewood	(103)	868,376	1,505,014
Irwindale	(2)	34,200	46,360
Kern Co.	(171)	1,899,702	2,766,100
Laguna Beach	(12)	286,500	394,020
La Habra	(135)	2,013,324	2,244,295
Lakewood	(3)	86,000	282,100
La Mesa	(8)	155,150	455,289
La Mirada	(2)	47,000	98,400
La Puente	(36)	387,700	685,450
La Verne	(2)	29,500	49,450
Lawndale	(34)	251,800	344,525
Lindsay		Nil	41,700
Livermore	(9)	149,329	482,597
Lodi	(28)	299,600	375,500
Lompoc	(2)	18,120	70,020
Long Beach	(236)	2,150,290	6,312,455
Los Altos*	(87)	1,235,932	1,863,892
Los Angeles	(793)	14,413,561	47,468,779
Los Ang. Co.	(1217)	13,698,880	20,390,154
Los Gatos	(15)	264,000	560,740
Lynwood	(48)	323,000	648,870
Madera	(4)	33,750	47,835
Madera Co.	(14)	121,000	244,250
Manhttn. Bch.	(16)	328,834	525,162
Manteca	(8)	88,600	122,840
Marin Co.	(101)	1,227,556	1,388,656
Martinez	(7)	77,259	104,926
Marysville		Nil	142,533
Maywood	(10)	58,000	91,600
Menlo Park	(73)	675,000	776,805
Merced	(66)	413,331	489,190
Merced Co.	(84)	869,950	1,149,952
Millbrae	(13)	251,500	291,900
Mill Valley	(9)	206,000	258,917
Mirada Hills		No Reply	No Reply
Modesto	(63)	907,400	1,234,703
Monrovia	(13)	167,448	338,627
Montclair	(28)	392,740	644,690
Montebello	(16)	185,965	352,069
Monterey	(8)	130,000	496,875
Monterey Co.	(79)	856,280	1,161,005
Monterey Park	(18)	226,540	366,895
Mountain Vw.*		686,840	817,185
Napa	(27)	335,760	461,360
Napa Co.	(18)	226,822	384,687
National City	(17)	139,072	246,755
Newport Bch.	(53)	1,028,814	1,502,427
Nrth Scrmnto.	(14)	126,400	174,262
Norwalk	(70)	470,200	683,350
Novato	(17)	311,300	472,533
Oakdale	(2)	30,367	49,628
Oakland	(279)	2,218,969	5,645,041
Oceanside	(55)	648,000	877,624
Ojai	(78)	980,688	1,038,688
Ontario	(28)	195,786	589,162
Orange	(168)	2,274,226	2,530,784
Orange Co.	(393)	5,231,506	5,844,017
Oroville	(6)	68,902	158,429
Oxnard	(165)	1,843,900	2,274,174
Pacifica	(10)	219,170	246,845
Pacific Grove	(12)	127,500	152,300
Palm Springs	(29)	344,000	514,533
Palo Alto	(101)	1,228,500	2,390,383
Pals. Vrds. Es.	(11)	445,475	555,800
Paramount	(36)	281,700	389,990
Pasadena	(68)	641,368	1,586,309
Paso Robles	(26)	85,000	121,500
Pico Rivera	(15)	207,000	678,045
Piedmont	(1)	20,000	43,553
Pinole		No Reply	No Reply
Pittsburg	(4)	62,466	115,968
Placentia	(1)	53,000	96,620
Placer Co.	(61)	687,296	840,149
Pleasanton	(3)	47,100	59,469
Pomona	(84)	1,005,910	1,414,898
Porterville	(2)	13,650	45,740
Port Hueneme	(66)	858,000	878,660
Red Bluff		Nil	260,725
Redding		No Reply	No Reply
Redlands	(8)	103,500	364,582
Redondo Bch.	(17)	172,006	3,169,032
Redwood Cty.	(74)	549,000	813,738
Richmond	(110)	986,443	1,602,227
Riverside	(11)	121,000	1,623,429
Riverside Co.	(135)	1,626,881	2,826,884
Rolling Hills	(4)	111,200	116,180
Rollg. Hlls. Es.	(1)	34,800	345,150
Rosemead	(5)	43,400	282,109
Roseville	(5)	56,626	131,263
Sacramento	(208)	1,710,500	2,908,275
Sacrmnto. Co.	(416)	4,883,801	8,141,463
St. Helena		Nil	3,000
Salinas	(27)	367,500	598,281
San Brnrdno.	(111)	1,325,949	2,372,581
Sn. Brdno. Co.	(370)	2,981,111	6,601,691
San Bruno	(11)	166,825	471,428
San Carlos	(82)	820,000	1,165,615
San Clemente	(25)	234,825	260,50
San Diego	(466)	5,142,430	9,369,62
San Diego Co.	(210)	3,767,000	6,261,82
San Dimas	(62)	660,160	708,87
San Fernando	(6)	54,200	69,02
San Francisco	(269)	2,809,090	10,833,04
San Gabriel	(42)	292,460	596,58
Sanger	(4)	48,700	60,09
San Jacinto	(5)	43,100	63,87
Sn. Joqun. Co.	(52)	519,413	920,53
San Jose	(622)	5,909,900	9,636,62
San Leandro	(17)	262,572	871,64
S. Luis Obispo	(6)	92,200	211,25
S. L. Obsp. Co.	(41)	471,485	929,81
San Marino	(1)	32,000	119,00
San Mateo	(126)	921,495	2,484,61
San Mateo Co.	(53)	887,000	2,354,28
San Pablo	(20)	161,982	186,43
San Rafael	(62)	684,870	1,807,80
Santa Ana	(288)	2,699,370	3,689,90
Santa Barbara	(43)	719,000	942,83
Snta. Brbr. Co.	(242)	3,592,800	4,571,80
Santa Clara	(70)	608,800	1,174,72
Santa Clr. Co.	(78)	1,554,000	2,291,18
Santa Cruz	(33)	390,659	489,62
Santa Crz. Co.	(81)	881,677	2,911,90
Santa Fe Spgs.	(1)	13,500	1,835,29
Santa Maria	(54)	757,758	968,37
Santa Monica	(111)	1,016,100	1,225,90
Santa Paula	(69)	769,651	1,127,30
Santa Rosa	(36)	451,450	871,22
Sausalito	(20)	255,500	282,11
Seal Beach	(13)	164,447	177,69
Seaside	(30)	243,580	571,27
Selma	(3)	46,680	105,88
Shasta Co.	(7)	84,850	109,75
Sierra Madre	(13)	208,100	236,90
Solano Co.	(7)	85,845	141,69
Sonoma Co.	(95)	808,979	1,191,85
South Gate	(54)	343,340	545,30
South El Monte	(4)	25,000	256,59
South Pasadn.	(19)	175,330	246,91
S. Sn. Frnsco.	(11)	118,850	648,14
Stanislaus Co.	(33)	389,268	1,037,30
Stockton	(67)	659,544	1,674,56
Sunnyvale	(256)	2,729,515	3,147,83
Temple City	(7)	95,000	191,11
Torrance	(144)	1,448,700	2,720,80
Tracy		Nil	145,63
Tulare	(4)	50,642	270,72
Tulare Co.	(79)	491,961	737,49
Turlock	(4)	56,606	85,34
Ukiah	(1)	17,500	71,47
Upland	(28	497,950	584,70
Vacaville	(6)	75,775	87,20
Vallejo	(15)	171,800	335,91
Ventura	(134)	1,542,400	1,969,94
Ventura Co.	(393)	4,467,850	4,960,19
Visalia	(16)	221,555	298,27
Walnut		Nil	2,60
Walnut Creek	(12)	134,200	236,09
Wasco		Nil	74,60
Watsonville		Nil	62,54
West Covina	(13)	229,781	2,888,24
Whittier	(32)	323,000	649,90
Woodland	(14)	168,080	638,14
Woodside	(1)	45,000	83,26
Yolo Co.	(16)	178,839	405,36
Yreka	(6)	99,200	109,29
Yuba City	(9)	96,050	331,98
Yuba Co.	(25)	205,580	3,143,21
TOTAL	**(15,325)**	**$178,895,374**	**$348,896,17**

OREGON	Res.	$ Value	Total $
Albany	(5)	$ 44,000	$ 52,82
Ashland	(4)	55,500	73,60
Astoria		Nil	5,96
Baker	(5)	66,500	146,92
Beaverton	(14)	254,846	278,76
Bend	(2)	20,000	47,20
Central Point	(5)	49,000	71,11
Clackamas Co.	(38)	514,225	619,82
Coos Bay	(1)	21,000	201,13
Corvallis	(10)	119,000	224,53
Dallas		Nil	10,38
Douglas Co.	(23)	228,903	240,61
Eugene	(24)	240,250	885,34
Forest Grove	(6)	76,500	177,73
Grants Pass	(12)	235,000	288,95
Gresham	(2)	23,000	62,60
Hermiston	(4)	61,970	75,37

*Breakdown not available

Western States for March

sidential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

Hillsboro	(8)	116,000	205,855
Hood River	(1)	9,000	22,620
Klamath Falls	(3)	49,000	181,440
La Grande	(3)	34,785	48,261
Lane Co.	(71)	761,325	994,614
Lebanon	(1)	20,000	23,950
Marion Co.	(50)	581,150	703,525
McMinnville	(12)	119,500	165,475
Medford	(10)	148,500	376,883
Milton-Frwtr.	(1)	5,000	17,050
Multnomah Co.	(129)	1,863,885	3,511,581
Newberg	(6)	42,000	88,950
Newport	(3)	28,810	40,530
North Bend	(5)	74,360	133,067
Ontario	(9)	78,600	142,950
Oregon City	(2)	19,500	44,800
Oswego	(16)	293,295	301,025
Pendleton	(13)	186,000	304,571
Portland	(117)	1,194,650	4,098,785
Prineville	(1)	15,000	16,700
Roseburg	(7)	66,484	96,542
St. Helens	(2)	24,440	25,090
Salem	(16)	193,390	262,225
Seaside	(2)	65,700	341,550
Springfield	(5)	46,704	164,443
The Dalles	(2)	21,000	182,765
Washingtn. Co.	(60)	1,078,495	2,291,903
TOTAL	**(710)**	**$ 9,146,267**	**$ 18,152,003**

WASHINGTON	Res.	$ Value	Total $
Aberdeen	(1)	$ 15,600	$ 335,365
Anacortes	(2)	27,200	40,553
Auburn	(12)	140,000	152,350
Bellevue	(5)	143,800	365,100
Bellingham	(4)	64,000	283,687
Bremerton		Nil	95,065
Camas		Nil	6,401
Centralia	(1)	6,000	47,744
Chehalis		No Reply	No Reply
Clark Co.	(47)	632,800	747,973
Clarkston		Nil	13,515
Ellensburg	(4)	45,000	85,770
Drumclaw	(4)	32,500	61,500
Ephrata		Nil	10,180
Everett	(19)	248,651	809,199
Grys. Hrbr. Co.	(7)	76,800	90,525
Hoquiam		Nil	161,977
Island Co.	(9)	78,950	127,755
Kelso	(2)	24,000	53,588
Kennewick	(41)	322,200	393,270
Kent	(6)	99,500	171,582
King Co.	(339)	5,469,945	7,220,630
Kirkland	(19)	104,600	138,825
Longview	(11)	172,650	353,697
Mercer Island	(17)	383,000	416,750
Montesano		No Reply	No Reply
Moses Lake	(2)	30,950	299,633
Olympia	(5)	59,000	86,383
Pasco	(6)	65,600	187,831
Pierce Co.	(217)	2,335,620	3,199,186
Port Angeles	(3)	28,500	193,600
Port Orchard		Nil	Nil
Pullman	(10)	141,010	153,960
Puyallup	(6)	75,000	199,825
Renton	(12)	155,200	357,296
Seattle	(85)	1,523,850	18,598,604
Shelton	(3)	38,500	42,600
Spokane	(47)	651,240	1,619,306
Spokane Co.	(51)	848,160	1,475,955
Sunnyside		Nil	5,450
Tacoma	(91)	1,108,400	2,202,863
Vancouver	(20)	274,750	666,027
Walla Walla	(20)	309,000	1,015,262
Walla Walla Co.	(10)	125,400	142,060
Wenatchee	(4)	61,500	762,882
Yakima	(24)	273,000	849,680
TOTAL	**(1,166)**	**$ 16,191,876**	**$ 44,223,304**

ALASKA	Res.	$ Value	Total $
Anchorage	(3)	$ 52,976	$ 2,659,576
Fairbanks		Nil	7,300
Juneau		Nil	30,500
Ketchikan		Nil	14,200
Sitka		No Reply	No Reply
TOTAL	**(3)**	**$ 52,976**	**$ 2,704,276**

IDAHO	Res.	$ Value	Total $
Alameda	(10)	$ 108,200	$ 152,275
Blackfoot		No Reply	No Reply
Boise	(10)	142,494	414,000
Caldwell	(9)	79,500	117,460
Coeur d'Alne	(1)	11,300	121,967
Idaho Falls	(9)	131,213	290,661
Jerome		Nil	321,300
Lewiston	(1)	15,000	51,930
Moscow	(2)	41,000	411,024
Nampa	(9)	86,500	172,635
Payette		Nil	144,200
Pocatello	(6)	103,527	131,313
Sandpoint	(2)	26,000	28,500
St. Maries		Nil	24,000
Twin Falls	(9)	90,000	272,000
TOTAL	**(68)**	**$ 834,736**	**$ 2,653,265**

MONTANA	Res.	$ Value	Total $
Anaconda		Nil	Nil
Billings	(45)	$ 680,500	$ 987,701
Bozeman		Nil	47,700
Butte	(5)	25,650	25,650
Cut Bank	(2)	15,700	23,900
Glasgow	(2)	30,000	72,400
Glendive	(3)	49,000	53,325
Great Falls	(77)	681,649	1,064,704
Havre	(5)	55,000	162,990
Helena	(15)	219,000	288,737
Kalispell	(3)	43,000	54,900
Lewistown	(5)	51,000	50,500
Livingston	(1)	4,000	3,550
Malta	(3)	28,500	28,500
Miles City	(3)	42,000	316,622
Missoula	(6)	91,800	170,591
TOTAL	**(175)**	**$ 2,016,799**	**$ 3,360,770**

WYOMING	Res.	$ Value	Total $
Casper	(18)	$ 238,000	$ 1,000,301
Cheyenne	(54)	585,500	778,447
Cody	(2)	23,000	25,000
Laramie	(1)	20,000	40,469
Rawlins	(1)	7,000	14,233
Riverton*		20,000	210,500
Rock Springs	(3)	39,000	53,000
Sheridan	(6)	72,000	98,957
TOTAL	**(85)**	**$ 1,001,500**	**$ 2,220,907**

COLORADO	Res.	$ Value	Total $
Adams Co.	(235)	$ 3,086,000	$ 3,970,825
Alamosa	(1)	12,000	36,778
Arapahoe Co.	(103)	1,804,180	2,076,846
Arvada	(209)	2,593,000	3,075,600
Aspen		No Reply	No Reply
Aurora	(218)	1,702,150	2,549,914
Boulder	(74)	806,643	909,137
Boulder Co.	(47)	508,500	590,551
Canon City		No Reply	No Reply
Colorado Spgs.	(36)	550,100	1,221,192
Cortez	(2)	31,000	67,960
Denver	(439)	2,703,258	7,278,489
Durango	(2)	20,000	40,480
El Paso Co.	(23)	434,225	882,713
Englewood	(16)	153,000	603,815
Estes Park	(10)	35,000	40,800
Fort Collins	(13)	174,000	209,321
Fort Morgan	(1)	14,462	19,473
Golden	(3)	32,360	168,719
Grand Junction	(2)	38,000	122,565
Greeley	(88)	667,000	1,074,198
Jefferson Co.	(389)	3,575,608	4,443,156
La Junta	(1)	12,600	17,895
Lamar		Nil	17,000
Littleton	(59)	532,100	759,490
Longmont	(13)	146,200	249,649
Loveland	(13)	205,000	229,525
Monte Vista	(1)	2,100	8,000
Montrose	(2)	30,258	382,424
Pueblo	(47)	509,702	703,326
Pueblo Co.	(12)	93,500	161,090
Sterling	(2)	13,000	29,900
Trinidad		Nil	12,195
Walsenburg		Nil	1,000
Westminster	(21)	198,453	267,944
TOTAL	**(2,082)**	**$ 20,683,399**	**$ 32,221,161**

UTAH	Res.	$ Value	Total $
American Fork	(3)	$ 30,000	$ 54,150
Bountiful	(9)	141,400	245,350
Brigham City	(34)	440,600	550,222
Cedar City		Nil	181,090
Clearfield	(4)	55,000	61,700
Davis Co.	(20)	225,308	250,220
Kaysville	(4)	29,440	31,040
Layton	(40)	525,000	538,550
Logan	(10)	161,100	944,864
Murray	(9)	86,500	111,525
Ogden	(25)	410,000	587,500
Orem	(23)	279,055	546,815
Price		Nil	3,000
Provo	(28)	325,000	529,850
Salt Lake City	(141)	139,400	3,240,632
Salt Lake Co.	(201)	2,213,500	2,745,655
South Salt Lake City	(2)	51,500	186,464
Spanish Fork	(4)	40,500	47,550
Tooele	(4)	54,720	165,511
Utah Co.	(10)	113,630	144,970
Weber Co.	(8)	99,000	218,600
TOTAL	**(579)**	**$ 6,420,553**	**$ 11,385,258**

NEVADA	Res.	$ Value	Total $
Boulder City		$ Nil	1,882
Clark Co.	(155)	2,133,849	2,854,383
Elko	(1)	20,150	321,800
Las Vegas	(357)	3,679,596	5,852,685
North Las Vegas	(2)	19,239	62,710
Reno	(40)	695,100	1,469,082
Sparks	(37)	432,600	646,713
Washoe Co.	(22)	337,437	408,542
TOTAL	**(614)**	**$ 7,317,971**	**$ 11,617,797**

ARIZONA	Res.	$ Value	Total $
Buckeye	(1)	$ 17,000	$ 45,533
Casa Grande	(5)	20,000	26,800
Chandler	(15)	165,000	180,000
Douglas	(1)	2,000	16,657
Flagstaff	(38)	203,819	594,025
Florence	(1)	13,600	13,600
Glendale	(18)	102,600	366,239
Maricopa Co.	(715)	6,743,718	8,566,820
Mesa	(79)	689,560	2,220,942
Miami		No Reply	No Reply
Phoenix	(535)	3,877,242	8,821,570
Pima Co.	(172)	1,759,450	2,584,572
Prescott	(6)	56,200	87,045
Scottsdale	(65)	746,325	746,325
Tempe	(72)	719,100	1,013,797
Tuscon	(123)	1,587,780	3,491,025
Wickenburg		Nil	9,925
Winslow	(24)	172,850	195,850
Yuma	(21)	135,000	159,650
TOTAL	**(1,891)**	**$ 17,011,244**	**$ 29,140,375**

NEW MEXICO	Res.	$ Value	Total $
Alamogordo	(1)	$ 7,000	$ 31,578
Albuquerque	(141)	1,883,850	5,194,225
Artesia		No Reply	No Reply
Carlsbad	(20)	256,500	499,850
Clovis	(41)	359,048	359,048
Deming		No Reply	No Reply
Farmington	(3)	26,559	84,577
Gallup	(6)	97,945	125,660
Hobbs	(6)	69,700	246,900
Las Cruces	(15)	160,000	214,000
Las Vegas	(3)	25,400	46,265
Lovington	(16)	164,000	164,000
Raton		Nil	35,200
Roswell	(70)	603,000	741,700
Santa Fe	(60)	335,175	335,175
Silver		Nil	Nil
Truth or Consequences	(1)	10,000	58,950
Tucumcari		Nil	48,100
Tularosa		No Reply	No Reply
TOTAL	**(383)**	**$ 3,998,177**	**$ 8,186,128**

HAWAII	Res.	$ Value	Total $
Hawaii Co.	(30)	$ 344,418	$ 593,798
Honolulu	(214)	3,066,246	10,801,172
Maui Co.	(26)	284,288	565,150
TOTAL	**(270)**	**$ 3,694,952**	**$ 11,960,120**
GRAND T.	**(23,356)**	**$267,265,824**	**$526,716,339**

Forever the freeway: irate Seattleites have their inning

A freeway, typically, is the shortest distance motorwise between two points, destroying everything in its path without regard for the landscape, whether solely the work of nature or helped along by man.

But Washington's state highway engineers were beginning to find last month that obstacles can impede freeway progress—in this case notably a determined architect, Paul Thiry, whose hold-no-punches comments rallied a band of irate Seattle citizens behind his cause. He also happens to be a city planning commissioner.

Rapping the design as "organized devastation," Thiry proposed that the freeway, at least through the central district, be covered with a parklike area at a possible additional cost of $1 million. Opponents immediately dismissed the idea on grounds that it is impractical.

That Thiry's proposal would get off—or possibly under—the ground seemed encouraging at press time, and the proposal already was having its side effects. Mayor Gordon S. Clinton in a wire to Gov. Albert D. Rosellini urged a restudy of the Seattle Central Freeway as well as the new Lake Washington Bridge and its westerly approaches.

Furthermore, the mayor said that conversations between the highway department and consulting architect Lloyd Lovegren, hired by the state at the city's suggestion, would be stepped up regarding the Montlake interchange, key to the entire project. Up to this point Lovegren had been consulted by the state only once.

In addition, the "Keep Seattle Beautiful Crusade" began an advertising program (see sketch at right) in which it gave its "answer to this grim wasteland of cement: tunnels for Seattle so our city can emerge once more from its crushing mutilation."

Proponents no doubt were bolstered



by recent legislation passed in Olympia which prohibits billboards within 660 ft. of interstate highways and in scenic areas along state roads. This particular measure passed even to the surprise of its most ardent supporters.

Construction begins on Space Needle, Century 21 landmark

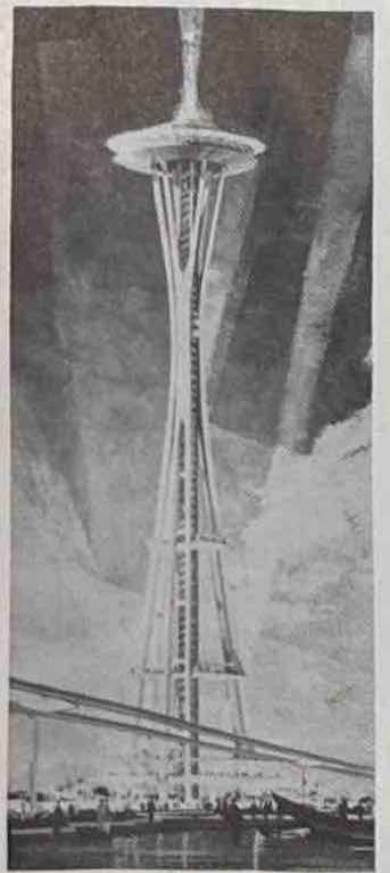
With an all-day fanfare climaxed by a spectacular array of fireworks April 21 to mark the opening of the Century 21 Exposition a year hence, Seattle attempted to unshake public apathy in its own backyard and proclaimed the 600-ft. high Space Needle as the symbolic structure of the six-month fair.

Work has begun on the unique tower, designed with a revolving restaurant near the top by the architectural-engineering firm of John Graham & Co. The scale model already has been through the wind-testing tunnel at the University of Washington, passing each examination with flying colors.

During construction, the all-steel structure will sprout in sections about 50 ft. high. Three pairs of legs will support the tower. The foundation will be anchored 30 ft. underground. A central utility shaft enclosing two interlacing staircases will give further strength to the structure.

The restaurant, capable of seating 220 persons, will revolve once an hour, giving diners a panorama of the Cascade Mountains to the east, Mt. Rainier to the south, Puget Sound and the city itself below and the snow-capped Olympic Mountains to the west. An observation deck will be above the restaurant. But Century 21 officials hastily add that any snacks served here will be dispensed on paper plates and in paper cups.

Two high-speed elevators with transparent walls will zoom on outside shafts to the top at 800 fpm. Each elevator will carry a capacity of 29 passengers. A third, to be used primarily for service, will coast along at 350 fpm.



Courtesy of The Argus

SPACE NEEDLE is on tight construction schedule, but backers say it will be ready for opening of Century 21. Total weight: 2,000 tons; estimated cost: $2.5 million.

Retention of out-of-state firms for CU work draws AIA's ire

Colorado architects are critical of the University of Colorado for engaging out-of-state architectural firms in connection with a proposed building program in Boulder.

The criticism was voiced in a letter to Quigg Newton, CU president, by F. Lamar Kelsey, Colorado Springs, president of the Colorado Chapter, AIA.

"The decision of our state's largest educational institution to go outside our own borders for a large portion of its architectural services without having more completely researched and interviewed resources available here" was deplored by the chapter.

"Our state possesses architectural firms of experience and ability to provide services comparable with those to be found elsewhere. Colorado possesses architects of established national reputation," the letter continued.

Kelsey said the state chapter is not critical of the CU building plans nor of the ability of architectural firms selected.

One Colorado firm was commissioned by the regents to design a $5 million residence for 1,000 students. The firm is Architectural Associates of Colorado. Members are Hobart D. Wagener of Boulder; W. C. Muchow Associates, Fisher & Davis, and Ketchum, Konkel & Hastings of Denver.

Pietro Belluschi, dean of architecture and planning at Massachusetts Institute of Technology, was retained as a design consultant.

Other design commissions were awarded to DeMars & Reay, Berkeley, Calif.; to Meyers & Ayers, Baltimore; to Murphy & Mackey, St. Louis.

Building permits (Cont'd from p. 5)

and New Mexico, $22,000.

Residential starts in March total $267,265,824, a drop of $42.8 million from the corresponding month in 1960. The slowdown is reflected in all state figures with the exception of Colorado, up $6.6 million, number of units up 778; Nevada, $2,751,236, units 225; and Montana, $392,000, units 30. Decreases in residential construction, with amount of drop in dollar volume and number of units, are California, $35.7 million, units 3,289; Arizona, $10.6 million, units 1,403; Hawaii, $2.7 million, units 474; Washington, $1.2 million, units 114; Idaho, $860,000, units 52; New Mexico, $645,000, units 75; Wyoming, $478,000, units 34; Alaska, $22,000, units dead even; Oregon $196,000, but units up 9; and Utah, $11,520, but units up 56.

Top 25 agencies

1.	Los Angeles	$47,468,779
2.	Los Angeles County	20,390,154
3.	Seattle	18,598,604
4.	Beverly Hills	17,459,243
5.	San Francisco	10,833,046
6.	Honolulu	10,801,172
7.	San Jose	9,626,635
8.	San Diego	9,369,430
9.	Phoenix	8,821,570
10.	Maricopa Co., Ariz.	8,566,820
11.	Sacramento County	8,141,463
12.	Denver	7,278,489
13.	King County, Wash.	7,220,630
14.	San Bernardino County	6,601,691
15.	Long Beach	6,312,455
16.	San Diego County	6,261,600
17.	Anaheim	5,873,939
18.	Las Vegas	5,852,685
19.	Orange County	5,844,017
20.	Oakland	5,645,041
21.	Albuquerque	5,194,225
22.	Ventura County, Calif.	4,194,225
22.	Ventura County, Calif.	4,960,198
23.	Santa Barbara County	4,571,800
24.	Jefferson County, Colo.	4,443,156
25.	Costa Mesa, Calif.	4,173,271

Honolulu reverses decision in Queen Emma dispute

Formal selection in March of the Queen Emma Gardens combine, with Minoru Yamasaki as architect, to design and construct a multimillion housing development to replace a 8.3 acre cleared slum in Honolulu culminated many weeks of controversy among bidders, city officials and the Hawaii Chapter, AIA, reinforced by the commentary of local and national editors and taxpayers.

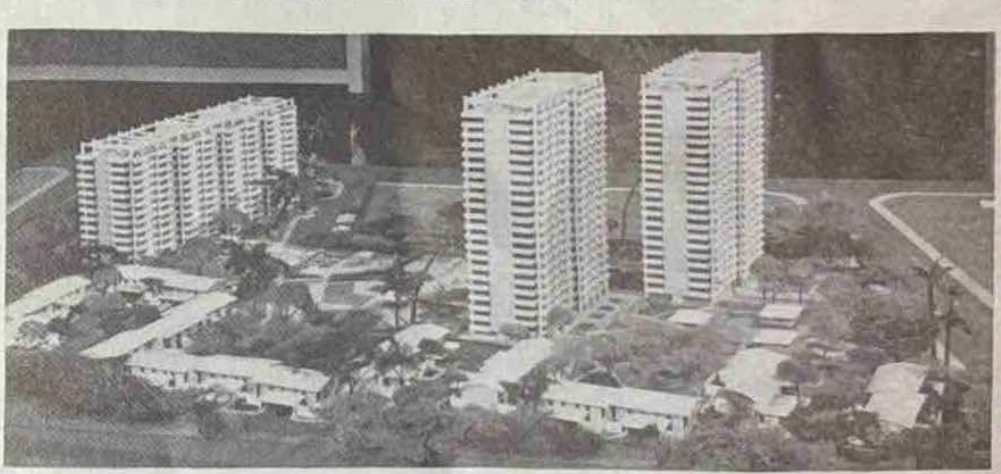
Developers E. E. Black, Ltd., and Castle & Cooke bid $4 per square foot for a total of $11,855,000. Completing the winning team: structural engineers Alfred A. Yee & Associates and city planners Harland Bartholomew & Associates.

The Honolulu Redevelopment Agency made its first tentative choice in January when it picked Queen Emma Associates (Adrian Wilson, architect) from among five bidders: The others: Alexander Young Co., Ltd. (Daniel, Mann, Johnson & Mendenhall); Queen Emma Plaza (Edwin J. Bauer); and Masao Shintani & Associates (Robert E. Wiese). A sixth contestant, Nuuanu Redevelopment Corp. (Leo Daly and Merrill, Roehrig, Onodera & Kinder) withdrew.

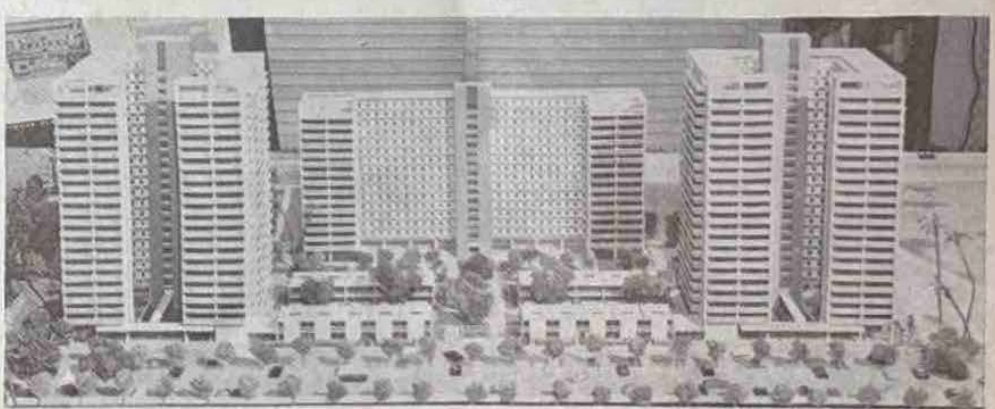
Following a storm of protest, the HRA retained two mainland architectural consultants—Mario J. Ciampi and John Lyon Reid, both of San Francisco—and ordered a study on the economic feasibility of each design by Western Real Estate Research Corp. of Los Angeles.

The local AIA chapter felt that the original choice was architecturally offensive, although reasonably priced, and its anger mounted when questionable procedures enabled the five bidders to alter their design after the initial and unsuccessful trial. These irritations had been preceded by a series of mismanaged city and county projects under which architects suffered financial and moral humiliation in spite of their concerted efforts to keep the public's interest constantly before the local officials eyes, often with belated—if any—success.

Almost lost in the shuffle were the efforts of 22 Chinese societies, schools and other nonprofit groups to relocate.



FINAL WINNER: Queen Emma Gardens proposal, praised as "an outdoor living experience in the sky as the result of well-conceived lanais."



ORIGINAL CHOICE: Queen Emma Associates plan, questioned regarding usefulness of 6-ft. wide balconies for individual units and enclosed corridor arrangement for main buildings which would create rather disturbing dark spaces at certain times of day.

new offices, partnerships

L. Jane Hastings has opened an office for the practice of architecture at 1314 N.E. 43rd, Seattle. She has been employed by two local firms since her graduation from the University of Washington.

William A. Kelly Jr. has opened an architectural office at 101 S. Virgil Ave., Los Angeles. Holding degrees from the Universities of California and Illinois, he has been associated with the offices of Smith & Williams, Jay Dewey Harnish and the city's planning department.

Alan Golin Gass has established an office for the practice of architecture and urban design in the Denver Hilton offices, 1515 Cleveland Place, Denver.

Neill Smith, former design chief for John Carl Warnecke & Associates, has opened his own architectural office at 211 Sutter St., San Francisco, under the name of Neill Smith & Associates.

Albert J. Gasvoda has opened an office for the practice of architecture in the Professional Block, Helena, Mont. A graduate of Montana State College, he formerly was employed by firms in Great Falls and Butte.

Norman H. Dyer has opened an office for the general practice of architecture at 696 Sacramento St., San Francisco.

Donald S. Blair and Saul Zaik, Portland architects, have entered into a partnership known as Blair & Zaik, with offices at 1134 S.W. Market St.

Gerald I. Cain, Edward H. Nelson and James A. Wares have formed an architectural firm known as Cain, Nelson & Wares, located in the Broadmoor Center Building, Tucson. Cain, who has a degree in architectural engineering from the University of Illinois, has been practicing under the firm name of Starkweather & Cain since 1955. A Yale University graduate, Nelson established his own practice in 1953. Wares, an Illinois graduate in architecture, was chief architect for Marshall Field & Co. in Chicago for 22 years prior to opening a private office in Tucson last year.

The engineering firm of J. C. Triolo has been established at 1100 Champa St., Denver, to offer services to architects in the fields of electrical and mechanical design. President and owner is Joseph C. Triolo, former works manager of the Denver Sunstrand plant and a graduate of the University of Alabama.

The architectural firm of Reese & Blachly has been organized at 1328 S.W. 14th Ave., Portland, by John W. Reese and Frank E. Blachly.

Richard L. Crowther, Denver architect, has been joined by Jack Kruse and Gary Landin as associates, the firm now being known as Richard L. Crowther & Associates. Both men have been with Crowther's office since 1956.

The firm of Arthur A. Sauer & Associates, civil-structural engineers, has been organized in Sacramento by Kenneth V. Marr, Charles H. Grimes and R. Joe Wood.

T. Y. Lin & Associates, consulting structural engineers with headquarters in Van Nuys, Calif., have opened a branch office at 3106 Fillmore St., San Francisco, under the direction of Felix Kulka.

The Phoenix architectural firm of Guirey & Associates has become a partnership known as Guirey, Srnka & Arnold, with offices remaining at 506 E. Camelback Road. Fred M. Guirey has been joined by Milan E. Srnka, who has been with the firm for three years, and Richard M. Arnold, two years.

Garretson & Elmendorf, San Francisco consulting engineers, have expanded their partnership to Garretson, Elmendorf, Klein & Reibin, architects-engineers. Principals are Bradley B. Garretson, civil-structural-mechanical engineer; James H. Elmendorf, civil engineer; John Klein, architect; and Fred M. Reibin, electrical engineer.

new partners, associates

John C. Bryant, architect, and Robert Butterfield, design associate of Everett, Wash., have acquired a new partner, Jack E. Frets. A graduate of Washington State University, he was engaged as an industrial engineer by Skagit Plastics and earlier was employed in the Mount Vernon office of architect Henry Klein.

William L. Zimmerman has been made an associate of the firm of Archie J. Fry, Auburn, Wash., architect.

deaths

Harry Nye, 88, retired architect who designed buildings of the Panama Pacific International Exposition in San Francisco in 1915 and later practiced in Stockton, died March 1 in San Mateo.

new addresses

Johannessen & Girand, consulting engineers, to 6601 N. Black Canyon Road, Phoenix.

Jones, Lovegren, Helms & Jones, architects, to Suite 1240, Washington Bldg., Seattle.

Edmundson & Kochendoerfer, architects, to 444 Pittock Block, Portland.

Parker, Zehnder & Associates, structural engineers, and Boris M. Lemos, mechanical engineer, to 612 S. Flower, Los Angeles.

Thomas Potter, architect, to 1851 S.W. 58th Ave., Portland.

Thonis, Harrison & Wolfe, architects, to 3850 W. Santa Barbara, Los Angeles.

DeWitt Robinson, architect, to 1333 S.W. 13th Ave., Portland.

elections, appointments

New Mexico Chapter, AIA, has reelected its president Philippe Register of Santa Fe. Completing the slate are Kern Smith, Carlsbad, vice president; John McHugh, Santa Fe, secretary; and John J. Heimerich, University of New Mexico, treasurer.

Central Valley Chapter, AIA, has reelected its entire slate of officers, headed by Albert M. Dreyfuss of Sacramento. Others are Robert S. Oliver, vice president; Whitson W. Cox, secretary; and Armsby Tod Hart, treasurer.

Montana Board of Architectural Examiners has named this slate of officers: William J. Hess, Great Falls, president; Oscar J. Ballas, Missoula, secretary; and Leonard R. Sundell, Billings, treasurer. H. C. Cheever of Bozeman was reappointed executive secretary-treasurer.

David J. Witmer, Los Angeles architect, has been reelected president of the board of directors for the Library of Architecture and Allied Arts. Other officers are Robert Alexander, architect, vice president; George B.

Allison, architect, treasurer; Henry Layne, structural engineer, secretary; Verne Boget, Gladding, McBean & Co., investment committee; and Martin F. Shakley, attorney, executive committee. Located adjacent to the Southern California Chapter, AIA, offices and founded several years ago through personal and association financial grants, the library is the only one of its kind west of the Mississippi.

Northern Utah Architects Association, which was organized a year ago in Ogden, has named Robert D. Hodgson as president; Sterling Lyon, vice president; and Thair Blackburn, secretary-treasurer.

Structural Engineers Association of Arizona has named Robert G. Niebur of Phoenix as its new president. Hugh M. Elliott is vice president and William F. Wendlind, secretary-treasurer.

Sacramento Builders Exchange has named an architect, Albert B. Thomas, as its new president.

Felix M. Warburg, San Rafael, Calif., architect, has been elected president of the Marin County Planning Council.

Architect John L. Wright has been named president of the Seattle Urban Renewal Enterprise, Inc.

Roland E. Quinlan has been named coordinator of land planning and architecture and Andrew Gerakas, director of business research and development, for the Honolulu firm of Law & Wilson, architects-engineers. Quinlan formerly was associated with planner George Raymond and as a partner in the firm of Quinlan-McVernon on the Brooklyn Heights renewal study and a Staten Island redevelopment study. Gerakas was an executive of Honolulu Iron Works for the last two years.

Austin, Field & Fry, Los Angeles architects-engineers, have appointed Robert E. Michener as director of the department of specifications. Most recently he held the same post in the firm of Stiles & Robert Clements.

Robert H. Dietz has been appointed chairman of the graduate program to be offered by the College of Architecture and Urban Planning of the University of Washington, beginning the fall quarter of 1961.

Los Angeles architect Robert Inslee has been reappointed to a two-year term to the consulting committee of the department of church architecture of the United Lutheran Church in America.

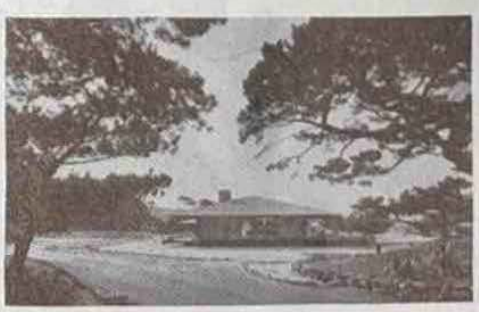
competitions

Two West Coast architects—Paul Hayden Kirk of Seattle and Edward H. Fickett of Los Angeles—are among four Americans chosen to submit a design for the European Housing Exposition for August in Copenhagen. Carl Koch of Cambridge, Mass., and Charles Goodman of Washington, D.C., complete the quartet. A group of Danish officials and architects will select one design to be built on the Copenhagen site, along with typical houses from more than 20 countries, including the Soviet Union.

Jury for the nationwide competition for the design of 990 apartment units at Red Rock Hill in San Francisco's Diamond Heights area will consist of these northern Californians: architects Ernest J. Kump and John Carl Warnecke; builders Joseph Eichler and Gerson Bakar; and staff member Don Burkholder of the sponsoring San Francisco Redevelopment Agency. William J. Watson is professional adviser for the competition, to be judged June 13-15.

Two additional architectural firms —Anshen & Allen and John Carl Warnecke & Associates—will join the original design team of Wurster, Bernardi & Emmons and DeMars & Reay in the $60 million Golden Gateway redevelopment project on a 20-acre site adjacent to San Francisco's Embarcadero. The developers, Perini-San Francisco Associates, will add another architectural firm at a later date. Present design team is composed of Bay area firms.

Pasadena architect Donald E. Neptune has been appointed to serve on a five-man jury for the 1961 architectural competition sponsored by The Ruberoid Co.'s mastic tile division. The design problem concerns a rapidly growing satellite city on the fringe of a major metropolis. Architects and students will share $25,000 in prize money.



ARCHITECTURAL PRIZE

of $100 in 136th annual show of National Academy of Design in New York is awarded to John Carl Warnecke of San Francisco for Asilomar Conference Hotel near Pacific Grove, Calif. Roger Sturtevant



HONOR AWARD

goes to Katharine Caldwell Residence in Lole, designed by Johnson & Perkins, architects, in 1961 Hawaii Chapter, AIA, competition (March ran incorrect photo). Camera Hawaii

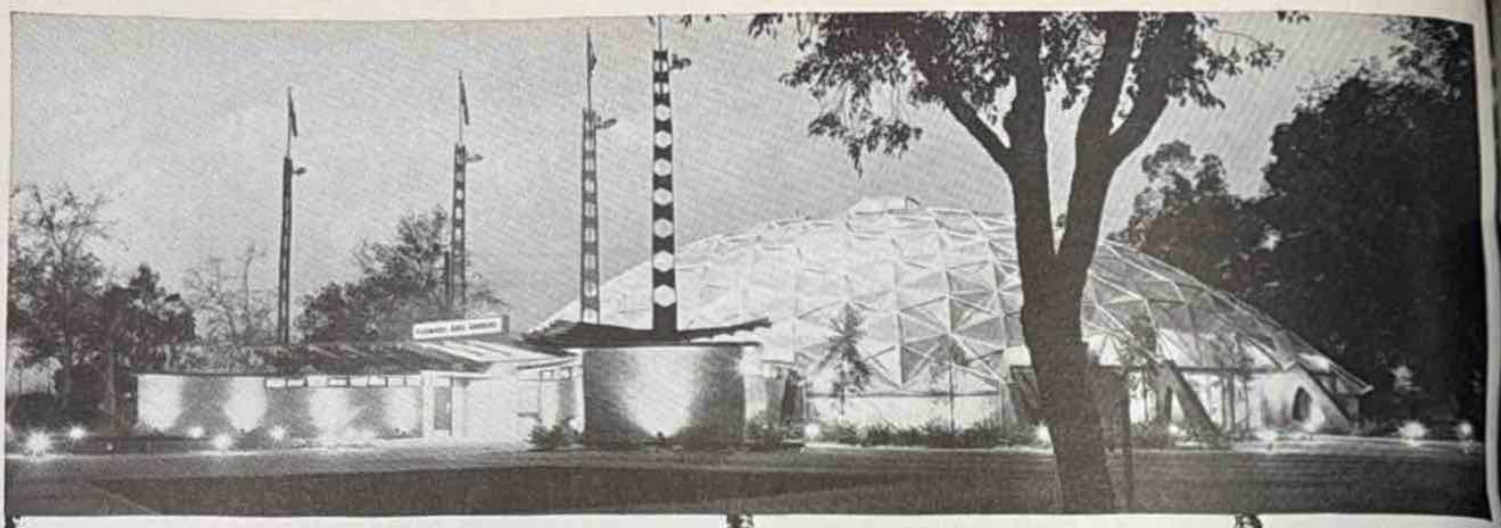
honors

Four of the nine fellowships granted by the Graham Foundation for Advanced Studies in the Fine Arts for 1961 have gone to westerners. Kenneth H. Cardwell, architectural professor at the University of California, is completing and publishing a definitive work on the late Bernard Maybeck; Paolo Soleri, resident architect at Arizona State College, Tempe, is working on a theoretical project, "City on a Mesa"; Jules Langsner, critic and lecturer in art history at Chouinard Art Institute, Los Angeles, is developing a series of five lectures to be prepared for eventual publication; and Malcolm Leland, architectural sculptor of Los Angeles, is continuing research on the creative development of plastic form in structural and nonstructural components (see article on p. 23.)

George J. Hasslein, head of the architectural engineering department at California State Polytechnic College in San Luis Obispo has been named to honorary membership in the national professional architects' fraternity, Scarab. A graduate of the University of Southern California, he has been instrumental in building Cal Poly's department over the past 12 years.

tours

Southern California Chapter, Women's Architectural League, will sponsor its fourth annual Architects' Home Tour May 28, with the proceeds ($3 admission; $1.50 for students) going to a scholarship fund at the University of Southern California's School of Architecture. Architects whose work has been selected for this year's tour include Thornton M. Abell, Benton & Park, Harold W. Levitt, Rex Lotery, Henry N. Silvestri, Stephen Stepanian and Bernard Bob Zimmerman. Tickets can be obtained at the AIA office in Los Angeles.



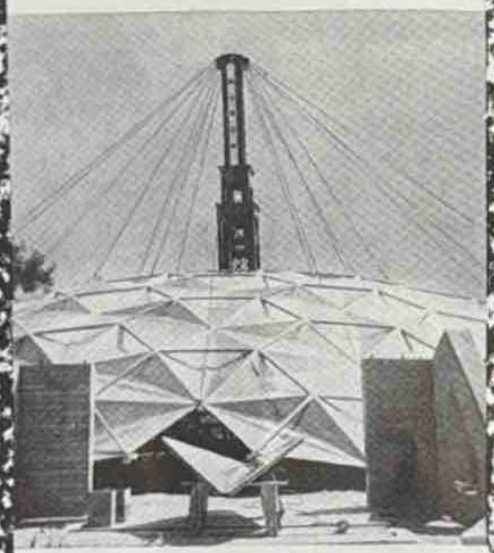
'MAHON-WEST' fabricates and erects **GEODESIC-DOME BUILDINGS** to your needs... your designs. Offers budget-paring, creatively different structures that retain **THE PRIDE OF ARCHITECTURE**

The versatility of geodesic-dome structures is unlimited. Here is a cost-cutting building design that architects can use with creative freedom in an infinite variety of projects—schools, banks, theatres, showrooms and many more. Applications requiring open-span floor areas of up to 30,000 square feet are "naturals" for domes. Mahon-West, the licensed fabricator and erector for Kaiser stressed-skin Aluminum Domes in the West, is the experienced source for practical architectural assistance. Why not contact them and learn how dome structures, in aluminum or steel, can ease your project... and budget... problems.

NATIONAL ORANGE SHOW

exhibition hall at San Bernardino, Calif. is a 125-foot-diameter Kaiser dome providing some 11,500 sq. ft. of usable floor space.

Architect: Lee Evison, Pasadena



DOME ERECTION COSTS ARE LOWER

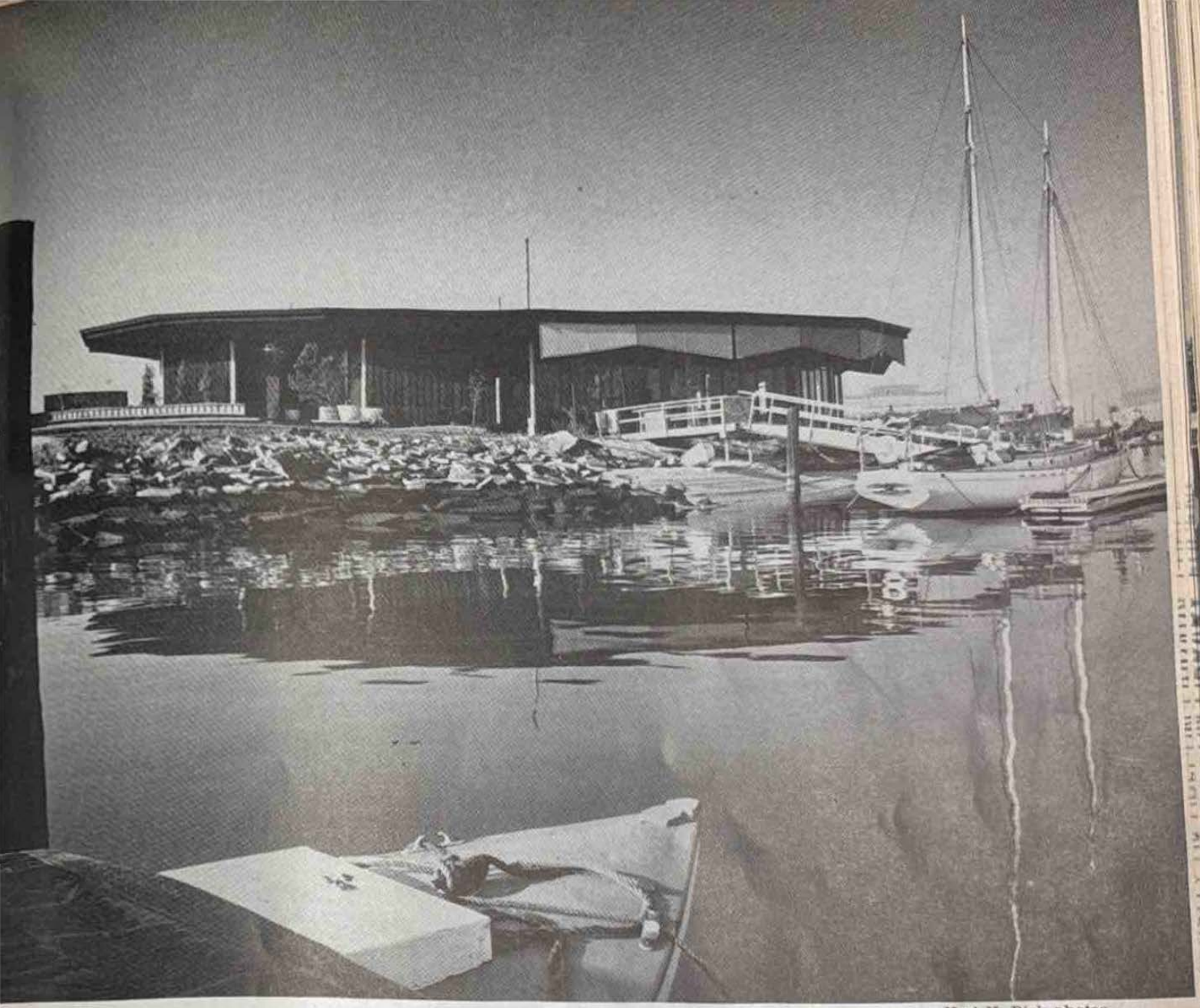
and Mahon-developed techniques, such as this telescoping mast speeds job completion.

MAHON-WEST / *2600 MONTEREY ST., TORRANCE, CALIF.*

WESTERN OPERATION OF
THE R. C. MAHON COMPANY
Detroit 34, Michigan

Mahon-West Sales-Engineering offices at 2600 Monterey St., Torrance, Calif. and 821 Market St., San Francisco.

MAHON



Karl H. Riek photos

Three restaurants designed in good taste

1. The Galleon Restaurant
   Alameda, California

•

CAMPBELL & WONG
Architects

PACIFIC BRIDGE CO.
General Contractor

Sixteen-sided structure affords maximum view

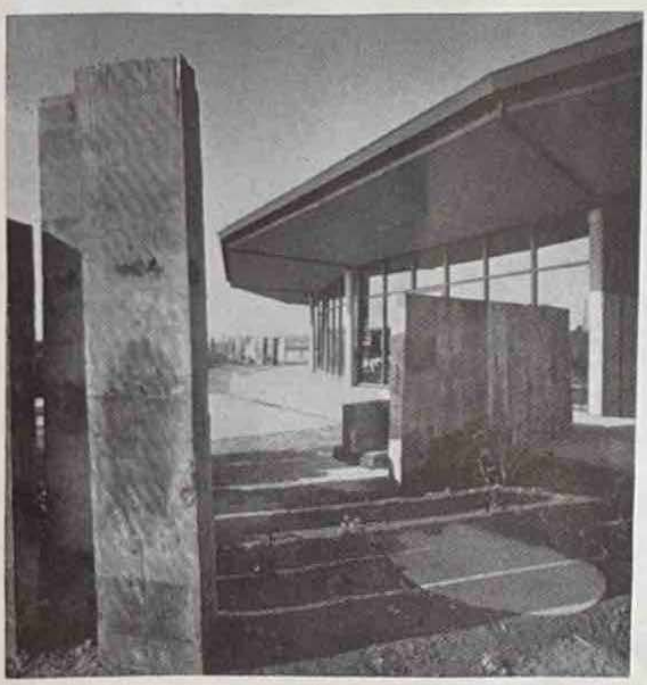
ATMOSPHERE here is created by a spectacular view of the Oakland Harbor Estuary, the distant skyline, the Oakland hills and the immediate yacht harbor and boats. Taking full advantage of these natural elements, the architects designed a 16-sided structure with a 16-sided court. After many schemes were studied, this solution was found to be the most flexible affording flowing views and spaciousness in every direction.

Although the structure itself has a quality of formality and elegance, materials have been kept informal. Black-brown stained redwood is combined with natural red tile grillwork, deep gold acoustical plastered ceiling, rich bright orange carpeting and green, gold and olive seating.

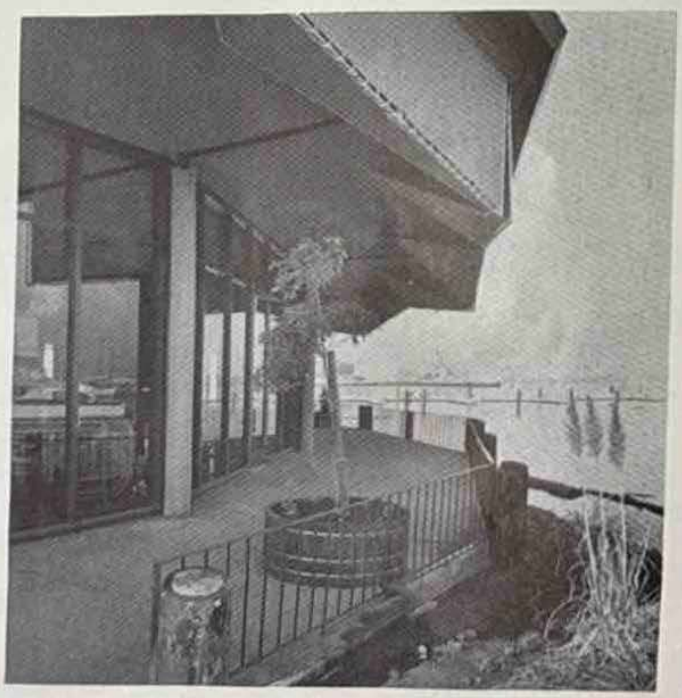
In keeping with the restaurant's site and name,



RESTAURANT'S EARLY SUCCESS is attributed to stimulating atmosphere as well as good food.

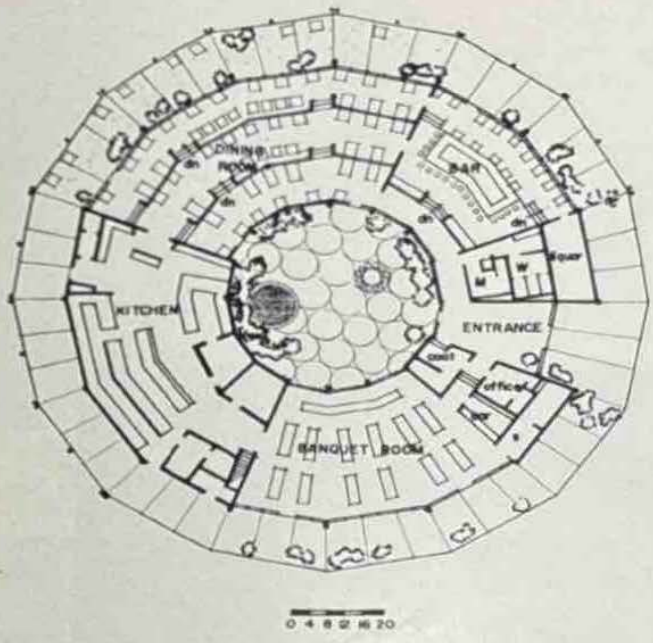


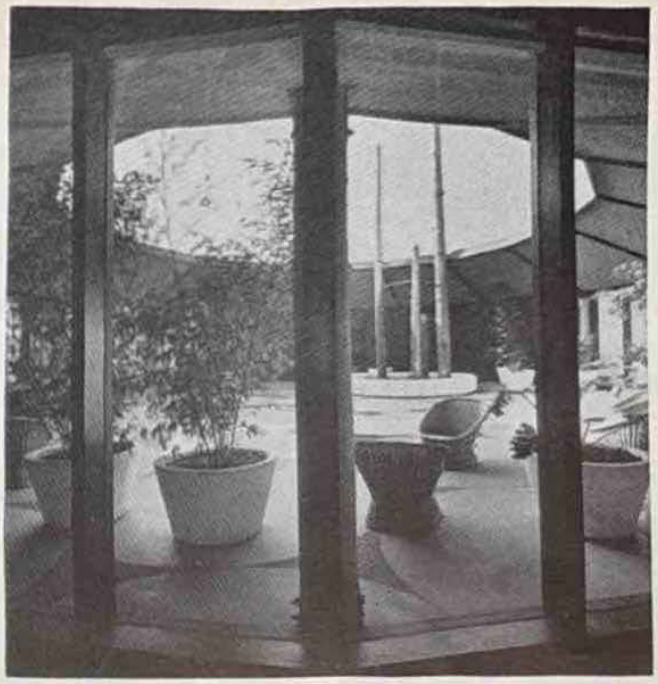
OLD REDWOOD BRIDGE PLANKS have interesting warm tone.



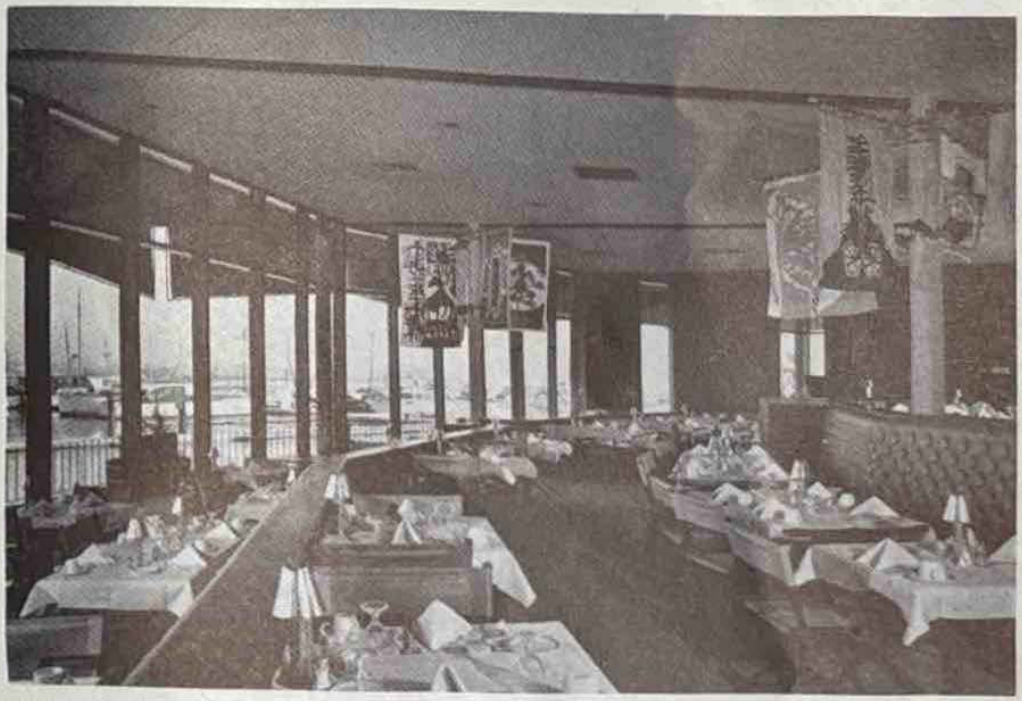
CANVAS SUNSHADE protects deck on estuary side.

1. THE GALLEON RESTAURANT





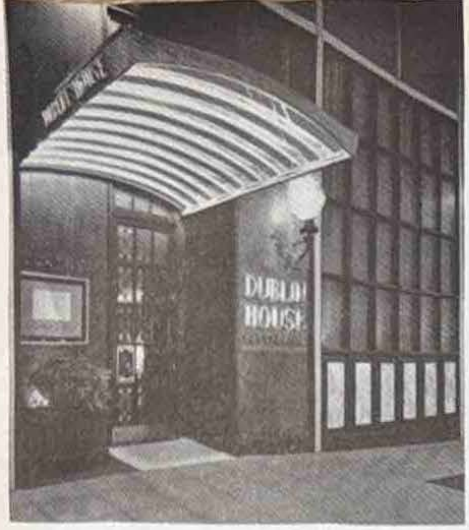
INTERIOR COURT provides additional dining space in suitable weather, allows view of water while enjoying its shelter.



TERRACED DINING LEVELS all offer views toward estuary. Especially designed flags depict world's seas and oceans as contemporary graphic symbols.

symbolic flags in the dining room and lounge represent the seven seas and five oceans. Dining room and banquet room each accommodates 150 guests.

The Galleon is part of a development by Pacific Bridge Co. on the Pacific Marina to eventually include a motel, shops, offices and showrooms. Even the neighboring owner-designed gas station (see p. 22) carries out the nautical theme in a carefree yet sympathetic manner.



2. Dublin House Restaurant
Seattle, Washington

•

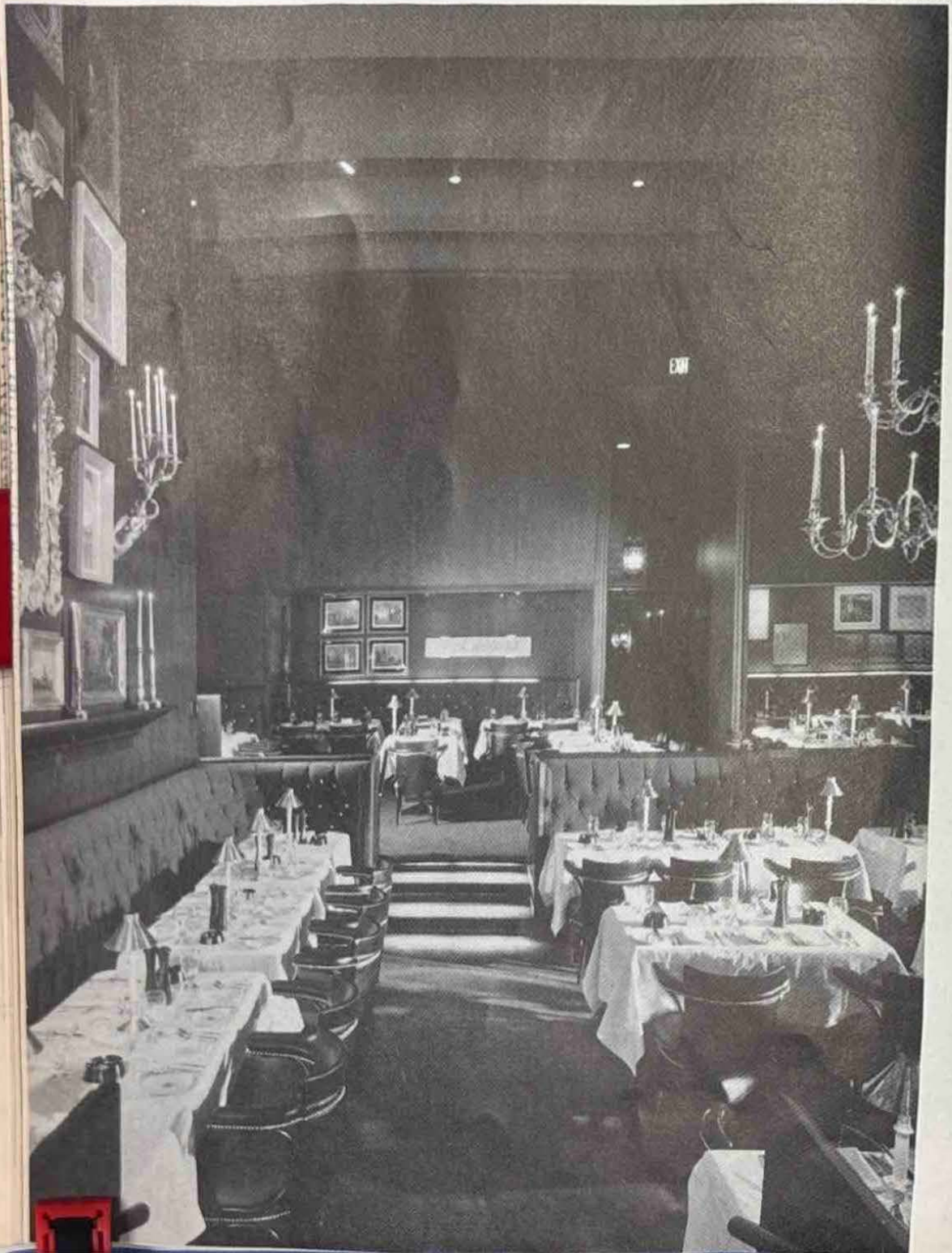
ROLAND TERRY
PHILIP A. MOORE

with Robert H. Egan
of Terry & Moore

Architects-Interior Designers

E. F. SHUCK CONSTRUCTION CO.
General Contractor

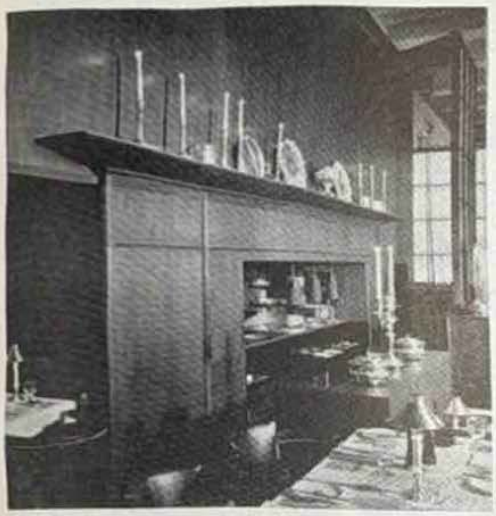
Dearborn-Massar photos



A nostalgic return to 18th century Ireland



ALCOVE DINING is quiet, intimate. Table setting on unbleached linen contrasts with emerald green banquette upholstery. Marble bas-relief is from Adam mantlepiece (ca. 1780).



MANTLE above open boiler section displays Sheffield silver candlesticks electrified with low-voltage wax candles.



PART OF COLLECTION of old and contemporary paintings from Ireland arranged around 18th century mirror in Chippendale style. At left, great brass Georgian chandelier.

THIS BIT OF OLD IRELAND perches jauntily right in the midst of a modernistic office development in downtown Seattle. Its design, inspired by 18th century decor items collected by the architect and owner in Ireland, tastefully uses dark stained mahogany paneling, emerald green banquettes, unbleached linen draperies and the art objects to conjure up the charm of an old Irish country home.

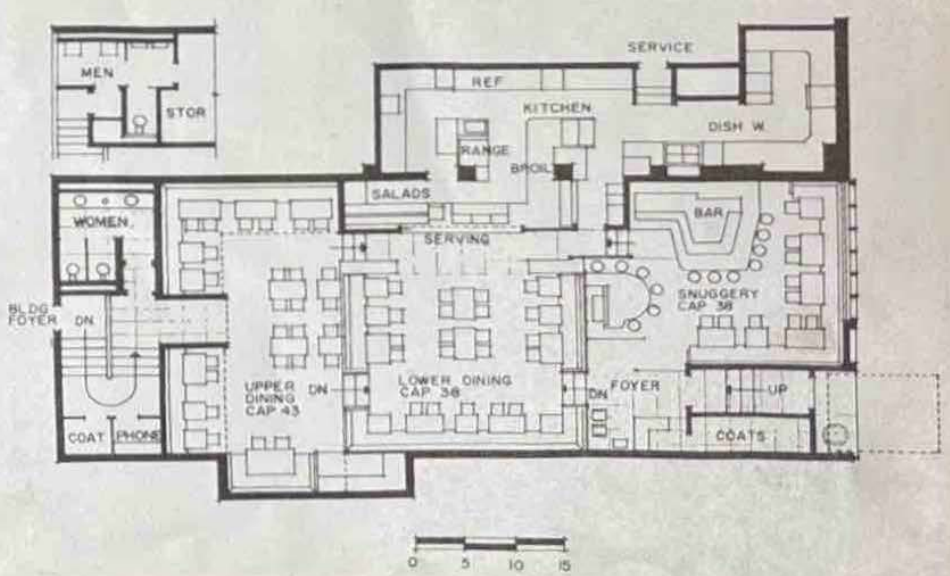
As a design solution it more than amply meets specifications of the client, who operates a string of Seattle restaurants, for a sophisticated atmosphere that would appeal to a luncheon clientele composed mainly of the business executives within the building and interesting enough to draw a discriminating dinner crowd after office hours.

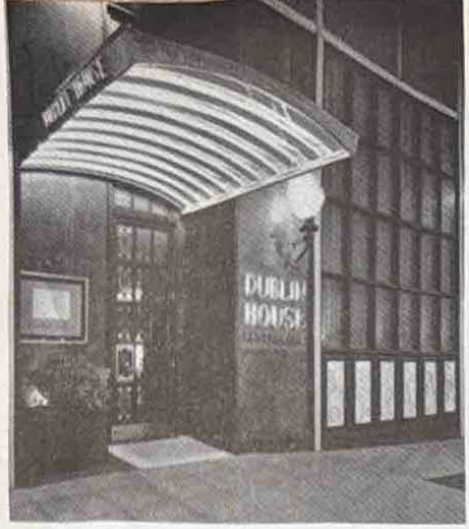
The pieces of art not only serve as table topics but have been used to create an illusion of space in what actually is a very small area. On one wall in the dining room, pictures are placed almost to the top of the high ceiling. Focal point here is a Georgian chandelier, electrified with low-voltage wax candles. This slight modernization of the fixture, along with similar adaptation of the silver candelabra and candlesticks, is the work of Irene McGowan, who also adapted the gas torch at the entrance and did the verdigris on the copper panels and canopy at the entrance.

Chinaware, table linen and menu covers are all inscribed with insignia of the restaurant name, inspired from 18th century penmanship calligraphy and designed by the architects. The decorative theme in gold leaf appears again on the entrance door. Exterior facade combines large areas of verdigris copper paneling with enframements of dark stained mahogany and accented with white marble and gold leaf lettering. Door also has an 18th century brass lock from Ireland.

Even the women's powder room has its art object: a Robert Adam mantel installed over the marble counter with basin spouts in plated silver.

Carpeting in the dining room, woven in Ireland, repeats the mahogany and green tones. Vinyl tile in some areas is black and white checkerboard. In the Snuggery (lounge), window coverings are hand-loomed linen striped gauze draperies and custom-woven reed blinds stained to match the mahogany.





2. Dublin House Restaurant
Seattle, Washington

•

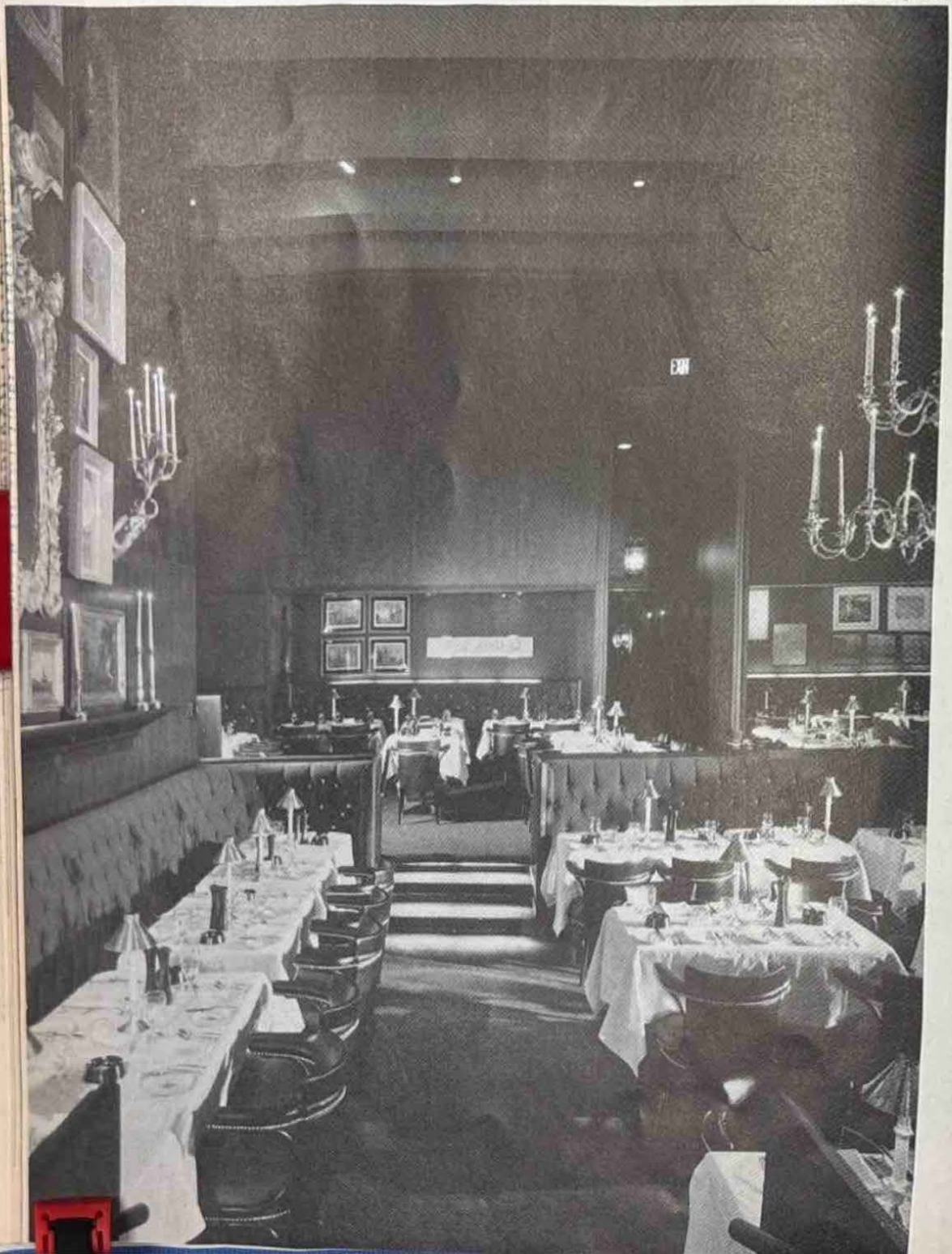
ROLAND TERRY
PHILIP A. MOORE

with Robert H. Egan
of Terry & Moore

Architects-Interior Designers

E. F. SHUCK CONSTRUCTION CO.
General Contractor

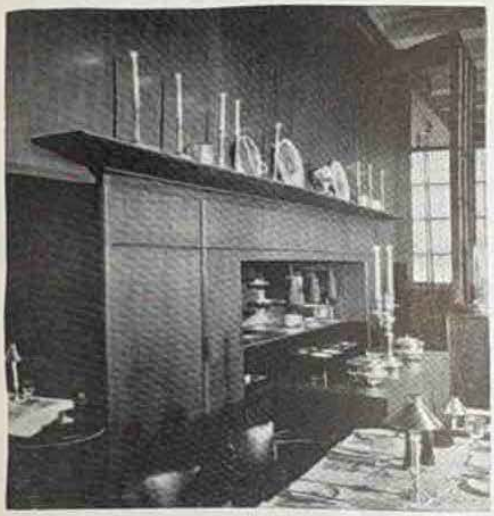
Dearborn-Massar photos



A nostalgic return to 18th century Ireland



ALCOVE DINING is quiet, intimate. Table setting on unbleached linen contrasts with emerald green banquette upholstery. Marble bas-relief is from Adam mantlepiece (ca. 1780).



MANTLE above open boiler section displays Sheffield silver candlesticks electrified with low-voltage wax candles.



PART OF COLLECTION of old and contemporary paintings from Ireland arranged around 18th century mirror in Chippendale style. At left, great brass Georgian chandelier.

THIS BIT OF OLD IRELAND perches jauntily right in the midst of a modernistic office development in downtown Seattle. Its design, inspired by 18th century decor items collected by the architect and owner in Ireland, tastefully uses dark stained mahogany paneling, emerald green banquettes, unbleached linen draperies and the art objects to conjure up the charm of an old Irish country home.

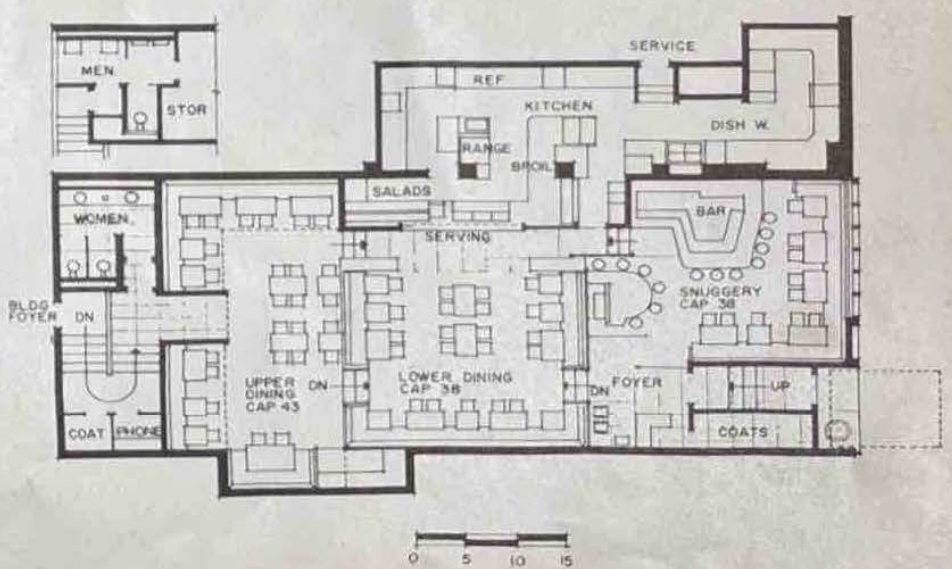
As a design solution it more than amply meets specifications of the client, who operates a string of Seattle restaurants, for a sophisticated atmosphere that would appeal to a luncheon clientele composed mainly of the business executives within the building and interesting enough to draw a discriminating dinner crowd after office hours.

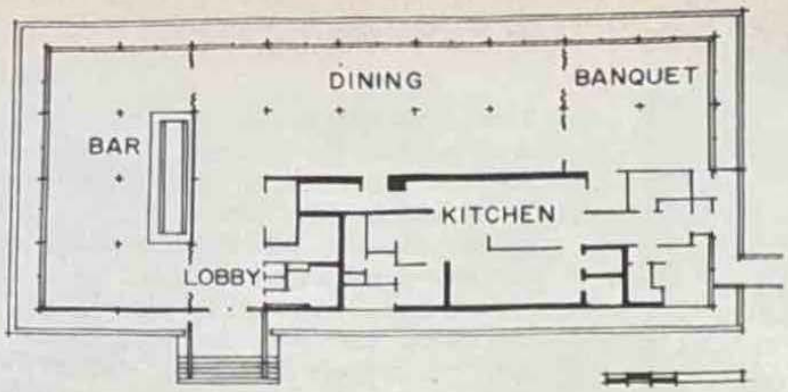
The pieces of art not only serve as table topics but have been used to create an illusion of space in what actually is a very small area. On one wall in the dining room, pictures are placed almost to the top of the high ceiling. Focal point here is a Georgian chandelier, electrified with low-voltage wax candles. This slight modernization of the fixture, along with similar adaptation of the silver candelabra and candlesticks, is the work of Irene McGowan, who also adapted the gas torch at the entrance and did the verdigris on the copper panels and canopy at the entrance.

Chinaware, table linen and menu covers are all inscribed with insignia of the restaurant name, inspired from 18th century penmanship calligraphy and designed by the architects. The decorative theme in gold leaf appears again on the entrance door. Exterior facade combines large areas of verdigris copper paneling with enframements of dark stained mahogany and accented with white marble and gold leaf lettering. Door also has an 18th century brass lock from Ireland.

Even the women's powder room has its art object: a Robert Adam mantel installed over the marble counter with basin spouts in plated silver.

Carpeting in the dining room, woven in Ireland, repeats the mahogany and green tones. Vinyl tile in some areas is black and white checkerboard. In the Snuggery (lounge), window coverings are hand-loomed linen striped gauze draperies and custom-woven reed blinds stained to match the mahogany.





3. Stuft Shirt Restaurant
Newport Beach, California

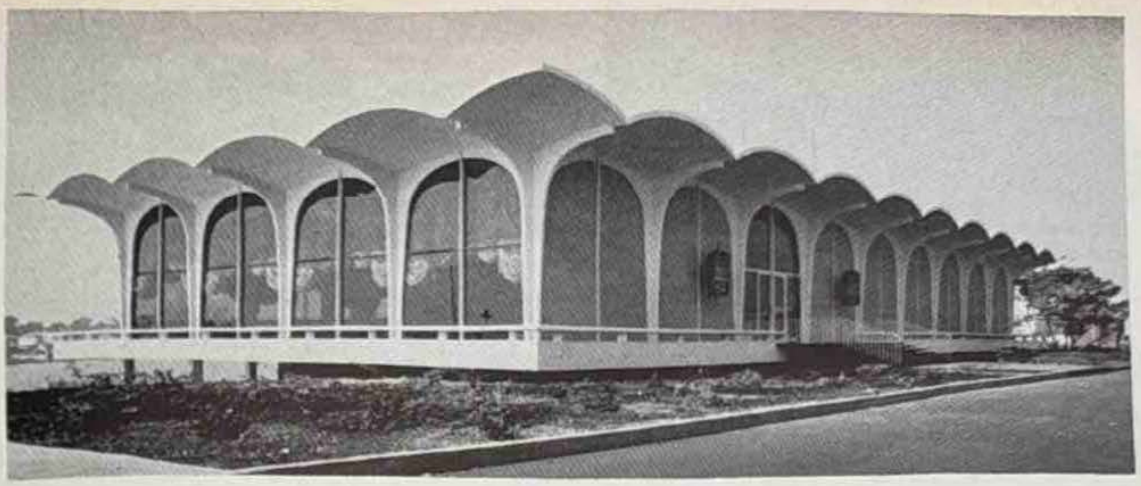
LADD & KELSEY
Architects

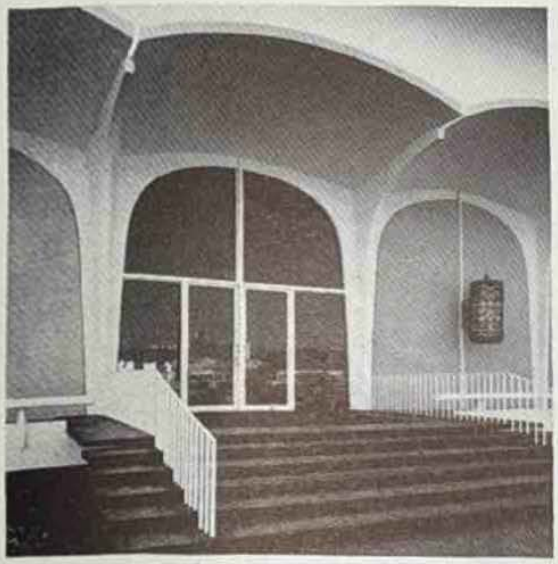
RICHARD R. BRADSHAW, INC.
Structural Engineer

ENCINO CONSTRUCTION, INC.
General Contractor

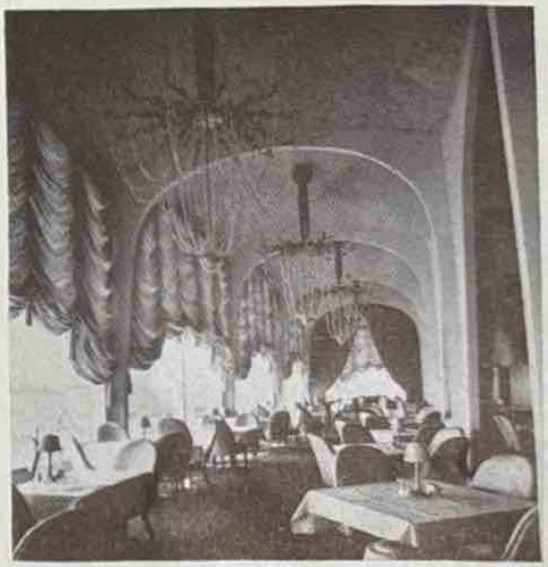
Erwin G. Lang photos







CAST IRON LAMPS on either side of main entrance have verdigris patina to simulate old copper. Restaurant is third in chain bearing identical name (other two are located in Pasadena and Ontario).



AUSTRIAN PUFF SHADES, representing more than 2,500 yd. of material, are wheat colored; sea green velvet hangs in doorways. Czechoslovakian crystal is used in chandeliers, designed by decorator Wolff.

Variations on an old Venetian theme

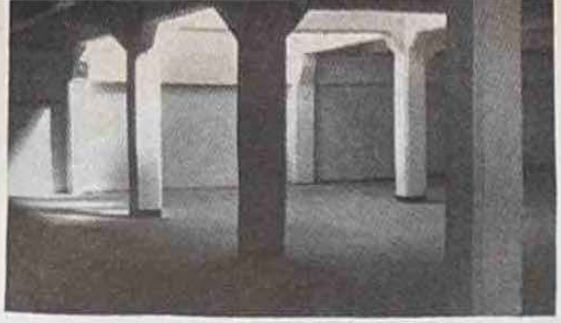
GRACEFUL STILTS and domed roof sections, combined with the Venetian decor, give an old-world quality to this restaurant overlooking the Newport Beach harbor at Port Orange. Piers, 50 of them, on precast concrete piles straddle the existing bulkhead and carry the 300-capacity restaurant partly over the water ensuring an unobstructed view and freeing additional land for off-street parking.

Exposed members branch into quatrefoil arches at the ceiling line, in turn capped by 3-in. thick concrete domes. In the center of each dome hangs a 7-ft. diameter chandelier.

Main floor is surrounded by a 5-ft. wide concrete deck, an aid when it comes time to clean the wide expanse of gray-tinted glass. Acoustical treatment consists of sprayed asbestos on the ceiling in public areas.

Site was raised by 3,500 yd. of fill to bring the restaurant floor level up to 16 ft. above the water, thus giving patrons a better view of the harbor. It also affords space beneath the restaurant for marina facilities.

Levine & McCann were mechanical-electrical engineers; Paul Veneklasen, acoustical consultant; Marco Wolff Jr., interior consultant.



ROUGH CONCRETE STRUCTURE of old warehouse.

Where architects hang their hats

KNORR & ELLIOTT
San Francisco, California

DISPLAY COURT has white-painted frame and walls, yellow-ochre precast concrete tiles.

Karl H. Riek photos

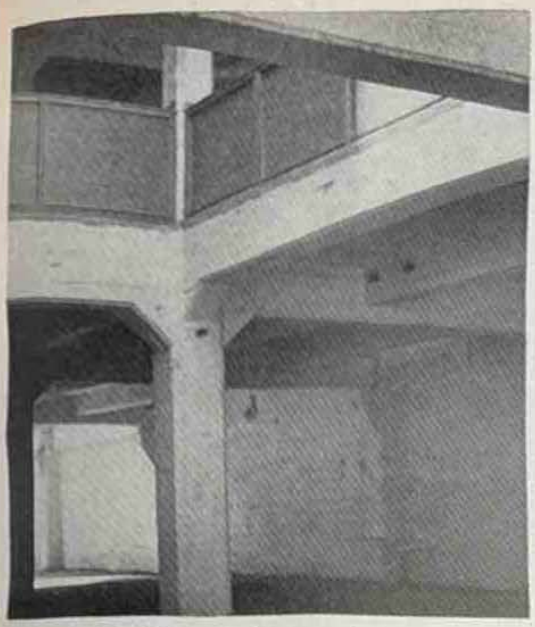


AN OLD SYRUP PLANT built in 1910 and later converted into a warehouse doesn't sound like the most likely candidate for an architectural office. But this particular one, old concrete pillars and all, sparked the imagination when two principals looked about for growing space. What's more, it nicely fulfilled their basic requirements: the potential for creating both an exciting space for clients to visit and a pleasant environment for the office personnel; allowance for future expansion; convenient location to the city's business center and main arteries leading out; and concrete construction for insurance purposes.

The plant's structural frame, reflecting crude forming techniques of the early 1920s, was turned into one of the prime assets of the building. Rather than attempt to cover the rough, irregular surfaces with finished plaster, it was decided to play up the "gutty" character of the space.

Existing light court, 24x14 ft. wide and 24 ft. high, had exactly the character potential the architects sought. Quality of natural light is excellent for the mezzanine drafting area, while a garden display court (upon which all areas and personnel look) on the lower level is enhanced by the sunlight.

Concrete walls are painted white and new dividing partitions are either gypsum wallboard or resawn redwood over steel studs. Floors were sufficiently level and smooth for direct application of vinyl asbestos tile. Center court has 1-ft. square precast concrete tile. Electrical wiring necessary to provide an office level of illumination was a major cost and a prime difficulty, especially in avoiding [illegible] duit.

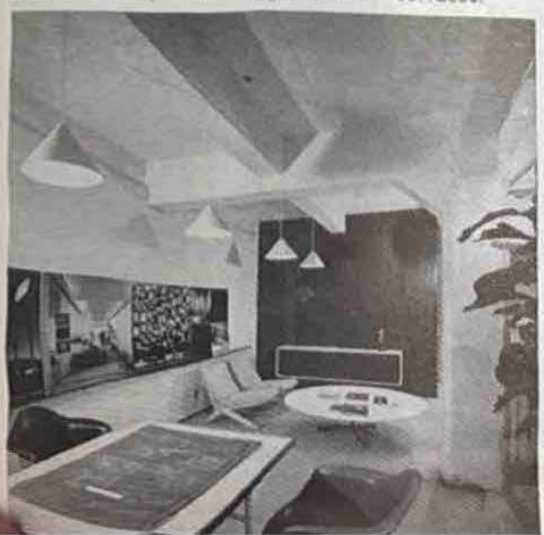


EXISTING CORNER now houses spiral stair below.



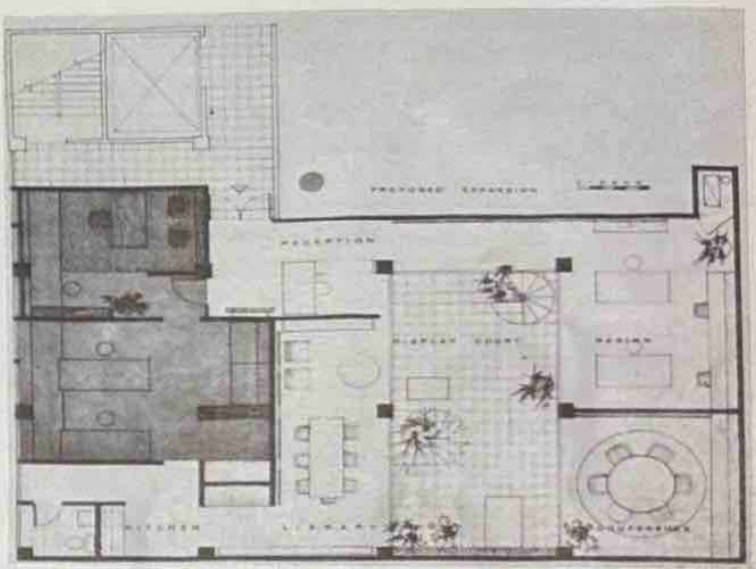
FLOORING in stair area is white and black vinyl tile.

LIBRARY-REFERENCE AREA illustrates sensitive use of contemporary furniture (Knoll Associates and Herman Miller) with rough-textured surfaces.

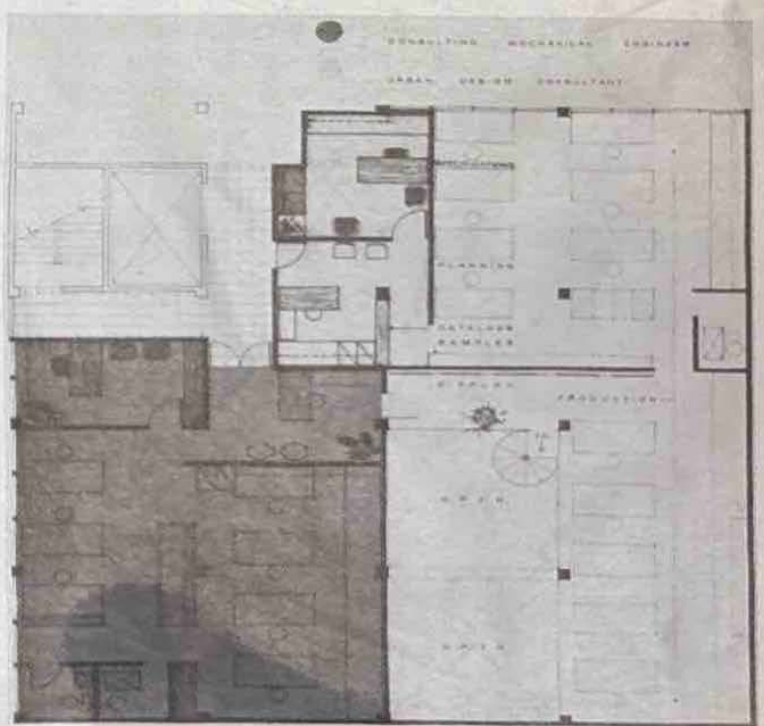


Project has been most successful economically as well as aesthetically. Total cost of remodeling 3,650 sq. ft. by Greystone Builders was $11,500; total rent, including the improvements, comes to just under 25 cents per square foot per month, compared to 60 to 90 cents per square foot for major office buildings a few blocks away.

The architects have taken on an additional 2,500 sq. ft. now being remodeled. This space will not only provide protection for expansion but also makes it possible to offer offices to consultants called upon frequently by the firm. For example, two present tenants are a site planner and landscape architect and a consulting mechanical engineer.

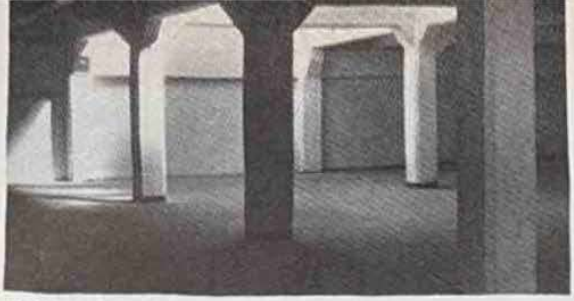


LOWER FLOOR



UPPER FLOOR

Where architects hang their hats



ROUGH CONCRETE STRUCTURE of old warehouse.

KNORR & ELLIOTT
San Francisco, California

DISPLAY COURT has white-painted frame and walls, yellow-ochre precast concrete tiles.

Karl H. Riek photos

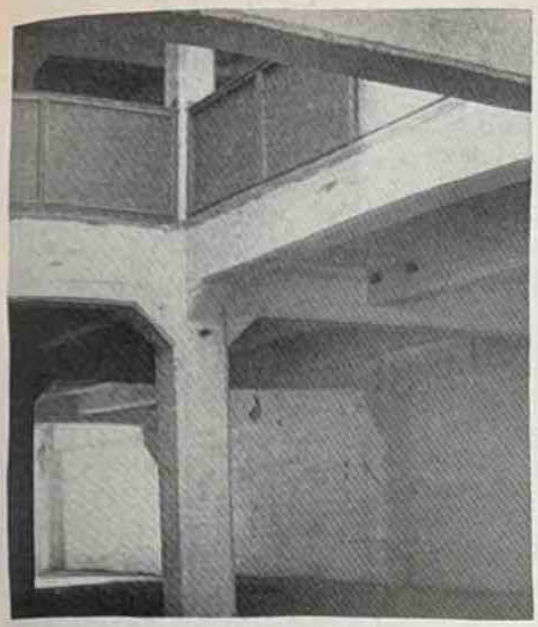


AN OLD SYRUP PLANT built in 1910 and later converted into a warehouse doesn't sound like the most likely candidate for an architectural office. But this particular one, old concrete pillars and all, sparked the imagination when two principals looked about for growing space. What's more, it nicely fulfilled their basic requirements: the potential for creating both an exciting space for clients to visit and a pleasant environment for the office personnel; allowance for future expansion; convenient location to the city's business center and main arteries leading out; and concrete construction for insurance purposes.

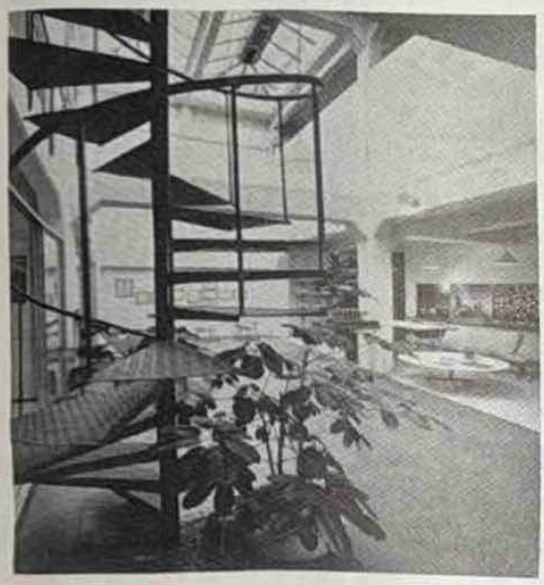
The plant's structural frame, reflecting crude forming techniques of the early 1920s, was turned into one of the prime assets of the building. Rather than attempt to cover the rough, irregular surfaces with finished plaster, it was decided to play up the "gutty" character of the space.

Existing light court, 24x14 ft. wide and 24 ft. high, had exactly the character potential the architects sought. Quality of natural light is excellent for the mezzanine drafting area, while a garden display court (upon which all areas and personnel look) on the lower level is enhanced by the sunlight.

Concrete walls are painted white and new dividing partitions are either gypsum wallboard or resawn redwood over steel studs. Floors were sufficiently level and smooth for direct application of vinyl asbestos tile. Center court has 1-ft. square precast concrete tile. Electrical wiring necessary to provide an office level of illumination was a major cost and a prime difficulty, especially in avoiding running exposed conduit.

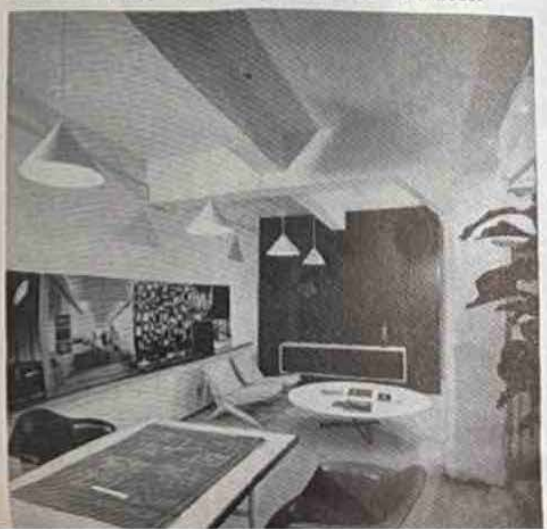


EXISTING CORNER now houses spiral stair below.



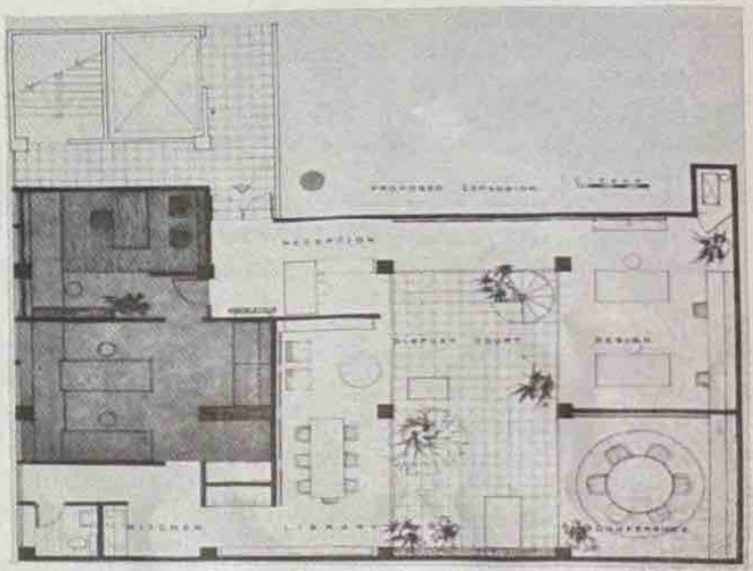
FLOORING in stair area is white and black vinyl tile.

LIBRARY-REFERENCE AREA illustrates sensitive use of contemporary furniture (Knoll Associates and Herman Miller) with rough-textured surfaces.

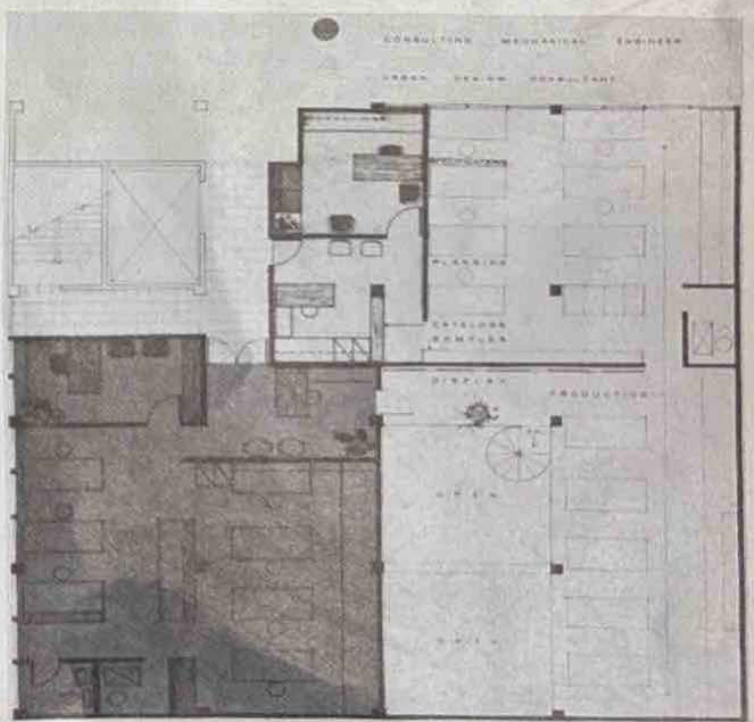


Project has been most successful economically as well as aesthetically. Total cost of remodeling 3,650 sq. ft. by Greystone Builders was $11,500; total rent, including the improvements, comes to just under 25 cents per square foot per month, compared to 60 to 90 cents per square foot for major office buildings a few blocks away.

The architects have taken on an additional 2,500 sq. ft. now being remodeled. This space will not only provide protection for expansion but also makes it possible to offer offices to consultants called upon frequently by the firm. For example, two present tenants are a site planner and landscape architect and a consulting mechanical engineer.



LOWER FLOOR



UPPER FLOOR



CITIZENS MOTOR BANK, CLOVIS, N.M.: To provide four drive-in and two walk-up windows (half have been installed to date) on a triangular site at the intersection of two major thoroughfares, the architect selected a spherical shaped protective dome framed with structural steel.

Four main supporting members are formed with plate girders, anchored at the base to concrete mass footings. Intermediate steel members are channels and angles fabricated to the spherical frame. The steel skeleton is covered with 2-in. t&g lumber, waterproofed with a mopped-on asphalt roofing felt and covered with a blown-on portland cement plaster about 1 1/2 in. thick. Each quarter segment of the sphere is separated with a metal expansion joint. The entire dome is finished with a sprayed-on ceramic coating.

The motor bank building is constructed under the dome using concrete masonry units and brick veneer exterior walls, bar joints and steel deck roof framing with built-up asphalt and gravel surfacing. Fascia of the structure and a fountain, which carries the building's indentification, are veneered with ceramic tile. An electric heat pump provides air conditioning. Architect: James A. Burran Jr.; associate designer: Loren E. Mastin; contractor: Byron Black.

Karl H. Riek



Project roundup

Designed for a society on wheels

COLLEGE CARWASH, PASADENA: As an overall shelter, the architects conceived a dramatic roof structure of steel deck planes supported by steel columns to provide a space for each function in terms of use, to obtain a variety of surfaces and textural qualities and to employ simple, prefabricated parts in the construction.

Canopy allows a pleasant, airy space in direct contrast to the typical enclosed carwash project and permits bright, uniform illumination so that every operation is clearly visible to patrons and passersby. Two pleasant waiting areas are provided: one outside, landscaped with tropical foilage; and one inside, completely air conditioned during extreme weather.

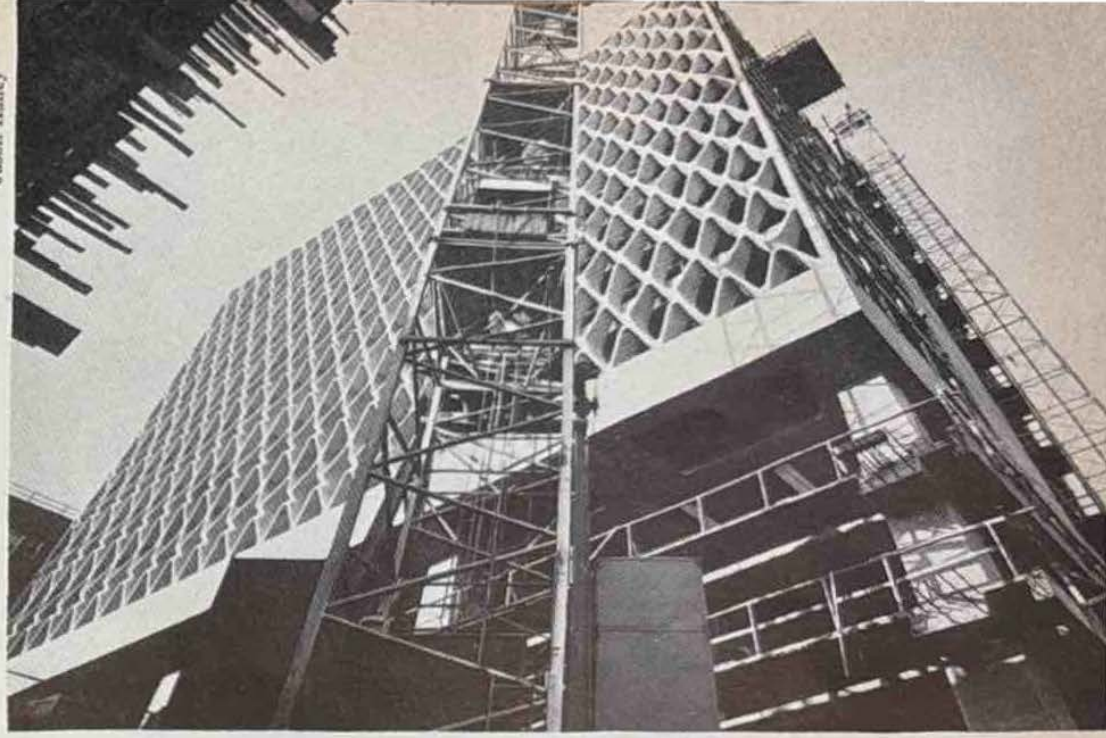
In harmony with the roof structure, all buildings are of prefabricated steel decking. Facilities are offered for gasoline, lubrication, underseal, etc., as well as a commercial laundry to service towels. Architects: Smith & Williams; contractor: Roulac Construction Co.

Julius Shulman



GAS STATION, ALAMEDA, CALIF.: This little project is most appropriate as part of a major development being accomplished by the contractor-owner, Pacific Bridge Co., serving as a good neighbor to the Galleon Restaurant (see p. 13). The pilings immediately establish the continuity, which is further carried out by the canopy covered with a piece of sailcloth. Hemp has been strung through holes drilled 2 ft. o.c. in the structural frame, thus generating a true hyperbolic curve.

In keeping with the nautical theme which employs the simplest materials available, the gas station is largely made from tiles salvaged (literally dug up) from the bay; wall areas are decorated with sea shells and other flotsam. Rock used in the area has been brought in from a construction job in the mountains. Left in their natural colors, the stone, tile and canvas will weather beautifully. Designer: Roy Anderson.



Jason Hailey

LOAD-BEARING GRILL on north and south facades doubles as sun control device. Parking levels below will be surrounded by zigzag concrete mullions to form sculptural screen.

A lively concrete neighbor for Wilshire

In planning the 13-story American Cement Corp. Building in Los Angeles, Daniel, Mann, Johnson & Mendenhall, architects-engineers, were given free rein to exploit the use of reinforced concrete both in a structural and a sculptural sense.

Results proved interesting enough to draw more than 300 persons to an on-site seminar where they could observe first hand the unusual construction techniques being employed in the $3¼ million building (about $13 per square foot), scheduled for completion by Peter Kiewit Sons in June.

Most obvious of the several innovations is the first known use of sculptural diagonal posts in a load-bearing grill poised over the base tower structure on the north and south facades, particularly suited to absorb seismic stress in an earthquake area such as Southern California. The structural system used here provides completely column-free interior space with a separate, fixed-sash glass curtain wall recessed behind the grill.

As James Kessler, chief structural engineer, explains: "This grill essentially replaces the normal beam and column system and has the advantage of providing an extremely rigid wall for the resistance of lateral loads and of becoming a distinctive architectural feature of the building.

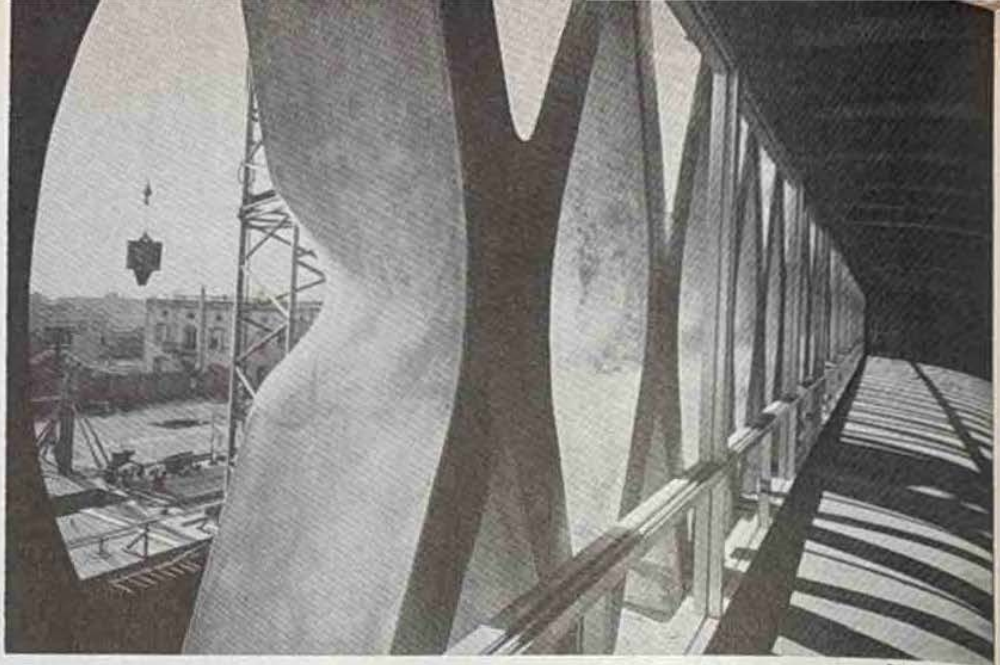
"The grill is used, therefore, as a principal load-bearing and shear-resisting element on the exterior faces. The grill members are used in conjunction with precast concrete floor beams which clear span from the exterior faces of the structure to the central core. The latter is of concrete construction and is also a load-bearing and shear-resisting element."

But more significant than the load-bearing grill in itself, the resultant form of the building is a composition reflecting its functional elements in a dramatic way:

1. Parking extends over the full site throughout four levels. One is underground (the water level of the lake in adjoining MacArthur Park discouraged a deeper basement) and three above. The ground level also contains the Wilshire Boulevard lobby, a restaurant and coffee shop. The upper two levels of parking are open to natural ventilation and are surrounded by a sculptured two-story precast concrete grill. Building elevators are available from all parking levels.

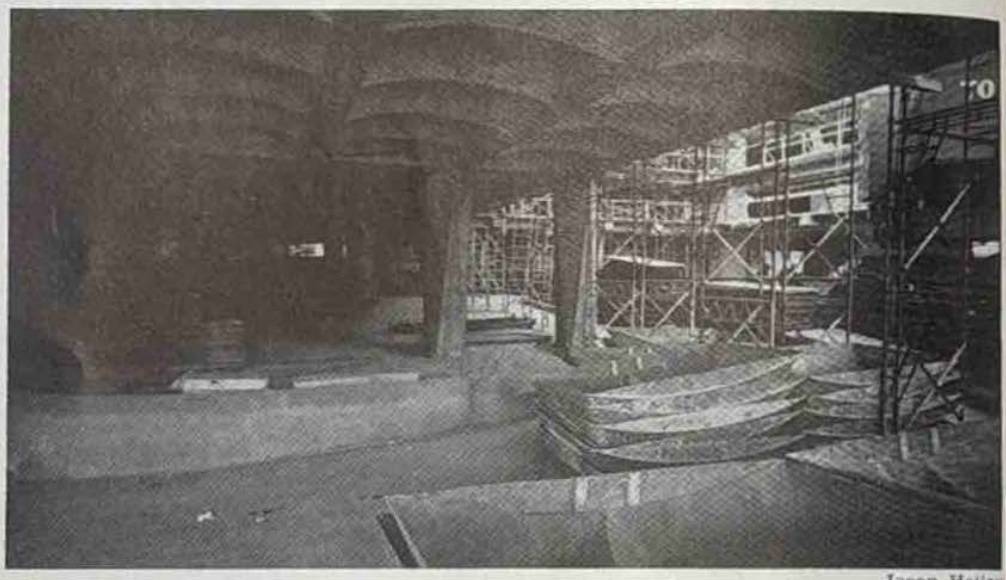
2. The fourth level above ground, surmounting the parking structure, allows the development of an executive suite set in a hanging garden overlooking the park, extending over the full site.

3. The fifth level, not an occupied floor, serves a dual function. Structurally, it provides a transition from the column system of the office tower above. Mechanically, it contains, in a more effective location than usual,



BEHIND PRECAST DIAGONAL POSTS is column-free interior space with separate fixed-sash glass curtain wall.

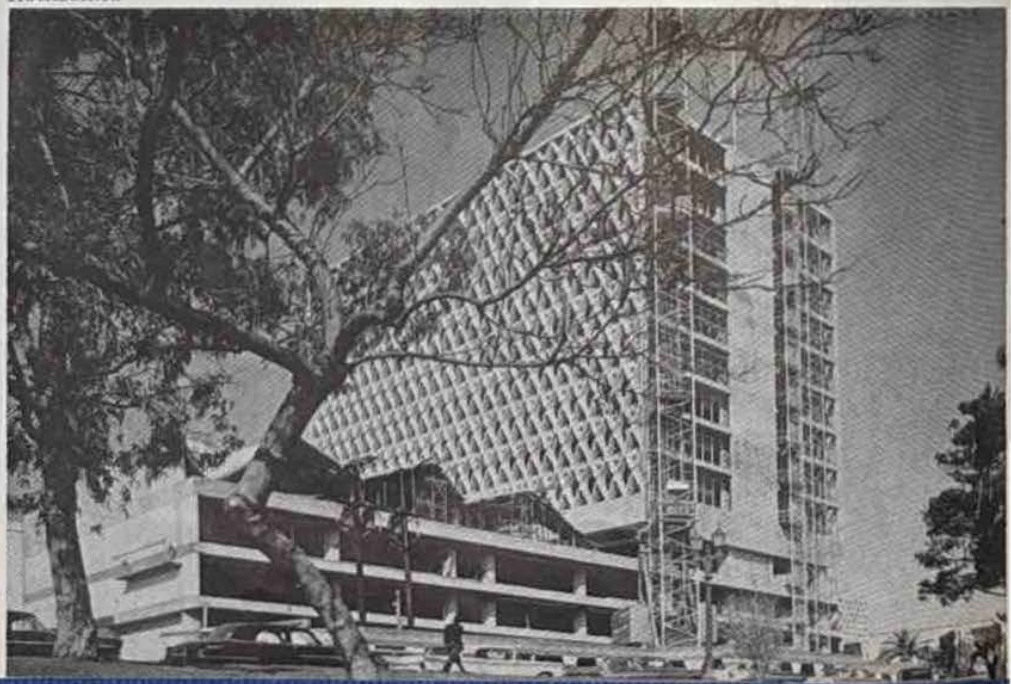
Jason Hailey



VAULTED CEILING of ground floor is produced by pouring concrete over plastic forms. In lobby and restaurant areas, vaults will be used as part of decoration in combination with lighting fixtures.

Jason Hailey

Rothschild



EXECUTIVE OFFICES for client's major division, Riverside Cement Co., will be housed in separate structure with folded concrete plate roof of flower-like geometric shape poised over glass office walls and surrounded by landscaped terrace.

the principal air-moving equipment for the building.

4. The previously-mentioned tower above the transition floor consists of nine office floors of about 12,000 sq. ft. each. In the form of an inverted T, it rests on eight 5x4-ft. sculptural columns.

Construction of the tower from the fifth floor up utilizes several techniques which are noteworthy in that they have not often been applied to multistory buildings. The central core was constructed separately by slip form methods and as such was erected entirely within a period of about four weeks.

Rapid construction in the central core also permitted work to begin very early on the installation of elevators. The precast grill members and the precast floor beams were then installed floor by floor and all elements tied together by means of the poured-in-place floor slab. Thus the slab was poured without the need for any shoring.

The east wall overlooks MacArthur Park and shows off the simple T-form of the building, with the addition of a glass curtain wall protected by adjustable sun screens. These roll in and out of the central core on electrically controlled tracks. The west facade faces another high-rise structure and is a windowless concrete wall.

Malcolm Leland conceived the sculptural elements from basic structural requirements. After clay studies were completed and the architects' decision was made, a full-size model was constructed, working in plaster with carving tools and exact measurement devices. Molds came next, frequently in a fiberglass material, and full-scale casting of the final building components then became a production line job performed either at the site or in the yards of the concrete subcontractor.

"This growing interest in the sculptural form," says Leland, "indicates an area in which the sculptor has a tremendous opportunity to integrate his work with architecture and to contribute a human scale to building in contrast to the ever-growing use of the stock machine-made components so much in evidence in our sterile environment today."

Recognizing American Cement's interest in the use of concrete, structural engineer Kessler makes this comment: "Concrete technology was expected to require a substantial part of the design and construction effort. However, the entire superstructure is built with only two basic strengths; 3,750 and 5,000 psi. concrete, with lightweight or hardrock aggregates, and no unusual procedures were required."

What you need to know about paint

by S. O. JONES

Today all of us are using words or phrases in connection with paint products with which we are familiar by name only. Very few people fully understand what these names imply or represent. They are alkyd, rubber base, vinyl latex, acrylic latex and epoxy.

An effort is made here to explain in understandable language the meaning of these names. From this knowledge, one will be able to differentiate between the various types of paints offered to him by the industry and to select the products best suited to his specific needs.

Alkyd

For many years the vehicles or liquid portions of paint were based on vegetable oils, principally linseed oil, which were sometimes blended with natural resins such as rosin. For exterior house paints, linseed oil was usually the only vehicle. For interior usage and for enamels, natural resins were added to the linseed oil to obtain faster drying, more gloss or more wear-resistant films. The oils and resins were cooked together in small open kettles made of iron or copper and the recipes were closely guarded secrets belonging to the varnish maker.

In the 1930s a new type of vehicle made its entrance into the paint industry. This new vehicle was a synthetic or manufactured resin known as an alkyd. Alkyd resins had many advantages over previous oil or oleoresinous (oil and resin) vehicles. The alkyd resins were first widely used in enamels because of their durability and toughness.

The name "alkyd" was coined to show that alkyd resins are made from an alcohol, such as glycerol, and an acid, such as phthalic anhydride. The hard resin obtained from the reaction of glycerol and phthalic anhydride is not usable and oils such as linseed oil must be processed with the glycerol and phthalic anhydride to make a usable resin solution. The resulting resin is said to be oil modified and is the type used in paints.

The type and amount used in the process determines the properties of the finished product. The vegetable oils are often heated or refined by other means before they are used with the alkyd resin. Linseed and soya oil are the most commonly used vegetable oils found in alkyds. The soya-modified alkyd resins are the type found in non-yellowing architectural enamels.

It is possible to obtain a wide range of properties by varying the amount of oil used in processing the alkyd resin. The "long-oil" alkyd contains a high percentage of oil; consequently these resins are used in exterior enamels, such as trim enamels which require flexible films. The alkyd resins contribute to these exterior enamels' improved gloss retention, nonfading qualities and good weathering properties.

Where faster dry and harder, wear-resistant films are required, as for porch and floor enamels, quick-drying enamels and interior enamels, the "medium-oil" and the "short-oil" alkyds are generally used. As the name implies, these resins contain less oil and therefore are faster drying, harder and less flexible. In addition to toughening the paint film, these alkyds promote good color retention and produce excellent self-sealing qualities.

Short-oil alkyd resins are sometimes highly processed to produce very heavy body. Such resins are used in high quality flat wall paints, which show excellent self-sealing qualities and superior color uniformity when applied.

Most appliances found in the home —stoves, refrigerators and washing machines—are painted with an alkyd type enamel. These enamels also are used on automobiles, boats and many other items.

The alkyd paints are far superior to conventional oil or oleo-resinous paints and if usage demands an alkyd type paint, one should always specify an alkyd paint and accept none of the cheaper conventional oil or oleo-resinous paints as substitutes.

Vinyl latex

One of the greatest impacts ever made on the surface coatings industry was the introduction of the latex type paint. The advantages of quick-drying, lack of odor, washability and safety resulted in rapid customer acceptance of properly formulated latex paints.

Today there is marketed a relatively new type of paint known as

---

This address by Mr. Jones, specification department chief for Graham, Anderson, Probst & White, Chicago architects-engineers, was given before the annual sales meeting of The O'Brien Corp., paint manufacturers of South Bend, Ind., last fall. A registered architect, he has worked on a painting technical subcommittee for the Chicago Chapter, Construction Specifications Institute.

vinyl latex. The word "vinyl" is well known to the public as a tough, durable type of floor covering. The vehicle (liquid portion) of vinyl latex paints is made from a substance very similar to the vinyl in floor coverings.

While there are several kinds of vinyl materials, the type of vinyl which is considered best for paints is a polyvinyl acetate latex emulsion, better known as vinyl latex. A latex emulsion is defined as a suspension of rubberlike particles in water.

The polyvinyl acetate latex emulsion is prepared by a process called emulsion polymerization. The starting material is a clear liquid, vinyl acetate, which itself may be made by reacting acetylene with acetic acid (found in vinegar). The vinyl acetate is mixed with water in the presence of heat and a catalyst or accelerator. The vinyl acetate then reacts with itself to form large molecules of polyvinyl acetate, which are literally thousands of vinyl acetate units joined together.

In the polyvinyl acetate latex emulsion, the resin itself is dispersed as tiny, soft, round particles throughout water emulsion. When applied to a surface, the water evaporates and the resin particles flow together to form a film. This film does not require a long drying or oxidation step as in conventional oil or alkyd paints. Instead it hardens practically as soon as the water evaporates and may be recoated after only two hours dry and after 24 hours has completely hardened to a tough durable, washable film.

When vinyl acetate is the only starting material in the polymerization process, the resulting resin is referred to as a homopolymer. Vinyl acetate also may be reacted with other raw materials to produce a large variety of resins known as copolymers. These resins as expected show a wide range of properties quite different from the homopolymer, but are still referred to by the general term "vinyl latex."

The physical qualities of vinyl latex paints are outstandingly superior in both interior and exterior finishes. The easy application by either brush or paint roller, the absence of paint odor, the self-sealing quality, the excellent alkali resistance and, above all, the exceptionally uniform, flat appearance of the vinyl latex paint are qualities which recommend its use in interior paints. For exterior surfaces, the excellent adhesion, nonfading quality, good alkali resistance, and blister resistance due to its "breathing" film are typical qualities of a well-formulated exterior vinyl latex paint.

The first widespread usage of vinyl latex paints was in painting exterior masonry surfaces. The next usage, which has met with excellent customer acceptance, was as an interior flat wall paint. Recently vinyl latex exterior paints for wood have been introduced. Vinyl latex paints have also been sold commercially as semigloss interior paints and as porch and floor enamels.

Vinyl latex paints are in a class by themselves and should always be designated vinyl to distinguish them from other latex paints. They have more desirable features than any other latex paints.

Rubber base (butadiene-styrene latex)

The first latex introduced to the paint industry was butadiene-styrene latex, which is chemically similar to the synthetic rubber widely used during World War II. Butadiene-styrene latex paints are also called rubber base or sometimes just latex paints, although vinyl and acrylic latex paints also are classified as latex paints.

As with the vinyl latex, the butadiene-styrene resin in its latex emulsion is suspended as tiny soft spheres in water. When applied to a surface, the water evaporates and the latex spheres flow together, forming a film.

As interior wall paints, the rubber base paints have many of the advantages of other latex paints, such as easy application, fast dry, absence of paint odor and easy cleanup of equipment. Later developments in the latex paint field have greatly improved this type of paint and the rubber base paint has been outmoded by vinyl latex paints. The rubber base or butadiene-styrene paints have certain weaknesses, such as inferior sheen uniformity and disagreeable odor. They also require about 30 days to develop hardness and washability. When completely dry, specially formulated butadiene-styrene paints develop very good alkali and water resistance. These properties may be utilized in latex porch and floor paints.

In addition to their use as interior wall paints, the rubber base paints have also been used as exterior paints for masonry, although they have never received widespread customer acceptance as have the vinyl latex and the acrylic latex paints.

It might be well to mention here that the word "latex" means milky liquid and does not necessarily refer to rubber. To differentiate between the various types of latex, each type should be designated, for example, as butadiene-styrene latex, vinyl latex, etc.

The solvent type rubber base paint is sometimes confused with the rubber base (butadiene-styrene) latex paint. The solvent type rubber base paint is either of two types: chlorinated rubber or butadiene-styrene. Both types require strong solvents. These paints are generally used on exterior masonry surfaces, including swimming pools. Their chief disadvantage is the presence of strong solvent, which results in a disagreeable and irritating odor.

Acrylic latex

Since the introduction of latex paints over 10 years ago, the chemists have been busy searching for a new and better resins with improved qualities over present materials. The use of vinyl latex was an outgrowth of this research. Another latex which has met with considerable success in the paint field is acrylic latex.

The acrylic resins are made from starting materials similar to the vinyl resins. As with the vinyl latex, the acrylic resin is dispersed as tiny soft droplets in water. When applied to a surface, the water evaporates and the droplets flow together to form a film.

The strong point of the acrylic paint is its very good water resistance, which on the other hand can be a disadvantage in that brushes, if allowed to dry, are almost impossible to clean. The acrylic latex also forms a very elastic, flexible film. In comparison with vinyl latex paints, the acrylic paints have a more disagreeable odor, bubble during roller application, have shorter wet edge time and do not have the practical uniform finish features of the vinyl latex paints. On exterior exposure, the acrylic paints have a tendency to pick up dirt and sometimes do not have the fade resistance of the vinyl latex paints.

Other latexes

At present, the paint chemist has at his disposal three principal types of latex emulsion systems: vinyl latex, butadiene-styrene latex (rubber base) and acrylic latex. With the emphasis on the expanded use of emulsion paints, new latex emulsions are the object of continued research by the paint and chemical industries. Relatively new and still limited use of latex paints today includes porch and floor paints, exterior paints for wood as well as masonry, interior semigloss enamels, and industrial metal primers, particularly for the automotive industry. As new and improved latex emulsions are discovered, it is conceivable that latex paints can be formulated for practically all applications which now use solvent type paints or lacquer.

No one can predict what new latex emulsions will be used by the paint

industry 10 years from now, but one prediction is fairly safe: the use of latex as a paint vehicle can only increase in the 1960s.

Expoxies: their use in architectural coatings

In the history of the coatings industry, no new synthetic material has appeared which has lent itself to such a wide variety of applications and economic and technical utility as does epoxy. Technically, epoxy resins are condensation products of epichlorhydrin and bis-phenol A.

As surface coating materials, epoxies may be divided into two grades: catalyzed epoxy resin coatings and epoxy ester coatings.

Epoxy ester coatings behave much like alkyd resin coatings, but are markedly superior in water and alkali resistance. They may be applied by brushing, rolling, spraying or dipping. They are used as floor varnishes, spar varnishes, masonry finishes, primers and general maintenance paints where better than normal durability is expected or required.

Catalyzed epoxy resin coatings are unique in that they are packed in two containers—not to be mixed until they are to be used. When once mixed on the job, they must be used within a specified time, usually between two and six hours depending on the particular product.

These coatings represent the ultimate in chemical alkali, acid and water resistance available today. In addition, as a class, they have outstanding adhesion, flexibility, abrasion resistance, impact strength and hardness.

Since air-dry coatings based on catalyzed epoxy resins can exhibit a degree of general chemical and solvent resistance associated with baked coatings, they are widely used in maintenance applications. Prime areas are breweries, dairies, paper plants, chemical plants, battery plants, dye houses, plating rooms and even atomic plants.

High film thickness up to 20 mils or more may be applied in one coat over any substrate: masonry, cinder block, etc., where its excellent adhesion will prevent the coating being loosened from the surface by vapor pressures being built up inside the block. Its high film thickness and impermeability prevent moisture penetration from the outside and efflorescence from the inside.

A notable use of catalyzed epoxy resins is in making a floor coating or cement substitute. This is a pure epoxy resin mixture together with an appropriate catalyst, filled with the proper type and quantity of sand aggregate.



METAL PANS, 26-gage cold rolled units which clip-lock together, are laid on concrete subslab.

Hollow floor system serves dual purpose in bank job

Design of Puget Sound National Bank Branch in Tacoma called for extensive glass on all four sides, an attractive solution, but one that came with built-in air conditioning and heating problems.

These were neatly solved by using a hollow floor system called Airfloor, providing both a radiant floor and a perimeter air duct system with heating and air conditioning in one installation.

The system eliminated large ducts going through beams and up walls, impossible in this case because of the glass; provided the additional cooling surface needed due to the excessive exposure of glass; and eliminated necessity of insulating the ceiling below the floor. Use of the metal duct form also provided an easy means of raising the main banking floor above the drive-in deck level.

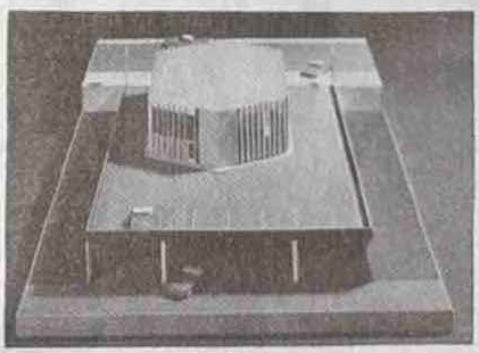
Light gray quarry tile is used as the finish over the main banking floor, offering a good surface for the radiant heat and an easily maintained one.

The Tacoma Avenue Branch is located directly across from the County-City Building. The program spelled out a pleasant, walk-in banking facility; a drive-in operation capable of adequately handling traffic flow off of Tacoma Avenue without undue congestion; and provision for parking spaces below the banking floor, accessible from the alley which is 13 ft. below the main street.



Norman Erickson photos

FLOOR SYSTEM is covered with another concrete slab about 1½ in. thick.



PARKING FACILITIES accommodate six cars on upper deck, 18 below in covered area.

In order to separate the pedestrians from the automobile traffic, architects-engineers Worthen, Wing, Seifert & Forbes designed a pavilion type structure affording circulation around the entire structure to accommodate drive-in patronage and with the sidewalk adjacent to the front entrance to accommodate foot traffic.

Main banking floor has 2,490 sq. ft., comprising the lobby, teller area, bank offices, conference room and vault. The entire area is enclosed by gray heat-absorbing glass, white laminated vertical wood mullions and a luminous ceiling. Roof structure is wood frame with laminated beams supported by steel columns running from the roof through the main floor to the basement for stability.

exterior panels

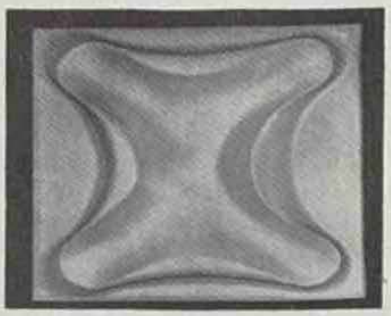
Exterior plywood permanently finished with a color acrylic overlay is being marketed by Georgia-Pacific. Presented as a low initial cost, low maintenance product, the double-overlaid Douglas fir panels were extensively field tested in all-weather conditions before being introduced. They can be used as fascias, feature walls or for entire buildings, either as a curtain wall material or as an integral structural part of the building. No on-the-job painting or other surface treatment is needed. Material is being manufactured in a variety of sizes and thickness and in four colors. All panels are edge sealed at the factory unless ordered otherwise.—Georgia-Pacific Corp., Equitable Bldg., Portland 4, Ore. (No. 1)

repeatless wallpaper designs

For those who wonder where wallpaper went, W. P. Fuller last month unveiled an imported line whose striking designs and color patterns should give a real lift to this often forgotten field. Heavy duty, vinyl coated wall covering made in Germany features repeatless designs which do not need to be matched when hung, designs by internationally known artists and machine-made repeat patterns ranging from 16 to 40 in., compared to domestic paper repeat maximums of 22½ in. Repeatless pattern process resolves the constant repetition of a single pattern into endless continuity and is protected by an international patent. Marburg wallpapers include both picture stories—Boulevard life in Paris, Porgy and Bess, etc.—and abstract designs.—W. P. Fuller & Co., 301 Mission St., San Francisco, Calif. (No. 2)

sculptured ceramic veneer

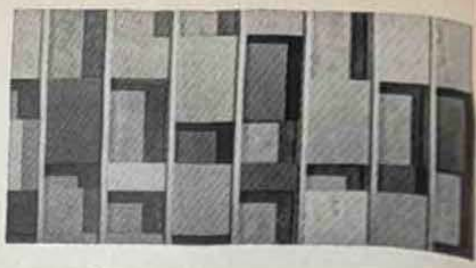
A three-dimensional architectural facing material called Contour C. V. fills the growing need for an economical



sculptured ceramic veneer. Product can be made in various dimensional projections is sizes up to 12x12 in. at the present time. It is light in weight, has a low coefficient of expansion and is available in a range of colors. Since pieces can be glazed on either side, Contour can be used in bas- or incised-relief.—Gladding, McBean & Co. 2901 Los Feliz Blvd., Los Angeles 39, Calif. (No. 3)

air handling troffer

Thomas Industries and Tuttle & Bailey have teamed up to produce a high-capacity air handling troffer adaptable to any type drop ceiling. Units provide light and cool or warm air from a single concealed ceiling fixture. Air passageway is completely isolated from the troffer housing by fiberglass insulation and an insulating air gap, thus removing possibility of temperature variations affecting light output. Air handling capacity is from 0 to 200 cu. ft. per minute from a single 1x4- or 2x4-ft. unit. For the troffers, Tuttle & Bailey have developed a line of diffusing dampers to reduce sound levels and avoid pressure buildups. Benjamin troffers have a shallow depth of 4⅞ in. at ends so that beams and pipes in the plenum may be easily cleared. Side-mount hanger eliminates overhead yokes and supports.—Thomas Industries Inc., 207 E. Broadway, Louisville, Ky. (No. 4)



versatile screen components

Custom-designed screens utilizing standard components are possible with a system marketed under the trade name Curtainscreen. Stock aluminum and plastic components can be used to form single- or dual-plane screens for three-dimensional effects and for free-standing screens in a wide range of types and sizes. Basic components of Curtainscreen form a coordinated group of interlocking, slip-fit extrusions, mullions, panels, spacers and glass stops. Aluminum sections are furnished in a variety of finishes. Plastic units are black and will be available in colors later. These components can be used alone or in combination with other materials. Aluminum panels are available in widths from 4 to 8 in. and in lengths up to 20 ft.—Julius Blum & Co., Inc., Carlstadt, N.J. (No. 5)

fluorescent fixtures

Completely enclosed fluorescent surface lighting fixtures only 3½ in. deep are being offered by Litecraft under the designation Series S16. Fixtures feature end plates of gold anodized aluminum or enameled steel and wrap-around prismatic diffuser extruded from clear polystyrene. Glare-free light is concentrated downward, while angled sides direct light out on the ceiling for maximum indirect lighting benefits. Series is designed for individual mounting or in continuous runs and for easy installation and maintenance. — Litecraft Manufacturing Corp., 545 Rodier Drive, Glendale 1, Calif. (No. 6)

entrance doors

Libbey - Owens - Ford has added a rough plate glass tempered door to the firm's line of Tuf-flex doors for building entrances. The glass has slight configuration on both surfaces, producing a translucent textured appearance while retaining relatively high light transmission. Doors are available in ½-in. thickness in three styles and equipped with aluminum, bronze or stainless steel fittings.—Libbey-Owens-Ford Glass Co., 811 Madison Ave., Toledo 1, Ohio. (No. 7)

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

MAY 1961
(After June 30 write directly to manufacturer)

1 2 3 4 5 6 7
8 9 10 11 12

Name

Title

Firm

Address

City Zone State

plastic coated paneling

Two national firms have joined forces to develop a method of bonding a clear, plastic film to wood by the roll-laminating process to produce a line of decorative plywood wall paneling and doors marketed under the name Weldwood Permagard. Manufacturer, U. S. Plywood, says cost of this technique is considerabl less than that of high-pressure plastic laminates since it is a one-stop operation and laboratory tests show Permagard lasts longer. Cost is estimated at about 20% higher than the firm's top grade Weldwood prefinished line. The film, Videne, is produced by Goodyear Tire and Rubber.—United States Plywood Corp., 55 W. 44th St., New York 36, N.Y. **(No. 8)**

soundproof movable partitions

Described as "a folding partition with the sound insulation charcteristics of a solid masony wall," Modernfold's Soundmaster 240 has an average sound attenuation of 41.8 decibels, surpassing that recommended for walls between apartments. To accomplish this, it has 12 separate layers of material, two of which are 24-gage steel measuring 5⅝ in. wide. In addition, all four horizontal edges are double insulated. Vinyl fabric is back coated with an aluminized layer for dimensional stability. Available in single units up to 25 ft. high by 60 ft. wide Soundmaster's price tag is reported to be about one-half that of wide-panel folding wall type partitions—New Castle Products Inc., Box 353, New Castle, Inc. **(No. 9)**

glass bonding agent

Glasshesive, a flexible, epoxy-resin adhesive formulated especially for bonding glass to glass, should open up new vistas in the design and construction of glass panels. Product forms a permanent, transparent and shatterproof bond line, waterproof and resistant to sunlight. It is a controlled-flow liquid adhesive mixed just before use. Glasshesive also can be used to join glass to concrete, masonry, metals, most plastics, marble and similar structural materials.—Adhesive Engineering, 1411 Industrial Road, San Carlos, Calif. **(No. 10)**

exterior tile adhesive

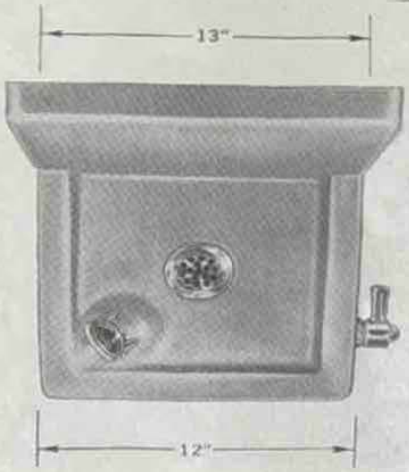
Cost of installing exterior ceramic tile should be reduced with introduction of a thin-set adhesive which cuts down overall thickness and weight of the panels. Called MA-450, the product is a high-strength waterproof rubber base adhesive with nonoxidizing resins. It will bond to any rigid, dry, hard, clean surface. Recommended surfaces are concrete, metal, cement-asbestos board or other materials structurally strong enough to support the weight load. For prefabricated panels, cement-asbestos board and metal are preferred. Adhesive was recently used to construct prefabricated curtain wall panels faced with 45,000 sq. ft. of ceramic mosaic tile at the Philco Research Center in the East.—Miracle Adhesives Corp., 250 Pettit Ave., Bellmore, L.I., N.Y. **(No. 11)**

aluminum frame coating

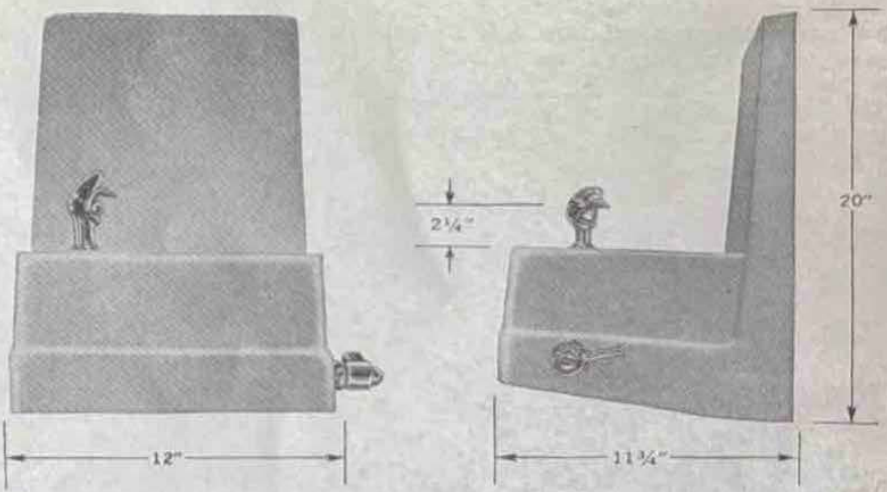
An aluminum coating that provides protection from damage by wet mortar or cleanup products for 30 days has been introduced by Johnson's Wax. Called Perma-Cote 61, the all-polymer coating prevents etching by the highly alkaline mortar used in construction and the muriatic acid used in post-installation cleanup. It is colorless, nonyellowing and forms a tough, glossy film that dries within two to three minutes at room temperatures.—S. C. Johnson & Son, Inc., 1522 Howe, Racine, Wis. **(No. 12)**

ANOTHER HAWS PROJECTION OF STYLE

HAWS MODEL 71



The essence of modern styling is simplicity . . . clean lines, completely functional—with a unity of form that says, "For this object, this shape is right." Fiberglass construction, color selection (at no extra cost!) and HAWS Craftsmanship are also "right." Your Sweet's File can give you more details. Or write to HAWS for the comprehensive catalog.



Since 1909 HAWS DRINKING FOUNTAINS

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street • Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California

Interiors Book of Restaurants. By William Wilson Atkin and Joan Alder. Whitney Library of Design, 18 E. 50th St., New York 22, N.Y. 1960. 215 pp. $15.

This handsomely laid out and lavishly illustrated book is a must for the architect and interior designer engaged in restaurant work; and the picture portfolio of some of the best projects produced over the past several years holds interest for every reader. First section is aimed primarily at the new restaurateur although the designer in this field will find it a source of useful background knowledge which is practically essential to meeting his client's requirements. In the next section a full design program is set forth. And finally are the restaurant designs themselves, drawn from all over the U.S. as well as from Europe, with a good number from the West.

Five California Architects. By Ester McCoy. Reinhold Publishing Corp., 430 Park Ave., New York 22, N.Y. 1960. 208 pp. $10.

First full study of the pioneering work in modern architecture of Bernard Maybeck, Charles and Henry Greene (this section by Randell L. Makinson), Irving Gill and R. M. Schindler. The publisher's promotional literature accurately sums up the book when it says: "Here is the exciting history of the rise of the California school of architecture as seen through the work of five men who gave it impetus and direction. Author Ester McCoy writes from the viewpoint of one who has been closely associated with both architects and their achievements. She brings to this book not only a profound understanding of their professional careers and major works but also a penetrating critical approach of their legacy to the present generation of architects.

"The book reflects the vitality, the imagination, the eagerness to experiment with new forms and materials that characterize the contributions of Maybeck, the Greenes, Gill and Schindler to the growth of American architecture. Many of the striking photographs were taken by the author herself to illustrate design innovations traceable to these men, such as the glass wall with sliding doors, the shed roof with wide overhang, the movable non-bearing partitions, the use of poured concrete and the first small low cost homes. These photographs, along with an abundance of drawings and design plans, will serve as a source of inspiration for today's builders and designers."

Hospitals, Clinics and Health Centers. By the editors of Architecural Record. F. W. Dodge Corp., 119 W. 40th St., New York 18, N.Y. 1960. 265 pp. $9.75.

A fully illustrated survey of medical buildings, encompassing projects completed within the past five years, with 60 presentations and discussions.

Design of Prestressed Concrete Beams. By William H. Connolly. F. W. Dodge Corp., 119 W. 40th St., New York 18, N.Y. 1960. 252 pp. $11.50.

Places major emphasis on elastic design for bending; gives consideration to prestress losses, shear and ultimate flexural strength; and uses the report of ACI-ASCE joint committee 323, "Tentative Recommendations for Prestressed Concrete," as a guide in considering these important factors. It contains over 120 tables, charts and diagrams applicable to I-beams, T-beams, long-span members and composite sections.

Estimator's General Construction Man-hour Manual. By John S. Page. Gulf Publishing Co., Box 2608, Houston 1, Texas. 1960. 218 pp. $10.

Gives the reader an accurate and convenient method of estimating direct labor in 17 areas: demolition; grading and structural excavati concrete roadways; sheet, steel mesh; miscellaneous items; concre masonry; structural steel and misc laneous items; carpentry and mi work; metal doors; sash glass a ceilings; roofing and siding; ornam tal metal and special partitions; pai ing.

Planning the Surgical Suite. By Warw Smith. F. W. Dodge Corp., 119 W. 40th S New York 18, N.Y. 1960. 456 pp. $12.75.

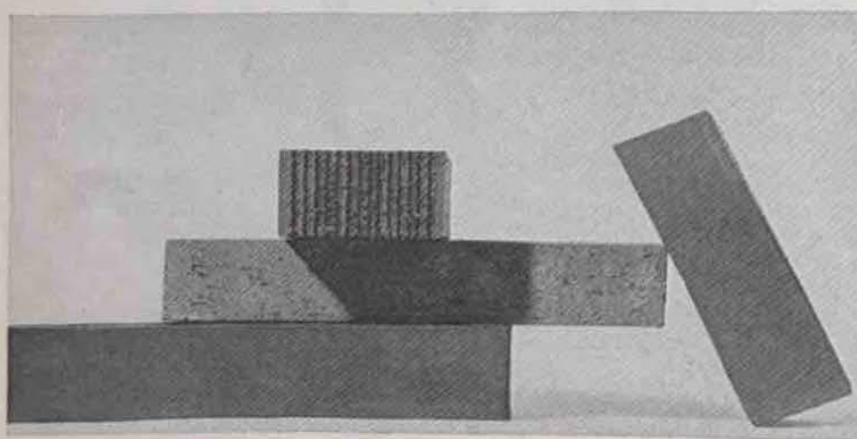
Explains how the intended functio of a surgical suite affect its organ zation and design, describes the met ods of translating these needs in actual facilities and provides a com plete analysis of functional require ments of the operating room comple

Industrial Architecture: An Analysis of I ternational Building Practice. By James Munce. F. W. Dodge Corp., 119 W. 40th S New York 18, N.Y. 1960. 240 pp. $14.75.

A comprehensive review of the bas principles and newest development in factory design in the U.S., Grea Britain and Germany. It covers his tory of industrial building design, ex amines its present state and empha sizes changing trends and their impli cations for the future. The author i the senior partner of an architectural engineering firm which practices i London and Belfast.

The Northern California Metropolis. B Karl H. Baruth. The National Press, Pal Alto, Calif. 1960. 24 pp. $8.

This 13x11-in. publication, which comes with a map entitled "Metropoli tan Coordination of Territorial Activi ties" and sketch paper, has been pre pared to 1) stress the need for a balance relationship between the total quantum of employment and the num ber of local residences in order to minimize the need for commuting; 2) propagate a new concept of a basic metropolitan planning unit — "the



There's a quiet dignity, a quality of everlasting beauty in a church built of brick. Architects are enhancing this inherent charm by creative design, utilizing various of the colors and shapes produced by **builders brick co.** Seattle

Distributors... VANCOUVER, B.C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co. • Oregon: PORTLAND, Columbia Brick Works; SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.

quarter"—with 250,000 inhabitants; 3) advocate a multiple-nucleated regional settlement pattern instead of a single dominant center; 4) establish assumptions, objectives and planning principles and visualize a long-term forecast to the year 2010 of a physical pattern for the urban part of the metropolitan region; 5) work toward acceptance by the public and the local authorities of a recognized region-wide administration, with constructive duties and the power to plan and to implement physical changes in the planning area. Author is city and regional planning consultant for San Mateo, Calif.

Mechanical-Electrical Equipment Handbook for School Buildings. By Harry Terry. John Wiley & Sons, Inc., 440 Park Ave. S., New York 16, N.Y. 1960. 412 pp. $9.50.

Devoted exclusively to the topics of installation, care and use. Appendix contains a description of the duties of an architect-engineer team which a school board might select to prepare plans and specifications for the construction and equipment of a school building. A contractors' administrative manual also is included here.

Reinforced Concrete Column Tables, Ultimate Strength Design. By Hugh F. Fenlon. F. W. Dodge Corp., 119 W. 40th St., New York 18, N.Y. 1960. 300 pp. $15.

A major working tool for the structural engineer and designer, with 8,568 reinforced concrete column designes presented in full-page tables. All computations are in accordance with the ACI building code and cover rectangular columns up to 36 in. in diameter.

Building and Construction Terms. By Benjamin Lipowsky and Murray Berstein. Arco Publishing Co., 480 Lexington Ave., New York 17, N.Y. 1960. 57 pp. $5 (clothbound); $3 (paperback).

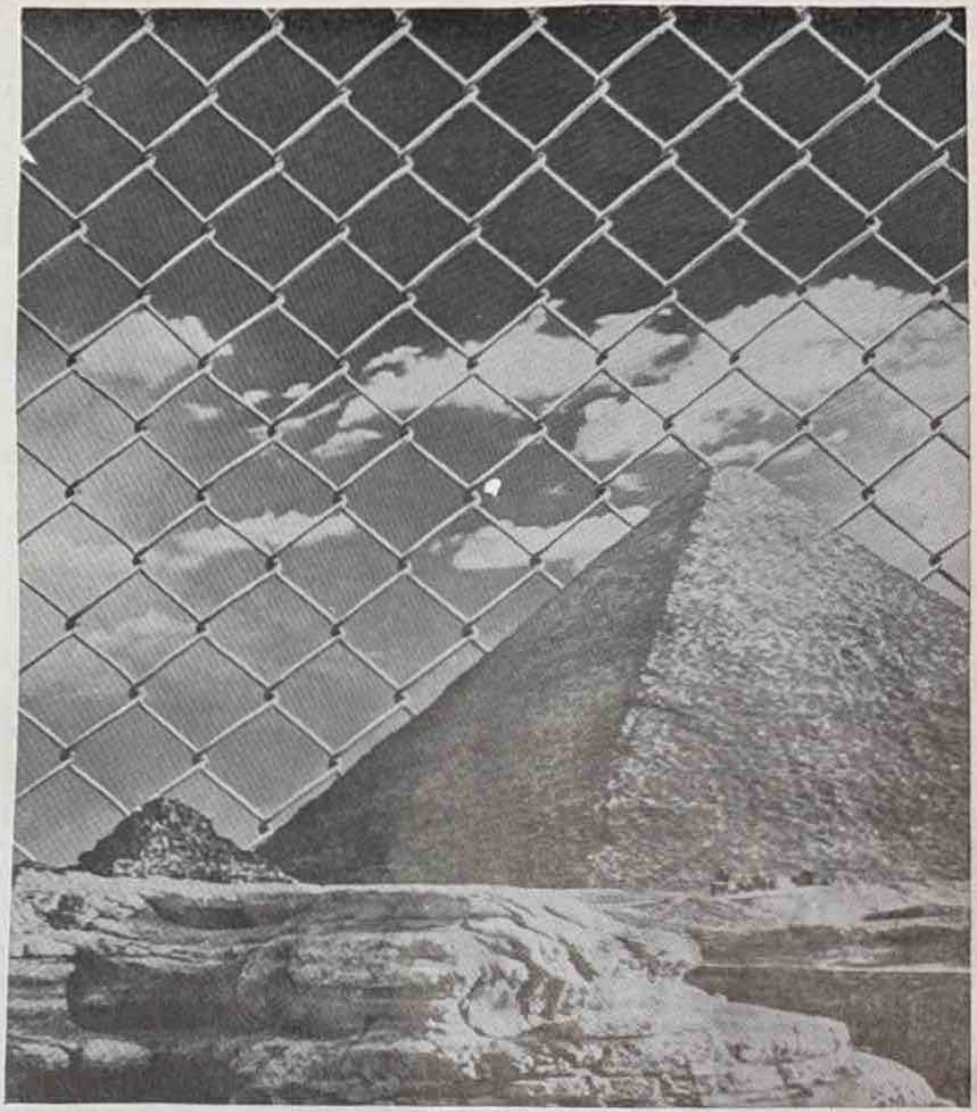
Consists of two basic sections: conventional definitions followed by 21 illustrative diagrams giving the grouping of building terms by family.

Erecting Structural Steel. By Samuel P. Oppenheimer. McGraw-Hill, 327 W. 41st St., New York 36, N.Y. 1960. 272 pp. $9.50.

Ranges in coverage from basic planning of structures to the installation of roof and beams. Author is a professional engineer engaged in managerial work for a general contracting company.

The Measure of Man. By Henry Dreyfuss. Whitney Library of Design, 18 E. 50th St., New York 22, N.Y. 1960. $4.95.

A portfolio of 16 diagrams, including life-size figure charts of the male and female providing all the essential measurements.



Realock Fence is built to last a long time, too!

Made of top grade steel wire, Realock Fence is strong and durable . . . and is heavily galvanized to resist corrosive elements.

Available in a wide variety of styles, Realock Fence is ideal for protection of buildings, grounds and equipment . . . and is widely used in right of way installations where limited access is essential. For a free estimate, call the nearest CF&I office.



THE COLORADO FUEL AND IRON CORPORATION

• **Gladding, McBean & Co.,** has named Allan Paul as advertising and public relations manager, servicing all product and administrative divisions from the Los Angeles headquarters.

• **Weyerhaeuser Co.'s** Rilco Engineered Wood Products Division will be moved from St. Paul to Tacoma August 1.

• **Inland Steel Products Co.** has opened a warehouse operation at 672 Townsend St., San Francisco. The company has two other installations in California: a branch sales office in Los Angeles and a manufacturing plant for its roof deck in Fremont.

• **Johns-Manville Corp.** has entered an agreement with Bestwall Gypsum Co. and Certain-teed Products Corp. whereby J-M will market a complete line of gypsum wallboard and plaster building products. Among plants supplying both materials is one located at Sigurd, Utah.

• **Colorado Fuel & Iron Corp.'s** Pacific Coast division has moved into its new Seattle office and warehouse at 2200 Sixth Ave. S.

• **Evans Products Co.** has elected Emory Moore of Portland as a vice president. He is executive vice president of Fiddes-Moore & Co., an Evans subsidiary.

• **Planett Manufacturing Co.,** Downey, Calif., producer of electrically welded steel wire mesh for reinforcing concrete, has been purchased by another California firm, American Pipe and Construction Co., Monterey Park. Under the new setup, Planett becomes a division of Etiwanda Steel Producers, Inc., a source of reinforcing rod and wholly owned subsidiary of American Pipe. Earl Planett, former president, remains in charge of welded wire mesh production.

• **K-Lath Corp.** has appointed J. R. (Bob) Smith as architects' service representative in the Pacific Coast states.

• **United States Plywood Corp.** has appointed Marshall R. Leeper as vice president in charge of its West Coast manufacturing operations. He will remain in Eugene where he will continue direct supervision of the firm's Oregon division facilities.

• **Bestwall Certain-teed Sales Corp.** has opened a sales office and asphalt roofing warehouse at 2670 Leonis Blvd., Vernon, Calif.

• **Columbia Brick,** Portland, has expanded into a line of stone products now on display at its showrooms, 1320 S.E. Water Ave.

• **The Ruberoid Co.** has appointed Charles M. Hopper to its mastic tile division as a sales representative in the Los Angeles area.

• **Tubular Structures Corp. of America** and **Tube-Strut Corp.** have moved into expanded office and production facilities at 4560 Sperry St. in Los Angeles. The firm also has made several appointments: Jay Stine, sales manager, shoring and scaffolding division; Pat Ballou, sales engineer, shoring and scaffolding division; Gunther Piepers, sales engineer, Mayco-Weitz Tower Crane Division; Buck Buckingham, sales manager, grandstands and bleachers; Marcia Friedman, assistant advertising and sales promotion manager; Michael Grunfeld, chief engineer; and Dick Henneuse, project engineer.

• **Simpson Timber Co.** has promoted Harvey H. Warnaca from insulating board products sales manager to general sales manager. He has been with the firm since 1949.

• **Air Control Products, Inc.,** has opened a warehouse at 690 Stockton Ave., San Jose. Manager is Lee Downey.

• **Riverside Cement Co.** is building a plant to produce white cement at Crestmore, Calif., first of its type in the West. Production is expected to begin around the middle of the year.

• **Los Angeles Brick and Clay Products Co.** has named its sales manager, Robert G. Reordan, as a vice president. Albert E. Massen has been named treasurer-controller and John G. Baer, plant superintendent.

• **The General Tire & Rubber Co.** has appointed Pacific Floor Products as distributor for its Bolta-Floor vinyl line in northern California. Main office of the firm is in San Francisco.

• **Consolidated Western Division** of U. S. Steel Corp. has moved into new Phoneix office and plant facilities at Madison and 51st Avenue.

• **Sani-Top, Inc.,** West Coast fabricator of sink tops, is expanding operations to include manufacture of plastic laminates for wall paneling, room partitions and other building and furniture uses. Initial production will begin soon at newly acquired plant facilities in Gardena, Calif. Sales will be headed by Charles N. Cone.

• **Owens-Corning Fiberglas Corp.** has opened a sales office at 685 Auahi St., Honolulu. Manager of the new office



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

- West's largest architectural circulation
- Highest readership
- Lowest rates and cost per thousand

A Pacific Builder & Engineer, Inc., publication
1945 Yale Place East Seattle 2, Washington

is John A. Sommer, who has been with the firm 10 years in field sales positions in Los Angeles and Sacramento. Most recently he was director of California state services.

• **Auminum Company of America** has formed a wholly owned subsidiary to market residential aluminum building products. To be called Alcoa Building Products, Inc., the company will be headquartered in Pittsburgh, Pa. Marketing plans, as outlined in the announcement, call for retention of present distributors in the West: Flintkote Co.; Philip Carey Mfg. Co.; Bird & Son, Inc.; Jones & Brown Division, the Mastic Corp.; and Barrett Division, Allied Chemical Corp .

ASSOCIATIONS

• **Red Cedar Shingle Bureau** four-color consumer advertisement, prepared by Botsford, Constantine & Gardner, Inc., has been judged the best magazine insertion produced in Washington during 1960 in the annual competition sponsored by the Seattle Advertising Club.

• **Western Pine Association** at its 30th annual meeting in San Francisco March 8-11 picked J. B. Edens of Southwest Forest Industries, Inc., Phoenix, as president. Completing the slate are John S. Richards, Coeur d'Alene, Idaho, and Kenneth R. Walker, Atherton, Calif., vice presidents, and R. W. Rehfeld, Phoenix, treasurer.

• **Vermiculite Institute** held its 20th annual meeting in March in Chandler, Ariz., where it elected L. J. Venard of Minneapolis to the presidency.

• **National Lumber Manufacturers Association** has appointed Robert D. McPherson as regional manager of technical promotion in Seattle.

• **Northwest Building Subcontractors & Suppliers Association** has elected Buckie Taft of Seattle to a second term as president. He also heads Taft Structurals, Inc.

• **West Coast Lumbermen's Association** observed its 50th anniversary at its annual meeting held in Portland in March and elected William R. Garnett of St. Paul & Tacoma Lumber Co., Tacoma, as president. New vice president for Washington is Ben H. Gardner Jr. of Seattle. Among those re-elected: Nils B. Hult, Junction City, and Jack Fairhurst, Eureka, vice presidents for Oregon and California; William Swindells, secretary; Rick Middleton, treasurer; and Hal V. Simpson, executive vice president.

Two publications issued by AGC headquarters

Among the recent publications released by the AGC is one supporting the single contract method of construction and another devoted to field cost accounting.

The first, entitled "Save Construction Dollars with America's Basic Construction Method, the Single Contract System," states that about 95% of federal contracts and 85% of the states use the single contract method, as well as the overwhelming majority of local governmental and private contract awarding authorities. The 12-page brochure is available without charge.

"A Suggested Guide for Field Cost Accounting for Building Contractors" was developed by the AGC after consulting executives of some 80 leading firms about the forms they employed. Cost is $1.25 for AGC members; $2.50 for nonmembers.

Both publications can be secured through AGC headquarters at 1957 E St. N.W., Washington 6, D.C.

• **Howard S. Wright,** who for the last three decades has actively headed Howard S. Wright Construction Co.—a firm founded by his father in the Pacific Northwest more than 70 years ago—has received the Seattle Chamber of Commerce's first Construction Industry Achievement Award. The citation read in part: "The pioneering experience and creative work of his organization in the building of modern pulp mill facilities has developed specialized methods and construction techniques that are recognized nationally." The firm, which was responible for many major Northwest defense facilities, is one of the nation's 100 largest building construction companies.

• **Northern and Central California Chapter, AGC,** has added Paul N. McCarron to its staff as legislative advocate with headquarters in Sacramento. A member of the California State Bar Association, he has had about 20 years of experience in legislative work. The chapter also has named two new members to its Sacramento district committee: Chairman Henry Teichert of A. Teichert & Son, Inc., Sacramento, and G. E. McDaniel Jr., McDaniel & Burroughs, Marysville.

• **Arizona Chapter, AGC,** has elected H. Furman Byars of Isbell Construction Co., Phoenix, as president. Other officers are W. L. Hibbs, vice president; Gordon Marshall, treasurer; James R. McDonald, executive secretary; and Richard G. Kleindienst, legal counsel. All are of Phoenix except Hibbs who resides in Tucson.

• **Idaho Branch, AGC,** has moved into its new quarters at 110 N. 27th St., Boise.

• **Magnus L. Anderson,** 63, Seattle building contractor and a native of Norway, died March 31.



The ALEXANDER HAMILTON San Francisco

Just a few steps from the heart of the city, the Alexander Hamilton offers 200 spacious rooms, plus meeting and banquet facilities to accommodate 10 to 150 people.

Whether national or regional Convention—Association, Club or Business Group . . . Successful

Meetings begin at a HANDLERY HOTEL

PLAN NOW to hold your next meeting or convention in the "heart of the city" . . . at an experienced HANDLERY HOTEL. Write or call your Handlery Manager, or contact "Convention Manager", 631 O'Farrell Street, San Francisco.

- SAN FRANCISCO — The Alexander Hamilton, Hotel Stewart, Hotel Don
- FRESNO — Hotel Californian
- SAN DIEGO — The El Cortez Hotel, El Cortez Motel
- BAKERSFIELD — Hotel El Tejon
- MONTEREY — Hotel San Carlos
- ALAMEDA — Hotel Alameda
- OAKLAND — Lake Merritt Hotel
- RICHMOND — Hotel Don
- VALLEJO — Casa de Vallejo Hotel
- WOODLAND — Hotel Woodland
- OROVILLE — Oroville Inn
- GRASS VALLEY — Bret Harte Inn

HANDLERY HOTELS of California • 631 O'Farrell St. • San Francisco

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Builders Brick Company	30
Colorado Fuel & Iron Co.	31
Gladding, McBean & Company	IV Cover
Handlery Hotel	33
Haws Drinking Faucet Company	29
Macomber, Inc.	III Cover
Mahon, R. C. Company	10
Riverside Cement Company	II Cover
Rudd & Cummings, Inc.	32

not specified

some thoughts on the a

It was significant—and we like to think a good omen—that William H. Scheick chose the West for three of h initial public appearances as executive secretary of t American Institute of Architects. In Los Angeles he i stalled the Southern California officers; in Seattle h joined Washington State members for both a luncheo and a dinner and stayed on a couple of days longer tha he had intended; and in Montana he broke bread wit the Exchange Club when it presented the Great Falls So ciety of Architects the first "Outstanding Industry of th Year" plaque.

Mr. Scheick had learned quickly, of course, that re lations between the national headquarters and the We over the past several years have become strained, to sa the least. The Northwest District in particular has bee a constant thorn in the Octagon's side. It has been th feeling in these parts that the AIA, in essence, is no "located" in Washington, D.C., but in every city, tow and hamlet where a member practices his profession—a feeling that has not been reflected in the Octagon's oper ations. Undoubtedly a few of the grievances have stem med from petty reasons and on occasion have been re duced to personality clashes. But by and large, we fee the criticism has been of a constructive nature and ha been justified, principally because the line of communica tion between Washington, D.C., and the chapters ha been unsatisfactory and because on several importan but controversial issues (the package deal, for example) the national headquarters has buried its head in th sand—only to be raised when needled by entire region and chapters or individual members.

During the regional conference in Sun Valley last fall it already was becoming apparent to the Northwest tha the tide was changing. James Hunter, national secon vice president and a westerner (Boulder, Colo.), by th way, and Robert R. Denny, public relations counselor fo the Institute, bent a sympathetic ear to numerous com plaints and suggestions.

And it was heartening to read Mr. Scheick's own words when he introduced himself to the membership i the AIA Journal for January. He said in part:

"From a fairly intimate experience with national as sociations in Washington, I believe that a society's head quarters must not do two things: a) aggrandize itself as a self-perpetuating bureau and b) fall into the slough o doing only precisely what is asked of it. The successful headquarters will carry out the will of the membership as expressed through the policies of the directors and give its share of leadership with clear statements of con structive ideas generated or simulated by the staff."

It is concerning these very two points that most of the criticism has been leveled at the Octagon from the West. It would seem that the Institute intends to demonstrate the kind of leadership that should be expected from a professional society of almost 14,000 members. R.E.K.

WELCOME FRIEND: AIA's Big Chief Scheick receives scroll from John Morse on behalf of Washington State Chapter.

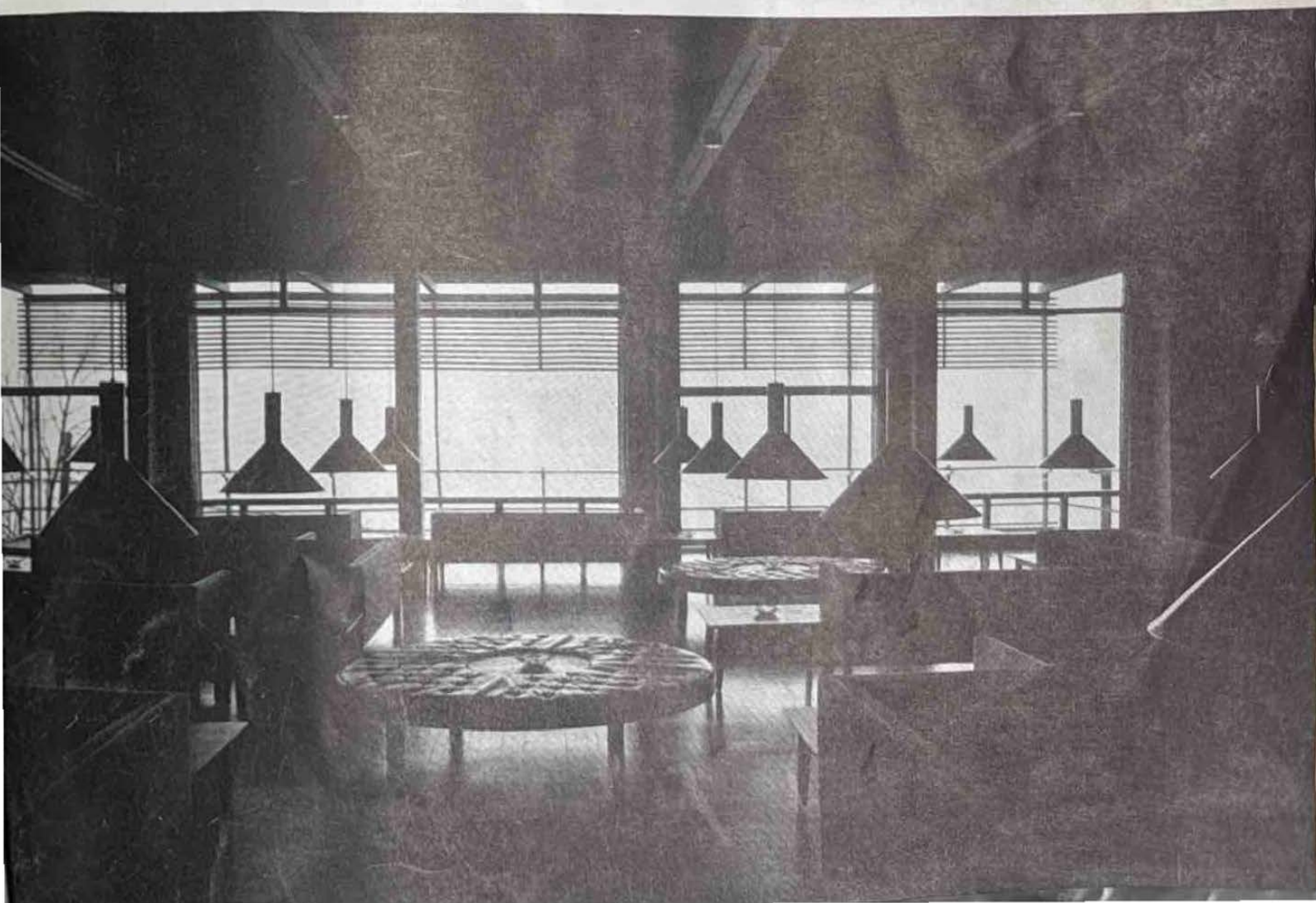


Pacific Architect & Builder

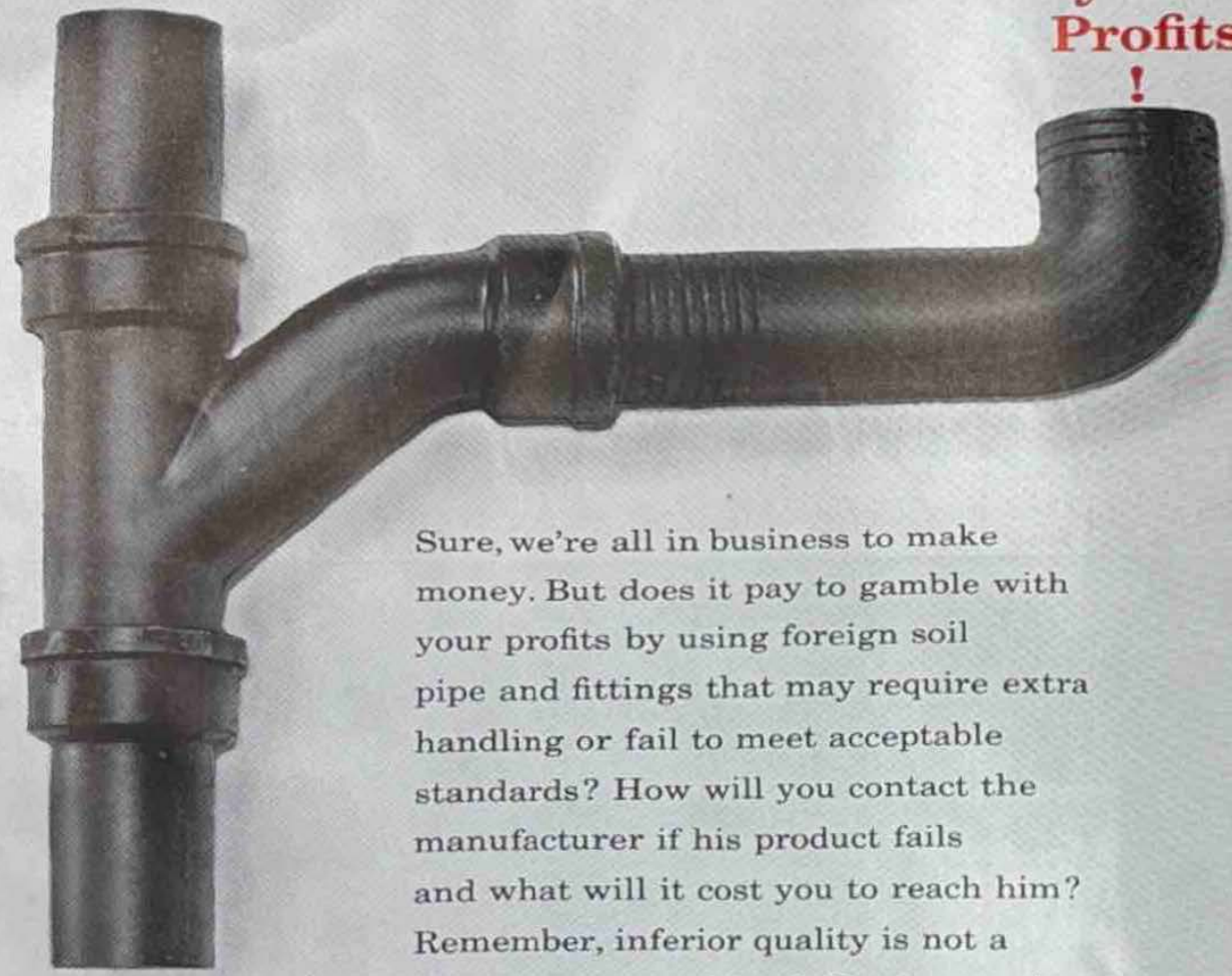
LIBRARY
SCHOOL OF ARCHITECTURE & ALLIED ARTS
UNIVERSITY OF OREGON

JUN 7 1961

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ JUNE 1961



Foreign Soil Pipe can DRAIN your Profits !



Sure, we're all in business to make money. But does it pay to gamble with your profits by using foreign soil pipe and fittings that may require extra handling or fail to meet acceptable standards? How will you contact the manufacturer if his product fails and what will it cost you to reach him? Remember, inferior quality is not a bargain at any price...before you make your next purchase of soil pipe and fittings get the full story of this "guaranteed difference"...write to:



The 50 year written guarantee is issued by the Cast Iron Soil Pipe Foundation to the home owner.

All are members of the Cast Iron Soil Pipe Institute.

CAST IRON SOIL PIPE FOUNDATION

Alabama Pipe Company · The American Brass & Iron Foundry · Rich Manufacturing Company

6723 SOUTH WESTERN AVENUE · LOS ANGELES 47, CALIFORNIA

Pacific Architect & Builder June 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

17 Student Union Building, Western Washington College of Education, Bellingham: Bassetti & Morse, Architects

21 Four Schools that Respect Their Locale

22 Armijo Elementary School, Albuquerque: Stanley & Wright, Architects

24 La Colina Junior High School, Santa Barbara, Calif.: Arendt, Mosher, Grant, Architects

26 Carbon High School, Price, Utah: Edwards & Daniels, Architects

28 Laupahoehoe School, Laupahoehoe, Hawaii: Fisk, Johnson & Perkins, Ossipoff and Preis, Associated Architects.

methods & materials

34 White Quartz Grillwork and Panels for a Seattle Temple

departments

6 As We Go To Press

8 Project Preview

10 Building Permits

12 The Building Month

15 T-Square Talk

36 PA&B Memo

38 Products

40 Literature

41 Manufacturers/Suppliers

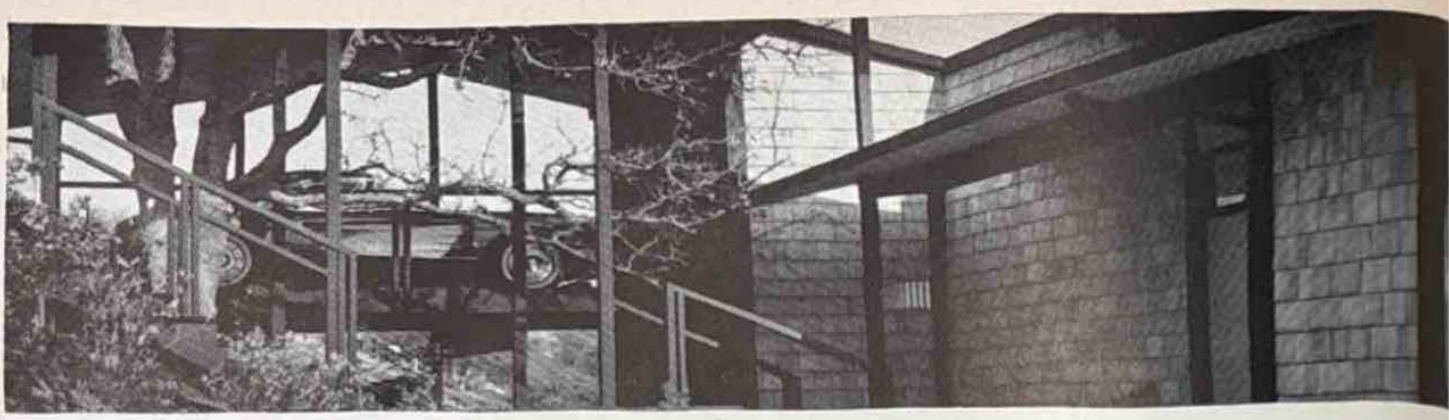
42 Not Specified

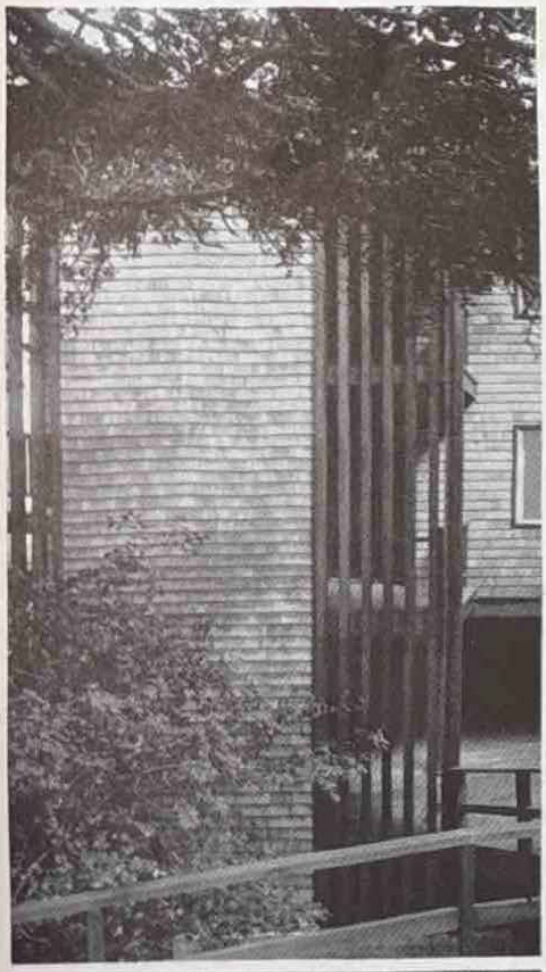
VOLUME 67, NUMBER 6

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

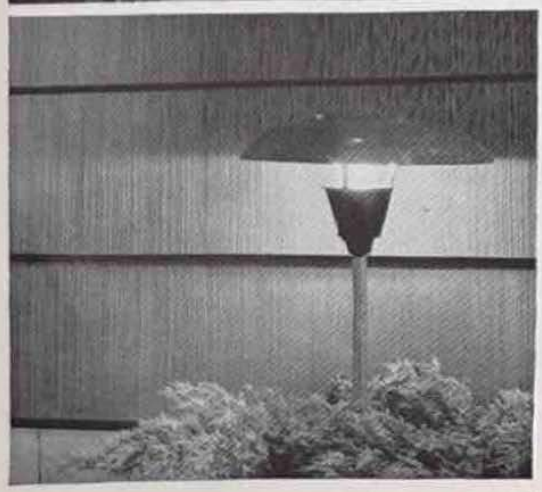
Full circulation and business data and advertiser's index on page 42

COVER: Student Union Building, Western Washington College of Education, Bellingham (p. 17)—Bassetti & Morse, Architects; Douglas Bennett, Interior Design; Art Hupy photo.













WALLS OF GENUINE CEDAR BRING THEM IN TO BUY



Cedar shingles and shakes on the walls of your homes do much more than add texture and dimension—they show that you care about quality. For cedar is the genuine. It adds stature and customer appeal regardless of architectural style. To assure complete versatility, shingles of several types are available— the traditional sawn variety, the modern squared-and-rebutted, the smooth sanded-faced . . . or shingles that have been processed into machine-grooved shakes. All are available natural, primed or factory-colored, as you prefer. Properly applied, they add two thicknesses of Nature's most insulative wood at the lowest applied cost of any genuine wall material on the market. Send for, "The House of Cedar." This colorful folder gives complete application details for new construction and remodelling. Then join the profitable trend to quality—with exterior walls of genuine cedar shingles and shakes.



CEDAR GIVES YOU AN EDGE

RED CEDAR SHINGLE BUREAU

5510 White Building, Seattle 1, Wash.

550 Burrard Street, Vancouver 1, B. C.

As We Go To Press . . . *Highlights & Sidelights*

THE BUILDING WEST—Permits totaling $495,142,183 were issued during April by the nearly 500 cities and counties in PA&B's survey of the 13 western states, an increase of $23.5 million (5%) over April 1960. Strong volumes of commercial, industrial and institutional building are accounting for the gain as the volume of residential work is running slightly below that of a year ago. As usual, California had the greatest total dollar volume ($339.5 million) and the greatest increase over a year ago ($27 million), but Colorado showed the greatest rate of increase, climbing an astonishing 61%. Washington was up 14% and Arizona up 12%. Only Nevada and New Mexico had serious decreases of about 50%.

TOP TWENTY-FIVE—Hottest spots in the West for April are the agencies listed here with dollar volume of permits rounded out in millions: 1. Los Angeles, $61.8; 2. Los Angeles County, $24.6; 3. San Diego, $12.8; 4. San Jose, $11.7; 5. Honolulu, $10.6; San Mateo County, $10.3; 7. Phoenix, $9; 8. King County, Wash., $8; 9. Maricopa County, Ariz., $7.6; 10. San Francisco, $6.9; 11. Long Beach, $6.9; 12. Seattle, $6.7; 13. San Bernardino County, $6.4; 14. Sacramento County, $6; 15. Denver, $5.6; 16. Orange County, $5.4; 17. Jefferson County, Colo., $5; 18. Santa Barbara County, $4.9; 19. Adams County, Colo., $4.9; 20. Anaheim, $4.7; 21. Oakland, $4.5; 22. Ventura County, Calif., $4.4; 23. San Diego County, $4.4; 24. Contra Costa County, Calif., $4; 25. Spokane, $3.8. (A complete tabulation appears on pp. 10-11.)

LOBBIES AND LEGISLATION—After five years of developing a long-range legislative program and bearing the brunt of occasional attacks by members as to the merits of its activities, the California Council, AIA, has chalked up an important victory in Sacramento. Senate Bill 70, which would have forced control of state college design by the Division of Architecture, has been rejected by the senate education committee. The CCAIA also is strongly endorsing a bill which would give the State Building Standards Commission authority to adopt a uniform building code, but it faces strong opposition by several state agencies and some building officials.

. . . A joint petition from four Oregon groups urging legislation to restore balance between public and private engineering has been presented in Washington, D.C., to all members of the state's congressional delegation. The sponsors: Consulting Engineers Association of Oregon; Oregon Chapter, AIA; Portland Chapter, AGC, Building Division; and the Oregon Technical Council.

THE TIME AND THE SPACE—One hundred architects and hopefuls gathered in Pullman to hear about moon structures and other way stations in space, appropriately enough, May 5 as the world was still ringing with the first praises of the U.S. astronaut's feat earlier in the day. Architect Ron E. Wilson, Boeing Co. researcher concerned with man-missiles and space station possibilities, addressed a joint AIA chapter meeting of the Washington State University students and the Spokane professionals. Will DeNeff, who heads the latter group, marked the occasion by presenting the charter of the local Women's Architectural League to its initial president, Mrs. Keith Boyington.

EXPANDING EICHLER—Marking the entry of Eichler Homes, Inc., into urban redevelopment, the Palo Alto-based firm is about to start construction of a $13 million garden apartments project in San Francisco's Western Addition. Entire four-square block program will encompass more than 500 units of high-rise buildings.

UPLIFTING THE LANDSCAPE—Tucson architect Nicholas Sakellar in a recent blast against utility companies for spoiling the area's desert atmosphere by erecting "unsightly" power poles said he counted 65 different types while driving into the city on a single highway. He told the Chamber of Commerce civic affairs committee that the utility companies apparently do not come under zoning laws which would have some control over the number, size and uniformity of poles.

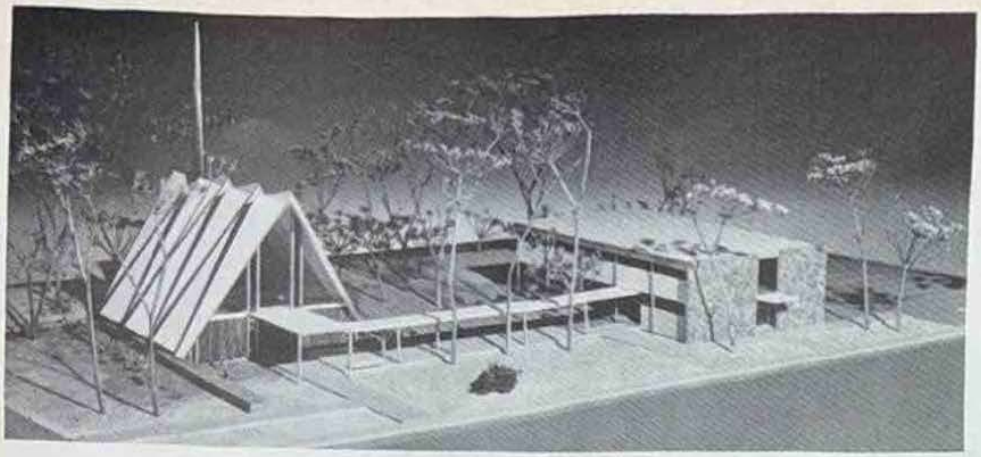
CURRENT CORRECTION—Credits for the Laupahoehoe School on page 28 should read Fisk, Johnson & Perkins, Ossipoff and Preis, Associated Architects.

HAWAII'S STATE CAPITOL BUILDING

on display in model at Iolani Palace reveals open columnar plan to catch sweep of capitol park from both ocean and mountain approaches. Structure rises from great reflecting pool, spanned by 90-ft. concourse with sculptured enclosures of legislative chambers on either side. Refinement of design and studied cost estimates by architects John Carl Warnecke & Associates and Belt, Lemmon & Lo have lowered construction figure to $13,374,000.




Use Your Imagination
HANDS will do the rest
Products from HANDS
Architectural Sculpture
• Alumasol screen system
Custom solar screens
Decorative grills
Spandrels
Decorative facias
Custom metal work
• Sculpt-Cast metal bas-relief murals
*TRADEMARK
Hands Co.'s blending of the sculptor's and the foundryman's art is always available for new custom or exclusive design creations.
HANDS CO., 4159 WHITESIDE ST. ▪ LOS ANGELES 63, CALIF.
Division of H&S Metal Products Co. ▪ "Largest in the West"



RELIGIOUS PLANT

for University Christian Church in Westches district of Los Angeles will include sanctu and two-story bible school as first phase long-range building program. Folded pl plywood roof sides will terminate in series skylights 38 ft. above floor. They will be spray with asphalt and fiberglass and topped w color coat. Stucco facade of bible school w be interrupted only by off-center entrance a canopy. Architects: Deasy & Bolling.

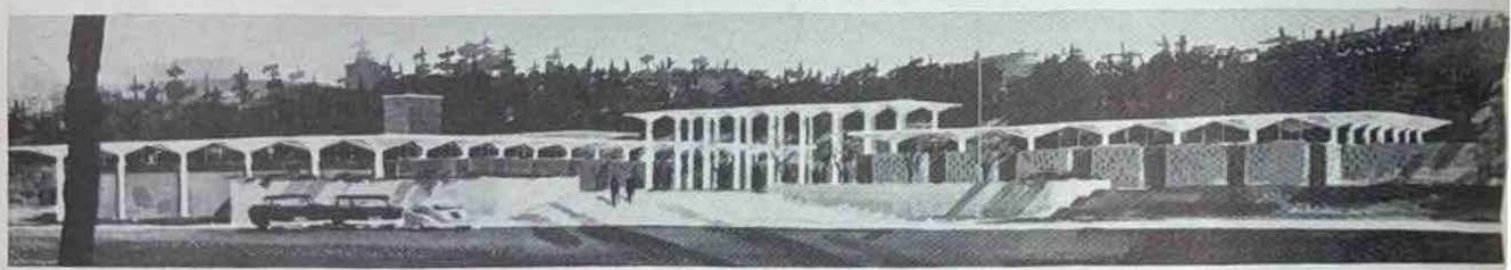


SHERATON HOTEL

designed for Kaanapali Beach on island of Maui will be built on and around lava rock outcropping, with drive on back slope leading to public areas and restaurant at highest point. From top entrance, guests will be conveyed by elevator down through block of 150 rooms, resembling series of hanging gardens on sheer face of rock. Polynesian styled cottages will dot beach. Architects: Wimberly & Cook, Ltd.

CIVIC CENTER

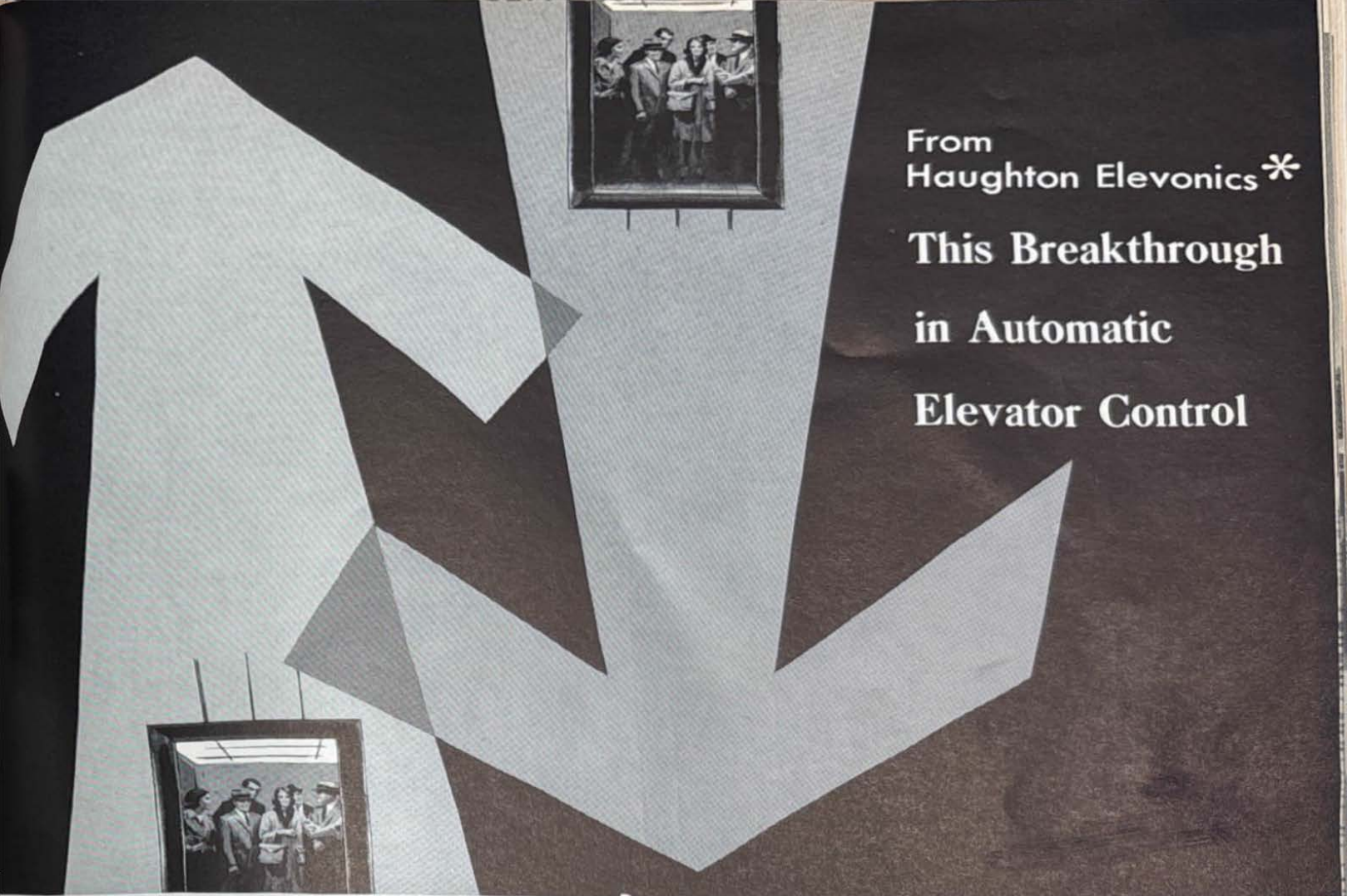
for Edmonds, Wash., will consist of two separate buildings: 7,000-s ft. library and 13,000-sq. ft. city hall. Latter will house city office fire and police departments, council and court chambers and ci defense control center in basement. Estimated to cost $320,000, proje will have concrete hyperbolic paraboloid roof, concrete columns, bri filler panels and glass walls. Architects: Dan F. Miller & Associate





50-BED NURSING HOME

now under construction in Sacramento for Mercy Hospital has been designed on hotel-like plan, each room having its own patio, with general enclosed court for recreation. Costing about $700,000, brick and concrete structure will have large community rooms and therapy facilities. Architect: Harry J. Devine.



From
Haughton Elevonics*

This Breakthrough in Automatic Elevator Control

DYNAFLITE

Now every trip can be incredibly fast and smooth . . . *for unparalleled service*

Imagine floor-to-floor travel so smooth you can barely sense acceleration and deceleration . . . and faster than engineers thought possible a few years ago. It's a practical reality today, with Haughton Dynaflite . . . bold new concept of operatorless elevator control for new buildings and old.

The Dynaflite System is fully automatic . . . thoroughly reliable. Every run is as precisely controlled as those that preceded it, and those that will follow.

Dynaflite is but one result of the magic of Elevonics* . . . which, today, is shaping the new technology in vertical transportation. Get all the facts on Dynaflite, as well as Haughton's complete design, modernization and maintenance capabilities. The Haughton representative in your area will gladly consult with you—no obligation, of course. Or, write today.

EMBLEM OF EXCELLENCE IN VERTICAL TRANSPORTATION

Haughton Elevator Company

DIVISION of TOLEDO SCALE CORPORATION • Toledo 9, Ohio

OFFICES IN PRINCIPAL CITIES

• PASSENGER AND FREIGHT ELEVATORS • ESCALATORS
• DUMBWAITERS

* Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative application of electronic devices and instrumentation for betterment of systems design and performance. Registered in U.S. Patent Office.

Building Permit Totals for

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dollar

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(28)	$ 271,236	$ 441,033
Alameda Co.	(135)	1,041,950	1,527,750
Albany	(9)	66,500	89,489
Alhambra	(17)	720,900	949,648
Anaheim	(222)	2,700,902	4,661,363
Antioch	(14)	121,898	400,011
Arcadia	(68)	863,772	1,070,180
Arroyo Grnde	(0)	Nil	14,000
Artesia	(2)	42,900	71,500
Atherton	(5)	245,960	886,600
Atwater	(12)	83,350	93,550
Auburn	(3)	50,500	249,909
Avalon	( )	Nil	11,700
Azusa	(8)	80,000	214,372
Bakersfield	(30)	394,500	667,573
Baldwin Park	(123)	1,290,680	1,493,120
Banning*	( )	243,728	205,367
Barstow	(53)	440,900	452,765
Bell	(20)	115,600	255,620
Bellflower	(41)	518,200	666,955
Belmont	(57)	423,000	470,900
Benicia	(2)	19,000	29,800
Berkeley	(3)	65,619	1,310,165
Beverly Hills	(4)	400,000	667,841
Bradbury	( )	Nil	1,950
Brawley	(5)	45,000	69,250
Brea	(3)	50,564	99,365
Buena Park	(70)	1,015,145	1,856,137
Burbank	(75)	507,800	1,190,288
Burlingame	(3)	67,000	785,053
Butte Co.	( )	Nil	238,800
Calexico	(1)	4,000	11,440
Campbell	(2)	39,025	136,344
Carlsbad	(13)	180,740	203,490
Carmel	(3)	53,000	130,550
Chico	(13)	348,241	417,606
Chino	(3)	32,526	67,768
Chula Vista	(5)	64,200	125,196
Claremont	(4)	61,500	143,770
Coalinga	( )	Nil	4,300
Colton	(4)	37,880	57,599
Commerce	(2)	22,500	2,232,800
Compton	(1)	6,500	402,540
Concord	(97)	1,135,020	1,704,220
Cntra Csta Co.	(173)	3,448,366	4,100,245
Corona	(8)	104,081	158,883
Coronado	( )	No Reply	No Reply
Corte Madera	(22)	228,640	341,738
Costa Mesa	(80)	929,019	1,758,221
Covina	(91)	1,289,188	1,527,972
Cudahy	(19)	187,100	236,300
Culver City	(8)	90,000	374,633
Dairy Valley	( )	Nil	34,700
Daly City	(44)	437,484	504,634
Davis	(45)	477,000	492,500
Delano	(6)	79,000	84,200
Downey	(51)	465,624	885,269
Duarte	(22)	330,000	372,073
El Cajon	(3)	60,400	427,625
El Centro	(3)	44,000	88,470
El Cerrito	(8)	123,126	172,167
El Dorado Co.	(76)	772,176	1,576,220
El Monte	(7)	40,500	256,935
El Segundo	(6)	57,000	1,719,527
Emeryville	( )	Nil	19,095
Escondido	(26)	248,629	1,432,586
Eureka	(14)	220,500	510,550
Fairfield	(43)	397,817	421,251
Fillmore	(2)	25,824	37,344
Fontana	(6)	93,920	116,048
Fremont	(205)	2,581,900	3,347,086
Fresno	(127)	1,306,824	2,612,322
Fresno Co.	(69)	723,726	1,939,875
Fullerton	(260)	4,265,998	5,074,930
Glendale	(101)	570,100	1,595,999
Glendora	(10)	154,000	221,425
Half Moon Bay	(2)	29,500	32,200
Hanford	(67)	808,430	975,980
Hawthorne	(48)	402,250	977,850
Hayward	(44)	298,300	431,294
Hemet	(5)	53,000	95,930
Hrmosa Beach	(25)	229,525	833,185
Hillsborough	(4)	192,000	242,500
Holtville	(1)	15,000	26,850
Humboldt Co.*	( )		54,120
Huntingtn Bch	(92)	874,171	1,341,094
Hntingtn Park	(7)	41,000	316,280
Imperial Co.	( )	Nil	227,900
Indio	(43)	236,012	350,502
Industry	( )	Nil	145,630
Inglewood	(111)	879,000	1,352,542
Irwindale	(1)	13,400	241,900
Kern Co.	(148)	1,702,297	2,358,418
Laguna Beach	(16)	262,000	362,112
La Habra	(158)	2,375,618	2,451,356
Lakewood	(6)	78,000	283,080
La Mesa	(15)	255,459	566,851
La Mirada	(27)	224,500	261,000
La Puente	(6)	49,660	100,110
La Verne	(2)	24,000	208,680
Lawndale	(24)	207,800	303,789
Lindsay	(5)	45,400	53,612
Livermore	(9)	94,907	239,419
Lodi	(21)	253,900	334,460
Lompoc	(44)	575,485	634,240
Long Beach	(322)	3,198,500	6,920,105
Los Altos	(18)	347,300	487,940
Los Angeles	(2119)	26,569,764	61,790,736
Ls Angels Co.	(1028)	11,711,260	24,636,270
Los Gatos	(30)	495,000	1,013,506
Lynwood	(1)	6,500	135,844
Madera	(6)	83,640	123,562
Madera Co.	(18)	181,600	379,030
Manhattn Bch.	(13)	173,285	303,045
Manteca	(5)	53,900	90,275
Marin Co.	(54)	972,930	1,272,127
Martinez	(2)	37,166	83,886
Marysville	(64)	415,000	471,100
Maywood	(11)	61,490	139,966
Menlo Park	(7)	149,500	975,575
Merced	(10)	92,944	195,119
Merced Co.	(27)	290,455	343,101
Millbrae	(31)	562,500	633,100
Mill Valley	(7)	161,000	194,508
Modesto	(31	598,500	1,691,129
Monrovia	(29)	229,690	344,759
Montclair	(30)	400,995	496,495
Montebello	(44)	534,464	858,023
Monterey	(6)	79,140	659,470
Monterey Co.	(42)	633,690	869,662
Montery Park	(93)	1,372,650	1,506,127
Mountn View	( )	No Reply	No Reply
Napa	(24)	299,587	431,764
Napa Co.	(23)	336,106	461,869
National City	(5)	80,957	175,163
Newprt Beach	(23)	493,722	918,351
Nrth Sacrmnto	(71)	378,274	461,211
Norwalk	( )	Nil	165,050
Novato	(14)	243,720	260,870
Oakdale	(1)	11,736	28,346
Oakland	(319)	2,519,600	4,506,460
Oceanside	(23)	209,500	259,551
Ojai	(5)	96,912	107,332
Ontario	(140)	1,282,304	1,465,884
Orange	(150)	1,635,331	1,792,094
Orange Co.	(263)	4,400,660	5,450,517
Oroville	(6)	141,114	211,039
Oxnard	(89)	463,125	721,890
Pacifica	(12)	134,600	336,665
Pacific Grove	(6)	66,400	164,538
Palm Springs	(5)	108,000	694,916
Palo Alto	(112)	648,269	945,030
Pals Vrds Estts	(15)	612,501	642,466
Paramount	(19)	153,000	291,250
Pasadena	(53)	500,250	1,066,305
Paso Robles	(3)	47,280	84,980
Pico Rivera	(16)	114,400	515,315
Piedmont	( )	Nil	93,125
Pinole	( )	No Reply	No Reply
Pittsburg	(24)	219,820	685,439
Placentia	( )	Nil	4,210
Placer Co.	(83)	1,090,445	2,173,442
Pleasanton	(8)	113,563	113,833
Pomona	(44)	400,736	742,237
Porterville	(2)	36,400	48,590
Port Hueneme	(69)	882,000	882,900
Red Bluff	(2)	24,344	104,394
Redding	(4)	70,000	264,050
Redlands	(15)	164,700	375,588
Redndo Beach	(32)	308,029	2,002,532
Redwood City	(131)	692,500	992,532
Richmond	(61)	501,476	3,028,087
Riverside	(23)	413,250	1,250,821
Riverside Co.	(247)	2,604,681	3,559,691
Rolling Hills	( )	Nil	15,300
Rlng Hills Ests	(13)	359,300	431,160
Rosemead	(4)	55,300	83,900
Roseville	(23)	218,303	1,726,149
Sacramento	(102)	1,232,585	2,755,025
Sacramnto Co.	(310)	3,716,360	6,053,323
St. Helena	( )	No Reply	No Reply
Salinas	(51)	571,000	700,182
San Bernrdino	(17)	202,860	1,042,008
Sn Brnrdn Co.	(455)	3,612,712	6,381,265
San Bruno	(18)	129,400	225,839
San Carlos	(12)	246,000	691,460
San Clemente	(22)	262,231	285,559
San Diego	(480)	5,874,475	12,794,727
San Diego Co.	(162)	2,935,500	4,397,700
San Dimas	(5)	127,300	152,940
San Fernando	(5)	37,150	117,950
San Francisco	(236)	2,570,953	6,928,818
San Gabriel	(35)	229,900	682,528
Sanger	(5)	87,000	96,320
San Jacinto	(9)	77,700	82,970
San Joaqin Co.	(44)	415,575	961,847
San Jose	(766)	7,796,200	11,650,980
San Leandro	(18)	233,000	567,447
Sn Luis Obspo	(11)	143,310	229,880
Sn Ls Obsp Co.	(34)	375,573	554,034
San Marino	(2)	48,659	145,481
San Mateo	(89)	561,500	1,175,796
San Mateo Co.	(62)	1,051,000	10,305,964
San Pablo	(7)	36,293	675,587
San Rafael	(171)	3,129,440	3,817,638
Santa Ana	(79)	637,048	1,187,645
Santa Barbara	(117)	1,175,000	1,427,698
Snta Brbra Co.	(321)	4,114,300	4,933,200
Santa Clara	(79)	951,000	1,929,441
Santa Clra Co.	(53)	887,300	2,276,315
Santa Cruz	(29)	331,026	579,561
Santa Cruz Co.	(102)	1,162,893	1,438,342
Snta Fe Sprgs	( )	Nil	319,650
Santa Maria	(85)	1,128,724	1,296,356
Santa Monica	(65)	547,240	943,093
Santa Paula	(6)	70,628	10,107
Santa Rosa	(63)	709,828	964,280
Sausalito	(7)	125,000	149,600
Seal Beach	(12)	110,101	162,498
Seaside	(30)	201,000	223,873
Selma	(11)	79,650	113,049
Shasta Co.	(12)	161,530	318,824
Sierra Madre	(5)	107,200	403,330
Solano Co.*	( )	135,743	187,914
Sonoma Co.	(44)	461,973	1,007,549
South El Mnte	(4)	20,000	103,080
South Gate	(25)	139,500	455,879
South Pasadna	(20)	150,733	240,617
So. Sn Frncsco	(15)	153,225	611,825
Stanislaus Co.	( )	316,607	952,079
Stockton	(247)	2,825,245	3,497,429
Sunnyvale	(147)	1,929,255	2,173,419
Temple City	(20)	251,000	344,480
Torrance	(48)	495,310	2,444,902
Tracy	( )	Nil	465,176
Tulare	(6)	40,500	423,786
Tulare Co.	(38)	220,973	370,421
Turlock	(11)	164,535	221,543
Ukiah	(2)	33,000	275,006
Upland	(33)	476,550	618,079
Vacaville	(43)	522,400	527,765
Vallejo	(30)	297,650	574,633
Ventura	(16)	184,500	286,563
Ventura Co.	(319)	3,882,750	4,427,478
Visalia	(22)	412,411	605,678
Walnut	(2)	29,000	30,200
Walnut Creek	(43)	403,500	569,575
Wasco	(14)	141,300	153,700
Watsonville	( )	Nil	26,600
West Covina	(12)	208,997	680,533
Whittier	(9)	218,500	536,200
Woodland	(18)	212,480	272,656
Woodside	(5)	172,000	267,368
Yolo Co.	(20)	242,255	369,690
Yreka	(2)	33,000	172,967
Yuba City	(17)	172,100	1,029,968
Yuba Co.	(21)	176,500	214,350
TOTAL	**(15,337)**	**$179,515,986**	**$339,534,536**

*Breakdown not available

OREGON

Albany	(8)	$ 96,400	$ 206,944
Ashland	(9)	105,000	120,550
Astoria	(1)	2,000	6,350
Baker	(2)	16,000	45,300
Beaverton	(6)	131,365	497,943
Bend	(8)	118,000	141,035
Central Point	(5)	33,400	35,000
Clackamas Co.	(37)	448,230	482,195
Coos Bay	(3)	52,500	284,985
Corvallis	(15)	168,000	1,518,940
Dallas	(4)	42,500	49,035
Douglas Co.	(8)	77,000	91,995
Eugene	(28)	303,145	1,227,305
Forest Grove	(3)	30,500	64,340
Grants Pass	(12)	129,500	284,000
Gresham	(1)	22,000	62,950
Hermiston	(1)	7,680	27,046
Hillsboro	(16)	152,500	183,439
Hood River	( )	Nil	6,225
Klamath Falls	(2)	23,500	289,820

Western States for April

Residential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
La Grande	(5)	64,864	74,014
Lane Co.	(91)	998,837	2,118,858
Lebanon	(2)	24,500	32,420
Marion Co.	(57)	645,500	808,210
McMinnville	(6)	66,500	92,086
Medford	(18)	225,500	597,410
Milln-Freewtr	(4)	47,000	80,500
Multnoma Co.	(137)	2,133,724	3,069,513
Newberg	(4)	26,410	32,420
Newport	(4)	47,040	211,340
North Bend	(2)	34,262	72,219
Ontario	(3)	25,500	33,950
Oregon City	(2)	69,000	115,922
Oswego	(8)	112,015	129,310
Pendleton	(5)	92,400	122,660
Portland	(113)	1,384,310	3,710,510
Prineville	( )	Nil	6,800
Roseburg	(5)	49,227	98,440
St. Helens	(1)	10,500	12,900
Salem	(20)	204,150	957,649
Seaside	( )	Nil	13,650
Springfield	(6)	67,020	111,941
The Dalles	(4)	59,400	151,880
Washingtn Co.	(101)	1,892,320	2,709,395
TOTAL	**(767)**	**$ 10,239,199**	**$ 20,989,814**

WASHINGTON

Aberdeen	(1)	$ 12,000	$ 49,860
Anacortes	( )	Nil	112,146
Alburn	(3)	35,000	870,703
Bellevue	(6)	104,650	872,430
Bellingham	(4)	58,000	134,701
Bremerton	(3)	153,000	189,255
Camas	(3)	25,500	40,852
Centralia	( )	Nil	36,170
Chehalis	(1)	30,000	210,348
Clark Co.	(44)	563,800	681,100
Clarkston	( )	Nil	13,115
Ellensburg	(4)	46,000	69,620
Enumclaw	( )	Nil	Nil
Ephrata	( )	Nil	19,910
Everett	(9)	141,186	222,772
Grys Hrbr Co.	(8)	92,200	151,750
Hoquiam	(1)	12,000	22,750
Island Co.	(21)	156,630	173,355
Kelso	(2)	23,000	114,627
Kennewick	(16)	206,000	237,290
Kent	(24)	336,530	450,350
King Co.	(456)	6,339,400	7,998,239
Kirkland	(7)	76,000	93,700
Longview	(7)	85,100	692,091
Mercer Island	(17)	463,500	514,900
Montesano	( )	No Reply	No Reply
Moses Lake	(14)	165,400	380,598
Olympia	(6)	102,400	160,938
Pasco	(2)	21,000	183,180
Pierce Co.	(117)	1,524,595	1,741,063
Port Angeles	(2)	12,000	44,010
Port Orchard	( )	No Reply	No Reply
Pullman	(4)	48,214	239,178
Puyallup	(6)	89,000	101,040
Renton	(109)	232,500	299,079
Seattle	(89)	1,569,900	6,741,987
Shelton	( )	Nil	10,800
Spokane	(38)	547,950	3,849,090
Spokane Co.	(54)	859,066	1,105,948
Sunnyside	(4)	59,500	153,500
Tacoma	(29)	424,900	2,619,803
Vancouver	(17)	267,300	538,687
Walla Walla	(7)	72,000	121,694
Walla Wlla Co.	(6)	94,000	113,404
Wenatchee	(6)	102,500	270,218
Yakima	(16)	176,000	415,584
TOTAL	**(1,163)**	**$ 15,327,721**	**$ 33,061,835**

ALASKA

Anchorage	(8)	$ 190,340	$ 391,221
Fairbanks	( )	Nil	37,300
Juneau	( )	Nil	113,465
Ketchikan	( )	Nil	30,250
Sitka	( )	No Reply	No Reply
TOTAL	**(8)**	**$ 190,340**	**$ 572,236**

IDAHO

Alameda	(7)	$ 82,000	$ 92,000
Blackfoot	(4)	70,500	75,625
Boise	(5)	64,500	243,767
Caldwell	(2)	20,000	195,954
Coeur d'Alene	(5)	79,576	92,601
Idaho Falls	(20)	340,180	395,865
Jerome	(1)	10,000	298,320
Lewiston	(5)	80,700	162,370
Moscow	(7)	106,500	156,585
Nampa	(1)	16,000	622,180
Payette	(2)	33,000	46,100
Pocatello	(5)	64,400	176,170
Sandpoint	( )	Nil	72,700
St. Maries	(4)	38,000	38,000
Twin Falls	(6)	58,500	513,675
TOTAL	**(74)**	**$ 1,063,856**	**$ 3,183,912**

MONTANA

Anaconda	(3)	$ 30,000	$ 114,000
Billings	(27)	457,525	634,079
Bozeman	(1)	19,500	130,300
Butte	( )	Nil	Nil
Cut Bank	(2)	29,000	38,100
Glasgow	(18)	202,000	282,700
Glendive	(3)	52,580	77,800
Great Falls	(107)	924,474	1,064,608
Havre	(1)	25,000	51,025
Helena	(9)	129,000	245,505
Kalispell	(1)	13,000	159,850
Lewistown	(6)	36,500	41,000
Livingston	(1)	8,000	56,066
Malta	(1)	8,000	108,000
Miles City	(1)	13,500	25,431
Missoula	(4)	60,000	131,739
TOTAL	**(185)**	**$ 2,008,079**	**$ 3,160,203**

WYOMING

Casper	(35)	$ 414,500	$ 784,548
Cheyenne	(15)	196,500	527,315
Cody	(1)	10,000	42,300
Laramie	(9)	175,300	201,185
Rawlins	( )	Nil	36,806
Riverton	(21)	225,000	293,550
Rock Springs	(8)	72,000	90,000
Sheridan	(3)	54,000	107,591
TOTAL	**(92)**	**$ 1,147,300**	**$ 2,083,294**

COLORADO

Adams Co.	(191)	$ 2,554,280	$ 4,894,009
Alamosa	(4)	65,500	113,300
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(47)	620,000	980,976
Aspen	(4)	69,800	73,250
Aurora	(260)	1,961,516	2,060,837
Boulder	(27)	384,900	918,115
Boulder Co.	(35)	431,400	855,950
Canon City	( )	No Reply	No Reply
Colo. Springs	(56)	708,210	2,152,954
Cortez	(1)	7,000	14,020
Denver	(384)	2,327,094	5,598,165
Durango	(3)	56,976	75,871
El Paso Co.	(17)	301,500	970,156
Englewood	(27)	254,100	370,521
Estes Park	(8)	19,100	29,100
Fort Collins	(35)	381,100	627,683
Fort Morgan	(4)	54,339	123,683
Golden	(1)	15,240	181,940
Grand Junctn	(3)	28,250	94,934
Greeley	(39)	430,400	481,847
Jefferson Co.	(490)	4,054,166	5,014,131
La Junta	(3)	24,000	93,826
Lamar	(2)	27,000	82,500
Littleton	(48)	340,100	786,941
Longmont	(10)	96,900	146,489
Loveland	(18)	222,426	269,991
Monte Vista	( )	Nil	9,850
Montrose	(3)	37,213	55,881
Pueblo	(33)	391,801	663,373
Pueblo Co.	(18)	98,000	611,650
Sterling	( )	No Reply	No Reply
Trinidad	(1)	8,000	33,098
Walsenburg	( )	Nil	Nil
Westminister	(15)	180,462	504,557
TOTAL	**(1,787)**	**$ 16,150,773**	**$ 28,889,598**

UTAH

American Frk	(5)	$ 43,000	$ 45,550
Bountiful	(14)	218,600	530,680
Brigham City	(15)	193,800	287,049
Cedar City	( )	Nil	15,150
Clearfield	(2)	30,000	69,100
Davis Co.	(14)	160,128	169,113
Kaysville	(4)	28,170	29,670
Layton	(15)	209,000	243,424
Logan	(14)	179,922	432,947
Murray	(16)	239,000	266,340
Ogden	(15)	342,382	1,086,782
Orem	(9)	116,110	153,756
Price	( )	Nil	22,000
Provo	(8)	97,000	489,275
Salt Lake Cty	(125)	957,513	1,489,174
Salt Lake Co.	(176)	2,096,400	2,901,320
S. Slt Lke Cty.	(4)	24,000	476,400
Spanish Fork	(1)	15,000	26,450
Tooele	(6)	67,665	90,359
Utah Co.	(5)	63,380	142,550
Weber Co.	(8)	96,000	144,600
TOTAL	**(456)**	**$ 5,177,070**	**$ 9,111,689**

NEVADA

Boulder City	( )	$ Nil	$ 57,469
Clark Co.	(67)	869,328	2,637,609
Elko	(3)	22,450	46,220
Las Vegas	(118)	1,450,600	1,936,636
N. Las Vegas	(21)	189,617	297,630
Reno	(95)	990,300	1,642,351
Sparks	(17)	223,500	430,892
Washoe Co.	(14)	239,700	311,822
TOTAL	**(335)**	**$ 3,985,495**	**$ 7,360,629**

ARIZONA

Buckeye	( )	$ Nil	$ 20,873
Casa Grande	(5)	20,100	53,500
Chandler	(8)	92,778	142,335
Douglas	(4)	35,514	60,299
Flagstaff	(50)	61,979	1,744,420
Florence	( )	Nil	Nil
Glendale	(4)	24,000	142,035
Miricopa Co.	(593)	5,213,085	7,590,635
Mesa	(74)	668,743	885,747
Miami	( )	No Reply	No Reply
Phoenix	(350)	2,452,125	9,027,754
Pima Co.	(113)	1,247,450	1,645,499
Prescott	(9)	104,900	125,520
Scottsdale	(53)	789,600	1,152,285
Tempe	(60)	451,400	567,808
Tucson	(70)	912,810	3,795,926
Wickenburg	(1)	6,500	8,350
Winslow	(4)	16,500	54,815
Yuma	(10)	94,000	122,050
TOTAL	**(1408)**	**$ 12,191,484**	**$ 27,139,815**

NEW MEXICO

Alamogordo	( )	$ Nil	$ 156,857
Albuquerque	(231)	1,799,858	2,470,037
Artesia	(9)	84,500	111,045
Carlsbad	(11)	99,000	379,664
Clovis	(16)	185,009	353,629
Deming	(4)	44,000	71,050
Farmington	(3)	34,558	362,966
Gallup	(1)	10,206	65,806
Hobbs	(32)	304,000	357,752
Las Cruces	(11)	108,000	136,900
Las Vegas	(118)	1,450,600	1,936,636
Lovington	(2)	42,000	42,000
Raton	( )	Nil	Nil
Roswell	(60)	567,000	686,825
Santa Fe	(73)	564,900	691,684
Silver City	( )	No Reply	No Reply
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(2)	16,000	45,950
Tularosa	(1)	11,040	14,364
TOTAL	**(574)**	**$ 5,320,671**	**$ 7,883,138**

HAWAII

Hawaii Co.	(16)	$ 279,004	$ 1,149,562
Honolulu	(437)	4,764,220	10,557,739
Maui Co.	(22)	208,950	464,147
TOTAL	**(475)**	**$ 5,252,174**	**$ 12,171,448**
GRAND TOTAL	**(22,661)**	**$257,570,148**	**$495,142,183**

Lively floor debate sparks AIA convention in Philadelphia

Westerners who attended the 93rd annual AIA convention in Philadelphia April 23-28 returned home with favorable reports on the proceedings, both from the standpoint of the professional program and the refreshingly spirited business sessions which found delegate participation unusually high.

As for the theme "Redesigning Urban America," John Morse, president of the Washington State Chapter, summed it up this way: "Appropriately, Philadelphia has done more to rejuvenate and reorient herself than any other city in the U.S.; appropriate because this city also was the leader in the first days of this nation.

"The visiting architects saw the new office building and train commuter development called Penn Center in the heart of the city, the almost completed landscaping of new large open spaces leading up to Independence Hall, the extensive renovation of such historic sites as Society Hill and St. Peter's Church and the block after block of razed brick slums near the Delaware River, which will be turned over to new widely spaced apartment towers in parks bordering a mile-long waterfront of recreation facilities.

"Incidentally," Morse added, "a widespread taxi strike was a blessing in that everyone walked all over downtown and found that this was the way to see and enjoy the city."

Even architectural critic Lewis Mumford, who told the more than 1,000 architects that "nothing has done more harm to the genuine culture of the city than the large mass of urban renewal and public housing projects from New York to San Francisco," had some kind words to say about Philadelphia (see digest of his remarks below).

Certainly one of the convention highlights was a three-hour presentation "Redesigning Downtown Philadelphia" staged by Edmund N. Bacon, the city's planning director, in which the audience dramatically visualized what has been done thus far and what is hoped for the future.

The provocative addresses of the other principal speakers—Robert C. Weaver, HHFA administrator; Bruno Zevi, architectural historian of the University of Rome; and Sir William Holford, president of the Royal Institute of British Architects—undoubtedly will make good copy for the professional press in months to come.

Continued on page 14

Culture of the city

A summary of the AIA address by Lewis Mumford

There has never been a moment since the Chicago World's Fair of 1893 when there has been so much discussion of the state of the city as today. The reason is plain: the city has been disappearing before our eyes, sinking under a tidal wave of motor cars and parking lots. There is no sense discussing the culture of the city if the city itself is about to vanish, either by being thinned out into a suburban conglomeration, by being completely destroyed by nuclear bombardment or by our digging vast underground cities—bargain basements for those who prefer collective entombment.

In the present discussions, there are two main camps: those who wish to preserve at least the central core of the city and those who are eager to assist in bringing about its dissolution. But too often their efforts are indistinguishable. The people who are trying to save the city are seeking to save the very things that cause their neighbors to move out—mere bigness, confusion, congestion or empty ostentation, on the scale of New York's Lincoln Center. Nothing has done more harm to the genuine culture of the city than the large mass of urban renewal and public housing projects from New York to San Francisco.

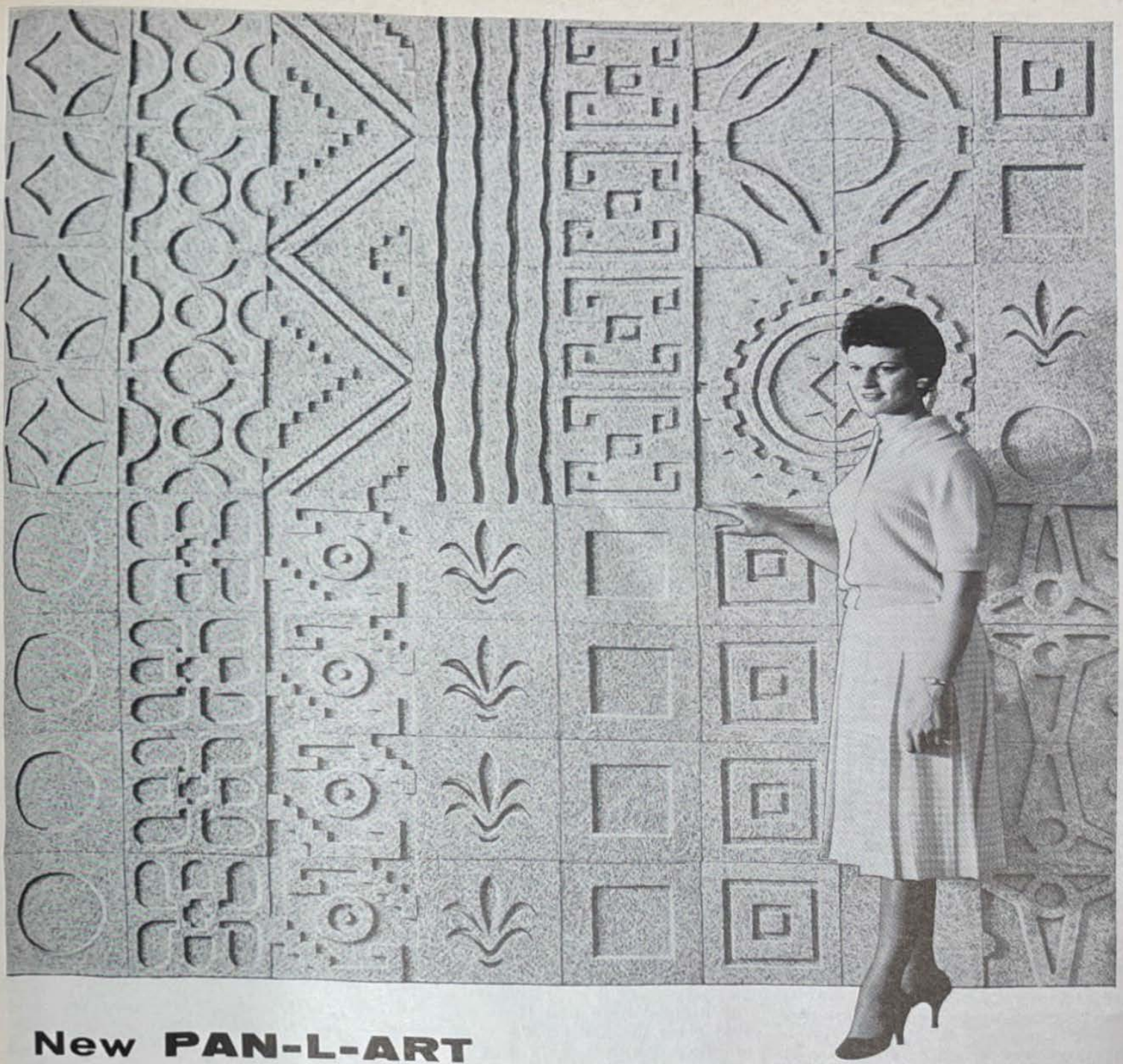
With a few exceptions, notably in Philadelphia and Baltimore, these sterile "improvements" have too often removed the living organs of the city and replaced them with an expensive but profitable mechanical substitute. Too often, under the illusion that they have assisted in an urban birth, the planners and architects have actually performed a hysterectomy.

If we are to speak with any hopefulness about the culture of the city, we must first remove all the sterile bureaucratic images of the city of the future which many of the greatest architects of our time have put forward. The city is a human artifact and must give form to human needs and human purposes in the order of their importance, beginning with man's need for fellowship and love, for biological reproduction and psychological development. Technological improvements exist only to serve more essential aspects of man's life, not to dominate them.

The city is an esthetic experience, an educational experience and a dramatic experience; and no part of a city is properly planned if it does not contribute its quota of visual joy, of vivid human contacts and of purposeful and meaningful activities that sustain the human spirit. These aspects of culture cannot be effectively pursued where differentiation, individuality and choice are absent. The larger the scale of planning, the more important it is to avoid mass solutions based on standardization and mechanical repetition; the whole must be organized into parts that respect the human measure and that invite a warm human response. The great boulevards of Paris needed the cafe to translate the large-scale order of movement into the intimate order of repose, conversation, human stimulation. The off-Broadway theaters and the espresso bars have done more for the culture of the city in New York than acres of pretentious estheticism.

The cultural requirements of the city can be met only by multiplying the places where lovers can meet, where friends can walk and talk, where colleagues and associates can hold long discussions without benefit of the tape recorder; where parents and children can occasionally come together on common ground, in an environment that contrasts with and complements that of the home; where individual persons can quit the lonely crowd and in solitude find the companionship and stimulus they need.

Our present dehumanized improvements produce only blankness and boredom. Culture needs an environment that reflects human purpose and human imagination: open spaces, with gardens, for meeting; natural beauty preserved, and if possible, enhanced and carried by architectural beauty, the whole immune to the pressures of technology and finance. We must stop spending astronomical sums on technological absurdities that are destroying the city and creating an empty and boring life; and we must invest generously and widely in the essential small-scale activities that will restore initiative and power and confidence to the individual person and the group.



New PAN-L-ART sculptured wall blocks

LIGHT WEIGHT • SOUND ABSORBING • BEAUTIFULLY TEXTURED

New, dramatic wall acoustics, by Tectum Corporation, offer a fresh decorative expression in sculptured deep-shadow designs. Wood fiber Tectum is insulating, structural, fire safe and durable. New 12″ x 12″ blocks, 1″ thick, are offered in fifteen design patterns and a choice of four colors. Now you can have the prestige and drama of carved stone at a fraction of the weight and cost; easily installed with ordinary adhesives. Complete color specifications on request.

PAN-L-ART

Multi Plane Ceilings
Sculptured Wall Blocks
Geometric Wall Panels

Decorative Division
TECTUM Corporation 535 East Broad St., Columbus 15, Ohio



WRIGHT



HUNTER

AIA convention (Cont'd from p. 12)

More significant than the professional program to a good many architects was the replacement of cut-and-dried business sessions with active participation from the membership itself. Said the Oregon State Chapter in its bulletin: "Much business was conducted at the Philadelphia convention and many floor debates occurred to indicate that the Institute is very much the delegates' organization."

Morse echoed this sentiment in his Washington State report. "Two trends among the delegates seemed very encouraging: 1) The grass roots made themselves felt, resulting in a resolution that restructuring the Institute be studied by the board for one year and then given one more year for study by chapters and regions before any action would be taken. 2) The conviction that 'design' is an architect's great concern and should be more important in AIA affairs brought about another resolution that design committees be established nationally and locally (their objectives and duties remained to be spelled out)."

In other actions, the delegates approved the change in structure substantially as proposed, limiting terms of officers, etc.; approved the addition of "supplementary dues" as proposed for a two-year trial period; defeated the proposal to add a membership class of professional affiliates; granted the board authority to take an option on land for a new headquarters building if current programming and analysis suggests this. (If such a building is given the green light, a national competition would be held for selection of an architect.)

Reelection of the entire slate of officers means that two westerners will continue in top AIA posts. The incumbents: Philip Will Jr., Chicago, president; Henry L. Wright, Los Angeles, first vice president; James M. Hunter, Boulder, Colo., second vice president; J. Roy Carroll Jr., Philadelphia, secretary; Raymond S. Kastendieck, Gary, Ind., treasurer.

R. Lloyd Snedaker of Salt Lake City was named director of the Western Mountain Region.

West Coast captures seven awards for church design

Continuing its winning tradition in the field of religious buildings, the West walked off with seven—four in Washington and three in California—of the 13 awards at the annual exhibit of the National Conference on Church Architecture in Pittsburgh the latter part of April. The competition drew 225 submissions from 75 architectural offices.

Robert L. Durham, a principal in the dual-winning Seattle firm of Durham, Anderson & Freed, was reelected regional vice president for 15 western states. Another architect, Anthony Ferrara of Washington, D.C., was named president.

The entire exhibit represents the first real break-through toward an expression of church architecture which may characterize the age in which we live, as did the Gothic cathedral of the Middle Ages, said Walther J. Wefel Jr., Shaker Heights, Ohio, architect, chairman of jurors and of the exhibit committee.

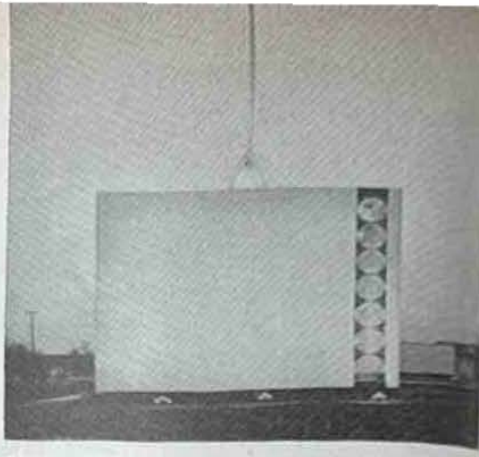
"The pioneering, experimental days of contemporary design are beginning to disappear," Wefel declared. "Although a wide range of design was exhibited this year from traditional to the most 'far-out,' it appears that contemporary architecture is emerging as a solid style illustrative of the times.

"Church architects and churchmen are cooperating in reassessing their responsibility to the community. Their churches are now designed to meet the needs of today. Each of them also reflects what that particular church believes. In other words, what we believe now determines what we build."

Naturally, not everyone among the 1,200 architects, artists and church building specialists at the conference agreed with Wefel's analysis. But even those experts who deplored the "monstrosities" which they felt are being erected here and there conceded that some designers are creating outstanding contemporary edifices that reflect what the churches believe.

This year's sessions clearly demonstrated that church architecture has taken a giant step since the time when the great question was modern or traditional, conference leaders noted. That battle has been won by the modernists although some traditional churches are still being built. The arena for struggle today has shifted to the question of how to make today's designs translate what the churches really believe and the way by which they teach it.

(Excerpts from major conference addresses will appear in later issues of PA&B.)



PRINCE OF PEACE LUTHERAN CHURCH (seating less than 250), Charter Oak, Calif.: Maul & Pulver, architects. "Straightforward in its expression of structural form with simple tailored appearance."



FIRST METHODIST CHURCH (seating less than 250), Mount Vernon, Wash.: Durham, Anderson & Freed, architects. "Commended for the interior of the sanctuary with its use of native stone and exposed wood, highlighted naturally by the central skylight."



ST. PAUL'S EPISCOPAL CHURCH (seating less than 250), Mount Vernon, Wash.: Durham, Anderson & Freed, architects. "Directness of the plan and the use of curved arches and local materials results in a worshipful atmosphere."



UNITY CHURCH OF TRUTH (seating 250 or more), Seattle: Young, Richardson & Carleton, architects. "A formal, although inviting and simple, church of excellent, consistent detail."



CHURCH OF THE HOLY FAMILY (seating 250 or more), Orange, Calif.: Theodore Criley Jr. & Fred W. McDowell, associated architects. "A pleasing, well-proportioned, unpretentious design with a careful and subdued use of the fine arts, clean lines of the facade and effective natural lighting of the chancel."



FIRST PRESBYTERIAN CHURCH (religious educational building), Oakland: Reynolds and Chamberlain, architects. "Commend additions for imagination, organization of educational and recreational space, off-street parking and a satisfying sense of openness achieved through the court."



BELLEVUE PRESBYTERIAN CHURCH (seating 250 or more), Bellevue, Wash.: Mithun, Ridenour & Cochran, architects. "An economical small church plant, well integrated with the site and commended for the tasteful use of native building materials and the novel employment of the A-frame."

Photo credits: Marvin Rand, Chas. R. Pearson, Julius Shulman, Karl H. Riek, Art Hupy.

T-SQUARE TALK

new offices, branches

Jack George, formerly a principal in the firm of Renfro & George, architects, has opened his own office at 188 E. 17th St., Costa Mesa, Calif.

James B. McDaniel has opened an office for the practice of architecture at 1522 E. Charleston, Las Vegas.

W. Ted Wilson, electrical engineering consultant, has started his own practice at 1220 E. Center St., Bountiful, Utah. He formerly was associated with Intermountain Engineers in Salt Lake City.

The Los Angeles architectural-engineering firm of Austin, Field & Fry and the Hawaiian architectural firm of Frank Slavsky have formed a Pacific division association with offices in the Halau Building, International Market Place, Honolulu. Lt. Col. E. S. Thompson, USAF (ret.) wil head the organization as a separate unit from Austin Field & Fry's California operation.

new associates

Bill Scarbro has been named an associate in the Phoenix architectural firm of Allan & Olsson.

firm changes

John E. Stafford and Kenneth L. Morin have added a third partner, James Longwood, to form the firm of Stafford, Morin & Longwood, continuing their practice at 2505 Capital Drive, Eugene. Longwood had been in private practice until recently when he associated with Stafford & Morin in the competition to design a new city hall for Eugene. The trio won out over three other finalists.

The Los Angeles architectural firm of Matcham & Granger has been dissolved. Charles O. Matcham continues to practice at 1258 W. First St. under the name of Charles O. Matcham & Associates. Stewart S. Granger has organized the firm of Granger-Chalmers-Associates at 1052 W. Sixth St.

The Payette, Idaho, firm of Johnston & Smith, architects, has been succeeded by Johnston & Associates Principals are Charles W. Johnston and associate Robert J. Smith.

Two Salt Lake City architects have organized a firm known as Ehlers & Ehlers with offices at 733 Carnation Drive, Sandy, Utah. Principals are Arnald H. Ehlers and A. Jack Ehlers, both formerly of Architects Associated, which is now dissolved.

James Plenert has joined the architectural firm of Gonzales, Plenert & Ludlow in Phoenix.

acquisitions

The Los Angeles architectural-engineering firm of Charles Luckman Associates has acquired full interest in Richard George Wheeler & Associates, San Diego architects-engineers. The latter organization will remain completely intact, operating as a division with Wheeler as president. He also becomes a vice president of CLA and a member of its management group.

deaths

Lewis Eric Sandstrom, 62, Provo, Utah, architect, died May 14 after a cerebral vascular accident suffered earlier in the day. He was architect for the San Juan School District the past six years. A prominent church leader, he designed numerous chapels of the Church of Jesus Christ of Latter-Day Saints, the most recent of which was for his own Provo Seventeenth Ward.

new addresses

Dreyfuss & Blackford, architects, to 2729 I St., Sacramento.

O'Neil Ford and Carl Groos Jr., associated architects, to 3101 E. Alameda, Denver.

Wayne F. Owens, architect, to 1210 S. Queen St., Honolulu.

Bernard W. Lorance, architect, to 847 E. Colfax Ave., Denver.

Rickey & Brooks, architects, to 2636 Fulton Ave., Sacramento.

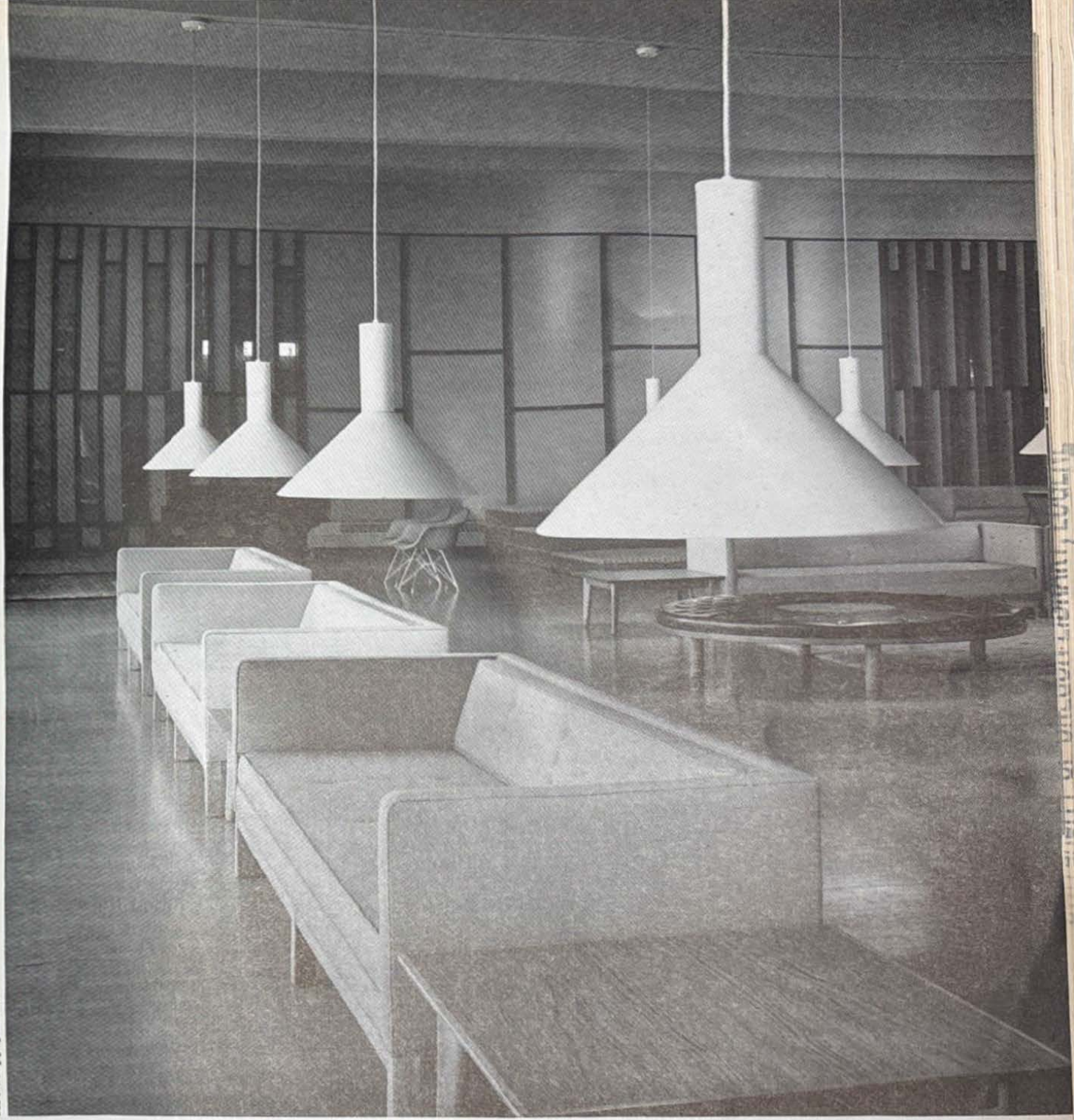
elections, appointments

A. W. McKelvey has been named executive vice president and member of the board of George Vernon Russell & Associates, architects-engineers of Los Angeles and Sunnyvale, Calif. He formerly was asociated with Charles Luckman Associates as vice president of client relations.

Gerald Moffitt, architect, has been elected president of the Las Vegas Junior Chamber of Commerce.



COPYRIGHT 1961 BY BLUMCRAFT OF PITTSBURGH • 460 MELWOOD ST., PITTSBURGH 13, PENNSYLVANIA



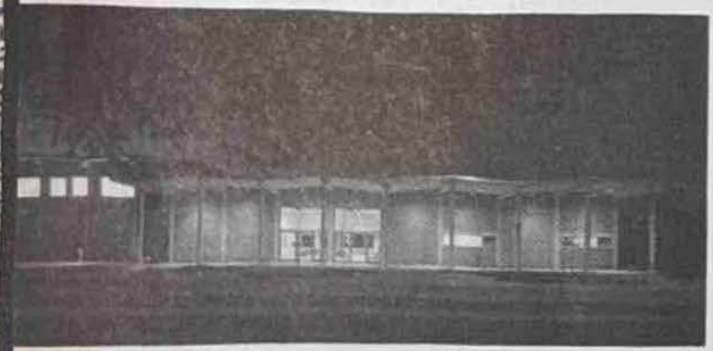
Art Hupy photos

A relaxed personality to match its purpose

The students themselves at Western Washington College share in the design success of their "living room" of the campus (Honor Award winner in the Washington State Chapter, AIA, competition), for they originated the project and financed it totally through self-voted fees; only the land was paid for by the state. The $485,000 budget resulted in a carefully detailed structure and in carefully selected furnishings, many of which were especially created for the building. It would be difficult indeed to find a more tastefully appointed student center anywhere in the land. The photographs on these four pages show what happens when interior design becomes a truly integrated part of architecture and not a thing apart that serves merely as a casual afterthought.



WOODSY CHARACTER of campus is evident from entry.



EAST ELEVATION has minimum of windows for privacy.



WEST SIDE of building enjoys view of water.



HANGING FIXTURES in main lounge glow in pools

DISTINCTIVE TAPERED COLUMNS, wide expanses of glass, balc nies that bring a magnificent view even closer and an interi geared to relaxation and discussion clearly define the noninstitu tional purposes of this student union building perched on a slo ing site near the western edge of the campus.

The building accommodates itself to the hill by having e tries at four different levels, a solution that also serves to deli eate the various functions that it must serve. At the main e trance on the east, a generous plaza is paved with hexagon blocks which continue under the projecting porch and lead in the main lobby through plate glass doors.

A series of terraces on the south lead to the coffee sho level so that tracking through the main level is held to a mini mum. The west entry from the alley serves the publication area which is kept open at night, while service entries are on th lower and intermediate levels at the north.

Large windows, shaded by sun control slats and balconie take advantage of the excellent vista of Bellingham Bay. Bal conies also serve a functional purpose as footing for windo washers. Window size on the main street side is kept to minimum for privacy.

"Considerable effort was made to refine the building i detail so that it would maintain its quality for many years," th architects comment in discussing their approach. "This can b seen in the tapered columns and their connections at both top and bottom, the clear expression of the concrete structural frame and the brickwork. A type of brick was used which varies



ination when raised for dances or public functions.

Student Union Building
Western Washington College
of Education
Bellingham, Washington

BASSETTI & MORSE
Architects

DOUGLAS BENNETT
Interior Design

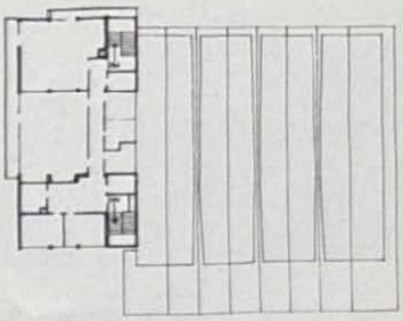
WORTHINGTON & SKILLING
Structural Engineers

HERB & NARODICK
General Contractors

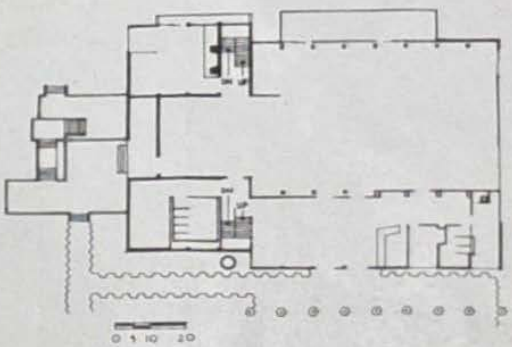
slightly in color gradation from one to another in fine separate shades. They were laid between the exposed columns each row of one shade only and with no regular pattern to the distribution of rows."

Structure is reinforced concrete frame with pan-joist floors and T-beam combination prestressed and cast-in place roof construction. Interior walls and ceilings are mainly plastered. There is some stucco on the outside. Publications area has an acoustical tile hung ceiling with fluorescent lights. Flooring is magnesite and magnesite terrazzo on the stairs and in the lobby, pressed wood tile in the main lounge and vinyl asbestos tile elsewhere.

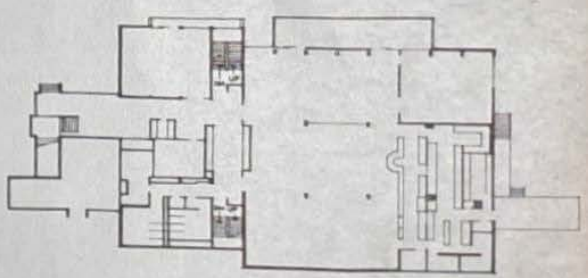
The building was designed to provide an informal gathering



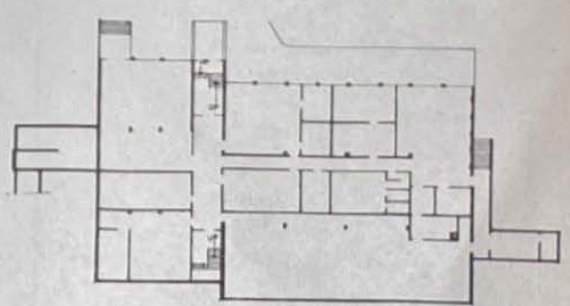
UPPER FLOOR
(Student government meeting rooms, offices)



MAIN FLOOR
(Lounges, powder room, offices)



INTERMEDIATE FLOOR
(Coffee shop, barber shop, lounge)



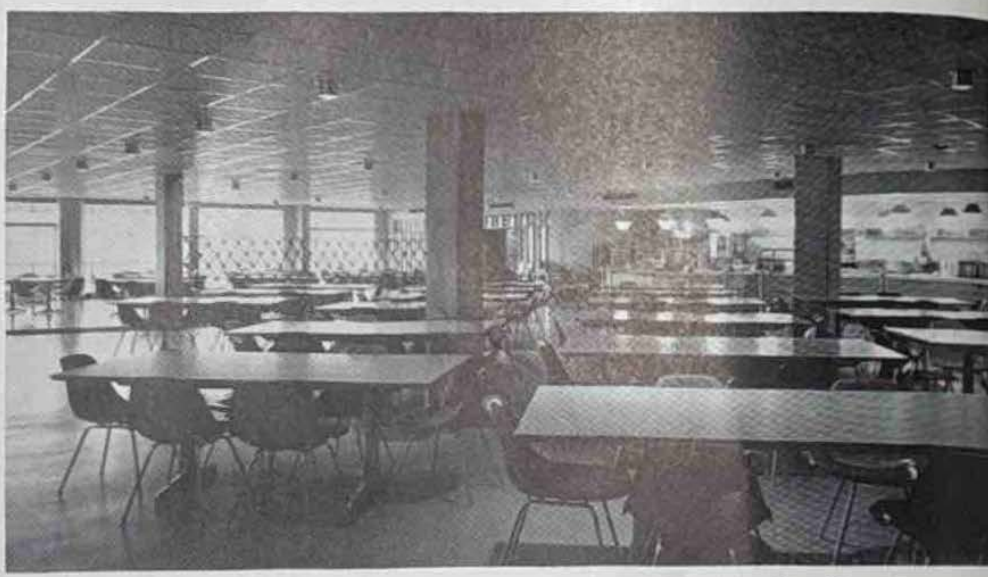
LOWER FLOOR
(Publications area, workroom, recreation room)



COFFEE SHOP is bathed in warm tones of yellow brick wall and coral rubber tile floor.

center for students, coffee shop and snack bar, a place for dance and other social gatherings, such as occasional musical recitals, seminars, lectures to small groups, etc.; to provide rooms for meetings of both student and faculty groups, for housing student government offices and student publications; to provide recreational areas such as ping-pong, billiards, etc., workroom facilities for student projects; and a barber shop.

Stern & Towne were the mechanical engineers; R. W. Beck & Associates, electrical engineers.



WOVEN ROPE SCREEN in background helps separate areas in coffee shop. All tables are modular



MOROCCAN CARPETS underneath comfortable seating give residential quality to groupings.

OUTLINE SPECIFICATIONS

Structure: foundation, frame and roof: reinforced concrete; some precast and prestressed beams—Graystone Prestress, Inc.; floors: concrete.

Exterior Finish: brick — Hebron Brick Co.

Roof Surfacing: built-up with gravel.

Windows: fixed glass in wood.

Doors: exterior: aluminum and aluminum sliding—Fentron Industries, Inc.; interior: solid core senwood.

Floor Surfacing: magnesite, magnesite terrazzo, pressed wood tile and vinyl asbestos tile.

Insulation: rock wool.

Interior Finish: plaster and exposed brick.

Ceilings: plaster and some acoustical tile.

Lighting Fixtures: Lightrolier, Inc.; Litecraft Manufacturing Corp.; Curtis-Allbrite Lighting, Inc.; some custom designed.

Heating: from central plant.

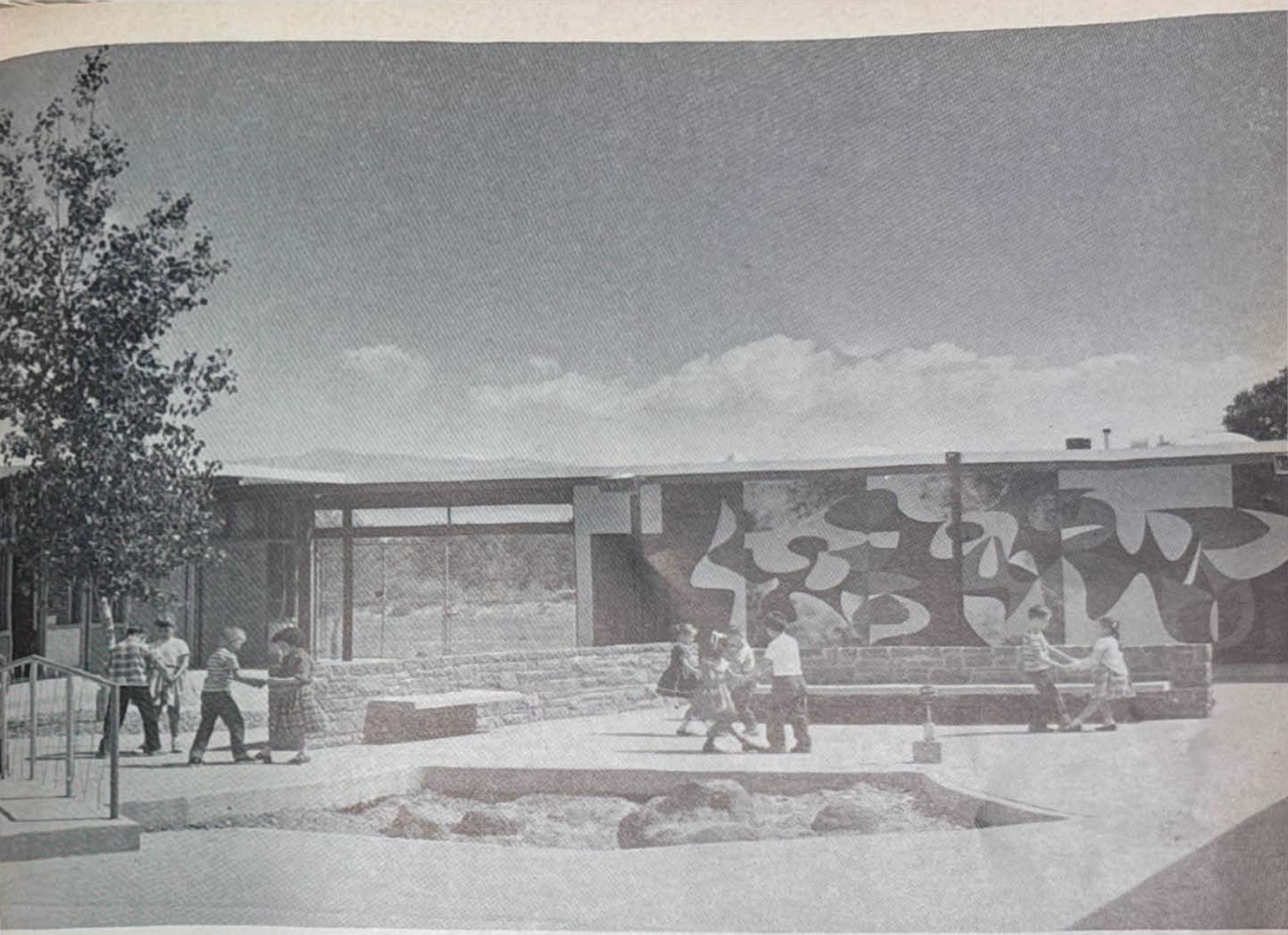
Plumbing: Kohler Co.

Total Area: 31,200 sq. ft.

Total Cost: $486,216.

Cost per Square Foot: $15.60.

Date of Completion: October 1959.



MURAL'S LYRICAL PATTERN executed by Alice Garver on block stucco in outside enamel and sealed is brilliant accent against clear blue skies, natural earthy colors of landscape and rigidity of building.

Four schools with a respect for their locale

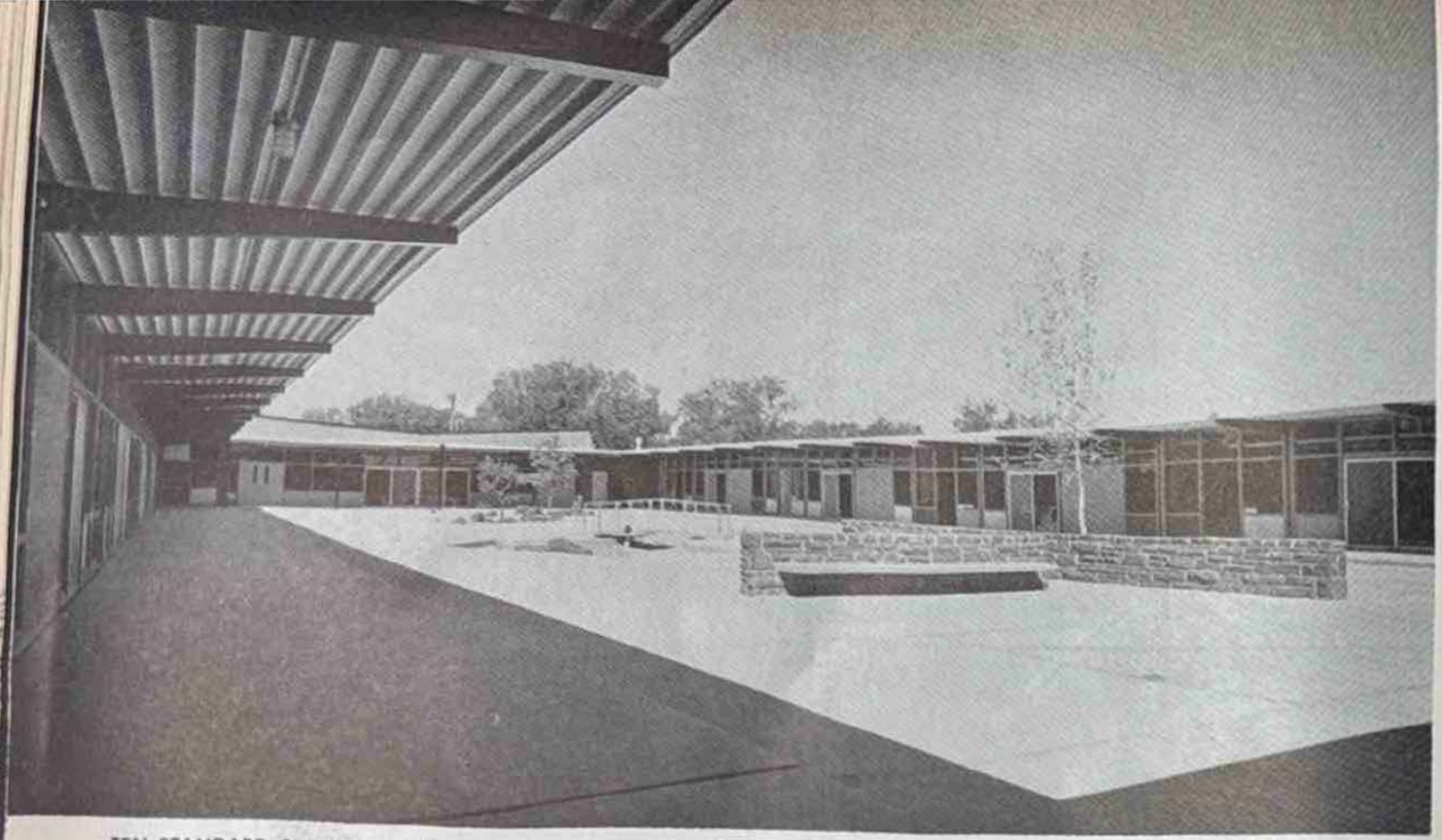
Armijo Elementary School
Albuquerque, New Mexico

•

STANLEY & WRIGHT
Architects

FRED J. FRICKE
Structural Engineer

HESSELDEN CONSTRUCTION CO.
General Contractor



TEN STANDARD CLASSROOMS face court for teaching first four grades (fifth and sixth are in another building).



EXTERIOR WALL MURAL takes motif from 70-ft. original painted on masonite panels in multipurpose room.

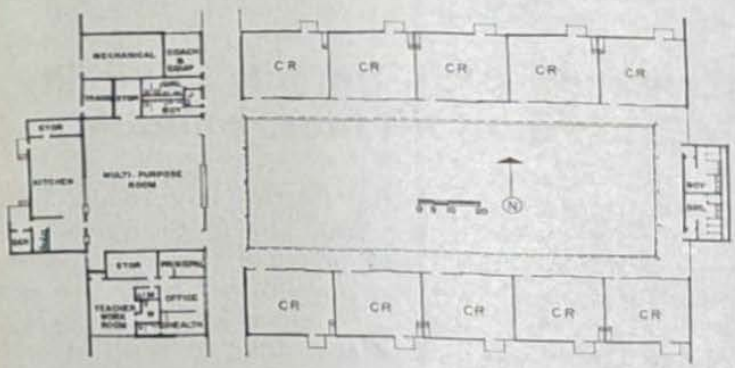


LITTLE PLANTING can be done in area, leaving much barrenness which is often sand, as seen here; hence paved interior court.

A simple and sound solution to Southwest's sun problem



NATURAL CROSS VENTILATION results in each classroom because of grouping on each side of patio. Steel decking is exposed.



INTENSE SUN and blowing dust are part of the standard problems faced by architects in the Southwest. Solution in the case of this 10-classroom elementary school building was to design a rectangle around an open patio, reminiscent of early-day answers to the same problem.

Heating is not much of a problem in Albuquerque. But cooling during the warmer months is another story. Specifically, temperature and humidity ranges make it possible to remain comfortable if one is in the shade taking advantage of the slight breeze, but it can become quite unbearable in the direct sunlight. By grouping five single-depth classrooms on each side of the patio and using outside corridors, the architects have provided natural cross ventilation through each room. Extensive roof overhang, 8 ft., protects the outside circulation area and keeps exterior walls in continual shade.

Due to lack of rain, little planting can be done, with the result that breezes bring dust and tumbleweeds. To meet this problem, the interior patio has a minimum amount of planting and much paving, allowing outdoor group activity protected from blowing dust and the hot sun.

Another design factor is that any building opening to the west will find these spaces almost uninhabitable through the warm months due to the intensity of the direct sunlight. Therefore, the kitchen, storage area, multipurpose room and mechanical rooms face that direction so that the need to open the building in this direction is overcome.

The school has 10 standard 30x30-ft. classrooms. Structural system is steel frame and metal decking with brick or metal curtain walls used throughout.

"I feel this school solves some of the problems of architecture here in the Southwest better than anything to date," says Don P. Schlegel, assistant professor of architecture at the University of New Mexico. "As successful as this building is, it has somewhat defeated itself at its own game. By paving most of the patio and opening large areas of glass from the classroom to this well-defined space, a new problem of glare was introduced which becomes quite annoying at times.

"This building makes one realize the wonderful possibilities in building schools of prefabricated, three-dimensional spaces. For it seems quite natural that technology will in the future lead us to the production of larger components and when the functions within a classroom are similar, they can be easily answered through the arrangement of these space cubes. The possibilities appear unlimited. For example, the programmed addition to this building can be easily accomplished by adding another 10 classrooms to the east, repeating another patio."

Bridgers & Paxton were mechanical engineers; Uhl & Lopez, electrical engineers.

OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete grade beams on piers; frame: steel wide flange sections with tubular steel units; roof: 2½-in. steel decking with 1-in. rigid Fiberglas insulation; walls: nonbearing concrete block; floors: concrete slab.

Exterior Finish: stucco; mosaic tile—Cambridge Tile Co.

Roof Surfacing: five-ply built-up—Ruberoid Co.

Windows: aluminum projected—Mesker Bros. Iron Co.

Doors: exterior: flush metal; interior: flush solid core birch plywood—Roddis Plywood Corp.

Floor Surfacing: asphalt and vinyl asbestos tile—Kentile, Inc.

Interior Finish: exposed masonry; tempered pegboard—United States Plywood Corp.

Ceilings: exposed steel decking.

Lighting Fixtures: fluorescent—Sunbeam Lighting Co.

Heating: hot water in convectors.

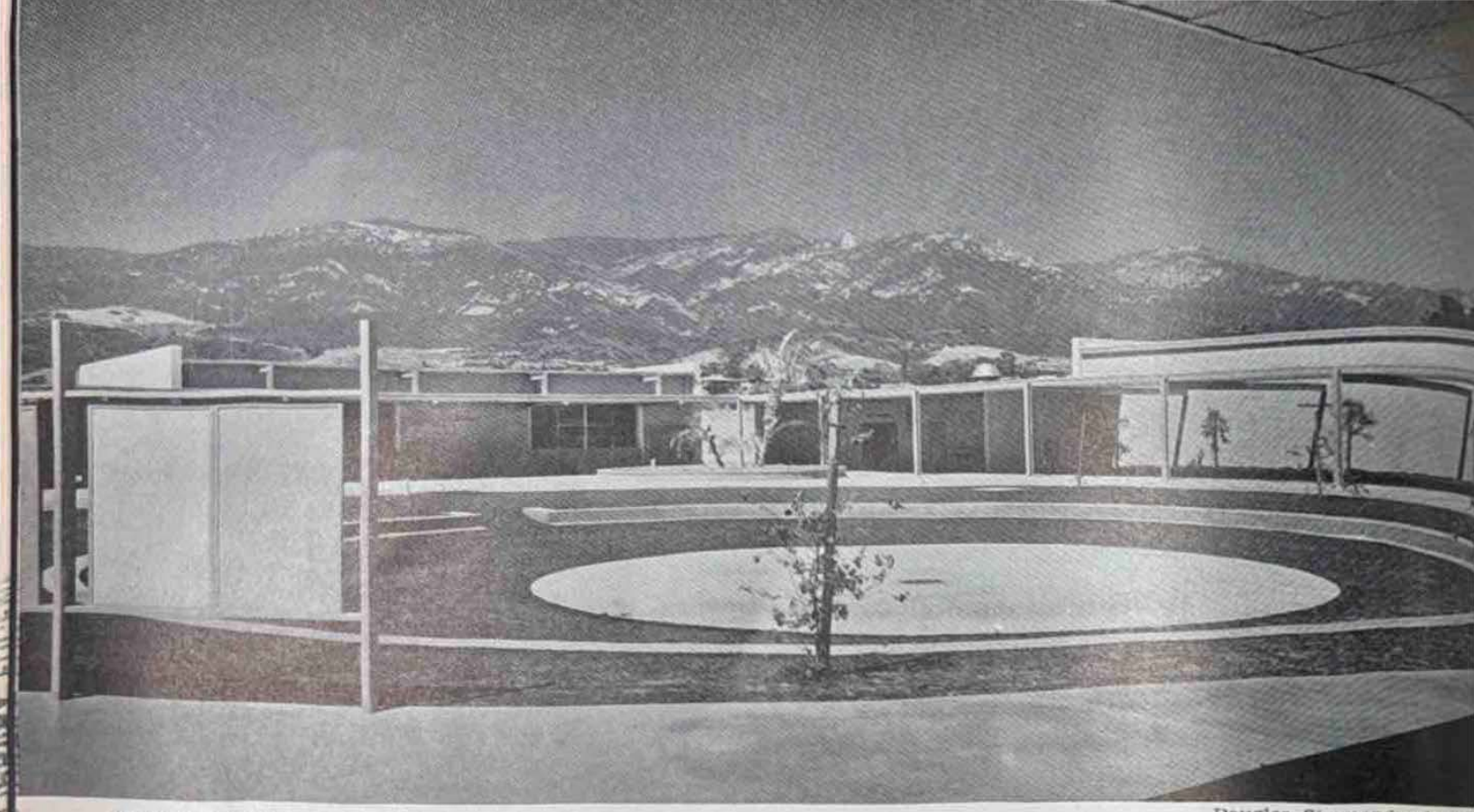
Plumbing: American-Standard.

Total Area: 18,500 sq. ft.

Total Cost: $209,000.

Cost per Square Foot: $11.30.

Date of Completion: August 1959.



SPANISH MEANING of La Colina is "little hill"; vistas of mountains and surrounding valleys have been captured by careful siting of buildings.

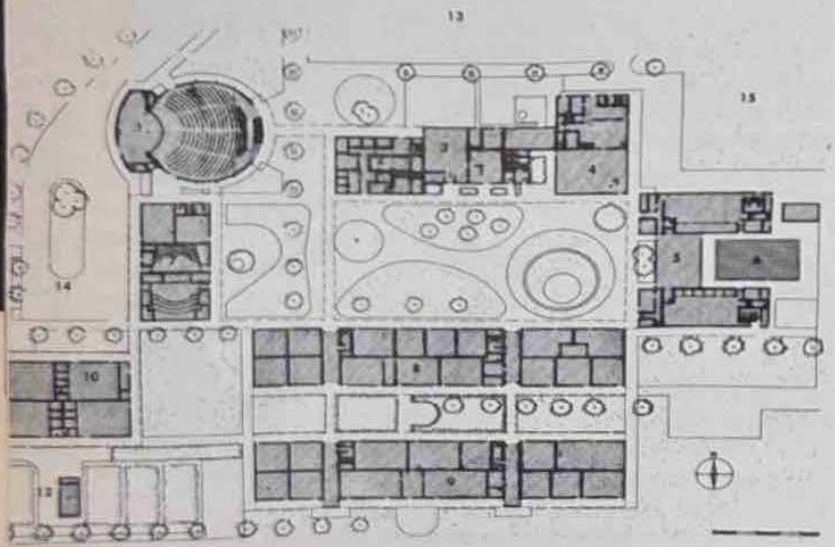
Douglas Simmonds photos

La Colina Junior High School
Santa Barbara, California

ARENDT, MOSHER, GRANT
Architects

ROPP & ROPP
Structural Engineers

KENNETH C. URTON
General Contractor



Clustered plan permits flexibility in educational ideas, buildings

CAMPUS STYLE was selected for this large junior high school as best fitting the basic aim of the project: to provide a pleasurable and practical learning environment for more than 1,000 preteen and early teen-age students and for a staff of 60 educators. Buildings are clustered on the campus according to function and within each provisions are made for future changes in size and in use as curriculum and teaching methods are modified. Space has also been set aside for a future auditorium and a swimming pool.

Since this was the first secondary school to be built in the Santa Barbara area in more than 25 years, it presented a challenge to the entire community in restyling its concepts of educational goals and architectural values. In describing the design goal, the architects comment: "A full year of study went into the development of educational specifications and preliminary plans. Cooperating with our staff was a steering committee consisting of school district personnel and interested lay leaders. The educational requirements for the new school were carefully established and evaluated prior

KEY: 1. Future Auditorium; 2. Administration; 3. Library; 4. Cafeteria; 5. Physical Education; 6. Future Training Pool; 7. Music and Dramatic Arts; 8. Academic Classroom Building No. 1; 9. Academic Classroom Building No. 2; 10. Industrial Arts; 11. Service Building; 12. Lath House; 13. Parking; 14. Bus Loading; 15. Athletic Fields.

to the development of an architectural plan. The entire community was kept informed of the planning process through frequent newspaper coverage.

"Spanish influence in older school architecture in the area was discarded in favor of a fresh approach to school design and operation."

Construction materials were selected both for durability and maintenance ease and for esthetic appeal. Concrete block, sandblasted to reveal its natural texture, is used extensively. Steel decking spans 30 ft. and cantilevers an additional 10 ft. to form the covered walkways. Acoustical panels and fluorescent lighting are integrated into the roof decking. Bright accent colors have been used throughout.

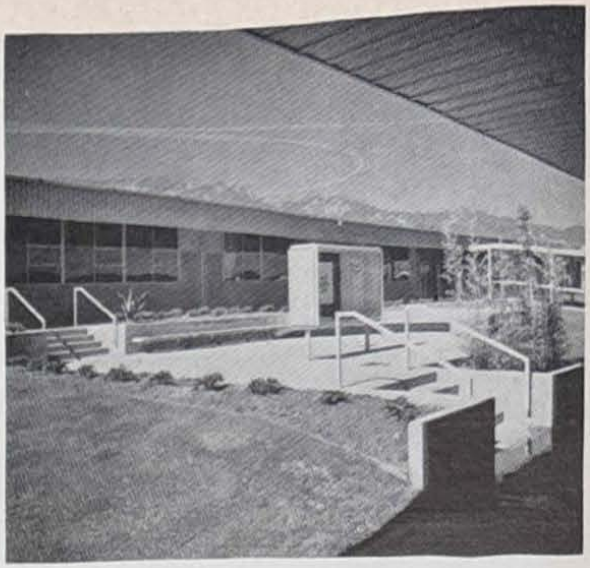
Classroom buildings have a number of special features: free-standing modular cabinets, movable chalk- and pinboards; special central storage facilities for science, art and homemaking materials. All classrooms can be darkened for use of audio-visual materials and all have provision for television transmission and reception. Classrooms for music, oral English and theater arts are grouped together in one building (next to the site for the future auditorium).

Physical education building provides for staff supervision of all activity areas, including shower and locker rooms from elevated offices. Dressing lockers are perforated to allow the room air to be exhausted through them, a measure designed to eliminate locker room odor.

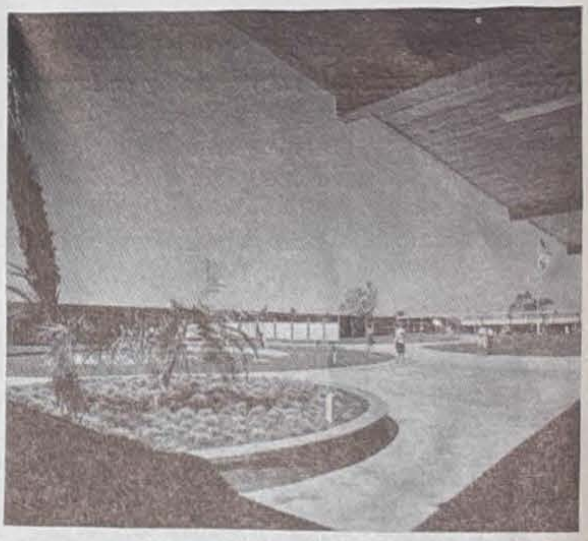
Industrial arts building has four shops, each designed to handle two different subjects in the curriculum. Central dust collection is provided and truck delivery can be made to each shop.

In addition to its basic academic function, the school will serve as a recreational and cultural center for the community, requiring facilities for parking, night lighting and adult activities. Thus, the future auditorium is near the parking area, accessible to the public.

Landscape architect was Richard B. Taylor; mechanical-electrical engineers, Archer, Spencer & Whitford.



ACADEMIC BUILDING has dropped metal fascia on south side to shade glass.



LANDSCAPE PLAN, with its informal patterns, provides for outdoor teaching and natural gathering spots for students.



LIBRARY is adjacent to storage and disbursing facilities for textbooks and audio-visual materials, is equipped with listening booths.

OUTLINE SPECIFICATIONS

Structure: foundation: concrete; roof: long-span steel decking — Fenestra, Inc.; bearing walls: lightweight concrete block, stacked bond and sandblasted; floors: concrete slab on grade.

Exterior Finish: sandblasted concrete block.

Roofing: 1-in. cane fiber insulation, built-up asphalt and cinder rock surfacing—Fry Roofing Co.

Windows: painted steel sash—Soule' Steel Co.

Doors: exterior: steel—Overly Manufacturing Co.; interior: solid flush—General Veneer Manufacturing Corp., Roddis Plywood Corp.

Floor Surfacing: vinyl asbestos tile—Flintkote Co.

Interior Finish: sandblasted concrete block; painted plaster.

Ceilings: painted steel deck flanges with gypsum acoustical tile — (Acousti-Celotex) The Celotex Corp.

Lighting Fixtures: fluorescent flush mounted in steel decking—Lighting Dynamics.

Heating: central forced warm air in each building with permieter heating trenches, air retempered by hot water sill convectors in each classroom — American Blower, Hayes Furnace Co.

Plumbing: fixtures: Crane Co., American-Standard; showers —Logan Manufacturing Co.

Total Area: 111,078 sq. ft.

Total Cost: $1,780,000.

Cost per Square Foot: $16.

Date of Completion: September 1959.

Carbon High School
Price, Utah

EDWARDS & DANIELS
Architects

JOSEPH PATRICK
Structural Engineer

JOHNSON CONSTRUCTION CO.
General Contractor

Stereotyped groupings discarded along with the windows

WINDOWS, or rather the lack of them, are the key design element in this high school serving 900 students. By using skylights as the daylighting source, the architects gained considerable freedom in grouping classrooms, unencumbered by such requirements as an exterior wall for each room. The result is a highly integrated plan, meeting the flexible needs of modern teaching concepts and costing less than more standard school design.

Classroom portion of the building includes laboratories down a central core with no exterior windows. These are large rooms, housing active tasks where visual release to the exterior is not necessarily an important factor. By eliminating windows here all together, expensive outside walls are reduced, the heat load is minimized, mechanical and electrical distribution runs are kept very short, and the plan of the laboratory rooms themselves is simplified since no windows break up the much-needed wall space.

Skylighting was selected, the architects say, after a thorough study of daylighting needs and problems as the best means of providing well-balanced illumination over the entire area and of eliminating glare resulting from an overabundance of light from a single source. Prismatic glass blocks sealed within aluminum frames are used for the units. Artificial lighting is closely integrated with the natural lighting by utilizing continuous louvered troffers across the classrooms which contain both the skylights and flourescent reflector strips.

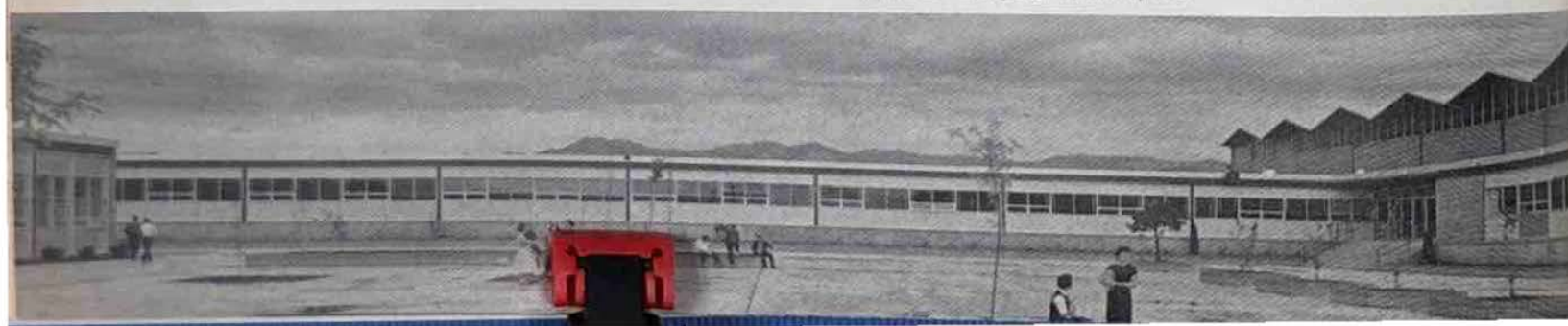
A vision strip has been provided on exterior rooms large enough to give an outlook for the students seated within but not so large as to disturb the balance of lighting from the skylights. Any closeness that might be felt in the interior rooms has been minimized by providing continuous glazing above door height on the corridor wall.

In order to provide a focal point and unifying influence for all the diverse interests within the complex



STRUCTURAL STEEL FRAME on regular bay spacing achieves economy by repititious length, size and connections. Serrated roof over gymnasium and auditorium is made possible by following form established by bracing between spanning trusses. Frame is dark blue, porcelain enamel panels are blue with several orange accents.

GREAT COURT around which building is planned serves as crossing for student traffic and assembly point for informal gatherings. Planters accommodate trees for shading, are raised to seat height to promote lounging within space.



OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete; frame: steel—United States Steel Corp.; roof: steel decking—Fenestra, Inc.; floors: concrete slab.

Exterior Finish: brick—Provo Brick & Tile Co.; porcelain enamel curtain wall—Marmet Corp.

Roof Surfacing: 20-year built-up — Johns-Manville Corp.

Windows: aluminum projected sash—Marmet Corp.; heavy sheet polished plate glass—American Window Glass Co.

Doors: exterior: aluminum — Marmet Corp.; interior: hollow metal.

Floor Surfacing: asphalt and rubber tile—Flintkote Co.; maple in gymnasium (Perma Cushion) Robbins Flooring Co.

Insulation: acoustical: 2½-in. batts—Owens-Corning Fiberglas Corp.; thermal: square edge fiberboard—Johns-Manville Corp.

Interior Finish: face brick; integrally colored stucco; ceramic tile in toilet rooms—(Hermosa) Gladding, McBean & Co.

Ceilings: acoustical metal decking—Fenestra, Inc.; acoustical tile in corridors—Johns-Manville Corp.

Lighting Fixtures: fluorescent reflector strips—Sunbeam Lighting Co.; skylights—(Toplite) Kimble Glass Co.

Heating: tunnel delivery ventilating system; low pressure steam boiler and finned tube radiators—National-U.S. Radiator Co.; electrical controls—Barber-Coleman Co.

Plumbing: Kohler Co.

Total Area: 125,000 sq. ft.

Total Cost: $1,556,800.

Cost per Square Foot: $12.46.

Date of Completion: August 1959.

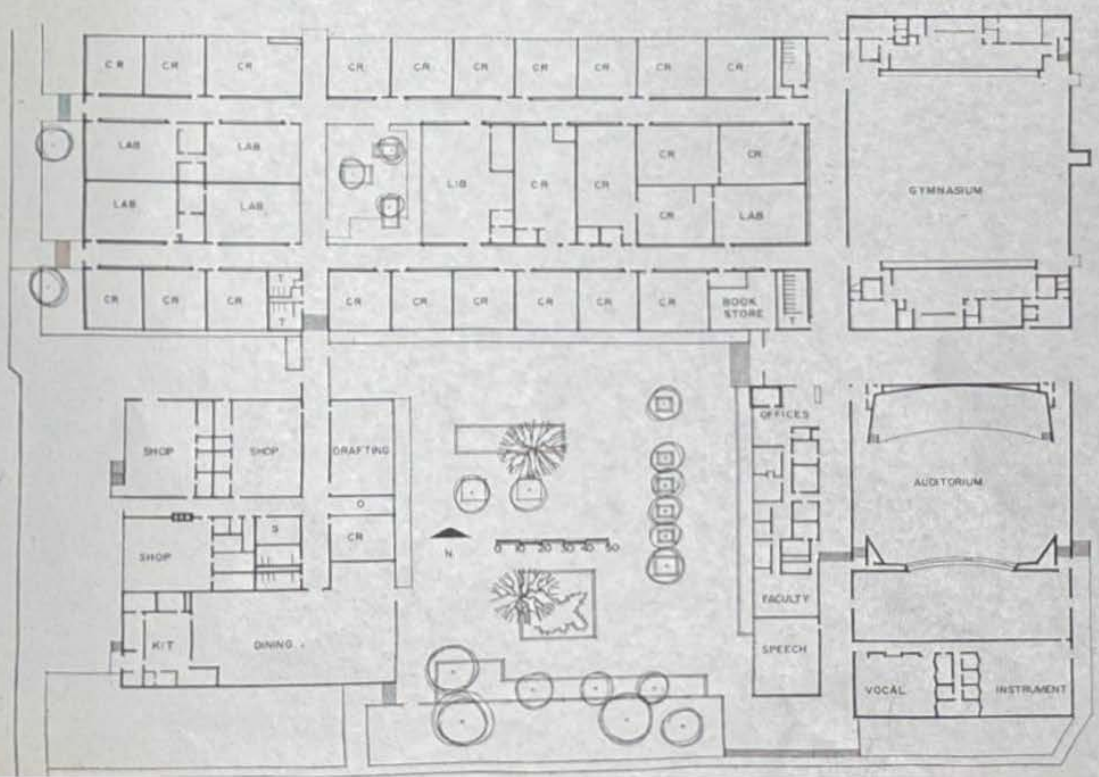


STOVEPIPE FIXTURES in lobby are custom made. Form of building, characteristics of exposed structure and natural color of materials used comprise "artwork," architects explain.

school, the building was planned around a great court. It was felt that such an element could play an important role in the social development of the students within the school, a most important factor in secondary education.

High, serrated roof profile, housing the gymnasium and auditorium, is built above a flat roof plane covering all classroom units. This contrast in form fits in well with the natural elements in Carbon County where the mountains rise above the flat buttes of the benchland.

Mark L. Bryner was mechanical-electrical engineer; L. K. Irvine, acoustical consultant.



Laupahoehoe School
Laupahoehoe, Hawaii

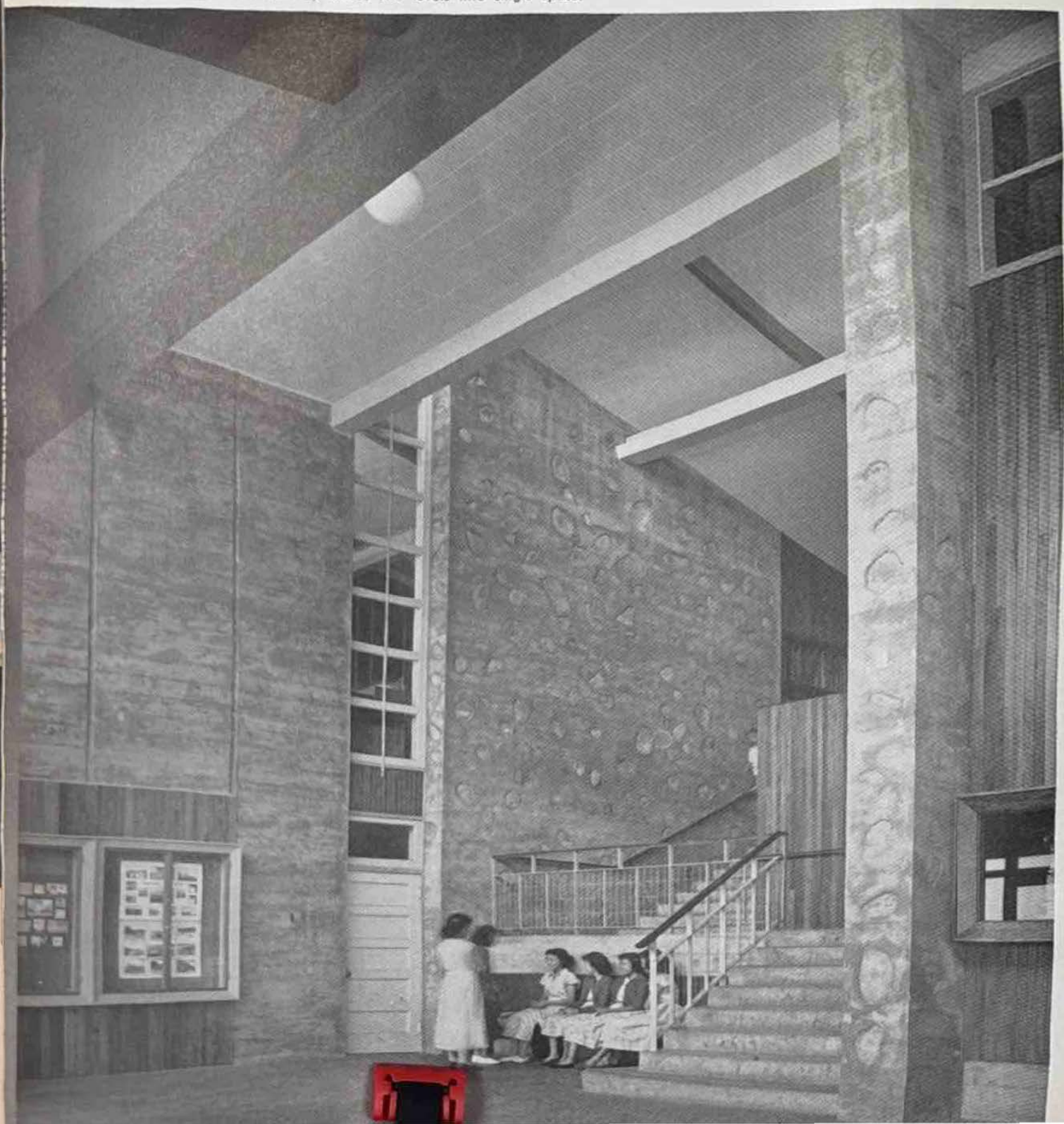
•

FISK, JOHNSON & PERKINS, OSSIPOFF
Architects

ALFRED PREIS
Architect in Charge

S. K. ODA
General Contractor

ENTRANCE LOBBY and stairway unites two levels into single space.



Kindergarten thru high school integrated in two-level scheme

IN MEETING the problems of a difficult site, varied program requirements and a somewhat restrictive building code, the architects have designed a school that not only functions well but is visually expressive, especially in the use of native lava rock and ohia hardwood.

The original school, on the Hamka coast of the island of Hawaii, was struck by a tidal wave, causing the death of 16 children and four teachers and wiping out large parts of the old wooden building at the beach. No doubt this was a major factor in the decision to site the new school high up on the mountain slope.

Site could be reached only by a narrow, meandering road, impassable for such items as prefabricated roof trusses and long and expensive for trucking of cement products. At the same time, building code restrictions limited wood construction.

Weather also was a restrictive factor. Although temperatures are mild, ranging between 68 and 82 deg., brisk northeasterly trade winds come over the ocean 96% of the time, heavy tropical storms blow occasionally from the southwest, average annual rainfall is over 110 in. and moderate earthquakes are frequent.

Basic design requirements were for 16 classrooms for kindergarten, elementary and secondary students, along with the customary specialized facilities. Because of the heavy rainfall, a concentrated floor layout was developed. A ribbon plan following the contour lines overcomes the problems of the steep site and the necessity to reserve its flattest area for the athletic field. To reduce distances and facilitate circulation, the ribbon is split into two parts: kindergarten and elementary classrooms on the lower level and high school and community center core on the upper one.

This core, made up of the administrative offices, health rooms, library, audio-visual room, art room, special classrooms for sciences, business and home economics, cafeteria and adjoining assembly patio and teachers' lounges, is placed midway between the classrooms. Isolation from the general classroom wings is easy, an asset in its double-purpose function as a place for civic affairs and adult education. Entrance lobby and gently rising stairway unite the two levels into a single space.

The only two-story portion of the building, which according to the code had to be of Type-I construction, serves at the same time as a fire barrier. It contains health rooms accessible directly from the lobby, kindergarten, elementary school wing and approach road on the first floor and the library on the second floor. It also carries the flagpole to symbolize the unification of these elements.

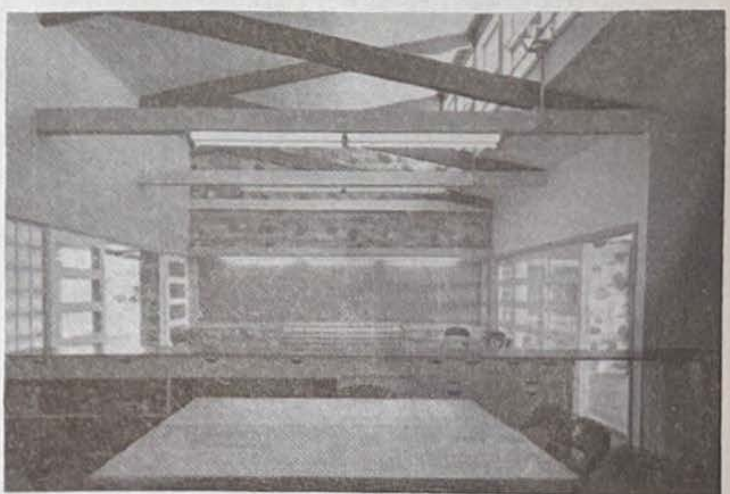
Wall heights of the classrooms range from 7 ft. 8 in. for the kindergarten to 8 ft. for the elementary



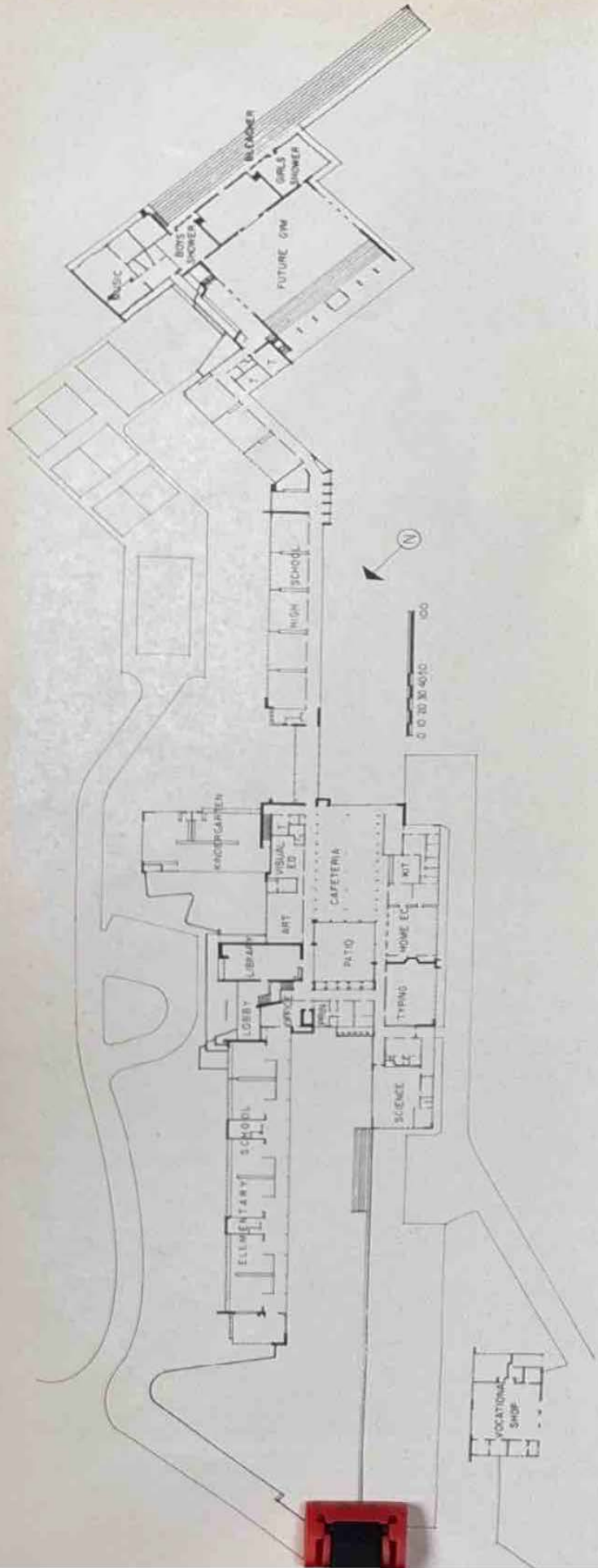
RIBBON-PLAN SCHOOL is not current—now nine years old—but included here because it continues to be one of Hawaii's finest educational plants.



HIGH SCHOOL WING LANAIS serve sheltered circulation only.



COLORFUL CLASSROOMS incorporate blue-greens and off-whites on trusses, coral on shelving, cabinetwork and lockers, soft pale yellow on cane fiber by windows, umber-tinted off-white on Douglas fir siding.



wing and 8 ft. 6 in. for the high school and center section. The architects report favorable reaction to this more familiar residential scale, noticed especially in the preschool and primary grades. High clerestories give the rooms expanse and good north light.

Windows are suspended from the roof structure and protrude out over the parapet, allowing for easily controllable air intakes in the window sills, a measure that has proven to be especially practical on the windward side.

All lanais are in the wind shadow of the classrooms. Those of the elementary wing serve for extensive outdoor activities and adjoin fenced-in play areas. Work alcoves open to both the indoors and the outdoors. Lanais of the kindergarten are larger and their storage and play facilities even more integrated with the classrooms. Lanais of the high school wing serve sheltered circulation only, although a section directly outside the student council room is widened to a "hangout."

Play areas for the smaller children are walled or fenced in for traffic safety. Paved play areas outside the high school wing render double service as overflow parking areas.

In the early planning stages, the client's program requirements were so vague and obsolete as to require a thorough research project, in collaboration with the staff members of the Department of Public Instruction, school faculty, PTA, student body and county engineer, leading in some cases to some new experimental standards. In the long run, this too turned out to be an asset. As the architects comment: "The early inclusion of the pupils, the parents and the staff members of the school in many of the design considerations resulted not only in a spirit of warm cooperation during the work process but in lasting sense of pride, ownership and accomplishment still apparent in the high standards of maintenance, landscaping and general care since its completion in 1952."

OUTLINE SPECIFICATIONS

Structure: lava rock, reinforced boulder concrete and native ohia hardwood; roof: corrugated iron with 2-in. thick pressure-treated and site-fabricated trusses spikes and joined with ring connectors; floors: integrally colored concrete.

Exterior Walls: lava rock, natural concrete and stained t&g Douglas fir.

Windows: painted Douglas fir sash.

Doors: painted Douglas fir.

Floor Surfacing: colored concrete on grade; some asphalt tile — (Tile-Tex) Pioneer-Flintkote; 1x4 off-white Douglas fir elsewhere.

Interior Walls: surfaced t&g Douglas fir; natural concrete; ohia hardwood in lobby.

Ceilings: cane fiberboard — (Canec) Pioneer-Flintkote.

Mechanical: water heater — (Sunray) National-U.S. Radiator Corp.

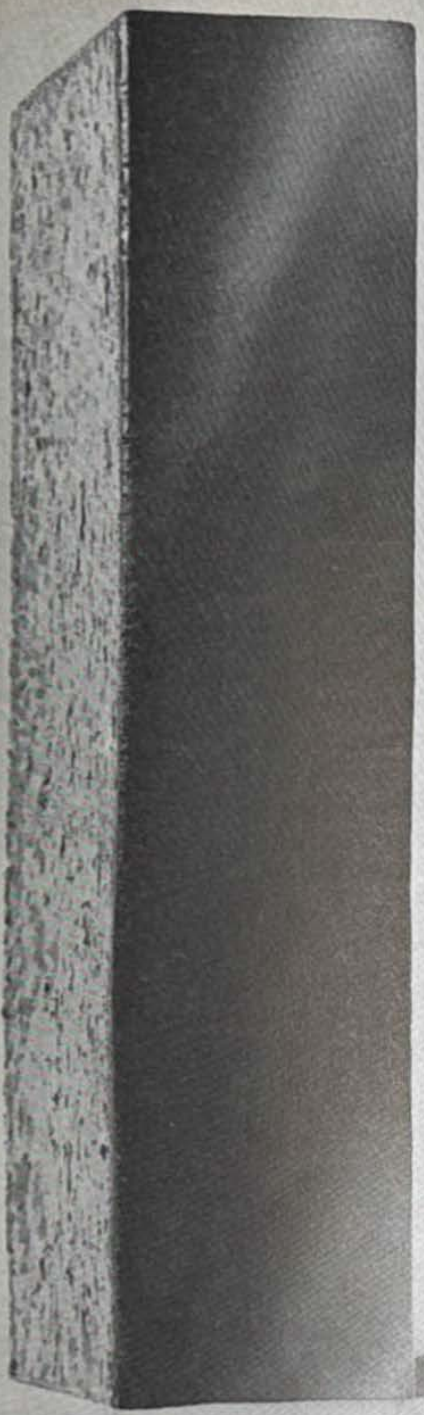
Plumbing: American-Standard.

Total Area: 52,464 sq. ft.

Total Cost: $809,533.

Cost per Square Foot: $15.23.

Date of Completion: spring 1952.



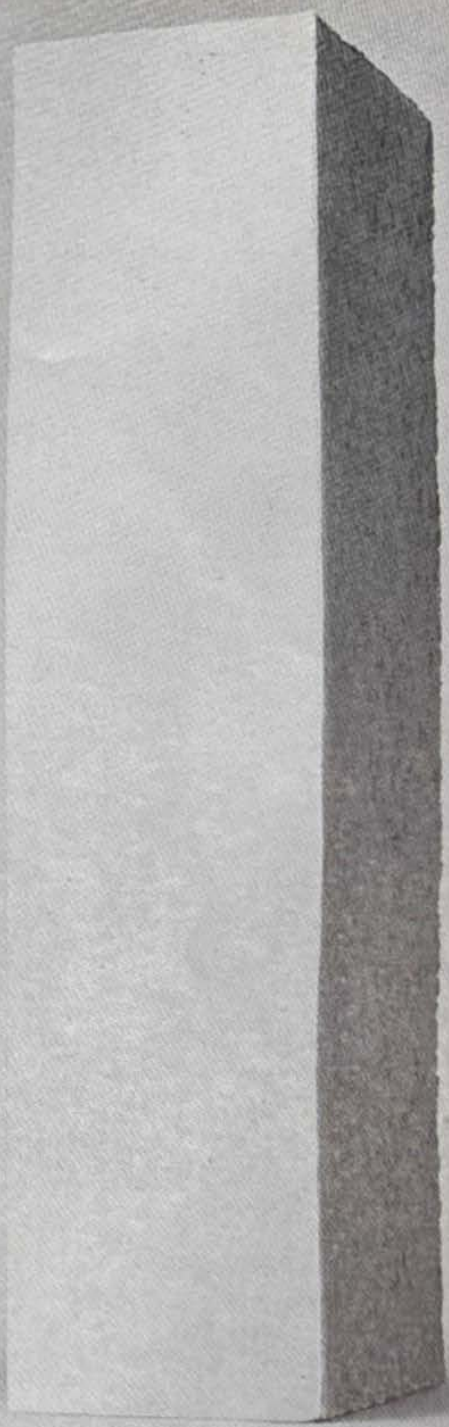
...and in between, there are 23 other colors in new Lincoln Glazed Brick

Ask your local Gladding, McBean & Co. representative to show you **all 25 everlastingly beautiful colors** of this modular-sized Norman glazed brick.

For your next project, you may choose **dark green,** perhaps...or **light blue.**

The Eastland Shopping Center May Co. in Southern California (Architects: A. C. Martin and Associates of Los Angeles), chose Lincoln Glazed Brick in **yellow.**

Bethlehem Steel Company garage building, San Francisco (Architect: Albert F. Roller, S.F.), used **black.**

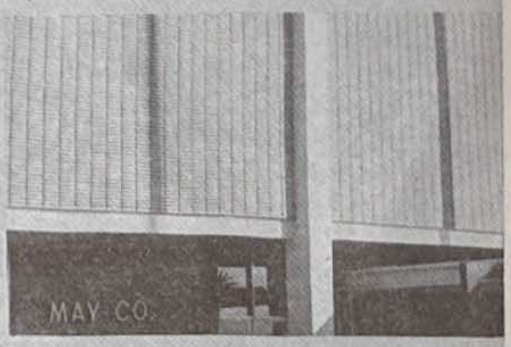


Lincoln Glazed Brick is made to ASTM specifications by
Architectural Products Division

GLADDING, McBEAN & CO.*

Sales Offices: Los Angeles · San Francisco · Phoenix

*You know them—they make Franciscan Hermosa Tile, Solar Screen, Ceramic Veneer, Roof Tile, Contour CV, Quarry Tile, Ceramic Mosaics ...and new Lincoln Glazed Brick in 25 colors.

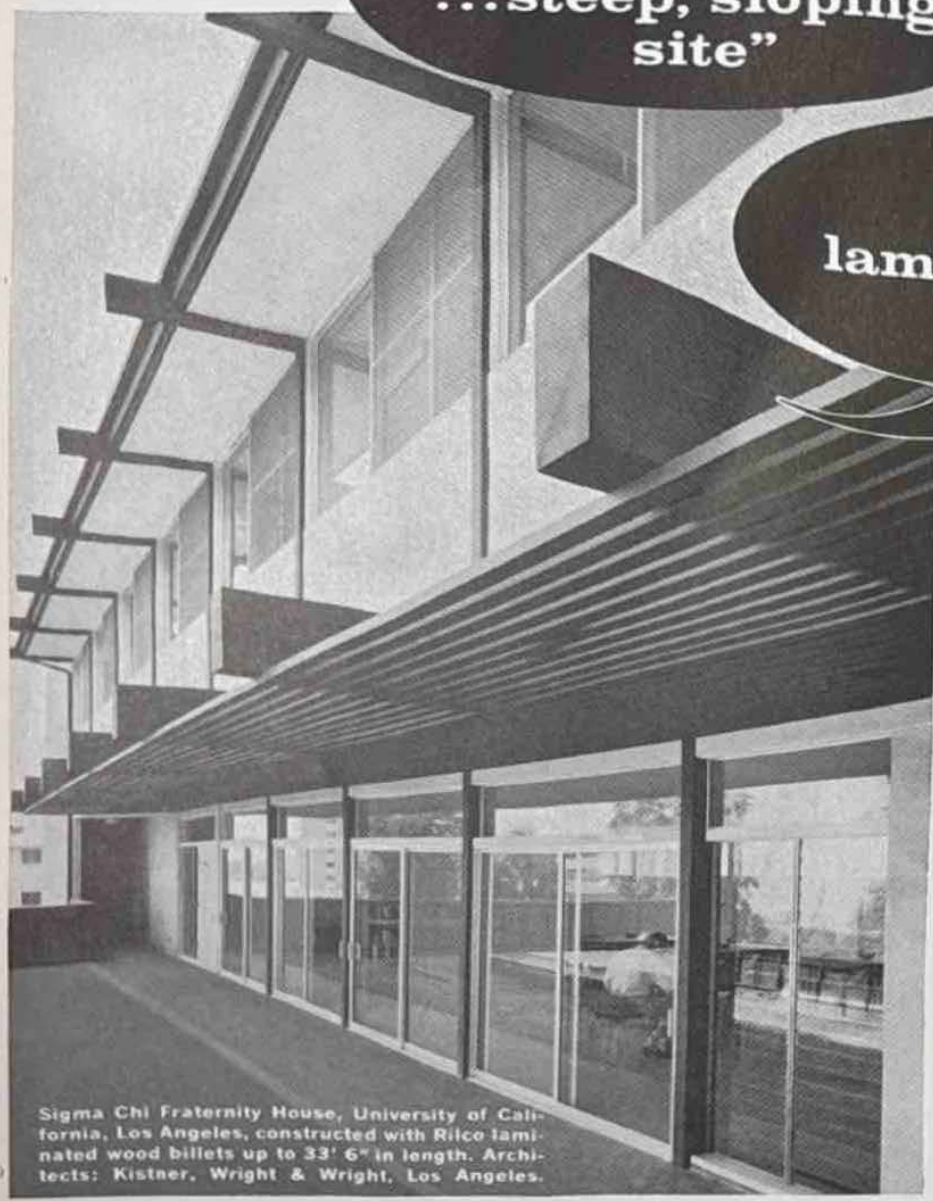


Problem:

"Limited budget ...steep, sloping site"

Answer:

"Rilco laminated wood beams"



Sigma Chi Fraternity House, University of California, Los Angeles, constructed with Rilco laminated wood billets up to 33' 6" in length. Architects: Kistner, Wright & Wright, Los Angeles.

Two problems challenged the designers of the new Sigma Chi Fraternity House, University of California: "A limited budget and steep, sloping site. One of the basic factors contributing to the success of the project," state the architects, Kistner, Wright & Wright, Los Angeles, "was the use of a simple structural system incorporating laminated wood beams. It offset the relatively high site preparation cost . . . lent itself well to future expansion plans, and allowed finishing on a 'do-it-yourself' basis by fraternity men."

Design flexibility, low cost, warm natural beauty . . . good reasons why more buildings of all types are constructed with Rilco laminated wood structural members. Rilco field sales engineers will be happy to consult with you, without obligation.



Write for free architectural catalog.

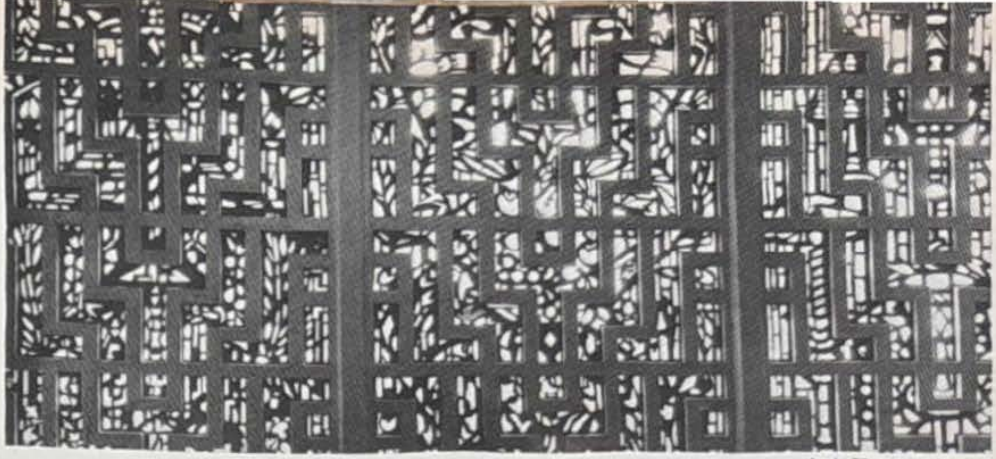


Weyerhaeuser Company

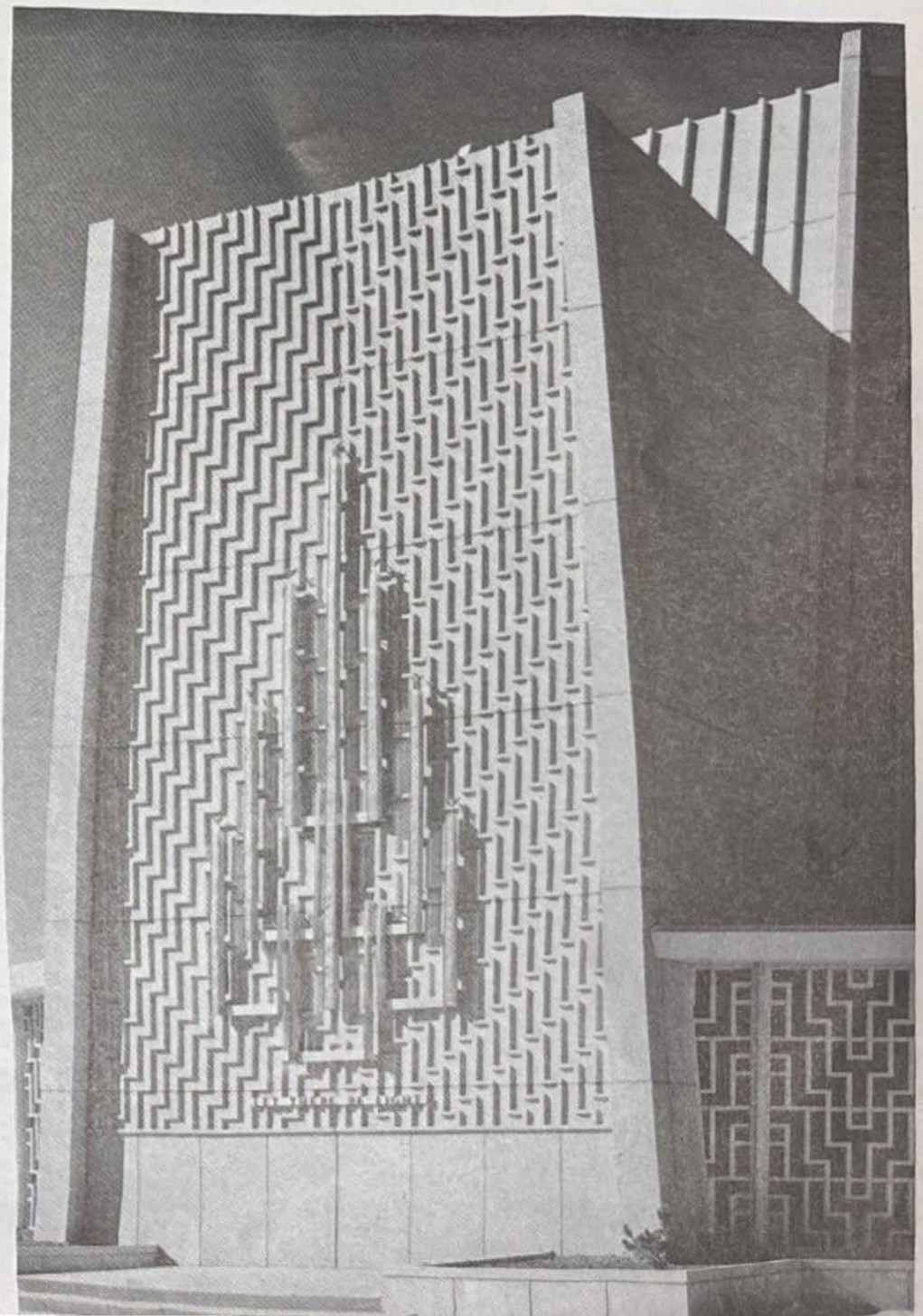
Rilco Engineered Wood Products Division

616 Professional Building, Tacoma 5, Washington, BRoadway 2-2249

methods & materials



Art Hupy photos



SEATTLE'S TEMPLE DE HIRSCH (see next page).

Precast units mark Seattle temple

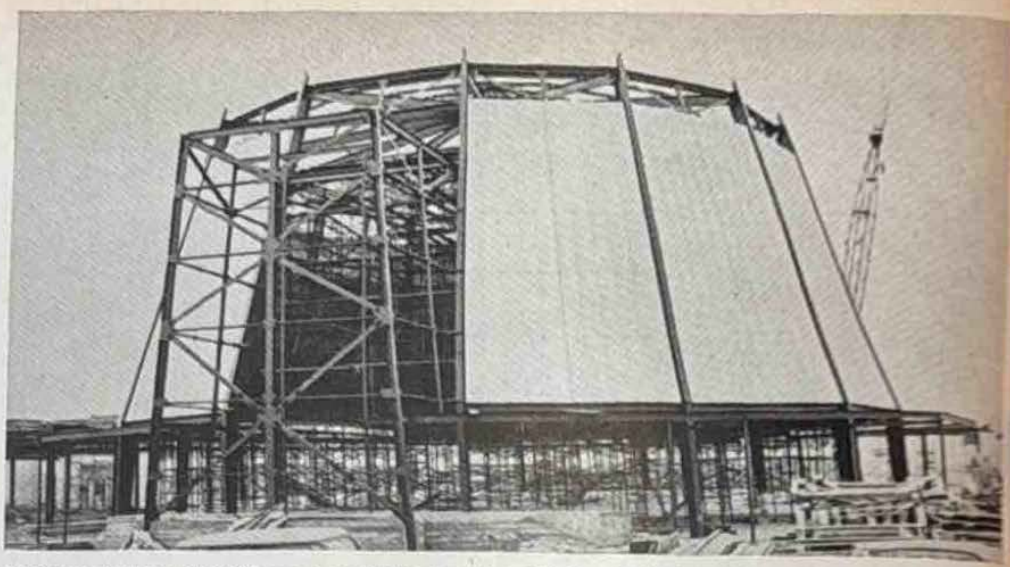
Surfacing the $750,000 Temple De Hirsch in Seattle are precast concrete panels and grills totaling 27,000 sq. ft. Olympian Stone Co. produced 810 MoSai components to the specifications of architects Detlie & Peck and B. Marcus Priteca, varying in size from 150 sq. ft. to ¼ sq. ft. The largest, a single dome panel, weighed 3¾ tons; the smallest, a "filler" used in the grillwork, a little over 3 lb.

The bolted method used by Sellen & Hansen, Inc., general contractors, enabled erection of the panels to proceed at a rapid rate.

Fabrication of these panels and grills required three carloads of crushed white quartz, one carload of white cement and 13 tons of reinforcing steel rods and mesh. Because of their steel reinforcing, the precast units become an integral part of the structural support.

Commenting on the special problems created by the job, R. C. Robinson, Olympian vice president, says: "Detailed layout was necessary to assure proper fit of panels, which tapered upward and whose ribs also grew progressively closer together toward the top. Column covers also tapered in both width and depth so that calculation of intersections with panels was difficult.

"Production on grills was difficult in that only at the perimeter and horizontal muntions could any continuous reinforcing be used. Very accurate, rigid forms were required since all stained glass work had to be produced to a master template, fitting into openings in any individual grill."

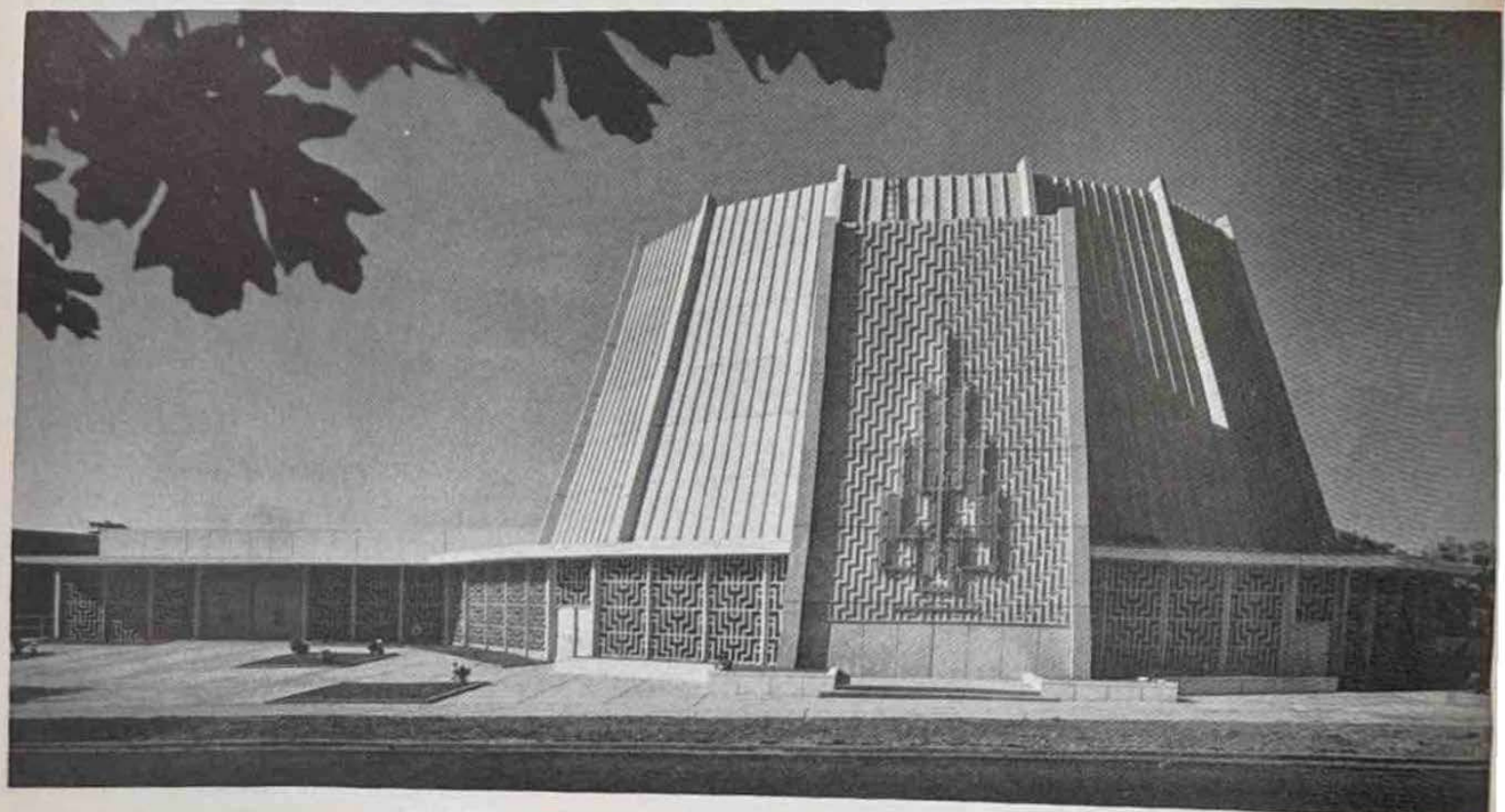


PRECAST TOWER PANELS are installed in less than 10 days by bolting them to basic steel framework. Because of intrinsic strength of reinforced units, they become part of structural support.

The 46 grills, each about 6x12 ft., are in a simple abstract design. Openings in a majority of the grills were used to insert specially fabricated colored glass units. Created by Roger Darricarerre, each depicts a symbolic representation of one of the Jewish holy days. Set off by the quartz and white cement, the glass artistry is one of the high points of the design.

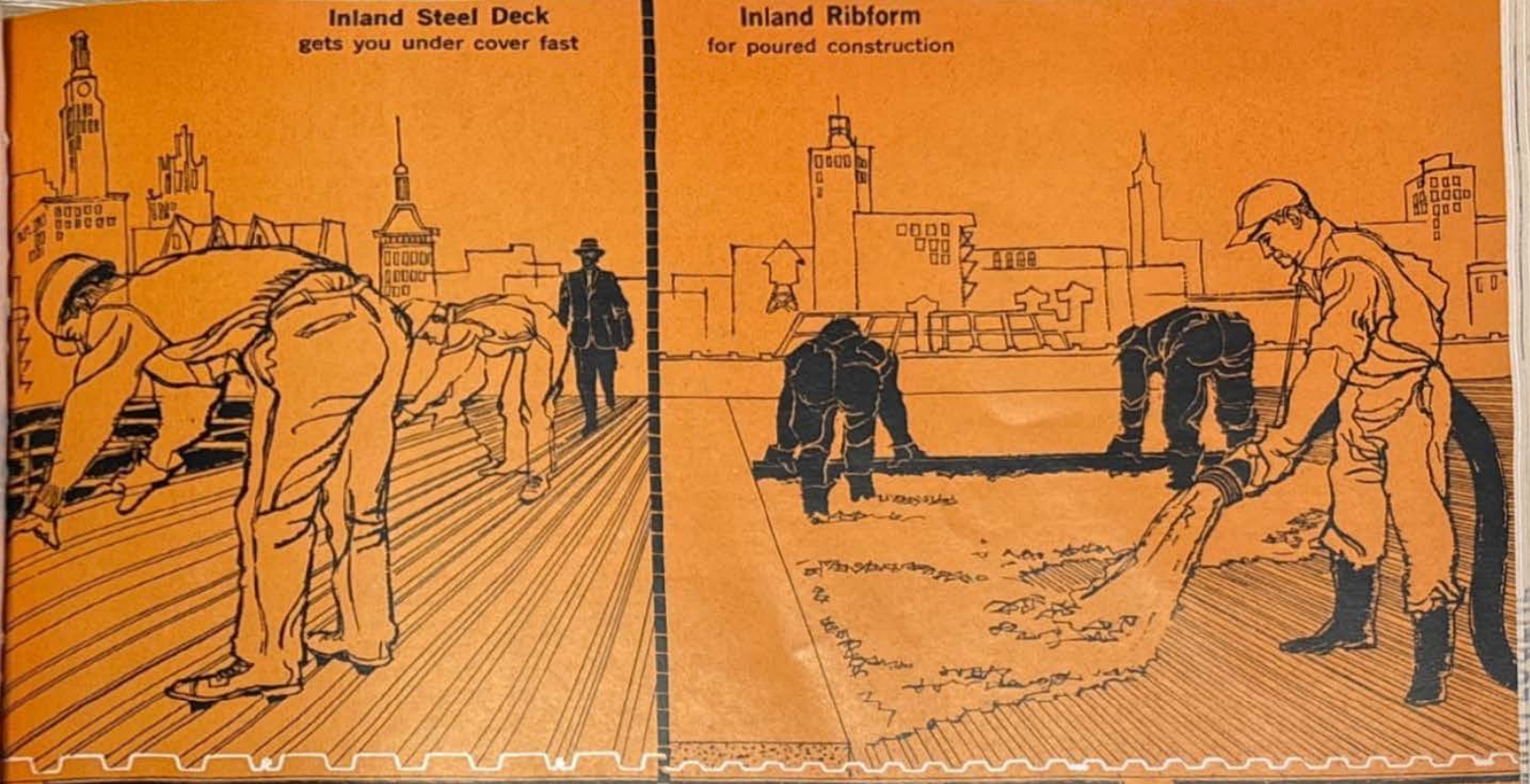
Inside, a Star of David decorates the auditorium dome.

COMPLETED FACADE of exposed white quartz crushed to desired size and set in white matrix is one of quiet strength. Gold-plated menorah is work of Charles Smith.

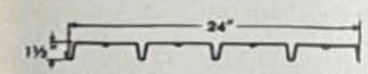


Inland Steel Deck
gets you under cover fast

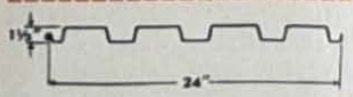
Inland Ribform
for poured construction



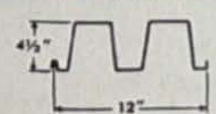
Steel deck or centering...you name it, INLAND has it!



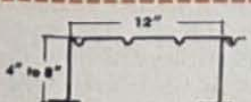
A-DECK — For purlin spacings not exceeding 8'4". Narrow ribs provide deck surface that supports the thinnest or softest types of insulation.



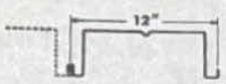
B-DECK — For spans to 10'0". Wide rib distributes metal for greater structural efficiency. Well suited for use as side wall panels.



C-DECK—Carries normal roof loads over spans up to 24'0". Used extensively in canopies.



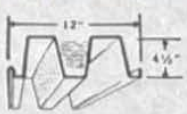
T-STEEL — New! Galvanized only. For clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to resist seismic and wind loads.



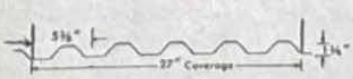
H-DECK — New! For simple spans to 20'0" — 3" and 4½" depths. Especially practical to cover walkways in shopping centers, schools, other installations.



B-ACOUSTIDECK — Two-in-one panel combines steel roof deck with acoustical ceiling having Noise-Reduction Coefficient of .70. Used for spans to 10'0".



C-ACOUSTIDECK — Offers same Noise-Reduction Coefficient as B-Acoustideck. Can be used for spans to 24'0".



RIBFORM — High-tensile, galvanized steel form for concrete slabs over spans up to 8'0". Three types: Standard, Heavy-Duty, Super-Duty (shown).

Expansion projects and new buildings get under cover fast and economically, when you specify an Inland roof system.

Inland steel deck is easy to handle and weld in place — in any weather that a man can work. Effects of construction abuse are held to a minimum, since types A, B, C, and H decks are Bonderized, then covered with a baked-enamel primer that resists on-the-job damage. One field coat of paint over this is usually enough.

In concrete-over-steel construction, Inland Ribform supports wet concrete with minimum deflection. Rigid sheets are quickly and inexpensively attached to supports — in place, they provide a safe work platform for crews.

Write for catalog 248 — see Sweet's section 2i/Inl. For help on unusual problems, you can draw on the diversified experience of Inland sales engineers. Write or call your nearest Inland office.

member of the INLAND steel family

ENGINEERED PRODUCTS DIVISION

INLAND STEEL PRODUCTS COMPANY

Dept. C, 4127 West Burnham Street
Milwaukee 1, Wisconsin

EP-5A

ATLANTA, BALTIMORE, ... NEW YORK, ST. LOUIS

VAPOR BARRIERS can be eliminated in vermiculite insulated masonry walls under normal climate and occupancy conditions, according to a research report issued by Pennsylvania State University. As a result of the tests, the Structural Clay Products Research Foundation and the Structural Clay Products Institute have recommended elimination of the vapor barrier except for severe occupancy conditions, such as cold storage. Tests at Pennsylvania were conducted with Zonolite's water-repellant vermiculite masonry fill insulation which can be poured into block cores or cavity wall spaces without any special equipment. Figures developed on a typical job application in the Northwest (West Seattle General Hospital) for Vermiculite-Northwest, Inc., showed that the installation of masonry fill would pay off for itself in less than two years with savings in heating costs of about eight cents per square foot per year, through a reduction in heat loss of about 50%.

—pa&b memo—

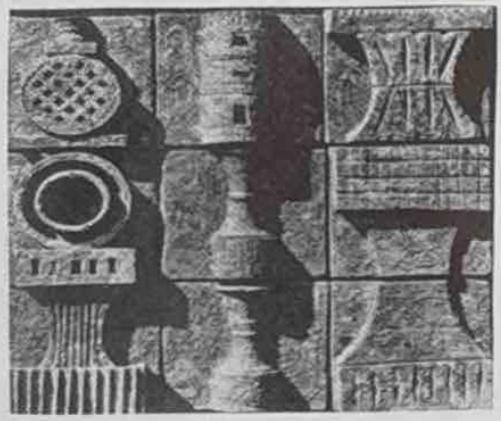
HIGH STRENGTH JOISTS are covered by an industry specification for the first time with publication of an industrywide design standard by the Cold Rollformed Structural Framing Institute. Standard was adopted in January by this relatively new organization made up of three U.S., one Canadian and three European companies.

—pa&b memo—

NEW COMMERCIAL STANDARD, completely reworked for the first time since 1955, has been put into effect for Douglas fir plywood. Designated CS 45-60, it will be distributed shortly by the Commodity Standards Division of the U. S. Department of Commerce. Some of the changes reflect scientific advances made in the past few years, others are revisions designed to clarify meanings. Western larch, commonly called tamarack, is accepted by CS 45-60 as equal in value to coastal type Douglas fir. At the same time, since the strength characteristics vary with the conditions under which it grows, Douglas fir has been given more specific handling. Only Douglas fir falling under coastal type classification may be used in plywood conforming to this new standard. Douglas fir grown elsewhere is grouped with other western softwood species used in plywood but covered in a separate commercial standard. Manufacturing specifications and testing procedures added in this revision include one for scarfing panels and veneers, a process important to production of extra-long panels. New overlays also are permitted. Underlayment grade panels previously covered within another grade are clearly listed for the first time, with an eye to the problems caused by the new, thin heels on women's shoes.

—pa&b memo—

SCULPTURED WALL TILES by Eloise Norstad Harmon received an international design citation at the American Institute of Decorator's annual awards dinner recently. The



AWARD-WINNING TILES

Virginia Frankel Gallery, a contract art service for architects and interior designers and distributor of the tiles, also received an award, given for the first time this year to manufacturers of winning designs. The custom-designed stoneware tiles, each 12 in. square, are individually hand sculptured with no two bearing the same design. Suitable for both indoor and outdoor use, the rough textured tiles are made of fire clay highlighted with a high-fire felspathic glaze.

—pa&b memo—

SOLAR HEATING and cooling system in operation at the University of Arizona's solar energy laboratory the past year and a half has been highly successful, according to Raymond W. Bliss Jr., designer and operator of the system. Around-the-clock records for the 18-month period show variations of not more than 3 deg. above or below 75 deg. System uses a 1,600-sq. ft. copper solar collector with integral parallel surface, serving as conventional roofing, functions during sunny daylight periods as a solar heat collector and a heat rejector at night during hot weather.

HOMES held together by glue who aluminum walls "like the human sk sweat a little to cool the building summer," was one of the ideas tomorrow suggested by Philip W Jr., national president of the AIA, the aluminum industry's 75th ann versary celebration. Interior surfac might have permanent vinyl coating incorporate radiant heating and coo ing and convenience wiring pl luminescent panels for light, he sai Will spoke at a meeting of the Alum num Association on the Oberlin Co lege campus in Ohio, marking the di covery of the electrolytic process f separating aluminum from its ore.

—pa&b memo—

MODULAR UNITS for schools, the value and the amount of design flex ibility they allow, will be tested o under a $12,750 grant to Californ Cupertino Union School District b Educational Facilities Laboratorie Inc. Two schools — elementary an intermediate—will be built by th district, 40 miles from San Francisc

—pa&b memo—

PRESTRESSED CONCRETE double T floor and roof members have bee approved for a two-hour fire resist ance label by Underwriters' Labora tories. Minimum bottom cover speci fied is 1⅝ in. and minimum side cov er, 1⅛ in. reports the Prestresse Concrete Institute, which conducte the tests. Up to five strands per ste may be employed and all commonly used strand sizes are permitted i UL-labeled members.

—pa&b memo—

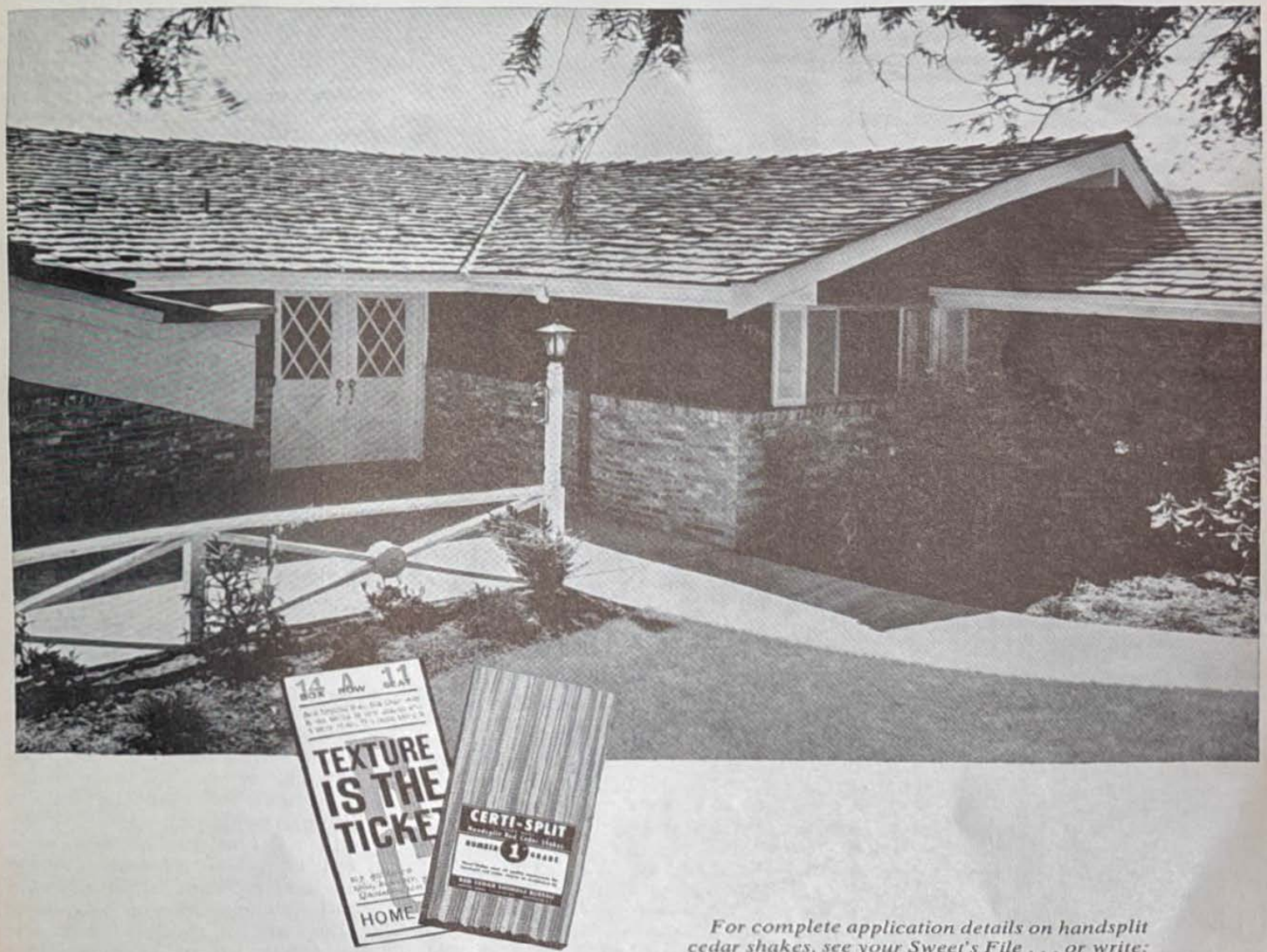
BURLAP coated with a 4-mil film o white polyethylene has proved to b an efficient curing material for nar row, multisurface and other specia concrete shapes and designs. Burla has been found to be much more flexible than curing papers and simpler than liquid membranes. A method of applying the resin to bur lap has been developed by American Sisalkraft Co., which is now mass pro ducing the item for the construction trades.

—pa&b memo—

ACOUSTICAL CEILINGS made of fissured mineral or wood fiber tile will be much easier to keep clean and new looking in the future. Major manufacturers, including Armstrong Cork Co. and United States Gypsum Co., are offering tiles faced with vinyl which protects the surface and is easily cleaned but does not affect acoustical properties.

HANDSPLIT CEDAR SETS THE STAGE

The stage is set for a sale. For this is the All-American House. Warm and friendly . . . natural through and through . . . it looks like home. Prominent in the design is an extra-heavy roof of genuine handsplit cedar shakes. Like most quality materials, handsplit shakes appeal to both kinds of buyers—those who demand the tasteful appearance of a natural material and those who measure a value by the years of service it provides. On both counts, a roof of handsplit shakes is unexcelled. Perhaps that's the reason this long-lived, beautifully-textured material is in such demand.



For complete application details on handsplit cedar shakes, see your Sweet's File . . . or write:

RED CEDAR SHINGLE BUREAU

5510 WHITE BUILDING, SEATTLE 1, WASH.
550 BURRARD STREET, VANCOUVER 1, B. C.

tinted window coating

A liquid plastic known as Sun-Chek can be applied to windows to reduce glare and heat, reportedly producing savings up to 30% in air conditioning operating costs. Particularly applicable for such installations as store fronts or supermarkets, the product is offered in clear as well as a number of transparent and frosty colors. It forms a permanent bond on the glass. —Sun-Chek Co., 166 Saratoga Ave., Los Gatos, Calif. (No. 1)

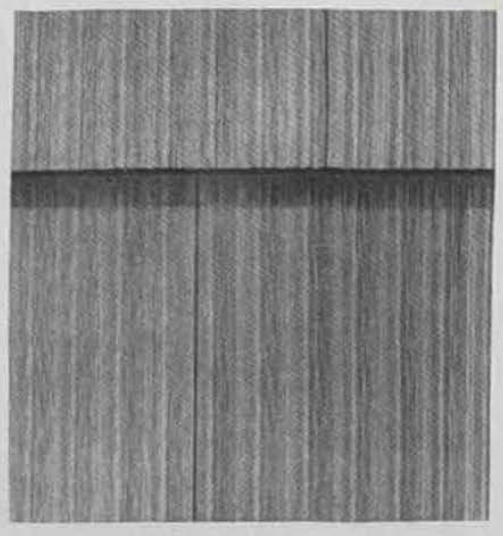
economy partition

A 3-in. thick nonload-bearing hollow lath and plaster assembly called Pabco Key-Grip Wall 40 has been introduced as an economy and space saving system for all types of construction. The unit is said to save about 1 sq. ft. of usable floor space for every 5 lin. ft., compared to conventional 2x4 wood stud, lath and plaster partition.

Material and application costs are low and hollow wall easily carries electrical wiring. Fire and sound resistance is good. System is made up of gypsum lath units composed of Pabco's Key-Grip studless partition lath to which has been laminated a gypsum lathing core. Partition lath units are usually job laminated. Lath units are nailed or screwed to the floor and ceiling runners and are laminated and wire tied together. Temporary bracing is not needed. Outside faces of the assembled units are then plastered.—Pabco Gypsum Division, Fibreboard Paper Products Corp., 475 Brannan St., San Francisco 19, Calif. (No. 2)

reversible cedar siding

A versatile cedar sidewall lightly rippled on one side with machine-grooved or sawn shingle surface on the other has been introduced by a Canadian firm. Lightly textured edge



grain appearance of Triple-R is the result of what the producer calls its Flomatic Recut process. Reversible feature should appeal to dealers as it reduces inventory needs. Triple-R sidewalls are recut, rebutted and rejoined in conformance with Red Cedar Shingle Bureau grading rules for fast application and snug fit. They are available factory primed in a white-gray color that provides a good base for all finish coats.—North Shore Shingle Co., Ltd., Box 130, North Vancouver, British Columbia. (No. 3)

giant siding panel

For apartment houses, motels and other types of light commercial construction, Weyerhaeuser has introduced a 16-ft. hardboard siding panel. In doing the work of several smaller panels, it saves on handling and fitting time and eliminates unsightly joints. Tempered Weytex in the 16-ft. size is available with smooth or striated surfaces, with or without a prime coat of light gray. Edge is stair stepped to provide a built-in guide stop in butting panels together. Battens are not required.—Weyerhaeuser Co., Silvatek Division, Box 3, Tacoma, Wash. (No. 4)



sculptured acoustical wall

Textured wood fiber Tectum, an insulating and acoustical material, is now available in cameo and intaglio patterns cut into the standard 12x12, 1-in. thick blocks. Fifteen sculptured designs range from simple geometric forms to complex interlocking patterns. Blocks are recommended as accent walls for reception or lobby areas, corridors, etc. Offered in four colors, the blocks are easily installed with ordinary adhesives. — Tectum Corp., 535 E. Broad St., Columbus 15, Ohio. (No. 5)

hardwood outlet plates

Hardwood veneer electrical outlet covers to match wood paneled walls are being marketed in eight wood species called the Shurwood line. Hardwood is bonded to aluminum, smooth sanded and ready to finish in desired tone. Line includes plates for standard electrical switches and outlet setups, telephone outlets and blank plates for custom adaptation or covering unused outlets.—Elliott Bay Lumber Co., 600 W. Spokane St., Seattle 4, Wash. (No. 6)

daylighting plastic panels

Although it has served as a major supplier of Fiberglas material to other panel manufacturers, Owens-Corning is marketing its entry into production of the finished product with a unit for roof and sidewall lighting. Daylighting panels utilize acrylic resin as the bonding agent for extra resistance to weathering and better light diffusion. Construction is termed triple-reinforced laminate. Acrylic resin is combined with one heavy center ply of Fiberglas reinforcing mat and a ply of surfacing mat on each side of the panel. Four colors are offered.—Owens-Corning Fiberglas Corp., 717 Fifth Ave., New York, N.Y. (No. 7)

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

JUNE 1961
(After July 31 write directly to manufacturer)

1 2 3 4 5 6 7
8 9 10 11 12

Name

Title

Firm

Address

City Zone State

aluminum solar screen

A firm which heretofore specialized in castings for the aircraft and space industries has moved into the building field with an aluminum solar screen AlumaSol and a casting service which includes metal bas-relief murals. Screen patterns are by Malcolm Leland. They provide a great deal of latitude in design since they can be assembled at various angles, in random patterns according to specifications or combined with standard extrusions. Units can be positioned according to the exact percentage of opening required for sun control, ventilation or visual screening. Installation has been simplified by almost eliminating assembly on the job. Wide range of color coatings are available.—Hands Co., 4159 Whiteside St., Los Angeles 63, Calif. **(No. 8)**

acoustical ceilings

Two mineral tile ceiling products—Acoustone "db" and 90—have been added to U. S. Gypsum's line. Former has foil backing to control sound transmission between rooms divided by ceiling-high partitions. Its nonporous barrier efficiently retards sound travel through the ceiling and over partitions. Average sound transmission attenuation is 45.5 decibels. Acoustone 90 provides both sound absorption and fire protection. It offers a 1½-hour fire rated bar-joist concrete floor or roof and ceiling construction when suspended on the Z-spline system.—United States Gypsum Co., 300 W. Adams St., Chicago 6, Ill. **(No. 9)**

reinforced plastic skylight

Sky-Glo skylight, which simplifies installation and thus saves on construction costs, is molded of continuous fiberglass reinforced polyester. Its configuration is such that a man can stand on the installed skylight without breaking it. No protective screen or barrier is required. Sky-Glo has good light diffusion; blocks ultraviolet and infrared rays; is fire retardent, shatterproof and maintenance free. Several basic sizes are available.—Fiberglass Supplies, Inc., Box 373, Malibu, Calif. **(No. 10)**

versatile facing method

For fabrication of new or remodeling of old building exteriors, Kawneer has developed a system which allows on-the-spot fabrication of exteriors and makes it possible for installers to incorporate facing, window or entrance units any place in the exterior. With this method, installers can produce 36 different members from 14 basic components. Old exteriors are accommodated with system-to-system transititions accomplished without the usual joinery problems, or obtaining special members at high cost. When gripped together with Kawneer's special locking design, the four basic shapes are multiplied into an entire frame ready to receive infill components of glass, sash or panel. Glazing procedures require one-third less time than conventional systems, providing further savings in down time on remodeling jobs.—Kawneer Co., 1105 N. Front St., Niles, Mich. **(No. 11)**

plywood panel floor system

Tongue and grooved on all four edges, Solidply assures an unbroken floor surface and eliminates protrusions caused by twisting and shrinking. Because the first two plies are solid wood, punch-through by pointed or heavy objects is eliminated. Sanded surface provides a smooth panel making cleanup easier since plaster, dust and other dirt do not cling to the floor. Solidply is edge sealed to protect against moisture and prevent joint swelling.—Interstate Container Corp., Box 790, Red Bluff, Calif. **(No. 12)**

HAWS

...SPECIFIED
FOR *MORE* THAN BEAUTY

To be sure, this semi-recessed, slim design vitreous china Model 77 has the beauty every Architect demands! But Haws provides even more...

Service ease! Maintenance is virtually nil, with extra-durable vitreous china (in color too!). All fittings are easily accessible from under the bowl—there's no access panel required.

Lifetime parts availability! There's no "planned obsolescence" at Haws. We carry parts in stock for fountains old or new to assure *lasting* client satisfaction for your client. It's to your advantage to standardize with Haws!

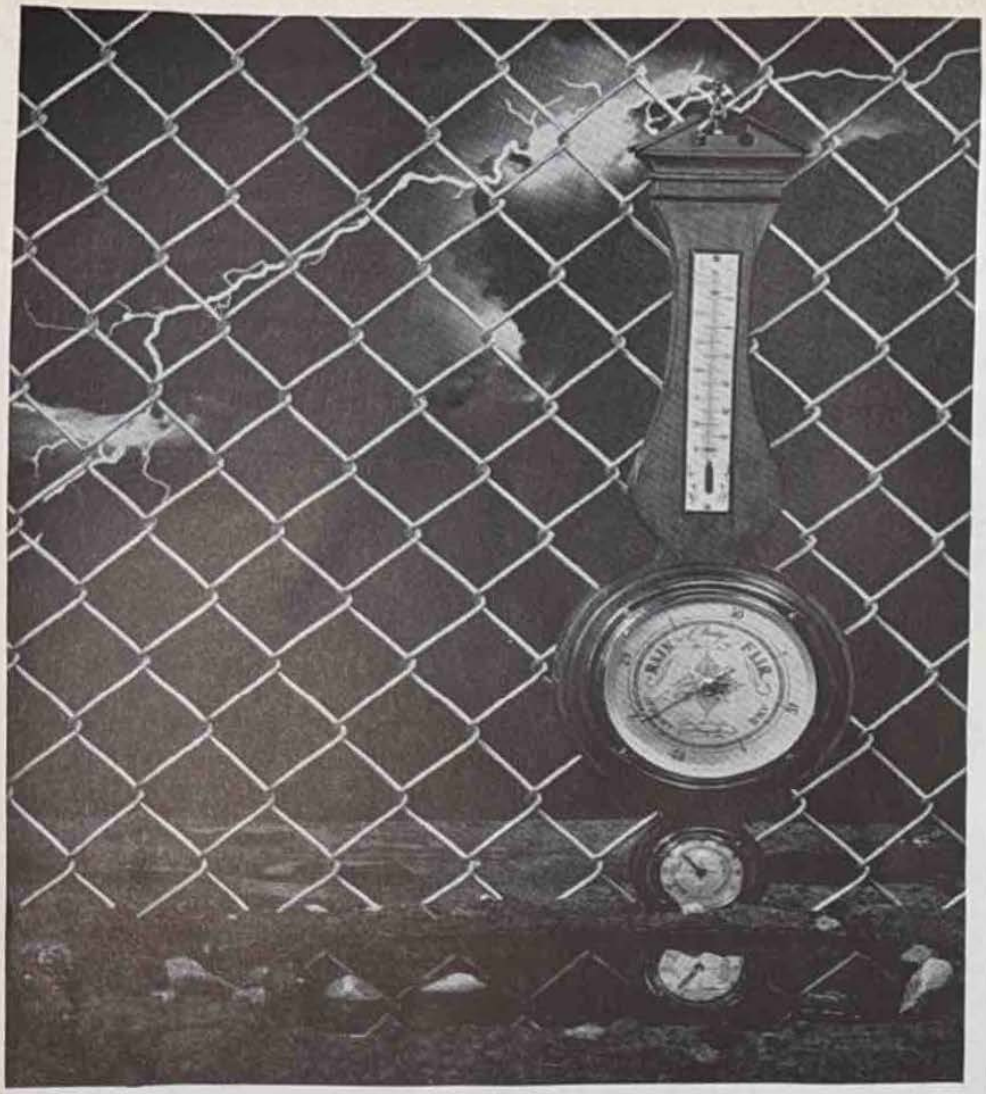


Illustrated below is Haws Model 77 as installed in corridors of the new **Tidewater Oil Building,** Los Angeles, California. (Architect: Claud Beelman, A.I.A., and Associates.) It is semi-recessed in brilliant marble walls, adjacent to the elevators. Haws Model 77 is a classic of good design.

See Haws in Sweets File—or write for the complete Haws Catalog.

HAWS DRINKING FOUNTAINS

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street, Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California



FORECAST: VIOLENT STORMS...BUT

Realock Fence will resist the foulest weather

That's because Realock is made from top grade steel wire, and is completely galvanized, making every foot thoroughly resistant to weather and corrosion. Realock Fence is a one-time investment that requires minimum maintenance.

For all enclosure jobs—from playgrounds to industrial sites—specify Realock Fence. Easy to erect, it's also ideal for right-of-way installations and for protection of equipment stored outdoors. Call the office listed below for full details and for prompt delivery.



THE COLORADO FUEL AND IRON CORPORATION

Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

LITERATURE

Thin Marble Wall and Floor T (AIA 23-N): pictures and briefly scribes Markwa line of lightwei ½-in. thick, modular tile; 4 pp.— V mont Marble Co., Proctor, Vt.

Ualco Aluminum Curtain Wall S tems: gives general specifications 18 pages of detail drawings; 23 pp Southern Sash Sales & Supply Inc., 818 20th St., Sheffield, Ala.

Kemiko Concrete Stains and Finish illustrates variety of applications patios, around swimming pools, e with color chips; 4 pp.— Rohloff Co., 918 N. Western Ave., Hollywo 29, Calif.

Cellular Steel Floor Wiring Da Manual (AIA 31-C-62): describes sy tem and component parts with desi and installation information; manu Q-63; 56 pp.—H. H. Robertson C 2400 Farmers Bank Bldg., Pittsburg Pa.

Rilco Laminated Wood Products (A 19-B-3): offers latest technical info mation, specifications, load char etc., with many photographs of insta lations in a variety of buildings; pp.—Weyerhaeuser Co., Rilco Lami ated Products Division, 616 First N tional Bank Bldg., St. Paul 1, Minn.

Colorweld 60 (AIA 12-C): presen line of precolored aluminum shee with color swatches; 8 pp.—Reynol Metals Co., Richmond 18, Va.

Economical Chalkboards: shows cro sections of chalkboard and bulleti board installations; technical bulleti 5, supplement 2; 2 pp.—Metal Lat Manufacturers Association, Enginee Bldg., Cleveland 14, Ohio.

Masonite Construction Manual: pro vides data on company's line of hard board with uses and application infor mation; 24 pp.— Masonite Corp., 11 W. Washington St., Chicago 2, Ill.

Palcote Paint-Primed Redwood Sid ing: describes product and include sample of the siding.—The Pacifi Lumber Co., 100 Bush St., San Fran cisco 4, Calif.

Koppers Built-Up Roofing Specifica tion Manual (AIA 12-B): provide step-by-step application instruction with material estimating charts; bro chure TA-49-61; 28 pp.—Koppers Co 3450 Wilshire Bldg., Los Angeles 5 Calif.

• **Weyerhaeuser Co.:** Rilco Engineered Wood Products Division, whose general offices will be established in Tacoma this summer, has a new vice president-production, Robert E. Eby, and a new chief engineer, R. A. (Rags) Glaze, succeeding Eby in that post. . . . A wood products division will consolidate lumber and plywood, hardwood lumber and veneer, Silvatek and Roddis in Tacoma, with John L. Aram as marketing vice president. . . . William H. Roddis holds the newly created post of hardwood specialist at the Longview, Wash., technical center, where an expansion program will increase floor space by 80%.

• **Permanente Cement Co.:** An expanded and formalized program has been inaugurated which a spokesman describes as "the most complete and comprehensive technical service made available on a local basis to customers by a cement manufacturer in the West." Key field technical representatives will be three division service engineers: Richard J. Doerman, Southern California; Robert A. Nieman, northern California; A. J. Showalter, Pacific Northwest.

• **Inland Steel Products Co.:** Victor G. Pignolet is manager of the newly created western region of the engineered products division. With headquarters in Fremont, Calif., the new region includes the Los Angeles and the San Francisco districts, where C. G. Harris and R. H. Benton are sales managers, respectively.

• **W. P. Fuller & Co.:** A metal fabrication plant to manufacture storm windows and doors has been established in Pocatello, Idaho. . . . William E. Wagner is heading up a newly created residential metal sales division at the Covina, Calif., plant. . . . Wayne deArment is the new Bay area district glass manager, succeeded in Sacramento by Major Chance, formerly glass manager in San Jose. John Ponischil takes over the latter post. In another Bay area district appointment, J. H. Herzog has become glass contract sales manager. L. R. Brown is directing the enlarged valley sales district, working out of Sacramento. . . . Trimview Metal Products Division has appointed Richard N. Giger as manager of the design and engineering department and E. J. (Lou) Gedeon as trainer-coordinator and chief estimator.

• **John C. Virden Co.:** A third division, Interior Systems, Inc., has been formed at the western offices, 300 N. Baldwin Park Blvd., City of Industry, Calif. Paul G. La Vigne, general manager of western operations, heads up the division, which will be concerned with commercial, industrial and institutional construction.

• **Arcadia Metal Products and Acme Metal Molding Co.:** Under a proposed acquisition and realignment by Northrup Corp., the two companies will combine operations at 5022 Triggs St., Los Angeles, where ground soon will be broken for construction of an all-aluminum office building designed by Craig Ellwood (see sketch in PA&B for Feb. '61).

• **Washington Steel Products, Inc.:** H. E. Anderson and James Picha, president and sales manager, respectively, have resigned. Don Burns, vice president of the parent Ekco Products Co., Chicago, and general manager of its industrial and builder division, has taken over the presidency of the Tacoma-based subsidiary in addition to his other duties. Sherwood Simpson has been named vice president.

• **Gladding, McBean & Co.:** John S. Barry is Southern California sales manager for the architectural products division.

• **Pittsburgh Corning Corp.:** John H. Hartzell is sales representative in Colorado, with offices in Denver.

• **Soule' Steel Co.:** Five product sales divisions have been created with these general sales managers, all headquartered in San Francisco. C. C. Carpenter, reinforcing products; S. W. Nightingale, steel structures; H. Scott Anderson, commodity products; R. L. Swan, Mosaica; K. W. Archer, architectural aluminum. In a sixth appointment, Roger Chung becomes assistant general sales manager of the steel structures division.

• **Coralite Co.:** New Southern California distributor is Diamond W Supply Co., Los Angeles.

• **Ideal Cement Co.:** The largest continuous concrete pour on any Seattle structure was made last month at the new terminal, 5200 W. Marginal Way. A 6-ft. thick slab, 95½x136 ft. in size, required 2,200 cu. yd. of concrete, using 3,300 bbl. of cement. Hoffman Construction Co. of Portland is the general contractor.

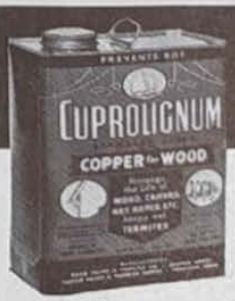
• **Bethlehem Steel Co.:** H. Harrison Fuller, 65, vice president in charge of the Pacific Coast division, died April 22 in Hillsborough, Calif., after a short illness. Joining the firm in 1919, he went to San Francisco in 1944 to head up what was then the West Coast division.

• **Lumber Manufacturers, Inc.:** Chas. R. Wilson is handling sales of the newly designed Truss-Joist, a unit being fabricated from wooden upper and lower chord members and tubular webbing in Portland.

Pacific Architect & Builder

- West's largest architectural circulation
- Highest readership
- Lowest rates and cost per thousand

A Pacific Builder & Engineer, Inc., publication
1945 Yale Place East Seattle 2, Washington



CUPROLIGNUM
(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .
CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

not specified

a lesson in professional leadership

When Oregon's statewide AIA meeting was held in Salem earlier this spring, a sociologist, a doctor, a lawyer and a newspaper editor examined "The Social Responsibilities of the Architect and His Profession." Perhaps the most significant statement—meaningful in that it represents the laymen's point of view—was this: the profession is reluctant to assume courageous professional leadership, to speak out on matters of public concern or to become politically controversial in determining community esthetics.

Refreshingly enough, the tide changes from time to time and we feel it has reached an all-time high these past few months in the person of Seattle architect Paul Thiry. It is not our purpose here to discuss the relative merits of the freeway controversy which we introduced in our news section last month. The free-for-all continues as we go to press, but it looks as though state highway officials and engineers will win out once again over beauty.

Nevertheless, in his proposal to cover a six-block downtown area with a landscaped cover (hence the current big debate is known as the "lid" vs. the "open ditch"), Thiry had the courage to champion what was a considered at the time of its introduction a most unpopular cause; but because of his position as a city planning commissioner and his stature as a professional and a private citizen, he has been able to make himself heard, his story has received widespread publicity in the press and he has aroused a public whose expressed sentiment up to this point is overwhelmingly on the side of some attempt to improve the environment. R.E.K.



Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

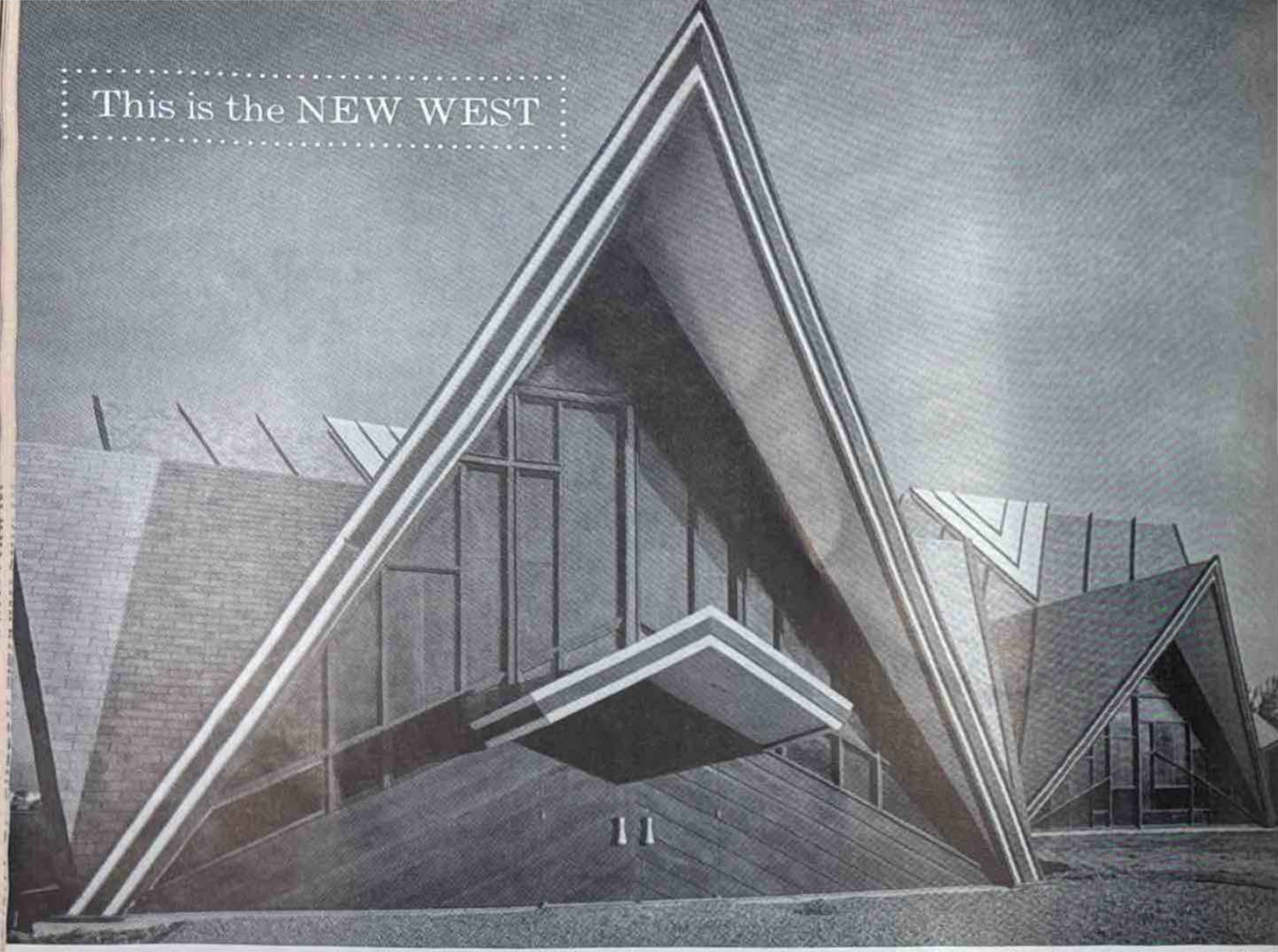
ADVERTISERS

Blumcraft of Pittsburgh	16
Builders Brick Company	42
Cast Iron Soil Pipe Foundation	II Cover
Colorado Fuel & Iron Corp.	40
Gladding, McBean & Co.	31
Handsplit Shake Assn., Div. Red Cedar Shingle Bureau	37
H & S Metal Products	7
Haughton Elevator Co.	9
Haws Drinking Faucet Co.	39
Inland Steel Products Co.	35
Macomber, Inc.	III Cover
Portland Cement Assn.	IV Cover
Red Cedar Shingle Bureau	4-5
Rilco Laminated Products Div. Weyerhaeuser Co.	32
Rudd & Cummings, Inc.	41
Tectum Corporation	13

Pacific Architect & Builder

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ JULY 1961





Architect Wilfred E. Blessing, San Jose, California, utilized U.S.G. materials in the First Congregational Church at Sunnyvale, California

"Architecture . . . can truly be called the effervescence of civilized life."

Spencer, ESSAYS On EDUCATION



Over 20 U.S.G. sales offices plants serving *western* buildi

The new West continues to produce the new in architecture . . . unique, vigorous ideas that have set building trends for all America. This western enthusiasm for innovation finds its counterpart in the United States Gypsum Architectural Service Department. Passing on ever-new systems and techniques for building, this special service of U.S.G. releases the architect for his true *creative* function. Perhaps the skills and resources available from this service can help implement your next idea. Write 2322 West Third Street, Los Angeles 54, California, Dept. PAB-11.

UNITED STATES GYPSUM

the greatest name in building

USG UNITED STATES GYPSUM

Pacific Architect & Builder July 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

12 Lane County Fairgrounds, Eugene: Stafford & Morin, Architects
16 Hoffman Science Center, Santa Barbara: William L. Pereira & Associates, Architects
18 Bowlero Lanes, Tacoma: Marshall W. Perrow, Architect
20 John T. Jacobsen Residence, Honolulu: John T. Jacobsen, Architect

special feature

22 Photo Editorial: Freeway's Pedestrian Bridge—A Step in the Right Direction

methods & materials

23 Blue Tile Coat Is Tailored for Los Angeles Job
24 Today's Materials, Techniques Express Early Symbolism in California Church
25 Individual Heat Pumps Installed in Oregon School

departments

4 Building Permits
6 Job of the Month
8 Project Preview
9 As We Go to Press
10 The Building Month
11 T-Square Talk
26 Products
28 Literature
29 Films
30 Technical Publications
31 Manufacturers/Suppliers
33 Letters
34 Not Specified

VOLUME 67, NUMBER 7

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Agriculture Pavilion, Lane County Fairgrounds, Eugene (p. 12)—Stafford & Morin, Architects; Tom Burns Jr. photo.

Building Permit Totals f

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dol

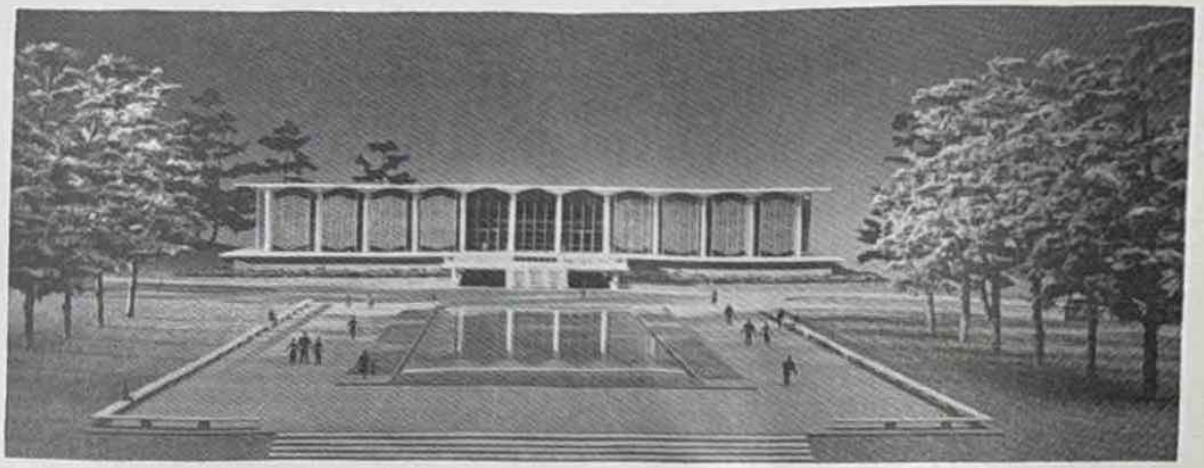
	# Res.	$ Value	Total $
CALIFORNIA			
Alameda	(34)	$ 298,815	$ 413,231
Alameda Co.	(344)	3,877,500	4,309,600
Albany	( )	No Reply	No Reply
Alhambra	(92)		1,208,936
Anaheim	(133)	1,562,520	4,952,465
Antioch	(15)	181,770	351,888
Arcadia	(33)	599,019	1,066,914
Arroyo Grnde	(7)	104,000	150,440
Artesia	(84)	1,587,200	1,644,300
Atherton	(4)	186,500	292,421
Atwater	(4)	58,529	63,129
Auburn	(6)	92,240	141,745
Avalon	( )	Nil	10,500
Azusa	( )	Nil	139,889
Bakersfield	(62)	685,855	1,507,386
Baldwin Park	(89)	954,800	1,038,195
Banning	(15)	139,591	167,076
Barstow	( )	Nil	86,547
Bell	(39)	225,000	286,630
Bellflower	(49)	384,300	499,655
Belmont	(16)	279,150	370,525
Benicia	(3)	29,700	34,456
Berkeley	(8)	172,000	662,596
Beverly Hills	(3)	235,000	1,121,905
Bradbury	( )	Nil	370
Brawley	(2)	18,500	18,500
Brea	(4)	71,475	140,834
Buena Park	(151)	2,139,666	2,914,447
Burbank	(104)	827,325	1,703,264
Burlingame	(11)	350,000	771,420
Butte Cty.	( )	Nil	230,700
Calexico	(3)	23,000	36,803
Campbell	(137)	981,775	1,046,209
Carlsbad	(19)	254,572	321,800
Carmel	(3)	56,250	145,600
Chico	(24)	350,576	583,469
Chino	(7)	123,307	218,378
Chula Vista	(1)	19,000	355,153
Claremont	(39)	621,600	643,100
Coalinga	(2)	24,500	35,185
Colton	(7)	75,867	100,816
Commerce	(7)	58,400	668,100
Compton	(22)	135,329	492,887
Concord	(124)	1,539,210	2,207,715
Cntra Csta Co.	(179)	3,342,288	4,581,806
Corona	(5)	62,401	141,044
Coronado	( )	No Reply	No Reply
Corte Madera	(6)	126,648	134,380
Costa Mesa	(134)	1,617,039	1,982,468
Covina	(120)	1,648,100	1,775,139
Cudahy	(73)	487,900	509,600
Culver City	(2)	31,000	201,565
Dairy Valley	( )	Nil	242,735
Daly City	(143)	1,214,102	1,354,579
Davis	(50)	450,000	467,450
Delano	(19)	159,112	186,652
Downey	(307)	1,344,400	2,094,885
Duarte	(1)	14,000	75,150
El Cajon	(6)	102,025	416,725
El Centro	(3)	34,500	112,138
El Cerrito	(14)	174,595	235,032
El Dorado Co.	(108)	1,256,215	2,464,338
El Monte	(1)	9,360	496,300
El Segundo	(22)	178,000	446,682
Emeryville	( )	Nil	141,000
Escondido	(7)	87,338	1,298,170
Eureka	(14)	212,500	336,624
Fairfield	(50)	385,052	507,023
Fillmore	(1)	22,400	28,141
Fontana	(11)	152,110	184,593
Fremont	(102)	1,357,600	1,648,640
Fresno	(251)	2,556,245	3,364,858
Fresno City	(73)	850,769	1,705,116
Fullerton	(116)	2,004,509	2,947,023
Glendale	(195)	1,838,160	2,453,589
Glendora	(35)	283,300	357,500
Half Moon Bay	(1)	12,500	35,250
Hanford	(90)	1,033,890	1,105,590
Hawthorne	(62)	448,650	658,932
Hayward	(164)	1,148,900	1,496,444
Hemet	(8)	80,000	139,788
Hermosa Bch.	(6)	96,052	452,697
Hillsborough	(9)	426,000	504,500
Holtville	(2)	32,286	33,378
Hmbldt Cty.*	( )		156,040
Hntngtn Bch.	(1027)	12,787,619	13,023,996
Huntngtn Prk.	( )	Nil	388,368
Imperial Co.	( )	Nil	80,609
Indio	(5)	32,762	129,749
Industry	( )	Nil	1,632,600
Inglewood	(158)	1,390,970	2,018,945
Irwindale	( )	Nil	109,650
Kern Cty.	(131)	1,567,253	2,343,970
Laguna Beach	(19)	315,000	461,583
La Habra	(67)	963,876	1,070,077
Lakewood	(5)	117,900	384,890
La Mesa	(8)	154,545	395,160
La Mirada	(5)	75,100	266,200
La Puente	( )	Nil	95,660
La Verne	(1)	21,000	34,700
Lawndale	(23)	204,400	315,065
Lindsay	( )	Nil	8,527
Livermore	(18)	210,176	247,381
Lodi	(13)	166,950	227,585
Lompoc	(115)	1,549,700	1,561,250
Long Beach	(341)	3,235,790	6,837,915
Los Altos	(59)	844,535	1,041,435
Los Angeles	(2542)	37,355,045	70,411,315
Ls Angls Co.	(1540)	20,015,953	39,634,410
Los Gatos	(23)	381,500	1,121,175
Lynwood	(12)	81,500	463,467
Madera	(3)	44,500	104,567
Madera Co.	(22)	183,500	424,790
Manhttn Bch.	(21)	288,836	446,427
Manteca	(5)	41,500	60,070
Marin Co.	(59)	1,064,450	3,434,405
Martinez	(18)	325,796	364,681
Marysville	(3)	54,000	175,800
Maywood	(14)	81,200	135,589
Menlo Park	(7)	130,000	416,565
Merced	(11)	168,990	358,425
Merced Cty.	(36)	511,600	730,356
Millbrae	(13)	265,500	543,200
Mill Valley	(39)	317,000	516,347
Modesto	(123)	1,503,000	1,755,394
Monrovia	(16)	169,802	270,012
Montclair	(18)	235,000	479,975
Montebello	(235)	2,412,141	2,539,214
Monterey	(10)	90,070	279,197
Monterey Co.	(52)	648,000	821,762
Monterey Prk.	(25)	208,670	661,818
Mountn View.	(147)	869,193	1,713,761
Napa	(39)	490,816	565,868
Napa Cty.	(17)	250,364	457,948
National Cty.	(68)	783,466	937,208
Newport Bch.	(94)	1,691,724	2,268,952
Nrth Scrmnto.	(28)	172,360	196,351
Norwalk	(3)	37,000	292,450
Novato	(13)	292,900	321,900
Oakdale	(6)	42,718	63,674
Oakland	(383)	2,719,200	6,204,668
Oceanside	(10)	130,000	262,429
Ojai	(20)	291,012	298,457
Ontario	(13)	101,661	260,834
Orange	(132)	1,889,093	2,108,645
Orange Co.	(103)	2,067,182	3,142,227
Oroville	(2)	17,000	208,333
Oxnard	(32)	308,900	471,580
Pacifica	(22)	251,500	517,530
Pacific Grove	(30)	273,000	292,700
Palm Springs	(9)	201,000	844,065
Palo Alto	(66)	648,367	2,970,017
Pals Vrds Est.	(12)	493,745	526,204
Paramount	(9)	89,300	298,200
Pasadena	(53)	531,311	1,304,879
Paso Robles	(3)	67,000	111,060
Pico Rivera	(7)	110,450	663,521
Piedmont	( )	Nil	315,554
Pinole	( )	No Reply	No Reply
Pittsburg	(20)	206,552	234,880
Placentia	( )	Nil	4,258
Placer Co.	(92)	1,143,794	4,165,394
Pleasanton	(7)	105,100	115,907
Pomona	(85)	1,082,985	1,276,284
Porterville	(3)	40,700	57,778
Port Hueneme	(3)	18,000	184,300
Red Bluff	(2)	20,572	44,172
Redding	(3)	29,000	112,800
Redlands	(11)	174,300	380,883
Redondo Bch.	(32)	352,095	557,972
Redwood City.	(76)	576,310	766,023
Richmond	(64)	602,451	1,848,404
Riverside	(172)	1,197,025	2,869,299
Riverside Co.	(164)	1,783,372	2,941,814
Rolling Hills	(1)	48,000	111,850
Rlng Hls Est.	(6)	151,050	181,900
Rosemead	(16)	178,700	195,175
Roseville	(21)	217,128	1,624,514
Sacramento	(87)	1,021,555	2,970,750
Sacrmnto Co.	(420)	4,313,011	8,620,671
St. Helena	( )	No Reply	No Reply
Salinas	(67)	846,750	1,593,649
San Bernrdno.	(52)	1,080,215	2,095,936
Sn Brnrdno C.	(486)	5,100,012	8,480,197
San Bruno	(28)	272,000	585,896
San Carlos	(23)	383,500	632,790
San Clemente	(130)	681,678	1,048,592
San Diego	(459)	4,875,694	12,857,878
San Diego Co.	(172)	3,185,000	6,451,3
San Dimas	(8)	117,000	136,8
San Fernando	( )	No Reply	No Rep
San Francisco	(181)	2,074,200	6,977,2
San Gabriel	(12)	87,660	139,2
Sanger	(18)	250,270	258,6
San Jacinto	( )	No Reply	No Re
San Jaqun Co.	(51)	557,242	1,221,3
San Jose	(686)	7,224,850	11,381,8
San Leandro	(107)	1,118,620	1,296,9
Sn Lus Obspo	(33)	443,070	566,9
S. L. Obspo C.	(33)	394,775	909,1
San Marino	(4)	189,000	285,3
San Mateo	(88)	918,600	1,706,3
San Mateo Co.	(125)	1,559,354	2,610,9
San Pablo	(46)	254,645	387,8
San Rafael	(46)	632,056	1,315,8
Santa Ana	(38)	322,006	1,396,0
Santa Barbara	(187)	1,874,800	2,192,9
Snta Brbra C.	(343)	4,400,400	5,016,3
Santa Clara	(73)	1,002,500	2,664,6
Santa Clara Co.	(52)	966,100	2,622,7
Santa Cruz	(106)	441,334	876,9
Santa Cruz	(39)	441,334	876,9
Snta Fe Sprgs.	(34)	447,000	579,9
Santa Maria	(115)	1,356,045	1,653,8
Santa Monica	(63)	769,540	1,536,9
Santa Paula	(8)	142,814	290,2
Santa Rosa	(29)	346,650	736,6
Sausalito	(14)	194,000	222,7
Seal Beach	(4)	39,278	65,8
Seaside	(36)	274,000	338,9
Selma	(20)	195,242	228,5
Shasta Co.	(21)	246,745	367,2
Sierra Madre	(1)	9,000	88,6
Solano Co.	(6)	73,102	139,4
Sonoma Co.	(101)	853,371	1,760,9
South Gate	(47)	287,500	473,7
South El Mnte	( )	Nil	66,9
South Psdena.	(13)	149,613	218,2
So Sn Frncsco	(5)	53,150	2,107,9
Stanislaus Co.	(43)	492,870	899,9
Stockton	(25)	401,300	3,143,9
Sunnyvale	(140)	1,685,240	2,047,1
Temple City	(37)	336,600	548,9
Torrance	(106)	1,593,220	2,623,9
Tracy	( )	No Reply	No Rep
Tulare	(5)	91,800	346,2
Tulare Co.	(31)	152,032	299,7
Turlock	(5)	74,685	296,9
Ukiah	( )	Nil	47,4
Upland	(18)	308,700	352,7
Vacaville	( )	No Reply	No Rep
Vallejo	(11)	123,400	280,9
Ventura	(17)	280,300	984,6
Ventura Cty.	(233)	2,717,300	6,235,2
Visalia	(33)	475,952	781,7
Walnut	( )	Nil	1,7
Walnut Creek	(10)	184,000	285,2
Wasco	(1)	11,000	184,9
Watsonville	( )	Nil	67,8
West Covina	(16)	283,342	611,7
Whittier	(27)	474,000	599,9
Woodland	(5)	71,600	107,3
Woodside	(3)	83,000	132,5
Yolo Co.	(78)	644,825	1,018,2
Yreka	(1)	16,700	188,6
Yuba City	(7)	62,000	253,9
Yuba Co.	(26)	152,285	219,0
Total	**(18,633)**	**$221,540,442**	**$399,119,**
OREGON			
Albany	(72)	$ 88,974	$ 133,3
Ashland	(8)	92,500	100,5
Astoria	(2)	17,424	30,1
Baker	(4)	35,000	96,9
Beaverton	(4)	81,154	176,1
Bend	(4)	55,000	72,6
Central Point	(2)	16,000	19,3
Clackamas Co.	(59)	780,310	901,3
Coos Bay	(4)	88,287	174,4
Corvallis	(6)	85,000	394,7
Dallas	(3)	42,000	52,8
Douglas Co.	(7)	88,720	148,7
Eugene	(48)	535,025	2,524,8
Forest Grove	(10)	88,000	178,6
Grants Pass	(6)	72,500	193,7
Gresham	( )	Nil	1,1
Hermiston	(11)	111,890	194,7
Hillsboro	(11)	124,500	144,8
Hood River	( )	Nil	58,9
Klamath Falls	(2)	29,000	59,1

*Breakdown not available

Western States for May

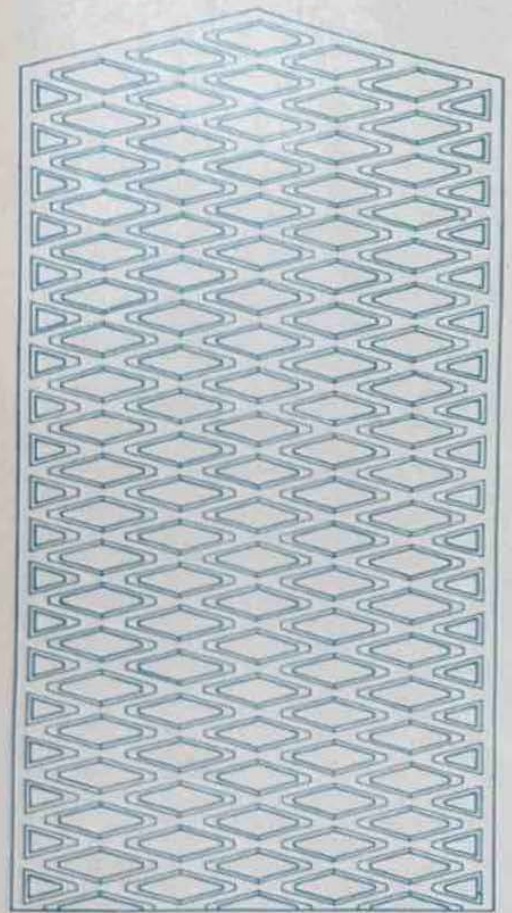
esidential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
La Grande	(5)	62,500	67,500
Lane Co.	(86)	946,648	1,409,250
Lebanon	( )	Nil	4,610
Marion Co.	(47)	508,500	592,675
McMinnville	(10)	110,500	280,860
Medford	(18)	152,400	360,650
Milln-Frwter	(5)	75,000	109,765
Multnomh Co.	(136)	2,099,810	2,662,277
Newberg	( )	Nil	25,105
Newport	(1)	11,200	353,600
North Bend	(3)	36,678	50,063
Ontario	(1)	8,000	23,500
Oregon City	(2)	16,500	45,930
Oswego	(12)	239,000	254,950
Pendleton	(6)	61,200	534,434
Portland	(108)	1,212,550	9,726,730
Prineville	( )	Nil	17,350
Roseburg	(4)	44,602	138,079
St. Helens	(4)	47,000	57,350
Salem	(18)	205,400	590,372
Seaside	(1)	15,000	22,080
Springfield	(8)	122,828	176,544
The Dalles	(18)	154,000	332,015
Wshngtn Co.	(67)	1,141,885	1,642,325
Total	**(758)**	**$ 9,702,485**	**$ 25,134,666**
WASHINGTON			
Aberdeen	(3)	$ 45,750	$ 357,027
Anacortes	(2)	28,000	51,959
Auburn	(23)	232,500	591,591
Bellevue	(2)	30,000	210,250
Bellingham	(3)	35,000	704,953
Bremerton	(4)	66,000	171,775
Camas	( )	Nil	50,070
Centralia	(1)	10,416	71,276
Chehalis	(2)	30,000	48,759
Clark Co.	(65)	843,300	962,260
Clarkston	( )	Nil	6,275
Ellensburg	(3)	43,500	72,600
Enumclaw	(3)	35,000	35,000
Ephrata	( )	Nil	137,235
Everett	(9)	150,004	321,764
Grys Hrbr Co.	(16)	122,700	180,150
Hoquiam	(1)	25,000	48,822
Island Co.	(15)	83,000	108,600
Kelso	( )	Nil	12,225
Kennewick	(3)	57,000	191,710
Kent	(22)	317,600	399,031
King Co.	(409)	5,887,270	8,015,975
Kirkland	(3)	33,500	35,950
Longview	(5)	77,500	152,417
Mercer Island	(14)	386,000	451,750
Montesano	( )	No Reply	No Reply
Moses Lake	(14)	199,780	479,351
Olympia	(6)	84,000	148,915
Pasco	(14)	162,000	444,125
Pierce Cty.	(137)	1,579,781	1,803,921
Port Angeles	(1)	16,000	34,500
Port Orchard	( )	No Reply	No Reply
Pullman	(6)	66,402	163,862
Puyallup	(3)	28,000	142,185
Renton	(14)	201,850	933,234
Richland	(11)	228,300	658,830
Seattle	(102)	1,943,350	7,196,539
Shelton	(2)	21,500	36,850
Spokane	(49)	742,300	997,400
Spokane Co.	(58)	886,040	1,206,243
Sunnyside	(3)	66,000	146,200
Tacoma	(32)	547,550	1,988,192
Vancouver	(15)	242,400	537,194
Walla Walla	(3)	172,500	256,168
Walla Wlla Co.	(7)	104,000	119,200
Wenatchee	(6)	88,500	140,275
Yakima	(11)	124,500	461,883
Total	**(1,102)**	**$ 16,043,793**	**$ 31,284,491**
ALASKA			
Anchorage	(24)	$ 588,935	$ 1,193,419
Fairbanks	(3)	63,000	1,710,075
Juneau	(30)	150,000	170,800
Ketchikan	(1)	15,000	192,700
Sitka	( )	No Reply	No Reply
Total	**(58)**	**$ 816,935**	**$ 3,266,994**
IDAHO			
Alameda	(12)	$ 132,400	$ 145,410
Blackfoot	(4)	61,000	66,875
Boise	(17)	169,400	1,138,985
Caldwell	(7)	92,700	271,885
Coeur d'Alene	(5)	72,350	233,326
Idaho Falls	(24)	336,330	462,374
Jerome	(1)	5,000	16,450
Lewiston	(2)	25,400	68,470
Moscow	(6)	120,800	138,400
Nampa	(5)	56,000	198,300
Payette	(2)	28,500	22,250
Pocatello	(4)	57,500	236,375
Sandpoint	(2)	26,000	48,300
St. Maries	(3)	30,500	30,500
Twin Falls	(9)	100,000	665,700
Total	**(103)**	**$ 1,313,880**	**$ 1,204,755**
MONTANA			
Anaconda	( )	Nil	$ 9,500
Billings	(55)	$ 784,400	823,182
Bozeman	(3)	53,500	65,600
Butte	( )	Nil	170,300
Cut Bank	(1)	24,000	35,300
Glasgow	(7)	90,000	99,800
Glendive	(1)	18,000	21,136
Great Falls	(52)	504,530	730,604
Havre	( )	No Reply	No Reply
Helena	(8)	128,800	196,448
Kalispell	(2)	18,500	51,865
Lewistown	(1)	6,000	32,700
Livingston	(2)	20,000	82,455
Malta	( )	Nil	Nil
Miles City	(6)	74,300	192,010
Missoula	(4)	70,000	104,688
Total	**(142)**	**$ 1,792,030**	**$ 2,615,588**
WYOMING			
Casper	(26)	$ 415,900	$ 1,113,874
Cheyenne	(44)	504,500	690,968
Cody	(5)	54,500	77,100
Laramie	(1)	15,000	119,075
Rawlins	(2)	45,000	60,960
Riverton	(5)	53,000	77,624
Rock Springs	(2)	35,000	39,000
Sheridan	(1)	8,000	110,353
Total	**(86)**	**$ 1,140,900**	**$ 2,288,954**
COLORADO			
Adams Co.	(63)	$ 768,000	$ 852,325
Alamosa	(3)	20,100	28,400
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(66)	1,371,000	1,602,429
Aspen	( )	Nil	5,000
Aurora	(107)	938,672	1,474,836
Boulder	(49)	713,100	145,900
Boulder Co.	(60)	697,300	825,928
Canon City	( )	No Reply	No Reply
Colrdo Sprngs	(53)	646,532	2,143,471
Cortez	( )	Nil	900
Denver	(418)	2,998,786	8,869,919
Durango	(2)	37,342	69,585
El Paso Co.	(31)	416,150	971,466
Englewood	(9)	84,546	249,604
Estes Park	( )	No Reply	No Reply
Fort Collins	(52)	595,710	710,274
Fort Morgan	(4)	39,831	54,936
Golden	(3)	29,300	39,020
Grand Juctn.	(2)	31,000	587,198
Greeley	(24)	269,000	381,029
Jefferson Co.	(347)	3,448,624	4,208,183
La Junta		41,900	50,538
Lamar	(6)	46,500	56,500
Littleton	(45)	325,800	627,598
Longmont	(19)	192,000	476,329
Loveland	(12)	137,664	275,789
Monte Vista	(3)	10,740	25,500
Montrose	(1)	13,265	92,845
Pueblo	(27)	318,940	1,556,893
Pueblo Co.	(13)	97,000	262,830
Sterling	( )	Nil	74,800
Trinidad	(1)	12,000	26,765
Walsenburg	( )	No Reply	No Reply
Westminister	(9)	90,102	212,767
Total	**(1,429)**	**$ 14,390,945**	**$ 26,959,557**
UTAH			
American Frk	(2)	$ 25,000	$ 64,100
Bountiful	(35)	535,404	575,164
Brigham City	(38)	433,100	621,450
Cedar City	(2)	48,000	71,300
Clearfield	(3)	36,000	75,650
Davis Co.	(13)	143,273	155,709
Kaysville	(8)	66,695	69,695
Layton	(24)	294,000	307,900
Logan	(8)	126,639	2,539,565
Murray	(22)	227,000	295,110
Ogden	(13)	244,000	359,000
Orem	(7)	71,260	222,076
Price	( )	No Reply	No Reply
Provo	(8)	105,000	250,225
Salt Lake City	(24)	328,240	1,359,027
Salt Lake Co.	(604)	4,836,900	5,472,040
So Slt Lk Cty.	(2)	287,500	339,945
Spanish Fork	(4)	28,500	35,550
Tooele	(12)	170,744	258,432
Utah Co.	(5)	66,015	162,520
Weber Co.	(5)	93,000	123,000
Total	**(839)**	**$ 8,164,270**	**$ 13,357,458**
NEVADA			
Boulder City	( )	Nil	$ 3,500
Clark Co.	(101)	$ 1,559,403	2,139,728
Elko	( )	No Reply	No Reply
Las Vegas	(181)	2,293,000	2,915,132
No. Las Vegas	(66)	624,898	684,426
Reno	(64)	844,500	2,007,983
Sparks	(11)	156,759	263,412
Washoe Co.	(19)	328,320	452,115
Total	**(442)**	**$ 5,806,880**	**$ 8,466,296**
ARIZONA			
Buckeye	( )	Nil	$ 3,650
Casa Grande	(2)	$ 27,000	33,100
Chandler	(6)	56,148	100,536
Douglas	(5)	35,000	57,096
Flagstaff	(71)	157,796	406,173
Florence	(5)	35,000	76,350
Glendale	(22)	190,800	351,550
Maricopa Co.	(704)	8,360,015	8,919,148
Mesa	(102)	885,600	1,328,432
Miami	( )	No Reply	No Reply
Phoenix	(474)	3,693,305	8,917,319
Pima Co.	(147)	1,700,915	1,985,298
Prescott	(10)	126,000	182,985
Scottsdale	(122)	972,700	1,305,800
Tempe	(63)	507,500	587,875
Tucson	(95)	1,183,406	2,914,664
Wickenburg	(1)	6,500	8,400
Winslow	(7)	21,045	469,910
Yuma	(20)	153,800	165,850
Total	**(1,856)**	**$ 18,112,530**	**$ 27,814,136**
NEW MEXICO			
Alamogordo	( )	Nil	$ 12,980
Albuquerque	(123)	$ 1,429,023	2,899,995
Artesia	(1)	7,000	67,021
Carlsbad	(8)	100,500	135,675
Clovis	(36)	333,255	374,287
Deming	(5)	44,500	103,500
Farmington	(4)	97,207	149,417
Gallup	(2)	30,800	318,849
Hobbs	(29)	255,000	414,600
Las Cruces	(11)	151,000	273,189
Las Vegas	(1)	13,285	403,085
Lovington	(5)	79,500	79,500
Raton	( )	Nil	Nil
Roswell	(76)	651,000	1,447,518
Santa Fe	(39)	303,550	355,897
Silver City	( )	No Reply	No Reply
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(1)	6,000	27,200
Tularosa	( )	Nil	Nil
Total	**(341)**	**$ 3,501,620**	**$ 7,082,713**
HAWAII			
Hawaii Co.	(21)	$ 264,178	$ 711,799
Honolulu	(358)	4,137,322	9,200,340
Maui Co.	(13)	131,861	535,961
Total	**(392)**	**$ 4,533,361**	**$ 10,448,100**
GRAND TOTAL	**(26,181)**	**$306,860,071**	**$559,047,959**



LIBRARY, focal center of 153-acre campus, is raised on one-story brick base. Columns encircling structure on 16-ft. square module support precast concrete roof forms. Glass enclosure is protected by precast concrete screens on three sides. Building is designed to house 50,000 volumes, seat 1,000 students.

Colonnaded courts set scale for junior college campus



LIBRARY SCREEN DETAIL

One of the oldest junior colleges in California, mushrooming College of San Mateo, will forsake two campuses—Coyote Point and Delaware—when it occupies the 153-acre Campus Heights site west of El Camino.

Located in the hills overlooking San Francisco Bay and the county of San Mateo, the site is dotted with fine old oak and eucalyptus trees. In the Bay area, where expanses of open land are becoming virtually nonexistent, this is one of the few remaining sites of such quality.

Architects John Carl Warnecke & Associates, who are master planning and designing all of the buildings to accommodate 4,000 students, explain their approach this way: "San Mateo shares a rich cultural and material heritage with many California communities situated along the path of the Spanish missionaries. In trying to continue this tradition, we have analyzed not only the architecture of the missions but the root of this tradition in Spain and Persia. The aim has been to create the atmosphere of such complexes as the Madresseh in Isphahan and the buildings and gardens of the Alhambra."

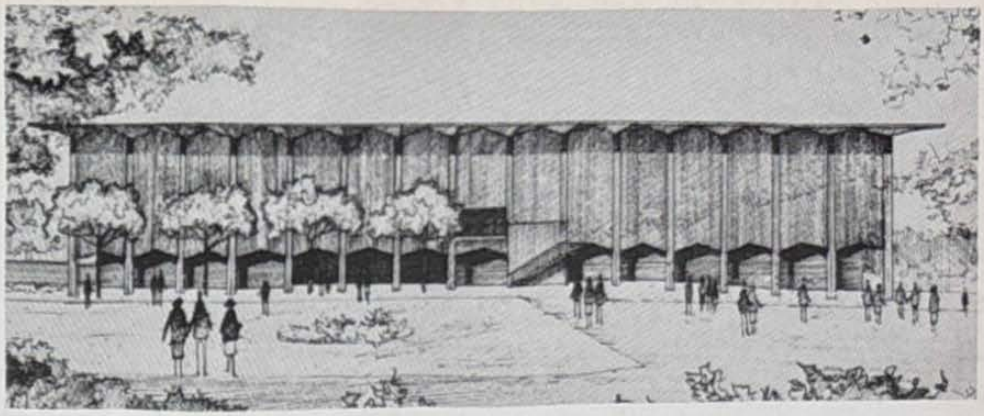
Thus the site plan gives the impression of a series of connected colonnaded courts, emphasized by a strongly expressed column module of 16 ft. A basic roof of poured-in-place folded plates which terminate in hyperbolic paraboloids is repeated with minor variations throughout. Spandrels and end walls are poured-in-place integrally colored concrete. Gray heat-absorbing glass is used throughout the campus wherever sun control presents a problem.

Buildings are sited in centers alon two circulation malls which coincid with the two long axes of the sit At this intersection is the library making it the geographical as we as the focal center of the campus.

The library's main floor is of two story height; the lower floor contain an audio-visual area comprising television and FM studio as well a listening and recording booths. Ex terior walls are completely glass, pro tected with precast concrete screen on the east, south and west. Roof rest on its slender supporting columns t produce an airy, almost basilica-lik interior space.

Both malls arise out of the col lege's main court, defined by the library to the east, the gynasium t the south, the student center and administration building to the west and one of the academic classrooms to the north. The cultural center, comprising art, music and drama facilities, surrounds a patio and forms the western termination of the shorter mall. An outdoor theater in-the-round is the focus of this court. The entire group of buildings is located close to the entrance of the campus and near major parking areas to provide access for community and public functions.

Principal access to the site will be by way of a freeway. The road pattern is a perimeter loop which at no point crosses pedestrian circulation between buildings. Parking is accomplished along the perimeter. A large area has been provided near the entrance; smaller ones are close to



GYMNASIUM repeats folded plate roof terminating in hyperbolic paraboloids at overhead.

TWO-STORY HEIGHT of library's upper floor houses reading room and open stack area, located on mezzanine, occupying about one-third of area. Lower floor contains audio-visual area with TV and FM studio.



the gymnasium and administration building. Remainder of the 2,500-car parking is provided along the windward side of the site in the shelter of native trees. Parking has not been planned along the lee side which also coincides with the main view.

Majority of the buildings are two stories with a few one-story structures. Their scale, as well as the courts and malls, has not been allowed to become as small and intimate as is common with school construction in California. The architects feel the individual free-standing buildings arranged in a campus plan, even though connected by covered walkways in many areas, "contribute to this feeling of greater scale and importance, both to the overall plan and to the individual units, in keeping with higher education."

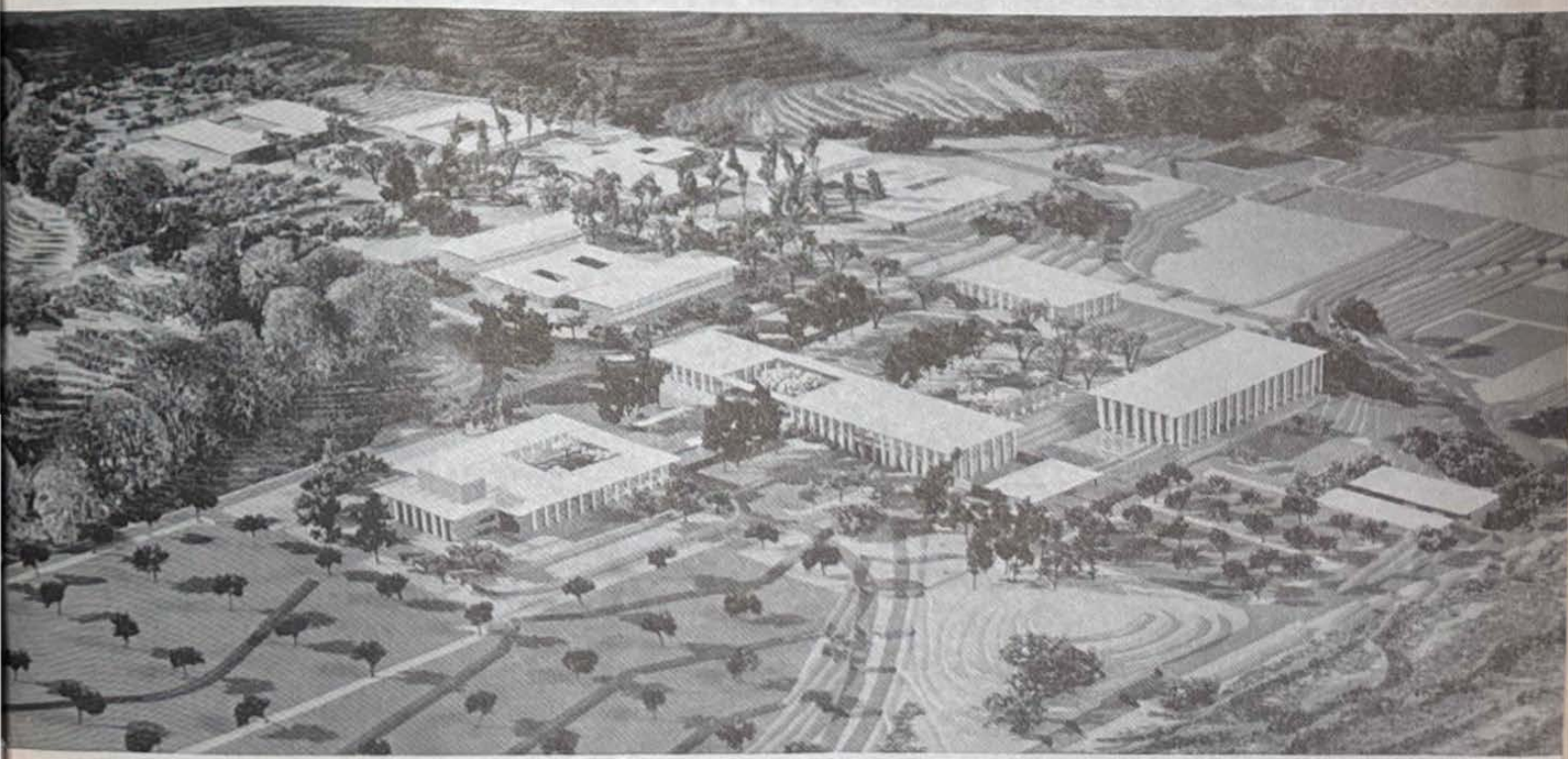
Working with college officials and a citizens' advisory committee since 1954, the architects evaluated 14 possible sites before the Campus Heights selection was made.

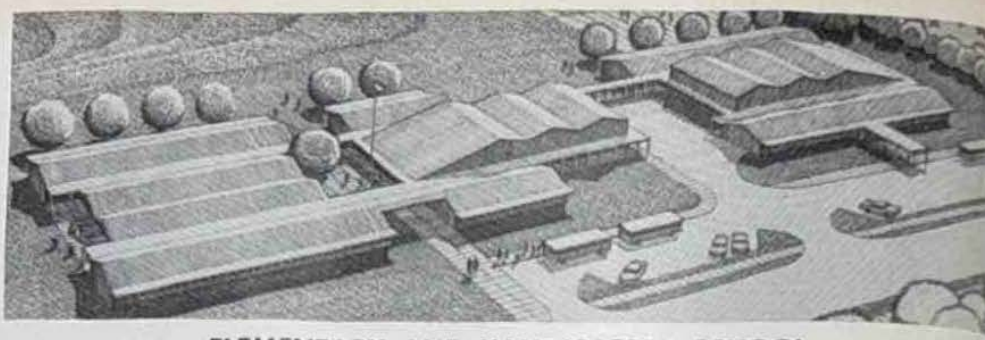
Project is being financed through $5.9 authorized in a 1957 bond election and sales of the two existing campuses. Anticipated move-in date: fall of 1962.

Structural engineers are John A. Blume & Associates; mechanical-electrical engineers: Keller & Gannon; acoustical engineer: Dariel Fitzroy; landscape architects: Royston, Hanamoto & Mayes.

Of the total 153 acres, 10 are devoted to buildings and 50-60 to developed garden areas. Present planning provides space for expansion within existing structures to handle a possible ultimate enrollment of 8,000.

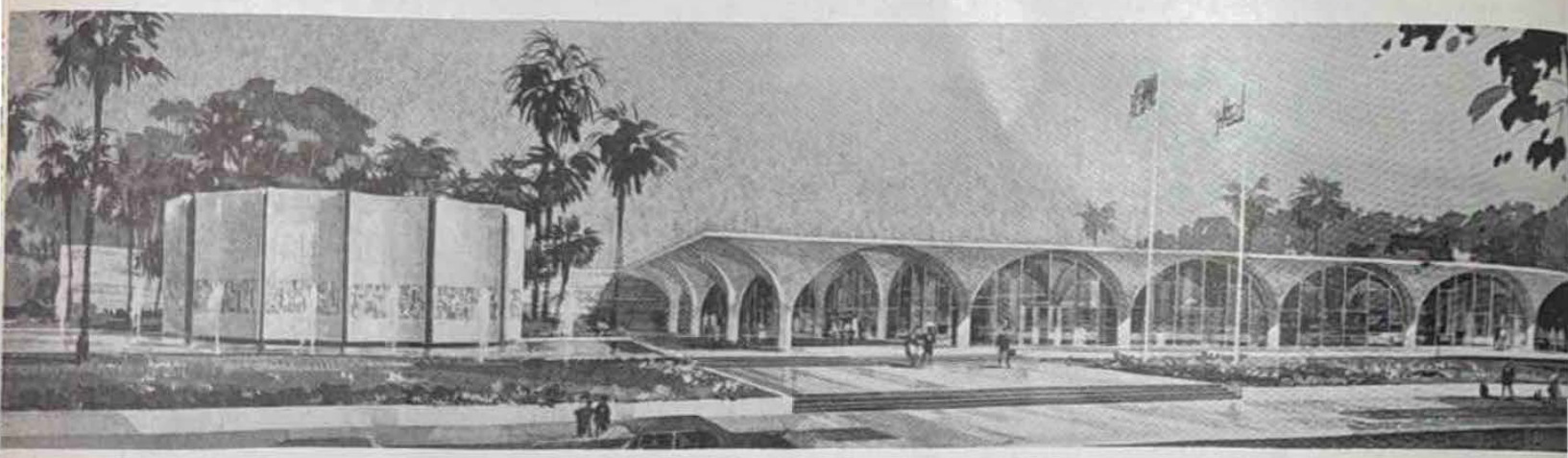
SITE is blessed with rolling hills, fine old oak and eucalyptus trees and view of San Francisco Bay. Naturally defined and protected by steep ravines, area is constantly under westerly wind of from 10 to 15 mph.





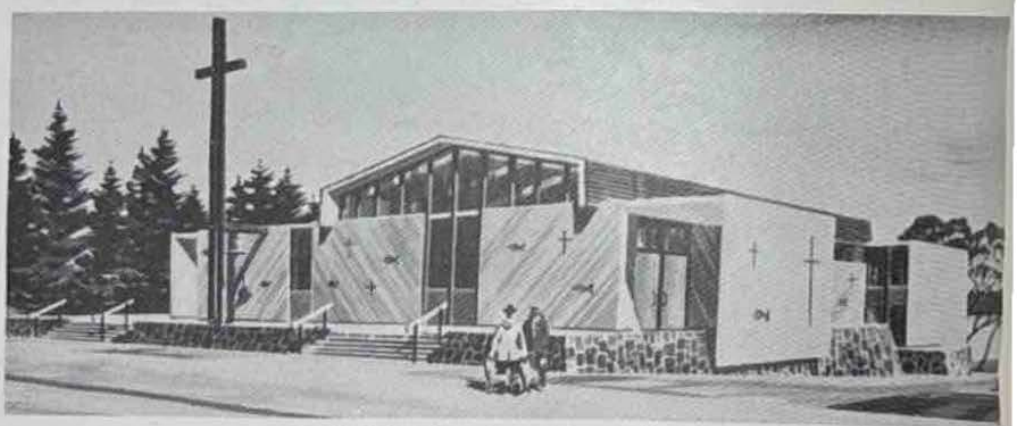
ELEMENTARY AND HANDICAPPED SCHOOL

in Tacoma will be distinguished by wood undulating roof shapes and by scale and atmosphe of small house space inside. Twelve-classroom elementary school is at left with multipurpo area housed in high element and entrance and play court as core. Handicapped facility h occupational and physical therapy core. Allowable budget is $614,000. Architects: Liddle & Jos



CIVIC CENTER FOR ORANGE, CALIF.

will consist of precast concrete arch structure of four units interconnected by arcade. Floor-to-ceiling glass windows will be protected by 12½-ft. overhangs of roof system. Fourteen-sided council chamber will have vertical, precast exposed aggregate panels with bas-relief mural in band around entire building. It will connect to administrative wing via glass enclosed lounge. Estimated cost, including demolition, property acquisition, etc.: $1,570,000. Architects-engineers: Welton Becket & Associates.



COMMUNITY BAPTIST CHURCH

is under construction in Cordova, Alaska, coastal city with population in neighborhood of 2,000, whose economic activities are strictly related to fishing, crabbing, clamming, etc. Designed to use some existing concrete foundation work of structure which burned last winter, building is sited on steep slope consisting of bedrock, hardpan and muskeg, all unpredictably mixed up. Upper floor contains sanctuary, office space, lounge and Sunday school classrooms; lower floor, small recreation hall and classroom and craftrooms for youth program. Estimated cost of construction on force account basis is about $140,000. Architects: Edwin Crittenden & Associates.

As We Go To Press . . . *Highlights & Sidelights*

THE BUILDING WEST—A surge of residential construction pushed building permits for May to a total of $559,047,959, as reported to Pacific Architect & Builder by 500 cities and counties in 13 western states. This was an increase of $65 million (13%) over April, and more significantly, $49 million of the gain was in residential permits. Nonresidential work continued its unusually strong pace, accounting for $252 million of the grand total. The building picture in May was not only better than April but also showed well in comparison with May of a year ago, with a $56 million (11%) jump in dollar volume.

FIVE-MONTH TREND—Permits issued through the first five months of 1961 total a strong $2,416,222,023, roughly $121 million greater than the figure for the same period last year. It is interesting to note that a trend seems to be established. First quarter permits were up 4% over a year ago; April, 5%; and May, 11%—all of these figures being greater than the increased cost index, indicating that this is an increase in actual physical construction and not just the effect of inflation. If residential construction continues to gain after its slow start this year and adds volume to the already heavy volume of non-residential work, the building industry in the West can look forward to very rosy third and fourth quarters.

TOP TWENTY-FIVE—Hottest spots in the West for May are the agencies listed here with dollar volume of permits rounded out in millions: **1.** Los Angeles, $70.4; **2.** Los Angeles County, $39.6; **3.** Huntington Beach, Calif., $13; **4.** San Diego, $12.9; **5.** San Jose, $11.4; **6.** Portland, $9.7; **7.** Honolulu, $9.2; **8.** Maricopa County, Ariz., $8.9; **9.** Phoenix, $8.9; **10.** Denver, $8.9; **11.** Sacramento County, $8.6; **12.** San Bernardino County, Calif., $8.5; **13.** King County, Wash., $8; **14.** Seattle, $7.2; **15.** San Francisco, $7; **16.** Long Beach, Calif., $6.8; **17.** San Diego County, $6.5; **18.** Ventura County, Calif. $6.2; **19.** Oakland, $6.2; **20.** Salt Lake County, $5.5; **21.** Santa Barbara County, $5; **22.** Anaheim, Calif., $5; **23.** Contra Costa County, Calif., $4.6; **24.** Alameda County, Calif., $4.3; **25.** Jefferson County, Colo., $4.2. (Fullerton, Calif., should have been listed as No. 17 last month.)

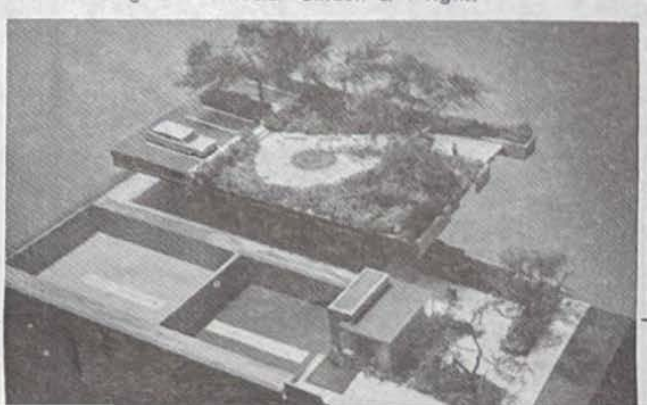
FACTORY MAINTENANCE MOUNTS—The West is leading the nation in factory maintenance problems because of big nuclear development, says the chairman of the board of sponsors of the Western Plant Maintenance & Engineering Show scheduled for the Los Angeles Pan Pacific Auditorium July 18-20. "A plant using radioactive materials offers many examples of our new reliance on sound maintenance engineering," explains R. L. Saling of Westinghouse Electric Corp. "For instance, an ordinary concrete floor won't do because of the danger of contamination if materials are spilled. What form of impervious materials should be used? What sort of disposable coverings are appropriate? In handling certain alloys, a plant must humidify its air to prevent static electricity in ventilators. Some alloys must be enclosed in resistant shields."

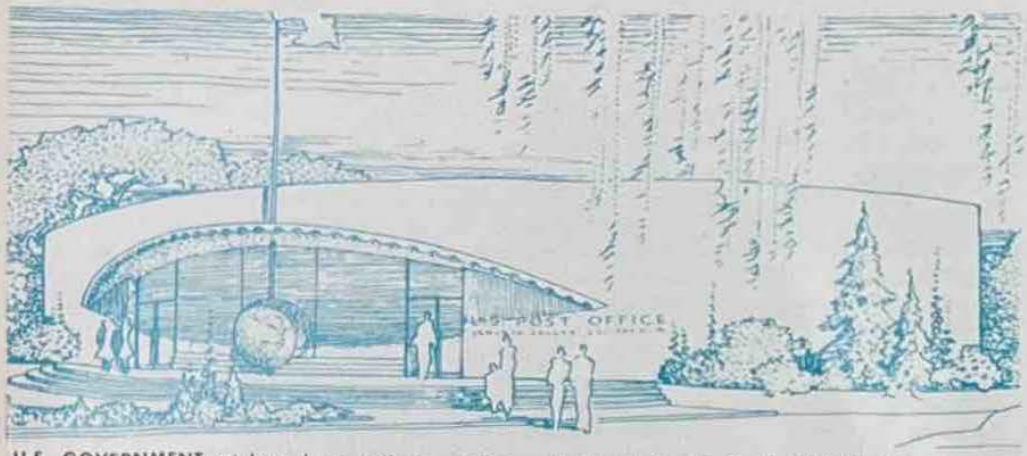
CONCERNING COMPETITIONS—Serving with editor Proctor Mellquist on the seven-man jury for the Western Homes Awards program cosponsored by Sunset Magazine and the AIA are architects Robert E. Alexander, Los Angeles; Fred Bassetti, Seattle; John Carl Warnecke, San Francisco; and Minoru Yamasaki, Birmingham, Mich.; landscape architect Thomas Church, San Francisco; and industrial designer Henry Dreyfuss, who presently has offices in both New York and California. Deadline for entries: June 30.

PA&B COMMENDATION, OMISSION—Among 173 works selected from a total of 950 entries in the 12th annual show of the Seattle Art Directors' Society was PA&B's cover thus earning an Award of Merit. James E. Peck was responsible for the design, which made its debut in January. . . . Dan Elliott should have been credited with the photographs of Armijo Elementary School, Albuquerque, in the June issue.

UNDERGROUND EQUIPMENT BUILDING

for Pacific Telephone Northwest will be first of its type anywhere in nation, with above-ground park to be developed for use of Pomeroy, Wash., residents. Plans call for structure, 31 ft. wide by 40 ft. long, to be buried about 3 ft. below ground level. Reinforced concrete walls, 10 in. thick, and slab floor and roof will be completely waterproofed. Entry cubicle is seen at right. Architects: Bindon & Wright.





U.S. GOVERNMENT, at long last, will use structure designed by Frank Lloyd Wright.

Marin post office, Phoenix house keep Wright in news

Only building designed by Frank Lloyd Wright to be erected for actual use by a federal agency will become a certainty later this year when a post office gets under way at the main entrance of the Marin County Civic Center near San Rafael, Calif.

This is the second time in the past few months that the late architect's name has popped up in the building news in the West. It was announced earlier that a $100,000 Wright-designed house completed in 1953 had been donated to the Phoenix Art Museum by Mrs. Lucius Boomer, widow of the builder of New York's Waldorf Astoria Hotel.

Plans for the post office were approved before leasing arrangements were completed, a departure from the normal procedure. John J. McDonnell of Upper Darby, Pa., has been authorized to construct the building.

The post office will be built of concrete masonry with a reinforced concrete arch entrance. It will utilize an unusual plywood box-truss system, incorporating 5,000 sq. ft.

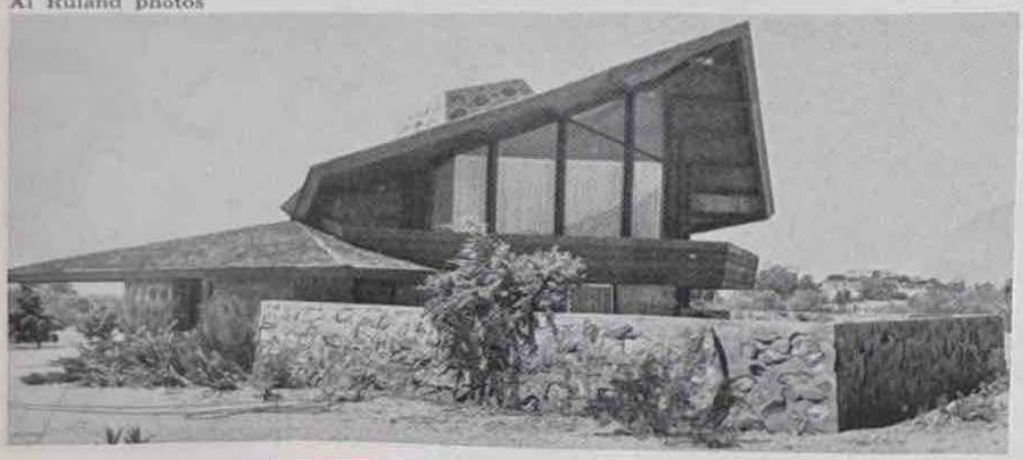
The entire Marin project, estimated to cost $11 million when completed, is the largest of Wright's western projects currently under construction. It will include a main structure to house all county offices, a jail and a library. The complex will link three hilltops and span a valley on the 140-acre site.

His work is being carried on by Taliesin Associated Architects, represented on the West Coast by Aaron G. Green of San Francisco.



BOOMER RESIDENCE, which Phoenix Art Museum currently will use as director's and guest house, is built of native stone and masonry, has redwood interiors throughout. South and east elevations, with wall to patio on right, are seen below. Entrance is at left.

Al Ruland photos



National code council has three westerners

An Advisory Council on Buildi Codes, made up of representatives architectural, engineering and tra associations and model code organiz tions, hopes to draw up "the cleare statement on code affairs that h ever been promulgated."

Among its 35 members are thr westerners: T. K. May, director technical service, West Coast Lumbe men's Association, Portland; N. Perkins, special assistant to the exe utive vice president, Douglas Fir Pl wood Association, Tacoma; and F. Roberts, president of the Internatio al Conference of Building Officia and chief building inspector of Boi

The council, which held a two-da organizational meeting in Washingto D.C., in May under the sponsorship the U.S. Chamber of Commerce, w map out statements on several diffe ent aspects of the code problem pri to its September meeting. Specifica ly, the group will give its opinion the steps to be taken in formulatin enacting and administering codes th can lead to further progress and provide general information to t public that will cast a true light the subject.

Supporters of the approach take by the council include William Tabler, chairman of the AIA's com mittee on building codes, who se the organization as a real sign th some of the code problems which hav hit cities can be eliminated.

George N. Thompson, former chi of codes and specifications for th National Bureau of Standards, point out that building code problems ar "periodically rediscovered by the pub lic at large, but the true course fo progress is not sensationalism bu steady, hard, first-rate effort by th best minds in the field."

Council chairman is William G Kirkland, assistant vice president a the American Iron and Steel Institute

Landscape architects pick Boulder for July sessions

Sibyl Moholy-Nagy, professor of architecture at Pratt Institute, Brooklyn, will address the American Society of Landscape Architects during its 62nd annual meeting in the Harvest House, Boulder, Colo., July 10-12. Her topic: "Buildings and Backgrounds."

Other speakers will be Theodore Osmundson Jr. of Berkeley ("Design en Masse: Art or Planning?"); Robert M. O'Donnell of Denver ("Restrictions of Climate on Landscape Design"), and John O. Simonds of Pittsburgh ("Role of Design in Public Office").

new offices, partnerships

Darrel C. Stebbins has established an office for the practice of architecture at 204 Great Northwest Life Bldg., Spokane. He formerly was an associate in the firm of Culler, Gale, Martell & Norrie and more recently of James & Hicks.

Smith-Waldron, San Francisco architects, have opened a second office at 1155 Crane St., Menlo Park, Calif.

Robert M. King and Don L. Yinger have formed the partnership of King & Yinger, architects, with offices in the United California Bank Building, Second and Main Streets, Pomona, Calif.

William H. Trogdon is continuing his architectural practice at 410 Sherwood Bldg., Spokane, with B. Russell Smith as the partnership of Trogdon-Smith.

new partners, associates

Edgar B. Jensen, Boise architect now located at 413 Idaho St., has a new associate, Robert L. Watson, who has had 10 years' experience in offices in Boise and California.

Kenneth V. Marr, Charles H. Grimes and R. Joe Wood have become partners in the firm of Arthur A. Sauer & Associates, Sacramento civil-structural engineers. (An item carried in May was incorrect.)

firm changes

The Berkeley architectural firm of Ratcliff & Ratcliff has been suceeded by Ratcliff-Slama-Cadwalader. Principals are Robert W. Ratcliff, Murray A. Slama and Burns Cadwalader.

new addresses

John Schotanus Jr., architect, to 207 E. Camelback Road, Phoenix.

Ralf E. Decker, architect, to 1040 Washington Bldg., Seattle.

Semco, Sweet & Mayers, consulting industrial engineers, to 2835 Gilroy St., Los Angeles.

Harold G. Thompson, architect, to 7071 Fairview Ave., Boise.

John S. Villesvik, architect, and Maurice R. Smith, associate, to 418 Liberty Bldg., Yakima, Wash.

Balzhiser, Seder & Rhodes, architects, to 755 Country Club Road, Eugene.

Robert E. Viault & Associates, architects, to 112 Second St., Hermosa Beach, Calif.

Harold G. Stoner, architect, to 29 Hillcrest Court, San Anselmo, Calif.

Norris M. Gaddis, architect, to 618 Grand Ave., Oakland.

W. C. Muchow Associates, architects, to 3911 E. Exposition, Denver.

Earl & Wright, consulting engineers, to 49 Fremont St., San Francisco.

Branch, Branch & Garrison, architects, to 811 Pacific Ave., Bremerton, Wash.

Andersen, Koerwitz & Hawes, consulting engineers, to 900 E. Louisiana Ave., Denver.

deaths

R. B. Scott, 66, chief of the Santa Cruz County (Calif.) Building Department, died May 5 of an apparent heart attack.

elections, appointments

Southwest Washington Chapter, AIA, has reelected its president, John E. McGuire, and its first vice president, Robert M. Jones. Other officers are K. Walter Johnson, second vice president; James M. Harris, secretary; and Donald W. Seifert, treasurer.

Henry Melton Hesse has been appointed director of the architectural department of Harland Bartholomew & Associates, Honolulu planning firm. He most recently served as master planning advisor to the Republic of Korea military government.

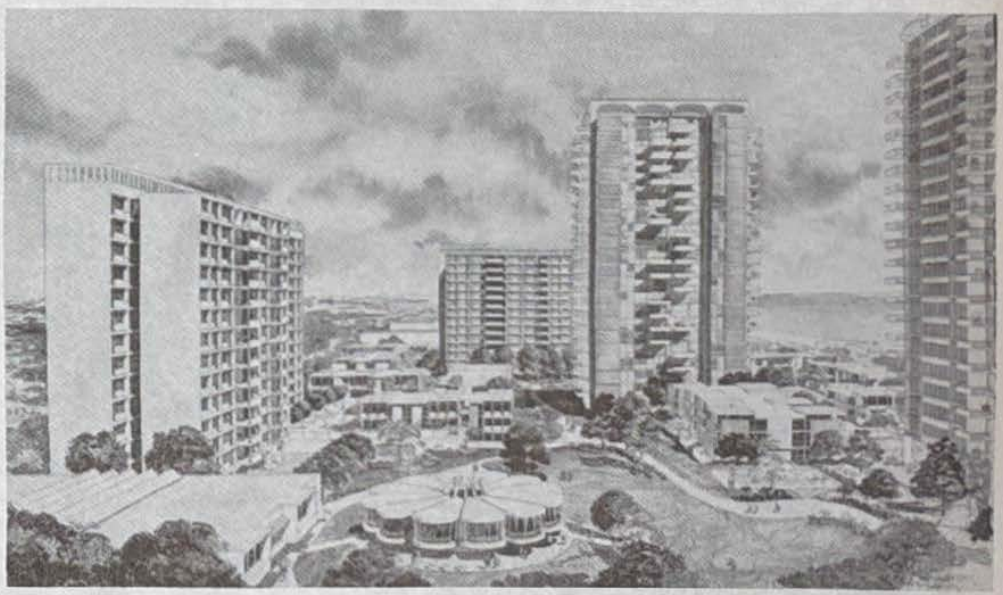
John B. Skilling, consulting and structural engineer, has been named to Seattle's Municipal Art Commission to fill the unexpired term of Victor Chanasky, landscape architect, who has left the city.

James D. Graham, civil engineer in the Los Angeles architectural-engineering firm of Albert C. Martin & Associates, has been elected president of the Engineers and Architects Institute.

Los Angeles architect Victor Gruen has been elected a trustee of the Washington (D.C.) Center for Metropolitan Studies, a nonprofit institution covering work on city planning and urban problems in cooperation with leading U. S. universities.

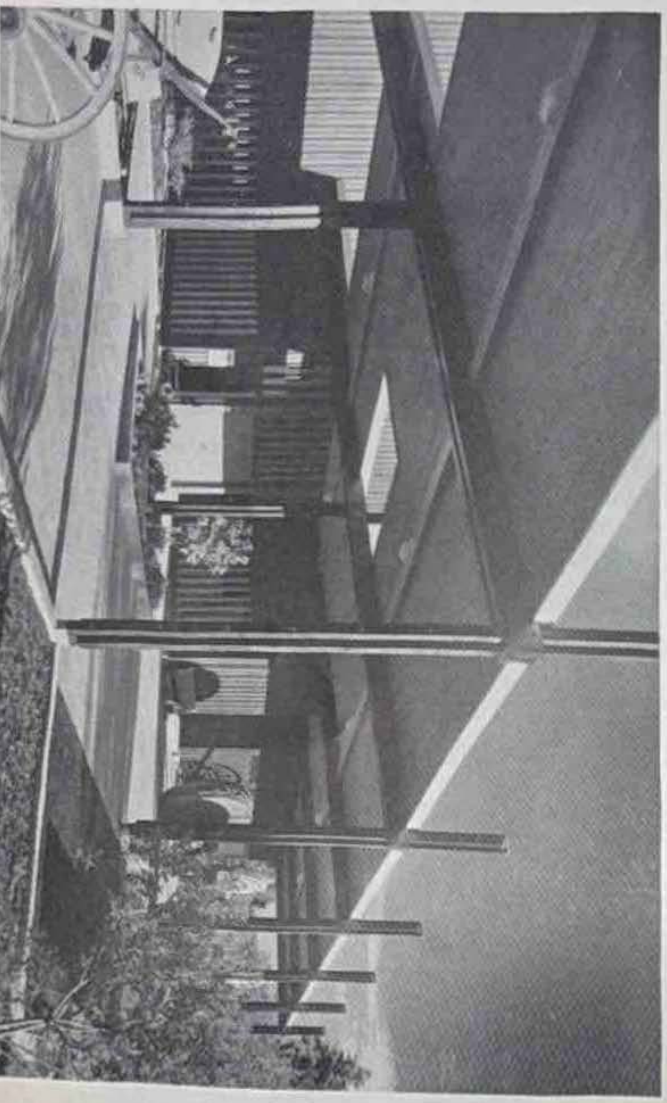
DeVon M. Carlson, Boulder architect and on the University of Colorado faculty, has been named to the State Board of Examiners of Architects for a five-year term.

Ralph M. Westcott, immediate past president of the national Consulting Engineers Council, has been named a director of the Los Angeles Chamber of Commerce.

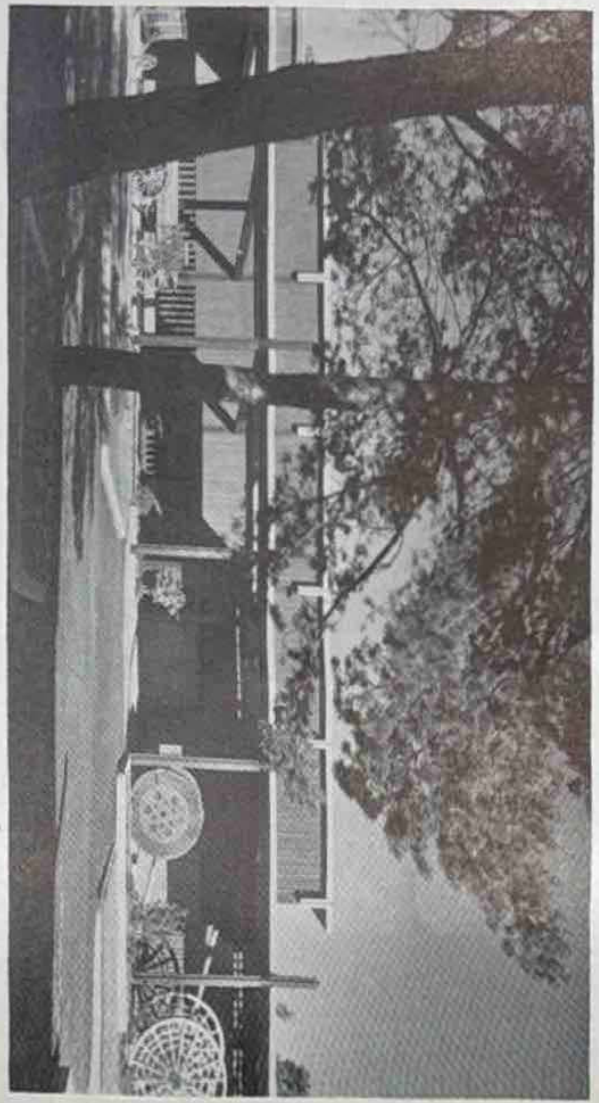


$50 MILLION OCEAN PARK PROPOSAL

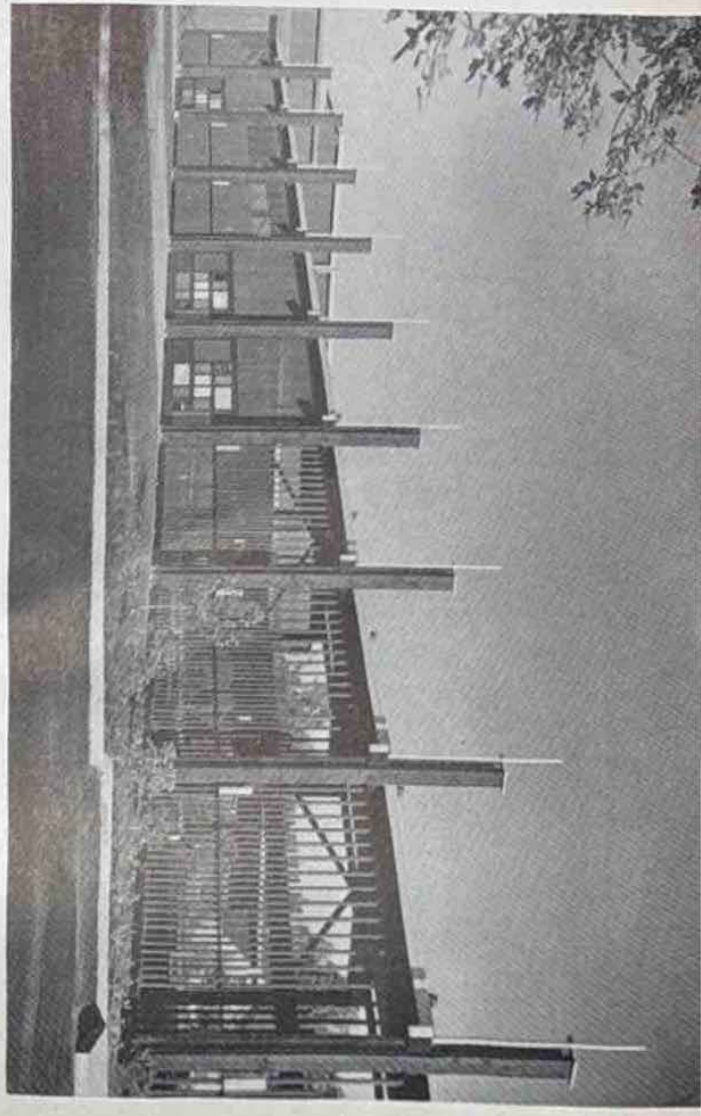
made by Kern County Land-Del Webb Construction Co., with Welton Becket & Associates as architects-planners, takes lead in race of 10 bidders to acquire and redevelop 36 acres in Santa Monica, Calif. Recommendation of city's Citizens Progress Committee, which ranks proposal first on basis of plan concept and architectural attractiveness, will count more than one-third toward final choice, also to be based on land bid, economic feasibility and background. Central park with flower shaped restaurant is flanked by 2,000 dwelling units.



3



2



1



4 Tom Burns Jr. photos

Lane County Fairgrounds
Eugene, Oregon

STAFFORD, MORIN & LONGWOOD
Architects

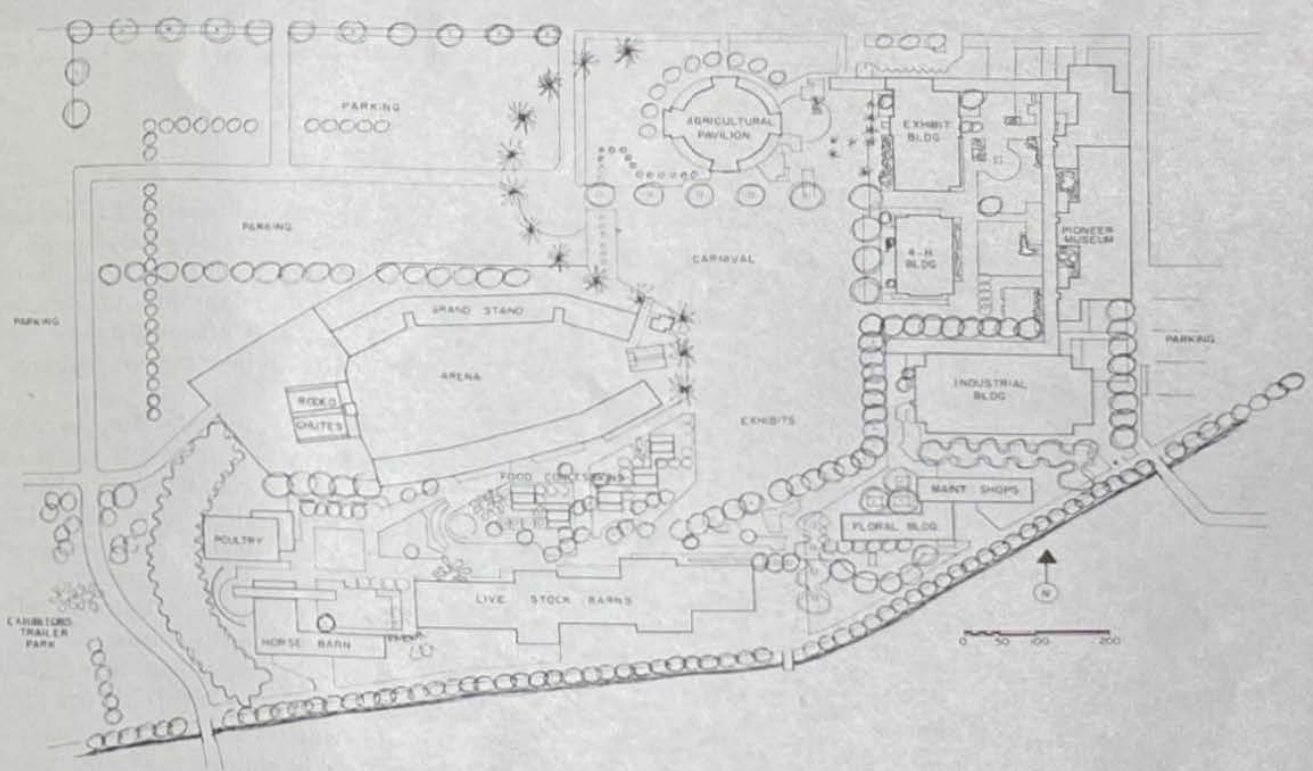
MARQUESS & MARQUESS
Engineers

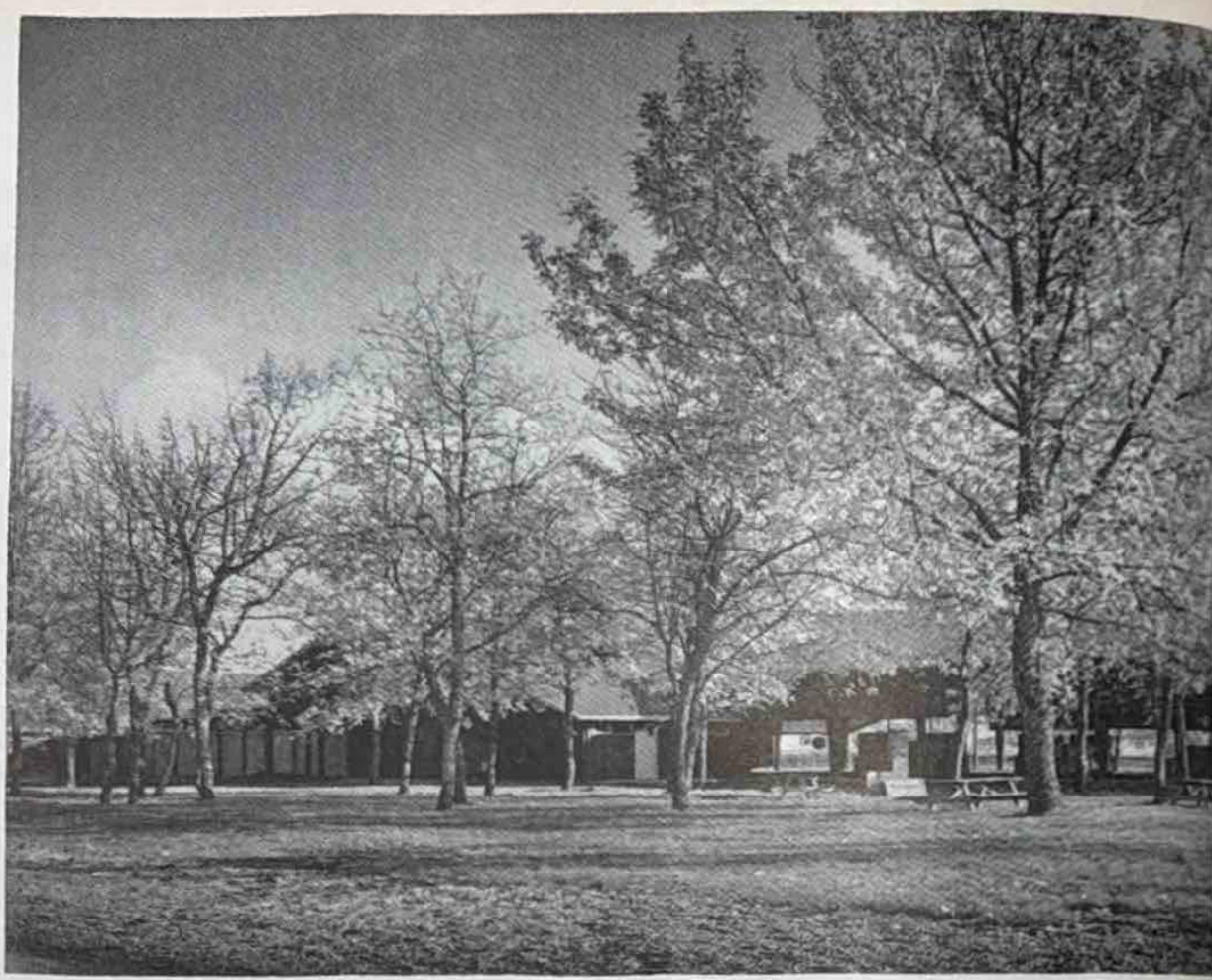
LLOYD M. BOND & ASSOCIATES
Landscape Architects

Design comes to the fair --gay but never garish

COLONNADE which unifies main entrance (1) and Pioneer Museum (2,3) has stained black structural members, cool yellow trim, stained rich brown siding and natural soffits. Glass panels at entrance are shades of green and blue with yellow accents. Museum's simple, smooth walled interior (4) is appropriate backdrop for exhibits.

SELDOM does one encounter a fairgrounds project designed with as much continuity and refinement as this one in southwestern Oregon. The architects have taken full advantage of a long-range program, existing buildings and native materials to create an appropriate setting—with just enough restraint—for both the





COW PALACE, which houses livestock at fair time, is multipurpose building used during rest of year for an



DOUGLAS FIR BLEACHERS of rodeo arena are architect designed.

county fair and other conferences and meetings to be held there

A major consideration in the overall planning was the site within the Eugene city limits and six blocks from the center o town, and its relation to arterial development. Of necessity, with a possible 10,000 to 15,000 people attending any one affair traffic patterns and parking areas became an integral part o the general scheme.

Buildings were designed for multiple use. In addition to specific space requirements for the fair itself, provisions were made for such activities as lumber conferences, religious meet ings, large conventions, banquets seating more than 1,500, auto shows, rodeos, horse shows, dog shows, 4-H activities, small group organization gatherings, dances and concerts.

Major material throughout is wood, a natural selection as best expressing this lumber center. All siding is rough sawn board and batten combination with the addition of glass panels for color. Colonnades and screens are of built-up solid wood columns; beams, decking, decorative screens and gateways like- wise are of wood. Construction is simple post and beam, using a cantilever system to increase the span. For large, clear spans, glued laminated haunch arches are employed.

In order to cut down the volume of building in the Agri- cultural Pavilion, a reversed arch in radial system is utilized

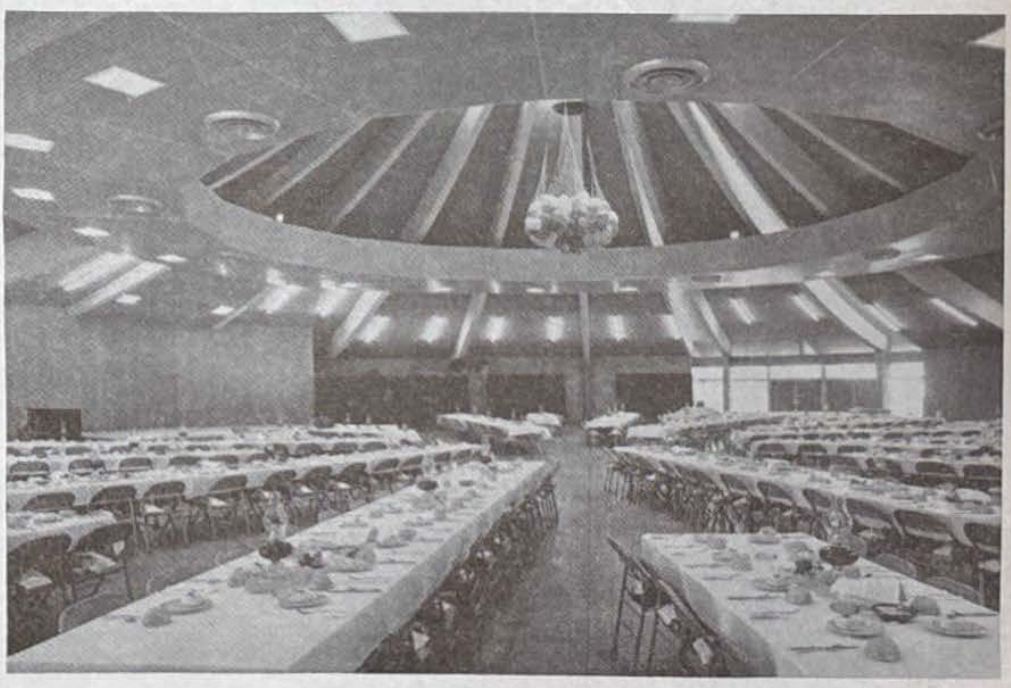


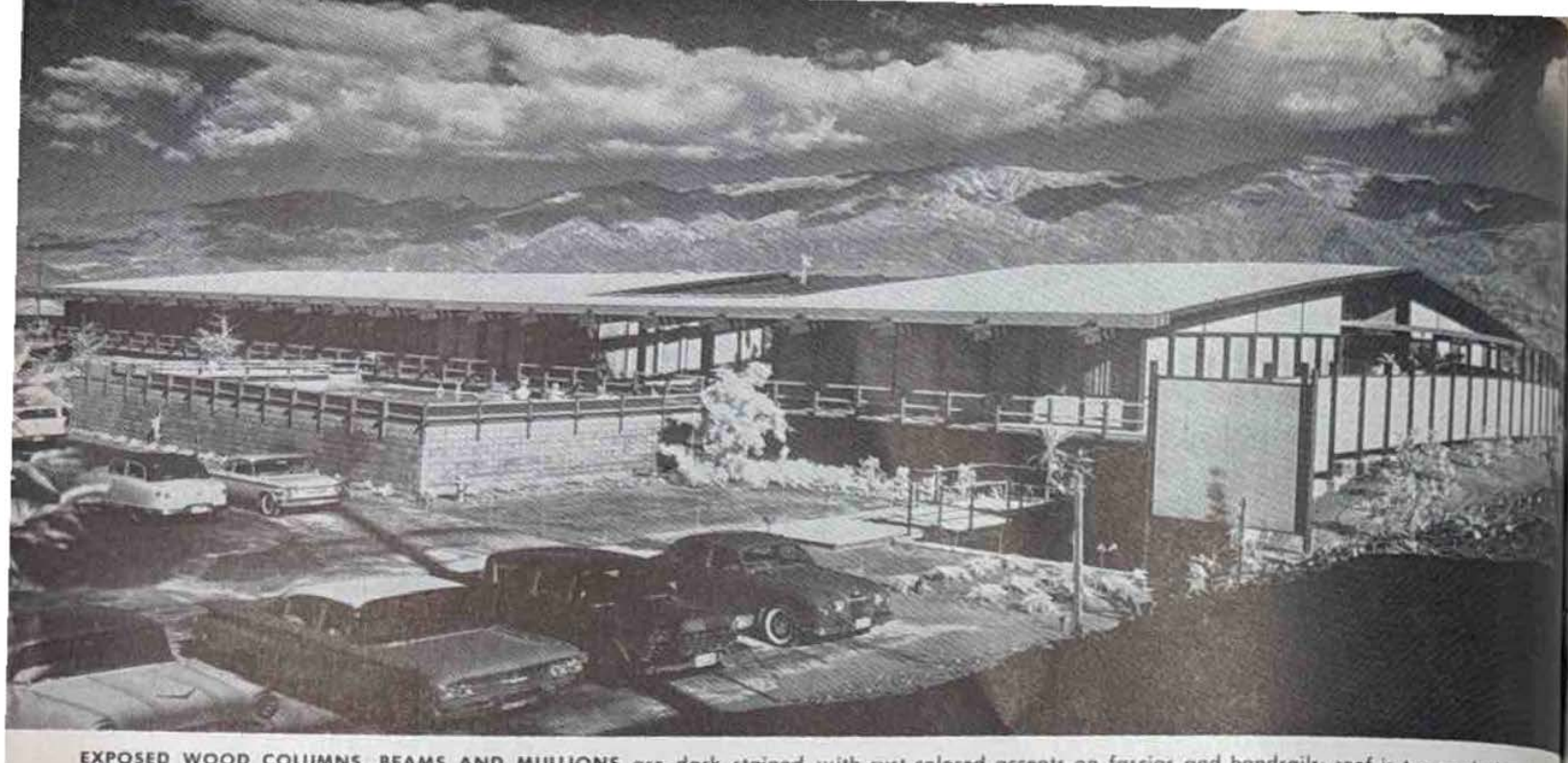
hows to logging exhibits.

with a compression ring at the center top and a tension ring at the piers supporting glued laminated arches, both a logical and happy solution.

Complete drainage and grading scheme has been worked out for the entire 40-acre site and a sequential plan for renovation of old and construction of new buildings set up. In order of their appearance, the project thus far includes the Pioneer Building, first unit of the Cow Palace (general contractor: John Steinmuller); rodeo arena, chutes and additions to stands; addition to the Cow Palace (John Steinmuller); Agriculture Pavilion (W. H. Shields Construction Co.); restrooms (Lee Built Homes); entrance and office building (Arnt Rhee & Son); Pioneer Museum (W. H. Shields); food booths and alterations to the arena building (Eldon Shields Construction Co.). While the museum is a separate entity from the actual workings of the fairgrounds, it lends itself to the overall development by opening up one side of the pedestrian mall.

COLORFUL AGRICULTURE PAVILION, set up here for banquet, has variety of activities taking place under its roof: dances, boxing, concerts, lectures, auto shows, even worship services.





EXPOSED WOOD COLUMNS, BEAMS AND MULLIONS are dark stained with rust colored accents on fascias and handrails; roof is tan crushed rock.

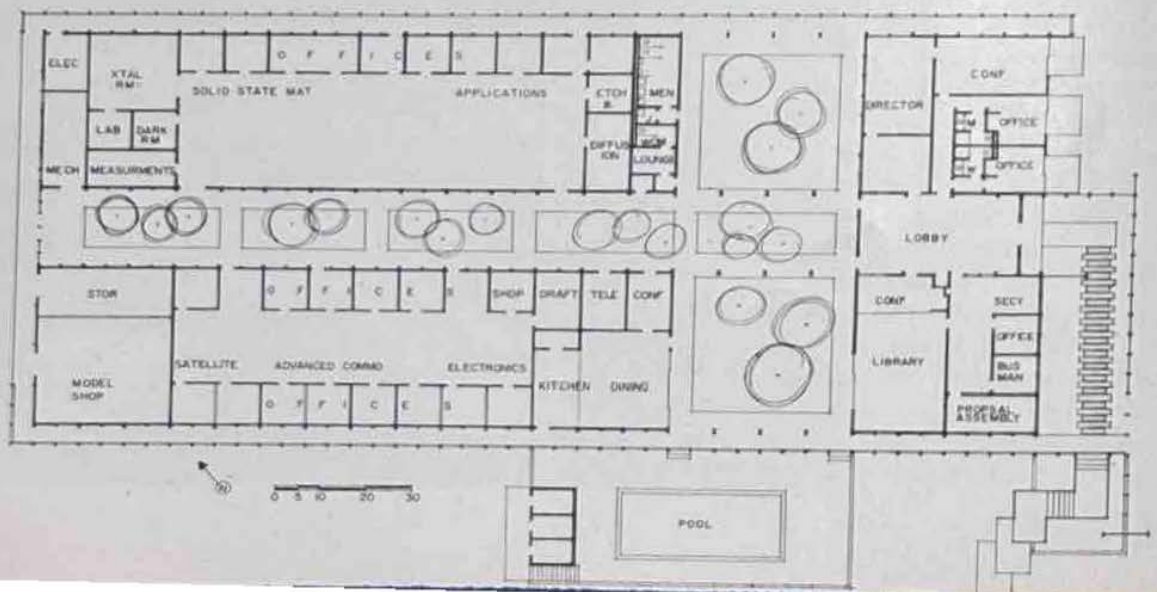
Hilltop retreat for the research scientists

ORDINARILY research scientists are housed in rather cold, stark, utilitarian structures where they ply their trade supposedly oblivious to their surroundings. Departing from this precedent, the architects have utilized the advantages of a hilltop site with its privacy and view to create a working environment that has both beauty and efficiency.

Three buildings covered by a single gently pitched roof and joined by landscaped courts form a U-shaped complex, slightly elevated from the ground. Offices for the staff of 50 scientists and engineers are all on the outer side of the two parallel buildings, oriented to capture a view of the city below or the Santa Ynez Mountains to the northeast. Laboratory space adjoining each office opens onto a central landscaped patio, making the outdoors an integral part of the complex. This is further emphasized by eliminating interior corridors. Circulation is by means of covered walkways on both sides of the buildings.

Laminated wood provides the principal decorative interest inside and out, framing the panels of glass and plaster that form the exterior of the buildings and composing the exposed beams extending beyond the eaves.

Structure forming the base of the U contains the entrance lobby, research library and visiting director's suite. The research center, for Hoffman Electronics Corp., is planned for expansion in increments to accommodate up to 400 personnel.



Hoffman Science Center
Santa Barbara, California

•

WILLIAM L. PEREIRA & ASSOCIATES
Planners-Architects

WOODWARD TOM
Structural Engineer

KENNETH C. URTON
General Contractor



RAISED SWIMMING POOL on south side of building is for use of staff and their families.

Julius Shulman photos



LANDSCAPED COURTYARD between building elements obviates need for interior corridor space and provides view from lobby and laboratories. Carefully detailed laminated wood, exposed beams and framed panels of glass distinguish interiors.



OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete footings; frame: 6x12 wood columns 10 ft. o.c.; roof: glued laminated beams with 3x6 t&g sheathing—Timber Structures, Inc.; floors: reinforced concrete.

Exterior Finish: stained exposed beams and columns; painted plaster panels.

Roof Surfacing: built-up three-ply fiberglass, asphalt and crushed rock.

Windows: fixed ¼-in. plate glass in wood stops—Libbey-Owens-Ford Glass Co.

Doors: painted wood solid core.

Floor Surfacing: linoleum—Armstrong Cork Co.; asphalt tile in laboratory areas; Mastic Tile Corp. of America; ceramic tile in toilets—Mosaic Tile Co.; carpeting in executive offices.

Insulation: aluminum foil blanket—(Alfol) Reflectal Corp.

Interior Finish: painted plaster.

Ceilings: demountable system—(Olympic); acoustical units—Johns-Manville Corp.; fiberglass — Owens-Corning Fiberglas Corp.

Lighting Fixtures: recessed fluorescent—Globe Illumination Co.

Heating and Air Conditioning: hot and cold water system; boiler—Rite Engineering & Mfg. Co.; refrigeration equipment—Trane Co.; cooling tower—Marley Co., Inc.; air handling units—Recold Corp.

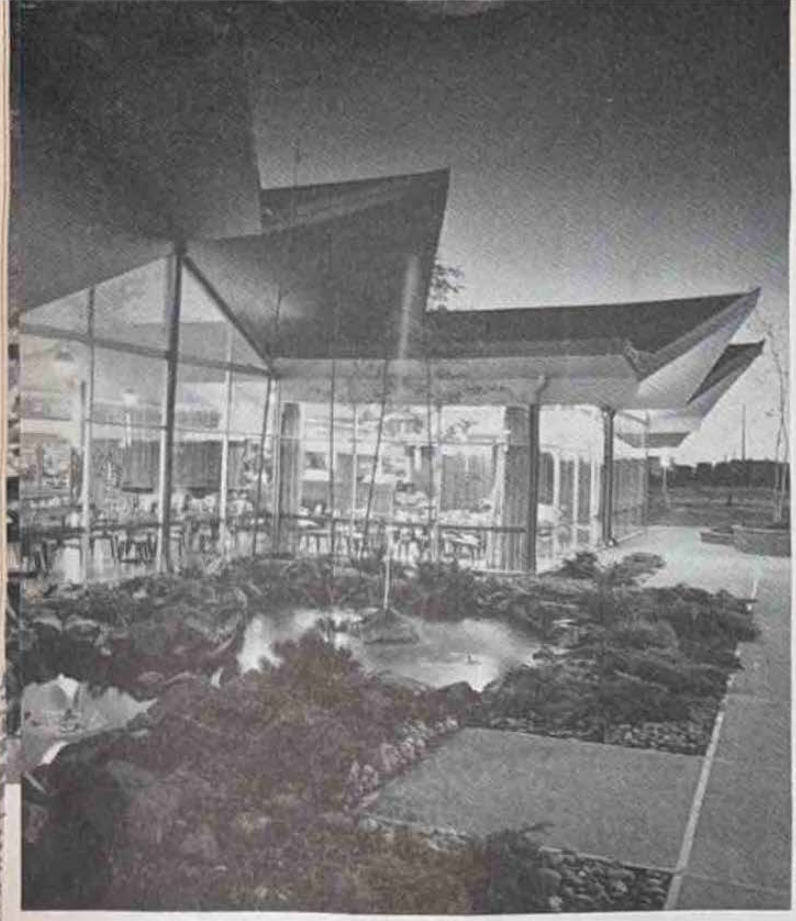
Plumbing Fixtures: American-Standard.

Total Area: 15,200 sq. ft. (exclusive of covered areas).

Total Cost: $350,000.

Cost per Square Foot: $23.

Date of Completion: December 1960.



Art Hupy photos

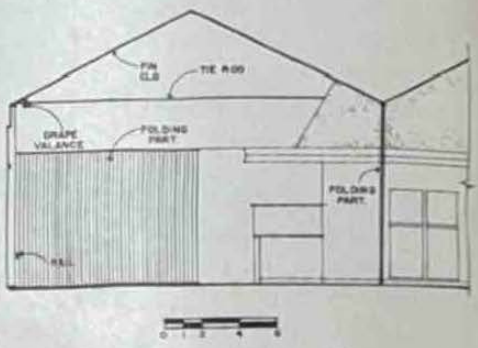
RESTAURANT seats five at lunch counter and 50 at tables which look out on fountain and pool of landscaped court. Additional tables are moved into portion of concourse during extra busy periods. Adjacent tavern lounge accommodates 30.

Bowlero Lanes
Tacoma, Washington

MARSHALL W. PERROW
Architect

HARRY POWELL & ASSOCIATES
Structural Engineers

JOHN PURVIS
General Contractor



RESTAURANT SECTION

SIGN PYLON supports folded plate canopy at front entrance.



An acoustical and lighting paradise for bowlers

FOLDED PLATE ROOF, large glass areas and effective landscaping all are designed to provide a richer and more colorful atmosphere than usually associated with bowling alleys and to match the owner's request that the building should not look like a typical establishment housing this sport.

Structure is located on the outskirts of the city, surrounded in general by middle income families and near a suburban shopping district. While the majority of bowlers have been men, there has been a recent upsurge of interest by women; hence the definite effort in design and decor to appeal to the distaff side.

Main roof spans from the rear of the concourse over the lanes to the back of the building without any posts,

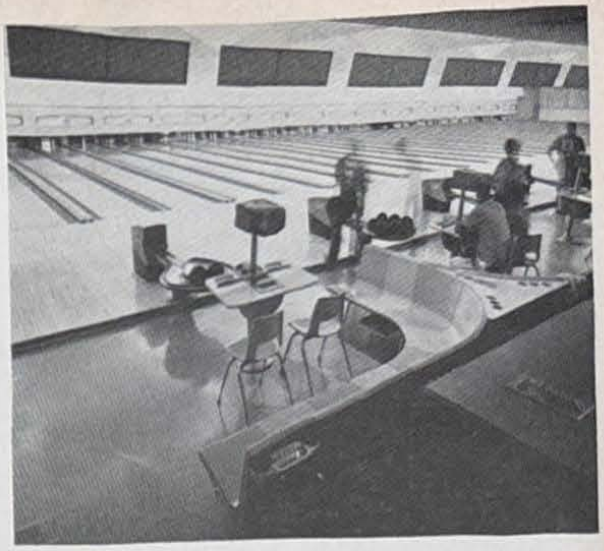
creating a light and airy feeling. The X-framing was selected as a means of providing an interesting ceiling. It also accommodates utilities in the voids of the unexposed area. This roof line is repeated at a lower level on the front of the structure by employing folded plywood plates of 1/2-in. plywood.

Use of the V-ceiling has exceeded expectations, both from an acoustical and a lighting standpoint. Sound reflection off the fiberglass is reduced to an unusually low amount, partially because of the angle surface and also because the amount of sound-absorption ceiling is considerably increased by use of the V-sections. Diamond shaped fiberglass baffles housing the lighting act as an additional sound reflector and absorbent. Even with all 32 lanes in operation and the house completely full for team play, the noise level is so low that an ordinary conversation can be carried on at the concourse without difficulty.

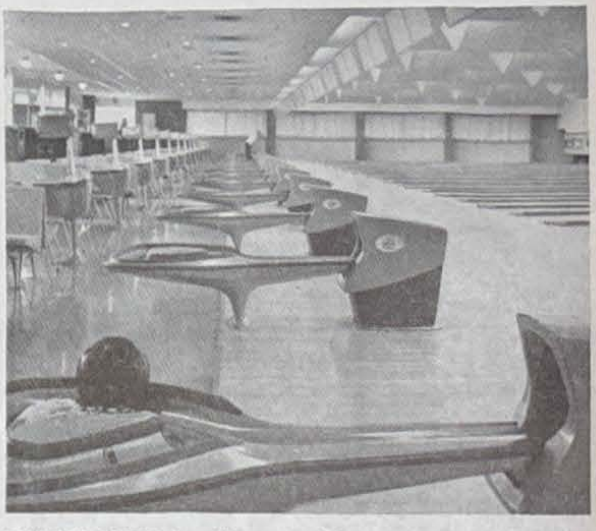
Reflected light spread from the strip fixtures mounted on the back face of the diamond baffles gives a glare-free floor and a high level of illumination throughout the entire lane area with a maximum variance of 4-ft. candles in a diagonal reading across the entire floor. Due to the shape of the ceiling, there is no side glare to distract the bowler on the approaches.

Trusses of the main roof are of steel, with all framing supports throughout the building either steel or masonry.

In addition to the bowling lanes, the project includes a sport shop and restaurant space, offices, storage, locker rooms and child playrooms. Mechanical equipment for the entire structure is a heat pump installation of the air-to-air type for both heating and cooling. Mechanical engineer was Hugh C. Miller.



SIMPLE LINES of Brunswick equipment blend with column-free area to create open feeling for bowlers.



DIAMOND BAFFLES in ceiling conceal lighting, act as sound barrier and produce interesting visual pattern.

OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete; frame and roof: lightweight steel trusses with X-framing between; walls: concrete block at rear; angle brick on sides—Builders Brick Co.; floors: concrete slab.

Exterior Finish: exposed concrete and brick; insulated asbestos panels set into steel frame with aluminum sections—Kawneer Co.

Roof Surfacing: ½-in. plywood sheathing; fiberglass built - up — (GlasGuard) Owens - Corning Fiberglas Corp.; light gray mineral surfacing on west slopes, blue-black on east.

Windows: aluminum — W. P. Fuller Co.; sections—Kawneer Co.

Doors: aluminum exterior—Kawneer Co.

Floor Surfacing: vinyl asbestos tile—(Tile-Tex) Pioneer-Flintkote.

Insulation: blanket type between roof framing—Johns-Manville Corp.; acoustical—1-in. fiberglass textured ceiling board—Owens-Corning Fiberglas Corp.

Interior Finish: exposed masonry; wood paneling.

Ceilings: acoustical tile — (Stria) Owens-Corning Fiberglas Corp.

Lighting Fixtures: plastic cone pendant—Sven Wolarth.

Heating: air-to-air heat pumps —Carrier Corp.

Plumbing: Crane Co., American-Standard.

Special Equipment: automatic pin spotters and furniture—Brunswick - Balke - Collender Co.

Total Area: 27,000 sq. ft.

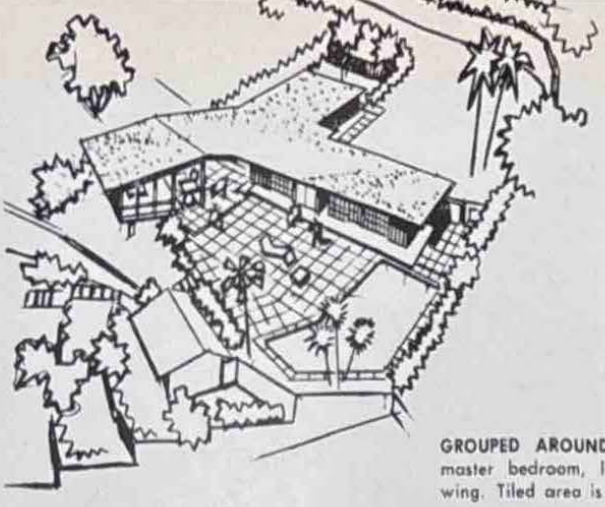
Total Cost: $256,000 (including all items such as draperies, landscaping, floodlighting, etc., but not bowling lanes, pin spotters or movable restaurant equipment).

Cost per Square Foot: $9.50.

Date of Completion: March 1960.



FREE-STANDING LOCKERS are between men's and women's lounges.



John T. Jacobsen Residence
Honolulu, Hawaii

JOHN T. JACOBSEN
Architect-Builder

GROUPED AROUND PATIO, starting at left: master bedroom, living room and bedroom wing. Tiled area is shower (see photo below).

Hillside house reflects owner's love of the tropics

Beatrice M. Howell photos



MAXIMUM PRIVACY and maximum outdoor living are always compatible aims. Here the architect has solved the problem for his own four-bedroom house on a hillside site by designing the living quarters on a 180-deg. T-shaped plan, with the lanai facing the sea and lava rock walls turned to the street and the slope. The solution takes full advantage of the previously landscaped 10,000-sq. ft. lot, a tropical garden and a magnificient view of the Pacific Ocean.

View from every room looks out onto Waikiki and the ocean through a shade growth of papaya, palm leaves and bright red African tulip trees in the garden below. While family members spend most of their time in the open, there is ample room for privacy and study for the children (two daughters) or guests in one of the three bedrooms adjoining the raised walk overlooking the patio and pool.

House is built upon raised redwood beam flooring, sealed and varnished in the wood's natural color, with the structural also serving as the finished flooring. Interior concrete walls allow the lava rock to be seen, creating an interesting pattern on bedroom walls.

Throughout the house a simple, yet effective design has been achieved by the use of exposed, crossing redwood joists with prefinished white fiberboard ceilings. Shoji doors enclosing bedrooms and a shower off the main patio carry out this theme. These doors serve to insulate the rooms against afternoon sun, heat and glare while allowing light to penetrate.

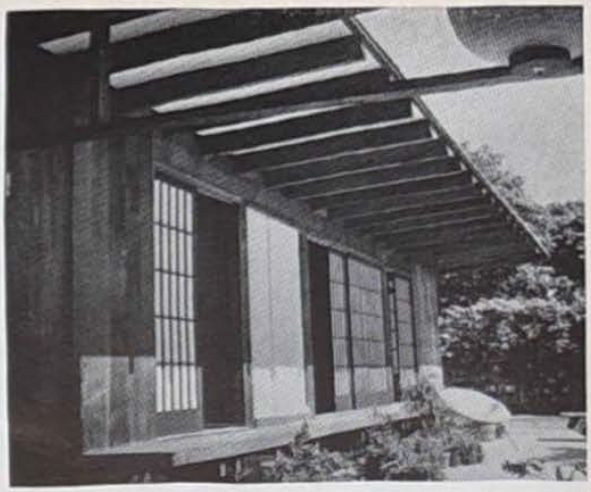
Master bedroom, to the left of the central living area, is glassed in on its exposed western side, leaving the lanai side open. Sail curtains may be drawn for privacy and temporary 1/2-in. plywood panels in various colors are hooked in to cover the exposed portion during the rainy season.

Front door consists of 1x2 redwood vertical wooden louvers facing a hallway, which leads to the open living-dining area, providing ventilation with privacy.

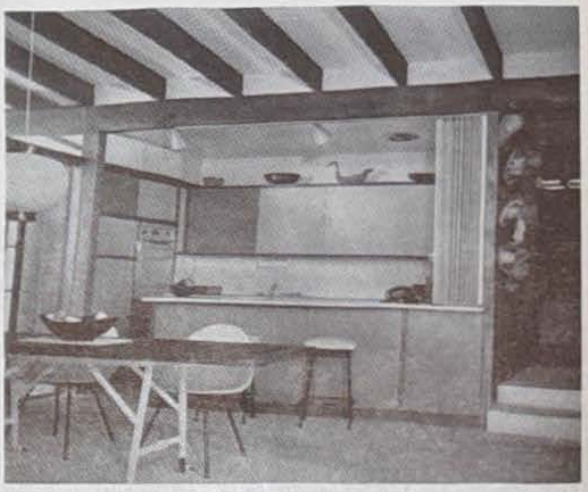
Color has been used extensively in the kitchen. Appliances are in blue-green; cupboards of ventilating pegboard are painted charcoal, red, blue and yellow. Countertops are white plastic.

Roof is tar and gravel with a white crushed coral cover. Floors are white cement with coral stone aggregate troweled into a pattern of rectangles and fish pressed into the cement in the living room-kitchen.

Below the master bedroom stone steps lead to an orchid greenhouse and four descending terraces with old Hawaiian rock walls. Swimming pool off the patio is gunite with a stone rim, easily accessible from bedrooms and shower.



SHOJI DOORS open bedrooms (two daughters and guests) to western exposure and Pacific Ocean.



MAID'S QUARTERS and ample storage in hall wall closets are behind work space. Shoji screens to left of dining area open to barbecue area when it is desired to keep smoke and charcoal out of patio.

OUTLINE SPECIFICATIONS

Structure: foundation: concrete footings; frame: redwood post and beam; floors: concrete slab.

Exterior Finish: rough sawn t&g redwood siding; lava rock.

Roof Surfacing: four-ply with crushed coral surfacing.

Windows: fixed glass.

Doors: redwood louvers at entrance; redwood shoji; old ship door in bathroom.

Floor Surfacing: white cement with crushed coral fish pattern impressed by architect in living-dining-kitchen; sealed and varnished 2x6 t&g redwood in bedrooms; koa in master bedroom.

Interior Finish: natural redwood; lava rock in bedroom wing.

Ceilings: 1½-in. cane fiberboard—(Canec Ceil-Deck) Pioneer-Flintkote.

Lighting Fixtures: Japanese lanterns; bullet spots; fluorescent in bathroom.

Plumbing Fixtures: Crane Co.

Kitchen Appliances: blue-green wall oven, countertop range, refrigerator, dishwasher, disposal—General Electric Corp.

Total Area: 1,000 sq. ft.

Total Cost: $14,000.

Date of Completion: December 1958.



PAN-AMERICAN FREEWAY'S PEDESTRIAN BRIDGE: A STEP IN THE RIGHT DIRECTION

Bridges, approaches and similar structures which serve the ever-stretching freeway systems in the West, generally speaking, have less to offer esthetically than the concrete ribbons themselves. But once in a while a state highway department decides that its citizens deserve something better. A case in point: the Pan-American Freeway pedestrian bridge near Albuquerque's Lincoln Junior High School. First of its kind to be build in New Mexico, the 1.2-mile, $1,855,000 project is of concrete slab construction on steel stringers. Designers: consulting engineers Gordon Herkenhoff & Associates; general contractor: J. W. Jones Construction Co.; project engineer: W. E. Brown.





BRILLIANT TILES, each no larger than postage stamp, make up 1,200-lb. panels which are lifted by moving derrick mounted to continuous monorail near roof. They are welded from inside steel framework without need for exterior scaffolding of any kind.

Photos: Gordon Sommers (top), Rothschild (right), Able (below).

Blue tile coat is tailored for the job

Sheathed in a curtain wall of intense blue Italian mosaic tile and ribbed at intervals with full-height aluminum fins, the 22-story Wilshire-Flower Building is a commanding structure on the Los Angeles skyline. It also represents an ingenious solution to the problem of economically placing some 80,000 sq. ft. of ¾-in. square tiles.

To overcome what would have been prohibitive costs in skilled labor and scaffolding, architects Victor Gruen Associates and Daniel, Mann, Johnson & Mendenhall devised a production line technique to manufacture tile faced panels on the ground, hoist them in place and weld them to the structure from the inside.

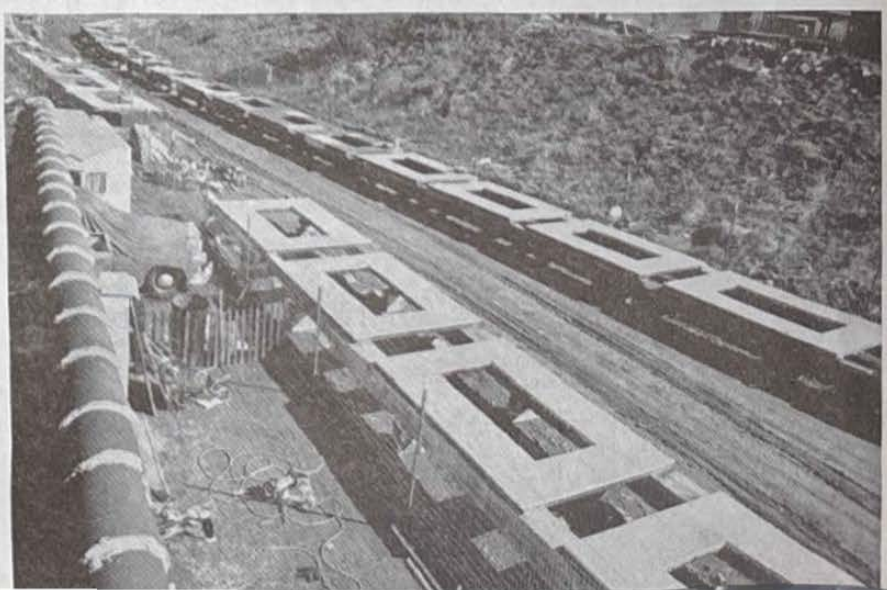
Panels were manufactured entirely in the open on a suburban industrial lot in Alhambra by Lavenberg Co. Ordinary tools and material were used. Each panel was rimmed with a 4-in. steel channel and contained a 3x5-ft. opening for an aluminum framed window assembly. Paper-backed wire mesh was attached to the frames and a plaster scratch coat was applied as the frames lay flat.

After the brown coat, a setting bed of U.S. Rubber Laticrete was applied. Paper-backed tile sheets were then laid on. After the tiles became fully bonded to the panel, wet cloths were laid over the paper backing to soak until the paper could be easily removed. Grouting was then rubbed into the tile joints and the panel, now weighing 1,200 lb., was stacked ready for shipment to the building site.

Three months were required to complete fabrication of the 1,180 panels. A continuous monorail at the 10th floor was installed to carry the hoisting mechanism. Panels were lifted into place and welded to the framework. When the entire curtain wall reached the 10th floor, the lifting equipment was reinstalled at the top floor to complete erection of the panels.

When all panels were in place,

PRODUCTION LINE METHODS are employed in manufacturing tile covered wall panels in open suburban industrial lot. No special shelter is required; ordinary tools and materials are used.



aluminum window assemblies were installed and glazed, the aluminum ribs were applied over the vertical joints, the horizontal joints were calked and the interior surfaces were plastered smooth. Panels are isolated by mastic joints which allow lateral movement of structural framing caused by wind and seismic forces.

Basic building plan utilizes a central service core with all office space located at the perimeter walls. It was constructed for Tishman Realty and Construction Co., Inc., which served as its own general contractor.

Two basements below ground level provide space for tenant storage, service and mechanical equipment rooms. One of the two air conditioning units is here, while a second is housed at roof level. At the street floor the perimeter walls of glass are accented with marble, travertine and granite. At the 20th floor executive office suites open onto a 12-ft. wide terrace which surrounds the entire building.

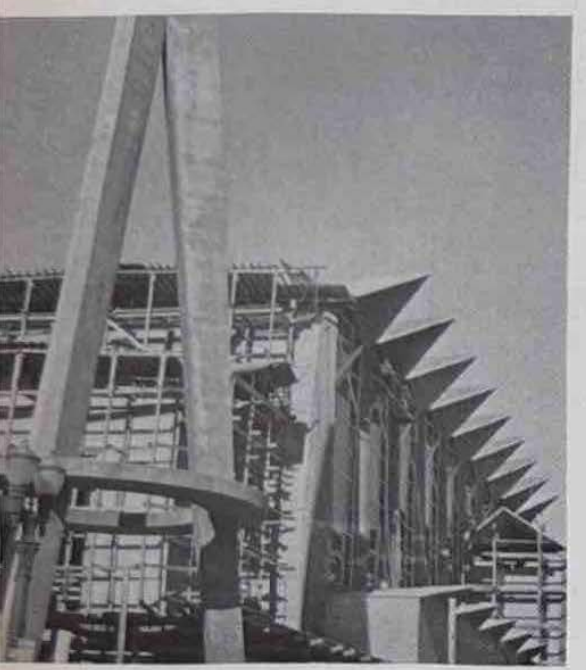
Framing is steel. Alternate column axes are rotated 90 deg. to provide resistance to lateral loads in both directions. Cost was $15 million. Ralph E. Phillips, Inc., served as mechanical and electrical engineer.



FOLDED PLATES of gunited prestressed concrete roof 1,300-seat sanctuary and adjoining chapel.

Today's materials, techniques express early symbolism

Structure and design of First Methodist Church at Glendale, Calif., is as contemporary as the materials and methods used in its construction while at the same time retaining some of the traditional symbolism of early glass and stone churches.



THIN SHELL CONCRETE is adequately cured, then prestressed before removing forms.

Much of the interest results from the particular form given to the prestressed columns and roof panels. Concrete columns, 68 ft. high, were fabricated of colored concrete. Each of the major columns weighs about 25 tons. After curing and prestressing on the ground, the columns were set in prepared footings, grouted in place and guyed with steel cables.

Roof panels of thin shell folded plate design were grouted in place over a form lining of Conwood acoustical material and Mo-Sai with exposed glass aggregate. These materials were exposed in alternating panels on the finished ceiling after forms were removed. After the thin shell concrete was adequately cured, it was prestressed before removing the forms.

Architectural firm was Flewelling & Moody; structural engineer, Carl B. Johnson; and general contractor, Steed Bros. Construction Co. Serving as consultant on the roof design and prestressed columns was T. Y. Lin. Cost was $850,000.

Architect explains absence of sprinkler systems

Fire experts from across the land who gathered in Detroit in May learned first hand from an architect why he does not design sprinkler systems into his buildings.

Alternately scolding and prescribing, William A. Halsey of Bastille Halsey Associates of Boston cited his own experiences during the 65th annual conference of the National Fire Protection Association when he declared: "I agree with you 100% about installing fire protective devices, particularly sprinkler systems, but if you examine my buildings, you will not find them."

The why-not involved the type of sprinkler systems the fire insurance engineers seem to be satisfied with, the fixed habits of subcontractors and the lack of interest in "selling" their program on the part of the fire protection people.

"Never have I had a fire protection engineer come into my office to explain or to sell, if you wish to use the word, his services for a project," Halsey said. "Never have I had in my office anyone who did more than lay out a sprinkler system. Never have I had a man who could integrate and define the advantages of fire protective construction details, of hose cabinets, fire extinguishers, building materials."

Still on sprinklers, the architect explained how fire protection authorities failed to realize in actual practice that:

1. Sprinkler systems esthetically speaking are "the most gosh-awful looking things" in a building, what with exposed piping, dirt-collecting heads, heads positioned so as to make proper lighting impossible and colored so as to clash with color schemes.

2. Even when the architect attempts to conceal these sights, subcontractors working on close margins, arrive on the job with precut pipes, prelabeled fittings. The result: a foulup!

3. Fire protection engineers often are unavailable or the design job falls to someone in the plumbing department of a mechanical contractor who, working with NFPA Standard No. 13, turns out overdone designs or underdone drawings. Result: more confusion, minimum standards.

In one case of unhappy memory, Halsey told the conference, his firm had run into an eight-month delay because a subcontractor had failed to do the sprinkler installation along the lines of revisions made in the original plans.

The contractor's argument: His original specifications had been approved by insurance authorities and

the architects had no right to change them. Halsey countered: If new authorization from insurance authorities was necessary, it should and could have been obtained. Result in this case: extra expense to his clients and bad feeling all around.

"It is this kind of field experience—and it happens again and again—that makes us think twice about the use of sprinklers," Halsey declared.

His program for improved understanding and cooperation between the fire protection field and architects:

1. The NFPA ought to do much more in the way of recognizing, awarding and designating fire protection consulting engineers — and then give more publicity to their names and the "tremendously helpful work they perform."

2. The NFPA, which after all is dedicated to democratic and practical compromise, should, with a panel of architects, settle upon better designs and methods of sprinkler installation for "a more esthetic harmony."

3. Lectures by top authorities in the fire protection field should be carefully prepared and presented to architectural students, outlining various aspects and principles of fire protection. This would ensure greater understanding and application of these very necessary principles later.

Liquid spray foam tested for home insulation

Insulation installation time was cut in half for a Boulder, Colo., brick veneer ranch home by using a new liquid spray urethane foam. The test demonstration indicated that an average three-bedroom home could be completely insulated in about 5½ hours, half the time needed for methods using batting cut to size and stapled between wall uprights or studding.

Sprayed as a liquid the consistency of heavy syrup, the urethane foams within two seconds to 30 times its original volume. Spraying was done with a high speed nozzle, paint type gun with two liquid components, a polyether resin and a semi-prepolymer, mixed in the gun under pressure. In this test application the foam was sprayed to an average thickness of 1¼ in. in standard wall studding sections of 10 sq. ft. at a rate of one panel in 40 seconds.

Foam has a K-factor of .15 at 75 deg. Once set, it is permanently bonded in place, will not shrink, mold or deteriorate. It can be cut or sawed if additional wall openings are needed.

Foam used for the Boulder house was StaFoam manufactured by American Latex Products Corp.



FIFTY-EIGHT TONS of mechanical cooling serve 17 classrooms and library-multipurpose room at left.

Individual heat pumps installed in Oregon school

Air-to-air heat pump installation at the William Walker Elementary School in Beaverton, Ore., is believed to be one of the first in the West. The combination heating, air conditioning and ventilating system, called Lennox Comfort Curtain, provides a full perimeter air discharge along the entire length of the outer walls, in this case through bookshelf ducts and from individual three-ton units placed in each of the 13 classrooms and four special rooms. In all there is a total of 58 tons of mechanical cooling.

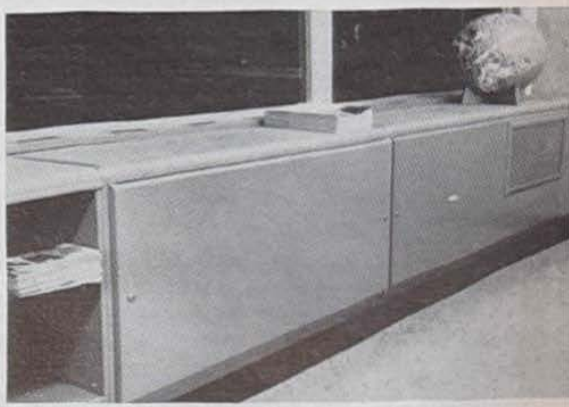
Each classroom has an air processing unit and a heat pump cabinet complete with coil. Individual heating, ventilation and cooling control is provided with a day-night wall type thermostat. The heat pump outdoor units are located in equipment rooms situated adjacent to the classrooms. Heavy-gage wire mesh doors enclose these units and allow ample outdoor air for the coil for both heating and cooling cycles.

System is virtually a modular setup which can be expanded easily as classrooms are added without future needs having to be included in the initial mechanical investment. Cost of the installation at William Walker was $2.40 psf. Heat pump unit is supplemented by 244,000 Btu. of electrical resistance.

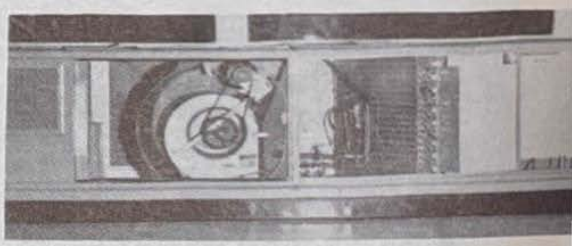
School has planned pupil capacity of 390. Exterior is frame; floors, asphalt tile over concrete; walls, plaster; corridor walls, plastered with vinyl covering; and lighting, eggcrate fluorescents. Total area, including library and multipurpose room, is 33,280 sq. ft.

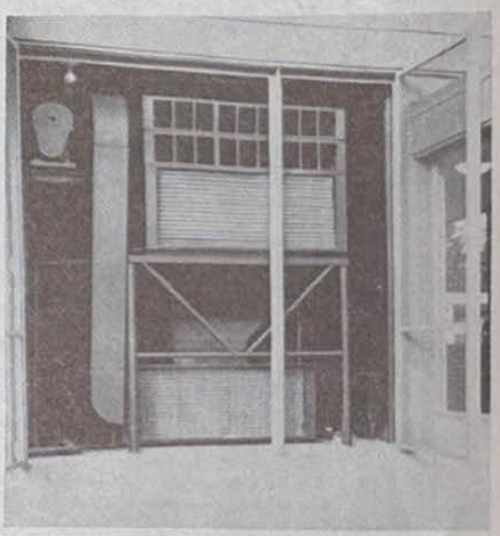
Architect for the school was James C. Gardiner; engineer, Omer T. Jacobson; general contractor, Earl R. Enger. Sunset Valley Plumbing and Heating Co. installed the heat pump, a product of Lennox Industries, Inc.

Other installations are found in Circle School, Circle, Mont.; St. Timothy Elementary School, West Los Angeles; Christian Education School, Federated Community Church, Flagstaff, Ariz.



BOOKSHELF DUCT, with doors removed below, handles air distribution within classrooms.





EQUIPMENT ROOM showing two HP2-303 units stacked with outdoor coil discharge from lower unit ducted up and discharged from standard hood. Fan and duct at left deliver exhaust air from halls and toilets to be discharged in front of outdoor coil, producing increased efficiency in heating cycle.

silicone rubber sealant

A one-part building sealant requiring no catalyst or premixing and resistant to extreme heat and cold comes ready to use, without heating or refrigeration, in polyethylene cartridges for standard air or hand-operated guns. Called Dow Corning 780, it cures to a dry, tack-free surface in less than one hour after exposure to moisture in the air, is nonstaining and will adhere to any surface except polyethylene. After curing, it maintains good flexibility and adhesion from -80 to 350 deg. Although relatively high priced, the company says the additional cost is more than made up through reduced application and maintenance costs and longer service.—Dow Corning Corp., Midland, Mich. (No. 1)

safety glass sliding door

Virginia Glass Products has added a ⅜-in. thick door to its line of frameless all-glass sliding doors made of a heat-tempered polished plate glass said to have many times the impact resistance of ordinary glass. Under extreme localized impact, Tempar-Glas crumbles into small, relatively harmless particles instead of jagged pieces. The new door is available in all standard opening sizes of fixed and sliding panels, as well as custom panels. Wheels and jambs are adjustable; weatherstripping seals the aluminum head and bottom rails and jambs. Firm also offers two thicker doors of Tempar-Glas. — Virginia Glass Products Corp., Martinsville, Va. (No. 2)

monkeypod paneling

First successful fabrication of laminated monkeypod paneling is ready for marketing on the West Coast via a Hawaiian firm and through a Portland distributorship. The tropical hardwood will be offered in 10 patterns in sheets of ¼- and ¾-in. thickness in full-length matches and mismatched patterns. Manufacturer is



making no attempt to reach the mass market, but intends to promote the paneling as a more exclusive item for residential and commercial construction. Price is said to be under comparable teak and walnut products. —Lane Paskill Corp., Box 2144, Portland, Ore. (No. 3)

exterior siding

Deep shadow line, extra wide exposure up to 11 in., dent resistance and good weatherability are some of the features of Masonite X, an exterior siding made from a new fiber formula which the manufacturer calls X-90. Uniform thickness and identical edges reduce waste and makes special cuts easier. Faces and edges are factory primed and backs are sealed. Guidelines at each edge aid alignment.—Masonite Corp., 111 W. Washington St., Chicago 2, Ill. (No. 4)

companion ceiling-floor

Decorator ceiling panels designed to complement a companion series of floor tile offer a single theme treatment for interiors and open up interesting architectural possibilities for both home and office construction. Featuring patterns by interior designer Michael Greer, the ceiling is acoustical panel; the floor is Terraflex vinyl asbestos tile. First in the series includes Bamboo Trellis (shown here) with a floor design called Bamboo Leaves, Floral Tracery, more formal Medallion and a geometric pattern known as Architectural. All are in color with the exception of the last named.—Johns-Manville Corp., 22 E. 40th St., New York 16, N.Y. (No. 5)



architectural planters

La Gardo Tackett's simply designed group of cylinders, which may be used singly or in proportioned arrangements for outdoor gardens, is the newest addition to the high-fired stoneware produced by Architectural Pottery. A variety of sizes can accommodate anything from a small delicate flowering plant to a tree. Treated to retain the original off-white color but sufficiently porous for plant health, they are available with tobacco brown-stained redwood bases which subtly suspend the bowls above ground or solid floor surfaces.—Architectural Pottery, 2020 S. Robertson Blvd., Los Angeles 34, Calif. (No. 6)





Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

JULY 1961
(After August 31 write directly to manufacturer)

1 2 3 4 5 6 7
8 9 10 11

Name

Title

Firm

Address

City Zone State

shower valve

Since its introduction in the West two years ago, the Tempera valve (originally known as Tempo) has been perfected to maintain constant water temperature control for showers and other outlets to within 1 deg., according to tests by the Western Plumbing Officials Association. The valve has an overall length of 3⅞ in. and an overall height of 3⅛ in. It is composed of only four parts: bronze body, perforated sleeve, hex body nut and perforated piston, the latter being the only moving part. Called "the most economical anti-scald shower valve on the market today," the valve is maintenance free and self-flushing, thus eliminating use of access plates in its installation.—Tempera Corp., 4035 N. Interstate Ave., Portland 17, Ore. **(No. 7)**

patterned ceiling

Kolordot squares lock into place in the Gratelite ceiling or other fixtures to produce decorative mosaic patterns or form directional signals. Squares grip securely and cannot be dislodged by normal maintenance or washing. —Edwin F. Guth Co., Box 7079, St. Louis 77, Mo. **(No. 8)**

double-hung window

For apartments, office buildings and institutions, a double-hung aluminum window is easily installed in single or multiple units and adaptable to curtain wall systems. Designated Series A730 it is offered with conventional spiral balance or overhead spring balance and accommodates both conventional and double-glazed units. Window is double-weatherstripped with wool pile.—Albro Metal Products Corp., 944 Longfellow Ave., New York, N.Y. **(No. 9)**

square fluorescent lamp

A thin, square panel fluorescent lamp under development by General Electric the past three years is now ready for marketing. Although stock fixtures for the lamps are not available as yet, the company expects that manufacturers will be ready with matching lines by fall. Small in size with high light output, the lamp can be used singly or in groups, lending itself to built-in, surface mounted, suspended and free-standing applications. It is 1½ in. deep and designed to fit a module 12 in. square. Face plate has a waffle-pattern configuration with 1¾ in. squares. These should facilitate use of the lamp in fixtures with louvers of an identical grid spacing. Bi-pin terminals for electrical connection are positioned behind an outer rim at adjacent corners and are entirely within the overall depth and other dimensions of the panel, simplifying application of the lamp to fixtures of various designs. Terminal arrangement also permits use of push-pull connectors. Lamp will come in two types. One will emit light in equal amounts from the front and back. The other will have a reflective coating on the back side to direct most of the light from the front.—General Electric Co., Nela Park, Cleveland 12, Ohio. **(No. 10)**

telescopic ceiling grinder

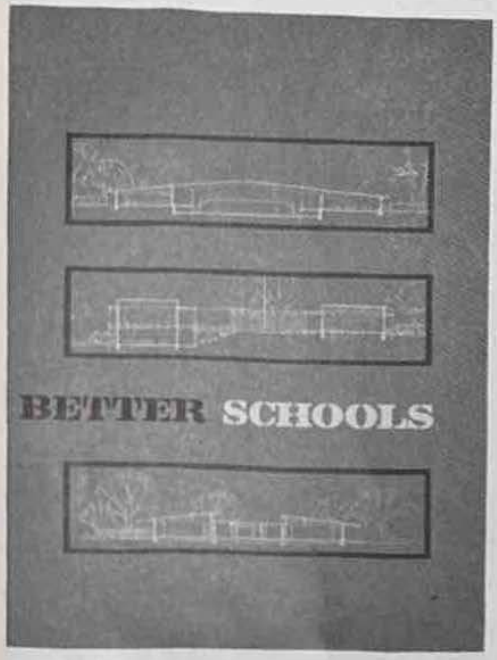
To help contractors match the growing demand for smooth-finished concrete ceilings, Stow is marketing a tool that grinds off the fins and smooths down ceilings of any height from 9 ft. 2 in. to 18 ft. The grinder eliminates need for scaffolding and hand grinding. The CG-18 has a double telescopic arrangement easily adjusted to the exact height desired. Powered by a 1-hp. motor, it has been tested to produce finish speeds up to 500 sq. ft. per hour.—Stow Manufacturing Co., 116 Shear St. Binghamton, N.Y. **(No. 11)**



Here is *your* source for drinking facilities that truly do credit to your finest plans! Complete details on fountains, coolers, emergency facilities, too. And it's yours for the asking!

Since 1909 HAWS

HAWS DRINKING FAUCET COMPANY / 1443 FOURTH STREET / BERKELEY 10, CALIFORNIA



pa&b pick of the month

As part of an ambitious program to stimulate the interest of architects and school planners in the use of lumber and wood products for educational buildings, the NLMA retained an eastern firm to study the environmental benefits resulting from the intelligent use of these materials. The resulting three basic designs—compact, hillside and pavilion—are comprehensively presented in a 22-page (15x19-in. format) booklet entitled "Blueprint for Better Schools." Each is complete with plans, structural systems and details. In addition, there are photographs of wood in actual use outside and in, including cabinetry, built-ins and furniture.—National Lumber Manufacturers Association, 1319 18th St. N.W., Washington 6, D.C.

Marlite Plastic-Finished Wall and Ceiling Paneling (AIA 23-L): depicts installations in color, catalogs line; 8 pp. — Marsh Wall Products, Inc., Dover, Ohio.

Recommended Floor Finishes: presents revised list of laboratory tested and approved finishes for hardwood floors. — Maple Flooring Manufacturers Association, 35 E. Wacker Drive, Chicago 1, Ill.

Home Ventilation Guide (AID 30-D-1): describes new rating system for fans and gives general information on types of fans and best placement; 12 pp.—Home Ventilating Institute, 1108 Standard Bldg., Cleveland 13, Ohio.

Movable Interior Walls (AIA 35-H-6): introduces new Signature and Delineator wall systems with comprehensive information, specifications, suggested applications and detail drawings; two publications, 32 pp. and 16 pp.—The E. F. Hauserman Co., 5711 Grant Ave., Cleveland 5, Ohio.

Structural Insulating Roof Deck: offers recommended product and application specifications as approved by member companies; 11 mimeographed sheets.—Insulation Board Institute, 111 W. Washington St., Chicago 2, Ill.

Performance of Lath and Plaster (AIA 12-A-2): reports on seven-year research project on suspended ceilings with construction recommendations; 8 pp.—Gypsum Association, 201 N. Wells St., Chicago 6, Ill.

Ceco Hollow Metal Doors (AIA 16-A): describes package unit (doors, frames and hardware); presents entire line; catalog 2040-I; 32 pp.—Ceco Steel Products Corp., 5601 W. 26th St., Chicago 50, Ill.

Sliding Glass Doors: outlines complete line with detailed drawings. 8 pp.—Ador Corp., 2345 W. Commonwealth Ave., Fullerton, Calif.

Your Guide to the Latest in Recessed Lighting: catalogs line of recessed troffers with detailed mounting information, photometric data and coefficients of utilization charts; 36 pp.—Smoot-Holman Co., Box 4097, Inglewood, Calif.

Dur-O-waL: reports on "Investigation of Continuous Metal Ties as a Replacement for Brick Ties in Masonry Walls" by Armour Research Foundation Institute of Technology; 44 pp.—Dur-O-waL Division, Cedar Rapid Block Co., Cedar Rapids, Iowa.

White Concrete in Architecture (AI 4-K-1): handsomely illustrates variety of design ideas utilizing precas concrete with brief design data o each building; 32 pp.—Universal At las Cement Division, United State Steel Corp., 100 Park Ave., New York 17, N. Y.

Skyway Series (AIA 31-F-2): catalog and gives technical data on recessed fluorescent lighting fixtures and dif fusing elements designed for large area lighting; brochure B-1; 40 pp.— Globe Illumination Co., 2121 S. Main St., Los Angeles 7, Calif.

Curtain Wall Index: includes scaled details for nine aluminum and stainless steel wall systems, also for doors louvers and vertically pivoted windows on transparent vellum. — Michaels Art Bronze Co., Box 668 Covington, Ky.

Bank Lighting (AIA 31-F-23): discusses lighting goals and problems, illustrated by actual installations; 4 pp.—Holophane Co., Inc., 342 Madison Ave., New York, N.Y.

Expanded Metals for Architecture: pictures design possibilities with decorative meshes, with product data; 16 pp.—United States Gypsum Co., 300 W. Adams St., Chicago 6, Ill.

Steel Decks, Curtain Walls (AIA 12-C, 17-A, 160): catalogs in five separate publications steel roof deck, Cel-beam sections, long span M-decks, insulated metal curtain walls and rolling steel doors with load tables; totals 80 pp.— The R. C. Mahon Co., Box 4666, Detroit 34, Mich.

OFFICE AID

Architects can design their own vinyl floor coverings with this kit. It has sample bottles containing aggregate or color chips in 35 colors and sheets of matrix or background material in 14 colors for producing patterns in Nafco's 3-D vinyl terrazzo tile. The kit is being offered as part of the company's promotion of a new production system that permits ordering as little as 2,000 sq. ft. of custom-colored tile, considerably below the usual minimum order, at no increase in cost over standard tile of equivalent quality. — National Floor Products Co., Florence, Ala.

FILMS

Modern's Catalog of Free Loan Technical Films. Modern Talking Picture Service, Inc., 3 E. 54th St., New York 22, N.Y.

Lists films being offered in just about every industry. All are 16 mm, sound presentations, from a quarter- to a half-hour in length, and most are in color.

Wasco Pyrodomes in Action. Wasco Products, Inc., Bay State Road, Cambridge 38, Mass. Sound, color, 16mm., 20 min.

Demonstrates a new technique in fire fighting with close-up shots during tests at Factory Mutual Insurance Co. Laboratories, Norwood, Mass.

Making Sound Behave. Barber-Colman Co., Rockford, Ill. Sound, slide, 14 min.

Discusses decible variations and air distribution sounds of different frequencies for architects and engineers, with accompanying illustrated booklet.

The Story Behind a Cal-Wood Door. California Wood Products, Inc., Box 1656, Santa Rosa, Calif. Sound, color, slide, 10 min.

Shows door buyers and specifies some of the things they should look for before ordering, with special emphasis on a newly developed process for the manufacture of prefinished doors.

Blueprint for Better Schools. National Lumber Manufacturers Association, 1319 18th St. N.W., Washington 6, D.C. Sound, color, 16mm, 22 min.

Presents applications of wood in three different sizes and types of junior high schools: compact, hillside and pavilion plans, along with a selection of doors, roofs, windows, siding, paneling, etc., in projects throughout the country. (For accompanying booklet, see "PA&B Pick of the Month.")

Casting and Erecting Concrete Curtain Walls. Portland Cement Association, 35 W. Grand Ave., Chicago 10, Ill. Sound, Color, 16mm, 22 min.

Deals with the numerous methods used to cast and put in place decorative wall panels, covering such topics as rubber and plastic form liners, plaster of paris forms, sandwich panels, grill wall units, sand molds and exposed aggregate techniques.

How to Build New Shapes in Concrete. Portland Cement Association, 33 W. Grand Ave., Chicago 10, Ill. Sound, color, 16mm, 19 min.

Surveys several of the techniques employed in construction of concrete shell roofs and treats the prestressing in shell design, as well as the use of shells in lift slab buildings. Serves as a companion to the earlier "New Shapes in Concrete."



Realock Fence... the symbol of protection

It's recognized as the economical, permanent way to protect all types of properties. Realock Chain Link Fence is widely used for municipal, industrial, residential, right-of-ways and outdoor equipment storage areas. The rugged fabric is made from top-grade steel wire that withstands lots of punishment. And every foot of Realock Fence is galvanized to prevent rust and corrosion.

For a free estimate and complete details about Realock Fence, call the nearest CF&I sales office.



THE COLORADO FUEL AND IRON CORPORATION

Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

8329

TECHNICAL PUBLICATIONS

Plastics as Building Construction Materials. Prepared by Graduates of the Harvard Graduate School of Business Administration. Structural Plastics Associates, Box 13, Belmont 78, Mass. 129 pp. $18.50.

Report presents and analyzes the basic problems which have hindered the widespread acceptance and use of plastics as structural and semistructural materials and proposes several courses of action designed to overcome these problems now and in the future. The nine graduate students drew on the candid views and opinions of more than 300 authorities in the fields of plastics, construction, architecture and design, education and management consulting. A bibliography is included.

Architectural Design Considerations for Language Laboratories. DuKane Corp., St. Charles, Ill. 1960. 10 pp. No charge.

Spells out many of the factors which must be considered to achieve a laboratory capable of optimum educational effectiveness such as lighting, ventilation, acoustical treatment and power requirements—all in a noncommercial approach.

Symposium on Bituminous Waterproofing and Roofing Materials. American Society for Testing Materials, 1916 Race St., Philadelphia 3, Pa. 81 pp. $2.50.

Attempts to inform and stimulate the interest of those concerned with waterproofing and roofing bitumens. Five of the papers are of a general nature, three of specialized experimental or theoretical interest.

Lighting Handbook. Westinghouse Electric Corp., Bloomfield, N.J. 1960. 250 pp. $3.

Revised edition — pocket-sized with wire binding—covers general field of modern lighting practices, the major changes having been made on floodlighting design, roadway and sign lighting.

Design of Welded Structural Connections. By Omer W. Blodgett and Dr. John B. Scalzi. James F. Lincoln Arc Welding Foundation, Cleveland 17, Ohio. 1961. 92 pp. $1.50.

Manual for structural engineers, designers, architects and fabricators; a reference book for students. Wire-bound volume summarizes current practices and gives examples and problems of application but does not discuss theory. It has 124 illustrations.

New Schools for New Education. Educational Facilities Laboratories, Inc., 477 Madison Ave., New York, N.Y. 1961. 56 pp. No charge.

A report on the October 1959 conference of architects and educators held at the University of Michigan. Ten architects present a series of new design proposals for high schools based on the work of Prof. J. Lloyd Trump of the University of Illinois. Among the five presentations shown in this booklet is an adaptation of Mills High School by Reid, Rockwell, Banwell & Tarics of San Francisco.

Engineering Manual on Radiant Heating, Cooling and Acoustic Ceiling. Burgess-Manning Co., Libertyville, Ill. 1961. 200 pp. $25.

Bound in a 10½x11½-in. red loose-leaf binder, additional material will be released at regular intervals to further enhance the value of the manual as a working tool.

Industrial Building, Volume 1. Clapp & Poliak, Inc., 341 Madison Ave., New York 17, N.Y. 1961. 232 pp. $10.

Contains texts of 38 papers presented at last December's Industrial Building Congress in New York, including a number of topics with particular interest for architects, engineers and contractors.

Papers on Building Construction. American Society for Testing Materials, 1916 Race St., Philadelphia 3, Pa. 1961. 117 pp. $3.50.

Twelve authors discuss such subjects as strength of scarf joints in laminated wood beams, testing of diaphragms, wood-pole type buildings, screw-holding ability of western woods and termite control in California residential construction.

Standard Grading Rules. Western Pine Association, 510 Yeon Bldg., Portland 4, Ore. 1961. 244 pp. 50 cents.

Integrates the new framing lumber grades and names adopted a year ago by the grading committee and published at that time as a supplement to the old book.

Strength and Related Properties of Wood Poles. American Society for Testing Materials, 1916 Race St., Philadelphia 3, Pa. 1961. 182 pp. $5.

Explains the many factors involved in the testing of wood poles, with 82 tabels of data plus 31 additional figures and illustrations.

Sound Absorption Coefficients of Architectural Acoustical Materials. Acoustical Materials Association, 335 E. 45th St., New York 17, N.Y. 1960. 54 pp. 50 cents.

Lists all acoustical materials offered by association members, with data provided on noise reduction coefficients, recommended specification range, surface appearance, size, weight, thickness, mounting requirements, flame-resistance and light-reflection qualities.

Structural Aluminum Design. Reyn Metals Co., Richmand 18, Va. 1960. 232 No charge.

Hard cover edition covering calcu tions for load-carrying members aluminum, with tables of properti applications and specifications, maximum allowable stress values, high and low temperature properti etc.

How to Lay out a Parking Lot. Western I dustries, Inc., 2742 W. 36th Place, Chicago Illinois. 1961. 40 pp. Free.

Takes into account the dimensions all 1960 and '61 model cars, includin the compacts which can be place effectively in reserved areas. Detaile sketches and photographs provide variety of plans, with layouts fo parking at 90-, 60-and 45-deg. angles recommended stall dimensions, aisl widths and entrance and exit sizes.

Manual of Standard Practice for Reinforced Concrete Construction. Western Reinforcing Steel Fabricators Association, 1322 Webster St., Oakland 12, Calif. 1960. 86 pp. $5 (some complimentary distribution).

A reference source for the architect, engineer, inspector, detailer and fabricator, this loose-leaf manual proposes certain standards which are practiced by the industry in the western states.

Economic Planning for Better Schools. By Benjamin Handler. College of Architecture and Design, University of Michigan, Ann Arbor, Mich. 1961. 107 pp. $5.

A study on the whole problem of school plant planning, emphasizing how to use available resources to best advantage through capital budgeting.

ACI 55-Year Index, 1905-1959. American Concrete Institute, Box 4754, Redford Station, Detroit 19, Mich. 1961. 350 pp. $9.

Comprehensive guide to technical papers which appeared in the ACI Proceedings and its successor, the ACI Journal, each indexed by title, author and major subject classification.

Fallout Shelter Surveys: Guide for Architects and Engineers. Office of Civil and Defense Mobilization, Washington, D.C. 1960. 52 pp. Free.

Outlines procedures and standards for evaluating the fallout shelter potential of existing structures and modifying them from the standpoint of radiation shielding and habitability to improve their worth.

Libraries-Fire Record Bulletin FR 60-1. National Fire Protection Association, 60 Batterymarch St., Boston 10, Mass. 16 pp. 50 cents.

Includes a point-by-point program for the prevention of library fires and protection of patrons, staff and contents in the event of a disaster. Case histories are cited.

• **Kawneer Co.** and **Kaiser Aluminum & Chemical Corp.**: The two firms have decided by mutual consent to terminate their agreement of merger which was to have been submitted to stockholders early in May. On April 27 the Department of Justice filed a suit in St. Louis, claiming that the merger would be in violation of the antitrust laws, and a restraining order entered in that court, without notice, prevented taking action on the merger at the scheduled stockholders' meetings.

• **Macomber, Inc.**: The first high strength cold roll-formed joists manufactured on the West Coast were shipped in May from the company's new operation in Montebello and shipments will climb soon to a level of 1,000 tons a month, predicts Clay Brown, western district manager.

• **Koppers Co., Inc.**: New West Coast district sales manager for the plastics division is John H. McSparran, with headquarters in Los Angeles.

• **Armstrong Cork Co.**: The Honolulu office has been expanded to sales headquarters for the entire Pacific area except Australia and New Zealand. Bruce M. Senior is manager.

• **Weyerhaeuser Co.**: Carroll K. O'Rourke of Tacoma, advertising and trade promotion manager for the lumber and plywood division, has been named president and board chairman of the national Home Improvement Council. . . . Rilco Engineered Wood Products Division has appointed George S. Reedal as sales manager for the western district which headquarters in Tacoma. He succeeds R. A. (Rags) Glaze who now is chief engineer for Rilco.

• **Filon Plastics Corp.**: Robert S. Levinson joins the Hawthorne, Calif., firm as director of public relations. . . . Among new distributors are Fiberglas Engineering & Supply of Seattle, Spokane, Boise, Los Angeles, San Diego and Phoenix and P.B.M., Inc., of Santa Rosa, Calif.

• **Adhesive Engineering**: Walter E. Fertig is new district sales representative in northern California, Oregon and Washington.

• **Sequoia Manufacturing Co.**: Personnel changes in the San Carlos, Calif., firm include Glenn A. Barnes to executive vice president and general manager from sales manager and M. W. Stransky to vice president, research, development and engineering, from plant manager.

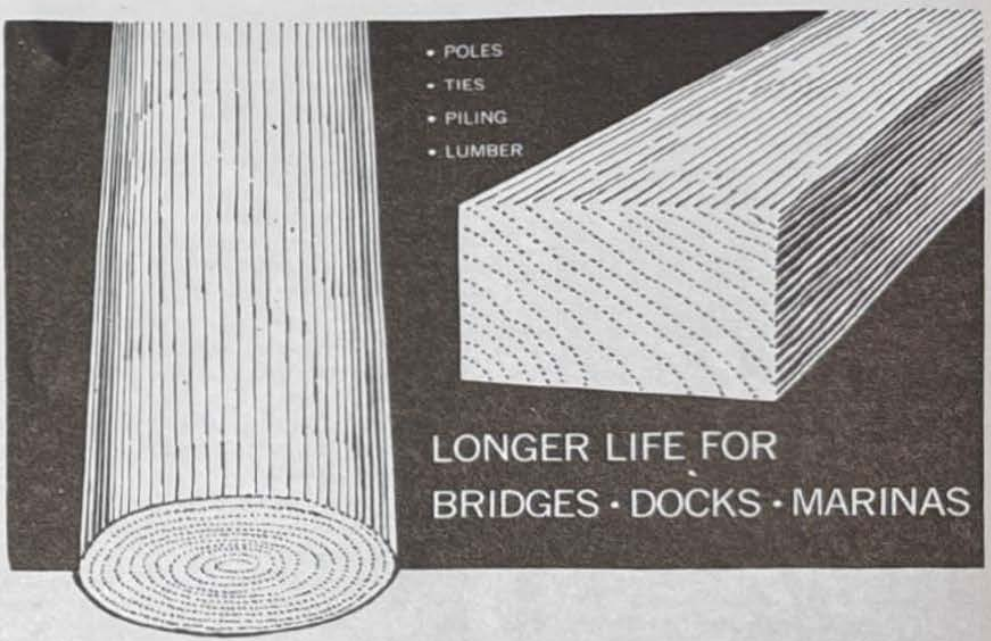
• **Electro Lighting Corp.**: Bill Horning Sales, Vancouver, is representing the firm in Washington, Oregon and part of Montana.

• **Calaveras Cement Co.**: A newly created post of district manager in Sacramento has been filled by Sherman Locke, sales representative in Oakland for the past five years. He has been succeeded by Bernard De Rose. Don Schwocho becomes sales representative in Fresno to fill an opening created by the transfer of Charles Lindgren to Springfield, Ore., where a cement distribution center has been opened and Robert M. Fisher takes on a sales post in Modesto, Calif.

• **B. B. Chemical Co.**: TaBo Chemical Corp., Sun Valley, Calif., has been named West Coast representative for the manufacturer's line of Bostik architectural coatings.

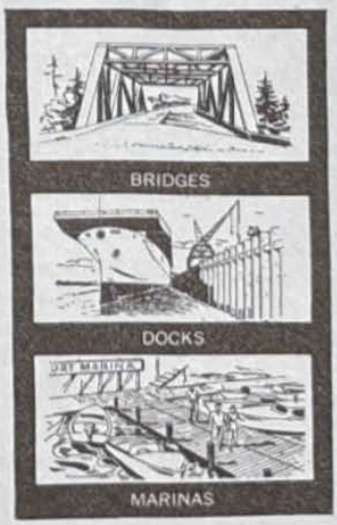
• **Alside, Inc.**: New divisional sales manager with headquarters in Seattle is A. A. Korbin, covering the Pacific Northwest, Alaska and the western portion of Canada.

• **United States Steel Corp.**: C. F. Raleigh, who has been identified with



WITH **McCORMICK & BAXTER**

PRESSURE-TREATED PILING & TIMBER



Build for permanence and economy with pressure-treated wood that protects against insects, marine borers, decay, splintering and checking for up to seven times as long as untreated wood. Ideal for construction of pleasure craft marinas.

McCormick & Baxter offers pressure-treatment with— • Coal tar creosote • Penta and paintable water-repellent Penta • Boliden Salts and Copperized Boliden Salt.

COMPLETE TIMBER PREFABRICATING FACILITIES

McCORMICK & BAXTER
CREOSOTING COMPANY
P. O. Box 3344, PORTLAND, ORE.
485 California St., SAN FRANCISCO, CALIF
110 W. Ocean Blvd., LONG BEACH, CALIF.

the structural steel industry in the West for 49 years, retired in April. He had been a contracting manager for the American Bridge Division in San Francisco since 1955.

• **Owens-Corning Fiberglas Corp.:** Frederic L. Purtill, marketing manager for the Pacific Coast division, headquartered in Santa Clara, Calif., has been named a vice president.

• **Dodge Cork Co., Inc.:** New distributors include K. M. Adams Co., Inc., San Francisco; Efco Distributing, Inc., Phoenix; Florco, Salt Lake City; Metropolitan Floor Covering Co., Los Angeles.

• **American-Marietta Co.:** A plant for the production of synthetic resins is in operation on a 10-acre site in Richmond, Calif., marking the initial step in the adhesive, resin and chemical division's expansion into that state.

• **Ador Corp.:** A new district office in San Francisco at 698 Minnesota St. is headed by Alfred J. Bonelli, formerly an architectural representative of Reynolds Metals Co.

• **Hexcel Products, Inc.:** William E. Lowery has joined the applied plastics division as a technical representative, with headquarters in the El Segundo, Calif., plant.

EFCO Steel Forms
available with
RETURN OPTION

Satisfaction is guaranteed when you purchase EFCO Lifetime Steel Forms for your concrete forming needs.

NEW CATALOG

Describes and illustrates EFCO Steel Forms and accessories with examples of many uses. Send coupon for your copy.



ECONOMY FORMS CORP. EFCO

MAIL TODAY

Economy Forms Corp.
Box 128-AC, H.P. Station
Des Moines, Iowa

Please send new catalog on EFCO Steel Forms, and address of nearest sales office (there are 29 coast to coast).

Name_____
Firm name_____
Address_____
City_____ State_____



1960 ALCOA AWARD

for outstanding design in aluminum products is presented to Robert Gelert by C. R. Boyle, sales executive, in ceremonies in Los Angeles. Gelert and architect A. Quincy Jones shared honors for work based on Brise Soleil solar screen system marketed by Arcadia Metal Products, Fullerton, now owned by Northrop Corp., along with Acme Metal Molding Co.

• **Wood Fibreboard Co.:** Operations have been increased to a three-shift basis for the production of Duraflake at the Albany, Ore., plant, first in the U.S. to use the famous German-developed Bison system.

• **Products Research Co.:** Toplite prefabricated roof panels are being produced in the Burbank, Calif., plant under a licensing agreement with Owens-Illinois Glass Co. and its subsidiary, Kimble Glass Co.

• **Westinghouse Electric Corp.:** In line with a new marketing concept, William L. Trudgian has been appointed regional construction and distribution manager, working out of San Francisco.

• **American-Standard:** Donald G. McCaffree, a University of Washington graduate, has joined the industrial division's sales force in Salt Lake City.

• **H. K. Porter Co., Inc.:** National Electric Division has moved its Los Angeles office to 6900 E. Elm St.

• **Glasteel, Inc.:** Alex Zakarian has purchased the controlling interest of the El Monte, Calif., manufacturer of fiberglass building panels and is the new president. Harry Beller is remaining as secretary.

• **All America Marble Co.:** C. C. Eaves as general manager is in charge of the development of more than 10,000 acres of land containing deposits about 30 miles southwest of Albuquerque.

• **Georgia-Pacific Corp.:** Construction is underway on a 60,000-sq. ft. warehouse and district sales office in Pico-Rivera, Calif.

• **Pacific Sealants:** Vice presid and general manager of the L Beach, Calif., firm is Robert Sla who resigned as vice president-sa for The Marco Co. and Panel Str tures, Inc., East Orange, N.J.

• **United-Pacific Concrete Corp.:** T largest prestressed concrete plant the Pacific area is nearing compl tion in Honolulu.

• **Rogers Industries, Inc.:** A plant 2000 S. Reservoir, Pomona, Calif., ha begun production of extruded alumi num prime windows, with Terran Tefelski as manager.

• **Fibreboard Paper Products Corp.:** An asphalt roofing plant near Mar tinez, Calif., is expected to be in op eration by the end of the year.

• **Goodyear Tire & Rubber Co.:** P. E. Mulvehill has been transferred from Cleveland to Los Angeles as western district manager in the films and flooring division.

• **Western Engineering and Mfg. Co.:** New factory representatives are Geo. V. Leseman & Co., Torrance, Calif., A. C. Lo Prest Co., San Francisco; Northwest Associates, Inc., Seattle.

ASSOCIATIONS

• **Western Pine Association:** James R. Pynes is chief lumber inspector in the Portland headquarters, succeeding Vern Johnson who retired May 1 after 41 years of grading service.

• **Western Concrete Reinforcing Steel Institute:** Formed to promote the use of reinforced concrete construction in nine western states, F. S. Clough is serving as executive vice president and manager at 1322 Webster St., Oakland. R. T. Stafford, general manager of Jos. T. Ryerson & Son, Inc., Seattle, is the initial president of the group, which succeeds the Western Reinforcing Steel Fabricators Association.

• **Western Red Cedar Lumber Association:** The trade promotion committee gathered in Vancouver, B.C., recently, to review detailed plans for the "cedar clinics" which Donald W. Pleier, secretary-manager, will conduct throughout the country for architects, builders and dealers.

• **Wood Products Association of Hawaii:** Clinton T. Hallsted, president and general manager of Honolulu Wood Treating Co., heads the organization newly formed by 12 lumber distributors.

LETTERS

In its December 1960 issue, Pacific Architect & Builder published the text of an address given by Phil W. Roulac before the student AIA chapter at California State Polytechnic College on the subject of single vs. joint responsibility. The editors, who prefaced Mr. Roulac's speech with the notation that his opinions were not necessarily those of the magazine, sincerely felt their readers would be interested to learn what the Southern California building contractor had to say to the students and certainly expected the offer of a rebuttal from the architectural profession. Among several letters received commenting on the address is the second one printed below.

However, the circulation of reprints of the article on behalf of Mr. Roulac has evoked more recent correspondence, including a letter which Walter Gropius addressed to Lewis D. Lawrence of Los Angeles, who had sent a copy of the talk to the distinguished architect and educator. Mr. Lawrence, in turn, forwarded the letter to PA&B, with the hope that it would be published to help clarify any misunderstanding which has developed.

Dean Gropius writes

Mr. Lawrence:

The article enclosed is an impertinent and deliberate distortion of my point of view. I published a book "Scope of Total Architecture," Harper and Brothers, New York, which I am sure you can find in a library. On page 76 of that book is an article titled "The Architect Within Our Industrial Society." From this Mr. Roulac has quoted me; what is better to say is, misquoted me. On page 81 you will find in that book this sentence: "When a client is in the building mood, he wants to buy the complete **building** for a fixed price and at a definite time of delivery." In the quotation of Mr. Roulac, he has changed "to buy a complete building" into "to buy a complete package."

On page 88 of my article there is a footnote which says: "With this type of collaboration I do not refer to the so-called 'package deal' corporations, as they treat architectural design more or less as a minor appendix only to the all-important business transaction. In the team which I have in mind, the designer must have as much power of decision as the businessman and the builder. He must be a legitimate partner."

From my article you will see that I am against the package deal as it is used today and is supported by Mr. Roulac and that the trend of my thinking is going opposite to that of his. How dangerous his approach is is very evident from his stating that he engaged a young architect who made a complete set of plans in two weeks. It shows how unserious he is regarding design. If the designer is an employee of the contractor, he cannot take a stand for the integrity of his design approach.

WALTER GROPIUS
Architect
Cambridge, Mass.

'No fear for the students'

Pacific Architect & Builder:

Your report of Mr. Phil W. Roulac's lecture is indeed an enlightening one for it shows that true leadership can misplace itself and not have sense enough to correct its own error. He takes the stand that there is trouble and he alone can solve it. I suspect that he can solve a lot but he has assumed the traditional duties of the architect to do it. He is quite right in believing that there should be a single responsibility but it should be a professional one, not a business one. He declaims bidding procedures for general contractors but surely he uses them for his subcontractors.

I have so enjoyed your well-balanced publication for many years that I trust you will not leave a one-sided presentation to mislead some of your readers.

I have no fear for the students who heard him. They can recognize a Fangio complaining from the back seat. They would only wonder why he does not get a license to drive.

ROBERT I. HOYT
Architect-Planning Consultant
Santa Barabara, Calif.

Flaunting the freeway

Pacific Architect & Builder:

The extremely shallow article in the May issue of Pacific Architect & Builder relative to the Seattle freeway is not worthy of a publication that perports to present factual and sensible analysis of the works of professional architects and engineers. It becomes apparent that the staff writer who prepared the article did not take the pains to secure the background facts nor to consider that many thousand man-hours have been expended by competent engineers and designers to solve a traffic problem to the best interest of the most people within the framework of available funds. The inference to incompetence reflected borders on libel. It indicates a lack of respect for the designers, planners and engineers who dedicate their lives to the creation of better facilities of this sort.

Basic design criteria are determined by the needs and resolution of the traffic pulse of the city. It would seem that the solution is to resolve the problem of traffic flow to the maximum benefit to the city and the greatest number of people. Our capitalistic system demands that maximum value must be achieved for the dollars expended. The current freeway design obviously took this into account. The second phase would be the landscaping development of the project. This can only occur when the citizens of the area are willing to tax themselves for the additional funds necessary.

CHARLES A. BAYLON
Charles A. Baylon & Associates
Architects-Planners
Seattle, Wash.

Pacific Architect & Builder

- West's largest architectural circulation
- Highest readership
- Lowest rates and cost per thousand

A Pacific Builder & Engineer, Inc., publication
1945 Yale Place East Seattle 2, Washington



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

not specified

one picture's worth

The proportions in the old saw about one picture equaling 1,000 words may be mathematically disputed, but few would deny the powerful impact of the camera's lens. Often the photograph tells the whole story with nary an accompanying word; on occasion, it may distort the truth.

With this in mind, we begin in this issue a continuing series of "Photo Editorials" marked, quite naturally, by a minimum amount of text. Our subjects will not be concerned necessarily with architecture and/or building per se; instead, we'll attempt to take a broader look at our environment, probing the cityscape primarily but observing the countryside every now and then. And, more likely than not in our attempt to make a point, the camera will record a critical observation. Our initial approach, however, happens to be positive (see p. 22).

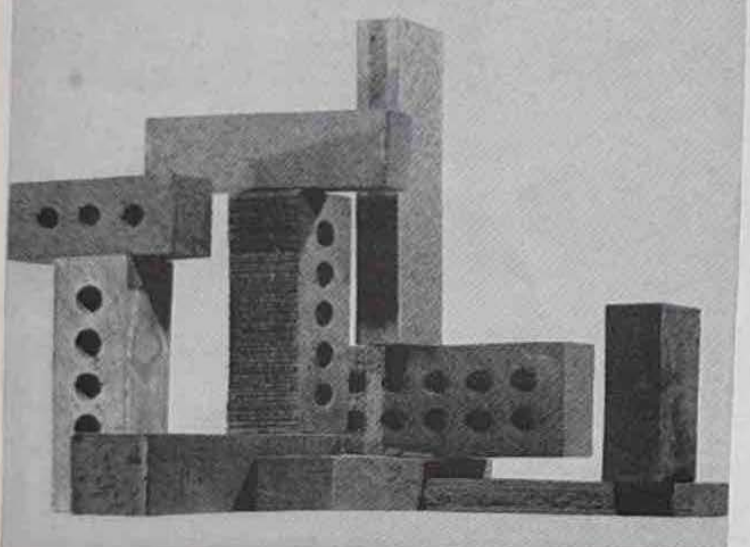
It is becoming more and more evident if we are to find our way out of the environmental chaos that exists in 20th century and nuclear-driven America, the architectural profession must lead the way. The architect, of course, cannot do it alone; still the time already is late and he must become more vigorous—outspoken when the occasion demands—in his respective community, rallying around him related professionals and other enlightened citizens to join the cause in promoting and preserving some amenities in our urban society, in respecting and conserving the yet unexploited natural assets elsewhere. We see the beautification of a freeway system, for example, in the same frame of reference as the preservation of the Olympic wilderness.

We sincerely hope this series will prove significant and we welcome contributions from readers. R.E.K.

Classroom frill? Hardly, when it takes only 1200 Clay City Norman Brick to build an attractive, indestructible, soundproof partition. Made only by

builders brick co. Seattle

Distributors... VANCOUVER, B.C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co. • Oregon: PORTLAND, Columbia Brick Works; SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.



Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 36, Laguna Beach, HYatt 4-7912

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

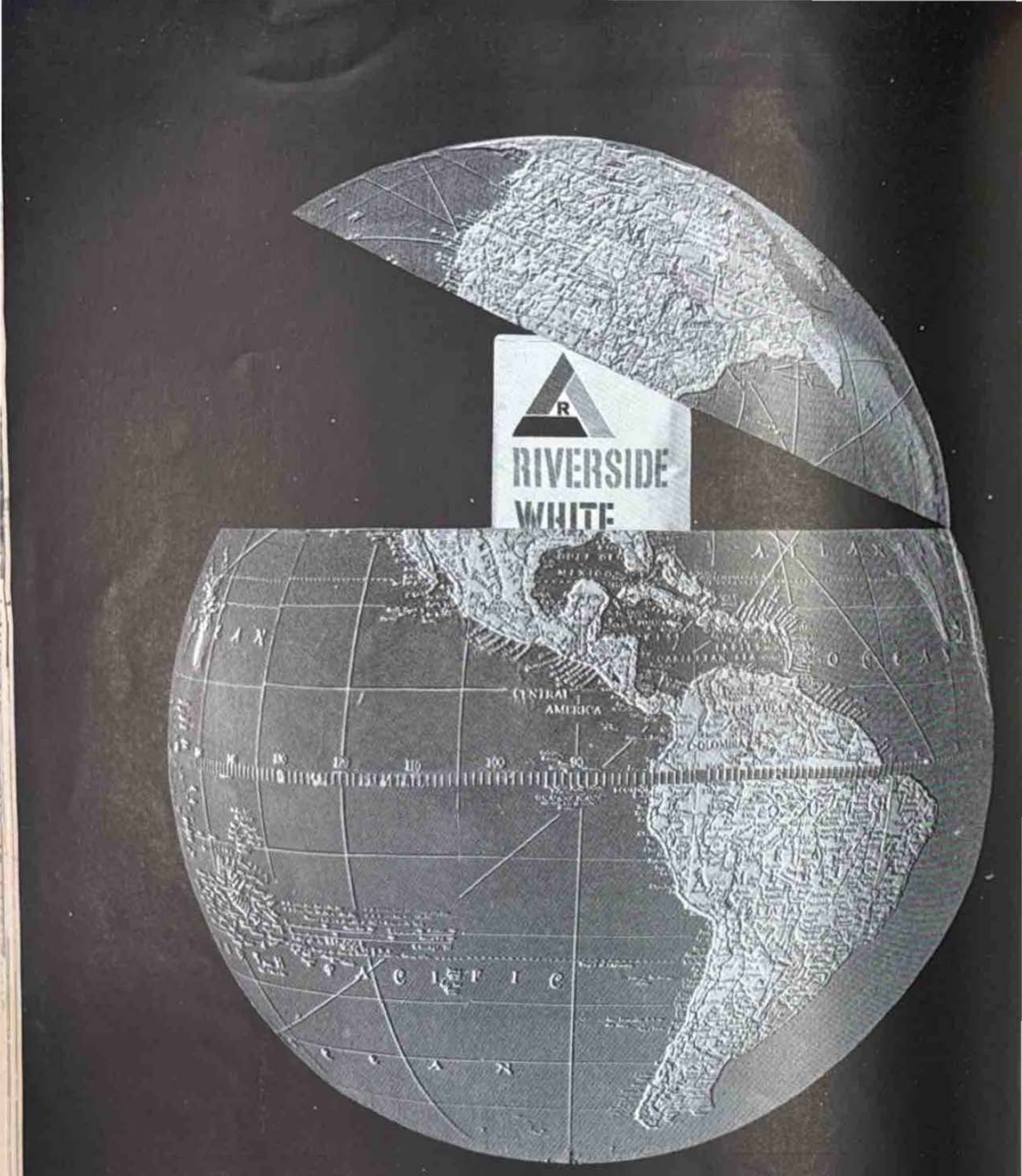
Builders Brick Company	34
Colorado Fuel & Iron Corp.	29
Economy Forms Corp.	32
Haws Drinking Faucet Co.	27
Macomber, Inc.	III Cover
Mahon, R. C. Company	IV Cover
McCormick & Baxter Creosoting Co.	31
Rudd & Cummings, Inc.	33
United States Gypsum Co.	II Cover

acific Architect & Builder

P A
& B

HE MAGAZINE OF WESTERN ARCHITECTURE ◆ AUGUST 1961





Now from the Depths of the Earth Comes a Pure White Cement

The West's only white cement is the purest white you've ever seen. That's because Riverside is the only white cement manufactured from limestone mined deep underground in its **purest** uncontaminated state . . . purity that also means a **uniformity of color** never before possible. But materials are only half the story: Riverside White is a product of unique modern facilities, the most advanced white cement technology to be found anywhere.

For the architect: Riverside White means a wider range of potential applications—no longer must white cement be reserved only for "showpiece" construction. Now with a dependable source of supply nearby, you can let your imagination go!

For the contractor: Riverside White means an immediate source of uniform white cement with the workability of Riverside grey—and it means immediate technical assistance too.

For the dealer: Riverside White offers th handling convenience of palletized deli ery, the reduction of costly inventorie the saving of precious warehouse spac

Now you can design more with white, build more with white!

RIVERSIDE CEMENT COMPANY
2404 Wilshire Boulevard, Los Angele

Pacific Architect & Builder August 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

21 Headquarters Building, Welton Becket & Associates, Los Angeles: Welton Becket & Associates, Architects-Engineers

28 Industrial Education Building, Brigham Young University, Provo, Utah; Dean L. Gustavson Associates, Architects — design

30 W. Coy Filmer Summer House, Downieville, Calif.: Francis Joseph McCarthy, Architect

26 Photo Report: Contemporary Architecture by University of Illinois Graduates in the West — special feature

31 Roof System Develops Space at Low Cost in Architect's Own House — methods & materials

4 Building Permits

8 Building Briefs

11 The Building Month

16 T-Square Talk

32 Products

34 Not Specified

departments

VOLUME 67, NUMBER 8

Published monthly by Pacific Builder & Engineer, Inc., 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Headquarters Building, Welton Becket & Associates, Los Angeles (p. 21)—Welton Becket & Associates, Architects-Engineers; Marvin Rand photo.

Building Permit Totals f

First Column Figures in Parentheses are Number of Residential Units • Second Column is Doll

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(89)	$ 616,310	$ 816,654
Alameda Co.	(105)	1,100,100	1,593,200
Albany	(46)	335,165	371,730
Alhambra	(106)	807,400	2,752,356
Anaheim	(182)	1,577,500	3,041,761
Antioch	(24)	257,736	299,819
Arcadia	(47)	668,470	1,040,940
Arroyo Grande	(13)	158,000	166,550
Artesia	(119)	1,595,200	1,652,700
Atherton	(2)	64,500	205,607
Atwater	( )	Nil	9,300
Auburn	(2)	20,750	36,530
Avalon	( )	Nil	71,900
Azusa	(3)	42,300	309,100
Bakersfield	(123)	1,493,700	1,902,610
Baldwin Park	(83)	959,700	1,030,100
Banning	(10)	123,576	208,000
Barstow	(1)	6,400	60,718
Bell	(7)	48,000	79,395
Bellflower	(122)	704,200	1,159,995
Belmont	(9)	165,000	304,240
Benicia		4,834	
Berkeley	(15)	655,811	1,337,011
Beverly Hills	(8)	744,000	1,216,624
Bradbury	( )	Nil	12,500
Brawley	(3)	26,000	60,129
Brea	(1)	16,969	39,966
Buena Park	(6)	85,238	2,720,251
Burbank	(103)	707,440	6,752,748
Burlingame	(7)	141,650	521,998
Butte Co.	( )	Nil	161,400
Calexico	( )	Nil	32,143
Campbell	(1)	13,250	48,850
Carlsbad	(8)	129,042	198,815
Carmel	(2)	30,000	44,320
Chico	(2)	40,937	74,876
Chino	(22)	242,011	324,594
Chula Vista	(2)	23,700	184,265
Claremont	(83)	1,193,300	1,323,100
Coalinga	(3)	55,000	58,150
Colton	(5)	65,618	94,599
Commerce	( )	Nil	438,820
Compton	(2)	15,000	247,292
Concord	(106)	1,373,906	1,989,601
Cntra Csta Co.	(218)	3,312,163	4,184,201
Corona	(13)	132,446	264,520
Coronado			
Corte Madera	(41)	381,400	430,256
Costa Mesa	(141)	1,712,895	2,135,524
Covina	(33)	342,828	587,632
Cudahy	(31)	243,500	287,150
Culver City	(6)	84,000	460,084
Dairy Valley	(1)	17,500	37,100
Daly City	(40)	589,637	742,483
Davis	(21)	339,000	361,810
Delano	(19)	256,180	936,225
Downey	(19)	168,430	867,897
Duarte	(3)	42,000	276,450
El Cajon	(15)	138,900	299,600
El Centro	(3)	47,500	128,000
El Cerrito	(35)	355,191	436,444
El Dorado Co.	(110)	1,229,233	2,009,566
El Monte	(10)	91,000	248,676
El Segundo	(38)	318,000	549,461
Emeryville	( )	Nil	38,000
Escondido	(1)	12,120	77,333
Eureka	(8)	136,500	518,528
Fairfield	(13)	206,025	302,260
Fillmore	(1)	9,216	14,912
Fontana	(5)	74,267	190,288
Fremont	(224)	2,842,610	3,091,245
Fresno	(87)	842,268	2,055,990
Fresno Co.	(64)	763,851	1,329,900
Fullerton	(17)	387,980	1,211,361
Glendale	(156)	1,455,970	2,023,790
Glendora	(83)	1,099,200	1,241,850
Half Moon Bay	(2)	25,500	26,800
Hanford	(29)	381,970	491,411
Hawthorne	(56)	553,200	794,229
Hayward	(110)	701,550	1,848,388
Hemet	(8)	77,500	370,984
Hermosa Bch	(13)	138,254	209,451
Hillsborough	(8)	334,000	407,100
Holtville	( )	Nil	Nil
Humboldt Co.	( )		219,574
Huntngtn Bch	(78)	1,039,045	1,149,374
Huntingtn Pk.	(3)	127,400	162,535
Imperial Co.	( )	Nil	53,480
Indio	( )	Nil	388,241
Industry	( )	Nil	84,800
Inglewood	(94)	884,000	1,237,288
Irwindale	( )	Nil	134,655
Kern Co.	(155)	1,821,688	2,532,866
Laguna Beach	(11)	236,000	315,975
La Habra	(85)	1,433,743	1,525,399
Lakewood	(4)	90,700	356,732
La Mesa	(7)	150,155	1,213,683
La Mirada	(5)	110,100	228,500
La Puente	(126)	569,200	660,680
La Verne	(6)	94,500	111,300
Lawndale	(36)	330,156	507,596
Lindsay	(1)	11,250	26,915
Livermore	(23)	249,183	346,240
Lodi	(30)	342,600	378,600
Lompoc	(49)	595,490	787,672
Long Beach	(170)	1,153,070	4,180,500
Los Altos	(20)	424,480	599,479
Los Angeles	(2603)	32,835,684	55,001,239
Los Angls Co.	(2104)	19,807,190	25,818,009
Los Gatos	(13)	218,000	829,315
Lynwood	(5)	34,500	156,592
Madera	(3)	39,000	60,145
Madera Co.	(6)	53,000	167,600
Manhattn Bch.	(7)	114,105	315,689
Manteca	(14)	139,800	526,869
Marin Co.	(56)	1,014,015	1,204,176
Martinez	(15)	117,280	117,280
Marysville	(1)	12,000	97,100
Maywood	(3)	25,800	70,516
Menlo Park	(9)	110,000	241,265
Merced	(6)	82,548	109,503
Merced Co.	(29)	416,510	448,440
Millbrae	(10)	186,500	234,100
Mill Valley	(8)	163,000	187,260
Modesto	(82)	1,148,500	1,512,058
Monrovia	(6)	90,907	822,595
Montclair	(60)	560,870	598,070
Montebello	(21)	208,851	624,421
Monterey	(8)	110,000	249,424
Monterey Co.	(96)	1,235,361	1,669,497
Monterey Park	(58)	867,250	1,078,897
Mountn View	(28)	242,740	1,128,813
Napa	(33)	440,950	659,036
Napa Co.	(19)	251,002	512,975
National City	(3)	39,016	598,421
Newport Bch.	(158)	1,602,908	2,194,340
N. Sacramento	(17)	136,142	173,082
Norwalk	(7)	51,000	159,970
Novato	(20)	339,640	369,940
Oakdale	(3)	35,006	102,634
Oakland	(410)	3,024,774	4,887,427
Oceanside	(53)	640,500	733,423
Ojai	(1)	9,350	57,846
Ontario	(115)	1,077,470	1,494,259
Orange	(126)	2,047,389	2,653,227
Orange Co.	(222)	4,088,474	9,260,621
Oroville	(1)	26,000	69,070
Oxnard	(306)	2,503,000	2,678,265
Pacifica	(26)	282,200	338,616
Pacific Grove	(6)	71,000	107,850
Palm Springs	(20)	205,000	1,100,214
Palo Alto	(13)	167,431	167,431
Palos Vrds Est.	(13)	534,693	568,748
Paramount	(21)	197,000	319,095
Pasadena	(74)	655,801	1,490,750
Paso Robles	(3)	46,500	64,000
Pico Rivera	(5)	76,000	618,379
Piedmont	( )	Nil	52,095
Pinole	(23)	264,555	274,792
Pittsburg	(4)	39,829	317,064
Placentia	( )	Nil	3,550
Placer Co.	(76)	1,003,606	1,257,837
Pleasanton	(8)	110,000	123,144
Pomona	(123)	1,164,910	1,737,958
Porterville	( )	No Reply	No Reply
Port Hueneme	( )	Nil	9,960
Red Bluff	(14)	142,883	158,308
Redding	(4)	75,133	154,916
Redlands	(17)	225,500	339,579
Redondo Bch.	(32)	343,078	678,484
Redwood City	(48)	498,460	694,472
Richmond	(50)	355,400	736,200
Riverside *	( )		882,142
Riverside Co.	(380)	3,858,959	4,870,742
Rolling Hills	(1)	32,000	39,750
Rollg Hills Est.	(10)	323,000	361,100
Rosemead	(37)	252,400	316,700
Roseville	(33)	346,473	436,471
Sacramento	(194)	1,770,450	6,141,100
Sacramnto Co.	(321)	3,437,290	6,571,472
St. Helena	( )	No Reply	No Reply
Salinas	(18)	235,500	681,220
San Bernardno.	(86)	1,048,325	1,718,057
Sn Brnrdno C.	(457)	3,828,656	9,215,569
San Bruno	(45)	616,200	4,372,191
San Carlos	(9)	160,000	336,218
San Clemente	(12)	195,169	332,947
San Diego	(653)	6,297,468	15,058,194
San Diego Co.	(217)	3,193,600	5,065,100
San Dimas	(4)	37,000	
San Fernando	(35)	274,100	
San Francisco	(292)	6,282,753	
San Gabriel	(7)	86,050	
Sanger	(84)	36,350	
San Jacinto	(4)	26,795	
Sn Joaquin C.	(35)	453,066	
San Jose	(763)	7,668,790	
San Leandro	(23)	321,000	
San Lus Obspo	(125)	1,444,301	
S.L. Obispo C.	(41)	470,565	
San Marino	(3)	125,000	
San Mateo	(38)	401,000	
San Mateo Co.	(103)	1,045,800	
San Pablo	(17)	137,378	
San Rafael	(138)	2,169,869	
Santa Ana	(74)	884,700	
Santa Barbara	(52)	765,000	
Snta Brbra Co.	(158)	2,480,600	
Santa Clara	(261)	3,022,500	
Santa Clra Co.	(57)	1,147,450	
Santa Cruz	(32)	420,606	
Santa Cruz Co.	(81)	903,980	
Snte Fe Sprgs	( )	Nil	
Santa Maria	(14)	135,932	
Santa Monica	(91)	967,166	
Santa Paula	(4)	67,966	
Santa Rosa	(98)	1,148,620	
Sausalito	(3)	34,000	
Seal Beach	(63)	500,466	
Seaside	(18)	154,500	
Selma	(4)	44,776	
Shasta Co.	(10)	124,550	
Sierra Madre	(32)	294,750	
Solano Co.	(5)	72,500	
Sonoma Co.	(60)	684,699	
South Gate	(82)	522,666	
So. El Monte	( )	Nil	
So. Pasadena	(3)	45,080	
S. Sn Frncisco	(33)	201,100	
Stanislaus Co.	(40)	419,133	
Stockton	(32)	944,440	
Sunnyvale	(170)	2,291,820	
Temple City	(18)	257,850	
Torrance	(59)	585,020	
Tracy	(7)	85,600	
Tulare	(9)	111,000	
Tulare Co.	(44)	243,782	
Turlock	(3)	50,908	
Ukiah	(1)	16,000	
Upland	(40)	695,750	
Vacaville		No Reply	
Vallejo	(43)	456,050	
Ventura	(229)	2,623,333	
Ventura Co.	(425)	4,775,900	
Visalia	(13)	202,831	
Walnut	( )	Nil	
Walnut Creek	(48)	323,000	
Wasco	(30)	397,150	
Watsonville	(1)	13,407	
West Covina	(14)	292,326	
Whittier	(15)	184,500	
Woodland	(41)	508,900	
Woodside	(3)	106,500	
Yolo Co.	(85)	651,925	
Yreka	(2)	29,000	
Yuba City	(31)	375,100	
Yuba Co.	(11)	99,000	
Total	**(18,215)**	**$206,363,407**	

* Breakdown not available

OREGON

Albany	(26)	$ 177,555	$ 232,2
Ashland	( )	Nil	107,9
Astoria	(2)	20,000	23,3
Baker	(1)	7,000	200,7
Beaverton	(16)	266,150	422,7
Bend	(2)	33,500	193,2
Central Point	(3)	19,000	19,2
Clackamas Co.	(61)	791,045	952,5
Coos Bay	(4)	70,000	131,5
Corvallis	(15)	194,000	274,4
Dallas	(1)	10,000	90,0
Douglas Co.	(12)	104,512	475,8
Eugene	(54)	552,550	1,090,9
Forest Grove	(2)	8,000	33,2
Grants Pass	(10)	122,300	174,6
Gresham	(6)	48,000	58,4
Hermiston	(5)	69,600	107,0
Hillsboro	(8)	92,800	126,6
Hood River	(10)	60,000	76,6
Klamath Falls	( )	Nil	122,6
La Grande	(2)	31,000	52,2
Lane Co.	(91)	1,000,397	1,406,8

Western States for June

dential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
Lebanon	(2)	42,500	97,980
Marion Co.	(56)	650,650	813,143
McMinnville	(6)	64,500	385,861
Medford	(15)	166,500	538,578
Milln-Frwter	(1)	7,000	10,500
Milnomah Co.	(190)	2,755,910	5,282,428
Newberg	(1)	8,000	62,895
Newport	(1)	11,700	159,880
North Bend	(5)	56,632	78,218
Ontario	(3)	33,000	165,925
Oregon City	(3)	31,000	239,134
Oswego	(15)	281,500	354,590
Pendleton	(2)	24,000	112,590
Portland	(80)	975,455	5,869,840
Prineville		No Reply	No Reply
Roseburg	(6)	66,477	142,721
St. Helens	( )	Nil	53,075
Salem	(36)	291,450	408,204
Seaside	( )	Nil	34,443
Springfield	(8)	72,570	154,735
The Dalles	(4)	56,000	69,425
Wshngtn Co.	(89)	1,477,435	2,519,228
Total	**(854)**	**$ 9,958,643**	**$ 23,926,680**

WASHINGTON

Aberdeen	(2)	$ 22,875	$ 72,466
Anacortes	(2)	20,200	48,650
Auburn	(23)	221,000	237,630
Bellevue	(2)	30,000	320,450
Bellingham	(2)	25,500	1,584,476
Bremerton	(4)	70,000	147,220
Camas	(1)	16,500	45,465
Centralia	(2)	22,500	72,050
Chehalis	(3)	61,000	95,495
Clark Co.	(60)	767,995	833,195
Clarkston	( )	Nil	10,635
Ellensburg	(1)	18,000	160,743
Enumclaw	(5)	60,000	60,100
Ephrata	( )	Nil	250,210
Everett	(4)	63,022	779,567
Grys Hrbr Co.	(15)	119,500	170,050
Hoquiam	(2)	15,500	46,577
Island Co.	(15)	87,650	124,750
Kelso	(3)	41,000	67,085
Kennewick	(5)	81,600	128,490
Kent	(8)	143,100	156,525
King Co.	(545)	6,279,400	7,231,530
Kirkland	(8)	95,100	99,820
Longview	(9)	178,700	502,789
Mercer Island	(26)	446,000	604,518
Montesano		No Reply	No Reply
Moses Lake	(8)	119,500	191,760
Olympia	(7)	127,900	244,045
Pasco	(6)	79,000	174,660
Pierce Co.	(139)	1,494,032	3,287,220
Port Angeles	(1)	13,000	118,000
Port Orchard		Nil	Nil
Pullman	(24)	299,693	309,658
Puyallup	(4)	45,000	378,300
Renton	(14)	193,000	336,195
Richland	(17)	347,600	802,905
Seattle	(84)	1,522,655	8,929,335
Shelton	(2)	27,000	165,300
Spokane	(27)	399,700	777,108
Spokane Co.	(56)	875,600	1,941,755
Sunnyside	(1)	15,000	26,687
Tacoma	(76)	1,113,200	2,754,435
Vancouver	(20)	287,675	574,444
Walla Walla	(4)	50,000	107,167
Walla Wlla Co.	(6)	77,000	608,165
Wenatchee	(3)	40,000	193,463
Yakima	(10)	173,000	286,402
Total	**(1,256)**	**$ 16,158,697**	**$ 36,058,820**

ALASKA

Anchorage	(34)	$ 795,063	$ 1,054,649
Fairbanks	(2)	71,500	503,215
Juneau	( )	Nil	1,330
Ketchikan	( )	Nil	14,025
Sitka		No Reply	No Reply
Total	**(36)**	**$ 866,563**	**$ 1,572,069**

IDAHO

Alameda	(9)	$ 98,500	$ 210,980
Blackfoot	(15)	214,500	227,514
Boise	(5)	60,900	1,182,202
Caldwell	(8)	116,500	164,595
Coeur d'Alene	(5)	64,615	123,706
Idaho Falls	(9)	184,490	360,820
Jerome	(3)	39,000	42,085
Lewiston	(3)	41,000	100,301
Moscow	(7)	124,000	160,000
Nampa	(6)	72,500	172,438
Payette	(1)	12,000	134,200
Pocatello	(4)	55,850	603,635
Sandpoint	( )	Nil	11,100
St. Maries	( )	Nil	Nil
Twin Falls	(5)	62,000	218,215
Total	**(80)**	**$ 1,145,855**	**$ 3,711,791**

MONTANA

Anaconda	( )	$ Nil	$ 27,300
Billings	(38)	537,400	856,977
Bozeman	(6)	106,400	251,778
Butte	(3)	1,600	1,600
Cut Bank	( )	Nil	8,300
Glasgow	(3)	37,000	72,500
Glendive	( )	Nil	48,250
Great Falls	(44)	426,044	742,979
Havre	(6)	91,550	96,550
Helena	(10)	141,500	224,247
Kalispell	(1)	10,000	75,165
Lewistown	(8)	73,000	142,200
Livingston	( )	Nil	23,946
Malta	( )	Nil	Nil
Miles City	(7)	81,900	124,980
Missoula	(3)	74,550	113,968
Total	**(129)**	**$ 1,580,944**	**$ 2,810,740**

WYOMING

Casper	(29)	$ 410,000	$ 1,755,826
Cheyenne	(63)	710,900	1,070,522
Cody	(1)	20,000	30,100
Laramie	(10)	128,989	195,152
Rawlins	(2)	34,400	47,180
Riverton	(1)	18,000	48,000
Rock Springs	(11)	97,000	126,500
Sheridan	(7)	87,500	122,568
Total	**(124)**	**$ 1,506,789**	**$ 3,395,848**

COLORADO

Adams Co.	(390)	$ 5,382,000	$ 5,905,960
Alamosa	(5)	46,000	532,000
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(61)	801,000	1,470,919
Aspen	( )	No Reply	No Reply
Aurora	(164)	1,079,014	1,292,476
Boulder	(13)	233,150	882,556
Boulder Co.	(33)	450,050	623,910
Canon City	( )	No Reply	No Reply
Colo. Springs	(42)	547,680	1,267,711
Cortez	( )	Nil	4,200
Denver	(437)	3,125,035	11,309,497
Durango	(3)	42,078	61,606
El Paso Co.	(18)	306,000	569,937
Englewood	(21)	98,817	411,803
Estes Park	( )	No Reply	No Reply
Fort Collins	(21)	231,500	385,249
Fort Morgan	(1)	12,670	333,581
Golden	(7)	111,300	223,660
Grand Junctn	( )	Nil	71,340
Greeley	(60)	387,000	510,721
Jefferson Co.	(531)	4,695,159	6,206,050
La Junta	(1)	12,100	50,766
Lamar	(1)	30,000	34,000
Littleton	(6)	93,400	372,072
Longmont	(18)	200,300	260,631
Loveland	(15)	180,860	268,235
Monte Vista	( )	No Reply	No Reply
Montrose	( )	No Reply	No Reply
Pueblo	(26)	286,102	766,474
Pueblo Co.	(12)	171,000	176,406
Sterling	(1)	17,500	33,335
Trinidad	( )	Nil	17,467
Walsenburg	( )	Nil	20,450
Westminster	(13)	146,834	242,352
Total	**(1900)**	**$ 18,686,349**	**$ 34,315,364**

UTAH

American Fork	(1)	$ 8,000	$ 11,800
Brigham City	(30)	364,500	746,630
Cedar City	(2)	51,000	66,930
Clearfield	(1)	14,000	25,800
Davis Co.	(6)	66,481	986,019
Kaysville	(8)	49,760	52,680
Layton	(10)	123,000	250,900
Logan	(9)	110,403	214,997
Murray	(42)	473,000	2,556,771
Ogden	(15)	473,565	714,565
Orem	(12)	128,646	707,611
Price	( )	Nil	55,000
Provo	(11)	169,000	3,780,855
Salt Lake City	(148)	11,628	2,271,308
Salt Lake Co.	(276)	3,154,100	4,771,365
S. Slt Lke Cty.	(1)	10,000	71,650
Spanish Fork	(7)	79,350	89,625
Tooele	(4)	51,000	123,314
Utah Co.	(8)	92,140	130,670
Weber Co.	(*)	71,000	119,100
Total	**(591)**	**$ 5,500,573**	**$ 17,747,590**

NEVADA

Boulder City	( )	$ Nil	$ 2,679
Clark Co.	(48)	624,003	1,971,074
Elko	(2)	23,000	187,200
Las Vegas	(297)	2,795,960	3,400,918
N. Las Vegas	(55)	520,490	632,034
Reno	(47)	737,965	1,394,558
Sparks	(21)	323,500	379,500
Washoe Co.	(23)	380,832	508,962
Total	**(493)**	**$ 5,405,750**	**$ 8,476,925**

ARIZONA

Buckeye	(6)	$ 65,800	$ 68,520
Casa Grande	(3)	18,000	40,400
Chandler	(6)	69,922	94,033
Douglas	(2)	17,225	68,348
Flagstaff	(96)	636,231	1,270,361
Florence	( )	Nil	Nil
Glendale	(9)	62,600	166,800
Maricopa Co.	(246)	2,446,720	3,221,886
Mesa	(111)	961,483	1,403,462
Phoenix	(789)	5,517,623	9,646,286
Pima Co.	(94)	1,188,090	1,384,435
Prescott	(9)	100,100	368,633
Scottsdale	(163)	1,260,700	1,599,961
Tempe	(110)	1,089,775	1,296,920
Tuscon	(81)	2,110,812	4,703,705
Wickenburg	( )	Nil	70,125
Winslow	(8)	25,400	25,400
Yuma	(12)	76,500	318,158
Total	**(1735**	**$ 15,646,981**	**$ 25,747,433**

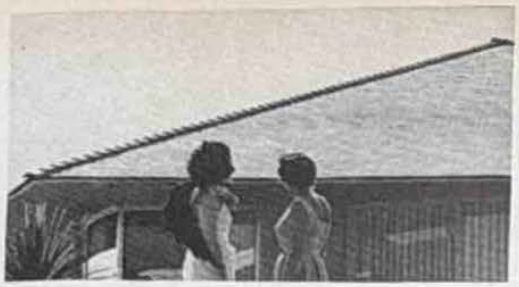
NEW MEXICO

Alamogordo	(1)	$ 4,500	$ 16,335
Albuquerque	(90)	1,193,747	3,751,455
Artesia	(13)	147,300	164,958
Carlsbad	(10)	118,000	297,075
Clovis	(10)	96,733	191,293
Deming	(1)	10,000	16,300
Farmington	(4)	24,000	235,246
Gallup	(10)	174,700	225,770
Hobbs	(11)	114,500	177,625
Las Cruces	(17)	11,150	460,850
Las Vegas	(2)	14,000	50,450
Lovington	(12)	134,000	137,500
Raton	( )	Nil	1,550
Roswell	(80)	655,500	2,360,400
Sante Fe	(49)	378,340	458,310
Silver City	( )	No Reply	No Reply
Truth or Consequences	(*)	8,390	33,140
Tucumcari	(9)	65,300	95,415
Tularosa	(1)	4,928	4,928
Total	**(320)**	**$ 3,155,088**	**$ 8,678,600**

HAWAII

Hawaii Co.	(23)	$ 251,480	$ 874,381
Honolulu	(672)	7,410,448	12,632,378
Maui Co.	(23)	242,965	593,316
Total	**(718)**	**$ 7,904,893**	**$ 14,100,075**
GRAND TOTAL	**(26,451)**	**$294,000,342**	**$549,304,402**

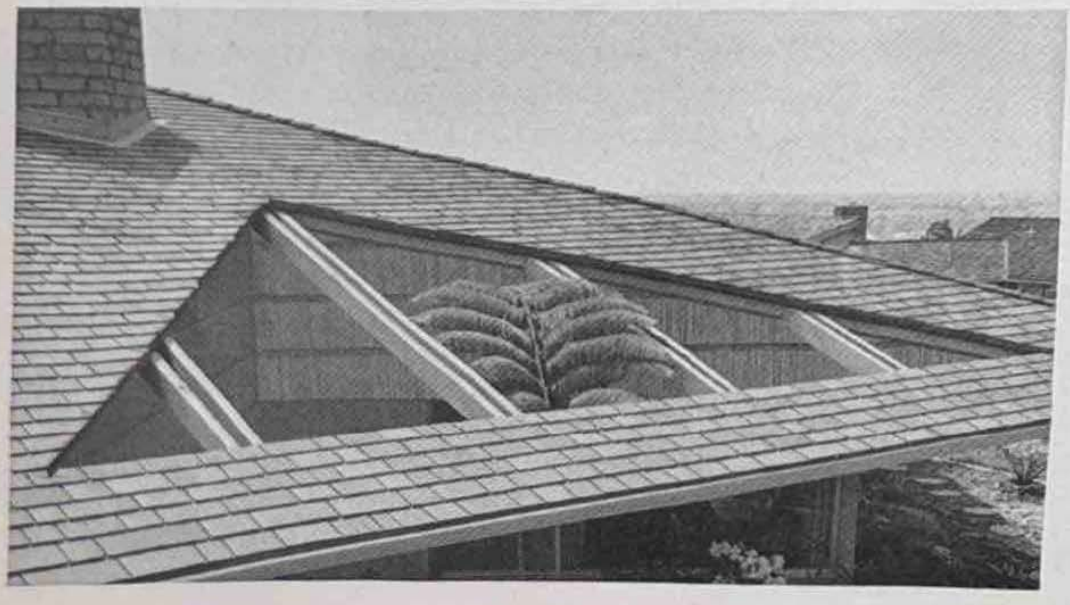














ROOFS OF GENUINE CEDAR COMBINE GOOD TASTE WITH SOUND JUDGMENT



No single feature of a home does more to show your concern with quality than a glistening new cedar shingle roof. Clear from the curb, its etched beauty and natural character are apparent. Equally important is a cedar roof's ability to assure troublefree service—even in areas where extremes of wind and weather are common. A properly constructed shingle roof provides three thick layers of solid cedar. This gives the roof unusually effective insulative properties. Because a cedar shingle is strong and rigid, it also adds structural strength to the house . . . and it can be applied over spaced sheathing (often saving up to 50% in decking costs). Send for your copies of "Distinctive Roof Applications" and "The House of Cedar." These colorful folders show ways that genuine cedar can help you speed home sales while enhancing your reputation for quality.

CEDAR GIVES YOU AN EDGE



RED CEDAR SHINGLE BUREAU

5510 White Building, Seattle 1, Wash.

550 Burrard Street, Vancouver 1, B. C.

Building Briefs . . . *Highlights & Sidelights*

THE BUILDING WEST—Building permits for the first half of 1961 totaled $2,968,097,453 in the 13 western states, an increase of $161.9 million over the same period last year. Pacific Architect & Builder's survey reveals that California has the largest increase, $137.3 million, followed by Colorado, $46.2 million. Residential building for the first six months of 1961 shared over half the total dollar volume, $1,552,826,365. Colorado led in this category showing a $22 million increase, with California gaining only $16 million over 1960. Industrial-commercial building, at $1,415,271,088, accounted for more than its normal share of the total volume. Most significant factor: non-residential building started strong this year, continues strong; and residential volume which was slow early in the year now is hitting full stride.

SIX-MONTH TREND—Permit figures throughout the first six months of the year have been climbing steadily upward. First quarter totals were 4% greater than in 1960. April was up 5%; May 11%. In June, permits totaled $549,304,402, an increase of 4% over the corresponding month a year ago. Thus the building trend continues strong and bullish. Industrial-commercial volume has been high all year. Residential starts were slow early in the spring but jumped ahead of last year in both May and June.

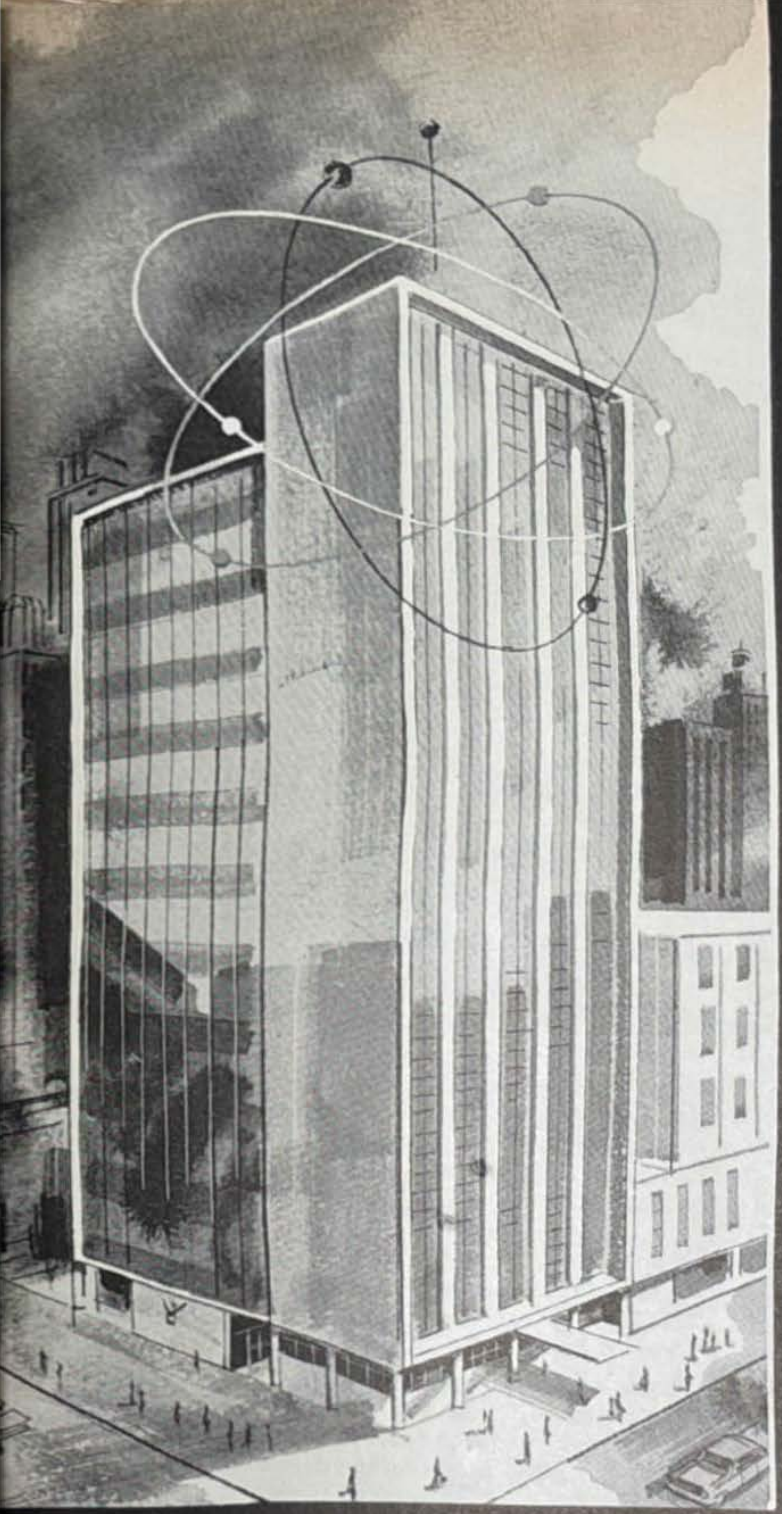
SCHOOLROOM SYMPOSIUM—Herbert H. Swinburne, Philadelphia architect, apparently did a first-rate job as keynoter for the A. A. Cleveland Conference at Washington State University in June. For two days in Pullman, 74 of his colleagues and 93 school administrators discussed his proposals for utilizing concepts from various sciences and arts to design school buildings so that the structures themselves contribute more to learning and teaching. Arnold T. Tjomsland, conference chairman, reports that the sessions already have resulted in plans for modernization of Washington state school building regulations. Commenting on foundations of school architecture, Swinburne said: "To build schools wisely as well as efficiently, professional practice must understand more of pupils themselves, of life itself. We must study pupils individually and collectively, in all their variations, in order to know how to build for them. The concrete aspects of the physical sciences are being studied incessantly but what about the intangibles? What about the indeterminate, often abstract, aspects of the social and behavioral sciences? Little is known about how they affect the shape and use of our schools."

ANALYZING ANCHORAGE—A "1980 General Plan" for the Anchorage metropolitan area now being studied by city officials recommends the "feasibility of creating an areawide or borough governmental body" which would have jurisdiction over more than 100 sq. mi. and a projected population of 225,000. The plan, prepared by the Anchorage City Planning Commission and the California consulting firm of Wilsey, Ham & Blair, suggests five major employment centers which, by 1980, are expected to provide approximately 78,000 jobs.

CONSULTING THE CALENDAR — Seattle will play host to the fourth national conference of the American Craftsmen's Council when it meets on the University of Washington campus August 26-29. The theme: "Creative Research in the Crafts." Among the speakers will be architect David A. Pugh of Portland. . . . What promises to be one of the most stimulating conferences of the year has been planned for September 15-17 on the Monterey Peninsula. "Eyes West," to be presented by the University of California Extension and the Art Directors and Artists Club of San Francisco in cooperation with the Los Angeles Art Directors Club, will draw such participants as Philadelphia architect Louis Kahn and critic Lewis Mumford.

COMPARATIVE TOTALS FOR 13 WESTERN STATES—FIRST HALF 1961

State	1961 Residential Only	1960 Residential Only	1961 Res. Units	1960 Res. Units	1961 Total $ Volume	1960 Total $ Volume	1961 No. Permits	1960 No. Perm
California	$1,092,014,695	$1,075,889,720	93,852	95,357	$2,029,487,308	$1,892,165,238	232,419	235,89
Oregon	51,153,456	54,614,912	4,067	4,345	115,416,430	119,234,944	13,761	13,11
Washington	86,600,704	85,697,845	6,272	6,370	197,962,576	192,926,915	24,365	23,90
Alaska	1,946,168	3,269,485	106	121	8,424,273	11,990,078	693	56
Idaho	5,567,564	6,695,086	432	501	17,077,934	16,209,443	2,888	2,91
Montana	10,115,394	8,639,204	875	800	15,555,622	18,474,825	2,046	1,97
Wyoming	5,955,739	9,066,500	459	697	12,326,814	14,090,818	1,467	1,66
Colorado	92,584,009	70,182,806	9,572	6,866	169,133,767	122,915,137	36,520	39,21
Utah	32,371,693	32,632,210	3,089	2,758	67,370,370	56,833,440	5,641	5,86
Nevada	30,970,615	26,896,331	2,651	2,199	52,887,358	51,509,484	5,670	5,07
Arizona	87,622,122	89,053,049	9,570	9,774	161,826,866	154,454,476	23,849	23,81
New Mexico	22,561,173	30,619,180	2,257	2,815	46,094,793	55,597,661	10,024	11,73
Hawaii	33,363,033	38,371,962	2,987	3,912	74,543,342	99,713,591	7,876	8,13
Total	$1,552,826,365	$1,531,628,290	136,189	136,515	$2,968,097,453	$2,806,116,050	367,219	373,85



New from Haughton Elevonics*

DYNAFLITE
ELEVATOR CONTROL

The Miracle in Motion That Sets New Standards for Speed and Comfort in Vertical Transportation

Haughton Dynaflite achieves the high speeds required for efficient handling of heavy elevator traffic with *incredible smoothness*. Acceleration and deceleration are so subtle—so finely controlled—that passengers scarcely feel any motion at all. This means passenger comfort and confidence that no conventional control system can provide.

The Dynaflite system is fully automatic, thoroughly reliable. Each run is as precisely controlled as those that preceded it, and those that will follow. Haughton quality in materials and workmanship brings tight-fisted economy in upkeep, too.

Haughton Dynaflite Control is ready to serve your buildings today, thanks to Elevonics* . . . the well-spring of progress in vertical transportation for multi-floor buildings. Include Dynaflite's distinctive advantages in your building or modernization plans. Ask your Haughton representative for complete information, without obligation. Or, write today.

* *Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative application of electronic devices and instrumentation for betterment of systems design and performance. Registered in U. S. Patent Office.*





Haughton Elevator Company

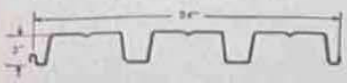
Division of Toledo Scale Corporation, Toledo 9, Ohio

Offices in principal cities

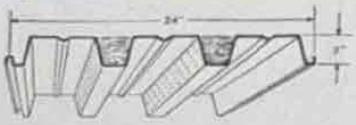
PASSENGER AND FREIGHT ELEVATORS • ESCALATORS • DUMBWAITERS



When it comes to roof systems, INLAND covers everything!



NEW! N-DECK—Available in lengths from 6'0" to 28'6". Carries normal roof loads over spans up to 16'0". Especially practical for canopies.



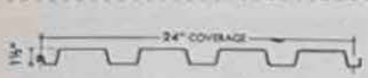
NEW! N-ACOUSTIDECK—Steel deck and acoustical ceiling in one panel. For spans to 16'0". Noise-Reduction Coefficient, .70.



A-DECK — For purlin spacings not exceeding 8'4". Narrow ribs provide deck surface that supports the thinnest or softest types of insulation.



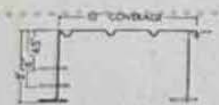
H-DECK — New! For simple spans to 20'0" — 3" and 4½" depths. Especially practical to cover walkways in shopping centers, schools, other installations. Also available in Acoustideck.



B-DECK — For spans to 10'0". Wide rib distributes metal for greater structural efficiency. Well suited for use as side wall panels.



B-ACOUSTIDECK — Two-in-one panel combines steel roof deck with acoustical ceiling having Noise-Reduction Coefficient of .70. Used for spans to 10'0".



T-STEEL — New! Galvanized only. For clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to resist seismic and wind loads.



RIBFORM — High-tensile, galvanized steel form for concrete slabs over spans up to 8'0". Three types: Standard, Heavy-Duty, Super-Duty (shown).

Whether your design calls for a dry insulation board roof or for wet-fill, there's an Inland roof system for the job — by the makers of famous Milcor steel building products.

Inland steel deck weighs less than half as much as poured-in-place or pre-cast construction. You can space joists wider and use lighter framework, to save both time and money. Panels are easy to handle and weld in place — in any weather that a man can work.

Types A, B, C, and H decks have the additional advantage of a Bonderized, baked-enamel prime finish that resists on-the-job damage. One field coat of paint on these Inland decks usually covers.

Write for catalogs 240, 241, and 245 — or see Sweet's sections 2c/Inl, 11a/In, and 2a/In.

member of the INLAND steel family

ENGINEERED PRODUCTS DIVISION

INLAND STEEL PRODUCTS COMPANY

Dept. H, 4045 West Burnham Street
Milwaukee 1, Wisconsin

EP-1A

ATLANTA, BALTIMORE, BUFFALO, CHICAGO, CINCINNATI, CLEVELAND, DALLAS, DENVER, DETROIT, KANSAS CITY, LOS ANGELES, MILWAUKEE, MINNEAPOLIS, NEW ORLEANS, NEW YORK, ST. LOUIS

Red Rock Hill competition narrows field to four

One of four schemes, all by Bay area design teams, selected by the San Francisco Redevelopment Agency will be built by the successful bidder for the 22-acre Red Rock Hill crest project. The finalists in the national competition were chosen from ninety submissions which, in preliminary judgment, had been narrowed to 10, each receiving a $1,000 prize.

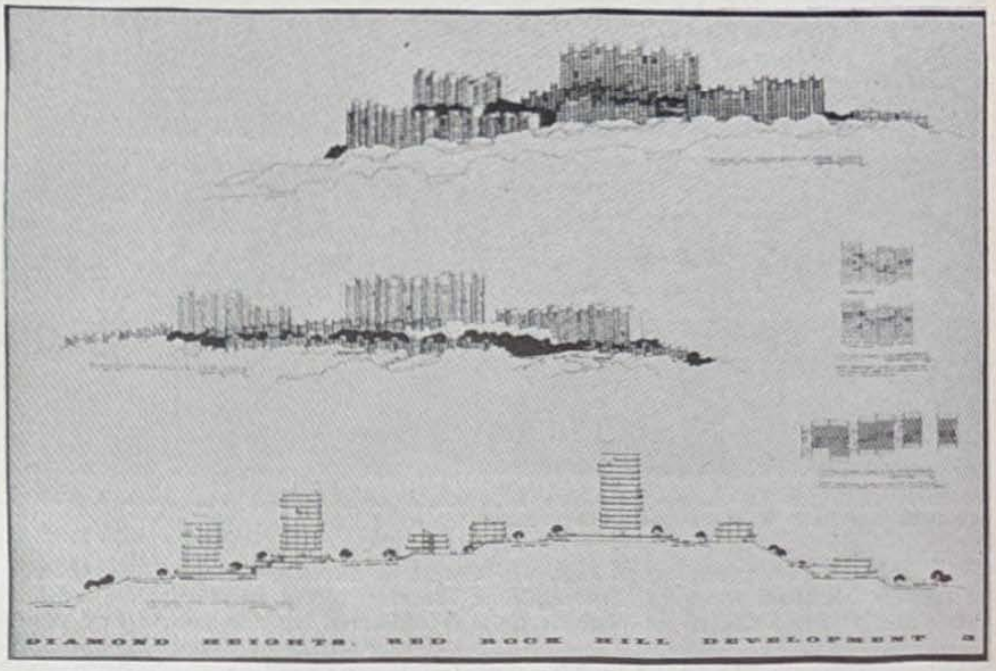
To determine quality of site planning, design and economic feasibility, the agency relied heavily on an architectural advisory panel's evaluation. Members were architects John Carl Warnecke, chairman, Ernest J. Kump and Don E. Burkholder and developers Sanford B. Weiss and Gerson Bakar, with architect William J. Watson as professional advisor.

In discussing the criteria for final selections, the agency had this to say:

"The four schemes selected present a range of choice in the dimensions of design. Their basic philosophy steps from informal, but with a strong San Francisco character, through various stages to a most striking monumental design. In choice of building types, they range from emphasis on garden apartments to full commitment to large structures. In some, the towers are used to reinforce the summit of Red Rock Hill. While all are imaginative, the selected designs present marked differences in their approach to pedestrian circulation and landscaping.

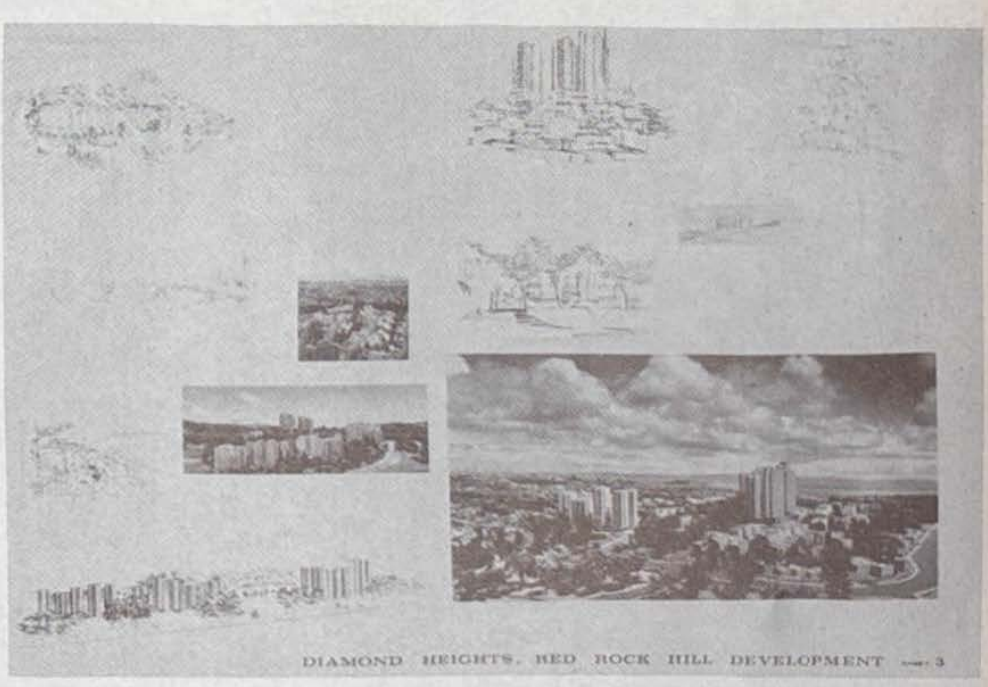
"Faced with the question of whether its own selections should reflect in this instance a continuity with the general pattern of San Francisco development, the members concluded that this facet is not of overriding importance. The area is visually separated from surrounding developments by major streets, a playground and the irregularities of the topography. The street pattern deviates from the grid pattern common throughout most of San Francisco. There is recognition of the fact that if part of the enjoyable aspects of San Francisco's architecture is variety, there can be real hazard in the insistence that some well-established pattern, in itself highly attractive and worthy of a place in the final selection, must necessarily be repeated to the exclusion of other approaches. Thus, the agency selections represent well-accepted and enjoyed designs of 'old' San Francisco and concepts that could be a new element for acceptance and enjoyment.

"To support the objective that development costs be kept within rea-



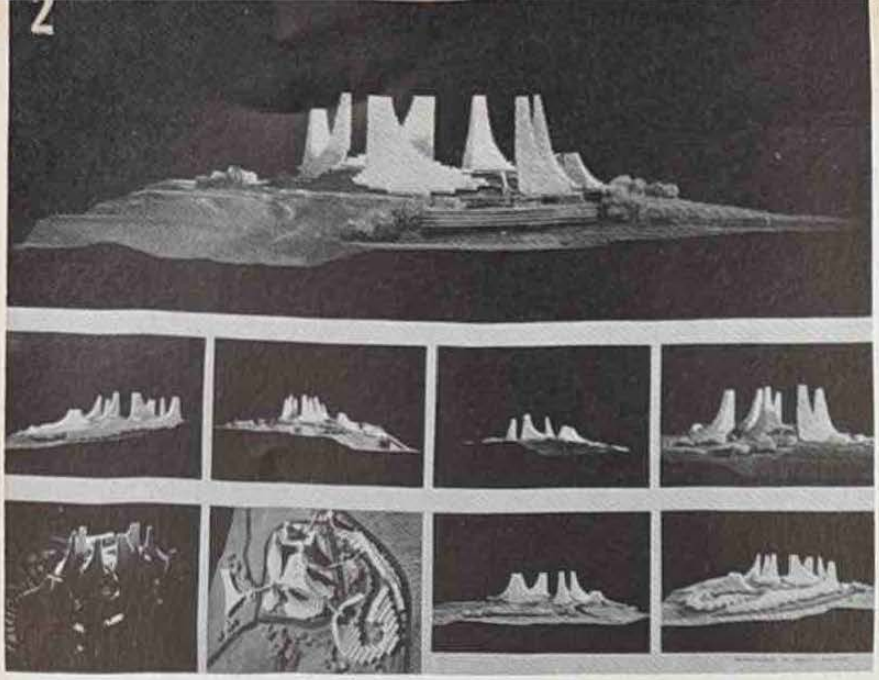
DESIGN TEAM: B. Clyde Cohen and James K. Levorsen, architects.

"The undulating linear forms of both the high-rise and low-rise units are sensitively adapted to the topography of the site. A laudable sense of unity is achieved through repetition of building segments and similarity of detail. The excellent character of building forms relates well to characteristic San Francisco architectural forms. The privacy and diversity of view from apartments is particularly commendable."



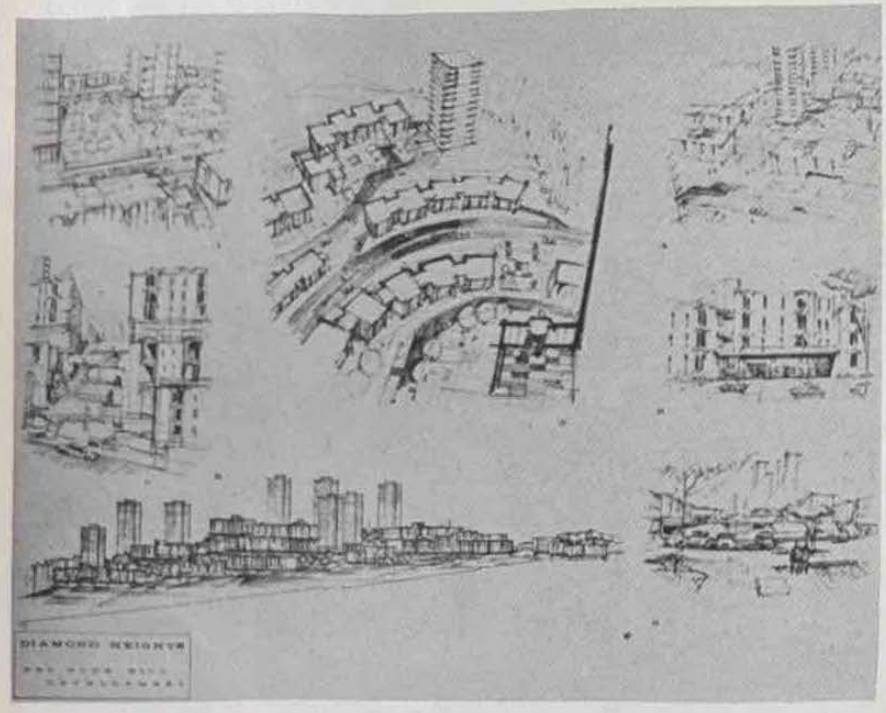
DESIGN TEAM: Reid, Rockwell, Banwell & Tarics, architects-engineers; Rai Y. Okamoto, architect; Royston, Hanamoto & Mayes, landscape architects.

"This sensitive grouping of high-rise clusters and low-rise hillside houses maximizes view opportunities in a highly imaginative manner. Sheltered recreation commons, a hilltop overlook accessible to the general public and a linkage with the San Francisco 'greenbelt' system are among the most praiseworthy elements of the site plan. The beautifully executed buildings have fine domestic scale and they incorporate unique structural techniques."



DESIGN TEAM: Jan Lubicz-Nycz, architect; John Karfo in association with Mario J. Ciampi, architect, and Paul W. Reiter, associate architect.

"This bold creative grouping of high-rise structures about the large hilltop piazza creates a beautiful landmark, giving new identity to the physical form of San Francisco. A high degree of organic units is achieved by the plastic and sensitive grouping of free forms. Close examination of the design reveals the practical construction possibilities of the seemingly radical forms. Large structures are created by a bringing together of a typical hillside step-down apartment with typical high-rise elevator apartments to create an imaginative new design direction. The thoughtful linking of apartment units to the piazza, bus stop, overlook and community center provides meaningful neighborhood organization."



DESIGN TEAM: A. M. Contopoulos and Russell Gifford, Albert R. Seyranian, Karl E. Treffinger and Paul A. Wilson, architects.

"This design successfully integrates free-standing towers with low-rise structures in a manner harmoniously adapted to the topography. Grouping of low-rise units to define common recreation spaces protected from the wind and the provision for an overlook accessible to the general public are particularly commendable. A functional pedestrian circulation system has been developed as a positive design enhancement."

sonable bounds, none of the four selected proposals suggests major deviations from the grading plan, street layout or utility systems which have already been incorporated into the site or which are now under construction.

"In a selection of this nature, a precise sequential rating is not desired; all of the 10 winners rated generally high in respect to the established criteria. In announcing the competition, the agency had indicated that it would select up to five designs. With admitted difficulty, it finally narrowed the field down to the designs it would strongly prefer to have built on the site. It has selected the four which in its judgment best meet the general standards of the program statement and of the agency's experimental attempt to encourage fine design along with practical marketing."

Dean Hurst to leave Auburn for Southern California

Samuel T. Hurst, 40, dean of the School of Architecture and the Arts at Alabama's Auburn University, has been named dean of the School of Architecture at the University of Southern California.



HURST

The new USC dean will assume his position in Los Angeles this fall or the first of next year. Prof. Henry Charles Burge has been acting dean the past year since Arthur B. Gallion resigned after 11 years to become director of planning for Harland Bartholomew & Associates, city planners-engineers in Honolulu.

Dean Hurst, a member of the AIA, received his bachelor's degree from Georgia Tech in 1942 and his master's from Harvard University in 1949. He recently received a new four-year appointment to the National Architectural Accrediting Board.

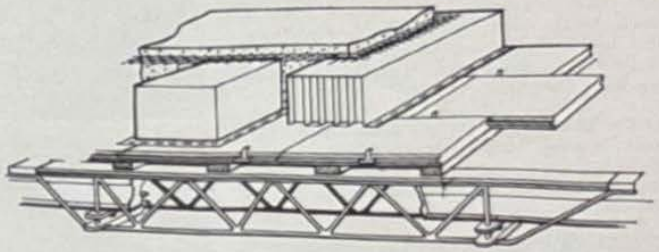
He has been a registered architect since 1950, a member of the Alabama State Board for Registration of Architects, the Auburn City Planning Commission, and the Association of Collegiate Schools of Architecture, serving as chairman of its committee on continuing studies. At Auburn he was also responsible for the departments of art, building technology, dramatic arts and music.

Before joining the Auburn faculty in 1957, Dean Hurst was an instructor in architecture at Georgia Tech and assistant professor at Tulane University.

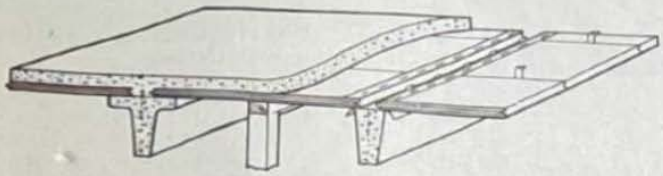
4 new ways to form concrete



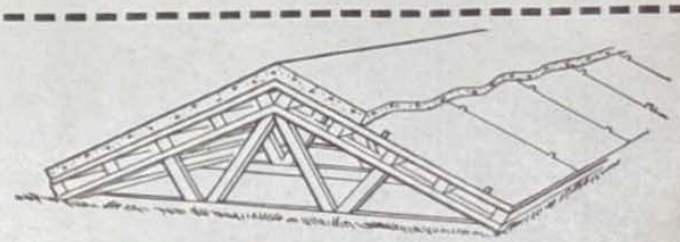
FLAT SLAB 2", 2½" and 3" Tectum form a solid base for flat slab forming of single or multi-level floors and ceilings. Tongue and groove joints, metal clips and natural bond with the concrete material assure positive support and installation in less time with uniform results. Tectum is shored until concrete cures. Tectum may be painted without materially affecting the acoustical value of the ceiling surface.



PAN SYSTEMS Tectum one and two-way pan systems utilize Tectum as a permanent forming material. Corrugated fiber pans are stapled to the Tectum decking which has tongue and groove edges on all four sides. Modular Tectum planks 2" x 30" x 96" are used for all two-way systems. Shoring members are positioned beneath each concrete joist. Reinforcing steel is laid between pans; steel mesh over the pans as illustrated. Tectum Form Plank for pan system construction has many advantages.



PRESTRESSED JOISTS Tectum has many applications on systems using prestressed concrete joists. With stirrups cast into the joists and with Tectum used as a forming material, the concrete slab ties directly into the structural system forming a tee-beam. Tectum form plank remains in place as a permanent acoustical ceiling and may be painted after moisture has drained from the slab. Economical wide span construction is possible in systems of this type.



PREFORMED SLABS The precasting of concrete slabs at the job site for folded plate and other roof deck sections can be economically and rapidly accomplished using Tectum form plank. Complete sections are cast over Tectum forms; form and slab are lifted from the shoring and allowed to cure at the job site. When ready for erection, the units are raised to the roof level and erected quickly and economically. This method saves time, material handling and eliminates conventional shoring expense.

Design Data

Tectum Form Plank

	FP200		FP250	
Concrete Slab Thickness	2" thru 4"	4" thru 8"	2" thru 4"	4" thru 8"
Max. Shoring Joist Spacing	24"	20"	28"	24"
Standard Form Plank Sizes (Covering Area)	22" x 48" thru 120" 30" x 48" thru 120"		22" x 48" thru 120" 30" x 48" thru 120"	
Modular Form Plank Size	2" x 30" x 96"		not available	
Noise Reduction Coefficient	.60-.70		.65-.75	

Note: 1" and 3" Form Plank also available

U-Values

AIR-TO-AIR

for Tectum Form Plank with sand and gravel concrete

Slab Thickness	Concrete Without Tectum	Concrete With Tectum	
		FP200 (2")	FP250 (2½")
3"	.980	.208	.174
4"	.910	.203	.172
6"	.785	.198	.167

Note: When lightweight concrete is used, the above values will be numerically lowered depending on the particular mix used.

Tectum®

Tectum Form Plank provides a permanent forming material with insulating and acoustical benefits for all types of construction. As a form, Tectum is structural, easily cut, can be shaped to the radii of many of the new curved shapes. Left in place, it becomes a permanent ceiling surface with an attractive acoustical texture for interior ceilings. The four methods illustrated represent the basic uses for this versatile material. Complete information on how to apply any of these methods will be sent on request.

Tectum CORPORATION

535 E. Broad Columbus 15, Ohio



JOHN JAY HOPKINS LABORATORY, San Diego: Charles Luckman Associates, architects; John & Neilsen, structural engineers; Haas-Haynie & Frandsen, Inc., general contractor; Apex Steel Corp., Ltd., fabricator.

FACULTY CLUB, Seattle: Paul Hayden Kirk & Associates, with Victor Steinbrueck, architects; Sigmund Ivarsson, structural engineer; Wick Construction Co., general contractor; Issacson Iron Works, fabricator.

BETHLEHEM STEEL CO. OFFICE BUILDING, San Francisco: Welton Becket & Associates, architects; Hayes & Little, structural engineers; Swinerton & Walberg Co., general contractor; Bethlehem Steel Co., fabricator.

HEADQUARTERS BUILDING of Sacramento Municipal Utility District, Sacramento: Dreyfuss & Blackford, architects; Lawrence G. Amundsen and Walter A. & Walter D. Buehler, structural engineers; Continental Construction Co. and Lawrence Construction Co., general contractors; Herrick Iron Works, fabricator.







Steel competition honors five western buildings

Five of the nine architectural firms who have received Architectural Awards of Excellence for steel framed buildings are in the West: three in California and one each in Washington and Colorado. The second-year program sponsored by the American Institute of Steel Construction drew 61 entries.

In addition to the two office buildings, a research laboratory and a faculty club shown here, the fifth winner (see photo on p. 27) is the First Federal Savings and Loan Association Building of Denver, designed by W. C. Muchow Associates. Ketchum, Konkel & Hastings were the structural engineers; Meyers Construction Co., general contractor; and Denver Steel & Iron Works, fabricator.

The four-man jury consisted of Thomas H. Creighton, editor of Progressive Architecture; Arthur Drexler, director of the department of architecture and design, Museum of Modern Art; Olindo Grossi, dean of the School of Architecture, Pratt Institute; and Morris Ketchum Jr., Ketchum & Sharp, New York architects.

AISC also cites bridge design in an annual competition.



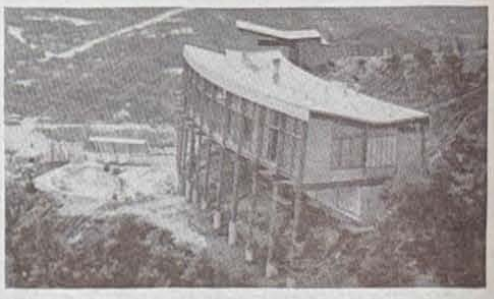
There's a quiet dignity, a quality of everlasting beauty in a church built of brick. Architects are enhancing this inherent charm by creative design, utilizing various of the colors and shapes produced by **builders brick co.** Seattle

Distributors—VANCOUVER, B. C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co.; EVERETT, The H. O. Seiffert Co.; MT. VERNON, Brick & Stone Supply Co. • Oregon: PORTLAND, Columbia Brick Works; CORVALLIS and SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.

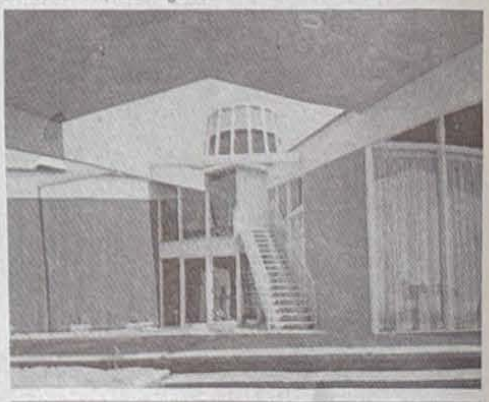


Research House, Flintridge, Calif., constructed with Rilco laminated wood beams and columns. Architect: John C. Lindsay, AIA, Los Angeles. Contractor: Norwood & DeLonge, San Marino, Calif.

designed with laminated wood



Below—Salton Rivera Hotel & Yacht Club, Salton Sea, Calif., constructed with Rilco laminated wood beams. Architect: Richard Dorman, AIA, & Associates. Contractor: Noxon Construction Co., Los Angeles.





The design freedom of wood when laminated by Rilco is unlimited. Versatile Rilco arches, beams and purlins are easily adapted to any architectural concept – make dramatic accents possible at a surprising low cost. And clients are especially pleased with the warm, natural beauty of carefully finished Rilco laminated wood structural members. Rilco field sales engineers will be happy to consult with you, without obligation. Write Weyerhaeuser Company, Rilco Engineered Wood Products Division, 616 Professional Building, Tacoma 5, Washington. BRoadway 2-2249.

Weyerhaeuser
RILCO ARCHES and BEAMS





WEEKEND SHELTERS on Lake Coeur d'Alene for Royal McClure and Tom Adkison: McClure & Adkison, architects; Bernt Stolass, contractor. "Highly experimental and marvelously creative, playful and different."



BRUCE M. WALKER RESIDENCE: Bruce M. Walker, architect; Bill Reese, contractor. "A well-done example of a house on a podium, very sophisticated and pleasant."



UNITARIAN CHURCH: McClure & Adkison, architects; Hazen & Clark, Inc., contractor. "Good spatial character and a sense of serenity in its interior."

Photo credits: Chas. R. Pearson, Robert J. Nixon (above); Morley Baer (top right).



T. J. MEENACH JR. RESIDENCE: McClure & Adkison, architects; Timothy Gunderson, contractor. "An example of a good open plan with long vistas, yet providing privacy in the desired areas."

Spokane AIA cites school and four other projects

In its second annual design competition, the Spokane Chapter, AIA, gave an Honor Award to the Wilbur, Wash., Elementary and High School (see photo on p. 26), designed by Kenneth Brooks & Associates and constructed by P & B Company of Washington, Inc. The jurors described the building as "well-proportioned, dignified and refreshingly free of cliche."

Merit Awards went to the four projects shown here at the annual meeting June 30.

T. J. Pritchard, head of the architectural department, University of Idaho, and president of the Idaho Chapter, AIA, spoke on behalf of the jury. Other members were architects A. O. Bumgardner, Seattle; O. Berg Jr., Bozeman, Mont.; and Charles W. Endicott, Eugene; and George H. Roberts, University of Idaho College of Fine Arts.

PA&B receives second award for layout and design

For the second successive year, Pacific Architect & Builder has been cited in the annual Merit Awards competition sponsored by the Western Society of Business Publications.

A third place for "outstanding artwork, layout and design" went to PA&B during the awards banquet in the Statler Hilton Hotel, Los Angeles, July 11. William G. Quinn, Southern California editor, received the certificate on behalf of the magazine.

The competition is open to business publications which headquarter in the 13 western states.

T-SQUARE TALK

new offices, partnerships

Howard Allen Kinney has established his own practice at 9046 39th S.W., Seattle. A graduate of the University of Washington, he has had nine years' experience with local offices.

Architects Paul W. Rader and Rush J. McCoy have formed a partnership, Rader & McCoy, with offices at 6915 Lakewood Place, Denver. For the past two years McCoy has been associated with Rader, who established his practice in 1950. Both are University of Nebraska graduates.

new associates

Raymond Harry Ervin, Denver consulting architect, has added three associates to his firm now known as Raymond Harry Ervin & Associates. They are D. R. Roggenbach, R. E. Zermuehlen and K. C. Maetzold.

Wheeler & Lewis, Denver architects, have appointed Larry L. Bourn and Stanley M. Goldberg as associates and promoted Stephen E. Kirkman to chief draftsman.

firm changes

The firm of Combs & Whisler, San Francisco architects, has been dissolved. Wilson Combs is now in partnership with Sprague Thresher under the name of Combs & Thresher, continuing to practice at 473 Jackson St. Francis L. Whisler has established his own office at 535 Pacific Ave.

Alan Golin Gass continues his practice in the Denver Hilton Offices, 1515 Cleveland Place, Denver, under the firm name of Alan Golin Gass and Robert Brewster Gay, associated architects.

Two new firms have been organized following the dissolving of Weed, Wallace & Associates, Honolulu architects. Principals in the partnership of Weed & Kelley, 2157 Kalakaua Ave., are Edwin Weed and Ormond L. Kelley, with the latter in charge; in the partnership of Wallace & Moody, 861 Mapunapuna St., Howard Wallace, architect, and Max W. Moody, engineer.

The firm of Culbertson, Gibbon & Wiederholt has moved from its offices at 800 University Ave., Berkeley, and the principals are continuing to practice architecture as individuals rather than as associates except for certain work now under contract. Thomas M. Culbertson is located at 1746 Shattuck Ave., Berkeley; Austin Howard Gib-

bon, 411 Fourth St., San Rafael; and Ned B. Wiederholt, 1940 Francisco St., Berkeley.

elections, appointments

✔ Seattle Chapter (formerly Washington State), AIA, has picked Hugo Osterman as its first president under the new name. Completing the slate are Ibsen A. Nelsen, first vice president; Dan F. Miller, second vice president; David A. McKinley Jr., secretary; and Gene Martenson, treasurer. The name change recognizes two other AIA chapters now active within the state and the formation last year of the Washington State Council of Architects.

✔ Wyoming Chapter, AIA, has elected Harold D. Engstrom of Casper as president. Robert W. Postin and Morris D. Kemper, both of Cheyenne, are vice president and secretary-treasurer, respectively.

✔ Spokane Chapter, AIA, has named this slate of officers: John McGough, president; Fulton G. Gale Jr., vice president; Frederic A. Long, secretary; N. A. Kabush, treasurer.

✔ Among the executive committee members of the newly formed Citizens' Planning Council in Seattle are two architects: Theodore D. Bower and Victor Steinbrueck. The committee will serve until election of officers in September (see "Not Specified").



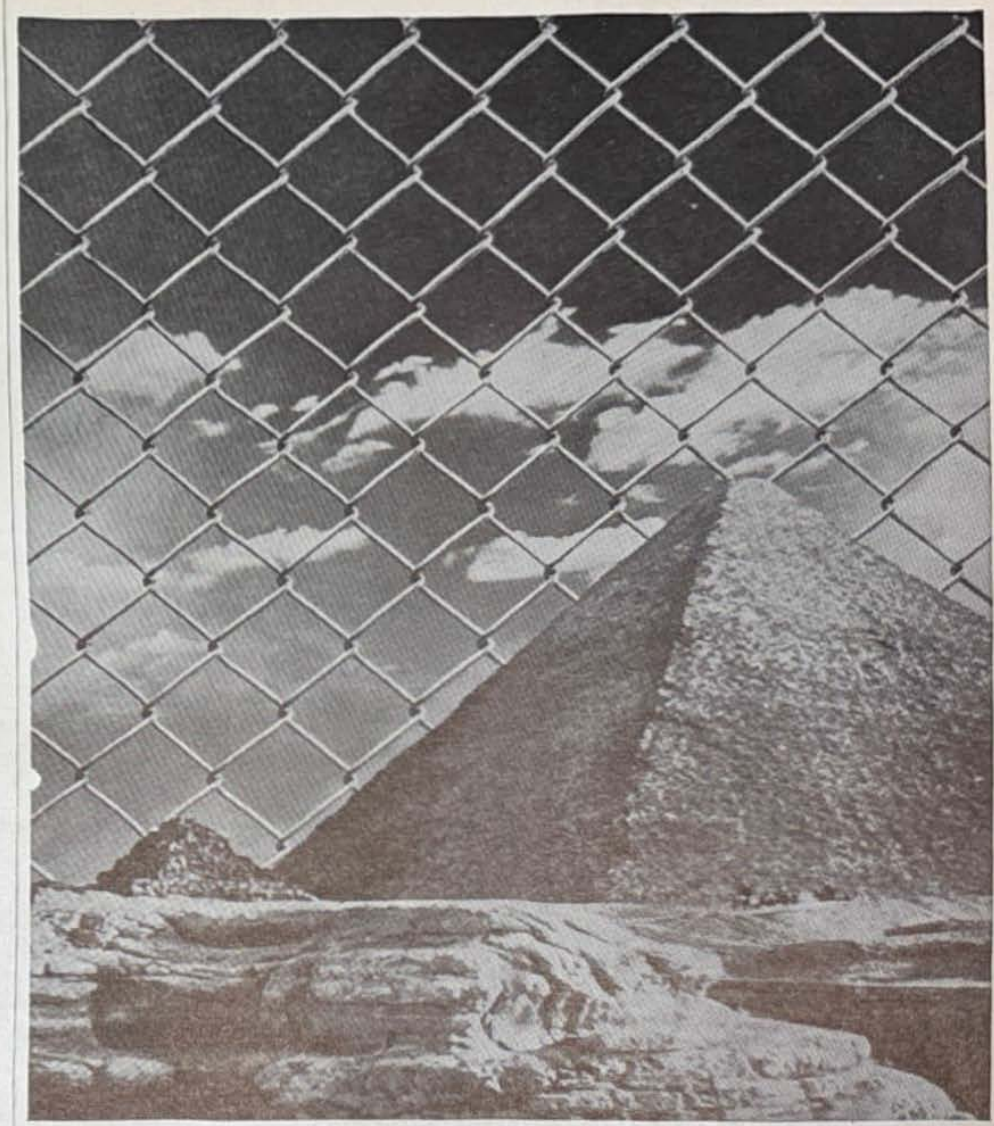
MAN-MILE TROPHY

given each year by Construction Specifications Institute at national convention is received by Seattle architect Kenneth C. Helms on behalf of Puget Sound Chapter from David Todd of host New York Chapter. Award is made to chapter with largest number of delegates and wives traveling greatest distance. Another architect, Vincent G. Raney of San Francisco, was elected vice president.

DRAFTSMAN — POSITION WANTED

• A partly bald, partly grey draftsman is dignified and experienced while working. He can bring you 12 years working drawing experience on homes, stores, factories and schools. He earned from $330 - $550 monthly and graduated from Pratt Institute, N.Y.C. 1935.•

WALDO SHARP
Route 1, Box 16 - Yelm, Washington



Realock Fence is built to last a long time, too!

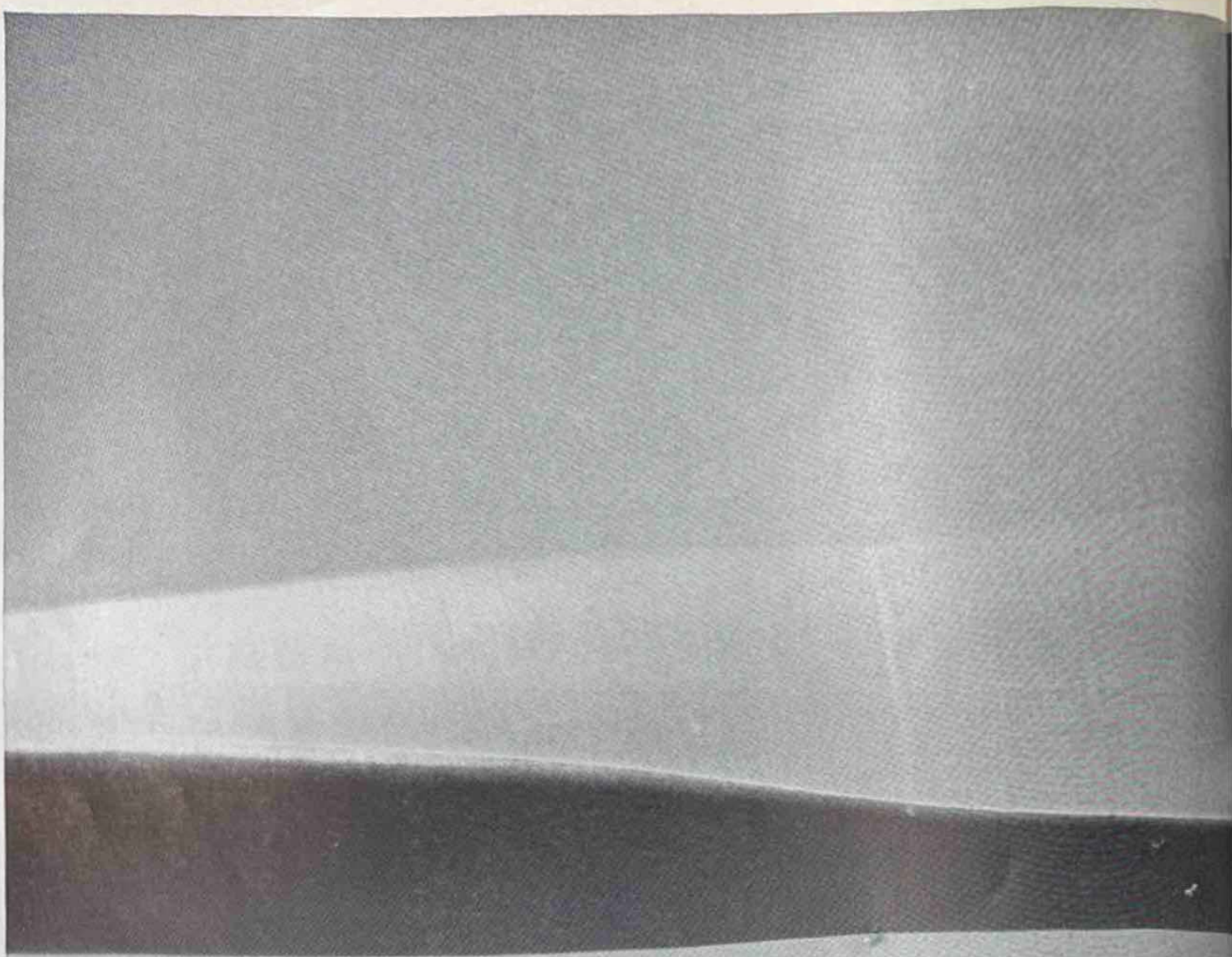
Made of top grade steel wire, Realock Fence is strong and durable . . . and is heavily galvanized to resist corrosive elements.

Available in a wide variety of styles, Realock Fence is ideal for protection of buildings, grounds and equipment . . . and is widely used in right of way installations where limited access is essential. For a free estimate, call the nearest CF&I office.

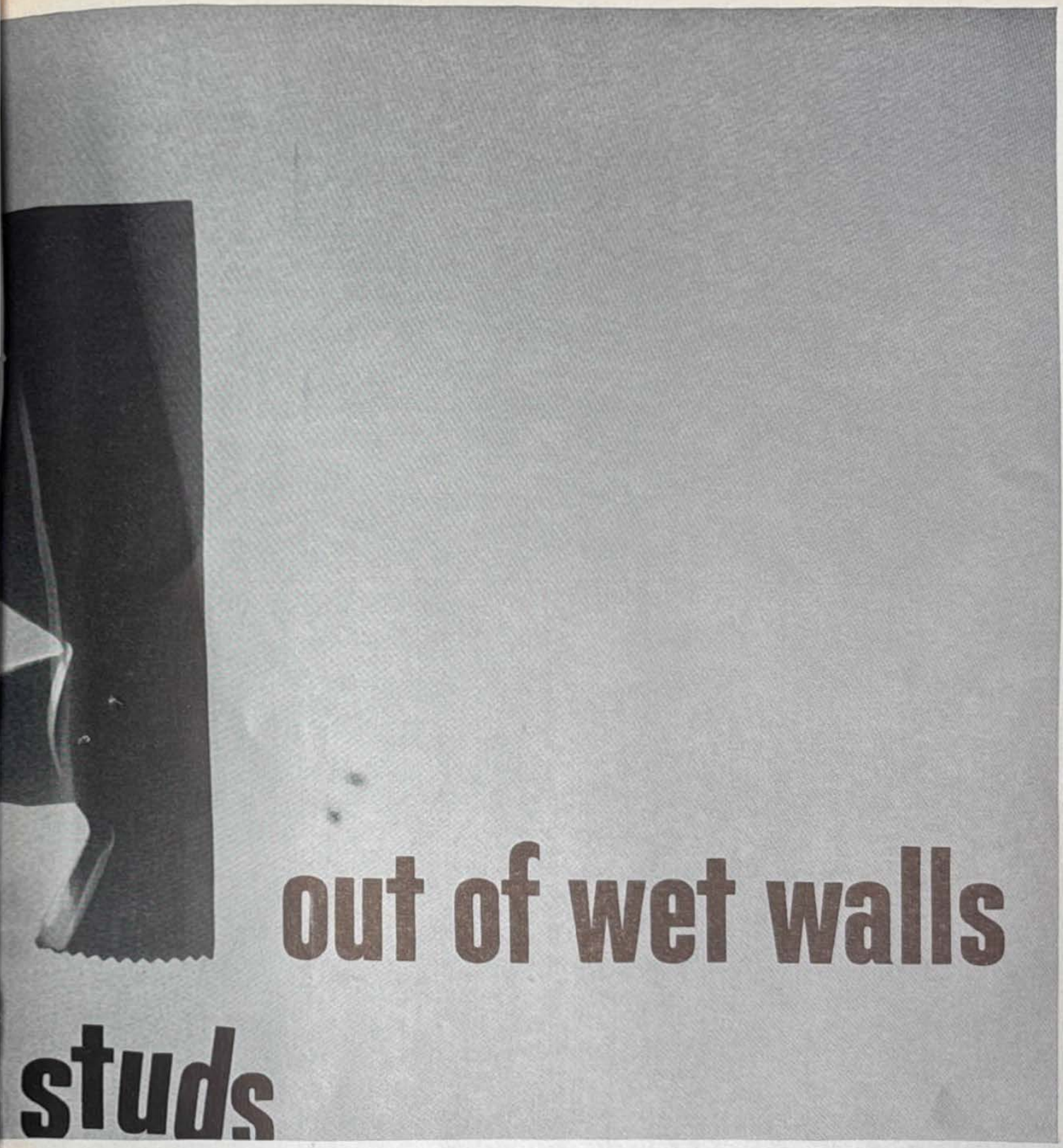


Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

THE COLORADO FUEL AND IRON CORPORATION



now Pabco knocks th

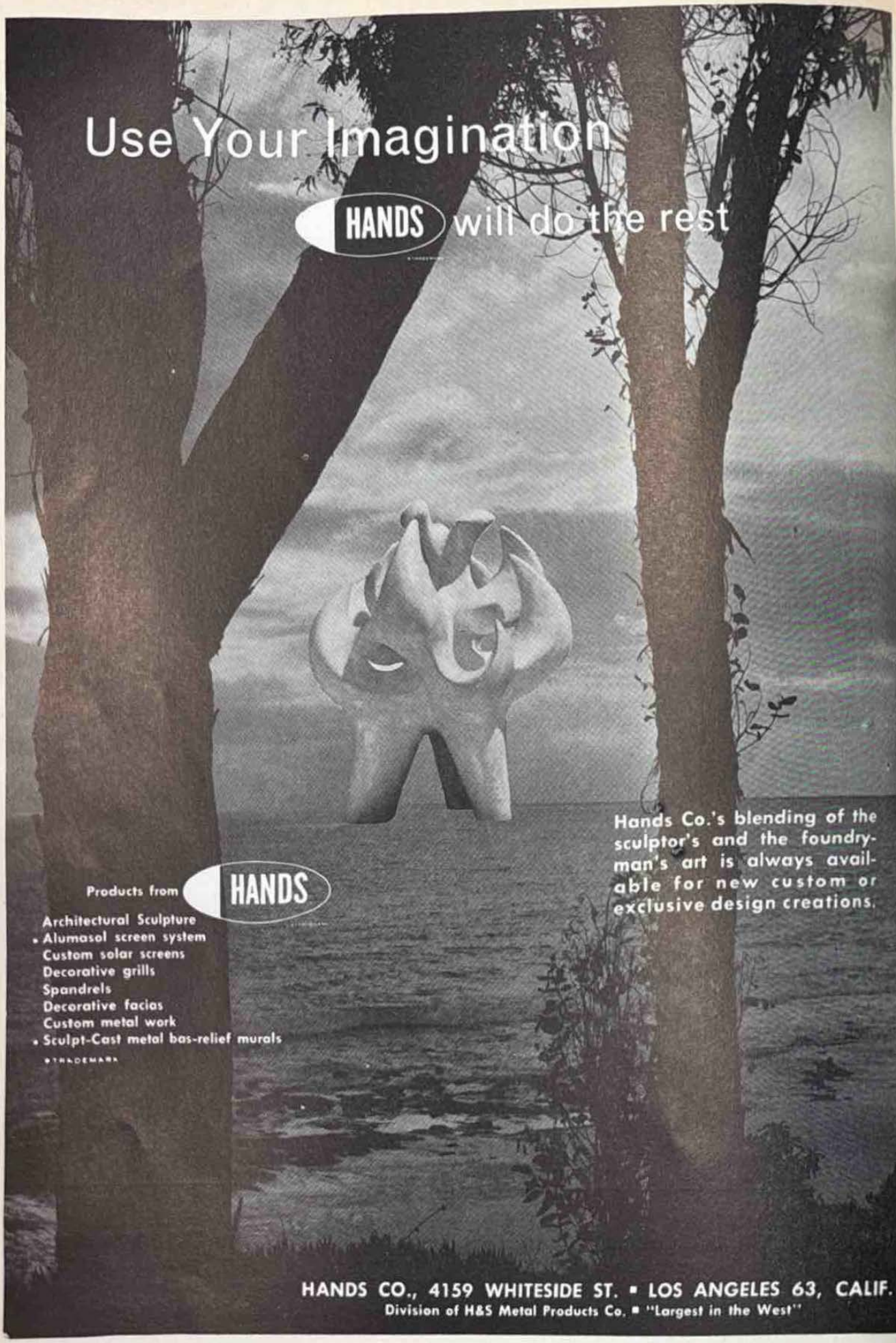


out of wet walls

studs

with new Key-Grip Wall 40. It's the first hollow 3" thick non-load bearing gypsum lath and plaster partition system to eliminate wood studs. You save time, save money, save valuable floor space—nearly one square foot for every five lineal feet of partition. And you have a plastered wall that's strong, fireproof, versatile for handling electrical conduit—and one that has excellent sound-proofing qualities (average sound transmission loss: 40 decibels!). For architectural details and specifications on Key-Grip Wall 40 write today to: Pabco Technical Services, Fibreboard Paper Products Corporation, 475 Brannan Street, San Francisco, California.

GYPSUM ROOFING AND SIDING, INDUSTRIAL PRODUCTS, PAINT . . . FROM PABCO DIVISIONS OF FIBREBOARD PAPER PRODUCTS CORPORATION. FIBREBOARD IS ALSO THE WEST'S LEADING PRODUCER OF PAPERBOARD AND PACKAGING.

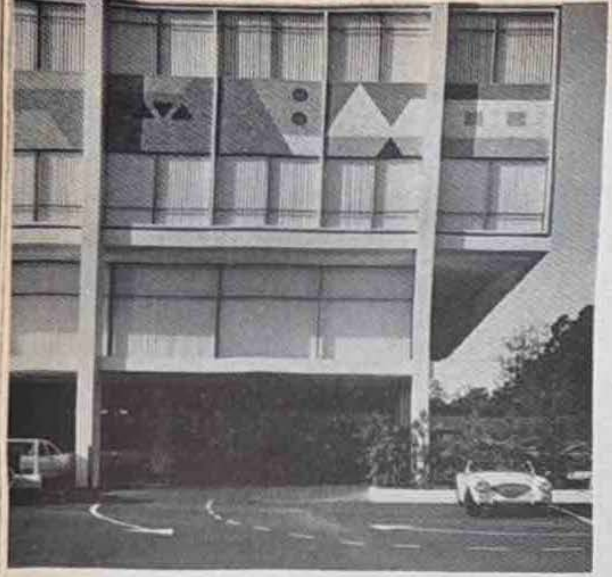

Use Your Imagination
HANDS will do the rest
Hands Co.'s blending of the sculptor's and the foundryman's art is always available for new custom or exclusive design creations.
Products from HANDS
Architectural Sculpture
• Alumasol screen system
Custom solar screens
Decorative grills
Spandrels
Decorative facias
Custom metal work
• Sculpt-Cast metal bas-relief murals
HANDS CO., 4159 WHITESIDE ST. ▪ LOS ANGELES 63, CALIF.
Division of H&S Metal Products Co. ▪ "Largest in the West"

Pacific Architect & Builder
August 1961

Becket's home office in Century City

Marvin Rand photos





CONTINUOUS MURAL, 8 ft. high and 734 ft. long, extends around all four sides of building as spandrel between two cantilevered levels. Depicting architectural shapes and forms, it was executed in native desert stone by Richard Haines. Employee parking is at rear.

Home Office Building
Welton Becket & Associates
Los Angeles, California

•

WELTON BECKET & ASSOCIATES
Architects-Engineers

STACY & SKINNER
Structural Engineers

C. L. PECK
General Contractor

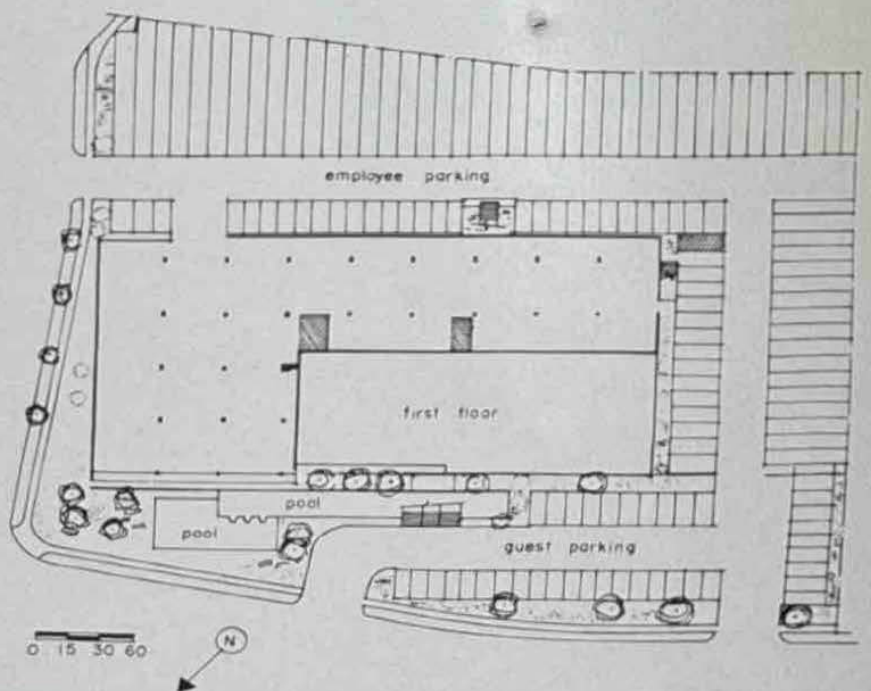


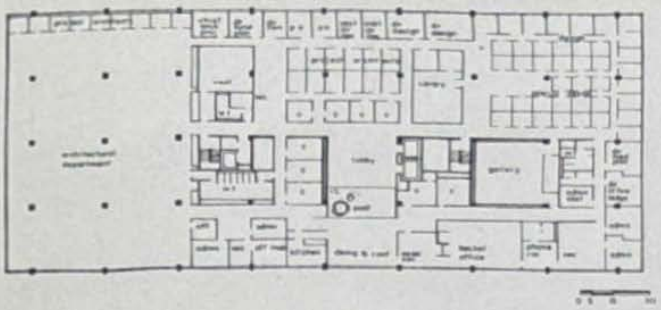
When an architectural firm has designed more than $2 billion worth of structures around the globe for a host of other companies, its own headquarters building is sure to arouse more than ordinary interest.

Use was made of the sloping site, adjacent to the huge Century City development on the 20th Century Fox lot, so that the main entrance is on the second level, reached by a sculptured bridge over a series of reflecting pools with 10 fountains.

A basic rectangular structure banded by a colorful mural, the building's third and fourth levels cantilever outward 10 ft. at either end and the fifth level forms a large penthouse. Walls are glass, punctuated by structural columns in white with flecks of mica.

While the embellishments naturally draw first attention, this is also a building efficiently designed to integrate the various functions of a large architectural and engineering





FOURTH FLOOR

staff. Each floor is planned around a compact central core containing a lobby, elevators, stairways, restrooms and mechanical and utility rooms. Building is laid out on a 4-ft. 10-in. module. Movable partitions, underfloor power communications and demountable acoustical tile ceilings with movable recessed combination lighting-air conditioning fixtures provide a high degree of flexibility.

Principal reception area for the architectural offices is on the fourth level, with design, production and administration grouped around the lobby. Placed between the latter and work areas are conference rooms of varying sizes for meeting with clients and vendors.

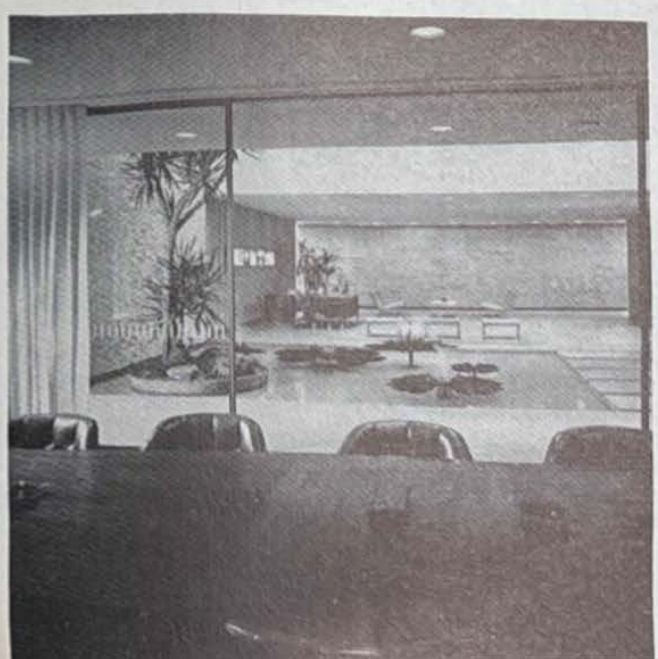
Exterior and interior designers and decorators are grouped together in the design section. Peripheral offices are fully partitioned while the rest of the floor has 4-ft. high dividers. This area is served by a centrally located materials and periodicals library. Between design and production are offices of the project architects. Administrative offices extend along the north and west walls.

Third floor contains mechanical and electrical engineering sections, a merchandising division which concentrates on department store interiors, specifications staff and other offices, plus a leased suite of Stacy & Skinner, consulting firm which does much of Becket's structural engineering.

Fifth level penthouse has a 200-seat employee cafeteria opening onto an outdoor dining terrace and landscaped courtyard.

Landscape architect was Robert Herrick Carter.





FOURTH FLOOR LOBBY (left and above) features two-story court illuminated by skylight and containing blue mosaic tile reflecting pool with circular planter and five sculptured fountains by Cliff Nelson, each with its own shape and spray pattern. Specially designed aluminum grill is suspended beneath translucent ceiling above pool which is crossed by large stepping stones. Lobby is paneled in vertical grain spruce except for precast quartz panels on either side of pool and 9x30-ft. sandcast cement block mural by John Smith illustrating scenes from Trojan Wars on south wall. Floor is quarry tile. Bright red carpet defines waiting and reception area.



FIFTH LEVEL COURTYARD with reflecting pool and spray fountain on north side is open to sky. Retractable striped awnings control sun.



EMPLOYEE CAFETERIA seating 200 has full-wall yarn-in-burlap tapestry by John Smith entitled "The Wonderful World of Ghostly Goat." Outdoor dining terrace is on south side.



OUTLINE SPECIFICATIONS

Structure: foundation, frame, roof and floors: reinforced concrete.

Exterior Finish: mica flecks—Magna Coating Co.; stone mosaic mural bench set into epoxy plastic binder, moved to site on 9x8-ft. plywood pallets, erected and secured to exterior metal studs, back-plastered before removal of pallets.

Roof Surfacing: composition and gravel—Pioneer-Flintkote.

Windows: aluminum sash; plate glass—Libby-Owens-Ford Glass Co.

Doors: exterior: aluminum and glass; interior: painted birch—Los Angeles Millwork Co.; sliding glass—Glide Windows, Inc.

Floor Surfacing: quarry tile on fourth floor lobby and fifth floor lounge—Mosaic Tile Co.; vinyl tile in public corridors and lounge — Robbins Floor Products, Inc.; carpeting in offices and drafting rooms.

Insulation: thermal: 2-in. fiberglass in walls —Owens-Corning Fiberglas Corp.; 2-in cane fiber in roof—Pioneer-Flintkote; 2-in. fiberglass in fan units—Owens-Corning Fiberglas Corp.; acoustical: 1-in. demountable mineral tile suspension system —Celotex Corp.

Interior Finish: vinyl covering on plaster walls; teak paneling in Mr. Becket's office; spruce paneling in elevator lobbies; custom-designed movable partitions—E. F. Hauserman Co.

Lighting: incandescent fixtures — Century Lighting, Inc., and Lightolier Co.; 1x4-ft. fluorescent recessed fixture with integral air conditioning outlets—Solar Lighting Co.

Heating and Air Conditioning: aluminum double-duct system with separate zones for each office — Westinghouse Electric Corp., American Air Filter Co., Tuttle & Bailey Pacific, Inc., Carrier Corp., Minneapolis-Honeywell Regulator Co., Cleaver-Brooks Co.

Plumbing: American-Standard.

Total Area: 130,000 sq. ft.

Total Cost: $3,500,000.

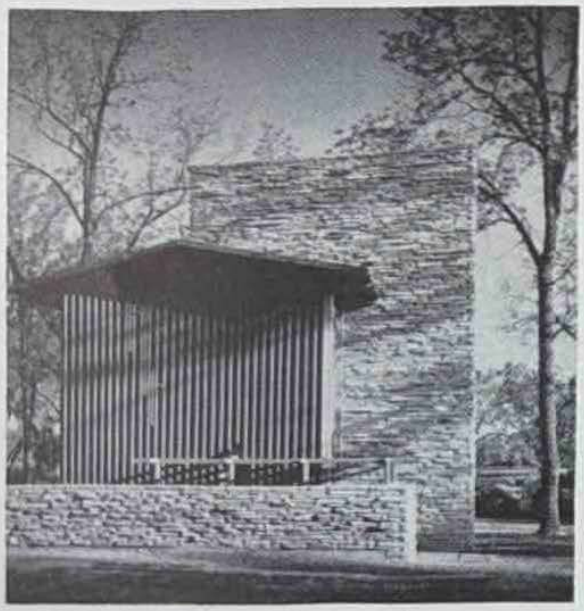
Date of Completion: September 1960.

Contemporary architectur



WILBUR ELEMENTARY AND HIGH SCHOOL, Wilbur, Wash.

KENNETH W. BROOKS, AIA
Kenneth W. Brooks & Associates
Spokane, Washington



DANFORD MEMORIAL CHAPEL, Fort Collins, Colo.

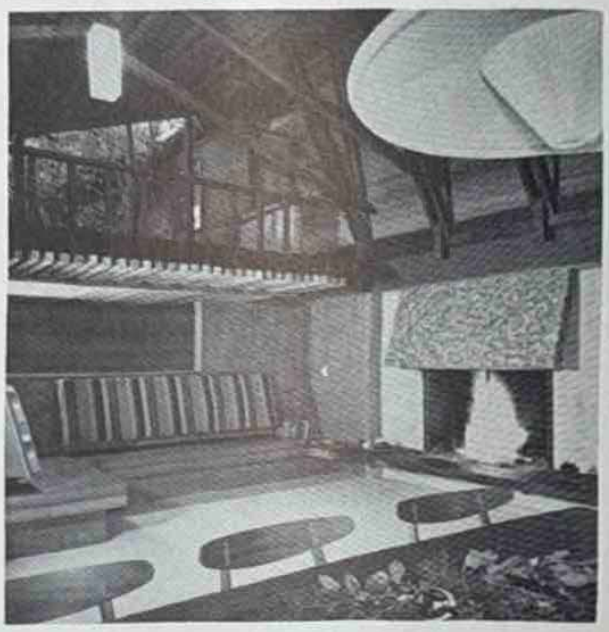
JAMES M. HUNTER, FAIA
James M. Hunter & Associates
Boulder, Colorado

When the University of Illinois held its 1961 "Festival of Contemporary Arts" this spring, it included an exhibition of photographs, drawings and models of recent work produced by its architectural graduates. Interestingly enough, 11 of the 18 firms represented are located in the West. And just for good measure, a lecture on "Aspects of Contemporary Architecture" given in conjunction with the show was delivered by a San Franciscan, Mario J. Ciampi.

Photo credits: Chas. R. Pearson, Vern and Elizabeth Green, Warren Reynolds, Stone & Steccati (above); James R. Roberts, Beinlich (across page).

A. O. BUMGARDNER, AIA
A. O. Bumgardner & Partners
Seattle, Washington

RESIDENCE for Dr. and Mrs. Richard E. Rust, Seattle.



DONALD KNORR, Architect
Knorr & Elliott
San Francisco, California

DUX, INC., PLANT AND OFFICE BUILDING, Burlingame, Calif.



KENNETH N. LIND, AIA
Kenneth Lind Associates
Los Angeles, California

HOLLYWOOD BILTMORE APARTMENT HOTEL, Hollywood, Calif.



niversity of Illinois graduates

CHARLES LUCKMAN, AIA
Charles Luckman Associates
Los Angeles, California

NORTRONICS RESEARCH CENTER, Palos Verdes, Calif.



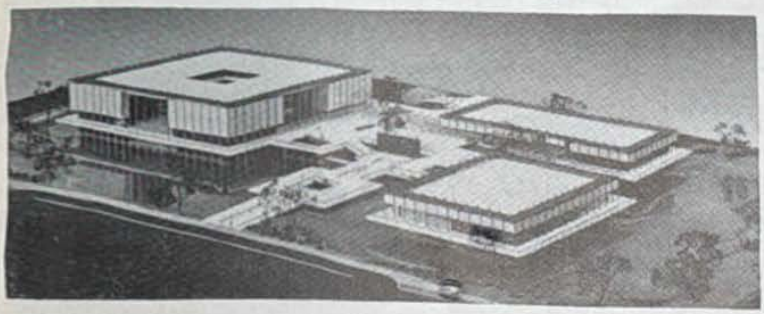


FIRST FEDERAL SAVINGS AND LOAN BUILDING, Denver.

WILLIAM C. MUCHOW, AIA
EARL W. HENDERSON
FRANK C. ZANCANELLA
W. C. Muchow & Associates
Denver, Colorado

WILLIAM L. PEREIRA, FAIA
William L. Pereira & Associates
Los Angeles, California

LOS ANGELES COUNTY MUSEUM OF ART, Los Angeles.





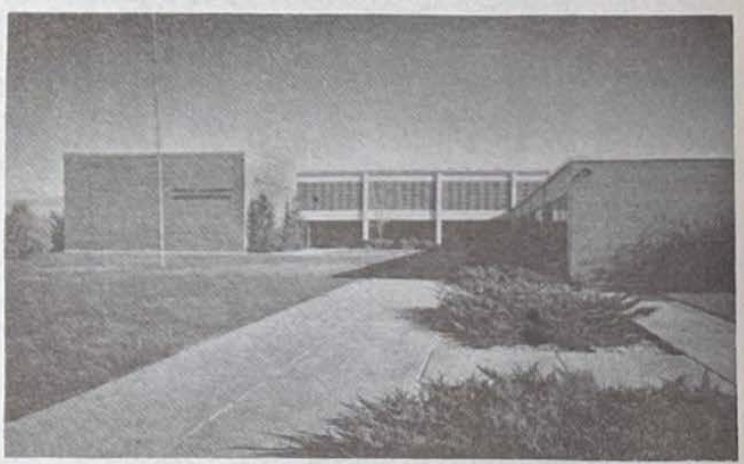
SACRAMENTO COUNTY COURTHOUSE, Sacramento.

DANIEL J. NACHT, AIA
Starks, Jozens & Nacht
Sacramento, California

EMERSON C. SCHOLER, AIA
SANTRY C. FULLER, AIA
Scholer & Fuller
Tucson, Arizona

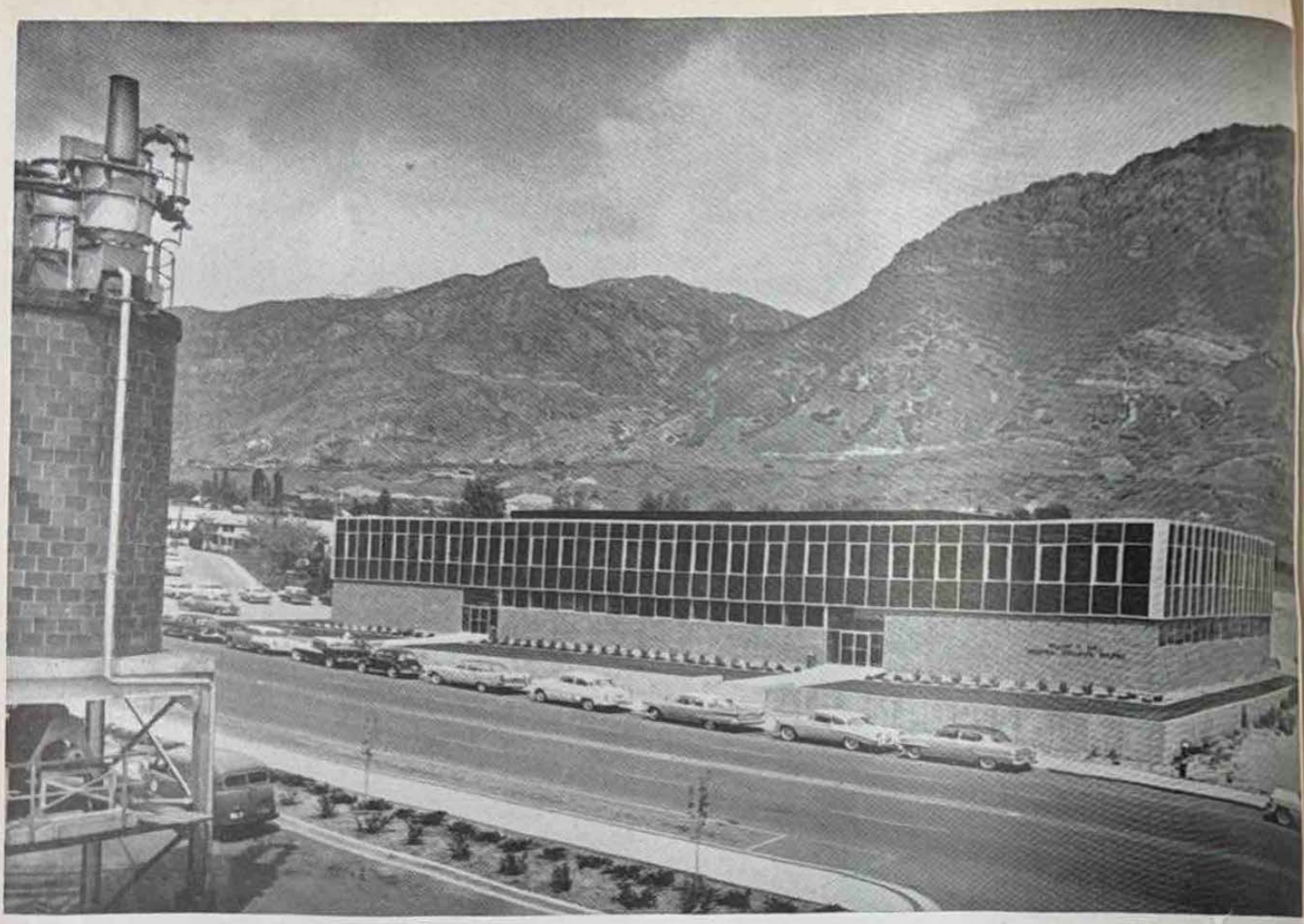
ALL SAINTS EPISCOPAL CHURCH, Phoenix.





PUBLIC SCHOOLS ADMINISTRATION BUILDING, Albuquerque.

DONALD P. STEVENS, AIA
Ferguson, Stevens, Mallory & Pearl
Albuquerque, New Mexico



LIGHT STRUCTURE is tied to ground with buff-colored face brick base which sits on podium of concrete retaining walls striated at 4 ft. 6 in.

Industrial Education Building
Brigham Young University
Provo, Utah

•

DEAN L. GUSTAVSON ASSOCIATES
Architects

HOFFMAN C. HUGHES
Structural Engineer

GARFF, RYBERG & GARFF CONSTRUCTION CO.
General Contractor

WEST ELEVATION as viewed from campus has double-glazed insulating glass.



William Beal photos

Custom curtain wall's rhythm peps up utilitarian shops

To EXPRESS the nonstructural character of the architect-designed curtain wall system, emphasis is placed on the closely spaced rhythm of the vertical wind mullions and the pattern achieved by the alternating pivoted sash. Charcoal color of the spandrels chosen to blend with the dark gray of the plate glass further accentuates this rhythm.

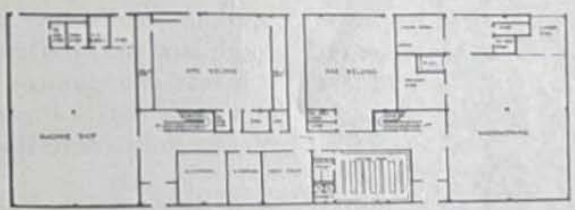
Requirements called for a two-story structure and a gas generator building providing facilities for woodworking, gas welding, arc welding, machine and general shops, three drafting rooms and graphic arts with their allied classrooms. Compounding the problem was the fact that each function is interrelated and a complex system of service, electrical and mechanical equipment is necessary.

Basic design concept locates the shops requiring heavy equipment and readily accessible service facilities on the first floor. Since natural light is not required, and usually not wanted in these circumstances, the entire first floor has high strip windows with pivoted ventilators.

Second floor, housing drafting, graphic arts, etc., is opened up to take advantage of natural light. The curtain wall employs heat-absorbing, glare-reducing, gray plate glass for vision areas. Entire west elevation has a system of double-glazed insulating glass (outside gray, inside clear) to minimize solar gain. Top and bottom spandrels are porcelainized tempered glass. Center vision panel is an alternating breakup of fixed movable panels. Audio-visual drapes and vertical venetian are combined for light control.

Neoprene rubber gasket (similar to that in automotive glazing) is used to mount glass units. Pivoted sash has a 1/4-in. leg extruded at the perimeter which is inserted in the gasket. Vertical fenestration—wind mullions and spanners—are T-shapes of extruded aluminum.

Building is located on gently sloping bench land, east of the university proper, sited in accord with a master plan regarding traffic, parking areas and existing facilities.



FIRST FLOOR



INTERIOR NEUTRAL SHADES of tan and blue-white are accented by primary colors on doors, rails, etc.



SAWDUST EXHAUST SYSTEM is supplied to woodworking and general shop equipment.

OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete spread footings; frame: steel—Pacific Iron & Steel Co.; two-hour plastic membrane—Bestwall Gypsum Co., United States Gypsum Co.; floors: concrete—Ideal Cement Co.

Exterior Finish: aluminum curtain wall—Cupples Products, Inc.; heat-absorbing plate glass—(Twindow) Pittsburgh Plate Glass Co., (Lustragray) American-Saint Gobain Corp.; face brick—Utah Fire Clay Co.

Roof Surfacing: five-ply built-up—Certain-teed Products Corp.

Windows: aluminum sash—Cupples Products, Inc.

Doors: exterior: aluminum—(Amarlite) American Art Metals Co.; interior: (PyroDoor) Dusing & Hunt Inc.

Floor Surfacing: 7/32-in. vinyl asbestos tile—Kentile, Inc.; terrazzo in interior entries and stairways.

Interior Finish: painted exposed concrete block; face brick in corridors.

Ceilings: suspended acoustical in classrooms, offices and corridors—Owens-Corning Fiberglas Corp.; exposed fire in shops—Bestwall Gypsum Co., United States Gypsum Co.

Lighting Fixtures: recessed—Sunbeam Lighting Co.; industrial fluorescent — Westinghouse Electric Corp.

Heating: warm water radiation fed from central boiler plus overhead tempered air system; cooling from evaporative cooler—Warren Webster & Co., American Blower.

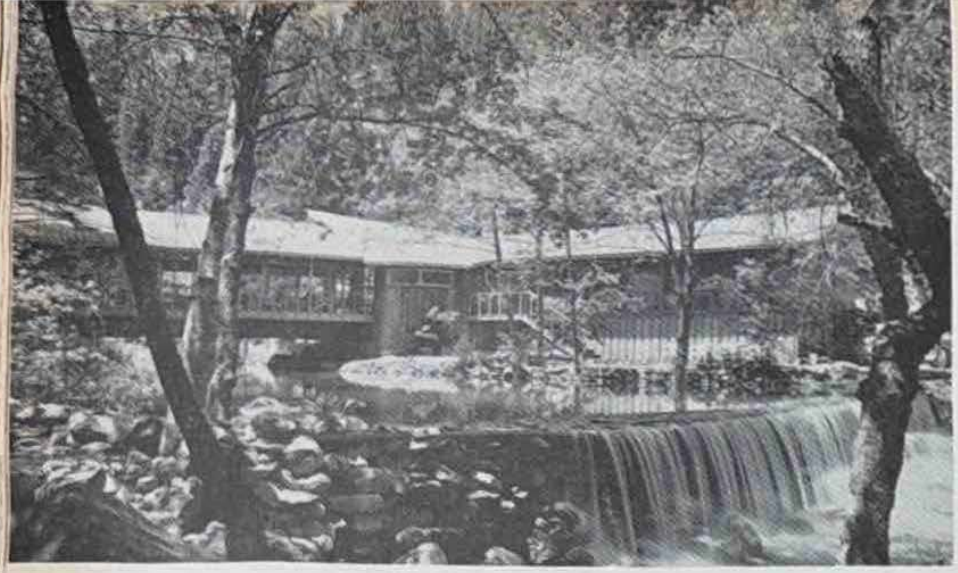
Plumbing: American-Standard.

Total Area: 33,862 sq. ft., main building; 644 sq. ft., generator building.

Total Cost: $614,800.

Cost per Square Foot: $17.75.

Date of Completion: January 1960.

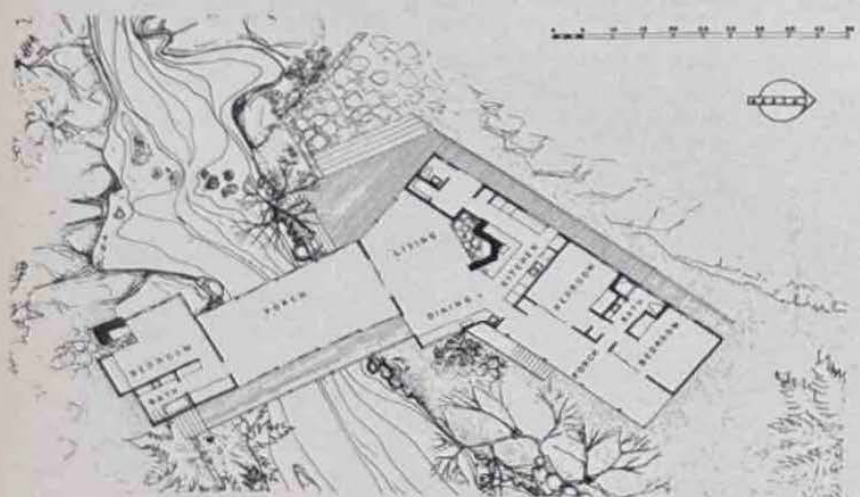


LOW DAM creates quiet poolside setting for summer home in Sierra Nevada.

Skelton photos



EXTENSIVE EXCAVATION is eliminated through use of steel bridge anchored to bedrock on opposite sides of creek. Total cost for steel in place: $1,500.



Filmer Summer House
Downieville, California

•

FRANCIS JOSEPH McCARTHY
Architect

A. V. SAPH JR.
Structural Engineer

CLARENCE V. DAWE
Contractor

Nature fully understood and undisturbed

SCARCITY of level land on this rugged wood land site led to an unusual design solution bridging the creek with the house. Site o the summer residence is on an old minin claim which runs along Jim Crow Creek i the Sierra Nevada. Property is extremel steep, the only level spot being a small are by the creek bed.

Spanning the creek are two steel beam 49 ft. long secured with anchor bolts t concrete abutments poured on bedrock a the creek banks. On the bridge is an en closed porch with sliding glass doors open ing onto a balcony. The porch connect the master bedroom, which is on one side o the creek, with the living and dining area and guest bedrooms on the other side.

Five porches in all, two of them enclosed make up nearly half of the 3,000-sq. ft house. These porches and the combinatio living room, dining room and kitchen ar rangement provide both an informal at mosphere and the need for minimum up keep.

Exterior and interior walls are finished with clear redwood board and batten. Stee beams under the house are painted a dul blue-black to blend with shadows and wa ter. Walkway provides foot room for wash ing windows.

Low dam located downstream creates a quiet pool of deep water and lowers the noise level of the rushing creek. Dam is cut away in the fall so debris won't mount up behind it when the house is vacant.



THREE-DIMENSIONAL EFFECT of Trofdek used as structural roof is well illustrated here.

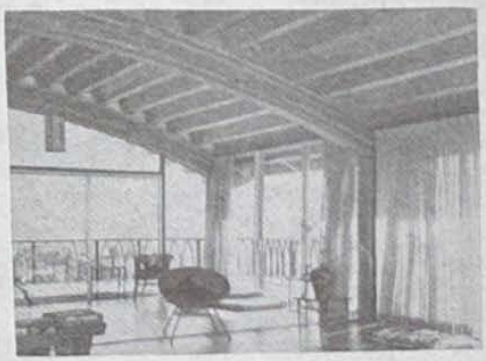
Roof system develops space at low cost

Structural roof and finished ceiling of architect Michel Marx's home in San Francisco is made up of Trofdek, a building component fabricated of fir plywood and lumber.

Use of the relatively new material enabled the architect to achieve the lofty appearance he desired and at the same time save him money. Because the roof system is extremely light in weight for long-span construction, it was possible to save about $2 psf. in building costs over comparable hillside homes in the area since foundation work was kept to a minimum.

The two-level house juts out from a 20% slope, with living area, kitchen, bath, dining and master bedroom on the upper floor and bath, bedroom and room for two more bedrooms later, below. Upper level is a 30x64-ft. rectangle with no interior bearing walls. Whole roof load is carried by glued laminated arches generally on 16-ft. centers.

Trofdek panels used here are the 4x16 and 4x24-ft. sizes. The product resembles a miniature folded plate and carries loads under the same principle. Spans were limited to 16 ft. because the architect felt that the solid appearance of the arches and supporting posts contributed to the effect he wanted. The 24-ft. sections were used only at ends of the roof to provide for an 8-ft. overhang.



ROOF SYSTEM provides high, vaulted ceiling, eliminates interior bearing walls.

Raceway for electrical conduit and a 2-in. blanket of insulation were built into the Trofdek, which was fabricated from A-C fir plywood by Berkeley Plywood Co., a licensee of Plywood Fabricator Service, Inc. Exposed A-face was left to darken with age to silver gray. In a few areas skylights are used, but elsewhere the folded effect is unbroken. Gentle curve of the ceiling from 8 ft. at the plate to 11 ft. 6 in. at the center was easily accommodated.

On the exterior, a skin of ⅜-in. PlyScord with exterior glue was power-screwed on as a roof deck. Screws were used because of potential nail holding difficulty with a curved surface. A layer of 15-lb. felt, resin sized paper and 20-gage sheet metal finished off the roof.

The five arches are 30 ft. long, curved to a 34-ft. radius. In section they are 5x15⅝ in. They rest on 8-ft. glued laminated posts that taper downward from 16 to 6 in. To prevent deflection from springing the lower wall, the beams are rigidly connected to a 1 ft.-thick masonry wall at the back of the house, but rest at the lower end in slip joints. A slotted metal yoke connects the arches to the posts.

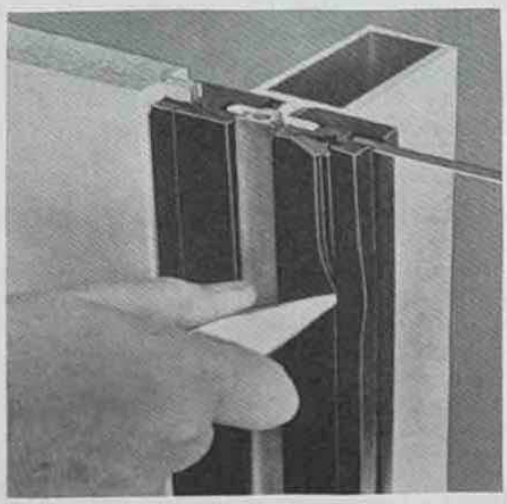
Concrete and masonry wall at the rear of the house is connected to the 4-in. slab on grade. Most other walls are framed with 2x4s 16 in. o.c. All exterior walls are sheathed with PlyScord finished with vertical resawn shiplap redwood. Similarly framed interior walls are covered with gypsum board of ¼-in. fir plywood finished with grass cloth.

fire-sound shield

Acoustiplast, a plaster-like shield against fire, sound and temperature, and Qui-ett, a decorative spray-on sound conditioner, are now being offered in a single product for one-step application in all types of buildings. Applied with spray equipment or trowel, it will bond to drywall, wood, metal, tile, lath or concrete and is available in a wide range of finishes. Tests have demonstrated that the material will withstand a 2,000-deg. steady blast of flame for four hours, reduces sound by more than one-half and has good insulating properties.—American Kylon Corp., 960 W. 48th Ave., Denver, Colo. (No. 1)

'zipped-in' wall units

For the low budget school and commercial construction market, Kawneer has developed a wall system called Zipperwall because of the zipping action which hermetically secures infill components of a frame. Speed and facility of assembly, ease in detailing and heat-saving factors are features claimed for the field assembled system which uses an H-shaped neoprene extrusion as weatherstrip and as the connector of most structural components. Basic aluminum parts of the system are the mullions, sill and head runners and adapter angles. Only two clips and screws at the top and bottom of each mullion are used in assembly. Neoprene gasket is cut to excess to assure positive pressure against moisture infiltration. Infill components of glass, panel, sash or combinations are zipped into the exposed inboard opening of the weatherstrip-H with a special tool. Joint sealing problems



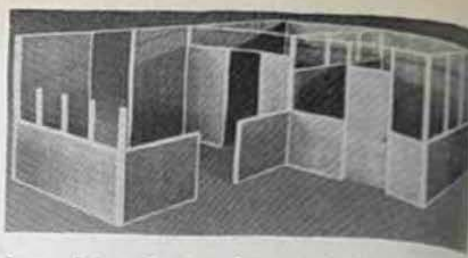
are eliminated because the neoprene absorbs expansion of infill components. Runners and mullions with matching flanges on the same plane leave no corner crevices which can become seepage problems. The system is suited to receive ¼-in. glass or flanged 1-in. panels.—Kawneer Co., 1105 Front St., Niles, Mich. (No. 2)

prefinished wood tile

Par-Tile, a prefinished wood block flooring, now is offered with t&g edges for easier installation in a high gloss walnut tone. Blocks are scored on the back to provide better mastic bonding and resiliency. Par-Tile reportedly will not dent or mar under heavy furniture. Matching feature strips, 37 in. long by 1 in. wide, are available.—Pacqua Division, Forrest Industries, Inc., Dillard, Ore. (No. 3)

hardboard partition system

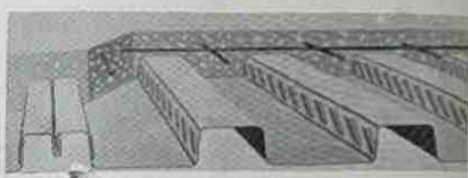
Simpson has developed a prefinished partition system easily and rapidly assembled in floor-to-ceiling, free-standing or counter-height installations and especially applicable where sound and thermal insulation are required. Called Commercial Easy Wall, the system includes a partition comprised of a rigid core of insulating board faced on both sides with prefinished hardboard, matching panel-



ing of insulating board backing faced on one side with hardboard, matching doors and seven precision interlocking components. Solid core of insulating board provides structural rigidity, controls sound and restricts heat transfer. All four edges of the partitions are kerfed, accommodating wiring vertically and horizontally. Prefinished vinyl wood grain surface is scuffproof and stainproof. Two finishes are available, plus a factory applied opaque prime for use when a paint finish is desired.—Simpson Timber Co., 2050 Washington Bldg., Seattle 1, Wash. (No.

steel floor deck

Separate bars, forms and shoring are eliminated by Inland's Hi-Bond steel floor deck which provides concrete reinforcement and serves as a permanent form. Use of economical gages of steel with the decking also is a cost saver. Substantial time savings on the job are possible because the steel decking goes in fast and act



as a working platform from the start. Reinforcement strength of Hi-Bond is provided by raised lugs formed into the webs of the panels. The lugs serve the same purpose in the slab as do the deformations in regular steel reinforcing bars. From beneath they provide a key for sprayed-on fireproofing—Inland Steel Products Co., Box 394, Milwaukee 1, Wis. (No.

acoustical folding doors

Sound transmission loss of 41.7 decibels is the key feature of the Hufcor Magnaseal folding partition. Steel plates laminated between layers of fiberboard and vinyl provide the sound shield. Door has a full-length magnetic seal operating with a bellows effect, described as insuring a "complete and positive seal at the jamb." Twin strips with five plies of vinyl, rubber and felt seal the top and bottom.—Hough Manufacturing Corp., Janesville, Wis. (No.

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

AUGUST 1961
(After September 30 write directly to manufacturer)

1 2 3 4 5 6 7
8 9 10 11

Name

Title

Firm

Address

City Zone State



remote electrical control

An unlimited number of individual lights, appliances and even entire electrical circuits may be controlled from a remote control system developed by Kenneth Reiner. The Swepe system will be produced for both home and commercial installations. Utilizing low voltage switches, relays and components, the system can be rearranged to suit changing needs by the householder without fear of shock. Thinner than conventional wall materials and of modular design, the switches can be mounted either flush with or on the surface of a wall in a continuous strip. Illuminated nameplates identify and show which circuits are on and off. Architect John Lautner served as consultant in developing the system.—Reiner Industries, Box 27878, Los Feliz Station, Los Angeles 27, Calif. (No. 7)

shatter-resistant glass

Twi-Lite, a laminated, architectural safety glass that controls heat and light transmission, is said to reduce the sun's energy by 40%, thus substantially lowering air conditioning requirements. It allows an option of 28% or 9% of visible light to be transmitted. The shatter-resistant glass is constructed of two pieces of glass bonded with an interlayer of vinyl butyral pigmented with carbon black. —Amerada Glass Corp., 3301 S. Prairie Ave., Chicago 16, Ill. (No. 8)

marble-like tile

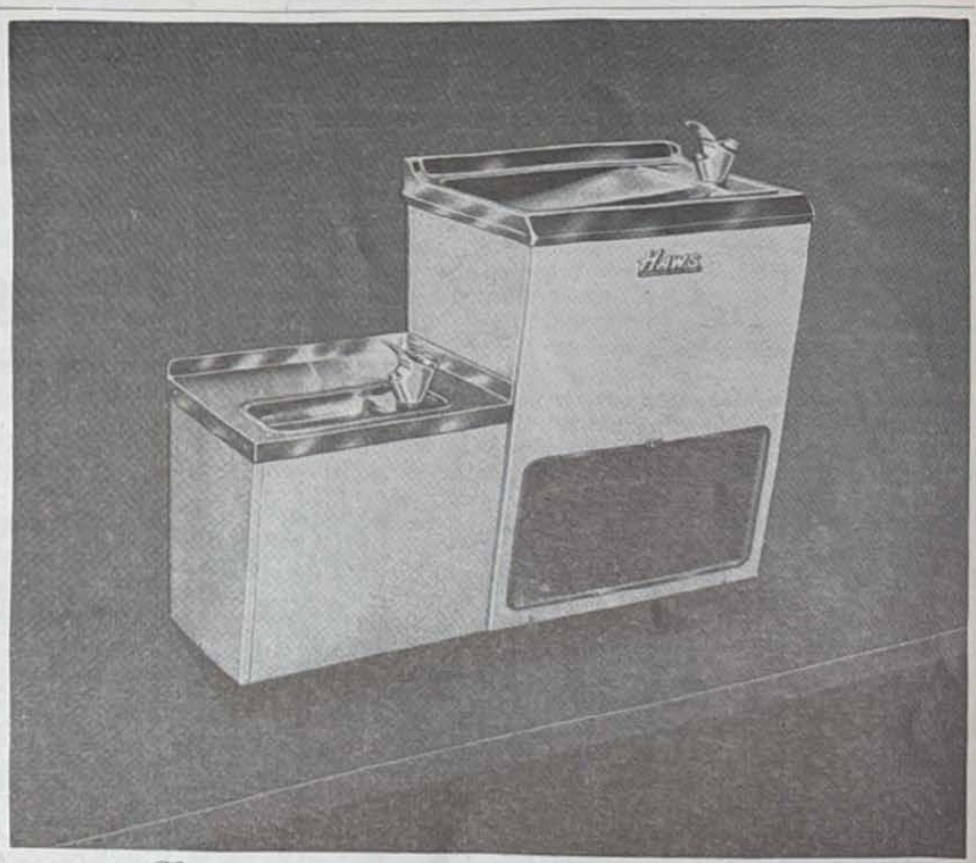
For the more luxurious home or commercial and institutional installations, Armstrong has introduced a vinyl floor tile resembling deep-quarried marble. Castilian embodies translucent, transparent and opaque vinyls in a nondirectional design that has a three-dimensional effect. It is suitable for use on, above or below grade.—Armstrong Cork Co., 4710 Stevens St., Lancaster, Pa. (No. 9)

ceiling system integrator

To provide full integration and coordination of lighting, air conditioning acoustical and partitioning systems, without increase in building costs, Virden has developed the Modu-Flo channel, a combination air distribution and suspended ceiling support channel adaptable to any module. Prefabricated, soundproofed duct snaps into the top of the channel to carry air to the conditioned space. Directional air control is provided by adjustable vanes in the channel. Lighting fixtures and acoustical tile are supported by the channel framework. Demountable partitions insert securely into the channel and can be readily moved to change space divisions without moving ventilation outlets, damaging ceiling or adding new light fixtures.—Virden Interior Systems, 300 N. Baldwin Park Blvd., City of Industry, Calif. (No. 10)

geometric light shapes

Incandescent light source and surface decoration are combined into one architectural unit with Light-Forms, a series of geometric shapes made from hand blown, satin etched thermopal glass. Series comes in hexagonal, round, square and rectangular shapes that can be used individually or in combinations to create patterns of light for both interiors and exteriors. All are 3½ in. deep with exposed metal parts constructed of black enameled aluminum. — Prescolite Manufacturing Corp., 2229 Fourth St., Berkeley 10, Calif. (No. 11)





WALL MOUNTED DUAL HEIGHT WATER COOLER

THE HAWS HI-LO, with convenient bubblers at both child and adult levels, combines an off-the-floor cooler with low level fountain attachment, serving all ages. Stainless steel tops on Cool Mist Gray baked enamel steel cabinets. Various capacities available.

Write for detailed specifications and copy of Haws Catalog.

Since 1909 HAWS ELECTRIC WATER COOLERS

Manufactured by
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street, Berkeley 10, California
Export Dept.: 19 Columbus Avenue, San Francisco 11, California

not specified

sound and fury signifying something

Role of effective citizen participation in Philadelphia's rejuvenation, so vividly told at this year's AIA convention, has been publicized across the land. Philly's success seems to be rubbing off on some other metropolitan areas in the U.S.; certainly it has served as an inspiration for the Citizens Planning Council which is now being activated in Seattle.

Our readers all over the West should receive this news with more than usual interest, for they might well consider forming a similar organization in their own backyards. The problems that face Seattle and its environs, after all, are not peculiar to the Queen City nor to Puget Sound. The not-yet-reconciled freeway controversy, for example, which has only emphasized the utter lack of coordination among planning agencies on city and state levels, is not unknown to cities such as Portland, San Francisco, Sacramento, Los Angeles, to name just a few.

There has been in the past year or two, a notable trend toward architects and related professionals taking a more active and aggressive part in these public "squabbles," a term we use advisedly because that is what most of them become in all the confusion. But more often than not, the story's the same: the constructive clamor is a case of too little, too late—underscoring the latter. A citizens council can go a long way in filling the void.

Some pertinent aspects of the Seattle group are best described by its executive chairman, attorney Charles H. Paul (the initial committee includes two architects), in a memorandum to a newspaper reporter when he explained "the council is not simply a body for criticism or review of existing plans. It has a much broader scope . . . to assist, to the extent possible, in better coordination of public agencies or public officials having to do with public planning."

"While 'beautification' is one of our objectives," the memorandum continued, "the council's position on planning will take into consideration all other elements necessary for sound planning results. . . . What seems to me the unique feature of the council is that hitherto there has been no vehicle for the ordinary citizen to express his opinion about planning and properly communicate it to any official planning agency."

We sincerely hope the council can match its stated objectives with deeds; we intend to keep abreast of its progress and, beyond that, to contribute in our own way to its development. R.E.K.



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. Wil..., Secretary-Treasu...

Serving the men who design, engineer and constru... the important buildings, large and small, in the 1... state West—California, Oregon, Washington, Alask... Idaho, Montana, Wyoming, Colorado, Utah, Nevad... Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

EPA

Pacific Printing Co.

ADVERTISERS

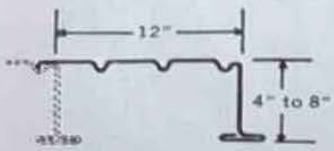
Builders Brick Company	14
Colorado Fuel & Iron Corp.	17
Fibreboard Paper Products Corp.	18-19
Hands Co., Div. H&S Metal Products Co.	20
Haughton Elevator Co.	9
Haws Drinking Faucet Co.	33
Inland Steel Products Co.	10
Macomber, Inc.	III Cover
Portland Cement Association	IV Cover
Red Cedar Shingle Bureau	6-7
Rilco Laminated Products Div. Weyerhaeuser Co.	15
Riverside Cement Co.	II Cover
Rudd & Cummings, Inc.	34
Tectum Corporation	13

Pacific Architect & Builder

HE MAGAZINE OF WESTERN ARCHITECTURE ◆ SEPTEMBER 1961

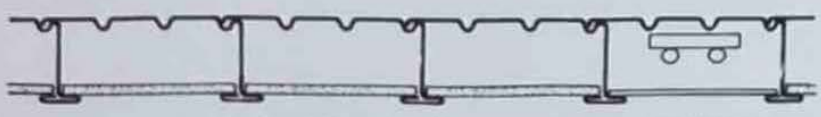




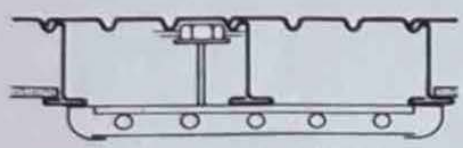


T-STEEL — New! Galvanized. For clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to transmit seismic and wind loads.

Ceiling Treatments with T-Steel Deck



Standard Tile or Board — Light Diffuser



Surface-Mounted Fixture



Lath-and-Plaster Fireproofing

Complete structural systems that broaden yo latitude in planning ceilings, lighting, acousti —within realistic budget boundaries

1. Acoustideck for gymnasiums, other activity areas

Combines steel roof deck and acoustical ceiling wi Noise Reduction Coefficient of .70.

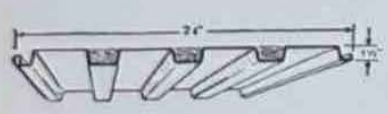
Erected fast in any weather that a man can work. I teresting ribbed underside provides an attractive ceilin

2. New Inland T-Steel Roof Deck for clear-ceiling classrooms

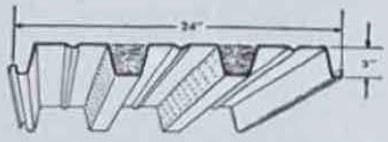
Especially suitable over classrooms of 26' to 32' spa —or other areas where you want an attractive unbrok ceiling surface.

You can use various types of acoustical tile — provi a flush, luminous ceiling — or leave the underside e posed and painted.

Write for catalog 248 or see Sweet's, sections 2i/In Inland Steel Products Company has trained sales en ineers capable of giving you the benefit of their diver fied experience on specific problems. Write or call yo nearest Inland office.



TYPE B ACOUSTIDECK — For purlin spacings from 6' to 10'. Uses minimum of 1" rigid insulation board.



NEW! N-ACOUSTIDECK—Steel deck and acoustical ceiling in one panel. For spans to 16'0". Noise-Reduction Coefficient, .70.

EP-2A

member of the INLAND steel family

ENGINEERED PRODUCTS DIVISION

INLAND STEEL PRODUCTS COMPANY

Dept. 1, 4045 West Burnham Street, Milwaukee 1, Wisconsin

ATLANTA, BALTIMORE, BUFFALO, CHICAGO, CINCINNATI, CLEVELAND, DALLAS, [illegible] KANSAS CITY, LOS ANGELES, MILWAUKEE, MINNEAPOLIS, NEW ORLEANS, NEW YORK, ST. LOUIS

Pacific Architect & Builder September 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

21 Wilbur Elementary and High School, Wilbur, Wash.: Kenneth W. Brooks & Associates, Architects

26 Landscaping of Home Office, Fireman's Fund Insurance Co., San Francisco: Edward B. Page, Architect; Eckbo, Dean & Williams, Landscape Architects

28 Knoll Associates, Inc., Showroom, Los Angeles: Knoll Planning Unit, Designers

methods & materials

29 Tilt-up Method Halves Stone Facing Costs for Oregon Newspaper Plant

departments

4 Building Permits

6 Project Preview

8 Building Briefs

11 The Building Month

14 T-Square Talk

16 Job of the Month

30 Products

31 Literature

32 Manufacturers/Suppliers

33 Not Specified

VOLUME 67, NUMBER 9

Published monthly by Pacific Builder & Engineer, Inc. 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Accepted as controlled circulation at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Wilbur Elementary and High School, Wilbur, Wash. (p. 21)—Kenneth W. Brooks & Associates, Architects; Chas. R. Pearson photo.

First Column Figures in Parentheses are Number of Residential Units • Second Column is D

	# Res.	$ Value	Total $
CALIFORNIA			
Alameda	(54)	$ 353,520	$ 606,955
Alameda Co.	(122)	1,081,350	1,377,550
Albany	( )	Nil	29,502
Alhambra	(5)	60,000	1,445,895
Anaheim	(233)	1,830,983	3,212,657
Antioch	(6)	72,884	88,310
Arcadia	(12)	193,662	847,868
Arroyo Grnde	(8)	89,000	119,000
Artesia	(6)	52,400	73,200
Atherton	(4)	121,000	206,755
Atwater	(3)	48,529	79,579
Auburn	( )	Nil	39,817
Avalon	(1)	20,000	22,700
Azusa	(108)	561,100	986,300
Bakersfield	(40)	454,300	540,567
Baldwin Park	(61)	675,200	867,656
Banning	(4)	51,512	89,612
Barstow	( )	Nil	23,417
Bell	(23)	129,500	147,375
Bellflower	(16)	139,500	376,800
Belmont	(9)	166,000	207,925
Benicia	(8)	45,000	164,204
Berkeley	(7)	135,400	1,057,934
Beverly Hills	(9)	747,000	1,280,674
Bradbury	(1)	51,000	51,000
Brawley	( )	Nil	36,400
Brea	(3)	61,811	101,834
Buena Park	(1)	12,510	1,423,412
Burbank	(17)	142,750	718,036
Burlingame	(3)	87,350	471,114
Butte Co.	( )	Nil	169,600
Calexico	( )	Nil	18,200
Campbell	( )	No Reply	No Reply
Carlsbad	(5)	80,196	120,259
Carmel	(3)	49,000	122,150
Chico	(5)	67,225	104,763
Chino	(2)	15,360	164,125
Chula Vista	(30)	489,000	709,842
Claremont	(13)	251,700	284,715
Coalinga	( )	Nil	Nil
Colton	(3)	34,899	60,253
Commerce	(12)	85,400	465,225
Compton	(11)	63,400	637,955
Concord	(66)	786,188	1,628,743
Cntra Csta Co.	(205)	2,435,051	3,092,615
Corona	(27)	332,282	367,398
Coronado	( )	No Reply	No Reply
Corte Madera	(27)	391,697	402,389
Costa Mesa	(199)	2,209,910	2,708,030
Covina	(11)	102,850	287,420
Cudahy	(10)	89,200	104,700
Culver City	( )	Nil	397,728
Dairy Valley	(2)	34,000	43,100
Daly City	(33)	618,065	677,034
Davis	(30)	296,000	337,040
Delano	(29)	290,500	294,100
Downey	(11)	409,430	896,142
Duarte	(9)	136,000	165,731
El Cajon	(8)	126,250	394,395
El Centro	(4)	42,500	73,015
El Cerrito	(17)	194,939	282,724
El Dorado Co.	(121)	1,365,087	2,584,260
El Monte	( )	No Reply	No Reply
El Segundo	(20)	185,200	2,931,079
Emeryville	( )	Nil	53,050
Escondido	(10)	95,220	452,797
Eureka	(5)	78,000	307,577
Fairfield	(34)	359,466	379,354
Fillmore	( )	Nil	127,052
Fontana	(7)	96,440	192,502
Fremont	(114)	1,406,870	1,803,460
Fresno	(149)	1,492,645	2,584,921
Fresno Co.	(73)	770,285	1,629,072
Fullerton	(65)	1,394,920	2,447,545
Glendale	(233)	1,995,193	2,665,903
Glendora	(41)	528,600	629,100
Half Moon Bay	( )	No Reply	No Reply
Hanford	(53)	840,350	909,600
Hawthorne	( )	No Reply	No Reply
Hayward	(184)	1,058,800	1,315,730
Hemet	(7)	76,000	118,849
Hermsa Beach	(14)	130,210	152,105
Hillsborough	( )	Nil	125,500
Holtville	(2)	20,700	23,800
Humboldt Co.*	( )		74,696
Hntgtn Beach	(4)	49,056	133,982
Huntngtn Prk	(6)	64,100	96,076
Imperial Co.	( )	Nil	171,900
Indio	(2)	26,690	121,484
Industry	( )	Nil	537,600
Inglewood	(63)	643,630	966,632
Irwindale	( )	Nil	27,500
Kern Co.	( )	Nil	2,003,336
Laguna Beach	(35)	865,000	890,463
La Habra	(17)	347,980	656,166
Lakewood	(6)	157,300	685,540
La Mesa	(4)	113,180	243,800
La Mirada	(27)	489,300	550,350
La Puente	(22)	276,300	834,990
La Verne	(5)	103,000	128,400
Lawndale	(17)	141,250	171,280
Lindsay	(2)	23,500	26,250
Livermore	(18)	189,200	792,831
Lodi	(20)	259,500	297,460
Lompoc	(30)	349,170	419,729
Long Beach	(117)	800,870	3,464,550
Los Altos	(15)	349,420	573,903
Los Angeles	(1745)	21,945,425	50,547,439
Ls Angels Co.	(1003)	13,204,100	20,414,850
Los Gatos	(16)	233,600	489,850
Lynwood	(17)	95,250	180,197
Madera	(24)	61,611	61,611
Madera Co.	(16)	119,100	227,850
Mnhttn Beach	(18)	166,750	1,154,650
Manteca	(7)	56,400	94,949
Marin Co.	(39)	716,840	1,201,290
Martinez	(2)	17,340	110,430
Marysville	(4)	64,500	317,680
Maywood	(3)	8,000	25,918
Menlo Park	(8)	191,000	448,620
Merced	(13)	176,050	266,710
Merced Co.	(68)	628,400	744,755
Millbrae	(61)	673,400	840,600
Mill Valley	(10)	245,000	304,054
Modesto	(31)	669,090	939,707
Monrovia	(25)	390,615	575,235
Montclair	(74)	1,113,070	1,129,385
Montebello	(40)	414,919	817,231
Monterey	(11)	140,500	336,642
Monterey Co.	(50)	592,260	1,126,720
Monterey Prk	(238)	3,434,085	3,588,790
Mntain View	(293)	1,564,486	1,874,747
Napa	(36)	554,784	951,140
Napa Co.	(13)	218,783	466,884
National City	(245)	2,567,742	3,060,826
Newprt Beach	(25)	437,973	651,572
Nrth Scrmnto	( )	Nil	148,411
Norwalk	(31)	121,200	323,750
Novato	(17)	303,550	318,150
Oakdale	(3)	39,516	58,054
Oakland	(374)	3,525,385	9,676,583
Oceanside	(29)	463,000	1,004,796
Ojai	( )	Nil	6,090
Ontario	(13)	85,076	399,977
Orange	(70)	1,210,780	1,679,374
Orange Co.	(227)	3,730,249	4,499,018
Oroville	(1)	10,000	51,313
Oxnard	(202)	2,315,500	2,543,195
Pacifica	(28)	315,300	840,810
Pacific Grove	(1)	18,000	38,700
Palm Springs	(11)	260,000	740,351
Palo Alto	(37)	427,480	1,713,923
Pls Vrds Estats	(1)	39,945	270,165
Paramount	(49)	329,300	408,230
Pasadena	(55)	699,908	1,415,663
Paso Robles	(1)	23,000	53,800
Pico Rivera	( )	Nil	264,481
Piedmont	( )	Nil	68,514
Pinole	(12)	126,522	159,334
Pittsburg	(12)	81,072	112,625
Placentia	( )	Nil	8,370
Placer Co.	(88)	1,218,597	1,510,065
Pleasanton	(5)	84,500	110,250
Pomona	(77)	675,650	2,414,409
Porterville	(5)	50,500	106,500
Port Hueneme	(1)	8,000	90,650
Red Bluff	( )	Nil	17,350
Redding	(1)	9,000	806,350
Redlands	(9)	120,600	329,554
Redndo Beach	(34)	352,046	3,171,525
Redwood City	(58)	208,885	630,616
Richmond	(122)	838,238	1,106,875
Riverside	(33)	288,000	4,163,348
Riverside Co.	(174)	1,870,092	3,105,825
Rolling Hills	( )	Nil	12,200
Rllng Hlls Ests	(7)	207,500	240,930
Rosemead	(51)	453,200	501,484
Roseville	(33)	343,629	540,419
Sacramento	(114)	1,298,500	1,857,700
Scramento Co.	(320)	3,778,848	5,120,019
St. Helena	( )	No Reply	No Reply
Salinas	(21)	263,900	1,052,496
Sn Bernardino	(37)	554,945	1,002,126
Sn Brnrdn Co.	(308)	2,533,212	4,811,236
San Bruno	(19)	237,300	389,394
San Carlos	(18)	310,000	1,049,107
San Clemente	(15)	163,186	
San Diego	(928)	8,540,180	
San Diego Co.	(121)	2,031,500	
San Dimas	(37)	492,500	
San Fernando	(1)	4,400	
San Francisco	(206)	5,112,410	
San Gabriel	(3)	21,000	
Sanger	(6)	48,000	
San Jacinto	(4)	37,000	
San Joaqn Co.	(32)	341,478	
San Jose	(707)	8,421,644	
San Leandro	(89)	952,284	
Sn Luis Obispo	(4)	78,035	
Sn Ls Obsp Co.	(23)	403,373	
San Marino	(2)	78,000	
San Mateo	(40)	412,250	
San Mateo Co.	(64)	803,200	
San Pablo	(44)	263,584	
San Rafael	(20)	412,879	
Santa Ana	(320)	4,384,800	
Santa Barbara	(38)	493,000	
Snta Brbra Co.	(260)	3,376,700	
Santa Clara	(178)	1,906,500	
Santa Clra Co.	(47)	911,900	
Santa Cruz	(15)	193,371	
Santa Cruz Co.	(78)	854,162	
Snta Fe Sprngs	( )	Nil	
Santa Maria	(118)	1,551,287	
Santa Monica	(65)	623,895	
Santa Paula	(7)	94,272	
Santa Rosa	(23)	343,150	
Sausalito	(7)	65,800	
Seal Beach	(129)	1,870,946	
Seaside	(16)	152,000	
Selma	(4)	83,619	
Shasta Co.	(12)	187,339	
Sierra Madre	(17)	175,060	
Solano Co.	(1)	19,500	
Sonoma Co.	(86)	957,410	
South Gate	(62)	390,047	
South El Mnte	(2)	10,000	
South Pasdena	(13)	151,262	
So. Sn Frncsco	(3)	34,000	
Stanislaus Co	(24)	292,400	
Stockton	(12)	149,500	
Sunnyvale	(66)	871,540	
Temple City	(10)	141,500	
Torrance	(106)	1,149,055	
Tracy	(5)	67,900	
Tulare	(10)	94,000	
Tulare Co.	(53)	272,887	
Turlock	(4)	70,881	
Ukiah	(3)	47,500	
Upland	(39)	722,100	
Vacaville	(3)	31,750	
Vallejo	(5)	67,600	
Ventura	(23)	304,700	
Ventura Co.	(429)	4,872,135	
Visalia	(13)	206,049	
Walnut	(5)	80,300	
Walnut Creek	(41)	468,469	
Wasco	(3)	26,800	
Watsonville	(10)	96,000	
West Covina	(9)	162,706	
Whittier	(61)	487,200	
Woodland	(15)	196,307	
Woodside	(4)	116,500	
Yolo Co.	(22)	222,615	
Yreka	(1)	16,500	
Yuba City	(13)	152,940	
Yuba Co.	(17)	147,142	
Total	**(14,806)**	**$173,903,482**	**$321,606,**
OREGON			
Albany	(12)	$ 133,600	$ 177,
Ashland	(5)	59,000	146,
Astoria	( )	Nil	16,
Baker	(3)	25,000	79,
Beaverton	(31)	397,786	531,
Bend	(4)	48,000	82,
Central Point	(4)	33,700	35,
Clackamas Co.	(55)	730,190	794,
Coos Bay	(8)	53,000	277,
Corvallis	(6)	77,000	152,
Dallas	(1)	13,000	36,
Douglas Co.	(12)	109,955	142,
Eugene	(34)	415,600	765,
Forest Grove	(3)	31,000	123,
Grants Pass	(5)	60,000	361,
Gresham	(6)	91,500	94,
Hermiston	(2)	41,170	58,
Hillsboro	(16)	249,500	275,
Hood River	( )	Nil	8,

* Breakdown not available

Western States for July

sidential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
Klamath Falls	(4)	66,800	221,885
La Grande	(4)	50,000	577,168
Lane Co.	(80)	906,799	1,388,310
Lebanon	(1)	14,000	21,020
Marion Co.	(44)	568,600	1,696,392
McMinnville	(3)	45,000	56,777
Medford	(13)	139,000	518,891
Milln-Freewtr	( )	Nil	83,614
Multnomah Co.	(117)	1,741,553	2,297,649
Newberg	(1)	14,000	41,060
Newport	(3)	29,760	33,285
North Bend	(2)	22,650	49,794
Ontario	(1)	15,000	96,900
Oregon City	(2)	22,000	143,571
Oswego	(14)	241,400	265,300
Pendleton	( )	Nil	83,316
Portland	(107)	1,086,300	3,876,835
Prineville	( )	Nil	1,650
Roseburg	(2)	21,675	901,069
St. Helens	(1)	7,500	11,550
Salem	(13)	163,450	465,189
Seaside	( )	Nil	30,376
Springfield	(5)	56,800	94,144
The Dalles	( )	Nil	23,756
Washingtn Co.	(152)	2,322,925	3,664,200
Total	**(776)**	**$ 10,104,211**	**$ 20,796,715**

WASHINGTON

Aberdeen	(2)	$ 27,000	$ 63,270
Anacortes	(1)	4,200	538,823
Auburn	(23)	235,000	477,050
Bellevue	(8)	176,500	295,620
Bellingham	(6)	87,500	147,400
Bremerton	(3)	43,750	103,955
Camas	(4)	65,800	119,780
Centralia	(1)	6,000	40,542
Chehalis	( )	Nil	39,920
Clark Co.	(54)	561,350	616,706
Clarkston	( )	Nil	8,975
Ellensburg	(2)	47,000	74,786
Enumclaw	(1)	7,000	8,100
Ephrata	( )	Nil	29,550
Everett	(7)	98,410	198,462
Grys Hrbr Co.	(11)	51,500	227,580
Hoquiam	( )	Nil	29,260
Island Co.	(26)	126,600	147,580
Kelso	(1)	11,500	52,221
Kennewick	(4)	77,000	172,550
Kent	(5)	61,600	64,000
King Co.	(475)	6,886,585	8,130,700
Kirkland	(1)	8,500	12,140
Longview	(3)	42,400	162,877
Mercer Island	(15)	396,800	624,750
Moses Lake	(4)	51,200	65,510
Olympia	(4)	45,000	105,579
Pasco	(2)	17,000	47,290
Pierce Co.	(91)	993,630	1,351,670
Port Angeles	(2)	30,000	74,765
Port Orchard	( )	No Reply	No Reply
Pullman	(3)	44,498	48,198
Puyallup	(1)	9,000	30,550
Renton	(19)	274,724	348,858
Richland	(13)	239,025	413,536
Seattle	(83)	1,576,450	7,883,838
Shelton	( )	Nil	186,300
Spokane	(33)	576,100	1,502,534
Spokane Co.	(51)	812,580	1,467,611
Sunnyside	(1)	12,500	19,650
Tacoma	(46)	571,950	1,851,265
Vancouver	(11)	201,000	405,689
Walla Walla	(7)	73,000	140,880
Walla Wlla Co.	(3)	43,000	102,050
Wenatchee	(1)	12,800	61,712
Yakima	(26)	272,000	491,250
Total	**(1,054)**	**$ 14,879,452**	**$ 29,154,641**

ALASKA

Anchorage	(27)	$ 539,786	$ 2,692,146
Fairbanks	(5)	101,000	596,220
Ketchikan	( )	Nil	70,282
Total	**(32)**	**$ 640,786**	**$ 3,359,874**

IDAHO

Alameda	(18)	$ 174,000	$ 204,815
Blackfoot	(2)	33,500	102,325
Boise	(7)	83,000	286,565
Caldwell	(10)	132,600	246,057
Coeur d'Alene	(2)	21,520	164,904
Idaho Falls	(11)	174,774	202,104
Jerome	(1)	13,000	16,250
Lewiston	(2)	29,400	154,832
Moscow	(4)	75,500	193,050
Nampa	(10)	120,100	180,072
Payette*	( )	26,000	301,258
Pocatello	(4)	55,000	389,559
Sandpoint	(1)	8,000	36,300
St. Maries	( )	Nil	Nil
Twin Falls	(8)	92,800	151,500
Total	**(80)**	**$ 1,038,394**	**$ 2,629,591**

MONTANA

Anaconda	(1)	$ 12,000	$ 17,300
Billings	(42)	650,200	1,064,611
Bozeman	(6)	91,000	228,447
Butte	( )	Nil	20,300
Cut Bank	( )	Nil	5,150
Glasgow	(8)	103,000	140,300
Glendive	(1)	7,100	50,100
Great Falls	(24)	213,804	1,598,119
Havre	(10)	127,131	134,681
Helena	(6)	95,000	231,760
Kalispell	(4)	38,000	152,000
Lewistown	(3)	26,000	65,150
Livingston	(3)	21,500	45,945
Malta	( )	Nil	Nil
Miles City	(3)	42,000	55,261
Missoula	(5)	87,850	210,520
Total	**(116)**	**$ 1,514,785**	**$ 4,019,644**

WYOMING

Casper	(14)	$ 188,500	$ 344,275
Cheyenne	(22)	258,000	575,235
Cody	(2)	39,000	45,976
Laramie	(3)	29,700	71,990
Rawlins	(1)	10,000	20,175
Riverton	(2)	42,000	372,400
Rock Springs	(3)	57,000	225,000
Sheridan	(2)	47,000	92,706
Total	**(49)**	**$ 671,200**	**$ 1,747,757**

COLORADO

Adams Co.	(278)	$ 3,413,500	$ 3,593,415
Alamosa	( )	No Reply	No Reply
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(96)	1,209,000	2,486,147
Aspen	(1)	8,750	124,250
Aurora	(89)	1,659,550	1,989,012
Boulder	(73)	799,900	1,236,739
Boulder Co.	(65)	581,100	932,097
Colordo Sprngs	(42)	552,810	746,628
Cortex	(1)	10,000	18,800
Denver	(423)	3,119,218	8,614,935
Durango	(2)	18,400	26,121
El Paso Co.	(17)	269,350	469,592
Englewood	(43)	205,800	421,267
Estes Park	( )	Nil	2,350
Fort Collins	(23)	293,500	575,611
Fort Morgan	(3)	61,966	80,786
Golden	(2)	17,800	18,850
Grand Jnction	(4)	44,000	603,975
Greeley	(36)	320,000	384,176
Jefferson Co.	(344)	3,086,295	3,659,930
La Junta	(6)	120,100	133,290
Lamar	(2)	16,000	20,000
Littleton	(7)	143,700	585,776
Longmont	(18)	141,500	192,849
Loveland	(11)	151,000	155,712
Monte Vista	(1)	7,000	15,000
Montrose	(1)	11,000	92,195
Pitkin Co.*	( )	207,000	215,000
Pueblo	(26)	268,008	698,936
Pueblo Co.	(9)	51,500	72,750
Sterling	(6)	60,000	127,168
Trinidad	( )	Nil	7,545
Walseburg	(1)	700	700
Westminster	(12)	176,400	422,546
Total	**(1,642)**	**$ 17,024,147**	**$ 28,724,108**

UTAH

American Frk	(4)	$ 39,000	$ 54,765
Bountiful	(20)	302,600	329,800
Brigham City	(12)	136,000	212,200
Cedar City	(1)	9,000	22,025
Clearfield	(2)	24,000	36,950
Davis Co.	(6)	68,478	108,052
Kaysville	(5)	35,960	35,960
Layton	(6)	76,000	114,250
Logan	(12)	166,002	841,640
Murray	(23)	207,000	522,600
Ogden	(61)	820,500	942,200
Orem	(6)	53,574	72,306
Price	( )	Nil	10,000
Provo	(11)	163,700	258,900
Salt Lake City	(54)	505,831	1,085,564
Salt Lake Co.	(184)	2,071,500	2,713,024
So. Slt Lke Cty	( )	Nil	169,300
Spanish Fork	( )	Nil	15,050
Tooele	(9)	116,413	136,500
Utah Co.	(4)	41,330	93,420
Weber Co.	(5)	52,000	74,400
Total	**(425)**	**$ 4,888,888**	**$ 7,679,606**

NEVADA

Boulder City	( )	$ Nil	$ 1,040
Clark Co.	(136)	1,784,554	2,657,674
Elko	(2)	21,850	130,395
Las Vegas	(322)	3,504,679	4,329,088
No. Las Vegas	(19)	163,136	213,389
Reno	(47)	610,541	1,200,960
Sparks	(75)	847,864	919,035
Washoe Co.	(31)	552,020	934,520
Total	**(632)**	**$ 7,484,644**	**$ 10,386,101**

ARIZONA

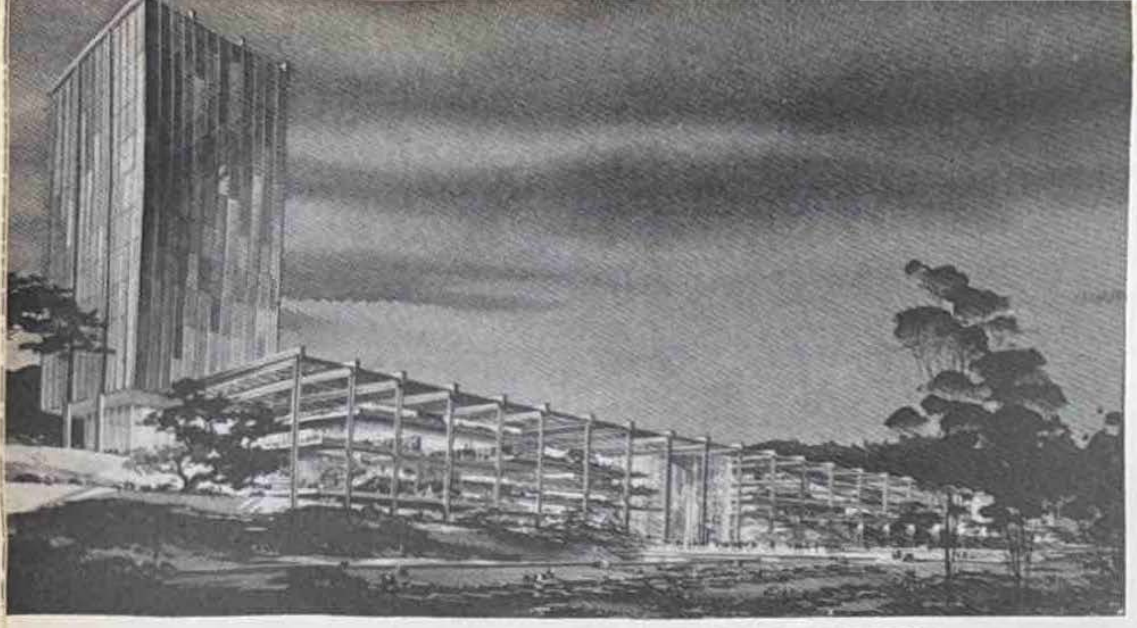
Buckeye	( )	$ Nil	$ 2,207
Casa Grande*	( )	5,000	24,300
Chandler	(21)	193,166	213,396
Douglas	(1)	7,420	16,898
Flagstaff	(70)	245,804	391,720
Florence	(1)	2,000	4,200
Glendale	(4)	38,100	88,685
Maricopa Co.	(355)	3,312,043	3,756,902
Mesa	(67)	573,998	2,860,730
Phoenix	(263)	2,027,370	1,357,027
Pima Co.	(186)	2,108,250	2,337,400
Prescott	(4)	51,300	105,850
Scottsdale	(14)	179,300	439,389
Tempe	(142)	1,268,400	1,417,217
Tucson	(67)	1,226,600	6,110,306
Wickenburg	(2)	23,000	26,980
Winslow	(10)	43,600	71,600
Yuma	(12)	72,000	92,550
Total	**(1,219)**	**$ 11,377,351**	**$ 25,317,357**

NEW MEXICO

Alamogordo	( )	$ Nil	$ 15,725
Albuquerque	(84)	1,198,096	1,978,204
Artesia	(4)	43,000	66,260
Carlsbad	(10)	106,000	260,550
Clovis	(13)	118,690	227,485
Deming	(5)	39,000	65,950
Farmington	(6)	41,990	143,744
Gallup	(1)	80,000	161,607
Hobbs	(11)	133,878	171,278
Las Cruces	(9)	111,500	421,268
Las Vegas	(1)	6,000	10,150
Lovington	(4)	53,000	118,485
Roswell	(90)	816,250	977,034
Santa Fe	(20)	144,190	811,330
Silver City	( )	No Reply	No Reply
Truth or Cnsequences	( )	No Reply	No Reply
Tucumcari	(1)	2,000	14,465
Tularosa	(2)	38,304	38,304
Total	**(262)**	**$ 2,947,898**	**$ 5,500,339**

HAWAII

Hawaii Co.	(19)	$ 220,702	$ 887,302
Honolulu	(455)	5,292,635	15,600,851
Maui Co.	(22)	218,036	391,979
Total	**(496)**	**$ 5,731,373**	**$ 16,880,132**
GRAND TOTAL	**(21,589)**	**$252,206,611**	**$477,803,850**



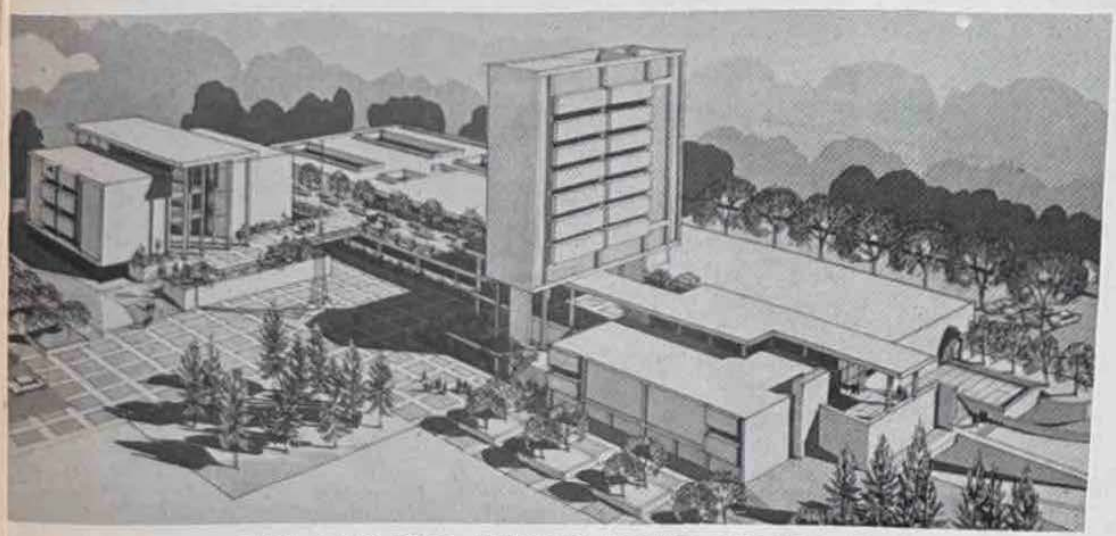
MOTION PICTURE AND TELEVISION MUSEUM

is envisioned as rectangular structural cage of prestressed concrete—600 ft. long and 50 ft. high—in which series of floating platforms, connected by ramps and escalators, will provide dramatic and flexible exhibition area for both permanent and temporary displays. Occupying 3½-acre wooded site opposite Hollywood Bowl, $4 million project will include sound stage and TV studio, theater and public restaurant. Adjoining tower, to be built in increments, will house offices, library facilities and student workshops. Architects: William L. Pereira & Associates.



EMMANUEL UNITED PRESBYTERIAN CHURCH

will get underway near West Linn, Ore., with this starter unit comprising 4,120 sq. ft. and costing $52,344. Chapel will seat 112 parishioners plus choir. Roofed with cedar shingles, wood structure will feature cathedral glass. Architects: Broome, Selig & Oringdulph.



SALT LAKE CITY—COUNTY PUBLIC SAFETY BUILDING

seen here from southwest reveals three-level concept with driveway and parking underneath plaza. First phase of proposed civic center, it will incorporate city, district and traffic courts, sheriff and police facilities, combined city and county jail. County has approved its portion of estimated $7.7 million building. Architects: Harold K. Beecher & Associates.



APARTMENT-HOTEL

to be constructed in Denver will contain [illegible] one-bedroom and buffet units and four [illegible] bedroom penthouse suites. Two-story gro[illegible] level will house parking, recreation faci[illegible] and lobby. Lightweight concrete structu[illegible] frame will be surfaced with cavity type li[illegible] gray brick walls. Architect: Donald R. Ro[illegible]

IF YOUR BUSINESS IS IN BUILDING . . . BUYING, SELLING, SPECIFYING, OR USING ANY TYPE OF CONSTRUCTION MATERIALS OR EQUIPMENT—DON'T MISS THE WEST'S OWN

WBIE

Attend the 1961 WESTERN BUILDING INDUSTRIES EXPOSITION

LOS ANGELES
OCTOBER 7-10
GREAT WESTERN EXHIBIT CENTER
For the TRADE only



Built with *you* in mind!

Now . . . a trade show to fit the needs of the business and professional men of western construction . . .

BUILDERS • ARCHITECTS • CONTRACTORS AND SUB-CONTRACTORS • ENGINEERS • JOBBERS BROKERS • WHOLESALERS • DEALERS • DEVELOPERS

Every minute at the 1961 WBIE will pay you dividends . . . bring you up to date on the newest and best in building products and equipment . . . keep you abreast of latest developments in materials, methods, ideas —to help you stay competitive in this biggest of all western industries.

PICK THE BRAINS OF THE EXPERTS in WBIE's special "Planning Centers" on industrial and residential building, storage and traffic control, sales and management, tax information, and other subjects.

New Products, New Equipment, New Systems, New Ideas for all your building needs in one show covering all four building markets—

INDUSTRIAL • INSTITUTIONAL • COMMERCIAL • RESIDENTIAL

Sponsored by Associations of the
WESTERN BUILDING INDUSTRIES COUNCIL
AMERICAN BUILDING CONTRACTORS ASSOCIATION
AMERICAN INSTITUTE OF ARCHITECTS, Southern California Chapter
ASSOCIATED BRICK MANUFACTURERS OF SOUTHERN CALIFORNIA
ASSOCIATED GENERAL CONTRACTORS, Southern California Chapter
ASSOCIATED PLUMBING & HEATING CONTRACTORS OF IDAHO, Inc.
ASSOCIATED PLUMBING & HEATING CONTRACTORS OF WASHINGTON, Inc.
NATIONAL BUILDING MATERIAL DISTRIBUTORS ASSOCIATION
REMODELING CONTRACTORS ASSOCIATION
WHOLESALE LUMBERMEN'S ASSOCIATION OF SOUTHERN CALIFORNIA

Get complimentary invitations from any of the above sponsor associations, or return the attached coupon to WBIE Show Office, 2216 South Hill Street, Los Angeles 7, California.

WESTERN BUILDING INDUSTRIES EXPOSITION
2216 South Hill Street, Los Angeles 7, California

Please send _____ complimentary attendance invitations to the 1961 WBIE for distribution to our customers, employees and guests.

NAME _____

FIRM _____

ADDRESS _____

CITY _____ STATE _____

Building Briefs . . . *Highlights & Sidelights*

THE BUILDING WEST—The trend in the 13 western states for 1961 has established a firm and optimistic pattern: total building permits issued during the first seven months have reached a dollar volume 7½% greater than the corresponding period last year. Pacific Architect & Builder's survey of nearly 500 cities and counties shows residential permits are 2½% greater; commercial, industrial and other nonresidential, 10% greater. Nonresidential construction has been strong all year, each month running well ahead of the same month a year ago. Residential permits started slowly, however, being down 1% by the end of the first quarter; down another 6% in April; then beginning to bounce back with increases of 13% in May, 5% in June and 9% in July. Thus architects and builders can count on a strong backlog of both residential and nonresidential work to be done during the remaining months of the year and can speculate on the basis of what seems to be a well-established trend in types and volumes of work now on the boards.

TOP TWENTY-FIVE—Hottest spots in the West for July are the agencies listed here with dollar volume of permits rounded out in millions: **1.** Los Angeles, $50.5; **2.** Los Angeles County, $20.4; **3.** Honolulu, $15.6; **4.** San Jose, $14.9; **5.** San Diego, $11.7; **6.** Oakland, $9.6; **7.** San Francisco, $8.7; **8.** Denver, $8.6; **9.** King County, Wash., $8.1; **10.** Seattle, $7.8; **11.** Phoenix, $7.3; **12.** Ventura County, Calif., $6.5; **13.** Santa Clara County Calif., $6.3; **14.** Santa Ana, Calif., $6.1; **15.** Tuscon, $6.1; **16.** Sacramento County, $5.1; **17.** San Bernardino County, Calif., $4.8; **18.** Orange County, $4.4; **19.** Las Vegas, $4.3; **20.** San Diego County, $4.2; **21.** Riverside, Calif., $4.1; **22.** Santa Barbara County, $3.9; **23.** Portland, $3.8; **24.** Maricopa County, Ariz., $3.7; **25.** Washington County, Ore., $3.6. In terms of state representation, California, as usual, dominates the field with 15 agencies. Arizona has three; Washington and Oregon, two each; Hawaii, Colorado and Nevada, one each.

DUBLIN DECISION — An entry by Harold J. Nicolais, partner in the Los Angeles architectural-engineering firm of Burke, Kober & Nicolais, was among the top five in an international competition to design a library extension for Dublin's Trinity College. His work was cited for its "strongly personal" expression and its provision for a "fine functional interrelationship" of the various library areas. Winning out over 217 other architects from 29 countries was London's 28-year-old Paul G. Koralek.

REDESIGNING DOWNTOWN—Spokane has joined the growing ranks of western cities to unveil a model of what it might look like in 1980. Plans were prepared by Ebasco Services, Inc., as consultants for Spokane Unlimited, Inc., a group of businessmen who contributed about $150,000 of their own money to promote the project. . . . The Downtown Denver Master Plan Committee, a 25-member quasi-public agency formed by the mayor two years ago, has launched a fund-raising campaign to cover, among other things, the $15,000 salary of its own newly appointed planner, John Dempsey of Gary, Ind.

CONCERNING COMMISSIONS — Skidmore, Owings & Merrill, architects for the highly praised Portland Memorial Coliseum (PA&B, April '61) have picked off another public plum: the proposed $15 million multipurpose Oakland Coliseum. . . . The Los Angeles architectural-engineering firm of Daniel, Mann, Johnson & Mendenhall is preparing a master development plan for 2,000 acres in Henderson, Nev., for Electronic Estates, Inc. Five hundred acres of this land border both sides of the main U. S. Highway 93 between Las Vegas and Phoenix, near Lake Mead.

AFTER HOURS—Fifteen weekly Wednesday lectures on "Men and Methods in Contemporary Architecture" will be offered by University Extension at UCLA beginning September 20. "Using the case study approach, anaylsis will be made of outstanding representative architectural projects created by leading nationally and internationally known architects," says lecturer Max R. Horwitz.

CONSULTING THE CALENDAR—The 10th annual conference of the Western Mountain Region, AIA, to be held in Reno September 21-23 will pursue the theme of "Public Agencies in Community Development: The Politics of Architecture." Among the speakers will be these Californians: Henry L. Wright, Los Angeles, national first vice president, AIA; Donald Reay, principal in one of the architectural firms for the Golden Gateway Redevelopment; Allan Temko Berkeley, architectural writer and critic; and Eugene Burdick, professor of political science, University of California. . . . Hawaii will host the Northwest Region, AIA, when it meets September 29-October 4 for its 10th conference and its first on the Islands. "Vanishing Boundaries" will be discussed by Antonin Raymond, Tokyo architect (architecture); Dr. Alex Spoehr, chancellor of Honolulu's East-West Center (society); and Bob Griffing, director of the Honolulu Academy of Arts (art). AIA President Philip Will Jr. is scheduled to address the banquet.

PA&B POST-MORTEM—Captions for the T. J. Meenach Jr. Residence, designed by McClure & Adkison, and Bruce M. Walker Residence, designed by the owner, cited in the Spokane Chapter, AIA, Honor Awards competition, were transposed in the August issue. . . . To clarify a point concerning the photographs of contemporary work of University of Illinois graduates shown last month, the exhibition was an invitational one.

MACOMBER ALLSPANS



PROVEN PERFORMANCE — ASSURED QUALITY

Nailable cold rollformed Macomber Allspans offer performance proven by hundreds of load tests of full-size Allspans taken at random from our production lines—quality assured by full-time Pittsburgh Testing Laboratory inspectors, backing up our own inspection forces. All this, plus the 15 years experience in cold rollforming and unequaled research record of Macomber—originator of the open web steel joist.

Architects and engineers who want the best in open web structural framing will find the Macomber story interesting. Our local Sales Representatives can give you the details, or if you prefer, send us the attached coupon for your copy of the Allspan Design Manual.

Summary reports of Macomber Allspan load tests are also available upon request.

THESE MACOMBER PRODUCTS HAVE BEEN PRODUCED UNDER CONTINUOUS RESIDENT INSPECTION PITTSBURGH TESTING LABORATORY

Free 28-page construction reference manual

- Dimensions
- Properties
- Load Tables
- Deflections
- Bridging
- Decking, etc.



Please send me your ALLSPAN Design Manual

NAME

COMPANY

POSITION

ADDRESS

CITY ZONE STATE

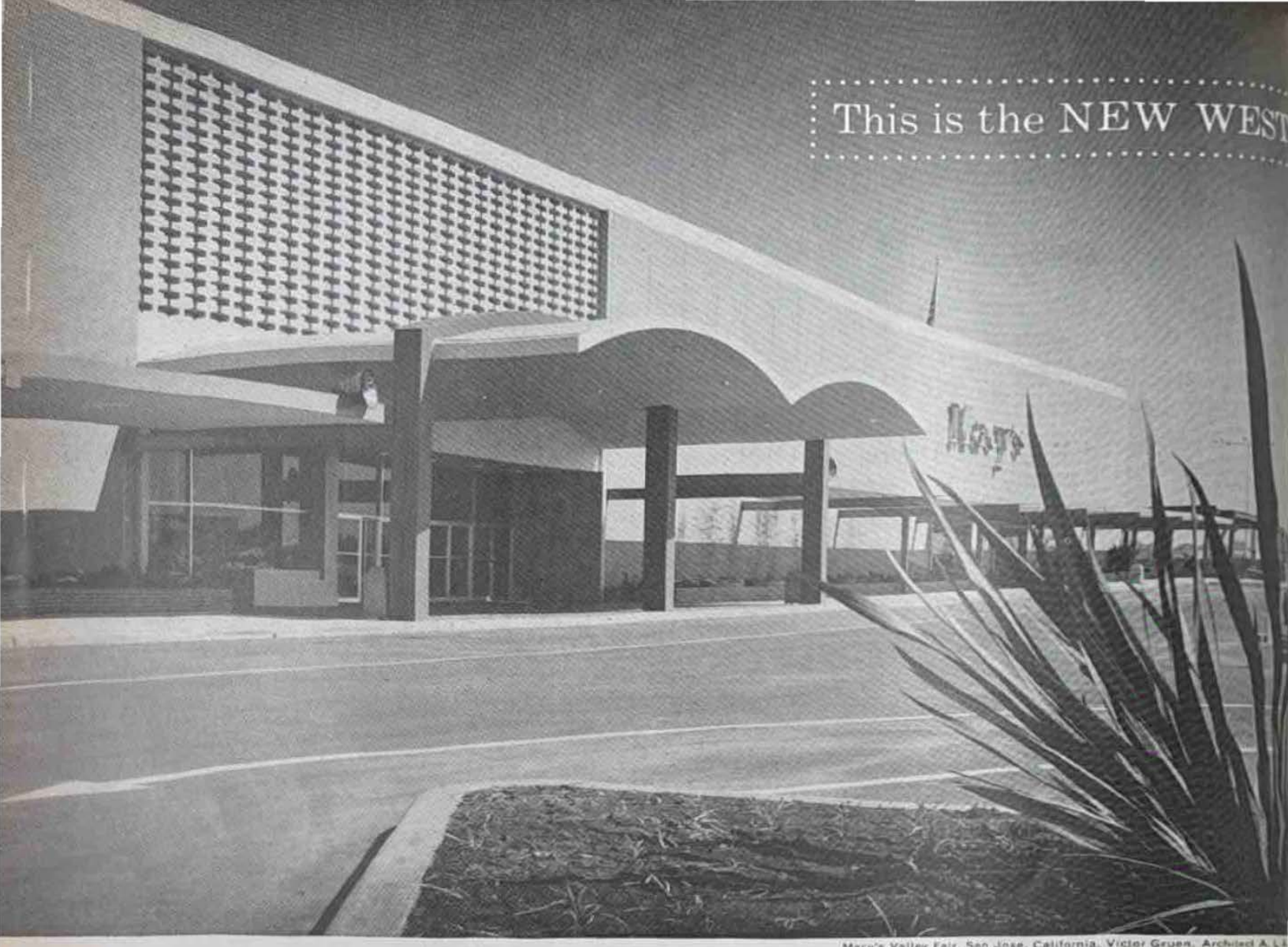
PAB-619

MACOMBER
CANTON 1, OHIO

ALLSPANS • V-LOK • V-PURLINS
BOWSTRING TRUSSES • ROOF DECK • STRUCTURAL STEEL

Find Your Local MACOMBER Representative in the Yellow Pages

SEE OUR CATALOG IN SWEET'S OR WRITE FOR COPY



Macy's Valley Fair, San Jose, California. Victor Gruen, Architect A.I.A.

No architecture is so haughty as that which is simple.

RUSKIN—STONES OF VE



Over 20 U.S.G. sales offices and plants serving *western* building

The pioneer spirit still flourishes in the west . . . *in its architecture!* Modern western architects, working with freedom and freshness of expression, are shaping new architectural frontiers—aided by bold new ideas in materials and methods from United States Gypsum.

Keeping western architects up-to-date on new building techniques and products is the job of U.S.G.'s Architectural Service Department. This department helps architects go beyond the conventional—enables them to utilize their full creative abilities to better advantage. Find out how this service can help supplement *your* next idea. Write Dept. PAB-12, 2322 West Third Street, Los Angeles 54, California.

UNITED STATES GYPSUM

the greatest name in building

USG

UNITED STATES

Santa Monica's reversal on Ocean Park bids creates storm

Decision of the Santa Monica Redevelopment Agency to allow four finalists "a second opportunity to look at its bids" for the 36-acre Ocean Park Project has drawn sharp criticism from the leading contender.

Kern-Webb (Kern County Land Co. and Del E. Webb Corp.) in a letter which it made public late in July said it would withdraw from the project if the agency "does not live up to its earlier commitments."

The agency narrowed a field of 10 proposals made in March down to four finalists, then proceeded to reverse its previously published intentions by asking for revised bids.

Director R. F. Priebe, who has taken responsibility for "changing procedure in midstream" as he puts it, explained that the action was taken only after the four had been reviewed by Santa Monica building officers, an economic consultant and the City Planning Commission. He insisted he was acting in the best interest of the city and the agency.

With Welton Becket & Associates as architect-planners, Kern-Webb got the top recommendation of the Santa Monica Citizens Progress Committee, whose opinion is to count more than one-third toward the final choice. The letter submitted to the agency by the developer's general manager, Axel Johnson, reads:

"We have reviewed your executive director's letter of June 26 and the minutes of the meeting of the Santa Monica Redevelopment Agency forwarded with it. At that meeting it was decided to permit four of the 10 original contestants on the Ocean Park Project to revise their bids.

"Our proposal was the result of careful study and represents our estimate of the best offer that can be made on a sound business basis. We feel, supported by the published opinions of citizens' groups and consultants selected by the agency, that it was the best of those submitted.

"We were assured repeatedly, before and after submitting our bid to the agency, that the successful redeveloper would be selected on the basis of his original bid. It was understood that details of the final definitive contract would be the subject of negotiations with the selected developer, but that basic concepts would remain unchanged. We see no need for revised bids, nor do we feel that the request for new bids is justified or proper in the circumstances. At the very least, we believe that this unexpected step in the procedure can only serve to make responsible organizations hesitant to enter such competitions in the future.

"The decision to permit four of the 10 contestants to submit new bids presents an additional serious problem. It is the opinion of our legal counsel that this procedure is improper in principle, discriminatory and of doubtful legality. Counsel advises that Kern-Webb, selected on the basis of a revised bid, might, with the agency and the city, be exposed to legal attack by taxpayers or others.

"Kern-Webb feels that it has no choice but to stand on its original proposal. When selected we will be happy to negotiate on any appropriate point in that proposal. For example, our plan will have to be modified to meet the city parking ordinance, revised since our bid was made.

"For the reasons cited above, however, we cannot submit a new bid."

New business technique tried on Red Rock Hill competition

The San Francisco Redevelopment Agency, which appears to be setting a new—and high—standard in the conduct of its architectural competitions, has gone one step further in the Red Rock Hill program. A 22-acre site on Diamond Heights suitable for the development of about 1,000 view apartments will be sold on a simple bid basis October 24.

In a 24-page "developer guide statement" issued in August, the agency carefully has spelled out the sale of land relative to four schematic plans chosen from a national competition, one of which the top bidder will develop.

"Quite apart from the important features of design and site, there is being tried for the first time a technique that may well offer the best of the benefits of business and architectural competitions without inordinate cost," explains M. Justin Herman, the agency's executive director, in a statement accompanying the brochure.

"In the Red Rock competition the private developer, after having had a large volume of design exploration done for him and the opportunity to exercise his business judgment as to which of the four schematic designs he prefers, may then bid on a dollar basis for the site. For the successful and unsuccessful developer alike, this is indeed a simple process and it is also a very inexpensive one."

Six Colorado firms cited in AIA design program

Eight buildings designed by six firms have been premiated in the initial Honor Awards program of the Colorado Chapter, AIA. Specific projects and degree of the award will be announced at a banquet September 15.

Winning architects are Fredric A. Benedict, Aspen; Bunts & Kelsey, Colorado Springs; and Moore, Sink & Bush, W. C. Muchow, Tician Papachristou and Donald R. Roark, all of Denver.

Jurors were Pietro Belluschi, dean of the School of Architecture and Planning, Massachusetts Institute of Technology; Walter Netsch, Chicago, partner in charge of design for Skidmore, Owings & Merrill; and Elisabeth Kendall Thompson, Berkeley, western editor of Architectural Record. DeVon Carlson chairmaned the awards committee.

In its report the jury said it had been deeply concerned with the problems faced by the architect in trying to recapture and express in his work the values that have hitherto motivated society, but which are today being increasingly dissipated.

"The loss of these values is obvious in the vulgarity which threatens to overwhelm our cities and which takes its toll in vitiating the quality of our physical environment. The disorder and discord produced by the confusion and multiplicity of signs and lights along city streets—and even on highways through otherwise open country—are only one manifestation of this vulgarity. Instead of a clear appeal to passersby, such confusion evokes only an impression of mumbo-jumbo. And the commercial buildings on which these signs hang are themselves a hodge-podge, a nerve-jangling disunity.

"It is up to the architect to set a standard in design not only of individual buildings but of their relation to the city of which they are a part and to the people whose environment they help to shape. Unless he does this, the values that spell out human dignity will be utterly lost in our man-made physical environment."

The jurors further stated they "are surprised and disappointed that the quality of school buildings submitted was no higher and have wondered if the limiting factor is outside the architect's responsibility. We are surprised that there were no motels, no vacation houses and so few recreation buildings submitted from an area with such notable vacation potentials. The small number of industrial buildings from an expanding area such as this was also disappointing."



CENTURY CITY PARTICIPANTS I. M. Pei, Minoru Yamasaki, Pietro Belluschi, Frederick Gebers (executive director) and Welton Becket study model of initial office building.

Star-studded cast plans Century City project

Tabbed the largest private urban development project in the U.S. by its sponsors, Webb & Knapp, Inc., and Aluminum Company of America, Century City is getting underway in earnest on 180 acres in West Los Angeles.

Master planning the project is Welton Becket & Associates, whose new offices (PA&B, Aug. '61) are the first part of the development, with Dean Pietro Belluschi of MIT as consultant.

New Yorker I. M. Pei, architect for several major buildings in downtown Denver, currently is designing the first 500 apartment units in association with the Becket firm. These will be located on Pico Boulevard at the eastern entrance to the Avenue of the Stars.

Minoru Yamasaki of Birmingham, Mich., selected by Western Hotels to design its $12 million project, is preparing a site plan for the hotel adjacent to a landscaped central plaza. Initial phase of the hotel will call for 500 rooms, garden cabanas, banquet facilities and parking for 2,000 cars. Space for the addition of another 500 rooms will be provided.

Bulldozers already are spewing up the ground to prepare the site for the start of work on the extensive road system required by the huge development. Work on this phase is scheduled for completion late in 1962.

William Zeckendorf, Webb & Knapp executive vice president explains: "We are keeping strong control of all aspects of the design of Century City, even to the street signs and the paving patterns, to assure the people who live and work and shop within its boundaries the most pleasant and beautiful environment to be found in any city."

Alcoa's primary interests in the venture lies in the program's opportunity to develop new uses for aluminum, especially in apartments.

Southland builders seek to improve bidding practices

Beginning September 11 a non-profit Construction Building Practices Conference will get underway in Southern California, headed by Walter A. Smith Jr. and sponsored by groups of general contractors, subcontractors and material suppliers in the Los Angeles area.

Need for such a bidding conference was apparent to these groups because the current system is such that general contractors receive prices from material suppliers and subcontractors within a few minutes of bid closing time, making it impossible to reconcile the many subcontract bids and material bids.

This, says Smith, makes it difficult for the general contractor to determine the lowest bidder or if the lowest bidder is capable of handling a particular job. Results of the old system, he explains, have been business failures or work done at big losses resulting in excessive amounts of field problems to both architects and owners.

The bidding practices conference really began early in 1960 when general and subcontractor associations formed an executive committee of 10 men—equally divided between generals and subs—to formulate a general plan for improving the bidding practices as currently exist in Southern California.

The committee, Smith adds, used as a guide, with considerable revisions to meet local conditions, a similar program that has been operating in Charlotte, S.C., since 1957. The plan, he points out, has been reviewed by legal counsel, the California state attorney general and the U.S. attorney general to determine not only its legality, but to also make sure that it did not in any way prevent or prohibit competitive trade.

The overall purpose of the program is to establish fair, competitive and ethical bidding practices throughout the construction industry in Southern California. All general contractors, subcontractors and material suppliers have been encouraged to participate in the program, but membership in a supporting trade association is not a requirement for affiliation with the conference nor does it constitute membership in the conference.

In outlining the way the bidding practices conference will work, Smith states that subcontractors and suppliers must submit their bid to general contractors a minimum of four hours prior to bid opening and must, at the same time, file a copy of the bid in bid envelope with the conference. Bid envelopes remain unopened in the conference office and are destroyed 120 days after bid open unless a grievance arises.

The general contractor who is apparent low bidder must immedi ly file and make public through conference a written list of all bidders whose subbids are more th $1,000 and used in compiling the g eral contractor's bid.

If a grievance between a subco tractor and general contractor occu a grievance committee is appoint by members of the executive co mittee of the conference and essen envelopes are moved from file to opened in the presence of the co mittee and grievors.

The grievance committee, equal divided between generals and sub serving on the conciliation committe will then seek to satisfy the interes of both parties and conclude satisfa torily the arbitration under the rul and regulations of the conference.

Smith says that once the subbide has submitted his bid to the gener and filed a duplicate with the co ference he cannot amend his bid any way. However, he points ou up to one hour prior to the actual b opening, he may withdraw his bid he so desires.

Most generals and subs as well material suppliers have been mail an agreement booklet which expla operations and conditions for joini the conference. Membership fees f the general is $50 a year and $10 f 40 bid envelopes for subcontracto and suppliers.

"We do not intend to have sta rules and regulations," Smith asser "and after we get into full operati September 11, there may be a need expand the present regulations enable the active participation segments of the industry possibly n covered at the present time."

To start the conference, money h been loaned by many generals, su and material suppliers associatio These loans were secured by a on year note and Smith feels will be ea ily repaid once the conference ge into full operation.

Serving on the executive committe are J. W. Bernad, chairman; Wi Rawlins, vice chairman; Stanley B Brekhus, secretary; Clarence V. Hol er, treasurer.

Others are Wade A. Perong, Job E. Meskell, John Moulder, J. Fran Park, Austin Dwyer and Edward B Fochel.

Legal counsel is G. M. Cox; co counsel, Henry B. Ely.

Offices of the bidding practice conference are located at 1725 Bev erly Blvd., Los Angeles 26.

Building standards measure is defeated in California

Long-range legislative efforts of the California Council, AIA, which earlier had won an important campaign in the selection of private architects to design state college buildings, suffered a setback in July regarding a measure to give the State Building Standards Commission authority to adopt a uniform building code.

Gov. Edmund Brown in his pocket veto message said Assembly Bill 1739 "would be concerned with resolving code conflicts among state agencies; most such conflicts exist among local agencies over which the commission would have no power."

On a somewhat optimistic note, however, CCAIA Executive Director Melton Ferris called the governor's action "only a temporary setback in the long campaign by architects, engineers, contractors and subcontractors to eliminate the wasteful maze of overlapping codes and regulations often encountered."

Still there was other good news for the profession. Assemblyman Edwin Z'berg's bill was signed into law providing for a competition open to all architects for design of the governor's mansion. AB 2986 further allows for awards to the top 10 architects selected by a jury with the first four prizes to be graduated in amount.

Meanwhile, the Board of Trustees of California State Colleges appointed an advisory committee for selecting private architects: William Allen, San Francisco; George J. Hasslein, San Luis Obispo; and Eugene Weston, La Jolla. The committee will serve to develop a questionnaire to be sent to all registered architects in California inviting them to submit their qualifications for state college work. Next it will screen the questionnaires and provide the trustees with two panels of architects: one for master planning the individual state colleges and one for the development of individual building projects. The panel for master planning will have about 45 names; the one for project development, 100.

Other bills of interest to the building industry signed into law as reviewed in the CCAIA monthly newsletter are:

- AB 178—Adopts as the official state plan, the plan for location of state buildings and other improvements in the Capitol area as approved by the Capitol Building and Planning Commission on February 15, 1961.
- AB 787—Abolishes the State Housing Commission. Authorizes the chief of the Division of Housing, with the approval of the director of industrial relations, to adopt rules and regulations relating to housing.
- AB 1541—Prohibits the state and any public agency from providing specifications on public works 1) in such manner as to limit the bidding to one bidder or 2) designating a material by brand or trade name unless the specifications are followed by the words "or equal."
- AB 2983—Provides for the experimental establishment of regional hospital planning in the San Francisco Bay area and the Los Angeles metropolitan area.
- SB 115—Provides for addition of a public member to various boards including the Board of Architectural Examiners.

Architectural examiners face suit in New Mexico

A suit was filed in Santa Fe, N.M., District Court August 3 attacking the constitutionality of the licensing procedures employed by the State Board of Examiners for Architects.

Donald S. Hawley of Bernalillo, hired as an architect by the federal government and a graduate of the University of Michigan, Ann Arbor, filed suit against the board and its members: Robert Graef, Santa Fe; Kern Smith, Carlsbad; Frank M. Standhardt, Roswell; James Burran, Clovis; and Lawrence Garcia, Albuquerque.

The action claimed the board and its members "unlawfully, maliciously and corruptly" conspired to fail Hawley on his architectural examinations, it was reported.

Hawley contended he took the examination in January 1960 for the third time in three years and made a passing grade, "prescribed by applicable regulations." However, he said, the board refused to issue him a certificate of registration because it "differed with the petitioner as to esthetic principles on said examination and therefore failed to give petitioner a passing grade."

He asked the court to compel the board to issue him a certificate to practice architecture in the state or to show cause why the board should not do so.

Hawley explained he has been employed by the Bureau of Indian Affairs for six years and was responsible for the production of an architectural design standards manual which is used all over the country by the agency.

He said he filed the suit because he feels esthetics is not a proper concern of the law and police powers of the state.

Los Angeles architects develop theme for building show

Theme for the 1961 Western Building Industries Exposition to be held in Los Angeles' Great Western Exhibit Center October 7-10 is being developed and will be presented by the Southern California Chapter, AIA.

"The participation of the AIA as a joint sponsor of WBIE is both welcome and appropriate," comments Warren Driver, Los Angeles building contractor and provisional chairman of the exposition council. "Western designs and materials are setting the major architectural trends throughout the nation," he points out, "and the architects of the region thereby exert a powerful, far-reaching influence in today's market for building materials."

Earl Heitschmidt, Lawrence Davidson and Kemper Nomland are representing the AIA on the policy guidance body for the exposition; Edwin Woodrich, AIA exhibit chairman, is in charge of the theme display; and Don Park is AIA liaison.

The WBIE theme is expected to cover the four aspects of the construction market which are encompassed in the four-day show—residential, commercial, institutional and industrial—and to emphasize the challenge of leadership which western architecture faces in this decade.

Denver will host two national concrete industry meetings

Two national organizations devoted to the interests of the concrete industry have selected Denver for their next conventions.

"New Opportunities in Structural Design" will be the theme of the seventh conference of the Prestressed Concrete Institute set for October 15-19 in the Cosmopolitan and Brown Palace hotels. Keynoter will be Thomas H. Creighton, editor of Progressive Architecture.

Close to 10,000 delegates, including a large representation of architects and engineers, are expected to attend the sessions, held in cooperation with the University of Colorado.

The American Concrete Institute will hold its 1962 convention in the Brown Palace Hotel March 12-15.

Presiding will be Lewis H. Tuthill of Sacramento, elected to the presidency of the 10,300-member organization earlier this year in St. Louis. Concrete engineer with the Division of Design and Construction, California State Department of Water Resources, he succeeded Prof. W. Kelly of the University of California, Berkeley.

new offices, partnerships

Arvid G. Johnson has opened an office for the practice of architecture at 2520 N. 16th St., Phoenix. A graduate of Kent State University, he has been registered in Arizona for 1½ years.

James Ginn Chinn has established an architectural practice at 672 S. Lafayette Park Place, Los Angeles.

William I. Williams has opened an office for the practice of architecture under the name of William I. Williams Associates in the Mayer-Central Building, 3033 N. Central Ave., Phoenix.

Donn Sibold and Harold J. Nesland, Seattle architects, have formed a partnership at 1020 E. John St.

Victor O. Gray and Daniel J. Evans have merged their private engineering practices under a new partnership with offices in the 1411-Fourth Avenue Building, Seattle. The firm will specialize in civil and structural engineering and feasibility studies. Gray opened his own office in 1958, while Evans was assistant manager of the Mountain Pacific Chapter, AGC, from 1954-59, when he entered private practice.

Maxwell G. Hess and George T. Sonntag have formed a partnership as consulting mechanical engineers at 1015 S. Seventh East, Salt Lake City. Hess formerly was associated with the architectural firm of Barker, Clayton & Hess.

firm changes

The firm of David Hyun & Associates has become Hyun & Whitney, Architect & Associates, with Richard W. Whitney as the other principal. Offices are at 1025 N. Vermont Ave., Los Angeles.

The Portland architectural firm of Burns, Bear, McNeil & Schneider has been succeeded by Bear, McNeil, Schneider, Bloodworth & Hawes. Tom Burns died July 2. Partners in the new firm are Wyman K. Bear, Harold C. McNeil, John T. Schneider, Robert L. Bloodworth and Richard Z. Hawes, the latter two having been associates.

deaths

Seattle architect William Aitken, 71, died July 23 following an illness of several weeks. A native of Scotland and a graduate of Glasgow Technical College, he had maintained an office in Seattle since coming from Vancouver, B.C., in 1914. Two of his best-known projects are Sick's Stadium and the Yesler Housing Project.

new addresses

Wicks & Brown, architects, to 818 Commercial St., Astoria, Ore.

Howard Schroder, architect, to 375 N. Fulton St., Fresno, Calif.

Nixon & Jones, architects, to 1240 Pearl St., Boulder, Colo.

Karl Treffinger, architect, to 2161 Shattuck Ave., Berkeley.

Benton & Park, architects, to 10817 Santa Monica Blvd., Los Angeles.

John K. Smeed, architect, to 12530 S.W. Highway 217, Portland (part-time office continues to be maintained in McMinnville).

Ratcliff-Slama-Cadwalader, architects, to 3408 Grove St., Berkeley, and 6117 Grove St., Oakland.

Donald W. Bogard & Associates, architects, to 511 N. Central, Kent, Wash.

Stanley G. Gould, architect, to 1275 Lincoln Ave., San Jose.

Irving Coryell, architect, to 4009 Menaul Blvd. N.E., Albuquerque.

Stanley M. Stein, Inc., architect, to 749½ W. Camelback Road, Phoenix.

Alfred Johnson, architect, to 812 Howard St., San Francisco.

George S. Wright, architect, to 4100 Silver S.E., Albuquerque.

Cornell, Howland, Hayes & Merryfield, consulting engineers, to 414 N. First St., Boise.

BRUNNER SCHOLARSHIPS

Applications will be accepted to January 15 by the New York chapter, AIA, for one of the nation's top architectural awards, the Arnold W. Brunner Scholarship, a $5,000 grant. Open to U.S. architects who have advanced professional background, the scholarship calls for "study in some special field of architectural investigation which will contribute effectively to the practice, teaching or knowledge of the profession." Further details are available from the chapter at 11 E. 40th St., New York 16, N.Y.

elections, appointments

Sacramento Chapter, Construct Specifications Institute, has el an architect as its new presi George Lionakis of the firm of C Liske-Associates. Completing the are Hal Okholm, architect, and J Gettman, Koppers Co., vice pr dents; and Donald Clark, Divisio Architecture, secretary-treasurer.

Denver Chapter, CSI, has elec architect Max Saul to head its orga zation for the new term. Others Charles B. Hazelwood, architect, f vice president; Thomas W. Kee Jr., Western Mineral Products C second vice president; A. B. Mann K C Construction Supply Co., tre surer; and Donald A. Wakefie Structural Clay Products Institu secretary.

Structural Engineers Association Oregon has picked these office Robert R. Adams, Corvallis, presid Cyril Burgstahler, Portland, vice pre ident; and Carl Rohde, Oswego, se retary-treasurer.

Consulting Engineers Associati of Washington has elected Norman Carson of R. W. Beck & Associat Seattle, as its president for the ye beginning July 1. Other officers a Joseph Lamont Jr., vice preside Charles R. Lyon, secretary; and All E. Hill, treasurer.

Architect George T. Rockrise h been appointed to the San Francis City Planning Commission.

Harold D. Hauf, dean of the Scho of Architecture at Rensselaer Poly technic Institute and formerly chai man of the architectural departme at Yale University, has been nam vice president in charge of design an planning for Charles Luckman Asso ciates, Los Angeles architects-eng neers. Serge P. Petroff, director architecture, also has been elected vice president of the firm. He is graduate of Cornell University an had his own practice in New Yor before joining the Luckman organiz tion in 1958.

Los Angeles architect Arthur Rendon has been named to the Gov ernor's Advisory Committee on Chil dren and Youth.

James D. Cowan of Yakima ha been appointed to a six-year term o the Washington State Council of Ar chitects, succeeding Walter Roth whose term recently expired.

Geoffrey W. Fairfax, an associate in the San Francisco firm of Wurster, Bernardi & Emmons and project ar-

chitect for the Golden Gateway Redevelopment, has been appointed to serve on the San Anselmo Planning Commission.

✓ Woodbridge Marshall has joined the Los Angeles architectural firm of Robert E. Alexander & Associates to serve as chief of its planning staff. He has been associated with the County of Santa Clara and City of Richmond planning departments, the Community Redevelopment Agency of Los Angeles and Harold F. Wise Associates.

✓ Daniel, Mann, Johnson & Mendenhall, Los Angeles architectural-engineering firm, has appointed Bryon E. Barnes as staff planning consultant and John Clabby as vice president of the systems division.

competitions

✓ A $5,000 commission for a sculpture to be installed in the lobby of the Wilshire-Flower Building in Los Angeles has gone to a local artist, John Mason, as the result of a juried invitational competition.

✓ Jurors for a $3,500 design competition open to all registered architects, draftsmen and architectural students living or working in Los Angeles and Orange counties will be architects Carl Maston and Richard Dorman and M. F. B. MacBan, senior vice president of Metropolitan Savings and Loan Association of Los Angeles, representing the sponsor. Six winners in the competition, titled "The Challenge of Hillside Construction," will be announced November 15.

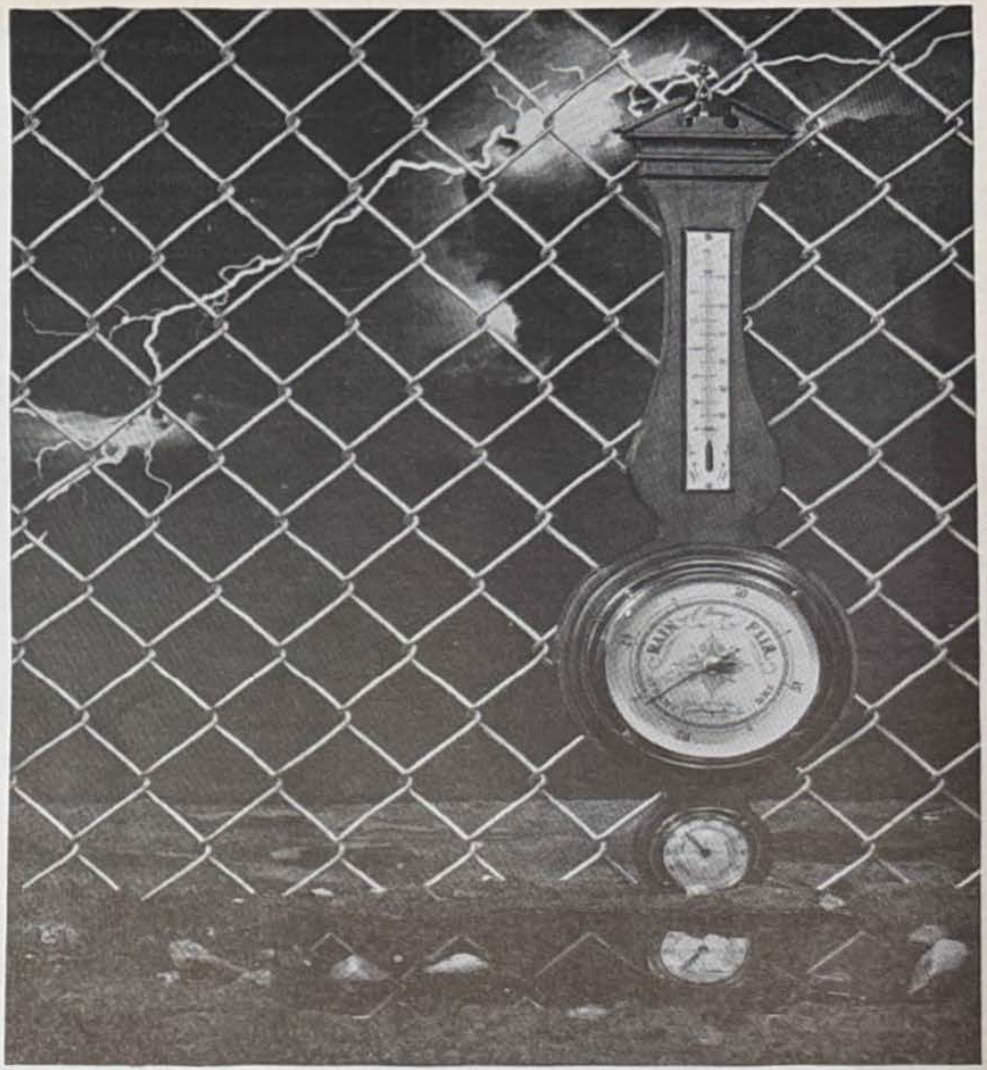
honors

✓ J. Donald Kroeker, Portland consulting engineer who heads the firm bearing his name, has been awarded the F. Paul Anderson Award by the American Society of Heating, Refrigeration & Air Conditioning Engineers. This was the first time that the award, made at the annual meeting in Denver, has gone to a man west of the Mississippi in the 30 years of its existence.

FOR SALE—Architect's Office

Completely equipped architect's office centrally located in downtown Seattle. Office, drafting room, reception area, secretary's alcove. Price will include office furnishings, three drafting tables and all equipment. This is an ideal opportunity for two or three young architects just opening their own practice. Very low rent. Phone for appointment.

ADams 2-0682



FORECAST: VIOLENT STORMS...BUT

Realock Fence will resist the foulest weather

That's because Realock is made from top grade steel wire, and is completely galvanized, making every foot thoroughly resistant to weather and corrosion. Realock Fence is a one-time investment that requires minimum maintenance.

For all enclosure jobs—from playgrounds to industrial sites—specify Realock Fence. Easy to erect, it's also ideal for right-of-way installations and for protection of equipment stored outdoors. Call the office listed below for full details and for prompt delivery. 8242



THE COLORADO FUEL AND IRON CORPORATION

Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

CF&I STEEL MADE IN U.S.A.

Stone's hospital puts every patient in private room

When Edward D. Stone's latest project now under construction on the West Coast is opened next spring, it will boast a feature that no other hospital in the U.S. can claim: all 100 patients' beds (expandable to 300) will be in private rooms.

With the architect's familiar imprinted pattern as surface decoration, the $2.5 million reinforced concrete structure will replace the present 40-bed Peninsula Community Hospital and the 20-bed Medical Annex six blocks away on a 22-acre site overlooking California's Monterey Bay.

Two atriums at the heart of the nursing units will provide sunny and enclosed exercise and relaxation spaces, protected from the cool coastal climate. Each one has 15 large plastic domes above it to admit sunlight. Four patient rooms will be grouped around a covered porch and balcony, affording a sense of indoor-outdoor living, desirable in recovery therapy.

Eight suites of two rooms and a large bath each are so planned that a patient's relatives may live in one of the rooms or the second may be used as a sitting room; or again both rooms could be employed for hospital bed purposes.

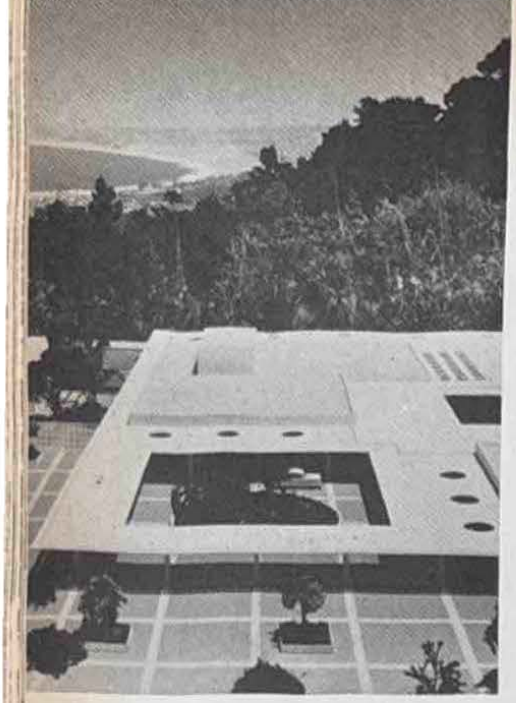
Automobiles will drive directly into a court of trees, ferns and hanging gardens so that patients may arrive and depart with the maximu comfort and ease. Glass ent doors will reveal still another of fountains and trees surrounde lounges and solaria. This is the of three large garden rooms w set the mood for the entire pro A second will be flanked by a leading to the edge of the forest. large rooms and four baths will commodate three children in eac a lower garden floor.

The dining room will have its sheltered outdoor terrace. Nearby be the laboratories and maternity administration sections. A sepa coffee shop also will be provided.

Service courts on the south north will be surrounded by a high patterned, pierced concrete w

Provision for expansion has b made at the south and north corn of the building by adding anot two-story nursing pavilion arran around a garden court and convert an outdoor dining area into nurs rooms.

Being built by Daniels & Ho Construction Co., the hospital incorporate 57,000 sq. ft. of floor a and 20,000 sq. ft. of garden spa Construction, equipment and furni ing costs are being financed entir from donations and without bene of federal and state grants.



ENTRANCE COURT to hospital, sited on Carmel Hill in Del Monte Forest between Monterey and Carmel, leads to another water court, partially indicated at right by black square.

PATIENT ROOMS continue on two levels around downhill side of hospital, all with unobstructed views of forest, mountains and sea. Planter boxes on balcony edge and at lower floor windows will add seasonal color.

Karl H. Riek pho

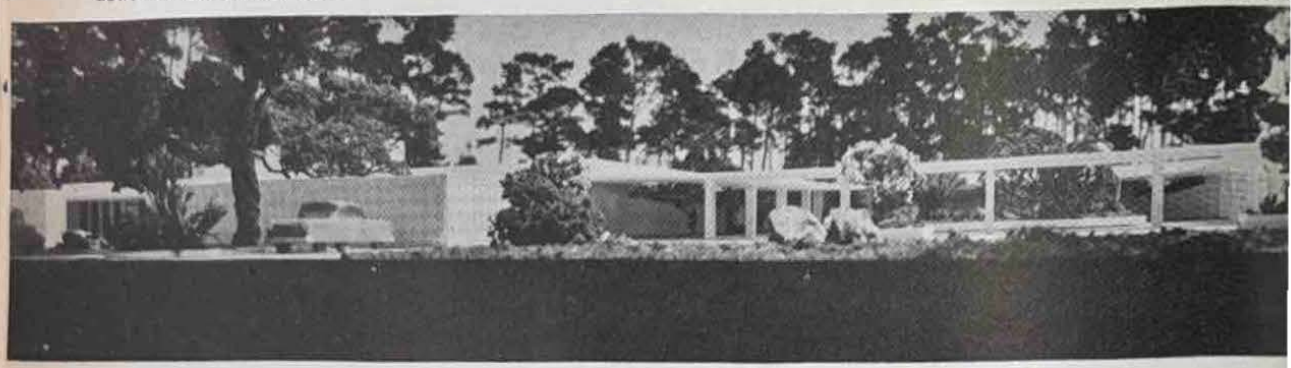




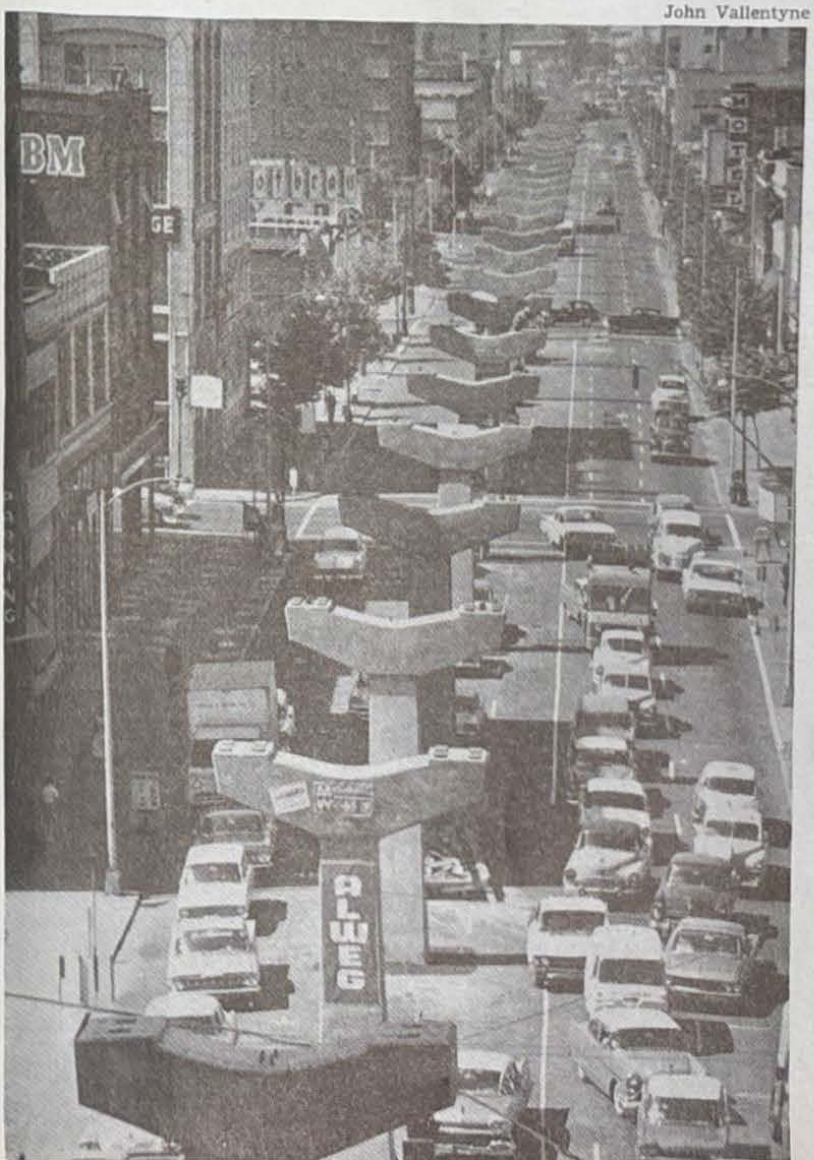
Photo editorial

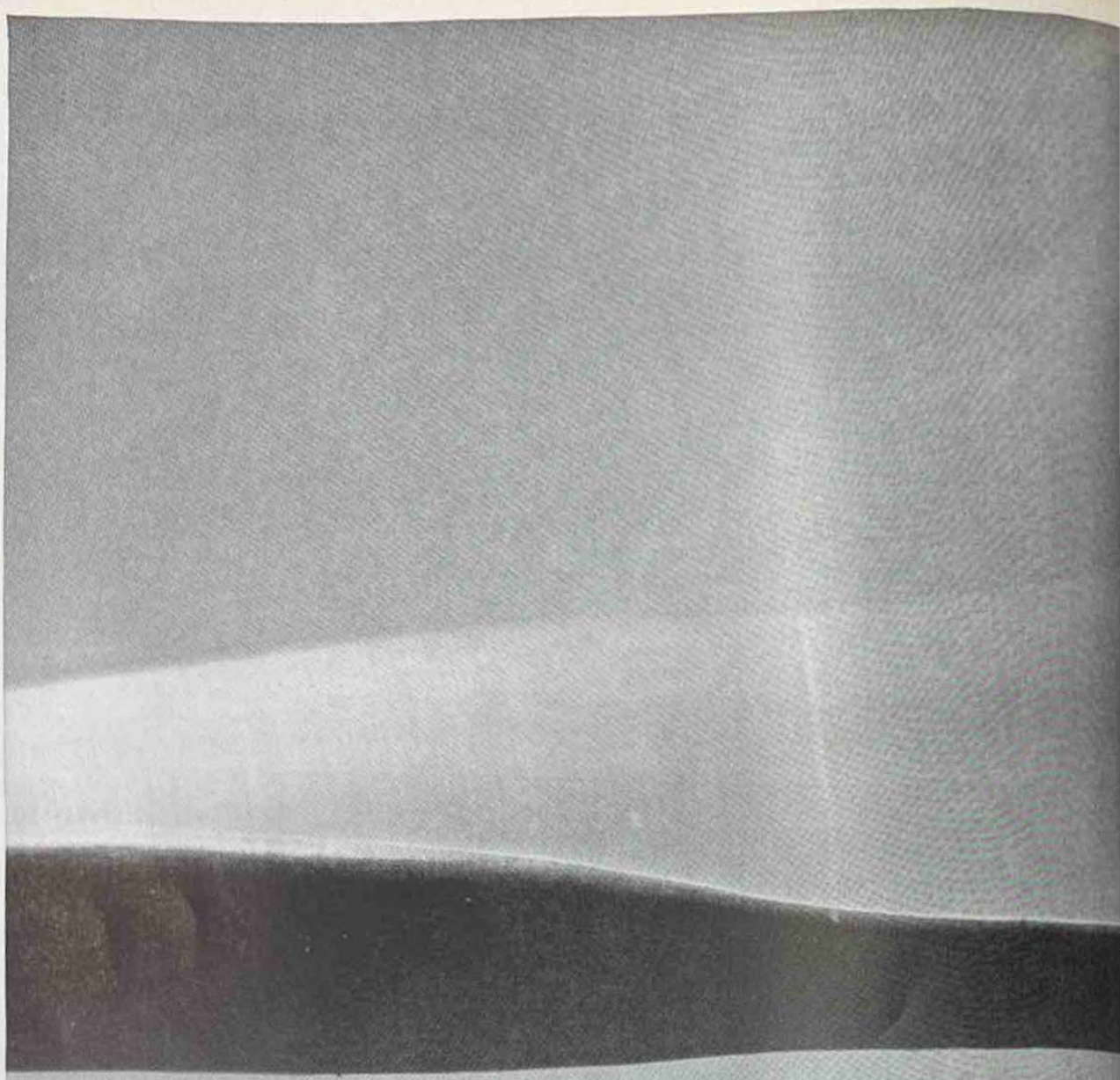
MONORAIL: AN EXCITING APPROACH TO SEATTLE WORLD'S FAIR

Beautifully executed, T-shaped pylons (their graceful form is a most pleasant surprise!) proudly march right up the middle of Seattle's Fifth Avenue on their way to the 1962 World's Fair, awaiting the 90-ft. concrete beams atop which Alweg's double-rail train will track before year's end. It's a truly fascinating project in more ways than one. As America's initial public experiment with this mode of rapid transportation, it has captured the interest of the entire U.S. and we must admit to being a bit excited about the prospect of our first ride. But what has really excited us more is the disciplined coordination of the many-faceted construction methods, progressing from a prosaic well-drilling operation to prepare for concrete anchors to the perfection of forming for 54-ton pylons that are cast on the site and raised into place by crane—all with relatively little interference to traffic on a busy street and ahead of schedule to boot.

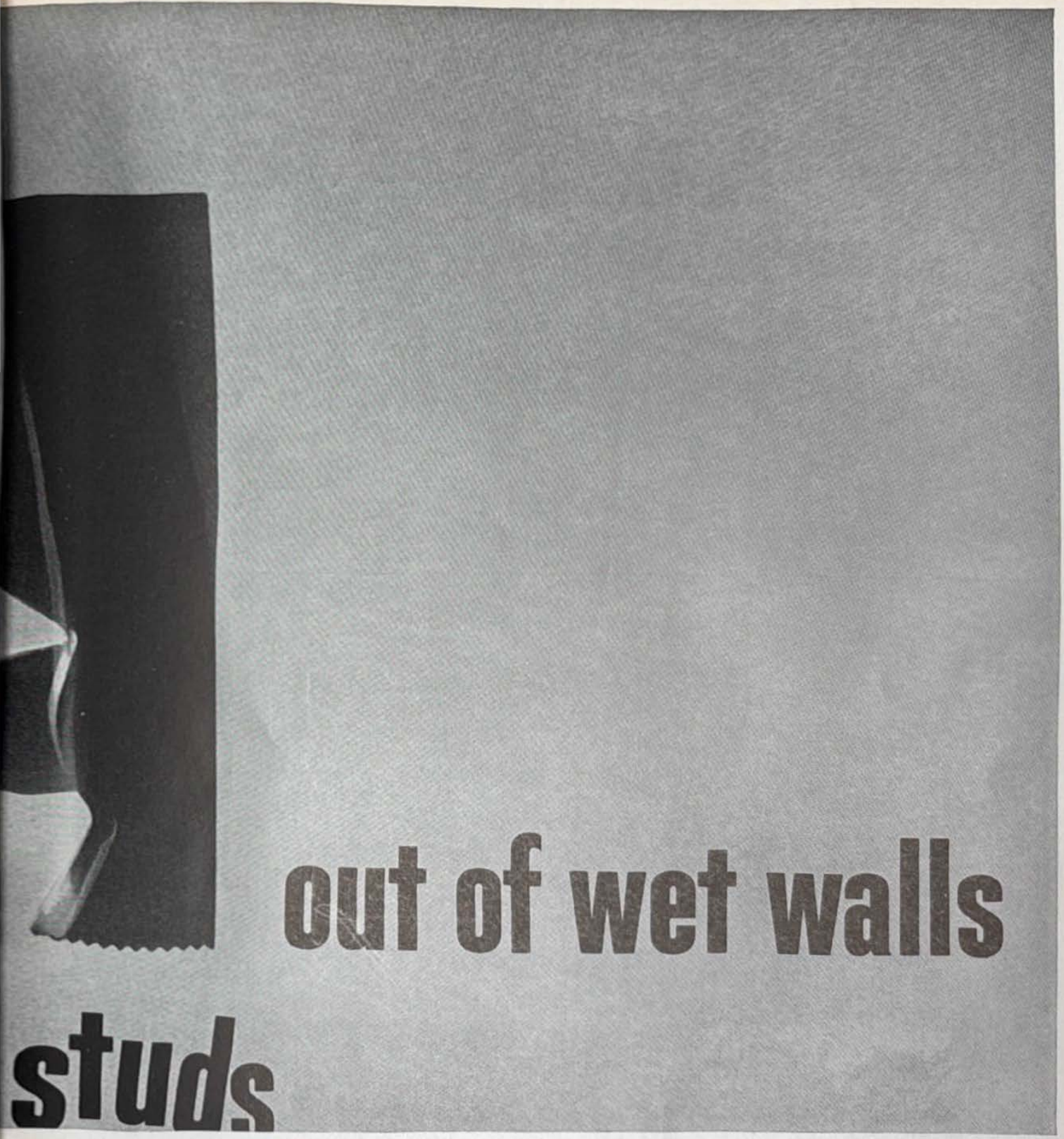
What's taking place at the end of the monorail's 1.2-mile run has caught our imagination too. If Pacific Architect & Builder seemed lukewarm to the whole idea at first, we editors today are firmly convinced that this is not just another World's Fair with its customary carnival atmosphere, gimmicks and all the rest. The 74-acre site is compact, to be sure, but it will produce better buildings per square foot than any other exhibition of its kind to date. With some of the top architects of the Northwest—in a few cases the nation—in the driver's seat, the fair is shaping up as a significant building complex: significant from the standpoint of design, of engineering, of methods and materials. We dare say anyone who has visited the site within the past month shares our enthusiasm. It seems appropriate then that we initiate a month-to-month construction progress report in October, climaxed by an all-Century 21 issue prior to the opening next April.

John Vallentyne



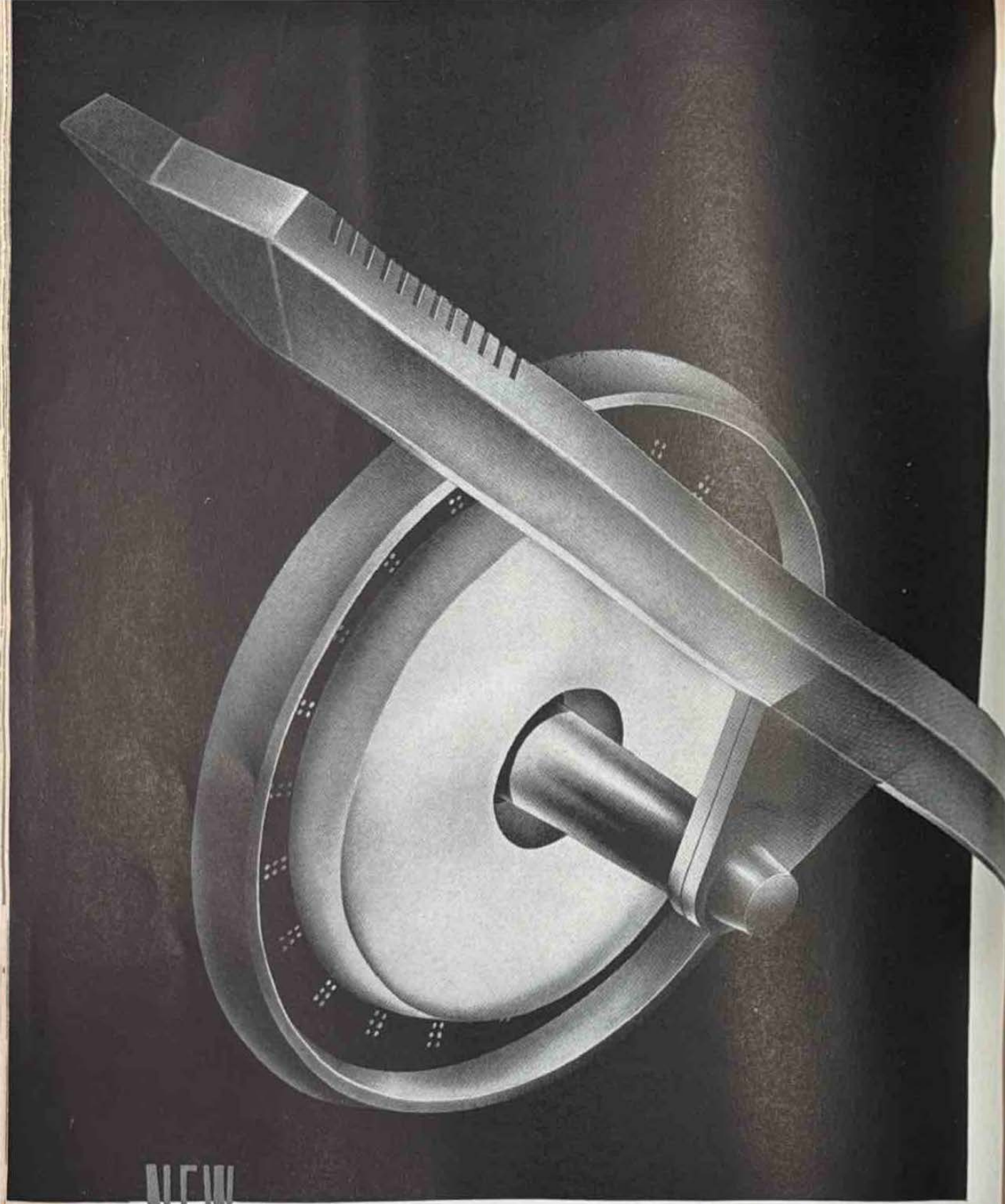


now Pabco knocks th



with new Key-Grip Wall 40. It's the first hollow 3" thick non-load bearing gypsum lath and plaster partition system to eliminate wood studs. You save time, save money, save valuable floor space—nearly one square foot for every five lineal feet of partition. And you have a plastered wall that's strong, fireproof, versatile for handling electrical conduit—and one that has excellent sound-proofing qualities (average sound transmission loss: 40 decibels!). For architectural details and specifications on Key-Grip Wall 40 write today to: Pabco Technical Services, Fibreboard Paper Products Corporation, 475 Brannan Street, San Francisco, California.

GYPSUM ROOFING AND SIDING, INDUSTRIAL PRODUCTS, PAINT . . . FROM PABCO DIVISIONS OF FIBREBOARD PAPER PRODUCTS CORPORATION. FIBREBOARD IS ALSO THE WEST'S LEADING PRODUCER OF PAPERBOARD AND PACKAGING.



NEW ILLUMINATED WALL BRACKET spotlights handrails in corridors and stairways . . . Incandescent recessed lighting provides added safety and decorative night lighting for:

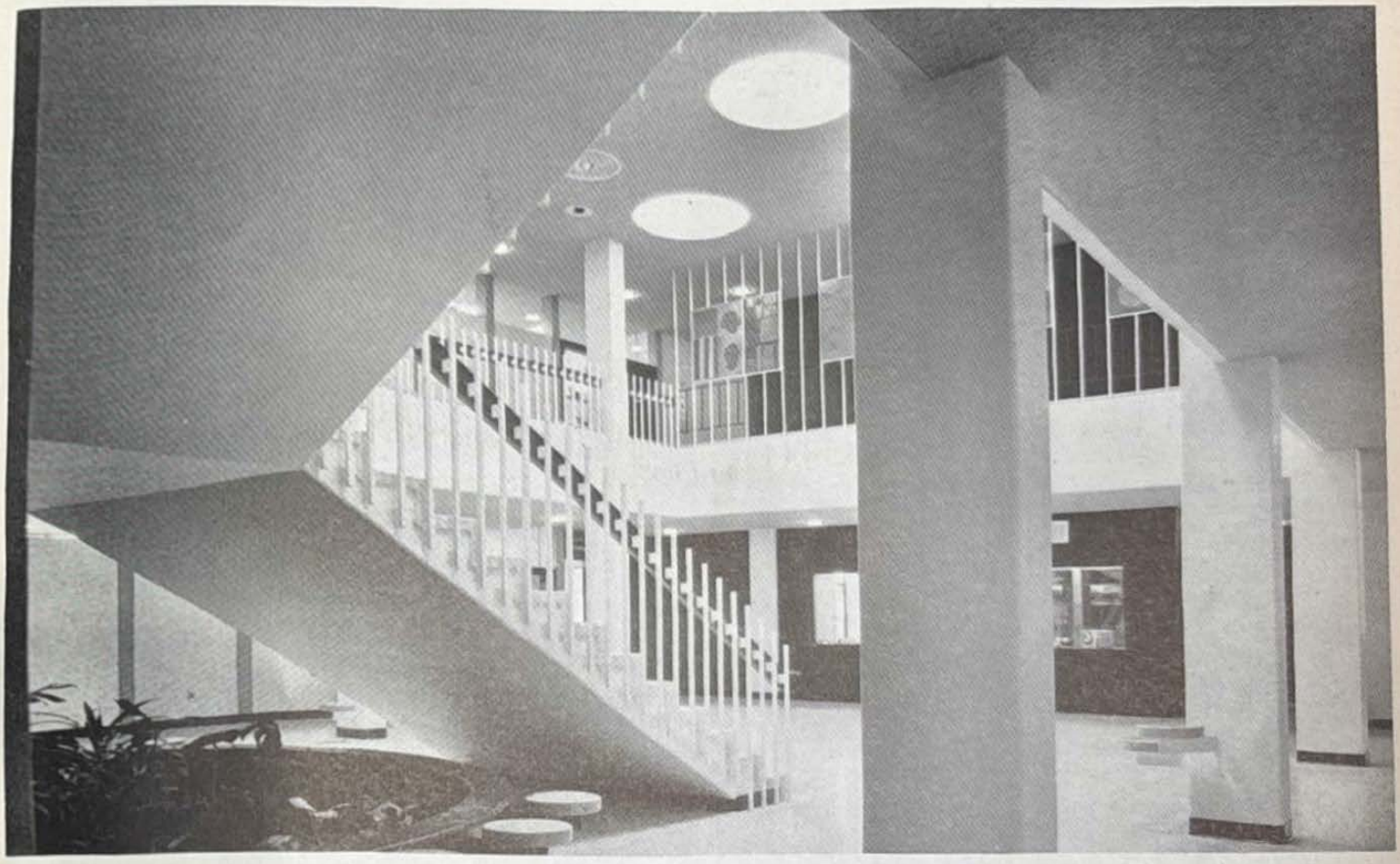
HOSPITALS • HOMES FOR AGED • THEATRES • HOTELS • SHIPS

Blumcraft OF PITTSBURGH

GENERAL CATALOG OF COMPLETE BLUMCRAFT LINE AVAILABLE ON REQUEST

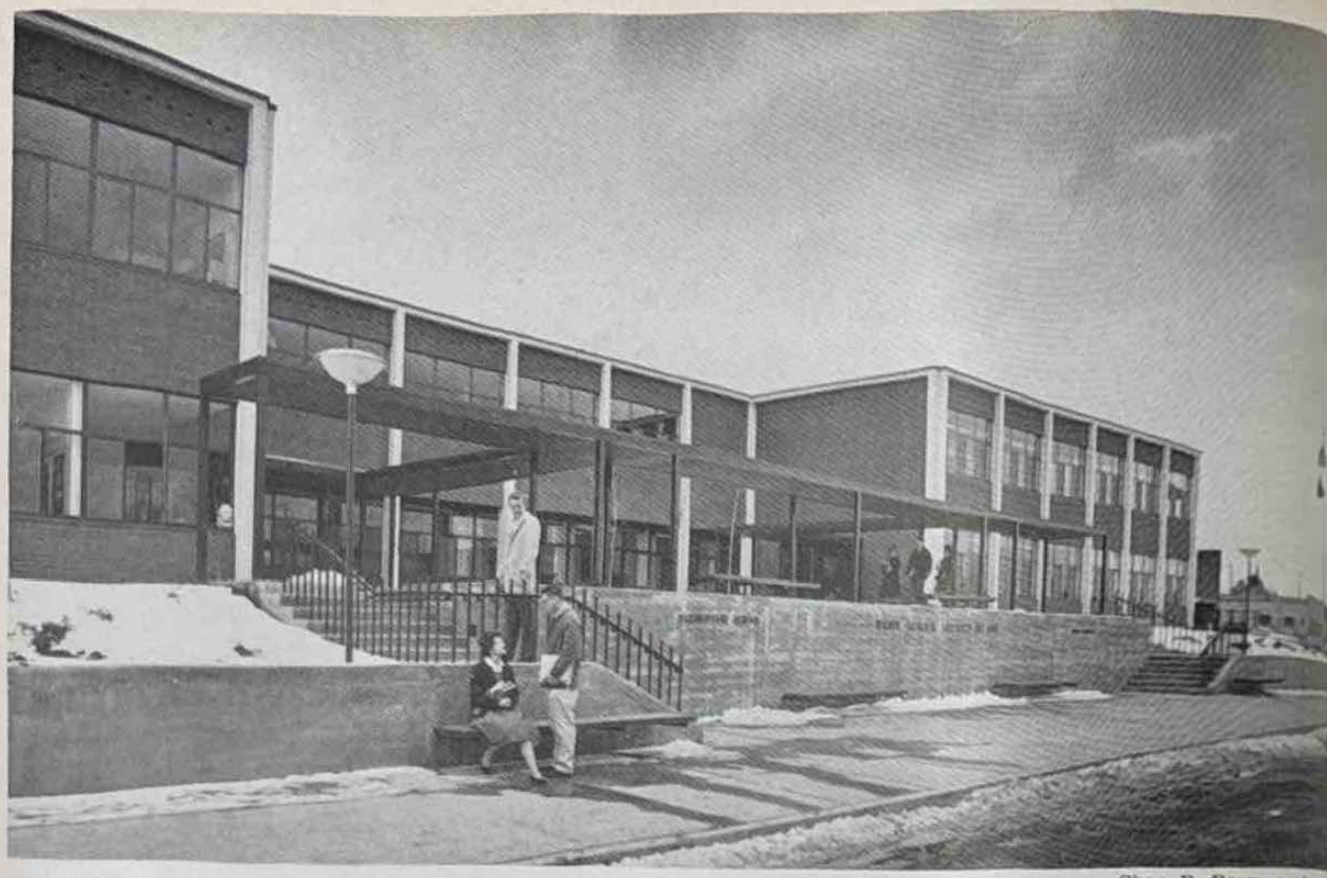
COPYRIGHT 1961 BY BLUMCRAFT OF PITTSBURGH • 460 MELWOOD STREET, PITTSBURGH 13, PENNSYLVANIA





The student square: a place for people

When the jurors for the Spokane Chapter, AIA, Honor Awards competition singled out this combination elementary-high school in a central Washington farming community for the top citation, they described the building as "well-proportioned, dignified and refreshingly free of cliche." The result was not at all surprising to anyone who had followed the project from its inception for the architects got things off to a good start with a fine documentation of the school and its departures from current trends, explaining in the preface: "These are primarily departures in the arrangement of space; no experimental structural shapes and no unproven materials have been used. It is hoped that these departures in the concept of space arrangement will be considered provocative and thereby become a contributing factor to the progress of education." The copy which follows, by and large, is taken directly from that brochure.



CENTRAL CORE, which separates elementary (282 students, 10 teacher stations) and high school (119 students) wings, contains administrative facilities for both schools on first floor and combined library for both on second floor. Reinforced concrete structure has brick exterior.

Chas. R. Pearson pho



SOLAR CONTROL is mandatory in Columbia Basin country because of hot days in spring and fall. Exterior sun blinds of canvas, adjustable and retractable, have been provided on south, east and west elevations. This system (used extensively in European schools) was considered a distinct advantage over fixed horizontal or adjustable vertical louvers because during cold winter months, light and occasional sunshine, plus view, are most welcome. Sun blinds cost about $7,000 vs. $20,000 for adjustable vertical louvers. In addition, landscape planting will include solar screen of Austrian pine between south side of building and playground which, after 20 years, will be high enough to take place of canvas sun blinds.

CURRENT EDUCATIONAL TRENDS place the elementar school on a separate site from the high school. Th Wilbur concept houses the elementary students se arately from the high school, yet connected by a centr core of facilities desirably common to both. The com mon administrative department allows teachers of a age groups to "compare notes" on student problem to improve the entire educational pattern. The com mon library, which has separate reading areas fo elementary and high school students, but only on reference section and librarian, allows the school district to offer a more complete selection of books than woul be possible if two separate libraries were provided This concept is no doubt most applicable to smal school districts.

Departure in concept of accommodating enrollment fluctuations

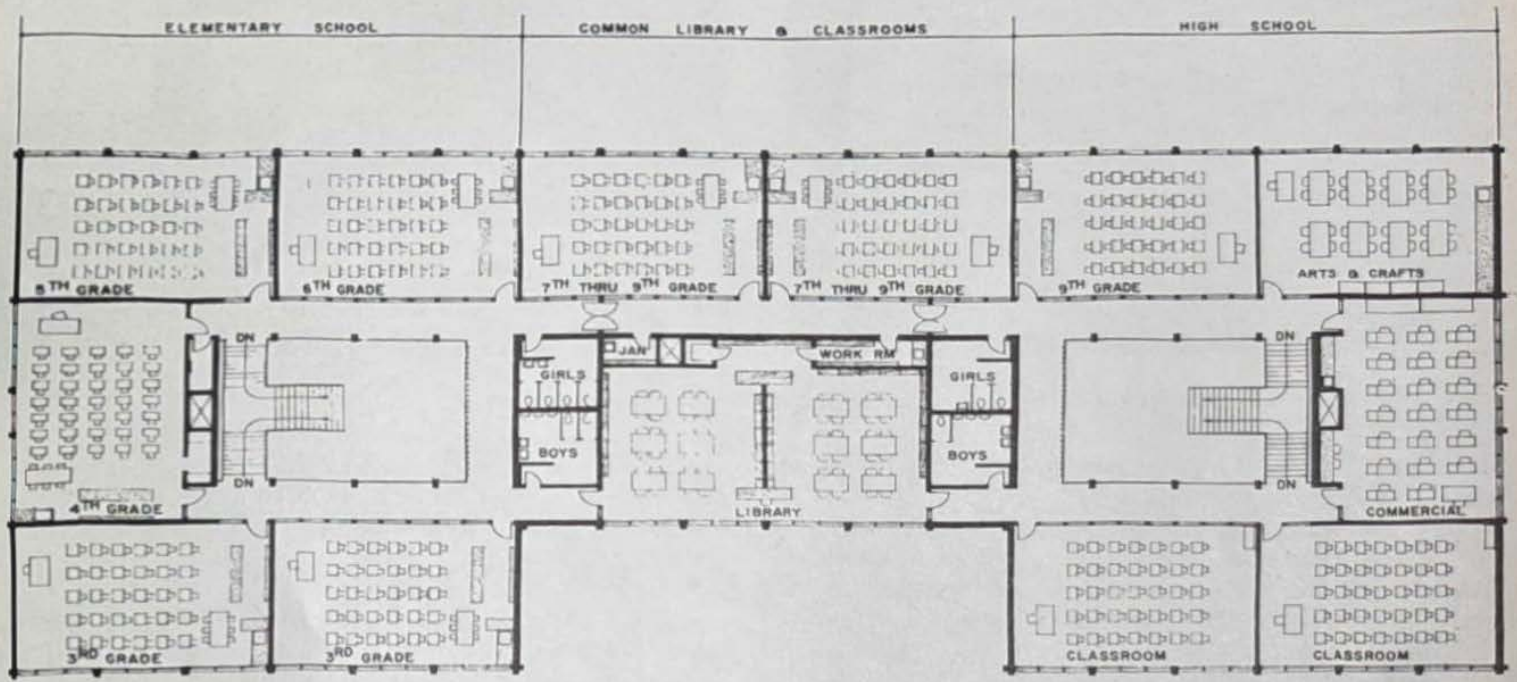
To accommodate enrollment fluctuations, two pro visions have been made: firstly, classrooms are of dif ferent sizes to allow the shifting of those classes havin large enrollments to the larger rooms (this is les expensive and more satisfactory than making all o the classrooms oversize or providing movable parti tions); secondly, there are two classrooms on the second floor in the central core area and adjacent to the library which may be used by either the elementary or the high school as enrollment fluctuations dictate–

Wilbur Elementary and High School
Wilbur, Washington

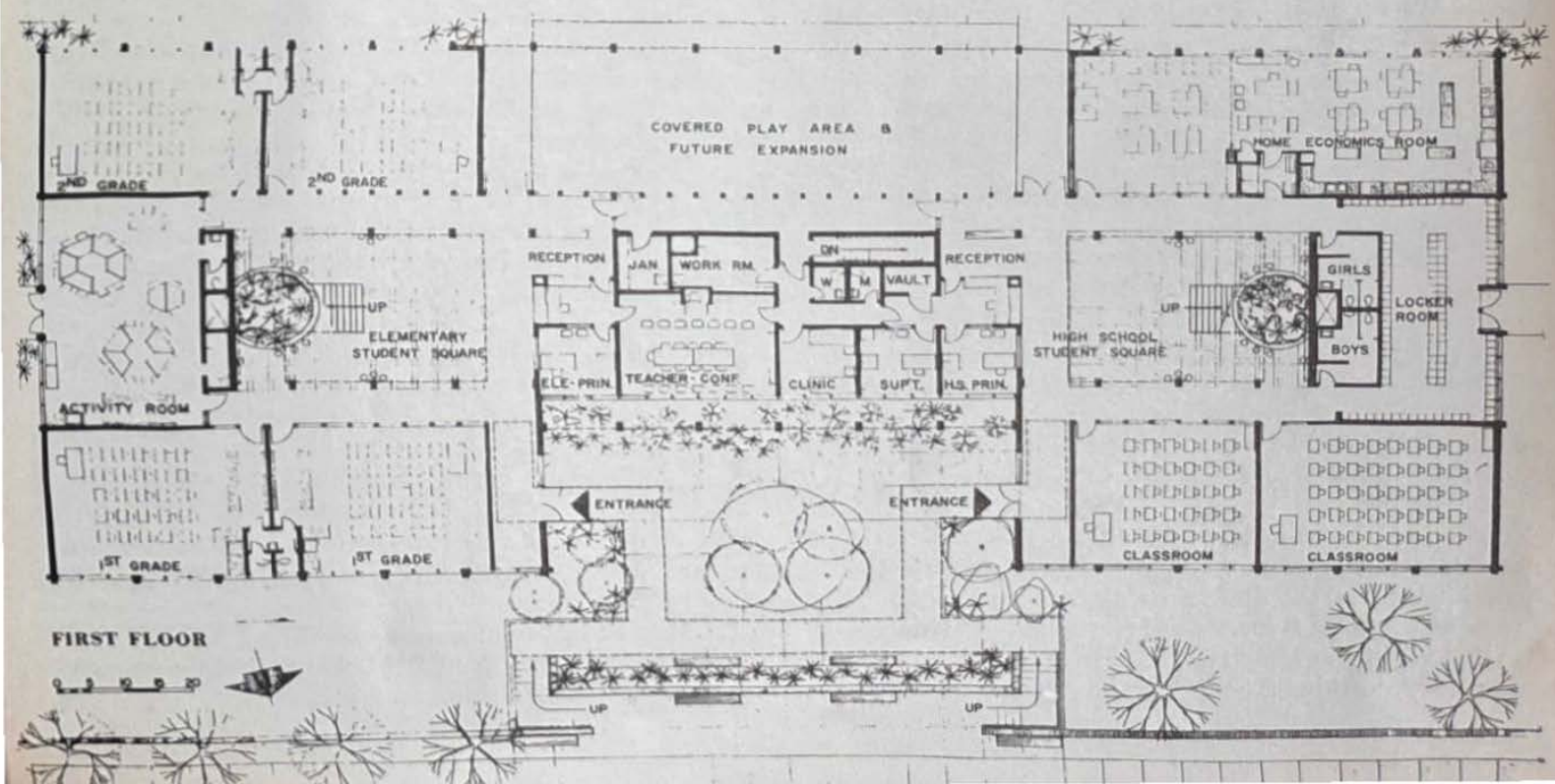
KENNETH W. BROOKS & ASSOCIATES
Architects

JACK M. LYERLA
Structural Engineer

P & B COMPANY OF WASHINGTON, INC.
General Contractor



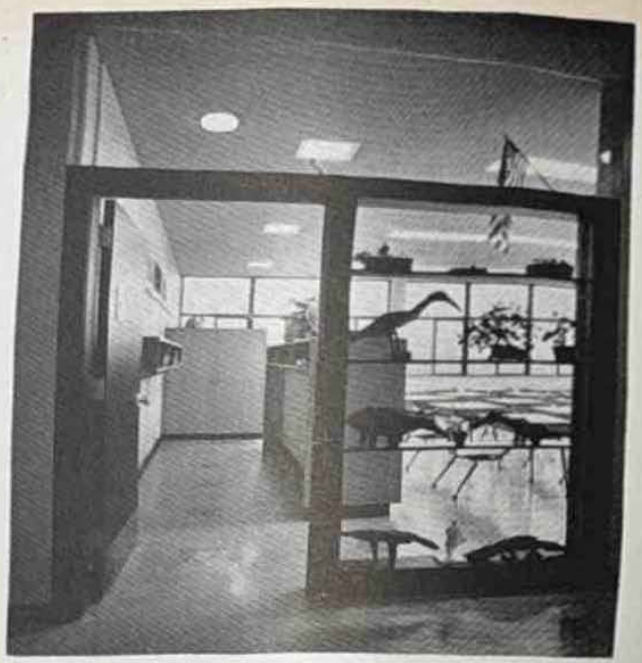
SECOND FLOOR



FIRST FLOOR

SIDEWALLS OF ALL CLASSROOMS have removable sections of chalkboard, tackboard and shelving, adjustable in height for any age group. All walls are completely tackable, made so by use of burlap covering over gypsum board. Painted semigloss white, this burlap does not pick up dirt easily; its texture breaks up light reflection; its surface provides suitable background for all multicolored displays.





NOMINAL BILATERAL NATURAL LIGHTING is afforded by glass relights in corridor walls which, in turn, borrow light from plastic dome skylights in student square. Awareness of cloud shade from time to time during school day was considered more desirable—and is less expensive—than "perfect" natural lighting.

a desirable feature for a small school district made possible because of this concept.

The first and second grade rooms on the first floor are planned for a smaller number of students (25) than those of the third through eighth grades (30). This is the result of an educational policy decision to give the first and second grades a better opportunity for a sound beginning in their education.

Departure in concept of corridors

Early studies were made of one-story finger plans. When the need for playground space on this small site was reconsidered and when the board expressed a desire for additional noon-time activity space for both schools, the two-story student-square plan was conceived. In addition to giving a bonus of 10,000 sq. ft. of playground area, the student-square plan put the administration area 100 ft. away from the most remote classrooms as compared with 200 ft. away in the finger plans; the toilets are 70 ft. away instead of 200 ft.

The total floor space allocated to circulation and lockers is the same in the two-story scheme as it was in the one-story finger plans, so the real bonus was in finding two usable, two-story balconied courts of 1,800 sq. ft., each usable for circulation plus activities and recreation in both schools. The separate student locker rooms isolate the noise and confusion from the student squares and improve their appearance too. The typical corridors plus the locker rooms now are reduced to 13% of the total floor area of the building as compared with 15% of the same type of area required in a typical one-story corridor school. This making of 36,000 sq. ft. of student-square circulation space available for scho use beyond just traffic use is worth approximately $5 000 to the school district.

Departure from one-story construction

The concept of school design has progresse from the little red schoolhouse to the conventiona two-story school to the current site-consuming one story finger plans. Although two-story has been a unpopular word in the design of small, and even larg schools, a reexamination of its advantages and disad vantages show certain recognizable assets for the two story plan, particularly when utilizing the student square concept.

Wilbur may possibly point the way to the fourth trend: that of the "unconventional two-story school. Beyond the advantages of consuming less site space and being more convenient for the students and teachers it was found that there is about 50% less foundation construction compared with the typical one-story concept and about 40% less roof skin to construct and maintain. A compensating factor is the cost of a suspended second floor as compared with an on-grade floor and the addition of a stairway. This has been changed, however, from a conventional fire tower to a spacious grand stairway incorporating a landing halfway down, usable as a speaking or musical platform for social events, roofed over and sunshine lighted with large plastic domes.

Mechanical engineers were Wood & Landerholm; electrical engineer, Joseph M. Doyle; landscape architect, Lawrence Halprin.

OUTLINE SPECIFICATIONS

Structure: frame: reinforced concrete; roof and floors: concrete pan.

Exterior Finish: red mission brick over 4-in. concrete block—Gladding, McBean & Co.; white paint on exposed concrete columns—(Alkatite) Pratt & Lambert, Inc.

Roof Surfacing: four-ply built-up tar and gravel.

Windows: dark brown baked enamel finish, horizontal sliding, vinyl glazed—(Rusco) F. C. Russell Co.

Doors: hollow metal steel—Rueter.

Floor Surfacing: asphalt tile—Azrock Floor Products Division.

Insulation: blanket type above second floor ceiling—Owens-Corning Fiberglas Corp.; cavity type with vermiculite pour-in waterproofing.

Interior Finish: 1x6 vertical grain t&g fir milled special profile with charcoal rez finish in student squares; burlap (Fab-Rik-O-Na) with eggshell bone white stippling—Pratt & Lambert, Inc.; acoustical tile above chalkboard height.

Ceilings: ⅛-in. sprayed-on acoustical plaster —(Rocklath and Audicote)—United States Gypsum Co.

Lighting Fixtures: recessed fluorescent in classrooms—(Trofferlite) Curtis AllBrite Lighting, Inc.; recessed incandescent in corridors—(Pry-Lite) Emerson-Pyrne Co.; elsewhere—Prescolite Manufacturing Co., Gotham Lighting Corp., Smoot Holman Co, Holopane Co., Inc., Columbia Electric and Manufacturing Co., Seattle Lighting Fixture Co.

Heating: low-pressure steam from existing plant to water heat exchanger; hot water fin tube radiation in classrooms—Trane Co.; ventilation through air handling units supplying tempered air through ceiling distribution—(Torrivent) Trane Co.

Plumbing: Kohler Co.

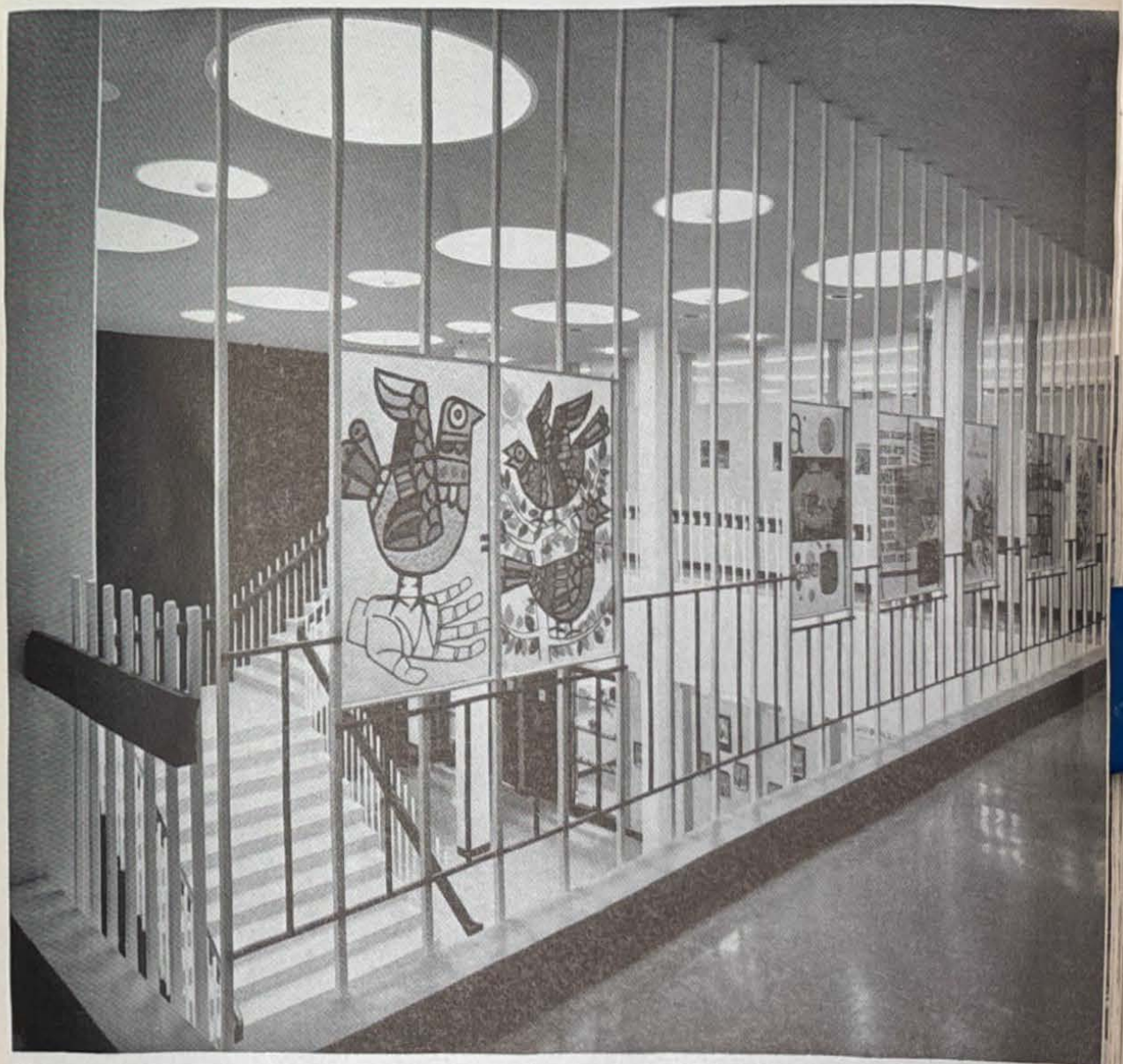
Special Equipment: vertical blinds—Thru-Vu Vertical Blind Corp.

Total Area: 34,500 sq. ft.

Total Cost: $511,730.

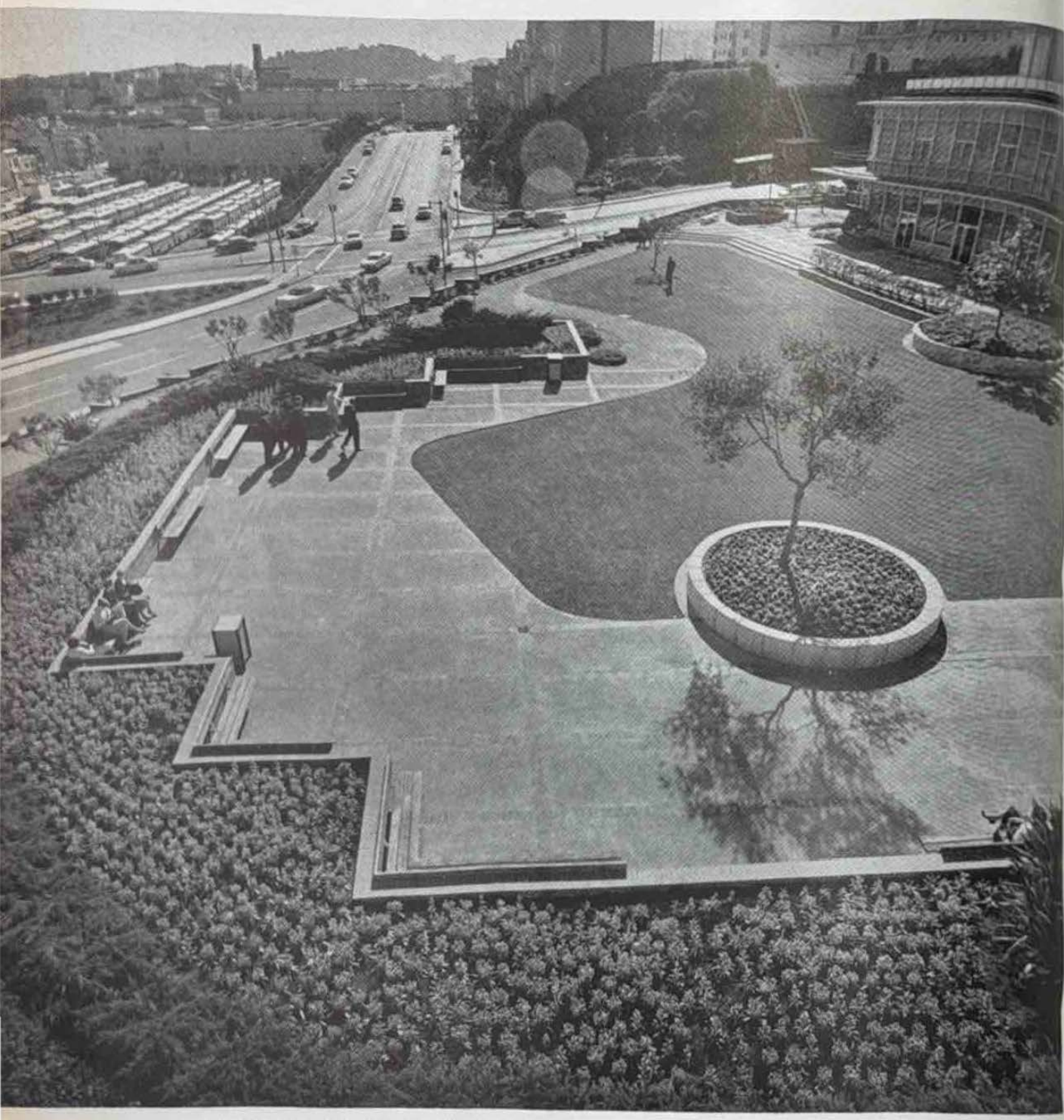
Cost per square Foot: $14.80.

Date of Completion: October 1959.



EDUCATIONAL AXIOM SCREENS cast in liquid plexiglass by Harold Balazs have twofold purpose: to serve as secondary source of interest after visitor has proceeded into great open court for major impact and to provide "basic object lessons." Many statements were considered, many rejected; those remaining are true reflection of philosophy of school board members and, in turn, students' parents. Elementary screens shown above illustrate Benjamin Franklin proverbs in colorful way, i.e., "A bird in the hand is worth two in the bush." High school screens depict five basic divisions of knowledge. Typical example is this proverb: "Art has no enemy but an ignorant man." Architect Brooks makes this comment: "After bidding, money was tight, but rather than put terrazzo floors in the toilet rooms, which the owners wanted very much, they did without them to have $1,800 worth of permanent contemporary masterpieces of educational art. It may be that this sort of natural greatness of thought and determination on the part of a school board can come most easily from our rural areas where members are considerably more free from political ambition, external pressures, etc."

Landscaping painted with a full and vibrant brush



TERRACE OFF CAFTERIA AND LOUNGES is particularly useful and colorful. Situated on east side of building, it is protected from prevailing west wind and is elevated so that it has good view of large part of San Francisco. Benches allow employees to relax in sun during lunch or at coffee breaks. Specimen oaks and magnolias are planted here, along with flowering cherries, wild lilac, camellias, Mediterranean broom, wild strawberry, St. John's wart and star jasmine. Last named provides delicious fragrance in summertime.



MONTEREY CYPRESS in parking areas probably are most impressive of existing trees.

Landscaping of Home Office
Fireman's Fund Insurance Co.
San Francisco, California

•

EDWARD B. PAGE
Architect

ECKBO, DEAN & WILLIAMS
Landscape Architects

Phil Palmer photos



U-SHAPED ENTRANCE COURT has brick and asphalt paving, provides adequate parking for those visiting executive offices. Two areas straddling 80-ft. reflection pool, planted with water lilies, contain specimen live oak and ground cover of creeping myrtle and pink flowering sunrose.

MAJOR PORTION of this 10.2-acre site was set aside for gardens, providing an extraordinary opportunity for the landscape architects. Actual acreage for landscaping was about 5.7 acres, compared to 1.75 for the building and 2.75 for parking. Edward A. Williams describes the program and its solution in the following paragraphs.

"Considerable care was taken in the arrangement of the building, parking areas and levels to save all the existing trees. Some of the trees were left on mounds of earth where the ground was depressed and others were contained in wells where the ground was raised. In all cases, special pruning, feeding, aereation and watering was done during construction to help the trees make the necessary adjustments.

"The most impressive of the trees saved are the beautiful specimens of Monterey cypress in the parking areas on the California street side, where three very large blue gums also are retained. Taking the cue from the existing trees and from the special climatic features of the site, live oak and red flowering eucalyptus predominate. Secondary themes are carried out by the Monterey cypress, olives, redwoods and Bishop pines.

"In addition to the general landscaping of the areas between the building and the streets on all sides, there are two gardens of note: the entrance court and the terrace adjacent to the cafeteria.

"Careful attention has been paid to the arrangement of the shrubs to provide interesting combinations of foliage, color and texture so that at all times of the year there will be something of special interest for the passerby to see."

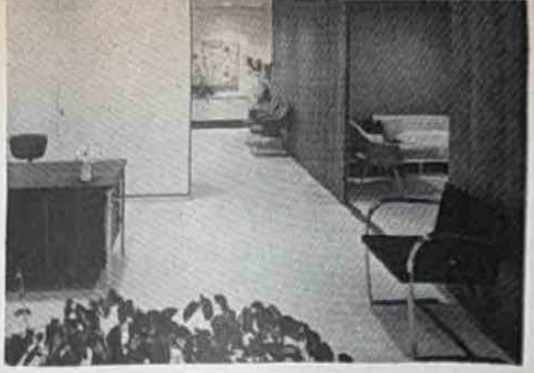


ARBOR-COVERED WALKS are graced with variety of shade-loving plants, including rhododendrons, azaleas, ferns, fuchsias and bluebells. Along one side of building, long row of alternating blue and white agapanthus provides splash of color.

Knoll Associates, Inc., Showroom
Los Angeles, California

•

Knoll Planning Unit
Designers



RECEPTION AREA, conference room and executive office are integrated within framework of sliding panel walls. Color scheme of neutral tones in natural wood, marble, black and brown leathers, beige and black tweeds further relates the areas with one another. Accents are brilliant red.

Furniture line dictates theme

FOCAL POINT of this remodeling project is a large central vaulted pavilion whose graceful lines serve to define the furniture groupings without limiting the overall view. Room settings of office and residential interiors are laid out around this core.

Glass facade extends 120 ft., its panels accentuated by alternate black and white awnings. All-glass corner entrance is flanked by a large planting area. Office settings are displayed within a framework of large sliding panels for easy rearrangement of space.

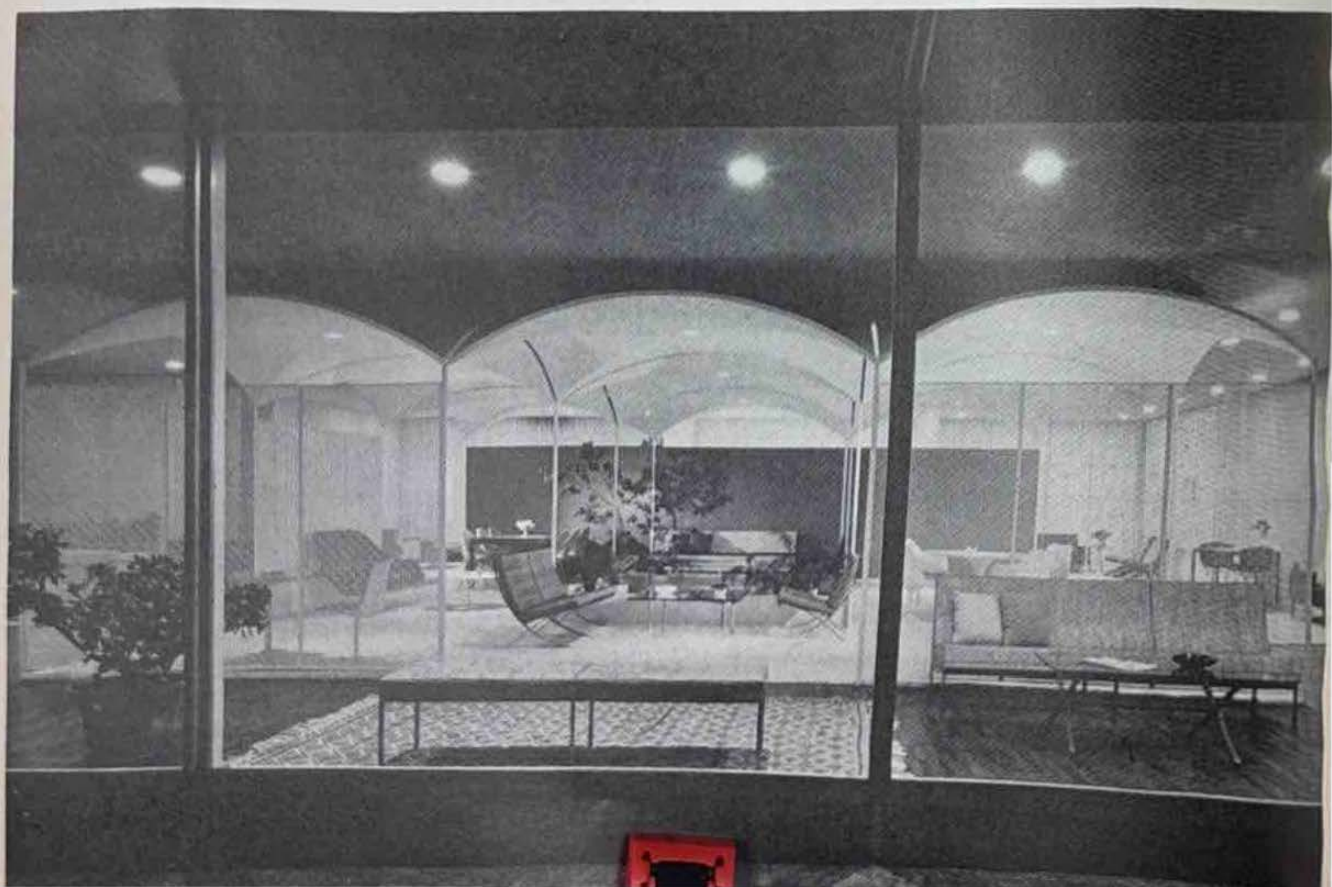
Floor surfaces throughout are primarily oiled teak with area rugs used to emphasize individual displays. Principal wall treatments include sheer casements in white and neutrals, white paneling and circle-patterned plastic screens.

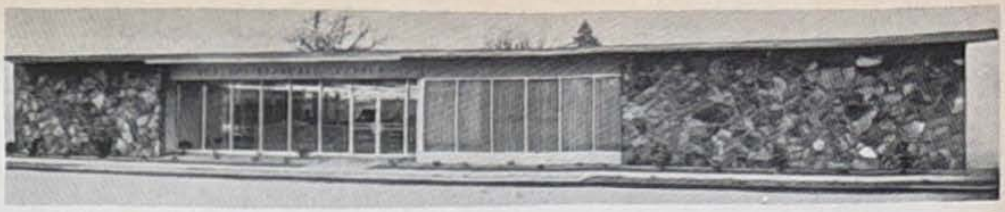
Showroom, occupying 6,500 sq. ft., is the largest of the company's 11 in the U.S. Head of the firm, Florence Knoll, received the Industrial Design Medal from the AIA in April, marking the second time an award has been made in this field.



LONG OVAL TABLE, suitable for use as dining or conference table, is work of Eero Saarinen. Form of the top is repeated in pedestal base flange.

WHITE CANOPY covers central fountain pool and draws attenti to furniture groupings. Circle-patterned screens of white plastic two sides add to airy, open feeling of showroom.





EVEN EXPERIENCED STONEMASON will have trouble telling difference between tilt-up panels used in this Oregon newspaper plant and conventional stone walls.

Tilt-up method cuts stone facing costs

Two stone wall sections for a small building in Albany, Ore., were placed at almost half the usual cost by utilizing a tilt-up method developed by Bill Ylinen of the Stone Center in Portland. The building, which houses the Albany Democrat Herald, is one of several completed recently by the firm with stone tilt-up walls.

To keep the slurry from seeping through onto the face side, a problem that has been a stumbling block in tilt-up stone construction, Ylinen used a sand bed in the bottom of the forms.

Stone was laid face down in the sand bed and depressed to the depth of the mortar joints. The sand acts as a bond breaker and keeps the slurry from oozing onto the face of the stone. Joints were then checked for accurate depth and made ready for pouring of the slurry. Steel reinforcing rods were placed and concrete poured to the desired depth. When cured and in place, the completed wall has all the beauty of a stone wall at considerably less cost than hand craftmanship.

Architect for the Albany building was James L. Payne; contractors, Claude Burge and George Schroeder.

Mo-Sai, an exposed aggregate tilt-up, is another facet of architectural surface treatment for concrete being pioneered by the Stone Center and has been used on several jobs at the cost of about one-eighth that of shop-cast panels, Ylinen comments. Such treatment is maintenance free providing the aggregates employed are impervious to the elements and slurry mix is properly engineered.



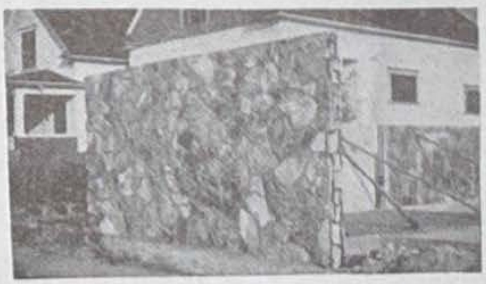
STONE TILT-UP WALLS begin with sand bed in form. Stone is laid face down and depressed to depth of mortar joints.



STONE IN PLACE, joints are checked for accurate depth and made ready for pouring of slurry, accomplished with bucket or plain watering can.



STEEL REINFORCING RODS back stone in forms. Concrete is poured to desired depth and allowed to cure.



FINISHED PANEL is in place and after others are tilted, construction is well underway.

Italian tile

Using techniques and equipment imported from Italy, Basalt Rock is producing Italian type terrazzo tile for marketing in the West. Surface aggregate varies from chips to large pieces of sawn marble, according to architect's specifications. Wide color range and combinations are available. Tile requires lightweight concrete backup, reducing weight in high-rise wall installations. — Basalt Rock Co., Inc., Napa, Calif. (No. 1)

steel door frame

A steel door frame that can be installed after drywall has been put in place has been introduced by Truscon. Called the Tartan, it is designed for use with 1⅜-in. wood or steel doors, with plaster or drywall construction. Anchors are welded to the frame, jamb and header for simple and quick installation. Series 610 frame is expected to provide on-site savings since it eliminates hinge and strike mortising, sanding for paint preparation and drilling in the field.—Truscon Division, Republic Steel Corp., 1315 Albert St., Youngstown 1, Ohio. (No. 2)

plastic foam sealer

For sealing all types of joints and materials, a California firm is introducing a watertight material of polyurethane plastic foam impregnated with asphalt Compriband. The material was developed several years ago in Holland and will be manufactured in the U.S. In order to be watertight, Compriband must be held under compression. In this condition it builds up a strong bond to the surface of almost any material. It is extremely resilient and will conform to irregularities on an uneven surface. Material is light, easy to handle, chemically inert and can be used through a long range of temperature conditions.—Asbiton Western, Inc., 1491 Daisy Ave., Long Beach, Calif. (No. 3)

fiberglass skylights

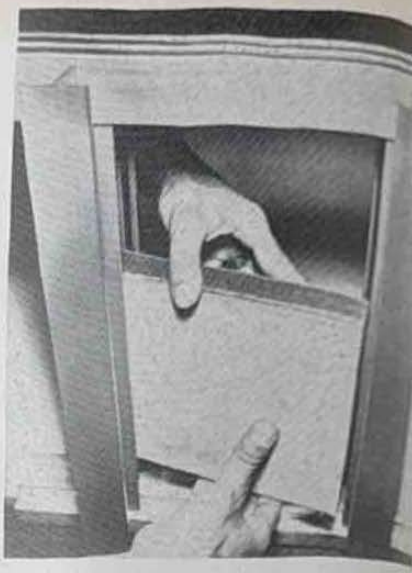
Translucent grids of the Cardenas Unibond Skypanels insure maximum light diffusion since there are no harsh lines showing through. Grids are made of the same resin-reinforced fiberglass as the two faces. Entire sandwich panel is bonded and sealed with Thiokol into a separate extruded aluminum frame with no mechanical fastening or other adhesives used. Elimination of secondary joints improves insulation and protects from condensation. Surface has resin mat on both faces, completely free of glass fibers. Skypanel is offered in clear models and also is available in color or with designs sealed and bonded inside the core.—Evsco, Inc., 252 Broadway, Tacoma, Wash. (No. 4)

masonry accent wall

Dramatic decorative effects can be achieved in the selection of both contrasting colors and aggregate with a cement-based finishing material called Roc-Set. Product, which is available in a variety of colors, is designed to receive many types of aggregates, in most cases applied by an air-driven rock gun. Once applied, the aggregate is lightly tamped into the Roc-Set, leaving a well-distributed plane free from tool marks. It was developed for such uses as accent panels, entry areas, fireplace panels, wing walls and decorative columns. —La Habra Stucco Co., 1631 W. Lincoln Ave., Anaheim, Calif. (No. 5)

prefab curtain wall

An aluminum curtain wall system for one- and two-story construction called the Pac/Wall 710 Series combines latitude in design with the ordering and installation efficiencies of standard modular materials. Designed for maximum shop prefabrication and minimal field work, it can be erected in a complete installed wall at an average cost of $2.30 per square foot (covers all materials and labor) according to company figures. All components of the wall, including panels and ventilators, lap and interlock without the use of bolts and nuts, forming a solid, watertight unit. Horizontals and verticals are precut in the factory to dimensions required by the architects's design and are shipped knocked down to the jobsite for installation without further fabrication. —Pacific Curtainwall, Inc., 600 W. 15th St., Long Beach 13, Calif. (No. 6)



prefinished paneling

Shastawood prefinished paneling produces a wall of solid wood ¾ in. thick with a sculptured surface for interesting light and shadow effects. The tongue and groove paneling is available in incense cedar or white fir 7 ft. to 10 ft. long and in two patterns, Modern with a slightly concave surface and Classic with a double French curve. Product is finished in light pastel coloring or natural, both with a clear plastic resin finish. —Scott Lumber Co., Inc., Burney, Calif. (No. 7)

electric door operator

An electric automatic door operator designed for in-the-header mounting has been added to the Stanley line. Called Magic-Door, it is economically priced and easily installed using standard 110-volt, 60-cycle, 1-phase power supply and optional plug-in or direct wiring. It is designed to operate hinge, center pivot and offset pivot-hung doors 30 to 42 in. in width. In event of power failure, doors may be opened manually.—The Stanley Works, 195 Lake St., New Britain, Conn. (No. 8)

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

SEPTEMBER 1961
(After October 31 write directly to manufacturer)

1 2 3 4 5 6 7
8

Name

Title

Firm

Address

City Zone State

LITERATURE

Garden Redwood: illustrates interesting and unusual decks, pavilions, etc., in color; 16 pp.—California Redwood Association, 576 Sacramento St., San Francisco 11, Calif.

Glazed Blocks: presents test reports and construction details for Spectra-Glaze glazed concrete masonry units with color plates showing standard and accent colors; 16 pp.—California Glazed Products Co., 1720 Rogers Ave., San Jose, Calif.

Walk-In Specification Guide: offers specifications for coolers or freezers of prefabricated, sectional type; 10 pp. — Bally Case and Cooler, Inc., Bally, Pa.

Built-Up Roofing Manual (AIA 12-B): includes specifications, application data, construction details; outlines basic rules for trouble-free roof; 52 pp.—Barrett Division, Allied Chemical Corp., 75 West St., New York 6, N. Y.

Olympic Prefinished Sidings (AIA 19-D-2): describes seven prefinished wood products manufactured by the company; 8 pp. — Olympic Stained Products Co., 1118 Leary Way, Seattle 7, Wash.

NF Steel Deck (AIA 12-C): introduces long-span structural section for simple spans to 32 ft.; 6 pp.—The R. C. Mahon Co., 2600 Monterey, Torrance, Calif.

Construction Specialties: outlines use, application and coverage of more than 100 construction and maintenance items; 118 pp.—A. C. Horn Companies, Division of Sun Chemical Corp., 550 Third St., San Francisco, Calif.

Contempo Fixtures (AIA 31-F-2): gives specifications, installation data, coefficients of utilization charts for line of shallow, surface mounted fluorescent lighting fixtures and diffusing elements; brochure A-6; 28 pp.—Globe Illumination Co., 2121 S. Main St., Los Angeles 7, Calif.

Teco (AIA 19-B): catalogs complete line of timber connectors, framing devices and installation tools; 12 pp.—Timber Engineering Co., 1319 18th St. N.W., Washington 6, D. C.

Wardrobes for Residence Halls (AIA 19-E and 35-B-4): contains perspectives of typical installations with traceable details of each; 8 pp.—Architectural Woodwork Institute, 332 S. Michigan Ave., Chicago 4, Ill.

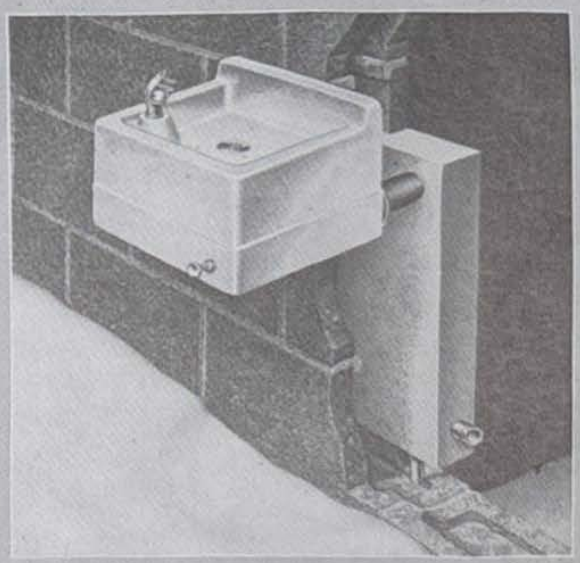
Franciscan Trend Tile: presents economy line of ceramic tile, in color; 4 pp.—Gladding, McBean & Co., 2901 Los Feliz Blvd., Los Angeles 39, Calif.

Circuit Breakers: catalogs all models with tables of current ratings, short circuit currents, etc.; 50 pp.—Mears Controls, Inc., Box 3798, Portland 8, Ore.

Dividend Engineering: presents system for estimating thermal performance of buildings and determining ideal insulation in terms of initial investment and long-term operating costs; separate 12-pp. publications on roofs and walls.—Owens-Corning Fiberglas Corp., Pacific Coast Division, Box 89, Santa Clara, Calif.

Insulation Product Information (AIA 37-D): catalogs complete commercial and industrial line; a revision of 1960 publication; catalog IN-244A; 64 pp.—Johns-Manville Sales Corp., 22 E. 40th St., New York 16, N. Y.

FREEZE-PROOF



HAWS Free Flowing Fountain Service in *any* Climate!

For positive Winter Protection against costly "freeze-ups" and excessive maintenance of outdoor fountains ...specify HAWS Freeze-Proof Units! Get year 'round drinking service. The choice of style is yours! Freeze-Proof Units are available with virtually any style fountain from HAWS' complete line—wall or pedestal, single or multiple bubbler. For details on model selection and installation ... see SWEETS Architectural File, or write today for catalog.

HAWS FREEZE-PROOF DRINKING FOUNTAINS

products of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street • Berkeley 10, California
Export Dept.: 19 Columbus Ave. • San Francisco 11, California

MANUFACTURERS/SUPPLIERS

• **Pacific Curtainwall, Inc.:** Donald R. Jacobsen is heading up a new branch office at 351 11th St., San Francisco.

• **Azrock Products Division,** Uvalde Rock Asphalt Co.: Willard Wright has been appointed representative in the Los Angeles area.

• **United States Plywood Corp.:** A new $750,000 distribution center has been opened at 490 Osage St., Denver, where Norman D. Ward is branch manager.

• **Solarex Corp.:** The Phoenix company has become sole owner of Glastint, glass coating that is applied to windows and doors by means of gravity flow.

• **Kaiser Gypsum Co.:** James J. Hague has been named vice president of sales and Ernest H. Schaper, vice president of operations at the Oakland headquarters. . . . Two new sales districts have been organized within the Northwest division: Charles E. Wilson of the Seattle office, covering most of Washington, northern Idaho, Montana and Alaska; and Edward K. Denning of Portland, covering Oregon, southeastern Washington and southern Idaho.

• **Weyerhaeuser Co.:** Embracing a new service-oriented sales program, the company has consolidated all lumber, plywood, door and panel divisions, with headquarters in Tacoma, and is transferring sales authority to local market areas. . . . Rilco Engineered Wood Products Division has appointed Ben C. Shipman as vice president-marketing. . . . Norman G. Carlson has become lumber sales manager at the Longview, Wash., branch.

• **Amweld California, Inc.:** Jerry A. Kuzmack has been appointed general sales manager of the Los Angeles producer of doors and door frames and E. A. Mauthe, manager of manufacturing.

• **United States Gypsum Co.:** Clement O. Futterer has been appointed director of field sales in the mid-continent and western regions. Formerly western region dealer sales manager working out of Los Angeles, he will be succeeded by Edward L. Busch.

• **Cal-Tech Systems, Inc.:** The S Jose firm has acquired Fullview Co Glendale, Calif., nation's fourth la est manufacturer of aluminum slid glass doors for residential constru tion and has moved its executive o fices to the latter city. Robert Williams, for six years sales manag of Fullview, becomes general sa manager of the parent company. Fu view, which operates assembly pla in Columbus, Ohio, and Atlanta, re ported sales of $8.6 million for t year ended October 31, 1960.

• **Bestwall Certain-Teed Sales Corp.** A new regional sales district has be organized in Los Angeles with C. Stout in charge, headquartered 2670 Leonis Blvd.

• **General Electric Co.:** John Hop pen has left Louisville to take over manager of the western region re dential market development oper tion in San Francisco, succeeding M. Falge who has retired after years with the firm. . . . Name Northwest region electric heati specialist is Wallace Ross, workin out of Seattle. . . . The silicone prod ucts department has opened a sal office at 1229 Burlingame Ave., Bu lingame, Calif., with Red Baurmeist as representative.



There's a quiet dignity, a quality of everlasting beauty in a church built of brick. Architects are enhancing this inherent charm by creative design, utilizing various of the colors and shapes produced by **builders brick co.** Seattle

Distributors—VANCOUVER, B. C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co.; EVERETT, The H. O. Seiffert Co.; MT. VERNON, Brick & Stone Supply Co. • Oregon: PORTLAND, Columbia Brick Works; CORVALLIS and SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.

• **Luminous Ceilings, Inc.**: Robert Jones, lighting sales representative since 1953 for the states of Washington, Montana and Alaska, has been named president of the newly formed division, Luminous Ceilings West, Inc., with offices at 5100 Santa Monica Blvd., Los Angeles.

• **Builders Brick Co.**: The Seattle firm has two new western Washington distributors: H. O. Seiffert Co., serving Snohomish County, and Brick and Stone Supply Co., Skagit, Whatcom and Island counties.

• **Stylon Corp.**: The Boston-based firm, one of the nation's largest producers of ceramic tile for the construction industry, has purchaced the Cal-Mar Tile Manufacturing Co. plant in Salt Lake City. L. E. Weiss, vice president in charge of Stylon's Redondo division in the Los Angeles area, also will direct the new Cal-Mar division.

• **W. P. Fuller & Co.**: L. R. Templeton has been appointed manager of Bay area glass distribution and will also supervise all activities at the northern California glass distribution center now under construction in Union City. . . . A newly formed eastern Washington district with headquarters in Spokane is being managed by D. S. Coles, formerly in charge of the Yakima branch.

• **Raybestos-Manhattan, Inc.**: Vibrated Concrete Co., Denver, has been named distributor of a new adhesive for bonding masonry units known as Raybestos Threadline mortar.

• **Vancouver Plywood Co.**: Len Moyer is the new assistant to the general manager of the Washington firm.

• **The Celotex Corp.**: M. L. Courington has been promoted to assistant general sales manager, with the Denver and West Coast districts included in his territory. He will continue to have merchandising responsibilities for West Coast roofing operations.

• **Formica Corp.**: Jack W. Clipper has been named district manager of the newly established Phoenix office and Robert C. Hockaday of the Honolulu office.

• **Fedders Corp.**: Mechanical Equipment Supply Co., Inc., Honolulu, has been named exclusive distributor in Hawaii for the manufacturer's line of room and central air conditioners.

• **Pacific Sealants**: Donald R. Jacobsen is northern California district manager with headquarters in San Francisco.

• **General Blower Co.**: Air Purification Co., Denver, has been appointed representative, with Robert Youker as sales engineer.

• **Sika Chemical Corp.**: Donald F. Burns is managing the newly opened Rocky Mountain district office at 4661 Meade St., Denver.

• **Filon Plastics Corp.**: Among new distributors is Orco Cooperative Warehouse, Inc., Santa Ana, Calif.

• **International Paper Co.**: L. A. Lundquist, manager of plywood development for the Long-Bell Division, has been named to the newly created position of plywood production manager in the Longview, Wash., headquarters.

• **Zurn Industries, Inc.**: John E. Glendon has been named sales engineer for its hydromechanics division in the San Francisco area.

• **Kentile, Inc.**: New distributors include Morrison-Merrill & Co., covering Montana out of Billings and Great Falls.

• **Caram Manufacturing Co.**: Structural Materials Co., Montebello, Calif., has been named distributor of the newly developed elastomeric roof coating system in the 13 western states.

• **Western Veneer and Plywood Co.**: A $230,000 modernization program designed to achieve better utilization of the log is currently underway at the Lebanon, Ore., plant.

• **Bestwood Corp.**: Albert M. Solen Co., Denver, is representative for the firm's contact cement in Colorado, Wyoming, Idaho, Montana and Utah.

• **H. K. Porter Co., Inc.**: National Electric Division has a new western district manager, J. C. Maeder, with headquarters in Los Angeles. . . . The firm has acquired National Cornice Works, Inc., manufacturer of fans and blowers in Los Angeles.

ASSOCIATIONS

• **Western Red Cedar Lumber Association**: Elected president at its meeting in June at Qualicum Beach, B.C., was Harry E. Morgan Jr., manager of the Snoqualmie Falls branch of Weyerhaeuser Co.

• **West Coast Lumbermen's Association**: Emmett E. Stoddard, a 42-year lumber veteran, has retired as director of field services. He had been associated with WCLA since 1948.

• **Illuminating Engineering Society**: Newly elected vice president of the Intermountain region is Robert W. Godemann, lighting consultant for Arizona Public Service Co., Phoenix.



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

for Planning Spotlight Installations in schools colleges theatres arenas auditoriums

Specification sheets and descriptive brochures on—

Strong INCANDESCENT AND CARBON ARC FOLLOW SPOTLIGHTS

Foot candle readings and diameters of spots at various throws are included.

FOR FREE COPIES WRITE—

Strong — A GENERAL PRECISION COMPANY

THE STRONG ELECTRIC CORP.

58 City Park Avenue • Toledo 1, Ohio

A SUBSIDIARY OF GENERAL PRECISION EQUIPMENT CORPORATION

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Blumcraft of Pittsburgh	20
Builders Brick Co.	32
Colorado Fuel and Iron Corp.	15
Fibreboard Paper Products Corp.	18-19
Fireproofing, Inc.	13
Hands Co., Div. H&S Metal Products Co.	17
Handsplit Shake Association, Div. Red Cedar Shingle Bureau	IV Cover
Haws Drinking Faucet Co.	31
Inland Steel Products Co.	II Cover
Macomber, Inc.	9
Mahon, R. C. Co.	III Cover
Red Cedar Shingle Bureau	IV Cover
Rudd & Cummings, Inc.	33
Strong Electric Corp.	33
United States Gypsum Co.	10
Western Building Industries Exposition	7

not specified

the contractor: an 'ugly' ima

Architects are not the only segment of the build fraternity concerned with the public image created its practitioners. Sending a direct letter to all the 7 members of the Associated General Contractors of Am ica recently, President M. Clare Miller issued the follo ing call for better public relations:

"During the past six months I have become incre ingly apprehensive over the adverse publicity our ind try has been receiving. It is a distorted image of t construction industry that is being projected on public screen as a result of congressional and ot investigations of the highway program and build practices in metropolitan areas. I tell you frankly t it is an ugly image—one that each of us has a respo bility to help correct. For, in reality, each of us i part of that public image because we are the constr tion industry.

"Much of the evidence presented at these hearin may not be of great importance. But, be that as it m our industry is smeared with suspicion, distrust a accusations of some downright dishonesty. The reputati of every contractor is damaged by the careless acts those who forget that they should be the guardian a public trust. The result is that there is being project upon the public screen an impression of principles qu the opposite of the cardinal ones of Skill, Integrity a Responsibility avowed by the AGC.

"Honestly, gentlemen, I am deeply disturbed abo our composite public image. We are not a bunch crooks plying our trade in the twilight zone of in sponsibility. We are the leaders of America's greate single industry. We constitute one of the strongest bu tions of the free enterprise system that has built t greatest nation on earth. We have a great heritage a our future is unlimited, provided we see that the publ has the correct understanding of our industry. Th depends upon our daily actions, which speak louder th any words.

"Therefore, may I suggest to each member of o great organization that we rededicate ourselves to th simple thesis: good public relations is a personal respo sibility of every member and can best be reflected on by conduct in keeping with our basic principles of Ski Integrity and Responsibility."

President Miller's cause for concern is not to b taken lightly and his message could well be heeded b the architect as well as the builder, for here are tw men with a strong need for a close bond of commo interest. One of our continuing editorial objectives is t help develop a better understanding between the tw thus enhancing the image on both sides of the coin. An we have always championed the practice in a number o AIA chapters of citing the contractor along with th architect in Honor Awards competitions. The purpos behind this is obvious but was very nicely summed up b a jury who judged the Southern California program i 1957 when it reported:

"Good building and the improvement of human en vironment is a collective effort for which responsibilit must be shared. A building does not exist until it i built. It cannot be good unless it is accurately buil with good workmanship. Good design can only be cre ated by the happy marriage of a thoughtful client and creative architect. With such criteria the success of building cannot be measured solely by its expressio of the owner's program."

We heartily second these sentiments! R.E.K

Pacific Architect & Builder

LIBRARY
SCHOOL OF ARCHITECTURE & ALLIED ARTS
UNIVERSITY OF OREGON

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ OCTOBER 1961



Pacific Architect & Builder

LIBRARY
SCHOOL OF ARCHITECTURE & ALLIED ARTS
UNIVERSITY OF OREGON

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ OCTOBER 1961





designed with laminated wood

Research House, Flintridge, Calif., constructed with Rilco laminated wood beams and columns. Architect: John C. Lindsay, AIA, Los Angeles. Contractor: Norwood & DeLonge, San Marino, Calif.



Below—Salton Rivera Hotel & Yacht Club, Salton Sea, Calif., constructed with Rilco laminated wood beams. Architect: Richard Dorman, AIA, & Associates. Contractor: Noxon Construction Co., Los Angeles.





The design freedom of wood when laminated by Rilco is unlimited. Versatile Rilco arches, beams and purlins are easily adapted to any architectural concept — make dramatic accents possible at a surprising low cost. And clients are especially pleased with the warm, natural beauty of carefully finished Rilco laminated wood structural members. Rilco field sales engineers will be happy to consult with you, without obligation. Write Weyerhaeuser Company, Rilco Engineered Wood Products Division, 616 Professional Building, Tacoma 5, Washington. BRoadway 2-2249.

Weyerhaeuser
RILCO ARCHES and BEAMS

Pacific Architect & Builder October 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

21 Student Center (Union and Dining Commons), University of California, Berkeley: Hardison & DeMars, Architects

28 Project Roundup: Solar Screening for Two City Halls

special feature

16 Progress Report No. 1: Seattle World's Fair

methods & materials

29 Simpson's Showcase of Products near Seattle

30 Prestressed Concrete Industry Turns Spotlight on Denver

31 Waikiki Adds Concrete 'Trees' to Landscape

departments

4 Building Permits

6 Project Preview

8 Building Briefs

11 The Building Month

14 T-Square Talk

32 Products

33 Manufacturers/Suppliers

34 Not Specified

VOLUME 67, NUMBER 10

Published monthly by
Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle, Wash.
Subscription price: $5 a year.
Controlled circulation postage paid
at Seattle, Wash.

Full circulation and business data and advertisers index on page 34

COVER: Student Center Dining Commons, University of California, Berkeley (p. 21)—Hardison & DeMars, Architects; Karl H. Riek photo.

Western States for August

Residential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
La Grande	(6)	81,500	123,200
Lane Co.	(75)	831,431	1,800,862
Lebanon	( )	Nil	38,272
Marion Co.	(47)	520,950	556,804
McMinnville	(5)	63,000	84,331
Medford	(19)	259,150	741,310
Milln-Frwtr	( )	Nil	3,050
Mltnomah Co.	(139)	2,062,595	3,061,695
Newberg	( )	Nil	3,350
Newport	( )	No Reply	No Reply
North Bend	(7)	52,880	73,636
Ontario	(1)	12,000	138,950
Oregon City	(2)	12,500	59,181
Oswego	(10)	202,300	266,600
Pendleton	(2)	22,000	62,485
Portland	(62)	997,445	5,249,800
Prineville	( )	Nil	1,000
Roseberg	(5)	62,422	86,659
St. Helens	(1)	11,800	20,790
Salem	(54)	371,150	638,839
Seaside	(1)	1,000	19,673
Springfield	(7)	87,548	180,821
The Dalles	(3)	50,000	79,548
Washngtn Co.	(89)	1,610,250	2,063,419
Total	**(736)**	**$ 10,982,748**	**$ 20,415,344**

WASHINGTON

Aberdeen	(1)	$ 14,000	$ 64,000
Anacortes	(1)	10,000	31,946
Auburn	(16)	152,800	167,175
Bellevue	(11)	282,900	856,320
Bellingham	(6)	82,500	404,361
Bremerton	(2)	30,900	125,635
Camas	(2)	17,500	32,892
Centralia	(2)	27,210	84,301
Chehalis	( )	Nil	18,575
Clark Co.	(82)	1,545,938	3,301,363
Clarkston	(3)	20,000	96,540
Ellensburg	(2)	21,000	186,350
Enumclaw	(1)	7,700	29,750
Ephrata	(2)	14,000	67,975
Everett	(4)	53,300	249,247
Grys Hrbr Co.	(27)	221,800	244,455
Hoquiam	( )	No Reply	No Reply
Island Co.	(17)	116,100	138,223
Kelso	(1)	13,000	240,195
Kennewick	(3)	43,500	71,875
Kent	(6)	99,900	180,900
King Co.	(533)	7,530,180	9,172,515
Kirkland	(15)	90,300	127,250
Longview	(10)	121,800	256,685
Mercer Island	(22)	527,800	551,765
Moses Lake	( )	Nil	31,300
Olympia	(22)	225,000	436,778
Pasco	(2)	53,400	74,380
Pierce Co.	(154)	1,819,500	2,025,839
Port Angeles	(2)	23,000	35,550
Port Orchard	( )	No Reply	No Reply
Pullman	(10)	112,422	135,564
Puyallup	(12)	129,500	612,975
Renton	(9)	133,150	536,685
Richland	(6)	101,300	330,529
Seattle	(93)	1,683,350	12,148,383
Shelton	( )	Nil	33,775
Spokane	(47)	569,540	3,978,840
Spokane Co.	(32)	509,100	864,840
Sunnyside	(2)	23,500	29,875
Tacoma	(36)	571,900	1,736,909
Vancouver	(11)	167,100	456,000
Walla Walla	(5)	63,000	264,403
Wlla Wlla Co.	(5)	56,500	1,869,950
Wenatchee	(3)	41,500	925,908
Yakima	(11)	143,000	2,413,183
Total	**(1,231)**	**$ 17,469,890**	**$ 45,641,959**

ALASKA

Anchorage	(24)	$ 628,865	$ 2,135,410
Fairbanks	(8)	195,800	437,050
Juneau	( )	Nil	297,850
Ketchikan	( )	Nil	2,400
Total	**(32)**	**$ 824,665**	**$ 2,872,710**

IDAHO

Alameda	(9)	$ 110,600	$ 519,300
Blackfoot	(8)	99,700	127,951
Boise	(10)	112,050	391,290
Caldwell	(6)	69,000	107,575
Coeur d'Alene	(7)	71,241	131,855
Idaho Falls	(13)	157,035	345,030
Jerome	(1)	10,000	19,750
Lewiston	(6)	90,600	1,183,430
Moscow	(6)	83,000	130,150
Nampa	(8)	82,000	103,525
Payette	( )	Nil	4,300
Pocatello	(3)	41,000	541,925
Sandpoint	(3)	37,000	31,000
St. Maries	(1)	11,000	11,000
Twin Falls	(12)	121,000	375,200
Total	**(93)**	**$ 1,095,226**	**$ 4,023,281**

MONTANA

Anaconda	(2)	$ 22,000	$ 22,000
Billings	(49)	639,600	925,975
Bozeman	(4)	52,150	111,250
Butte	( )	Nil	4,650
Cut Bank	( )	Nil	17,050
Glasgow	(17)	178,000	294,100
Glendive	(1)	16,000	36,975
Great Falls	(46)	405,576	546,546
Havre	(1)	5,775	7,775
Helena	(8)	134,500	201,845
Kalispell	(1)	13,000	48,353
Lewistown	(10)	95,000	104,500
Livingston	( )	Nil	13,250
Malta	( )	Nil	Nil
Miles City	( )	Nil	42,621
Missoula	( )	Nil	70,306
Total	**(139)**	**$ 1,561,601**	**$ 2,447,196**

WYOMING

Casper	(18)	$ 284,500	$ 344,370
Cheyenne	(60)	685,400	953,385
Cody	(1)	30,000	303,400
Laramie	(6)	123,000	320,326
Rawlins	( )	Nil	77,040
Riverton	(17)	194,000	202,345
Rock Springs	(4)	68,000	96,000
Sheridan	( )	Nil	58,930
Total	**(106)**	**$ 1,384,900**	**$ 2,355,796**

COLORADO

Adams Co.	(56)	$ 711,000	$ 1,530,120
Alamosa	(7)	103,500	119,442
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(121)	1,783,000	2,291,460
Aspen	(2)	29,200	121,000
Aurora	(88)	772,945	935,733
Boulder	(43)	605,960	664,953
Boulder Co.	(31)	368,000	879,284
Colo. Springs	(73)	1,002,960	1,262,382
Cortez	( )	Nil	7,250
Denver	(494)	3,094,884	13,876,153
Durango	(3)	43,720	427,160
El Paso Co.	(32)	416,250	863,844
Englewood	(5)	87,950	271,779
Estes Park	(2)	14,600	54,600
Fort Collins	(25)	325,500	715,115
Fort Morgan	(1)	13,568	29,989
Golden	(3)	49,580	84,460
Grnd Junction	(3)	29,500	118,369
Greeley	(20)	176,000	406,078
Jefferson Co.	(650)	6,151,707	8,187,960
La Junta	(3)	49,000	72,729
Lamar	(4)	45,000	53,000
Littleton	(10)	165,700	598,465
Longmont	(8)	77,500	245,804
Loveland	(12)	131,198	152,650
Monte Vista	(4)	3,625	46,000
Montrose	(2)	37,513	207,814
Pitkin Co.	(2)	26,000	47,700
Pueblo	(13)	153,795	457,345
Pueblo Co.	(12)	80,000	104,650
Sterling	( )	Nil	13,800
Trinidad	( )	Nil	18,744
Walsenburg	(11)	4,228	8,228
Westminster	(22)	243,700	462,844
Total	**(1,762)**	**$ 16,797,083**	**$ 35,336,904**

UTAH

American Frk	(3)	$ 29,300	$ 36,350
Bountiful	(20)	297,100	407,140
Brigham City	(32)	400,100	946,630
Cedar City	(2)	14,500	28,100
Clearfield	(3)	31,000	817,617
Davis Co.	(8)	87,294	116,752
Kaysville	(10)	49,090	54,040
Layton	(20)	244,000	288,100
Logan	(13)	195,522	229,772
Murray	(14)	153,000	512,484
Ogden	(14)	250,600	707,334
Orem	(5)	56,600	91,275
Price	( )	Nil	62,000
Provo	(15)	199,000	255,725
Salt Lake City	(76)	637,932	1,519,699
Salt Lake Co.	(311)	3,235,000	3,929,630
So. Slt Lk Cty	(7)	128,000	186,787
Spanish Fork	(3)	34,000	49,450
Tooele	(12)	113,323	133,257
Utah Co.	(8)	97,800	210,927
Weber Co.	(6)	73,000	82,000
Total	**(582)**	**$ 6,326,161**	**$ 10,665,269**

NEVADA

Boulder City	(2)	$ 17,920	$ 41,064
Clark Co.	(129)	1,634,010	8,650,428
Elko	(1)	5,200	43,320
Las Vegas	(196)	2,537,155	3,571,422
N. Las Vegas	(43)	484,812	601,352
Reno	(40)	546,100	1,092,980
Sparks	(138)	1,626,336	1,694,352
Washoe Co.	(24)	416,232	649,486
Total	**(573)**	**$ 7,267,135**	**$ 16,344,404**

ARIZONA

Buckeye	( )	$ Nil	$ 42,600
Casa Grande	(1)	14,000	34,700
Chandler	(11)	77,474	195,588
Douglas	(4)	18,725	20,020
Flagstaff	(65)	482,887	747,192
Florence	( )	Nil	Nil
Glendale	(14)	355,000	540,275
Maricopa Co.	(567)	4,930,140	6,127,557
Mesa	(121)	1,084,185	1,490,863
Phoenix	(384)	3,033,677	14,224,710
Pima Co.	(188)	2,015,850	6,198,943
Prescott	(7)	73,700	200,240
Scottsdale	(127)	1,076,800	1,303,427
Tempe	(132)	1,184,400	1,506,976
Tucson	(95)	1,545,903	2,758,477
Wickenburg	(1)	9,000	29,200
Winslow	(12)	59,950	67,650
Yuma	(13)	78,000	181,025
Total	**(1,742)**	**$ 16,039,691**	**$ 35,669,443**

NEW MEXICO

Alamogordo	( )	$ Nil	$ 50,738
Albuquerque	(101)	2,086,085	3,013,754
Artesia	(7)	84,500	100,606
Carlsbad	(10)	135,000	218,050
Clovis	(33)	371,635	398,674
Deming	(3)	37,000	60,224
Farmington	(2)	393,159	258,800
Gallup	(6)	98,900	246,852
Hobbs	(20)	309,188	890,249
Las Cruces	(15)	116,100	776,389
Las Vegas	( )	No Reply	No Reply
Lovington	(3)	44,000	366,449
Raton	(1)	16,000	18,500
Roswell	(113)	956,000	1,092,929
Santa Fe	(32)	246,090	1,178,546
Silver City	( )	No Reply	No Reply
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(2)	16,000	60,600
Tularosa	(1)	7,488	12,768
Total	**(349)**	**$ 4,918,145**	**$ 8,844,228**

HAWAII

Hawaii Co.	(36)	$ 429,034	$ 1,417,187
Honolulu	(335)	3,776,076	10,489,038
Maui Co.	(14)	152,458	320,861
Total	**(385)**	**$ 4,357,568**	**$ 12,227,086**
GRAND TOTAL	**(24,380)**	**$289,795,435**	**$538,550,516**

Building Permit Totals for

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dollar

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(36)	$ 307,493	$ 449,014
Alameda Co.	(65)	882,200	1,533,600
Albany	(6)	28,000	154,205
Alhambra	(184)	1,384,550	1,755,811
Anaheim	(74)	723,590	3,575,988
Antioch	(6)	96,057	160,631
Arcadia	(19)	351,568	512,621
Arroyo Grande	(6)	72,000	443,250
Artesia	(4)	73,900	95,550
Atherton	(1)	50,000	190,331
Atwater	( )	Nil	22,200
Auburn	(1)	11,000	42,623
Avalon	( )	Nil	1,900
Azusa	(51)	481,250	702,200
Bakersfield	(81)	970,450	1,076,166
Baldwin Park	(203)	2,418,300	2,680,225
Banning	(23)	262,484	290,688
Barstow	(3)	20,650	493,694
Bell	(19)	120,550	201,015
Bellflower	(27)	257,400	409,445
Bell Gardens	(22)	188,500	213,180
Belmont	(9)	167,500	599,070
Benicia	(1)	22,500	35,673
Berkeley	(117)	955,785	1,420,886
Beverly Hills	(12)	1,089,000	2,895,086
Bradbury	( )	Nil	14,890
Brawley	(1)	10,600	10,600
Brea	(50)	410,835	437,327
Buena Park	(66)	1,116,045	1,438,175
Burbank	(46)	358,761	902,993
Burlingame	(7)	119,800	745,766
Butte Co.	( )	Nil	200,000
Calexico	(8)	10,700	70,950
Campbell	(45)	374,500	449,598
Carlsbad	(5)	87,240	108,594
Carmel	(2)	45,500	258,400
Chico	(63)	901,502	1,033,047
Chino	(36)	365,188	414,435
Chula Vista	(15)	103,686	241,130
Claremont	(5)	107,500	178,040
Coalinga	(2)	28,500	41,330
Colton	(35)	394,721	581,799
Commerce	( )	Nil	479,425
Compton	(6)	44,400	201,480
Concord	(76)	939,974	1,337,260
Cntra Csta Co.	(124)	2,148,805	2,879,324
Corona	(5)	190,974	247,924
Coronado	( )	No Reply	No Reply
Corte Madera	(33)	430,943	978,360
Costa Mesa	(119)	990,472	1,980,424
Covina	(28)	358,510	690,818
Cudahy	(13)	121,000	309,100
Culver City	(3)	68,200	242,126
Dairy Valley	( )	Nil	25,000
Daly City	(111)	1,194,838	1,482,223
Davis	(84)	743,000	825,325
Delano	(19)	191,600	222,844
Downey	(46)	381,710	1,119,570
Duarte	(1)	16,000	145,000
El Cajon	(43)	472,040	657,600
El Centro	(6)	49,250	626,799
El Cerrito	(8)	88,791	141,826
El Dorado Co.	(132)	2,179,566	2,929,337
El Monte	(15)	113,686	1,124,789
El Segundo	(10)	86,000	221,657
Emeryville	( )	Nil	39,400
Escondido	(4)	46,158	239,793
Eureka	(12)	214,260	772,829
Fairfield	(136)	763,766	832,991
Fillmore	( )	Nil	4,000
Fontana	(5)	49,672	76,632
Fremont	(131)	1,751,704	1,976,042
Fresno	(109)	1,127,200	2,150,724
Fresno Co.	(70)	781,345	1,532,168
Fullerton	(18)	449,077	1,085,185
Glendale	(201)	1,536,571	2,395,570
Glendora	(105)	1,922,100	2,027,200
Half Moon Bay	(2)	33,300	41,100
Hanford	(112)	1,077,360	1,267,820
Hawthorne	(43)	280,400	1,353,737
Hayward	(13)	105,550	368,970
Hemet	(13)	90,000	108,992
Hermosa Bch	(12)	129,324	163,183
Hillsborough	(2)	85,000	156,000
Holtville	(1)	10,000	14,000
Humboldt Co.*	( )		165,896
Huntngtn Bch	(166)	2,582,084	2,699,658
Huntngtn Prk	(12)	83,130	114,800
Imperial Co.	( )	Nil	7,000
Indio	(2)	11,520	215,574
Industry	( )	Nil	840,225
Inglewood	(161)	1,506,940	2,581,103
Irwindale	( )	Nil	233,700
Kern Co.	(121)	1,311,151	2,763,588
Laguna Beach	(14)	302,500	407,617
La Habra	(71)	1,148,985	1,352,244
Lakewood	(6)	148,700	258,990
La Mesa	(15)	287,085	416,603
La Mirada	(14)	53,000	281,435
La Puente	(2)	19,000	180,630
La Verne	(2)	35,000	49,175
Lawndale	(65)	271,700	361,770
Lindsay	(2)	12,000	33,673
Livermore	(6)	52,483	178,283
Lodi	(23)	246,300	404,795
Lompoc	(30)	386,325	476,139
Long Beach	(169)	1,222,025	4,486,865
Los Altos	(15)	328,316	435,987
Los Angeles	(2407)	32,415,455	54,870,045
Los Angls Co.	(684)	9,019,276	18,232,051
Los Gatos	( )	No Reply	No Reply
Lynwood	(8)	64,500	424,490
Madera	(8)	109,340	340,565
Madera Co.	(15)	172,400	235,400
Manhattn Bch	(35)	380,107	562,687
Manteca	(14)	132,150	318,670
Marin Co.	(65)	1,450,060	1,679,424
Martinez	(10)	92,528	220,098
Marysville	(2)	19,000	850,058
Maywood	(3)	20,700	52,673
Menlo Park	(25)	266,000	926,655
Merced	(11)	158,475	375,511
Merced Co.	(22)	302,478	359,549
Millbrae	(15)	292,500	777,300
Mill Valley	(8)	159,500	241,861
Modesto	(79)	948,000	1,079,325
Monrovia	(43)	705,807	806,502
Montclair	(174)	2,076,525	2,093,265
Montebello	(76)	898,200	1,134,152
Monterey	(7)	84,800	120,645
Monterey Co.	(71)	1,576,973	1,984,486
Monterey Prk	(82)	681,000	950,505
Mountin View	(44)	260,800	689,714
Napa	(37)	532,319	724,091
Napa Co.	(14)	216,469	299,180
National City	( )	Nil	83,218
Newport Bch	(103)	2,044,530	2,404,491
N. Sacramento	(6)	60,462	556,110
Norwalk	(6)	55,500	519,150
Novato	(10)	217,050	275,350
Oakdale	(3)	32,498	39,603
Oakland	(248)	2,297,415	4,819,880
Oceanside	(16)	294,350	678,555
Ojai	(2)	24,000	64,575
Ontario	(53)	528,736	651,002
Orange	(256)	3,883,260	4,328,861
Orange Co.	(342)	5,587,814	6,286,321
Oroville	(2)	53,600	109,965
Oxnard	(105)	1,191,880	1,527,887
Pacifica	(82)	614,100	813,600
Pacific Grove	(6)	78,000	125,400
Palm Springs	(45)	817,500	1,495,530
Palo Alto	(22)	429,750	2,376,522
Palos Vrds Est.	(11)	439,230	675,610
Paramount	(6)	55,700	98,470
Pasadena	(71)	1,018,780	2,134,700
Paso Robles	( )	Nil	49,110
Pico Rivera	(3)	52,500	335,278
Piedmont	(1)	30,000	63,077
Pinole	( )	No Reply	No Reply
Pittsburg	(2)	41,292	73,239
Placentia	(1)	10,530	20,200
Placer Co.	(97)	1,261,843	1,636,163
Pleasanton	(5)	74,940	84,000
Pomona	(48)	400,125	832,294
Porterville	(2)	28,500	66,142
Port Hueneme	(9)	47,000	73,400
Red Bluff	( )	Nil	47,300
Redding	(6)	122,570	398,497
Redlands	(50)	659,000	752,331
Redondo Bch.	(43)	442,869	3,484,604
Redwood City	(41)	310,506	2,787,053
Richmond	(123)	1,150,686	3,363,522
Riverside	(48)	452,200	1,076,597
Riverside Co.	(137)	2,004,514	3,198,600
Rolling Hills	(2)	112,800	145,150
Rollg Hills Est.	(5)	124,200	163,185
Rosemead	(12)	156,300	247,185
Roseville	(23)	218,148	674,848
Sacramento	(87)	1,098,000	2,446,475
Sacramnto Co.	(266)	3,106,766	7,527,272
St. Helena	( )	No Reply	No Reply
Salinas	(53)	619,300	803,625
Sn Bernardino	(36)	392,981	1,314,008
Sn Brnrdn Co.	(325)	2,679,037	7,249,257
San Bruno	(32)	279,100	406,359
San Carlos	(18)	389,769	2,722,969
San Clemente	(63)	514,423	556,464
San Diego	(805)	7,798,412	11,232,582
San Diego Co.	(165)	2,934,000	4,748,200
San Dimas	(9)	118,315	162,050
San Fernando	(3)	39,000	166,500
San Francisco	(230)	2,997,253	5,843,580
San Gabriel	(46)	491,468	551,754
Sanger	(3)	40,800	65,200
San Jacinto	(6)	47,000	58,476
Sn Joaqin Co.	(26)	244,014	442,164
San Jose	(812)	8,780,779	10,741,059
San Leandro	(50)	770,320	919,090
Sn Luis Obspo	(9)	94,884	379,741
S. L. Obsp Co.	(48)	504,824	1,253,574
San Marino	( )	Nil	210,009
San Mateo	(74)	697,000	1,392,643
San Mateo Co.	(40)	684,180	2,196,600
San Pablo	(23)	171,599	206,519
San Rafael	(24)	523,008	1,179,427
Santa Ana	(132)	1,594,100	3,087,119
Santa Barbara	(78)	899,500	1,118,196
Snta Brbra Co.	(243)	3,567,500	4,238,600
Santa Clara	(165)	1,210,000	1,550,118
Santa Clra Co.	(81)	1,350,600	2,274,348
Santa Cruz	(37)	385,935	542,100
Santa Cruz Co.	(111)	1,233,718	4,064,087
Snt Fe Sprngs	( )	Nil	438,815
Santa Maria	(56)	670,588	1,031,914
Santa Monica	(382)	3,949,098	4,234,197
Santa Paula	(5)	57,857	127,545
Santa Rosa	(47)	643,100	1,851,633
Sausalito	(2)	15,050	101,000
Seal Beach	(21)	357,260	393,108
Seaside	(22)	172,500	322,179
Selma	(9)	78,000	96,425
Shasta Co.	(7)	101,655	514,605
Sierra Madre	(48)	371,905	411,100
Solano Co.	(5)	65,851	278,631
Sonoma Co.	(58)	623,169	1,223,137
South Gate	(206)	1,430,536	2,030,456
So. El Monte	( )	Nil	50,975
So. Pasadena	(5)	45,709	162,214
So. Sn Frncsco	(12)	113,975	918,055
Stanislaus Co.	(27)	333,562	575,210
Stockton	(49)	630,280	872,072
Sunnyvale	(140)	2,345,816	6,093,001
Temple City	(6)	92,000	164,612
Torrance	(266)	2,833,252	3,622,802
Tracy	(3)	36,000	71,200
Tulare	(4)	55,500	93,500
Tulare Co.	(51)	242,386	457,032
Turlock	(3)	53,293	104,170
Ukiah	( )	Nil	52,225
Upland	(73)	1,268,550	1,605,350
Vacaville	(9)	108,300	153,270
Vallejo	(41)	446,100	725,850
Ventura	(27)	417,750	567,850
Ventura Co.	(468)	5,375,200	8,498,000
Visalia	(62)	859,742	949,000
Walnut	(78)	1,063,400	1,071,900
Walnut Creek	(45)	839,100	940,800
Wasco	(1)	6,000	13,800
Watsonville	(3)	18,153	41,810
West Covina	(12)	249,640	761,420
Whittier	(39)	268,100	681,900
Woodland	(10)	120,090	193,700
Woodside	(1)	17,000	69,700
Yolo Co.	(20)	302,565	503,850
Yreka	(4)	60,500	120,000
Yuba City	(71)	541,220	647,050
Yuba Co.	(17)	132,650	192,950
Total	**(16,650)**	**$200,770,622**	**$341,706,850**

OREGON

Albany	(13)	$ 125,500	$ 142,150
Ashland	(4)	39,300	291,900
Astoria	(6)	60,760	65,450
Baker	( )	Nil	28,000
Beaverton	(5)	91,160	129,100
Bend	(1)	10,000	174,300
Central Point	(4)	31,000	32,600
Clackamas Co.	(42)	554,000	643,950
Coos Bay	(10)	87,500	283,350
Corvallis	(14)	158,000	210,700
Dallas	(1)	16,500	33,650
Douglas Co.	(5)	43,960	88,940
Eugene	(70)	2,144,952	2,230,400
Forest Grove	(1)	12,000	99,800
Grants Pass	(6)	50,500	70,800
Gresham	(8)	113,100	152,850
Hermiston	(1)	12,000	22,100
Hillsboro	(8)	89,495	298,010
Hood River	(1)	17,600	27,550
Klamath Falls	(1)	13,500	37,170

* Breakdown not available

Western States for August

Residential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
La Grande	(6)	81,500	123,200
Lane Co.	(75)	831,431	1,800,862
Lebanon	( )	Nil	38,272
Marion Co.	(47)	520,950	556,804
McMinnville	(5)	63,000	84,331
Medford	(19)	259,150	741,310
Milln-Frwtr	( )	Nil	3,050
Multnomah Co.	(139)	2,062,595	3,061,695
Newberg	( )	Nil	3,350
Newport	( )	No Reply	No Reply
North Bend	(7)	52,880	73,636
Ontario	(1)	12,000	138,950
Oregon City	(2)	12,500	59,181
Oswego	(10)	202,300	266,600
Pendleton	(2)	22,000	62,485
Portland	(62)	997,445	5,249,800
Prineville	( )	Nil	1,000
Roseburg	(5)	62,422	86,659
St. Helens	(1)	11,800	20,790
Salem	(54)	371,150	638,839
Seaside	(1)	1,000	19,673
Springfield	(7)	87,548	180,821
The Dalles	(3)	50,000	79,548
Washngtn Co.	(89)	1,610,250	2,063,419
Total	**(736)**	**$ 10,982,748**	**$ 20,415,344**
WASHINGTON			
Aberdeen	(1)	$ 14,000	$ 64,000
Anacortes	(1)	10,000	31,946
Auburn	(16)	152,800	167,175
Bellevue	(11)	282,900	856,320
Bellingham	(6)	82,500	404,361
Bremerton	(2)	30,900	125,635
Camas	(2)	17,500	32,892
Centralia	(2)	27,210	84,301
Chehalis	( )	Nil	18,575
Clark Co.	(82)	1,545,938	3,301,363
Clarkston	(3)	20,000	96,540
Ellensburg	(2)	21,000	186,350
Enumclaw	(1)	7,700	29,750
Ephrata	(2)	14,000	67,975
Everett	(4)	53,300	249,247
Grys Hrbr Co.	(27)	221,800	244,455
Hoquiam	( )	No Reply	No Reply
Island Co.	(17)	116,100	138,223
Kelso	(1)	13,000	240,195
Kennewick	(3)	43,500	71,875
Kent	(6)	99,900	180,900
King Co.	(533)	7,530,180	9,172,515
Kirkland	(15)	90,300	127,250
Longview	(10)	121,800	256,685
Mercer Island	(22)	527,800	551,765
Moses Lake	( )	Nil	31,300
Olympia	(22)	225,000	436,778
Pasco	(2)	53,400	74,380
Pierce Co.	(154)	1,819,500	2,025,839
Port Angeles	(2)	23,000	35,550
Port Orchard	( )	No Reply	No Reply
Pullman	(10)	112,422	135,564
Puyallup	(12)	129,500	612,975
Renton	(9)	133,150	536,685
Richland	(6)	101,300	330,529
Seattle	(93)	1,683,350	12,148,383
Shelton	( )	Nil	33,775
Spokane	(47)	569,540	3,978,840
Spokane Co.	(32)	509,100	864,840
Sunnyside	(2)	23,500	29,875
Tacoma	(36)	571,900	1,736,909
Vancouver	(11)	167,100	456,000
Walla Walla	(5)	63,000	264,403
Wila Wila Co.	(5)	56,500	1,869,950
Wenatchee	(3)	41,500	925,908
Yakima	(11)	143,000	2,413,183
Total	**(1,231)**	**$ 17,469,890**	**$ 45,641,959**
ALASKA			
Anchorage	(24)	$ 628,865	$ 2,135,410
Fairbanks	(8)	195,800	437,050
Juneau	( )	Nil	297,850
Ketchikan	( )	Nil	2,400
Total	**(32)**	**$ 824,665**	**$ 2,872,710**
IDAHO			
Alameda	(9)	$ 110,600	$ 519,300
Blackfoot	(8)	99,700	127,951
Boise	(10)	112,050	391,290
Caldwell	(6)	69,000	107,575
Coeur d'Alene	(7)	71,241	131,855
Idaho Falls	(13)	157,035	345,030
Jerome	(1)	10,000	19,750
Lewiston	(6)	90,600	1,183,430
Moscow	(6)	83,000	130,150
Nampa	(8)	82,000	103,525
Payette	( )	Nil	4,300
Pocatello	(3)	41,000	541,925
Sandpoint	(3)	37,000	31,000
St. Maries	(1)	11,000	11,000
Twin Falls	(12)	121,000	375,200
Total	**(93)**	**$ 1,095,226**	**$ 4,023,281**
MONTANA			
Anaconda	(2)	$ 22,000	$ 22,000
Billings	(49)	639,600	925,975
Bozeman	(4)	52,150	111,250
Butte	( )	Nil	4,650
Cut Bank	( )	Nil	17,050
Glasgow	(17)	178,000	294,100
Glendive	(1)	16,000	36,975
Great Falls	(46)	405,576	546,546
Havre	(1)	5,775	7,775
Helena	(8)	134,500	201,845
Kalispell	(1)	13,000	48,353
Lewistown	(10)	95,000	104,500
Livingston	( )	Nil	13,250
Malta	( )	Nil	Nil
Miles City	( )	Nil	42,621
Missoula	( )	Nil	70,306
Total	**(139)**	**$ 1,561,601**	**$ 2,447,196**
WYOMING			
Casper	(18)	$ 284,500	$ 344,370
Cheyenne	(60)	685,400	953,385
Cody	(1)	30,000	303,400
Laramie	(6)	123,000	320,326
Rawlins	( )	Nil	77,040
Riverton	(17)	194,000	202,345
Rock Springs	(4)	68,000	96,000
Sheridan	( )	Nil	58,930
Total	**(106)**	**$ 1,384,900**	**$ 2,355,796**
COLORADO			
Adams Co.	(56)	$ 711,000	$ 1,530,120
Alamosa	(7)	103,500	119,442
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(121)	1,783,000	2,291,460
Aspen	(2)	29,200	121,000
Aurora	(88)	772,945	935,733
Boulder	(43)	605,960	664,953
Boulder Co.	(31)	368,000	879,284
Colo. Springs	(73)	1,002,960	1,262,382
Cortez	( )	Nil	7,250
Denver	(494)	3,094,884	13,876,153
Durango	(3)	43,720	427,160
El Paso Co.	(32)	416,250	863,844
Englewood	(5)	87,950	271,779
Estes Park	(2)	14,600	54,600
Fort Collins	(25)	325,500	715,115
Fort Morgan	(1)	13,568	29,989
Golden	(3)	49,580	84,460
Grnd Junction	(3)	29,500	118,369
Greeley	(20)	176,000	406,078
Jefferson Co.	(650)	6,151,707	8,187,960
La Junta	(3)	49,000	72,729
Lamar	(4)	45,000	53,000
Littleton	(10)	165,700	598,465
Longmont	(8)	77,500	245,804
Loveland	(12)	131,198	152,650
Monte Vista	(4)	3,625	46,000
Montrose	(2)	37,513	207,814
Pitkin Co.	(2)	26,000	47,700
Pueblo	(13)	153,795	457,345
Pueblo Co.	(12)	80,000	104,650
Sterling	( )	Nil	13,800
Trinidad	( )	Nil	18,744
Walsenburg	(11)	4,228	8,228
Westminster	(22)	243,700	462,844
Total	**(1,762)**	**$ 16,797,083**	**$ 35,336,904**
UTAH			
American Frk	(3)	$ 29,300	$ 36,550
Bountiful	(20)	297,100	407,140
Brigham City	(32)	400,100	946,630
Cedar City	(2)	14,500	28,100
Clearfield	(3)	31,000	817,617
Davis Co.	(8)	87,294	116,752
Kaysville	(10)	49,090	54,040
Layton	(20)	244,000	288,100
Logan	(13)	195,522	229,772
Murray	(14)	153,000	512,484
Ogden	(14)	250,600	707,334
Orem	(5)	56,600	91,275
Price	( )	Nil	62,000
Provo	(15)	199,000	255,725
Salt Lake City	(78)	637,932	1,519,699
Salt Lake Co.	(311)	3,235,000	3,929,630
So. Slt Lk Cty	(7)	128,000	186,787
Spanish Fork	(3)	34,000	49,450
Tooele	(12)	113,323	133,257
Utah Co.	(8)	97,800	210,927
Weber Co.	(6)	73,000	82,000
Total	**(582)**	**$ 6,326,161**	**$ 10,665,269**
NEVADA			
Boulder City	(2)	$ 17,920	$ 41,064
Clark Co.	(129)	1,634,010	8,650,428
Elko	(1)	5,200	43,320
Las Vegas	(196)	2,537,155	3,571,422
N. Las Vegas	(43)	484,812	601,352
Reno	(40)	546,100	1,092,980
Sparks	(138)	1,626,336	1,694,352
Washoe Co.	(24)	416,232	649,486
Total	**(573)**	**$ 7,267,135**	**$ 16,344,404**
ARIZONA			
Buckeye	( )	$ Nil	$ 42,600
Casa Grande	(1)	14,000	34,700
Chandler	(11)	77,474	195,588
Douglas	(4)	18,725	20,020
Flagstaff	(65)	482,887	747,192
Florence	( )	Nil	Nil
Glendale	(14)	355,000	540,275
Maricopa Co.	(567)	4,930,140	6,127,557
Mesa	(121)	1,084,185	1,490,863
Phoenix	(384)	3,033,677	14,224,710
Pima Co.	(188)	2,015,850	6,198,943
Prescott	(7)	73,700	200,240
Scottsdale	(127)	1,076,800	1,303,427
Tempe	(132)	1,184,400	1,506,976
Tucson	(95)	1,545,903	2,758,477
Wickenburg	(1)	9,000	29,200
Winslow	(12)	59,950	67,650
Yuma	(13)	78,000	181,025
Total	**(1,742)**	**$ 16,039,691**	**$ 35,669,443**
NEW MEXICO			
Alamogordo	( )	$ Nil	$ 50,738
Albuquerque	(101)	2,086,085	3,013,754
Artesia	(7)	84,500	100,606
Carlsbad	(10)	135,000	218,050
Clovis	(33)	371,635	398,674
Deming	(3)	37,000	60,224
Farmington	(2)	393,159	258,800
Gallup	(6)	98,900	246,852
Hobbs	(20)	309,188	890,249
Las Cruces	(15)	116,100	776,389
Las Vegas	( )	No Reply	No Reply
Lovington	(3)	44,000	366,449
Raton	(1)	16,000	18,500
Roswell	(113)	956,000	1,092,929
Santa Fe	(32)	246,090	1,178,546
Silver City	( )	No Reply	No Reply
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(2)	16,000	60,600
Tularosa	(1)	7,488	12,768
Total	**(349)**	**$ 4,918,145**	**$ 8,844,228**
HAWAII			
Hawaii Co.	(36)	$ 429,034	$ 1,417,187
Honolulu	(335)	3,776,076	10,489,038
Maui Co.	(14)	152,458	320,861
Total	**(385)**	**$ 4,357,568**	**$ 12,227,086**
GRAND TOTAL	**(24,380)**	**$289,795,435**	**$538,550,516**

Building Permit Totals fo

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dollar

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(36)	$ 307,493	$ 449,014
Alameda Co.	(65)	882,200	1,533,600
Albany	(6)	28,000	154,205
Alhambra	(184)	1,384,550	1,755,811
Anaheim	(74)	723,590	3,575,988
Antioch	(6)	96,057	160,631
Arcadia	(19)	351,568	512,621
Arroyo Grande	(6)	72,000	443,250
Artesia	(4)	73,900	95,550
Atherton	(1)	50,000	190,331
Atwater	( )	Nil	22,200
Auburn	(1)	11,000	42,623
Avalon	( )	Nil	1,900
Azusa	(51)	481,250	702,200
Bakersfield	(81)	970,450	1,070,166
Baldwin Park	(203)	2,418,300	2,680,225
Banning	(23)	262,484	290,688
Barstow	(3)	20,650	493,694
Bell	(19)	120,550	201,015
Bellflower	(27)	257,400	409,445
Bell Gardens	(22)	188,500	213,180
Belmont	(9)	167,500	599,070
Benicia	(1)	22,500	35,673
Berkeley	(117)	955,785	1,420,886
Beverly Hills	(12)	1,089,000	2,895,086
Bradbury	( )	Nil	14,890
Brawley	(1)	10,600	10,600
Brea	(50)	410,835	437,327
Buena Park	(66)	1,116,045	1,438,175
Burbank	(46)	358,761	902,993
Burlingame	(7)	119,800	745,766
Butte Co.	( )	Nil	200,000
Calexico	(8)	10,700	70,950
Campbell	(45)	374,500	449,598
Carlsbad	(5)	87,240	108,594
Carmel	(2)	45,500	258,400
Chico	(63)	901,502	1,033,047
Chino	(36)	365,188	414,435
Chula Vista	(15)	103,686	241,130
Claremont	(5)	107,500	178,040
Coalinga	(2)	28,500	41,330
Colton	(35)	394,721	581,799
Commerce	( )	Nil	479,425
Compton	(6)	44,400	201,480
Concord	(76)	939,974	1,337,266
Cntra Csta Co.	(124)	2,148,805	2,879,324
Corona	(5)	190,974	247,924
Coronado	( )	No Reply	No Reply
Corte Madera	(33)	430,943	978,360
Costa Mesa	(119)	990,472	1,980,424
Covina	(28)	358,510	690,818
Cudahy	(13)	121,000	309,100
Culver City	(3)	68,200	242,126
Dairy Valley	( )	Nil	25,000
Daly City	(111)	1,194,838	1,482,223
Davis	(84)	743,000	825,325
Delano	(19)	191,600	222,844
Downey	(46)	381,710	1,119,570
Duarte	(1)	16,000	145,000
El Cajon	(43)	472,040	657,600
El Centro	(6)	49,250	626,799
El Cerrito	(8)	88,791	141,826
El Dorado Co.	(132)	2,179,566	2,929,337
El Monte	(15)	113,686	1,124,789
El Segundo	(10)	86,000	221,657
Emeryville	( )	Nil	39,400
Escondido	(4)	46,158	239,793
Eureka	(12)	214,260	772,829
Fairfield	(136)	763,766	832,991
Fillmore	( )	Nil	4,000
Fontana	(5)	49,672	76,632
Fremont	(131)	1,751,704	1,976,042
Fresno	(109)	1,127,200	2,150,724
Fresno Co.	(70)	781,345	1,532,168
Fullerton	(18)	449,077	1,085,185
Glendale	(201)	1,536,571	2,395,570
Glendora	(105)	1,922,100	2,027,200
Half Moon Bay	(2)	33,300	41,100
Hanford	(112)	1,077,360	1,267,820
Hawthorne	(43)	280,400	1,353,737
Hayward	(13)	105,550	368,970
Hemet	(13)	90,000	108,992
Hermosa Bch	(12)	129,324	163,183
Hillsborough	(2)	85,000	156,000
Holtville	(1)	10,000	14,000
Humboldt Co.*	( )		165,896
Huntngtn Bch	(166)	2,582,084	2,699,658
Huntngtn Prk	(12)	83,130	114,800
Imperial Co.	( )	Nil	7,000
Indio	(2)	11,520	215,574
Industry	( )	Nil	840,225
Inglewood	(161)	1,506,940	2,581,103
Irwindale	( )	Nil	233,700
Kern Co.	(121)	1,311,151	2,763,588
Laguna Beach	(14)	302,500	407,617
La Habra	(71)	1,148,985	1,352,244
Lakewood	(6)	148,700	258,990
La Mesa	(15)	287,085	416,603
La Mirada	(14)	53,000	281,435
La Puente	(2)	19,000	180,630
La Verne	(2)	35,000	49,175
Lawndale	(65)	271,700	361,770
Lindsay	(2)	12,000	33,673
Livermore	(6)	52,483	178,283
Lodi	(23)	246,300	404,795
Lompoc	(30)	386,325	476,139
Long Beach	(169)	1,222,025	4,486,865
Los Altos	(15)	328,316	435,987
Los Angeles	(2407)	32,415,455	54,870,045
Los Angls Co.	(684)	9,019,276	18,232,051
Los Gatos	( )	No Reply	No Reply
Lynwood	(8)	64,500	424,490
Madera	(8)	109,340	340,565
Madera Co.	(15)	172,400	235,400
Manhattn Bch	(35)	380,107	562,687
Manteca	(14)	132,150	318,670
Marin Co.	(65)	1,450,060	1,679,424
Martinez	(10)	92,528	220,098
Marysville	(2)	19,000	850,058
Maywood	(3)	20,700	52,673
Menlo Park	(25)	266,000	926,655
Merced	(11)	158,475	375,511
Merced Co.	(22)	302,478	359,549
Millbrae	(15)	292,500	777,300
Mill Valley	(8)	159,500	241,861
Modesto	(79)	948,000	1,079,325
Monrovia	(43)	705,807	806,502
Montclair	(174)	2,076,525	2,093,265
Montebello	(76)	898,200	1,134,152
Monterey	(7)	84,800	120,645
Monterey Co.	(71)	1,576,973	1,984,486
Monterey Prk	(82)	681,000	950,505
Mountin View	(44)	260,800	689,714
Napa	(37)	532,319	724,091
Napa Co.	(14)	216,469	299,180
National City	( )	Nil	83,218
Newport Bch	(103)	2,044,530	2,404,491
N. Sacramento	(6)	60,462	556,110
Norwalk	(6)	55,500	519,150
Novato	(10)	217,050	275,350
Oakdale	(3)	32,498	39,603
Oakland	(248)	2,297,415	4,819,880
Oceanside	(16)	294,350	678,555
Ojai	(2)	24,000	64,575
Ontario	(53)	528,736	651,002
Orange	(256)	3,883,260	4,328,861
Orange Co.	(342)	5,587,814	6,286,321
Oroville	(2)	53,600	109,965
Oxnard	(105)	1,191,880	1,527,887
Pacifica	(82)	614,100	813,600
Pacific Grove	(6)	78,000	125,400
Palm Springs	(45)	817,500	1,495,530
Palo Alto	(22)	429,750	2,376,522
Palos Vrds Est.	(11)	439,230	675,610
Paramount	(6)	55,700	98,470
Pasadena	(71)	1,018,780	2,134,700
Paso Robles	( )	Nil	49,110
Pico Rivera	(3)	52,500	335,278
Piedmont	(1)	30,000	63,077
Pinole	( )	No Reply	No Reply
Pittsburg	(2)	41,292	73,239
Placentia	(1)	10,530	20,200
Placer Co.	(97)	1,261,843	1,636,163
Pleasanton	(5)	74,940	84,000
Pomona	(48)	400,125	832,294
Porterville	(2)	28,500	66,142
Port Hueneme	(9)	47,000	73,400
Red Bluff	( )	Nil	47,300
Redding	(6)	122,570	398,497
Redlands	(50)	659,000	752,331
Redondo Bch.	(43)	442,869	3,484,604
Redwood City	(41)	310,506	2,787,053
Richmond	(123)	1,150,686	3,363,522
Riverside	(48)	452,200	1,076,597
Riverside Co.	(137)	2,004,514	3,198,600
Rolling Hills	(2)	112,800	145,150
Rollg Hills Est.	(5)	124,200	163,185
Rosemead	(12)	156,300	247,185
Roseville	(23)	218,148	674,848
Sacramento	(87)	1,098,000	2,446,475
Sacramnto Co.	(266)	3,106,766	7,527,272
St. Helena	( )	No Reply	No Reply
Salinas	(53)	619,300	803,625
Sn Bernardino	(36)	392,981	1,314,008
Sn Brnrdn Co.	(325)	2,679,037	7,249,257
San Bruno	(32)	279,100	406,359
San Carlos	(18)	389,769	2,722,969
San Clemente	(63)	514,423	556,464
San Diego	(805)	7,798,412	11,332,582
San Diego Co.	(165)	2,934,000	4,746,200
San Dimas	(9)	118,315	162,096
San Fernando	(3)	39,000	166,500
San Francisco	(230)	2,997,253	5,843,580
San Gabriel	(46)	491,468	551,734
Sanger	(3)	40,800	65,200
San Jacinto	(6)	47,000	58,476
Sn Joaqin Co.	(26)	244,014	442,164
San Jose	(812)	8,780,779	10,741,809
San Leandro	(50)	770,320	919,966
Sn Luis Obspo	(9)	94,884	379,741
S. L. Obsp Co.	(48)	504,824	1,253,574
San Marino	( )	Nil	210,000
San Mateo	(74)	697,000	1,392,641
San Mateo Co.	(40)	684,180	2,190,680
San Pablo	(23)	171,599	206,519
San Rafael	(24)	523,008	1,179,420
Santa Ana	(132)	1,594,100	3,087,111
Santa Barbara	(78)	899,500	1,118,190
Snta Brbra Co.	(243)	3,567,500	4,238,600
Santa Clara	(165)	1,210,000	1,550,110
Santa Clra Co.	(81)	1,350,600	2,274,340
Santa Cruz	(37)	385,935	542,190
Santa Cruz Co.	(111)	1,233,718	4,064,000
Snt Fe Sprngs	( )	Nil	438,810
Santa Maria	(56)	670,588	1,031,910
Santa Monica	(382)	3,949,098	4,234,190
Santa Paula	(5)	57,857	127,540
Santa Rosa	(47)	643,100	1,851,620
Sausalito	(2)	15,050	101,000
Seal Beach	(21)	357,260	393,160
Seaside	(22)	172,500	323,170
Selma	(9)	78,000	90,420
Shasta Co.	(7)	101,655	514,600
Sierra Madre	(48)	371,905	411,100
Solano Co.	(5)	65,851	278,620
Sonoma Co.	(58)	623,169	1,223,130
South Gate	(206)	1,430,536	2,030,450
So. El Monte	( )	Nil	50,970
So. Pasadena	(5)	45,709	162,210
So. Sn Frncsco	(12)	113,975	918,000
Stanislaus Co.	(27)	333,562	573,300
Stockton	(49)	630,280	872,000
Sunnyvale	(140)	2,345,816	6,093,000
Temple City	(6)	92,000	164,600
Torrance	(266)	2,833,252	3,622,800
Tracy	(3)	36,000	71,200
Tulare	(4)	55,500	93,900
Tulare Co.	(51)	242,386	457,800
Turlock	(3)	53,293	104,100
Ukiah	( )	Nil	53,200
Upland	(73)	1,268,550	1,605,200
Vacaville	(9)	108,300	153,200
Vallejo	(41)	446,100	725,800
Ventura	(27)	417,750	567,800
Ventura Co.	(468)	5,375,200	8,498,000
Visalia	(62)	859,742	949,900
Walnut	(78)	1,063,400	1,071,900
Walnut Creek	(45)	839,100	940,000
Wasco	(1)	6,000	13,900
Watsonville	(3)	18,153	41,000
West Covina	(12)	249,640	761,400
Whittier	(39)	268,100	681,000
Woodland	(10)	120,090	193,700
Woodside	(1)	17,000	69,700
Yolo Co.	(20)	302,565	503,000
Yreka	(4)	60,500	120,000
Yuba City	(71)	541,220	647,000
Yuba Co.	(17)	132,650	192,500
Total	**(16,650)**	**$200,770,622**	**$341,706,800**

OREGON

Albany	(13)	$ 125,500	$ 142,100
Ashland	(4)	39,300	291,900
Astoria	(6)	60,760	65,400
Baker	( )	Nil	26,600
Beaverton	(5)	91,160	129,100
Bend	(1)	10,000	174,200
Central Point	(4)	31,000	32,600
Clackamas Co.	(42)	554,000	643,900
Coos Bay	(10)	87,500	283,500
Corvallis	(14)	158,000	210,700
Dallas	(1)	16,500	33,600
Douglas Co.	(5)	43,960	88,900
Eugene	(70)	2,144,952	2,230,400
Forest Grove	(1)	12,000	99,800
Grants Pass	(6)	50,500	70,800
Gresham	(8)	113,100	152,000
Hermiston	(1)	12,000	22,100
Hillsboro	(8)	89,495	298,000
Hood River	(1)	17,600	27,500
Klamath Falls	(1)	13,500	37,100

* Breakdown not available

Western States for August

...idential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
...a Grande	(6)	81,500	123,200
...ane Co.	(75)	831,431	1,800,862
...banon	( )	Nil	38,272
...arion Co.	(47)	520,950	556,804
...cMinnville	(5)	63,000	84,331
...edford	(19)	259,150	741,310
...ilton-Frwtr	( )	Nil	3,050
...ltnomah Co.	(139)	2,062,595	3,061,695
...ewberg	( )	Nil	3,350
...ewport	( )	No Reply	No Reply
...orth Bend	(7)	52,880	73,636
...ntario	(1)	12,000	138,950
...regon City	(2)	12,500	39,181
...wego	(10)	202,300	266,600
...endleton	(2)	22,000	62,485
...ortland	(62)	997,445	5,249,800
...rineville	( )	Nil	1,000
...aseburg	(5)	62,422	86,659
...t. Helens	(1)	11,800	20,790
...alem	(54)	371,150	638,839
...easide	(1)	1,000	19,673
...pringfield	(7)	87,548	180,821
...he Dalles	(3)	50,000	79,548
...ashngtn Co.	(89)	1,610,250	2,063,419
Total	**(736)**	**$ 10,982,748**	**$ 20,415,344**

WASHINGTON

Aberdeen	(1)	$ 14,000	$ 64,000
Anacortes	(1)	10,000	31,946
Auburn	(16)	152,800	167,175
Bellevue	(11)	282,900	856,320
Bellingham	(6)	82,500	404,361
Bremerton	(2)	30,900	125,635
Camas	(2)	17,500	32,892
Centralia	(2)	27,210	84,301
Chehalis	( )	Nil	18,575
Clark Co.	(82)	1,545,938	3,301,363
Clarkston	(3)	20,000	96,540
Ellensburg	(2)	21,000	186,350
Enumclaw	(1)	7,700	29,750
Ephrata	(2)	14,000	67,975
Everett	(4)	53,300	249,247
Grys Hrbr Co.	(27)	221,800	244,455
Issaquah	( )	No Reply	No Reply
Island Co.	(17)	116,100	138,223
Kelso	(1)	13,000	240,195
Kennewick	(3)	43,500	71,875
Kent	(6)	99,900	180,900
King Co.	(533)	7,530,180	9,172,515
Kirkland	(15)	90,300	127,250
Longview	(10)	121,800	256,685
Mercer Island	(22)	527,800	551,765
Moses Lake	( )	Nil	31,300
Olympia	(22)	225,000	436,778
Pasco	(2)	53,400	74,380
Pierce Co.	(154)	1,819,500	2,025,839
Port Angeles	(2)	23,000	35,550
Port Orchard	( )	No Reply	No Reply
Pullman	(10)	112,422	135,564
Puyallup	(12)	129,500	612,975
Renton	(9)	133,150	536,685
Richland	(6)	101,300	330,529
Seattle	(93)	1,683,350	12,148,383
Shelton	( )	Nil	33,775
Spokane	(47)	569,540	3,978,840
Spokane Co.	(32)	509,100	864,840
Sunnyside	(2)	23,500	29,875
Tacoma	(36)	571,900	1,736,909
Vancouver	(11)	167,100	456,000
Walla Walla	(5)	63,000	264,403
Wlla Wlla Co.	(5)	56,500	1,869,950
Wenatchee	(3)	41,500	925,908
Yakima	(11)	143,000	2,413,183
Total	**(1,231)**	**$ 17,469,890**	**$ 45,641,959**

ALASKA

Anchorage	(24)	$ 628,865	$ 2,135,410
Fairbanks	(8)	195,800	437,050
Juneau	( )	Nil	297,850
Ketchikan	( )	Nil	2,400
Total	**(32)**	**$ 824,665**	**$ 2,872,710**

IDAHO

Ammeda	(9)	$ 110,600	$ 519,300
Blackfoot	(8)	99,700	127,951
Boise	(10)	112,050	391,290
Caldwell	(6)	69,000	107,575
Coeur d'Alene	(7)	71,241	131,855
Idaho Falls	(13)	157,035	345,030
Jerome	(1)	10,000	19,750
Lewiston	(6)	90,600	1,183,430
Moscow	(6)	83,000	130,150
Nampa	(8)	82,000	103,525
Payette	( )	Nil	4,300
Pocatello	(3)	41,000	541,925
Sandpoint	(3)	37,000	31,000
St. Maries	(1)	11,000	11,000
Twin Falls	(12)	121,000	375,200
Total	**(93)**	**$ 1,095,226**	**$ 4,023,281**

MONTANA

Anaconda	(2)	$ 22,000	$ 22,000
Billings	(49)	639,600	925,975
Bozeman	(4)	52,150	111,250
Butte	( )	Nil	4,650
Cut Bank	( )	Nil	17,050
Glasgow	(17)	178,000	294,100
Glendive	(1)	16,000	36,975
Great Falls	(46)	405,576	546,546
Havre	(1)	5,775	7,775
Helena	(8)	134,500	201,845
Kalispell	(1)	13,000	48,353
Lewistown	(10)	95,000	104,500
Livingston	( )	Nil	13,250
Malta	( )	Nil	Nil
Miles City	( )	Nil	42,621
Missoula	( )	Nil	70,306
Total	**(139)**	**$ 1,561,601**	**$ 2,447,196**

WYOMING

Casper	(18)	$ 284,500	$ 344,370
Cheyenne	(60)	685,400	953,385
Cody	(1)	30,000	303,400
Laramie	(6)	123,000	320,326
Rawlins	( )	Nil	77,040
Riverton	(17)	194,000	202,345
Rock Springs	(4)	68,000	96,000
Sheridan	( )	Nil	58,930
Total	**(106)**	**$ 1,384,900**	**$ 2,355,796**

COLORADO

Adams Co.	(56)	$ 711,000	$ 1,530,120
Alamosa	(7)	103,500	119,442
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(121)	1,783,000	2,291,460
Aspen	(2)	29,200	121,000
Aurora	(88)	772,945	935,733
Boulder	(43)	605,960	664,953
Boulder Co.	(31)	368,000	879,284
Colo. Springs	(73)	1,002,960	1,262,382
Cortez	( )	Nil	7,250
Denver	(494)	3,094,884	13,876,153
Durango	(3)	43,720	427,160
El Paso Co.	(32)	416,250	863,844
Englewood	(5)	87,950	271,779
Estes Park	(2)	14,600	54,600
Fort Collins	(25)	325,500	715,115
Fort Morgan	(1)	13,568	29,989
Golden	(3)	49,580	84,460
Grnd Junction	(3)	29,500	118,369
Greeley	(20)	176,000	406,078
Jefferson Co.	(650)	6,151,707	8,187,960
La Junta	(3)	49,000	72,729
Lamar	(4)	45,000	53,000
Littleton	(10)	165,700	598,465
Longmont	(8)	77,500	245,804
Loveland	(12)	131,198	152,650
Monte Vista	(4)	3,625	46,000
Montrose	(2)	37,813	207,814
Pitkin Co.	(2)	26,000	47,700
Pueblo	(13)	153,795	457,345
Pueblo Co.	(12)	80,000	104,650
Sterling	( )	Nil	13,800
Trinidad	( )	Nil	18,744
Walsenburg	(11)	4,228	8,228
Westminster	(22)	243,700	462,844
Total	**(1,762)**	**$ 16,797,083**	**$ 35,336,904**

UTAH

American Frk	(3)	$ 29,300	$ 36,550
Bountiful	(20)	297,100	407,140
Brigham City	(32)	400,100	946,630
Cedar City	(2)	14,500	28,100
Clearfield	(3)	31,000	817,617
Davis Co.	(8)	87,294	116,752
Kaysville	(10)	49,090	54,040
Layton	(20)	244,000	288,100
Logan	(13)	195,522	229,772
Murray	(14)	153,000	512,484
Ogden	(14)	258,600	707,334
Orem	(5)	56,600	91,275
Price	( )	Nil	62,000
Provo	(15)	199,000	255,725
Salt Lake City	(76)	637,932	1,519,699
Salt Lake Co.	(311)	3,235,000	3,929,630
So. Slt Lk Cty	(7)	128,000	186,787
Spanish Fork	(3)	34,000	49,450
Tooele	(12)	113,323	133,257
Utah Co.	(8)	97,800	210,927
Weber Co.	(6)	73,000	82,000
Total	**(582)**	**$ 6,326,161**	**$ 10,665,269**

NEVADA

Boulder City	(2)	$ 17,920	$ 41,064
Clark Co.	(129)	1,634,010	8,650,428
Elko	(1)	5,200	43,320
Las Vegas	(196)	2,537,155	3,571,422
N. Las Vegas	(43)	484,812	601,352
Reno	(40)	546,100	1,092,980
Sparks	(138)	1,626,336	1,694,352
Washoe Co.	(24)	416,232	649,486
Total	**(573)**	**$ 7,267,135**	**$ 16,344,404**

ARIZONA

Buckeye	( )	$ Nil	$ 42,600
Casa Grande	(1)	14,000	34,700
Chandler	(11)	77,474	195,588
Douglas	(4)	18,725	20,020
Flagstaff	(65)	482,887	747,192
Florence	( )	Nil	Nil
Glendale	(14)	355,000	540,275
Maricopa Co.	(567)	4,930,140	6,127,557
Mesa	(121)	1,084,185	1,490,863
Phoenix	(384)	3,033,677	14,224,710
Pima Co.	(188)	2,015,850	6,198,943
Prescott	(7)	73,700	200,240
Scottsdale	(127)	1,076,800	1,303,427
Tempe	(132)	1,184,400	1,506,976
Tucson	(95)	1,545,903	2,758,477
Wickenburg	(1)	9,000	29,200
Winslow	(12)	59,950	67,650
Yuma	(13)	78,000	181,025
Total	**(1,742)**	**$ 16,039,691**	**$ 35,669,443**

NEW MEXICO

Alamogordo	( )	$ Nil	$ 50,738
Albuquerque	(101)	2,086,085	3,013,754
Artesia	(7)	84,500	100,606
Carlsbad	(10)	135,000	218,050
Clovis	(33)	371,635	398,674
Deming	(3)	37,000	60,224
Farmington	(2)	393,159	258,800
Gallup	(6)	98,900	246,852
Hobbs	(20)	309,188	890,249
Las Cruces	(15)	116,100	776,389
Las Vegas	( )	No Reply	No Reply
Lovington	(3)	44,000	366,449
Raton	(1)	16,000	18,500
Roswell	(113)	956,000	1,092,929
Santa Fe	(32)	246,090	1,178,546
Silver City	( )	No Reply	No Reply
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(2)	16,000	60,600
Tularosa	(1)	7,488	12,768
Total	**(349)**	**$ 4,918,145**	**$ 8,844,228**

HAWAII

Hawaii Co.	(36)	$ 429,034	$ 1,417,187
Honolulu	(335)	3,776,076	10,489,038
Maui Co.	(14)	152,458	320,861
Total	**(385)**	**$ 4,357,568**	**$ 12,227,086**
GRAND TOTAL	**(24,380)**	**$289,795,435**	**$538,550,516**

First Column Figures in Parentheses are Number of Residential Units • Second Column is

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(36)	$ 307,493	$ 449,014
Alameda Co.	(65)	882,200	1,533,600
Albany	(6)	28,000	154,205
Alhambra	(184)	1,384,550	1,755,811
Anaheim	(74)	723,590	3,575,988
Antioch	(6)	96,057	160,631
Arcadia	(19)	351,568	512,621
Arroyo Grande	(6)	72,000	443,250
Artesia	(4)	73,900	95,550
Atherton	(1)	50,000	190,331
Atwater	( )	Nil	22,200
Auburn	(1)	11,000	42,623
Avalon	( )	Nil	1,900
Azusa	(51)	481,250	702,200
Bakersfield	(81)	970,450	1,070,166
Baldwin Park	(203)	2,418,300	2,680,225
Banning	(23)	262,484	290,688
Barstow	(3)	20,650	493,694
Bell	(19)	120,550	201,015
Bellflower	(27)	257,400	409,445
Bell Gardens	(22)	188,500	213,180
Belmont	(9)	167,500	599,070
Benicia	(1)	22,500	35,673
Berkeley	(117)	955,785	1,420,886
Beverly Hills	(12)	1,089,000	2,895,086
Bradbury	( )	Nil	14,890
Brawley	(1)	10,600	10,600
Brea	(50)	410,835	437,327
Buena Park	(66)	1,116,045	1,438,175
Burbank	(46)	358,761	902,993
Burlingame	(7)	119,800	745,766
Butte Co.	( )	Nil	200,000
Calexico	(8)	10,700	70,950
Campbell	(45)	374,500	449,598
Carlsbad	(5)	87,240	108,594
Carmel	(2)	45,500	258,400
Chico	(63)	901,502	1,033,047
Chino	(36)	365,188	414,435
Chula Vista	(15)	103,686	241,130
Claremont	(5)	107,500	178,040
Coalinga	(2)	28,500	41,330
Colton	(35)	394,721	581,799
Commerce	( )	Nil	479,425
Compton	(6)	44,400	201,480
Concord	(76)	939,974	1,337,260
Cntra Csta Co.	(124)	2,148,805	2,879,324
Corona	(5)	190,974	247,924
Coronado	( )	No Reply	No Reply
Corte Madera	(33)	430,943	978,360
Costa Mesa	(119)	990,472	1,980,424
Covina	(28)	358,510	690,818
Cudahy	(13)	121,000	309,100
Culver City	(3)	68,200	242,126
Dairy Valley	( )	Nil	25,000
Daly City	(111)	1,194,838	1,482,223
Davis	(84)	743,000	825,325
Delano	(19)	191,600	222,844
Downey	(46)	381,710	1,119,570
Duarte	(1)	16,000	145,000
El Cajon	(43)	472,040	657,600
El Centro	(6)	49,250	626,799
El Cerrito	(8)	88,791	141,826
El Dorado Co.	(132)	2,179,566	2,929,337
El Monte	(15)	113,686	1,124,789
El Segundo	(10)	86,000	221,657
Emeryville	( )	Nil	39,400
Escondido	(4)	46,158	239,793
Eureka	(12)	214,260	772,829
Fairfield	(136)	763,766	832,991
Fillmore	( )	Nil	4,000
Fontana	(5)	49,672	76,632
Fremont	(131)	1,751,704	1,976,042
Fresno	(109)	1,127,200	2,150,724
Fresno Co.	(70)	781,345	1,532,168
Fullerton	(18)	449,077	1,085,185
Glendale	(201)	1,536,571	2,395,570
Glendora	(105)	1,922,100	2,027,200
Half Moon Bay	(2)	33,300	41,100
Hanford	(112)	1,077,360	1,267,820
Hawthorne	(43)	280,400	1,353,737
Hayward	(13)	105,550	368,970
Hemet	(13)	90,000	108,992
Hermosa Bch	(12)	129,324	163,183
Hillsborough	(2)	85,000	156,000
Holtville	(1)	10,000	14,000
Humboldt Co.*	( )		165,896
Huntngtn Bch	(166)	2,582,084	2,699,658
Huntngtn Prk	(12)	83,130	114,800
Imperial Co.	( )	Nil	7,000
Indio	(2)	11,520	215,574
Industry	( )	Nil	840,225
Inglewood	(161)	1,506,940	2,581,103
Irwindale	( )	Nil	233,700
Kern Co.	(121)	1,311,151	2,763,588
Laguna Beach	(14)	302,500	407,617
La Habra	(71)	1,148,985	1,352,244
Lakewood	(6)	148,700	258,990
La Mesa	(15)	287,085	416,603
La Mirada	(14)	53,000	281,435
La Puente	(2)	19,000	180,630
La Verne	(2)	35,000	49,175
Lawndale	(65)	271,700	361,770
Lindsay	(2)	12,000	33,673
Livermore	(6)	52,483	178,283
Lodi	(23)	246,300	404,795
Lompoc	(30)	386,325	476,139
Long Beach	(169)	1,222,025	4,486,865
Los Altos	(15)	328,316	435,987
Los Angeles	(2407)	32,415,455	54,870,045
Los Angls Co.	(684)	9,019,276	18,232,051
Los Gatos	( )	No Reply	No Reply
Lynwood	(8)	64,500	424,490
Madera	(8)	109,340	340,565
Madera Co.	(15)	172,400	235,400
Manhattn Bch	(35)	380,107	562,687
Manteca	(14)	132,150	318,670
Marin Co.	(65)	1,450,060	1,679,424
Martinez	(10)	92,528	220,098
Marysville	(2)	19,000	850,058
Maywood	(3)	20,700	52,673
Menlo Park	(25)	266,000	926,655
Merced	(11)	158,475	375,511
Merced Co.	(22)	302,478	359,549
Millbrae	(15)	292,500	777,300
Mill Valley	(8)	159,500	241,861
Modesto	(79)	948,000	1,079,325
Monrovia	(43)	705,807	806,502
Montclair	(174)	2,076,525	2,093,265
Montebello	(76)	898,200	1,134,152
Monterey	(7)	84,800	120,645
Monterey Co.	(71)	1,576,973	1,984,486
Monterey Prk	(82)	681,000	950,505
Mountin View	(44)	280,800	689,714
Napa	(37)	532,319	724,091
Napa Co.	(14)	216,469	299,180
National City	( )	Nil	83,218
Newport Bch	(103)	2,044,530	2,404,491
N. Sacramento	(6)	60,462	556,110
Norwalk	(6)	55,500	519,150
Novato	(10)	217,050	275,350
Oakdale	(3)	32,498	39,603
Oakland	(248)	2,297,415	4,819,880
Oceanside	(16)	294,350	678,555
Ojai	(2)	24,000	64,575
Ontario	(53)	528,736	651,002
Orange	(256)	3,883,260	4,328,861
Orange Co.	(342)	5,587,814	6,286,321
Oroville	(2)	53,600	109,965
Oxnard	(105)	1,191,880	1,527,887
Pacifica	(82)	614,100	813,600
Pacific Grove	(6)	78,000	125,400
Palm Springs	(45)	817,500	1,495,530
Palo Alto	(22)	429,750	2,376,522
Palos Vrds Est.	(11)	439,230	675,610
Paramount	(6)	55,700	98,470
Pasadena	(71)	1,018,780	2,134,700
Paso Robles	( )	Nil	49,110
Pico Rivera	(3)	52,500	335,278
Piedmont	(1)	30,000	63,077
Pinole	( )	No Reply	No Reply
Pittsburg	(2)	41,292	73,239
Placentia	(1)	10,530	20,200
Placer Co.	(97)	1,261,843	1,636,163
Pleasanton	(5)	74,940	84,000
Pomona	(48)	400,125	832,294
Porterville	(2)	28,500	66,142
Port Hueneme	(9)	47,000	73,400
Red Bluff	( )	Nil	47,300
Redding	(6)	122,570	398,497
Redlands	(50)	659,000	752,331
Redondo Bch.	(43)	442,869	3,484,604
Redwood City	(41)	310,506	2,787,053
Richmond	(123)	1,150,686	3,363,522
Riverside	(48)	452,200	1,076,597
Riverside Co.	(137)	2,004,514	3,198,600
Rolling Hills	(2)	112,800	145,150
Rollg Hills Est.	(5)	124,200	163,185
Rosemead	(12)	156,300	247,185
Roseville	(23)	218,148	674,848
Sacramento	(87)	1,098,000	2,446,475
Sacramnto Co.	(266)	3,106,766	7,527,272
St. Helena	( )	No Reply	No Reply
Salinas	(53)	619,300	803,625
Sn Bernardino	(36)	392,981	1,314,008
Sn Brnrdn Co.	(325)	2,679,037	7,249,257
San Bruno	(32)	279,100	406,359
San Carlos	(18)	389,769	2,722,969
San Clemente	(63)	514,423	
San Diego	(805)	7,798,412	
San Diego Co.	(165)	2,934,000	
San Dimas	(9)	118,315	
San Fernando	(3)	39,000	
San Francisco	(230)	2,997,253	
San Gabriel	(46)	491,468	
Sanger	(3)	40,800	
San Jacinto	(6)	47,000	
Sn Joaqin Co.	(26)	244,014	
San Jose	(812)	8,780,779	
San Leandro	(50)	770,220	
Sn Luis Obspo	(9)	94,884	
S. L. Obsp Co.	(48)	504,824	
San Marino	( )	Nil	
San Mateo	(74)	697,000	
San Mateo Co.	(40)	684,180	
San Pablo	(23)	171,599	
San Rafael	(24)	523,008	
Santa Ana	(132)	1,594,100	
Santa Barbara	(78)	896,500	
Snta Brbra Co.	(243)	3,567,500	
Santa Clara	(165)	1,210,000	
Santa Cira Co.	(81)	1,356,600	
Santa Cruz	(37)	385,935	
Santa Cruz Co.	(111)	1,233,718	
Snt Fe Sprngs	( )	Nil	
Santa Maria	(56)	670,588	
Santa Monica	(382)	3,949,098	
Santa Paula	(5)	57,857	
Santa Rosa	(47)	643,100	
Sausalito	(2)	15,050	
Seal Beach	(21)	357,260	
Seaside	(22)	172,500	
Selma	(9)	78,000	
Shasta Co.	(7)	101,655	
Sierra Madre	(48)	371,905	
Solano Co.	(5)	65,851	
Sonoma Co.	(58)	623,189	
South Gate	(206)	1,430,536	
So. El Monte	( )	Nil	
So. Pasadena	(5)	45,709	
So. Sn Frncsco	(12)	113,975	
Stanislaus Co.	(27)	333,562	
Stockton	(49)	630,280	
Sunnyvale	(140)	2,345,816	
Temple City	(6)	92,000	
Torrance	(266)	2,833,252	
Tracy	(3)	36,000	
Tulare	(4)	55,500	
Tulare Co.	(51)	242,386	
Turlock	(3)	53,293	
Ukiah	( )	Nil	
Upland	(73)	1,268,550	
Vacaville	(9)	108,300	
Vallejo	(41)	446,100	
Ventura	(27)	417,750	
Ventura Co.	(468)	5,375,200	
Visalia	(62)	859,742	
Walnut	(78)	1,063,400	
Walnut Creek	(45)	839,100	
Wasco	(1)	6,000	
Watsonville	(3)	18,153	
West Covina	(12)	249,640	
Whittier	(39)	268,100	
Woodland	(10)	120,090	
Woodside	(1)	17,000	
Yolo Co.	(20)	302,565	
Yreka	(4)	60,500	
Yuba City	(71)	541,220	
Yuba Co.	(17)	132,650	
Total	**(16,650)**	**$200,770,622**	$

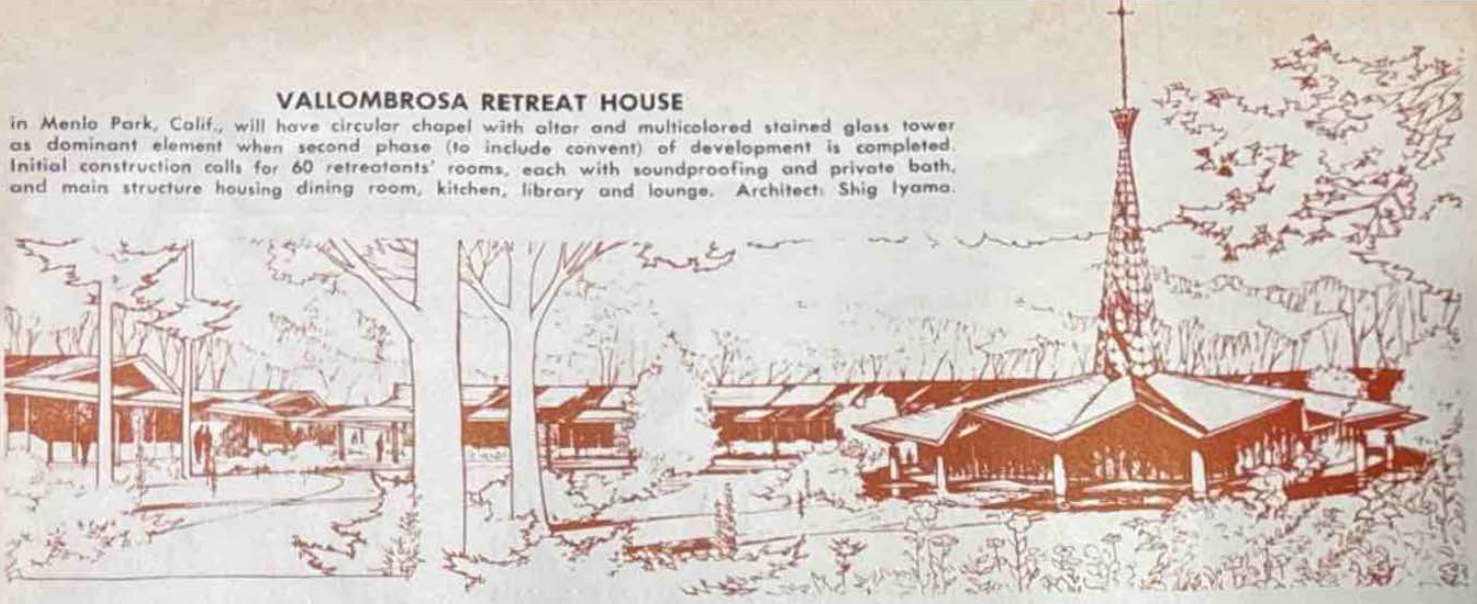
OREGON

Albany	(13)	$ 125,500	$
Ashland	(4)	39,300	
Astoria	(6)	60,760	
Baker	( )	Nil	
Beaverton	(5)	91,160	
Bend	(1)	10,000	
Central Point	(4)	31,000	
Clackamas Co.	(42)	554,000	
Coos Bay	(10)	87,500	
Corvallis	(14)	158,000	
Dallas	(1)	16,500	
Douglas Co.	(5)	43,960	
Eugene	(70)	2,144,952	
Forest Grove	(1)	12,000	
Grants Pass	(6)	50,500	
Gresham	(8)	113,100	
Hermiston	(1)	12,000	
Hillsboro	(8)	89,495	
Hood River	(1)	17,600	
Klamath Falls	(1)	13,500	

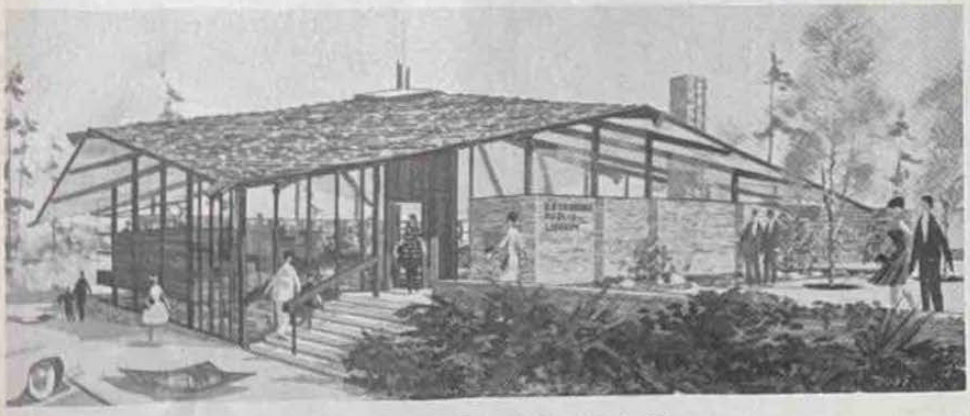
* Breakdown not available

VALLOMBROSA RETREAT HOUSE

in Menlo Park, Calif., will have circular chapel with altar and multicolored stained glass tower as dominant element when second phase (to include convent) of development is completed. Initial construction calls for 60 retreatants' rooms, each with soundproofing and private bath, and main structure housing dining room, kitchen, library and lounge. Architect: Shig Iyama.

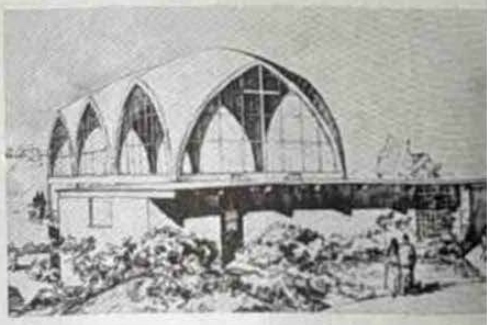


PROJECT PREVIEW



BAINBRIDGE PUBLIC LIBRARY

serving one of Seattle's island neighbors is planned as two-story structure with woodsy—and rainy—Northwest uppermost in mind. Glued laminated beams will be tied diagonally with steel rods hidden in roof, covered with cedar shakes. Glass gables will admit plenty of light and corner water spouts will flow into basins as pleasant design extra. Basement eventually will house children's and music departments and community meeting room. Architect: John Rudolph.



KAHIKUONALANI CHURCH

now being built in Honolulu's Pearl City Highlands is of thin shell, prefabricated arch construction with plastic windows. Structure is designed to fully utilize T-shaped sloping lot with view to right. Architects: Frost & Frost.



CLAIR E. GALE JUNIOR HIGH SCHOOL

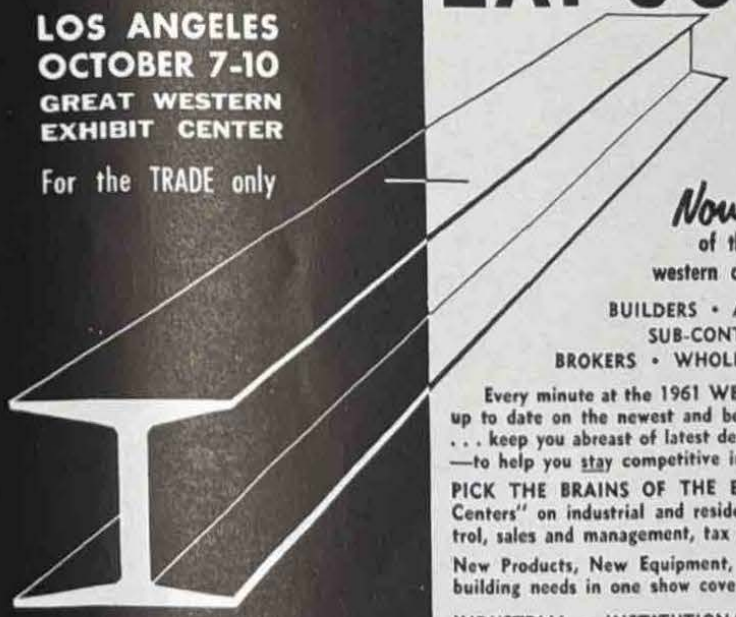
scheduled to open its doors to 1,075 students in Idaho Falls, Idaho, next year is noteworthy for use of space around periphery of circular gymnasium-auditorium. Beneath concrete folded plate roof, repeated on cafeteria at right, will be little theater, concession stand, checkroom, crafts and arts rooms, vocal and instrumental practice and storage rooms and teachers' lounge. Aluminum curtain wall and face brick will finish exterior of $1,220,000 structure. Architects: Norman J. Hamill & Associates; structural engineer: Lawrence E. Matson.

IF YOUR BUSINESS IS IN BUILDING . . . BUYING, SELLING, SPECIFYING, OR USING ANY TYPE OF CONSTRUCTION MATERIALS OR EQUIPMENT—DON'T MISS THE WEST'S OWN

WBIE

Attend the 1961 WESTERN BUILDING INDUSTRIES EXPOSITION

LOS ANGELES
OCTOBER 7-10
GREAT WESTERN EXHIBIT CENTER
For the TRADE only



Built with *you* in mind!

Now . . . a trade show to fit the needs of the business and professional men of western construction . . .

BUILDERS • ARCHITECTS • CONTRACTORS AND SUB-CONTRACTORS • ENGINEERS • JOBBERS BROKERS • WHOLESALERS • DEALERS • DEVELOPERS

Every minute at the 1961 WBIE will pay you dividends . . . bring you up to date on the newest and best in building products and equipment . . . keep you abreast of latest developments in materials, methods, ideas —to help you stay competitive in this biggest of all western industries.

PICK THE BRAINS OF THE EXPERTS in WBIE's special "Planning Centers" on industrial and residential building, storage and traffic control, sales and management, tax information, and other subjects.

New Products, New Equipment, New Systems, New Ideas for all your building needs in one show covering all four building markets—

INDUSTRIAL • INSTITUTIONAL • COMMERCIAL • RESIDENTIAL

Sponsored by Associations of the
WESTERN BUILDING INDUSTRIES COUNCIL
AMERICAN BUILDING CONTRACTORS ASSOCIATION
AMERICAN INSTITUTE OF ARCHITECTS, Southern California Chapter
ASSOCIATED BRICK MANUFACTURERS OF SOUTHERN CALIFORNIA
ASSOCIATED GENERAL CONTRACTORS, Southern California Chapter
ASSOCIATED PLUMBING & HEATING CONTRACTORS OF IDAHO, Inc.
ASSOCIATED PLUMBING & HEATING CONTRACTORS OF WASHINGTON, Inc.
NATIONAL BUILDING MATERIAL DISTRIBUTORS ASSOCIATION
REMODELING CONTRACTORS ASSOCIATION
WHOLESALE LUMBERMEN'S ASSOCIATION OF SOUTHERN CALIFORNIA

Get complimentary invitations from any of the above sponsor associations, or return the attached coupon to WBIE Show Office, 2216 South Hill Street, Los Angeles 7, California.

WESTERN BUILDING INDUSTRIES EXPOSITION
2216 South Hill Street, Los Angeles 7, California

Please send _____ complimentary attendance invitations to the 1961 WBIE for distribution to our customers, employees and guests.

NAME _____

FIRM _____

ADDRESS _____

CITY _____ STATE _____

THE BUILDING WEST—Pattern of permits issued during August—and during the entire first eight months of 1961—is a study in contrasts and contradictions, Pacific Architect & Builder's monthly survey reveals. Dollar volume for August was greater than July but lesser than August one year ago. The eight-month total for this year was greater than for the corresponding period of 1960. Residential permits were up from July, up from August a year ago; and the eight-month total also was greater this year than last. Nonresidential permits were up from July, down from August a year ago; but the total for the first eight months this year was far ahead of 1960. For the year so far, total building is up 5%; residential only, up 3%; nonresidential, up 7%. Contradictory or not, the figures do show that building of all types is greater this year than last and that the backlog of work to be done yet this fall is greater than in recent past years.

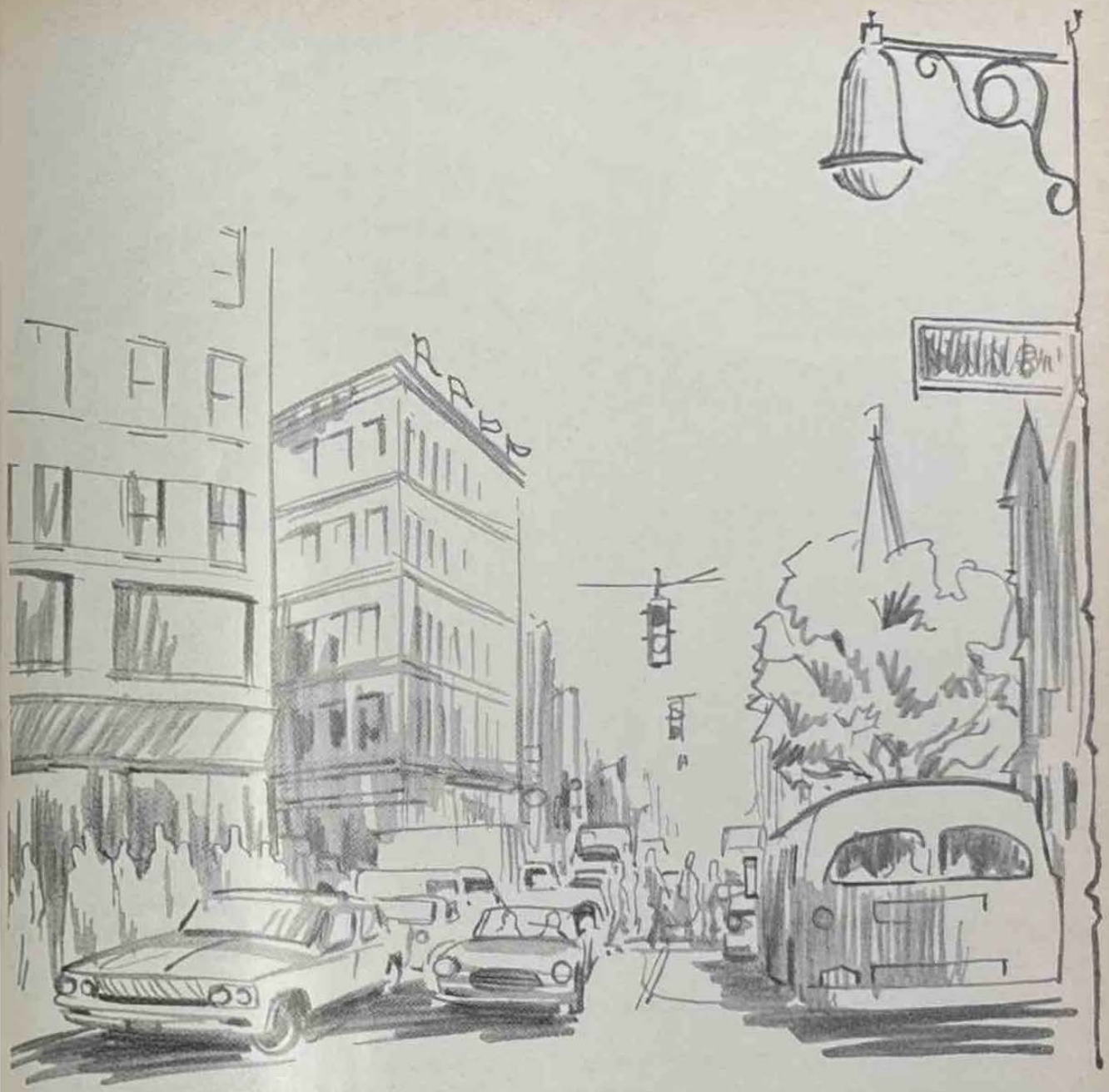
TOP TWENTY-FIVE—Hottest spots in the West for August with dollar volume of permits rounded out in millions: **1.** Los Angeles, $54.8; **2.** Los Angeles County, $18.2; **3.** Phoenix, $14.2; **4.** Denver, $13.8; **5.** Seattle, $12.1; **6.** San Diego, $11.3; **7.** San Jose, $10.7; **8.** Honolulu, $10.4; **9.** King County, Wash., $9.1; **10.** Clark County, Nev., $8.6; **11.** Ventura County, Calif., $8.4; **12.** Jefferson County, Colo., $8.1; **13.** Sacramento County, $7.5; **14.** San Bernardino County, $7.2; **15.** Orange County, $6.2; **16.** Pima County, Ariz., $6.1; **17.** Maricopa County, Ariz., $6.1; **18.** Sunnyvale, Calif., $6 **19.** San Francisco, $5.8; **20.** Portland, $5.2; **21.** Oakland, $4.8; **22.** San Diego County, $4.7; **23.** Long Beach, $4.4; **24.** Orange, Calif., $4.3; **25.** Santa Barbara County, $4.2. Among the newcomers are Clark and Pima counties and Sunnyvale.

LICENSING AND LEGISLATION—Serving on the initial Oregon State Board of Landscape Architect Examiners are Chairman William K. Roth and Arthur W. Erfeldt of Portland and Lloyd M. Bond of Eugene. Applicants who can show evidence of having practiced landscape architecture for two years previous to August 9 may apply for registration under the "grandfather" clause until February 9, 1962. After that time all applications will be either by reciprocity from another state having a similar law or by a 3½-day, 32-hour written examination. . . . A directive issued by Idaho's Board of Examiners calls for architects to prepare plans on all construction work costing more than $1,000. Commenting on the action, Secretary of State Arnold Williams has this to say: "I have been told by many contractors that they have been unable to bid on construction work because of the lack of adequate plans. I think this new requirement will result in better and less costly work." . . . Fearing that architectural dictatorship will result, members of the Southern California Chapter, AIA, are watching with interest a proposed Beverly Hills ordinance which would give that city's Building Department the right to issue a permit on "esthetic" grounds.

CONCERNING COMMISSIONS—The city fathers can't be blamed if Oakland doesn't get a first-rate design for its proposed $6 million museum center. The mayor's committee on architectural selection began its job of interviewing 12 firms by leading off with Yale's Paul Rudolph and Harvard's Jose Luis Sert, to be followed by Philip Johnson, New York; Walter Gropius, Cambridge, Mass.; Minoru Yamasaki, Birmingham, Mich.; Richard Neutra, Los Angeles; Mario Ciampi, Skidmore, Owings & Merrill and Campbell & Wong, all of San Francisco; and Warnecke & Warnecke, Treichel & Gibbs and Reynolds & Chamberlain, all of Oakland. . . . A $15 million construction program scheduled for completion in 1963 will produce the longest and highest cable car system in the Western Hemisphere. The 3.54-mile tourist attraction will start from Albuquerque's east mesa at the 6,000-ft. level and rise 3,782 ft. during the traverse to the summit of South Sandia Peak. The architectural-engineering firm of John Graham & Co. will do much of the basic work in its Seattle office.

PRESERVATION PROGRAM—Joining the ranks of AIA chapters across the land which are cataloguing buildings deemed worthy of preservation for historic or architectural values, the Southwest Washington Chapter will work with the Tacoma Tribune in presenting sketches and photographs to the public. Project chairman is Alan Liddle.

CONSULTING THE CALENDAR—The California Council, AIA, will discuss "Adios Suburbia?—Glamour for the Center City" when it meets for the 16th annual convention in Coronado October 18-22. Keynoter will be Samuel T. Hurst, newly appointed dean of the School of Architecture at the University of Southern California. The appearance of William Zeckendorf, who as president of Webb & Knapp, Inc., heads the world's largest real estate development company, is bound to engender more than ordinary interest. Other speakers of note: architects Charles A. Blessing, director of city planning, Detroit, and Carl Feiss, planning and urban renewal consultant, Washington, D. C. . . . October 5-7 are the dates for the statewide meeting of the Structural Engineers Association of California, with headquarters at the El Dorado Hotel and Sacramento Inn, Sacramento. . . . Structural Engineers in the Northwest will gather for their annual conference in Seattle's Benjamin Franklin Hotel October 20-21. Principal address will be given by Dr. Arthur Casagrande, professor of soil mechanics and foundation engineering, Harvard University. . . . Sacramento will host the state convention of the California Council of Landscape Architects in the El Dorado Hotel October 19-22.



Local Business Scores Again! On this, our Twentieth Anniversary, we salute the energy and foresight of thousands of businessmen and executives in every part of the land for their continuing support of the Payroll Savings Plan for U.S. Savings Bonds. For twenty years, they have seen the Payroll Savings Plan pay off in more local buying power. They've seen it help create more efficient and confident employees. They've seen it as a hard-to-beat employee benefit program. They've seen it improve labor relations and cut employee turnover. They've seen it strengthen the economic sinews of the nation.

How about you? Why not install this plan now or learn the many ways to improve participation in your existing plan. Send for complete brochure. Call your State Savings Bonds Director or write: U.S. Savings Bonds Division, Treasury Department, Washington 25, D.C.

20th ANNIVERSARY 1941 ☆ 1961

U.S. SAVINGS BONDS
20 Years of Service to America

PACIFIC ARCHITECT & BUILDER

The U. S. Government does not pay for this advertisement. The Treasury Department thanks, for their patriotism, The Advertising Council and the donor.

THE BUILDING WEST—Pattern of permits issued during August—and during the entire first eight months of 1961—is a study in contrasts and contradictions, Pacific Architect & Builder's monthly survey reveals. Dollar volume for August was greater than July but lesser than August one year ago. The eight-month total for this year was greater than for the corresponding period of 1960. Residential permits were up from July, up from August a year ago; and the eight-month total also was greater this year than last. Nonresidential permits were up from July, down from August a year ago; but the total for the first eight months this year was far ahead of 1960. For the year so far, total building is up 5%; residential only, up 3%; nonresidential, up 7%. Contradictory or not, the figures do show that building of all types is greater this year than last and that the backlog of work to be done yet this fall is greater than in recent past years.

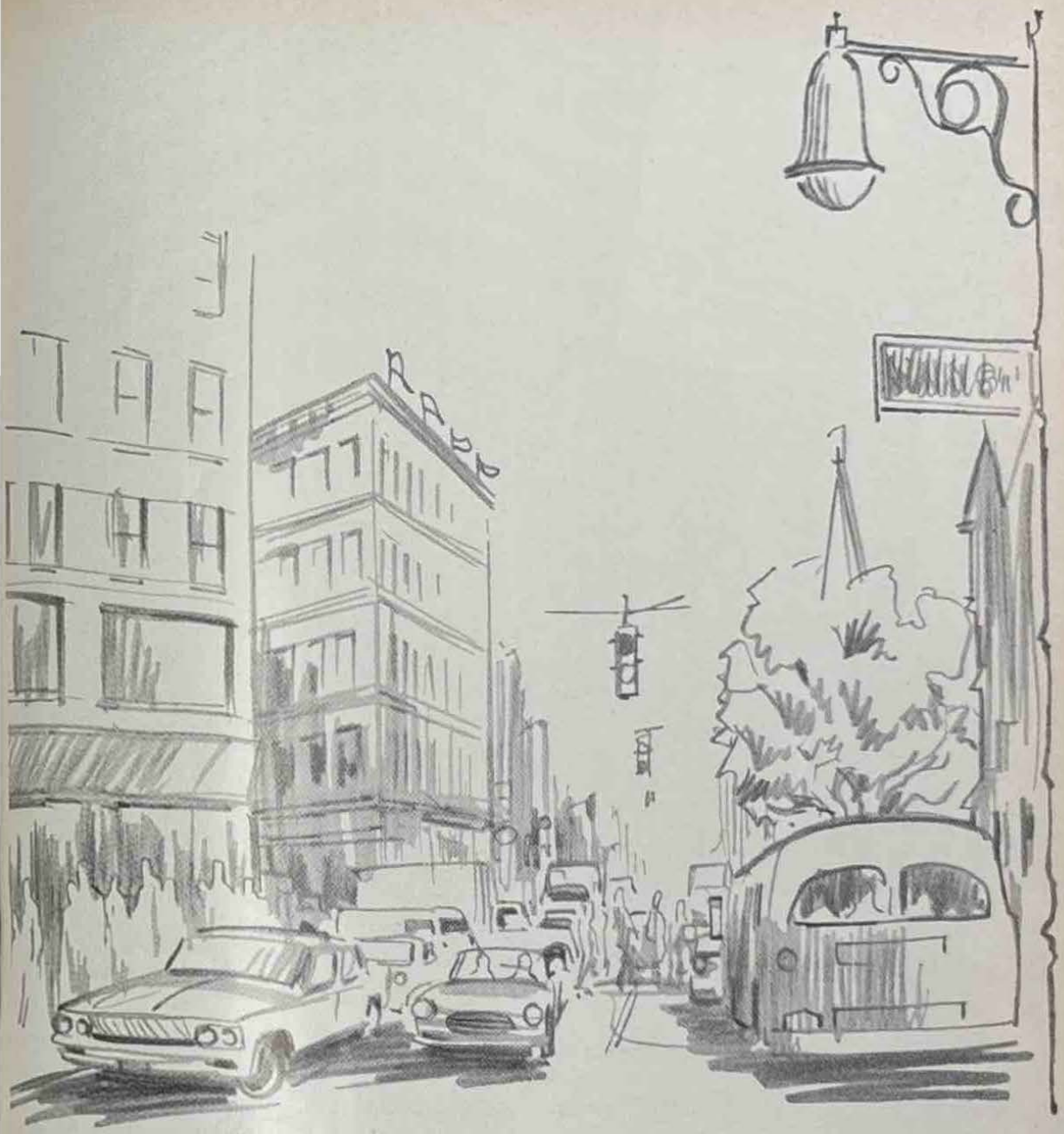
TOP TWENTY-FIVE—Hottest spots in the West for August with dollar volume of permits rounded out in millions: **1.** Los Angeles, $54.8; **2.** Los Angeles County, $18.2; **3.** Phoenix, $14.2; **4.** Denver, $13.8; **5.** Seattle, $12.1; **6.** San Diego, $11.3; **7.** San Jose, $10.7; **8.** Honolulu, $10.4; **9.** King County, Wash., $9.1; **10.** Clark County, Nev., $8.6; **11.** Ventura County, Calif., $8.4; **12.** Jefferson County, Colo., $8.1; **13.** Sacramento County, $7.5; **14.** San Bernardino County, $7.2; **15.** Orange County, $6.2; **16.** Pima County, Ariz., $6.1; **17.** Maricopa County, Ariz., $6.1; **18.** Sunnyvale, Calif., $6 **19.** San Francisco, $5.8; **20.** Portland, $5.2; **21.** Oakland, $4.8; **22.** San Diego County, $4.7; **23.** Long Beach, $4.4; **24.** Orange, Calif., $4.3; **25.** Santa Barbara County, $4.2. Among the newcomers are Clark and Pima counties and Sunnyvale.

LICENSING AND LEGISLATION—Serving on the initial Oregon State Board of Landscape Architect Examiners are Chairman William K. Roth and Arthur W. Erfeldt of Portland and Lloyd M. Bond of Eugene. Applicants who can show evidence of having practiced landscape architecture for two years previous to August 9 may apply for registration under the "grandfather" clause until February 9, 1962. After that time all applications will be either by reciprocity from another state having a similar law or by a 3½-day, 32-hour written examination. . . . A directive issued by Idaho's Board of Examiners calls for architects to prepare plans on all construction work costing more than $1,000. Commenting on the action, Secretary of State Arnold Williams has this to say: "I have been told by many contractors that they have been unable to bid on construction work because of the lack of adequate plans. I think this new requirement will result in better and less costly work." . . . Fearing that architectural dictatorship will result, members of the Southern California Chapter, AIA, are watching with interest a proposed Beverly Hills ordinance which would give that city's Building Department the right to issue a permit on "esthetic" grounds.

CONCERNING COMMISSIONS—The city fathers can't be blamed if Oakland doesn't get a first-rate design for its proposed $6 million museum center. The mayor's committee on architectural selection began its job of interviewing 12 firms by leading off with Yale's Paul Rudolph and Harvard's Jose Luis Sert, to be followed by Philip Johnson, New York; Walter Gropius, Cambridge, Mass.; Minoru Yamasaki, Birmingham, Mich.; Richard Neutra, Los Angeles; Mario Ciampi, Skidmore, Owings & Merrill and Campbell & Wong, all of San Francisco; and Warnecke & Warnecke, Treichel & Gibbs and Reynolds & Chamberlain, all of Oakland. . . . A $15 million construction program scheduled for completion in 1963 will produce the longest and highest cable car system in the Western Hemisphere. The 3.54-mile tourist attraction will start from Albuquerque's east mesa at the 6,000-ft. level and rise 3,782 ft. during the traverse to the summit of South Sandia Peak. The architectural-engineering firm of John Graham & Co. will do much of the basic work in its Seattle office.

PRESERVATION PROGRAM—Joining the ranks of AIA chapters across the land which are cataloguing buildings deemed worthy of preservation for historic or architectural values, the Southwest Washington Chapter will work with the Tacoma Tribune in presenting sketches and photographs to the public. Project chairman is Alan Liddle.

CONSULTING THE CALENDAR—The California Council, AIA, will discuss "Adios Suburbia?—Glamour for the Center City" when it meets for the 16th annual convention in Coronado October 18-22. Keynoter will be Samuel T. Hurst, newly appointed dean of the School of Architecture at the University of Southern California. The appearance of William Zeckendorf, who as president of Webb & Knapp, Inc., heads the world's largest real estate development company, is bound to engender more than ordinary interest. Other speakers of note: architects Charles A. Blessing, director of city planning, Detroit, and Carl Feiss, planning and urban renewal consultant, Washington, D. C. . . . October 5-7 are the dates for the statewide meeting of the Structural Engineers Association of California, with headquarters at the El Dorado Hotel and Sacramento Inn, Sacramento. . . . Structural Engineers in the Northwest will gather for their annual conference in Seattle's Benjamin Franklin Hotel October 20-21. Principal address will be given by Dr. Arthur Casagrande, professor of soil mechanics and foundation engineering, Harvard University. . . . Sacramento will host the state convention of the California Council of Landscape Architects in the El Dorado Hotel October 19-22.



Local Business Scores Again! On this, our Twentieth Anniversary, we salute the energy and foresight of thousands of businessmen and executives in every part of the land for their continuing support of the Payroll Savings Plan for U.S. Savings Bonds. For twenty years, they have seen the Payroll Savings Plan pay off in more local buying power. They've seen it help create more efficient and confident employees. They've seen it as a hard-to-beat employee benefit program. They've seen it improve labor relations and cut employee turnover. They've seen it strengthen the economic sinews of the nation.

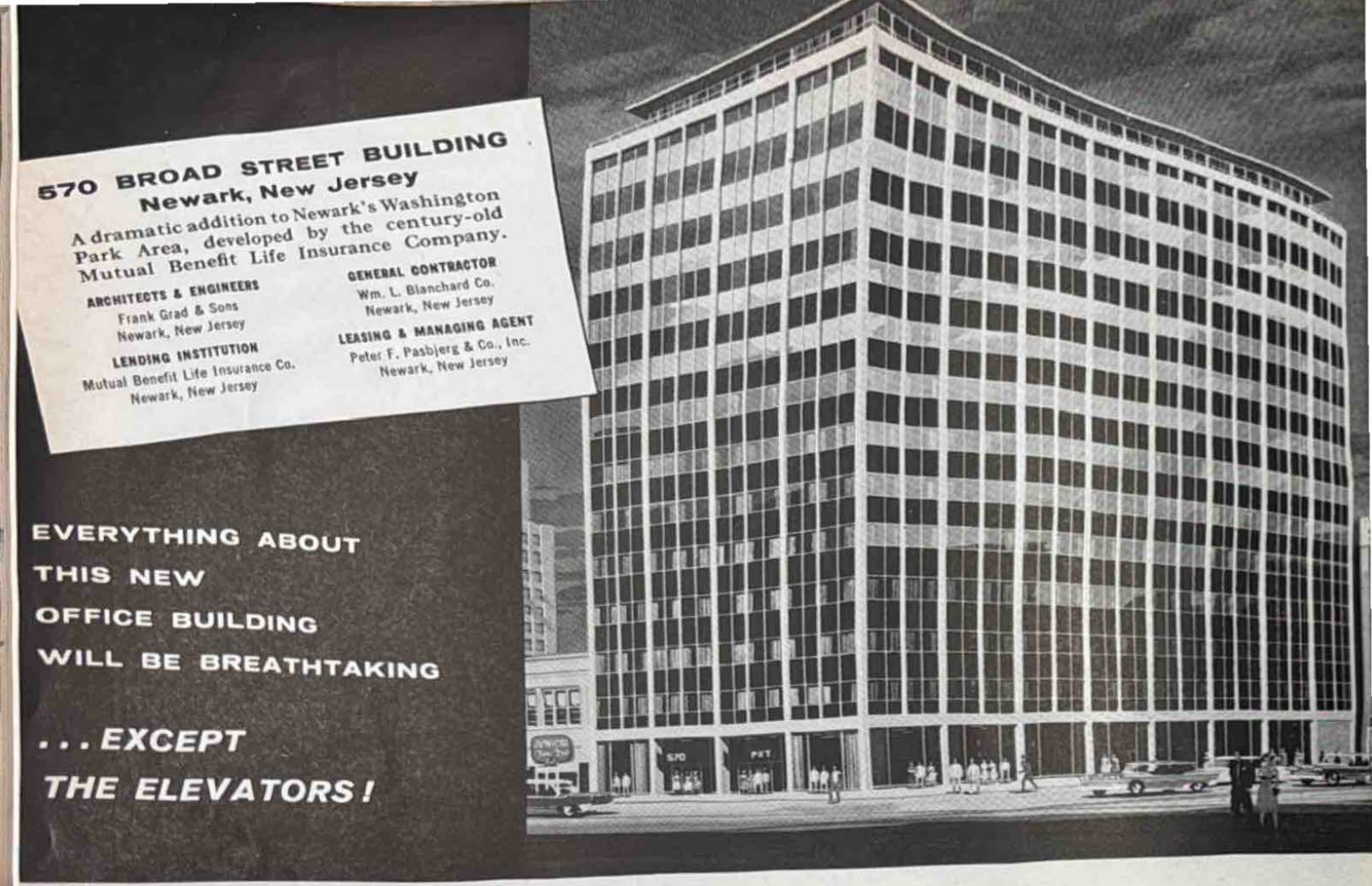
How about you? Why not install this plan now or learn the many ways to improve participation in your existing plan. Send for complete brochure. Call your State Savings Bonds Director or write: U.S. Savings Bonds Division, Treasury Department, Washington 25, D.C.

20th ANNIVERSARY 1941 ☆ 1961

U.S. SAVINGS BONDS
20 Years of Service to America

PACIFIC ARCHITECT & BUILDER

The U. S. Government does not pay for this advertisement. The Treasury Department thanks, for their patriotism, The Advertising Council and the donor.



570 BROAD STREET BUILDING
Newark, New Jersey

A dramatic addition to Newark's Washington Park Area, developed by the century-old Mutual Benefit Life Insurance Company.

ARCHITECTS & ENGINEERS
Frank Grad & Sons
Newark, New Jersey

GENERAL CONTRACTOR
Wm. L. Blanchard Co.
Newark, New Jersey

LENDING INSTITUTION
Mutual Benefit Life Insurance Co.
Newark, New Jersey

LEASING & MANAGING AGENT
Peter F. Pasbjerg & Co., Inc.
Newark, New Jersey

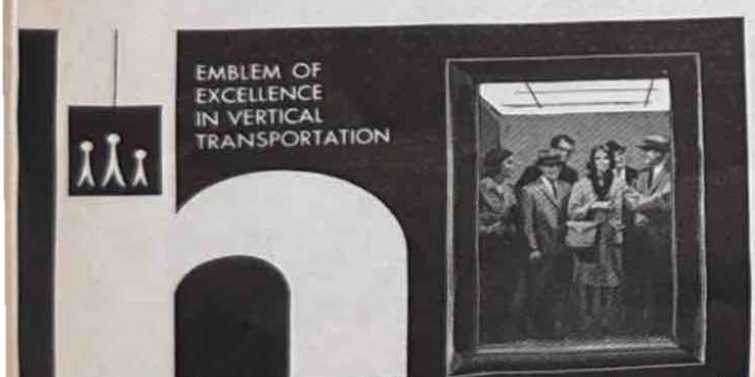
EVERYTHING ABOUT THIS NEW OFFICE BUILDING WILL BE BREATHTAKING

. . . EXCEPT THE ELEVATORS!

Haughton *DYNAFLITE* Contro

will provide fastest floor-to-floor time with *complete* comfor

This is the 570 Broad Street Office Building, Newark, New Jersey. Now under construction, its 14 floors will be served by four Haughton Operatorless Elevators with totally new *Dynaflite* control. With this control, floor-to-floor time can be incredibly fast, because starts and stops are so precisely controlled every time, and are so gentle that passengers scarcely feel any motion at all. Thus Dynaflite combines speed and comfort to provide unmatched efficiency and passenger well-being . . . and enhance building prestige an rentability. Haughton Dynaflite control is ready serve your buildings today, thanks to Elevonics*. the new technology in vertical transportation th has created new standards for excellence in elevat performance. Include Dynaflite's distinctive adva tages in your building or modernization plans. A your Haughton representative for complete details, write us, without obligation.



A HAUGHTON 7-PROGRAM SYSTEM

will anticipate in advance the varied traffic conditions encountered in the 570 Broad Street Building. An "electronic brain" will automatically dispatch cars at proper times, in the proper sequence . . . avoiding the congestion of "rush hours" and "coffee breaks." This type of predetermined service can work wonders in your installation.

*Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative a cation of electronic devices and instrumentation for betterment of systems design and performance. Reg. in U. S. Pat.

HAUGHTON ELEVATOR COMPAN

DIVISION OF TOLEDO SCALE CORPORATION

Toledo 9, Ohio — Offices in Principal Cit

PASSENGER AND FREIGHT ELEVATORS · ESCALATORS · DUMBWAITE

Colorado cites variety of projects in AIA design program

In its first Honor Awards program, the Colorado Chapter, AIA, cited eight buildings representing five classifications—commercial (three), residential (two) and religious, educational and health (one each). An office building, a church remodeling and an architect's own residence were singled out for the top Honor Awards.

Certificates to the six winning architects or firms and their clients were presented at a banquet in Denver's University Club September 15. Speaker was one of the jurors, Pietro Belluschi, dean of the School of Architecture and Planning, Massachusetts Institute of Technology. Completing the jury were Walter Netsch, Chicago, practicing architect of Skidmore, Owings & Merrill, who designed the Air Force Academy, and Elisabeth Kendall Thompson, Berkeley, western editor of Architectural Record.

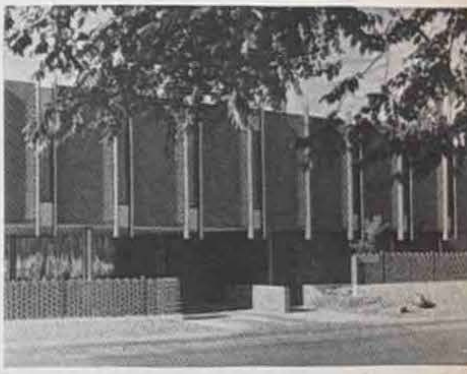
The jurors expressed their disappointment over the quality of the school buildings and the few submissions in the areas of recreational and industrial projects.

The premiated projects were displayed in an exhibit which will circulate around the state at a later date and will be available for showings through the AIA chapter.



FREDRIC A. BENEDICT RESIDENCE (PA&B, Sept. '60), Aspen: Fredric A. Benedict, architect.

Honor Awards

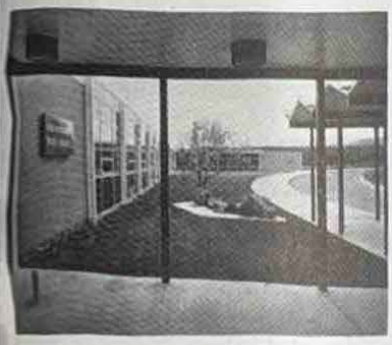


PROFESSIONAL OFFICE BUILDING, Denver: Donald R. Roark, architect.



WASHINGTON PARK CONGREGATIONAL CHURCH (remodeling), Denver: W. C. Muchow & Associates, architects.

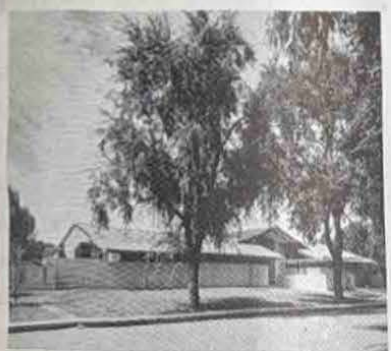
Awards of Merit



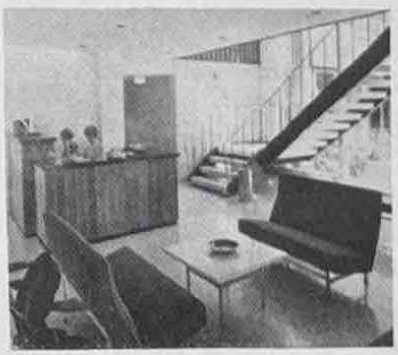
AIR ACADEMY HIGH SCHOOL, Colorado Springs: Bunts & Kelsey, architects.



CRAGMOR MANOR NURSING HOME, Colorado Springs: Bunts & Kelsey, architects.



STANLEY T. WALLBANK RESIDENCE, Denver: Tsian Papachristou, architect.



KOA BUILDING, Denver: Moore, Sink & Bush, architects.

Special Commendation

GALLUN BUILDING (PA&B, Apr. '60), Aspen: Fredric A. Benedict, architect.





Photos: Guy Burgess (3), Art Hupy (2), Arnold Gassan.

32 western houses honored in Sunset-AIA program

From almost 300 entries submitted in the 1961-62 Western Home Awards program co-sponsored by Sunset Magazine and the AIA, 32 have been selected as prize winners.

Entries were judged in two broad groups: custom- and merchant-built houses. All have been constructed in the West within the last four years and designed by registered architects.

Joining Proctor Mellquist, editor of Sunset, in the judging were designer Henry Dreyfuss, New York and California; architects Minoru Yamasaki, Birmingham, Mich.; Robert E. Alexander, Los Angeles; Fred Bassetti, Seattle; John Carl Warnecke, San Francisco; and landscape architect Thomas Church, San Francisco.

Winning architects and their awards:

Honor Awards: Buff, Straub & Hensman, Los Angeles; Henrik Bull, San Francisco; Hall & Goodhue, Monterey; Hester & Davis, La Jolla, Calif.; Killingsworth, Brady, Smith, Long Beach; Wendell H. Lovett, Bellevue, Wash.; Germano Milono, San Francisco; Smith & Williams, South Pasadena.

Awards of Merit: Allan & Olsson, Phoenix; Henrik Bull; Bystrom & Greco, Seattle; Campbell & Wong & Associates, San Francisco; John L. Field, San Francisco; Hester & Davis; Killingsworth, Brady, Smith (2); John Lord King, San Francisco; Jacob Robbins, Berkeley; George T. Rockrise, San Francisco; Edwin Wadsworth, Woodside, Calif.; Wurster, Bernardi & Emmons, San Francisco; Richard Dorman & Associates, Beverly Hills; Kirk, Wallace, McKinley & Associates, Seattle; Pierre Koenig, Los Angeles; Charles W. Moore with Richard C. Peters, Berkeley; Smith & Williams.

Special Awards: Richard Banta, Los Angeles; Homer Delawie, San Diego; John L. Field; Kenneth A. and Robert F. Gorden, Altadena, Calif.; Francis E. Leighton, Sacramento; Marquis & Stoller, San Francisco.

Hilton finally underway

The San Francisco Hilton, whose construction start was delayed due to a city building permit dispute, is now underway and general contractor John R. Cahill Jr. indicates that the 1,200-room hotel will be opened in about 28 months. Architect William B. Tabler's design calls for parking facilities on seven of the 15 floors. Guests arriving by auto will be able to drive up ramps in the center core of the $28 million structure and park their cars on their respective floors.

Condominium seen as answer to San Francisco housing

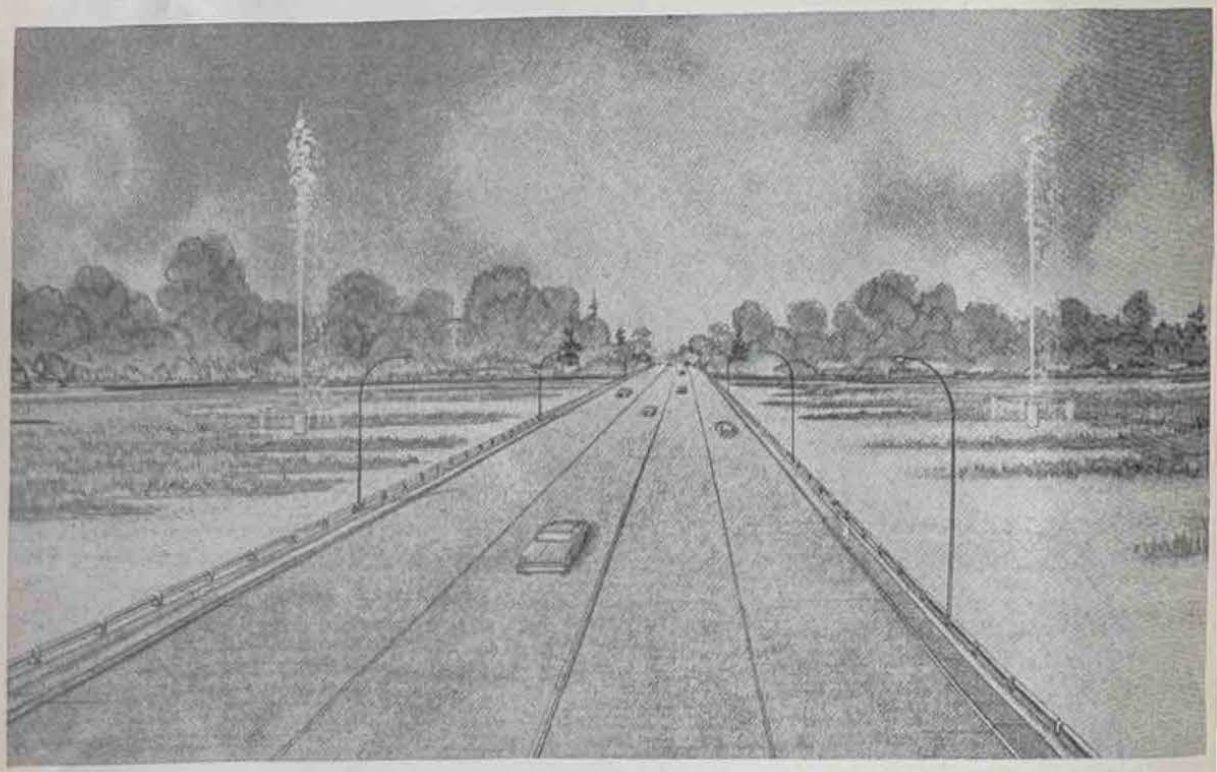
Solution to the shortage of middle-income housing in San Francisco lies in the condominium, or separate ownership of an individual apartment, William H. Young of Meyer & Young Building Corp. told the San Francisco Planning and Urban Renewal Association last month.

Condominium gives the owner fee title to his apartment by grant deed and a porportionate interest in the land and public areas of the building. The individual mortgages and taxes on each apartment protects the owner from liability should his neighbor default.

Young took sharp issue with the claim that housing can be made available in San Francisco at $22 a month rent per room through the use of FHA-insured, cooperative housing.

"I would like to remind all of you we have a real property tax here. We have a stringent building code. We have a Fire Prevention Bureau. We have an extremely limited land supply," he said.

Using figures of his firm's last apartment project, Young said real property taxes would come to $7.83 per month per room. And on the basis of the conventional amortization table of 6½% for 20 years, gar-



PAIR OF IDENTICAL, ILLUMINATED FOUNTAINS

jetting water to height of 96 ft. have been approved for western (Foster Island) approach to second Lake Washington Floating Bridge. Architect Lloyd Lovegren of Jones, Lovegren, Helms & Jones proposed project to Washington State Highway Department, for which he is consultant on Arboretum and Montlake interchanges. Fountains will be sunk directly into lake some 200 ft. from bridge on precast, hollow concrete pilings. Only bright, white shafts of light will be employed in keeping with character of Foster Island setting and since shifting patterns might create traffic hazard. Wind control device will be introduced on fountains to eliminate possibility of another hazard.

age space would come to $2.69 per room per month; land to $5.60 per room per month; building to $12.68 per room per month; and utilities (including public areas) to $2.50 per room per month.

This figure does not cover such items as maintenance, a return on the investment to the landlord or the builder's profit.

He said San Francisco builders have learned that $150 to $160 is the going rate for four rooms for rent.

"If we cry to the city to give us the land or forgive our taxes or change the building code, we can do better, but only at the expense of other San Franciscans not enjoying the subsidy."

Under the condominium principal, San Francisco builders can produce 850 to 900 sq. ft. in a high-rise apartment or 1,500 sq. ft. in a garden type building for a cost of about $30,000. The monthy payment under an FHA-insured payment would be about $140.

"With condominium, which eliminates the need for a landlord's return on investment, which provides the tenant with the tax benefits of being an owner, which delivers the value appreciation and equity accumulation of a tenant owner, the San Francisco builders can and will do the job and we need only condominium to help us do it."

California court decisions cover copyrighted plans

Two recent U.S. District Court decisions in Southern California have again affirmed that copyrighted architectural drawings may not be legally duplicated by unauthorized builders and designers.

The findings for the plaintiff were based on two suits instituted by builder Ross Cortese against:

1. Phillip Kirst & John D. Roberts and Glendora Homes, Inc.
2. Tola Jack Bennington, Hal B. Smith and architect Jimmie N. Cartee.

Cortese charged that his copyrighted designs for Frematic Homes built at Rossmoor were being copied by the defendants to build homes in Glendora and Apple Valley, respectively, and asked that they be enjoined from copying his plans.

The court's decision not only enjoined the defendants from use of plans for construction purposes, but also ordered their destruction and further stated that copyrighted plans could not be reprinted without authorization of the owner.

Said Cortese, now building Rossmore Leisure World in Seal Beach, Calif., a revolutionary senior citizen project which, upon completion, will comprise 6,750 cooperative apartments and include medical care and drugs, short of hospitalization, in the monthly payments:

"We are highly gratified by the decision, for it clearly shows the law protects the creativity of builders and designers much the same way as it does the work of authors and inventors."

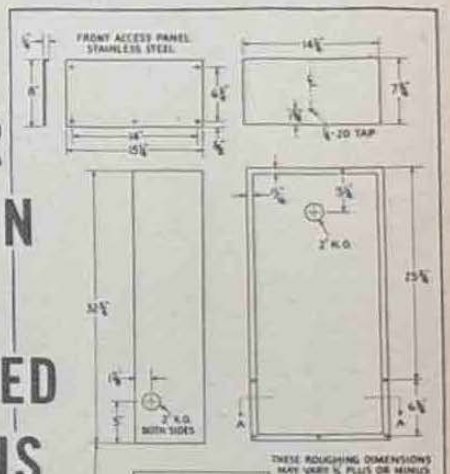
Cortese's attorney, Arthur S. Katz, added:

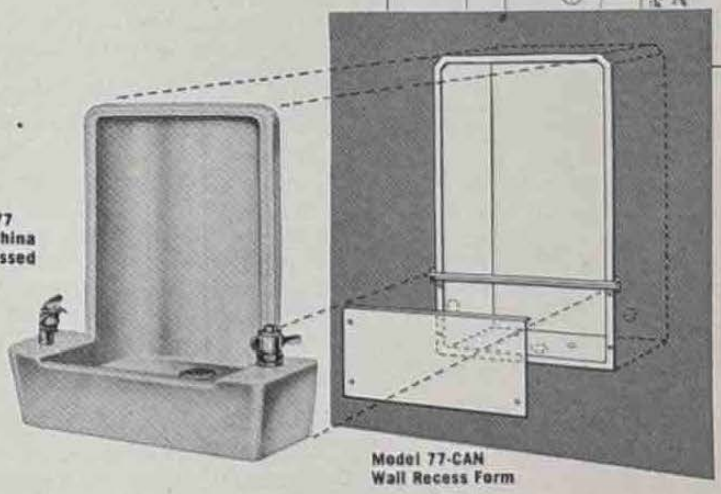
"While imitation may be subtle form of flattery, when applied to copyrighted architectural plans, it is but another form of unlawful use."

He noted that the court found for the plaintiff even though the defendants claimed that they did not copy from the original drawings but had conceived the plans from a visual inspection of Cortese's homes.

Significance of both cases, the lawyer added, was the application of the "doctrine of indirect copying," which, in effect, states that a copyright of architectural plans is violated when drawings made from a completed structure are substantially close to original drawings.

NOW...IT'S EASIER THAN EVER TO GAIN THE LUXURIOUS BEAUTY OF RECESSED DRINKING FOUNTAINS





Model 77
Vitreous China
Semi-Recessed

Model 77-CAN
Wall Recess Form

WALL RECESS METAL FORMS for Haws Fountains... provide the exact required opening, access panels, knock-out holes, etc., for simple, efficient, economical installation. Install HAWS special metal "CAN" form in the unfinished wall, and the recessed fountain fits snugly and securely. Write for detailed specs on all HAWS recessed models, with special metal forms. Write today.

See HAWS Catalog in Sweets Architectural File

HAWS DRINKING FAUCET COMPANY
1441 FOURTH STREET • BERKELEY 10, CALIFORNIA

new offices, partnerships

V. B. Hailozian has established an office for the practice of architecture at 2171 Shattuck Ave., Berkeley.

Bruce R. Sutherland has opened his own architectural office at 2727 W. Sixth Ave., Denver. A graduate of the University of Utah, he has 12 years' experience in school, church and residential design.

Rai Y. Okamoto, architect, has established an office at 300 Broadway, San Francisco.

H. Robert Hammill, structural engineer, has established an office at 420 Market St., San Francisco.

Alfred M. Fisher and Robert B. Metcalf have formed an architectural partnership at 3415 Fulton Ave., Sacramento.

firm changes

The Los Angeles architectural-engineering firm of Flewelling & Moody has become Flewelling, Moody & Horn, with the addition of two new members. New vice presidents and directors are Aubrey Horn, architect and civil engineer, and Ralph H. Flewelling, architect. Other principals are Ralph C. Flewelling, president, and Walter L. Moody, vice president.

The Portland architectural firm of Shell & Hoyt has been dissolved and the partners have returned to separate practices. Frank Shell is located at 4725 S.W. Canterbury Lane, Portland, and Charles Hoyt at 515 Fifth St., Oswego, Ore.

Charles A. Peterson has moved from Honolulu to Palo Alto, Calif., to become a partner in the firm of Johnson, Hawley & Peterson, architects.

deaths

Everett architect F. Edward Brown died August 24 following a short illness. He was an associate partner in the firm Harry E. Botesch & F. Edward Brown. Born in 1903, he came to Everett 13 years ago, where he participated in planning the new Cascade High School.

honors

Two West Coast architects—H. H. Waechter of Creswell, Ore., and Fred S. Hassouna of Pasadena—have been elected to fellowships in the International Institute of Arts and Letters, Geneva, Switzerland. Other architects included Michigan's late Eero Saarinen.

The $150 top award in a contest for ideas to improve Seattle's Fourth Avenue "gateway" has been won by Richard S. Alden and Robert J. Patton, architects in the office of Kirk, Wallace, McKinley & Associates.

Spokane Chapter, AIA, made an error in announcing its recent Honor Awards program (PA&B, Aug. '61). Presentation of an Award of Merit for the Unitarian Church to McClure & Adkison, architects, should have included the name of Moritz Kundig, associate architect.

Californians cop $10,000 prize

Top prize of $10,000 in the third annual architects' competition sponsored by the Mastic Tile Division of The Ruberoid Co. has gone to three Californians: Victor A. Cusack and Ronald Meza, associated with the firm of Charles Luckman Associates, Los Angeles, and James S. Moore, with Medical Planning Associates, Beverly Hills.

Two other California architects—Marvin Berman and Stanley S. Kogan of Berman & Kogan, Los Angeles—were named co-winners of a $500 merit award.

Theme of the competition concerned long-range planning of community medical care facilities. The jury, which included Pasadena architect Donald S. Neptune, said of the Cusack-Meza-Moore entry: "It is a well-conceived and well-balanced plan for hospital operation and economy of construction, relating well to present services and those to be added in the future, and expressing the suburban quality called for." Site utilization for the main part of the building is excellent, as is the placement of staff housing facilities across the stream. Its concept of a central vertical circulation serving the nursing units in three directions is sound, according to the judges.



HOSPITAL PLAN earns $10,000 for Californians.

new associates

Van Bourg, Nakamura & Associates, Berkeley, architects, have appointed John Collier and Michio Katsura as associates.

new addresses

James J. Chiarelli, architect, to 545 Washington Bldg., Seattle.

George R. Wiseman, architect, to 4701 Hampden Road, Corona del Mar, Calif.

A. G. Jan Ruhtenberg, architect, to 19 E. Platte Ave., Colorado Springs, Colo.

Don Slade, architect, to 12366 Wilshire Blvd., Los Angeles.

James W. Keefe, architect, to 3043 Royal Ave., Eugene.

William Allen, architect, to 315 S. Beverly Drive, Beverly Hills, Calif.

Francis L. Whisler, architect, to 426 Pacific Ave., San Francisco.

Seymour M. Slater, architect, to 5650 E. Evans Ave., Denver.

William Ficker, architect, to 446 N. Newport Blvd., Newport Beach, Calif.

Dean Blake Chambliss, architect, to 101 Mesa Ave., Grand Junction, Colo.

George De Masirevich, architect, to 11768 Chenault, Los Angeles.

Robert W. Ditzen, architect, to 2977 Peak Ave., Boulder, Colo.

Charles Wendell Lovett, architect, to 734 S.W. Taylor, Portland.

Hyman Rosenthal, structural engineer, to Room 215, 112 Market St., San Francisco.

elections, appointments

Idaho Chapter, AIA, has named these officers, all from Boise: H. Curtis Finch, president; Rodney Grider, vice president; Charles F. Hummel, secretary-treasurer.

Puget Sound Chapter, Construction Specifications Institute, has elected Walter F. Bishop of Public Buildings Service, GSA, as president. Serving with him are Clarence H. Irwin, architect, first vice president; John D. Finnegan, architect, second vice president; Owen E. Strecker, PBS Supply Co., secretary; Harold Keeney Jr., architect, treasurer.

Washington Society of Landscape Architects has picked Robert M. Blanchard of Olympia as president. Other officers, all Seattleites, are Cash M. Beardsley, vice president; William E. Talley Jr., secretary; Harold Strand, treasurer.

Los Angeles architect Charles Luckman, president of Charles Luckman Associates, has been appointed to President Kennedy's Citizens' Committee for International Development.

Montana architect Frank B. Shanley has been elected president of the newly formed Great Falls City Planning Board. He also headed the City-County Planning Board until the group was declared unconstitutional by the State Supreme Court.

James V. Bonomo has been named supervisor of drafting room production for the Los Angeles architectural firm of Leach, Cleveland & Associates. He formerly was project manager for Daniel, Mann, Johnson & Mendenhall, architects-engineers.

Frits H. Fenger has been elected a director and vice president for engineering for Law & Wilson, Honolulu architectural-engineering firm.

Calvin C. Straub, a faculty member of the School of Architecture, University of Southern California, for the past fifteen years, has been named professor of architecture at Arizona State University.

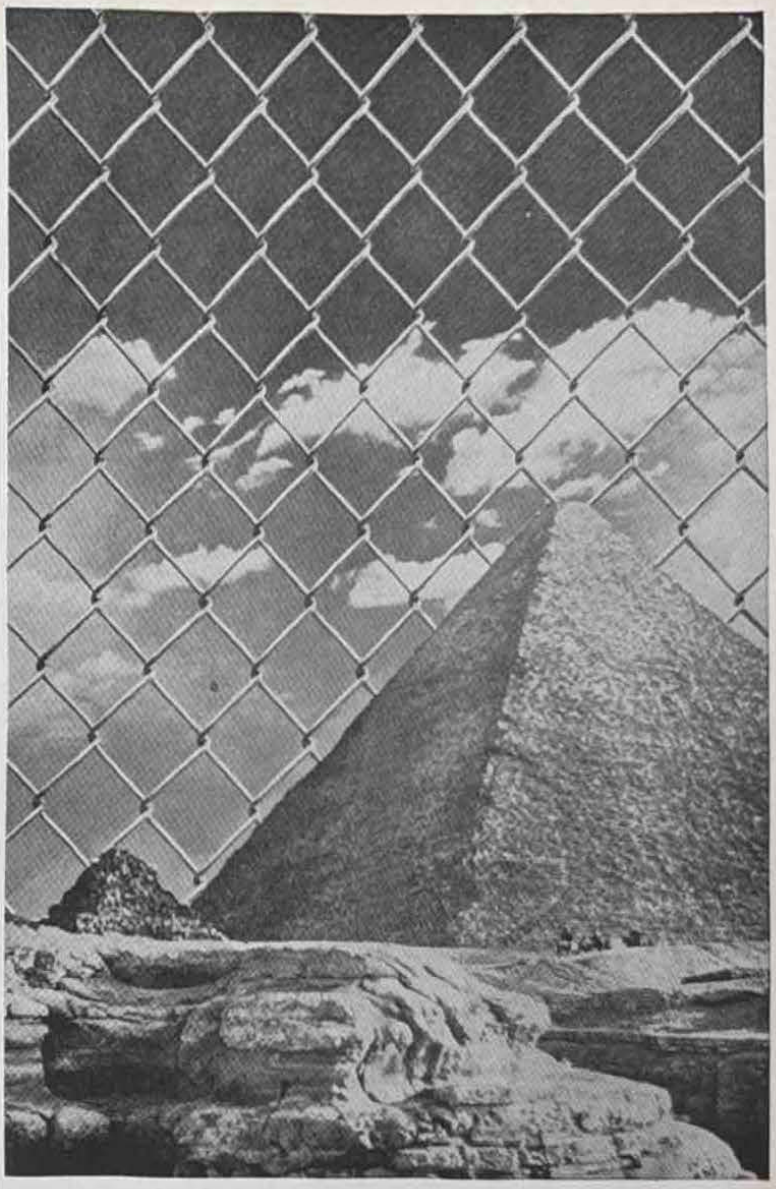
Ibsen Nelsen, architect, has been appointed to the Seattle Art Commission which was enlarged recently to include advocates of the preservation of historical buildings and places.

Architect Joseph F. Thomas has been elected to a two-year term as chairman of the Pasadena Planning Commission.

Robert W. Beatty has joined R. W. Beck & Associates, Seattle analytical-consulting engineers, as senior architect. He previously had maintained his own architectural office in Seattle for the past six years.

William W. Wurster, dean of the School of Architecture, University of California, has been named architectural adviser for a competition to design a new governor's mansion for the state of California. He will be assisted by Daniel J. Nacht, Sacramento architect.

Consulting Engineers Association of Washington has retained a Portland public relations counsel: Pacific National Public Relations.



Realock Fence is built to last a long time, too!

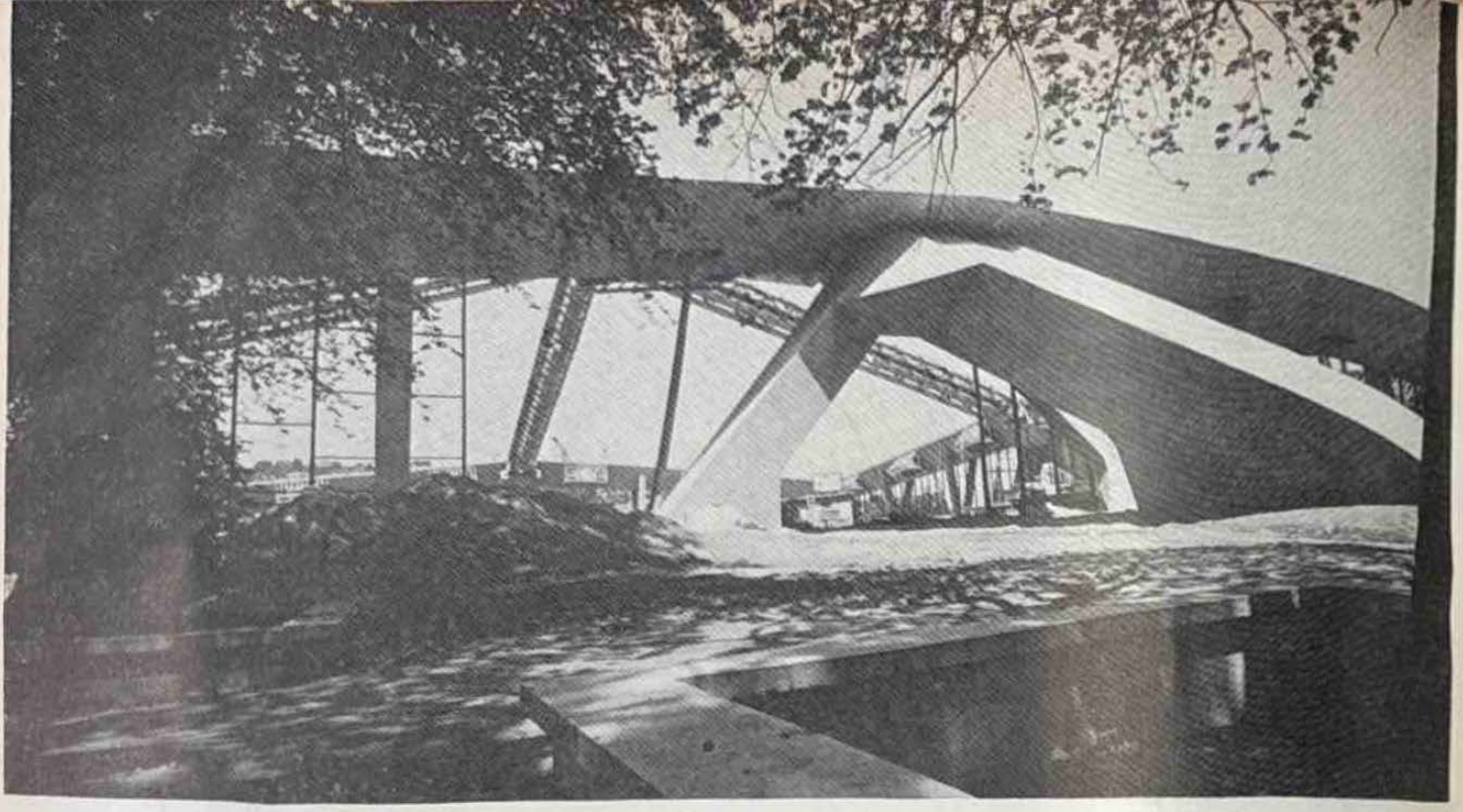
Made of top grade steel wire, Realock Fence is strong and durable . . . and is heavily galvanized to resist corrosive elements.

Available in a wide variety of styles, Realock Fence is ideal for protection of buildings, grounds and equipment . . . and is widely used in right of way installations where limited access is essential. For a free estimate, call the nearest CF&I office.

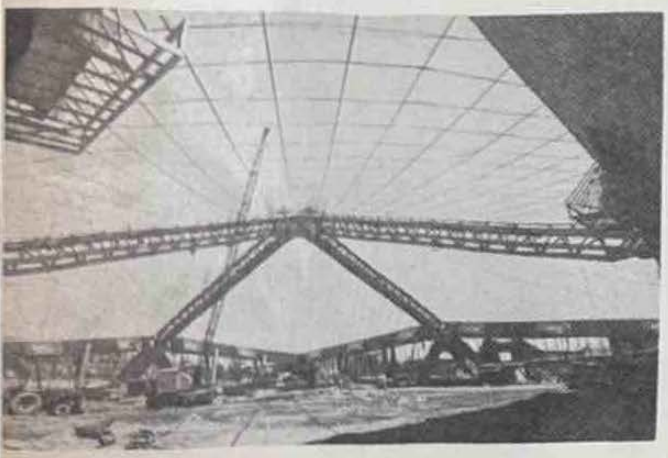


Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

THE COLORADO FUEL AND IRON CORPORATION



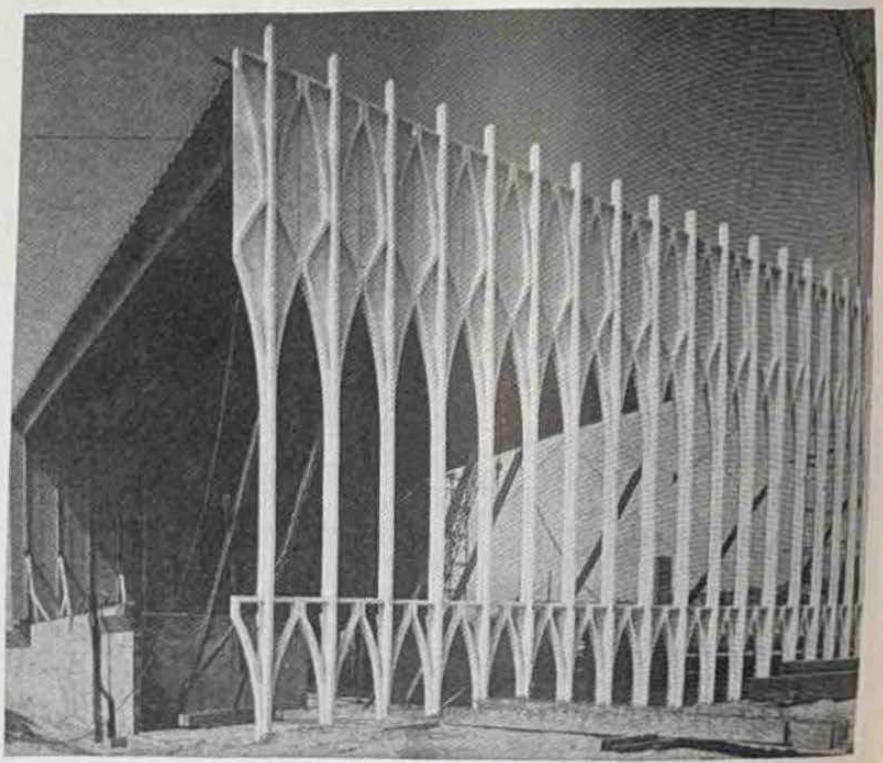
CENTURY 21 COLISEUM • Paul Thiry, architect; Peter H. Hostmark & Associates, structural engineers; Howard S. Wright Construction Co., general contractor.



Progress report No. 1: Seattle World's Fair

Forde photos





FEDERAL SCIENCE PAVILION • Minoru Yamasaki & Associates—Naramore, Bain, Brady & Johanson, associated architects-engineers; Worthington, Skilling, Helle & Jackson, structural engineers; Purvis Construction Co., general contractor.

Highly appropriate are these designs and materials and methods of tomorrow in construction today at Seattle's Century 21 World's Fair. Here is the first of a series of exciting progress previews:

CENTURY 21 COLISEUM • Monolithic perimeter of one of the world's largest clear-span buildings anchors miles of steel cables which will support 1,000 aluminum panels to be clipped on to form a roof surface.

FEDERAL SCIENCE PAVILION • One of six similar gleaming white precast, prestressed concrete structures reaching to the skies in a vast complex.

EXHIBIT BUILDINGS NO. 1, 2, 3 • Umbrellas turned inside out are extremely thin-shell concrete hyperbolic paraboloids supported by central columns and grouped seemingly by the dozen in one exciting structure.

EXHIBIT BUILDING NO. 55 • Prebuilding, precasting are evident throughout the grounds. Here precast concrete columns support prebuilt steel joists and girders. Fascia above and bulkheads below will be of precast masonry. Space Needle has reached nearly half of its height in an unusual view through the roof framing of Building 55.

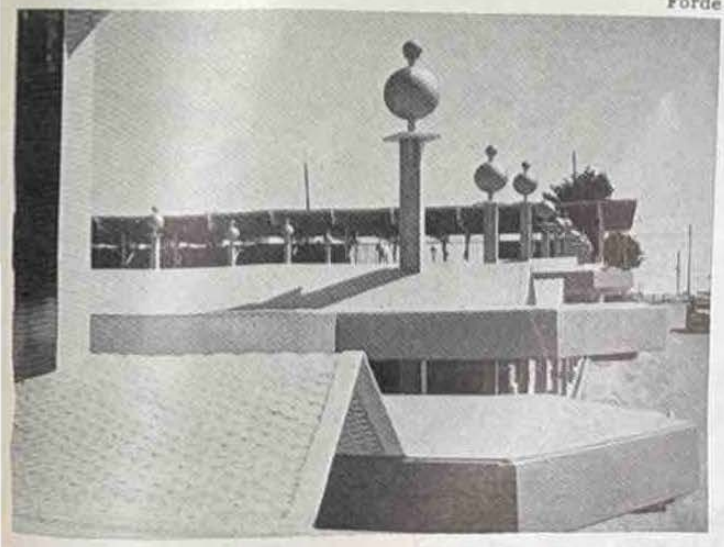
BOULEVARDS OF THE WORLD • Bazaar-like atmosphere reminiscent of foreign lands provided in minimum shelter buildings of steel columns, stressed-skin plywood panel clear-span roof sections finished with sprayed pigmented plastic.

EXHIBIT BUILDING NO. 37 • A splash of color in coordinated panels is disciplined by a solid roof structure of glued laminated beams. Colored plastic skylight domes (not visible in the picture) carry colors to the interior as well.

PA&B staff photos (except as noted)



Forde



BOULEVARDS OF THE WORLD • Naramore, Bain, Brady & Johanson, architects-engineers; Collins-Hunt Construction Co., general contractor.

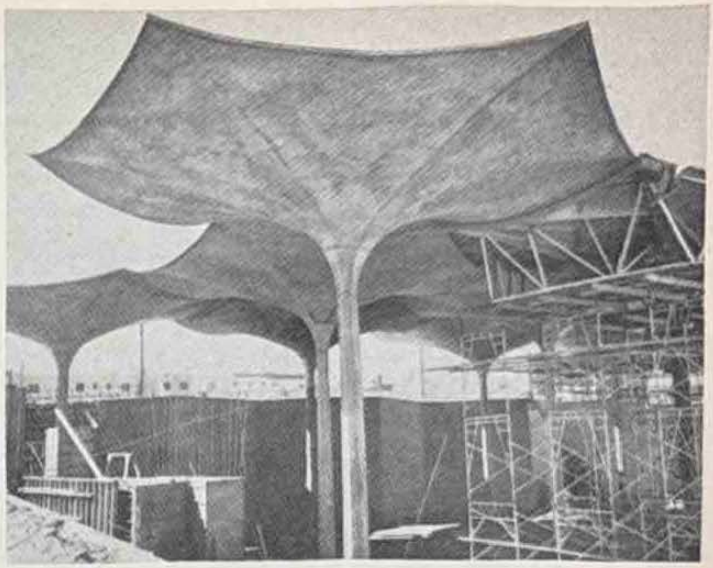
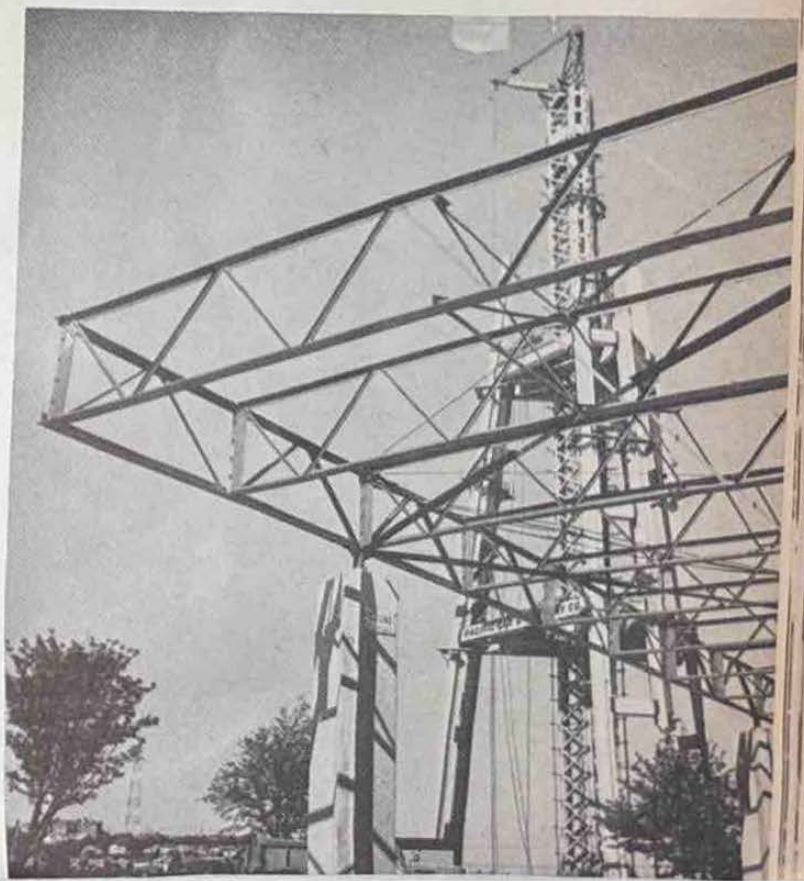


EXHIBIT BUILDINGS NO. 1, 2, 3 • Walker & McGough, architects; Worthington, Skilling, Helle & Jackson, structural engineers; Sound Construction Co., general contractor.



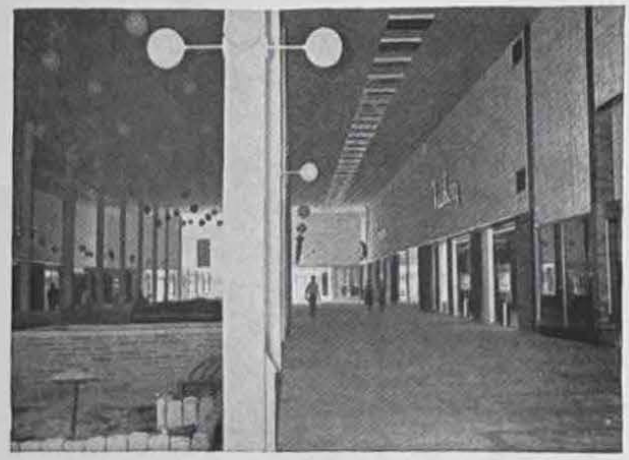
EXHIBIT BUILDING NO. 37 • Robert B. Price, architect; Horace J. Whitacre & Associates, structural engineers; Sellen Construction Co., Inc., general contractor.

EXHIBIT BUILDING NO. 55 • Waldron & Dietz, architects; Olsen & Ratti, structural engineers; Sellen Construction Co., Inc., general contractor.





TWO STORIES OF INTERLOCKED STEEL frame the 320′ wide, 25′ high, middle section which houses two department stores. Standardized, interlocking girders and purlins required no bolting, riveting or field welding — reduced engineering, fabrication and construction costs — advanced completion and occupancy dates.



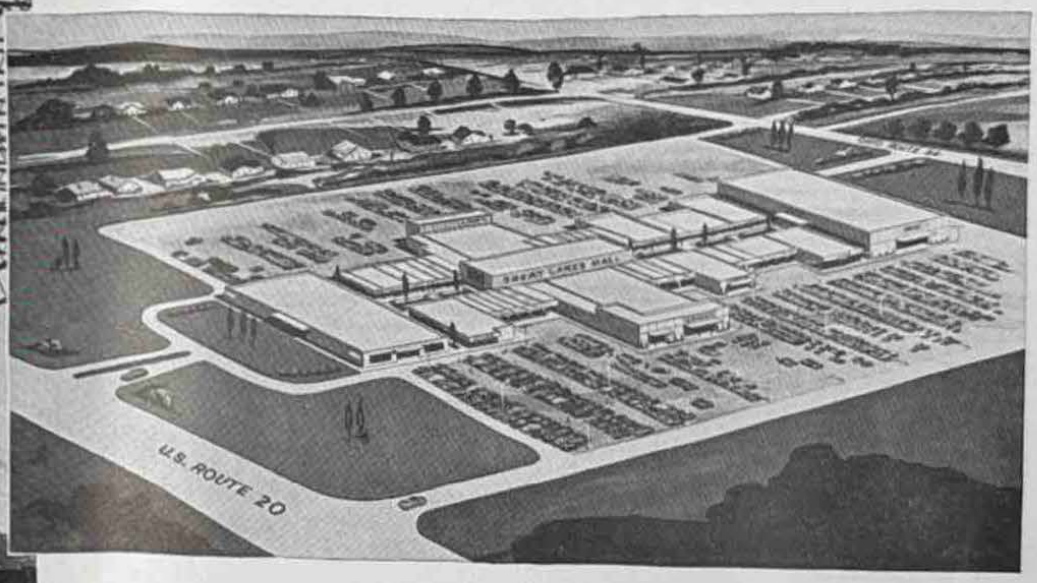
COMPLETELY FIRE-RESISTANT CONSTRUCTION. Masonry fire wall partitions rise unhampered through MACOMBER METAL DECK roof via double framing at roof line. V-LOK columns were embedded in walls. Open web purlins and girders made sprinkler installation easy.



870 FOOT LANDSCAPED CENTRAL CONCOURSE boasts bench- and rest areas. Two-story, 25′ ceiling height, enclosed featuring arcade-type display windows — is focal point o Canopied retail units surround area.

1300 tons of high-strength MACOMBER **V-LOK** frame 350,000 sq. ft. Great Lakes Mall at Mentor, Ohio





The Edward J. DeBartolo Co. of Youngstown, Ohio — designers and builders — specified Macomber V-LOK in planning their latest of over 70 shopping centers. Previous and extensive experience with Macomber V-LOK — its speed, rigidity, and economy — was so much to their satisfaction that no other methods were considered.

When fully completed, the project will comprise 50 units on 14 acre tract. Paved parking for 5,000 cars will be provided.

V-LOK is ideal for shopping centers, industrial buildings, schools, warehouses. Write today for your comprehensive MACOMBER V-LOK MANUAL.



MACOMBER
CANTON 1, OHIO

ALLSPANS • V-LOK • V-PURLINS
BOWSTRING TRUSSES • ROOF DECK • STRUCTURAL STEEL

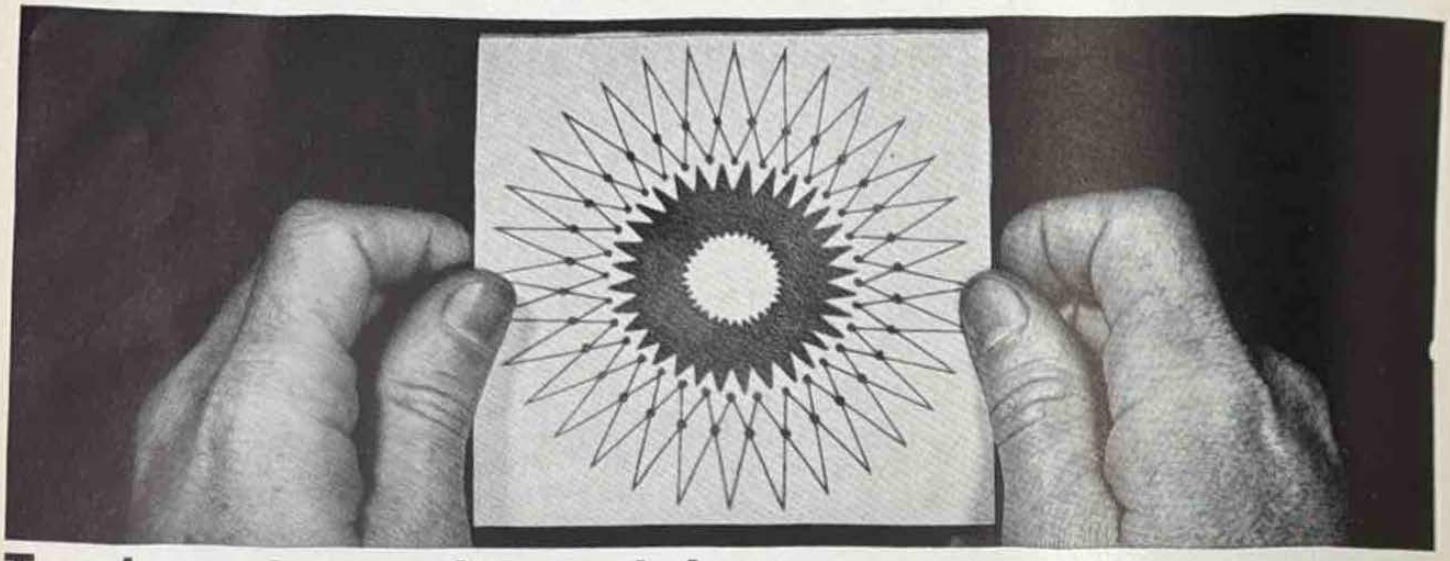
Find Your Local MACOMBER Representative in the Yellow Pages

SEE OUR CATALOG IN SWEET'S OR WRITE FOR COPY

PAB-6110

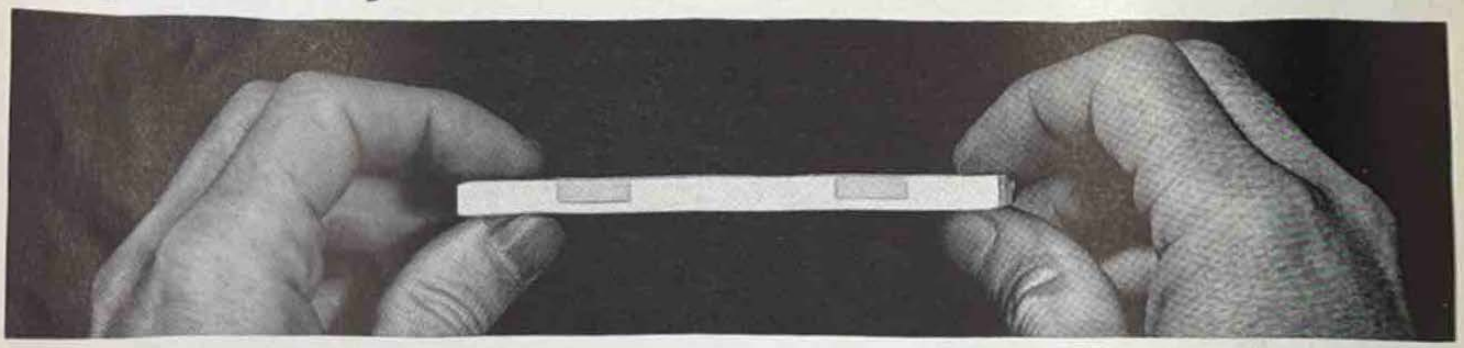
Fine as ever on the front...

Clearest everlasting colors, best designs
(This one: **Sun Circle**)



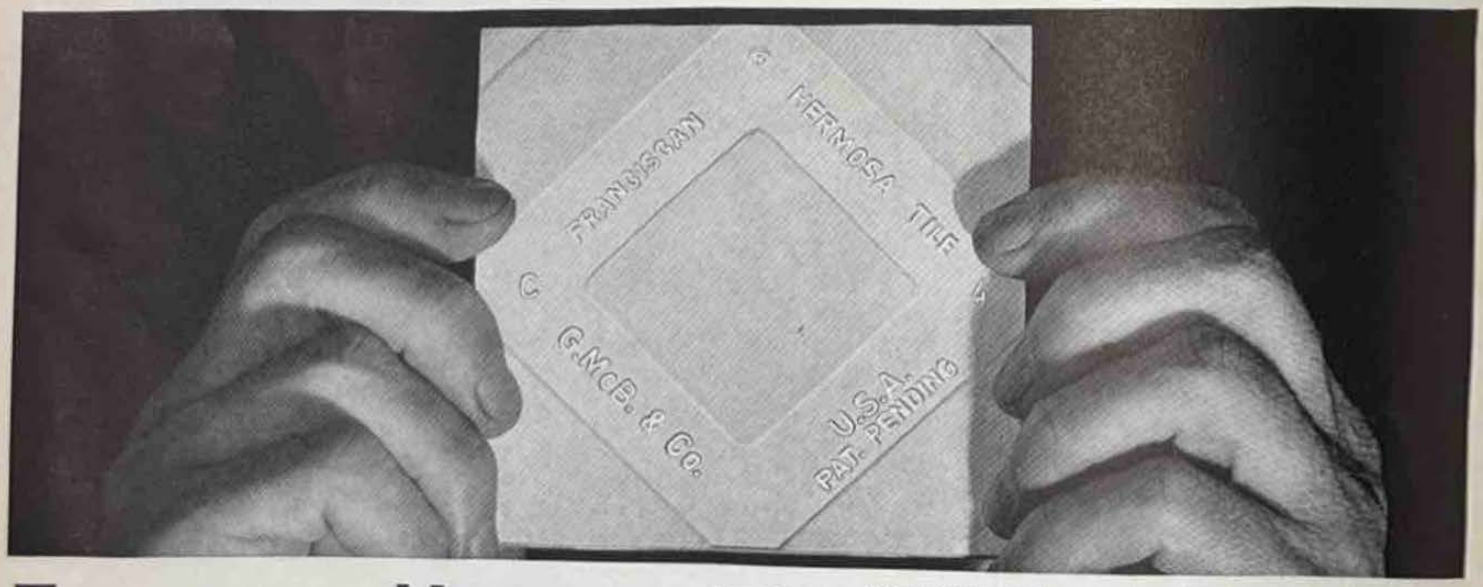
Tough as always thru and thru...

Rugged strength for long-lasting beauty



THE NEWS IS ON THE BACK

This new name will appear on the finest glazed ceramic tile from now on.
And because you deal in the finest, you will be seeing the name often.

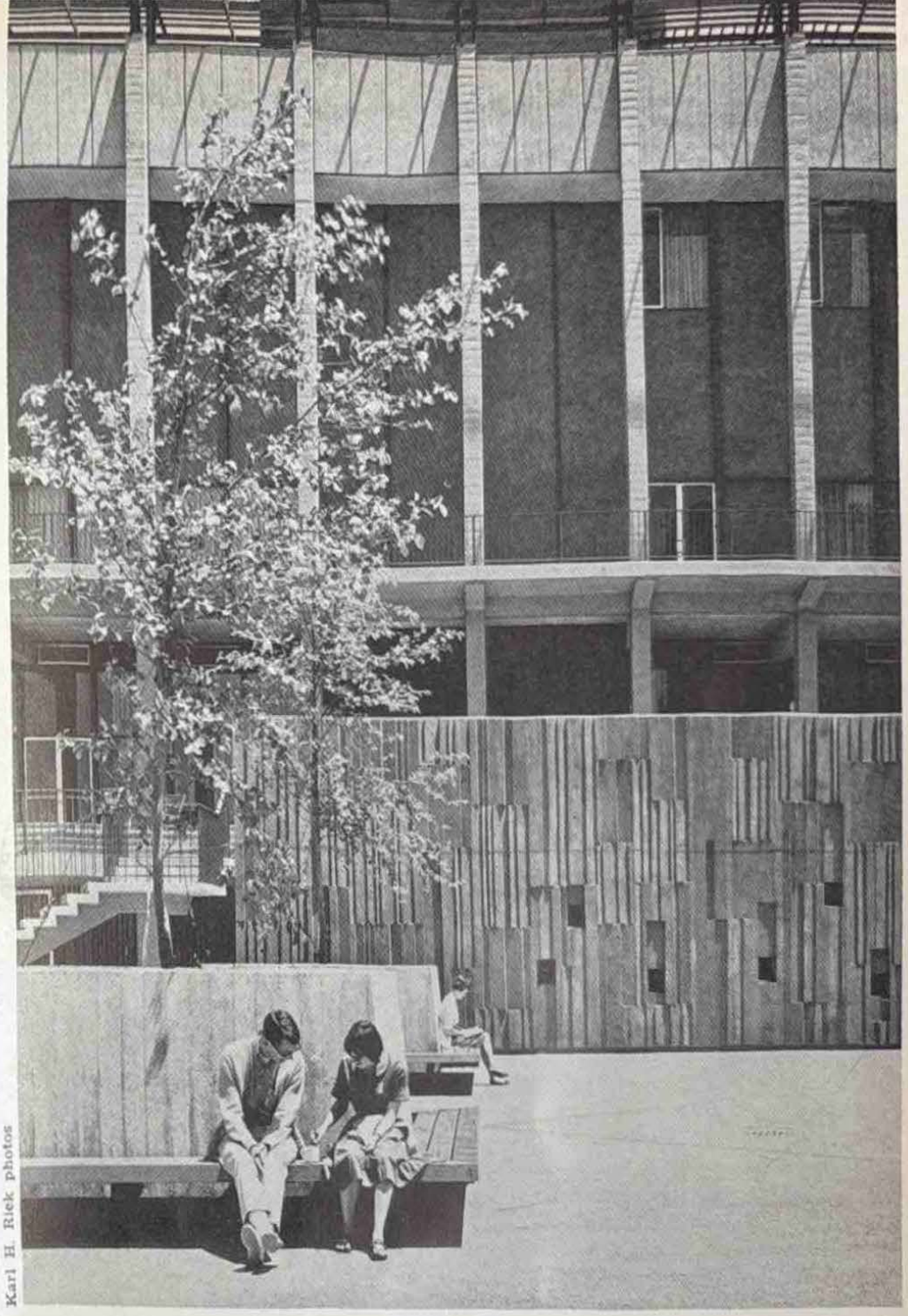


Franciscan Hermosa Tile

(formerly Hermosa Tile)

ARCHITECTURAL PRODUCTS DIVISION
GLADDING, McBEAN & CO.*
SALES OFFICES: LOS ANGELES • SAN FRANCISCO • PORTLAND
SPOKANE • SEATTLE • PHOENIX • SALT LAKE CITY

*You know them—they make Ceramic Veneer, Solar Screen, Ceramic Mosaics, Roof Tile, Lincoln Glazed Brick, Quarry Tile, Contour CV...and Franciscan Hermosa Tile.



Karl H. Riek photos

California's celebrated campus center

Even before it left the drawing boards, the scheme for the long-contemplated Student Center of one of America's great universities was destined to become a widely publicized project; it assumed added significance when it was made the subject of an invitational competition among six California firms, all of considerable stature. In noting its unanimous decision, the jury declared "the outstanding result produced may well be a milestone in the design of a collegiate structure." Now the first two units—Union and Dining Commons—of what will eventually be a four-unit, $10 million complex are in operation. The overall plan which makes the most of Berkeley's sunshine in its delightful indoor-outdoor relationships, the extraordinary dining facilities and other social amenities the initial phase provides have won the admiration of the students on the one hand; a certain lack of restraint and discipline in the buildings themselves is bound to raise some questions in the eyes of professional observers on the other. Several of those questions are explored on the following pages.

Student Center
Union and Dining Commons
University of California
Berkeley, California

HARDISON & DeMARS
Architects

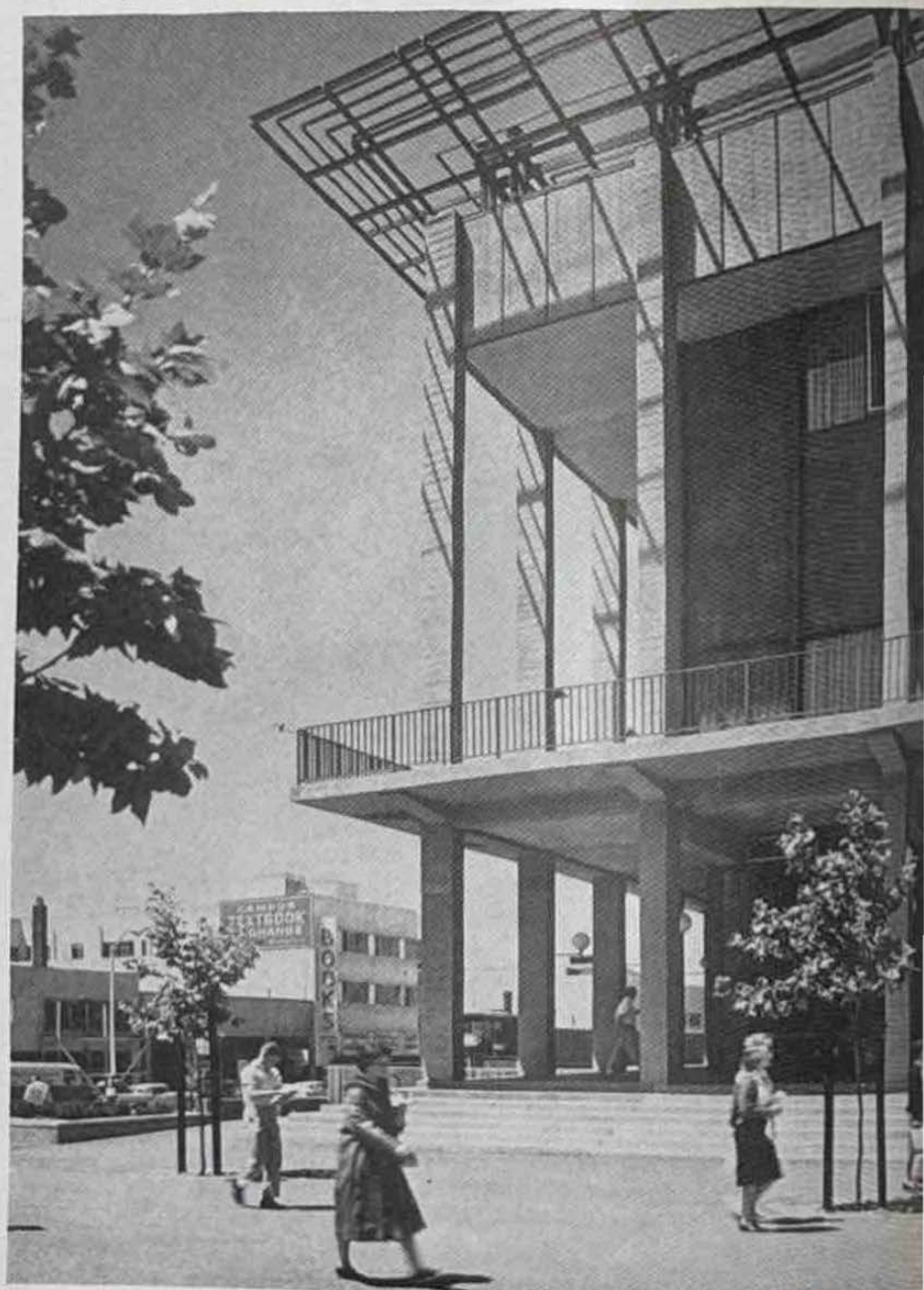
PREGNOFF & MATHEU
Structural Engineers

M & K CORP.
General Contractor



UNION BUILDING uses reinforced concrete for two lower levels, fireproofed steel frame and concrete for upper levels.

ORANGE-RED TRELLIS atop Union is recognition of character of Berkeley itself with its distinguished history of architecture from Maybeck to present day. While wood trellises were introduced on dining terrace, steel was considered more appropriate in relation to height and scale of Union. When vines have grown to maturity, architects believe gracefully valid design feature will result, creating feeling similar to that of Christian Science Church.

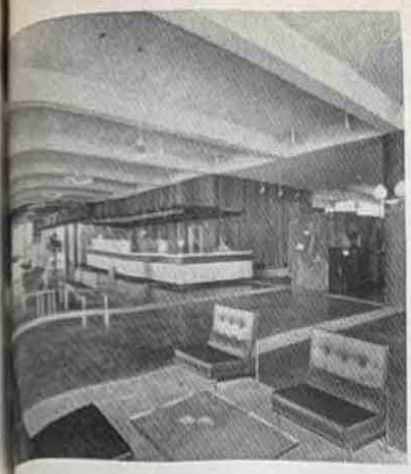


OBSERVATIONS of most buildings, the architects point out, rather prophetically perhaps, do not always suggest the fundamental considerations of a solution.

In the design program here, the Student Center was defined as an educational, social, cultural, recreational, service and public relations complex that should provide maximum flexibility of space and accommodations, contributing to the pleasure and richness of the students' university experience. "Architecturally, both in scale and atmosphere, the center should be a harmonious part of the university campus and the Berkeley community as well."

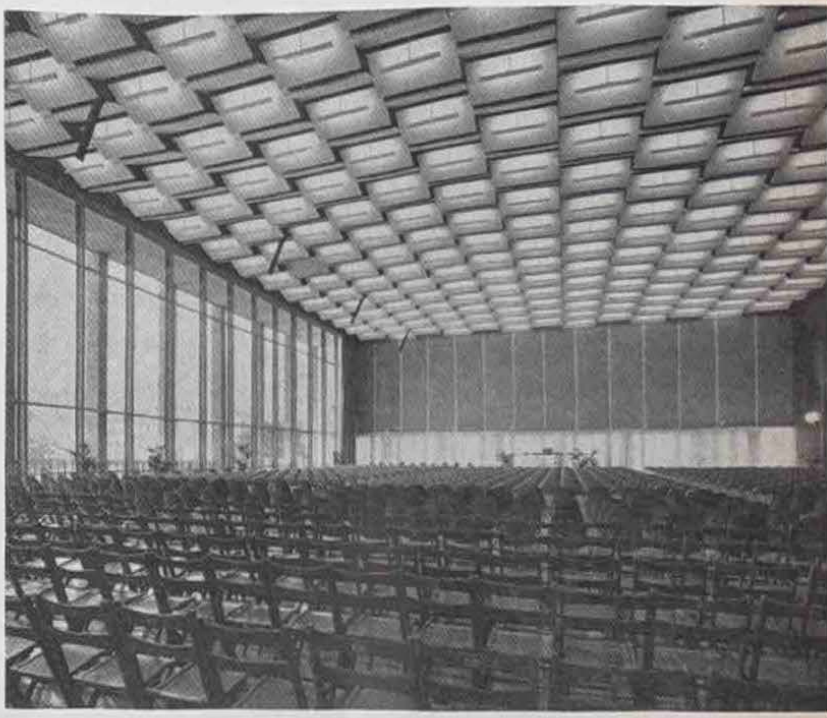
Translated into actual buildings, this was a herculean task, for the architects had to house multifarious facilities for a pedestrian community of more than 20,000 (expected to reach 25,000 in a few years), while keeping the desired open space around the structures. They found their solution in grouping four main units around a central landscaped plaza (sketch on p. 26). It is in the site planning and arrangement of the buildings that the center undoubtedly is at its best.

The Union and Dining Commons might be thought of basically as two separate wings above ground, with the lower levels combined as one structure. Docking, utility and storage facilities serve both units at the basement level. A 125-car parking



MAIN LOBBY looking toward information center under wooden trellis. There are no identical rooms in Union or Dining Commons. In recognition of this individuality, all light fixtures (lobby itself has half-dozen different types) and furnishings were designed and selected in considerable variety.

BALLROOM CEILING has overall pattern of rectangular perforated panels pitched to permit free circulation of air. One-half reflect light from cantilevered tube source. Many panels are hinged to permit opening of catwalks above for use of spotlights or screen and microphone drops.



garage also will be constructed under the plaza.

The philosophy behind the plan of the Union is explained this way by the architects: "It has been conceived as a student club: an urban club, to be sure, friendly and informal in some of its parts, dignified and formal when occasion demands. The size of the 'club membership' does not lend to coziness or intimacy in design but has allowed, however, a multitude of varying facilities and treatments. In fact, it was this richness of different activities in the building, with their resulting shapes and spaces, that led us to enclose the whole in a rather calm, symmetrical, even formal shell. The colonnade on all sides gives a sense of shelter and provides the necessary unifying motif. The trellis crown is in a sense a homage to the late Bernard Maybeck, first architect of the university. It is hoped that the Union building will be worthy of his memory."

Entering the Union from the street level, students find themselves in a large lobby with access to the lounge and a grand staircase leading to the ballroom floor above. Overlooking the central plaza through a wall of glass, the lounge spans almost the entire length of the building to afford ample room for relaxation, conversation, bridge, chess, reading and writing. A huge hooded fireplace near the center of the Union extends deeply into the lounge itself, making for greater intimacy and creating the impression of two large rooms rather than one. Doors on the west side



EACH BUILDING because of diverse function has character of its own and each is more successful in itself than in its relationship to one another.



SEVERAL HARMONIZING ELEMENTS *have been introduced in attempt to unify totally different Union and Dining Commons. Union's trellis appears in redwood on dining terrace (photo across page) where it is planned to some day carry gnarled wisteria along its full length. Shell forms are repeated in Union where they shelter Tilden Mediation Room in secluded roof garden.*

STUDENT CENTER: UNION AND DINING COMMONS

of the lounge open to a broad terrace (one of three), from which stairs lead down to the plaza and an approach to the Bear's Lair or coffee shop. The latter, lending itself to a collegiate decor, seats about 300 persons inside and on the terrace. With service administered from the cafeteria, the Lair features hamburgers and milkshakes.

From a design standpoint, the center seems to be the weakest in the handling of the Union interiors. While there is considerable merit in the concept of "creating as many interesting and appropriate spaces as the program required," the architects, in consultation with the interior designer, seem to have gone overboard in the selection of textures, fixtures and furnishings. And the ballroom stairway, commanding the important position that it does, fails to fulfill its promise.

The ballroom itself, on the other hand, emerges as one of the Union's strong elements. This flexible facility, with its handsome—and functional—ceiling, allows the "grand" social occasion to return to the campus. Entire north wall is of glass, permitting a view of Sather Gate, the campanile, campus buildings and the hills beyond; the west wall affords views of the central plaza. The space can be converted into a banquet hall or a flat-floor auditorium or can be divided into two rooms for events taking place simultaneously. A projection booth allows the showing of films and slides.

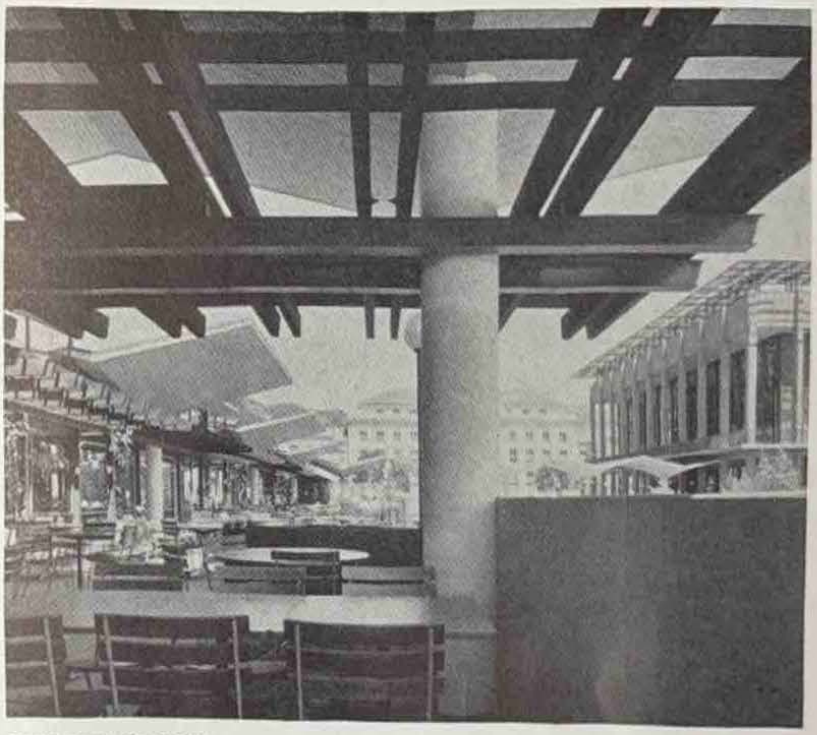
Two large meeting rooms are located up another flight of stairs. These can be subdivided into as many as eight rooms for student organization meetings, informal seminars and the like. Also found in the Union: 16 bowling alleys, a barbershop, a bookstore and "quiet" rooms equipped with cots for the study weary, with adjacent dressing rooms and showers.

A covered walkway joins the Union to the Dining Commons, whose concrete shells on slender columns suggest a rather playful structure where all the dining areas have

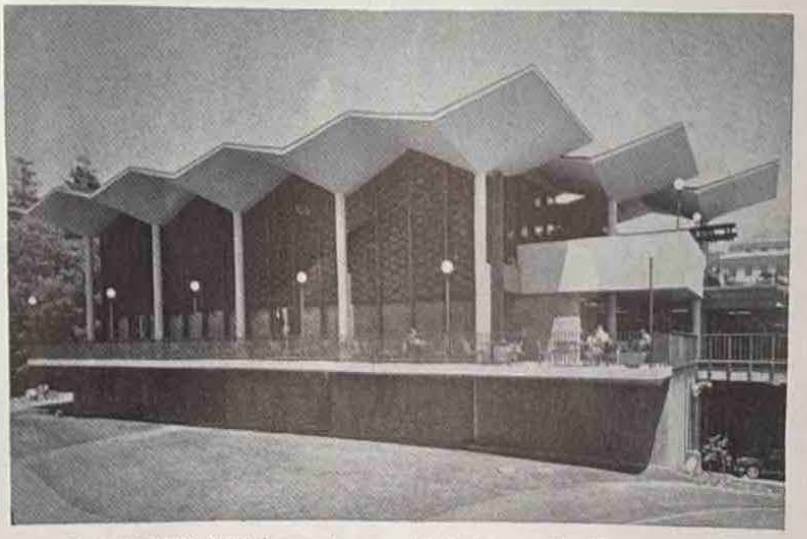
attractive outlooks and terraces, making the most of the sylvan glen to the north. The main dining room and terrace have a view in three directions; the second floor supplementary dining room overlooks the plaza. A small room seating 125 serves those who want quieter service or who are "entertaining."

A highlight of the entire complex is an abstract relief frieze (cover photo) executed by Emmy Lou Packard to form one side of the concrete railing of the cafeteria terrace facing the plaza. Forms were made in the artist's studio, then brought to the jobsite and poured in place monolithically with the other concrete.

In summing up their efforts, the architects say: "We hope that the total concept of shapes and masses, varying from the extreme lightness of the cafeteria roof to the massiveness of the auditorium, will provide an interest and warmth in material



COMPLEXITY OF FORMS, materials and textures is especially disturbing from some vantage points, as seen here from cafeteria terrace. Walkway's connection to Union also is awkward.

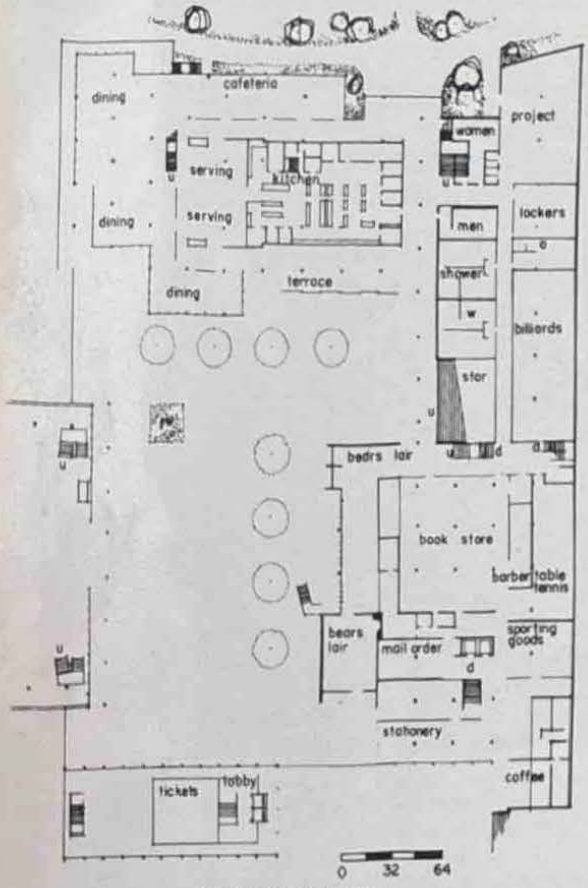


CAFETERIA'S WESTERLY WALL is concrete screen intended to provide effective sun control and to direct interest to creek on north—"a delightful remnant of woodland," as one observer put it.

STUDENT CENTER: UNION AND DINING COMMONS



DINING COMMONS, which seats 800 and additional 1,000 on various enclosed, sheltered or outdoor terraces, enjoys view of Strawberry Creek on north and plaza on south. Also included are private dining rooms and small restaurant open to public.



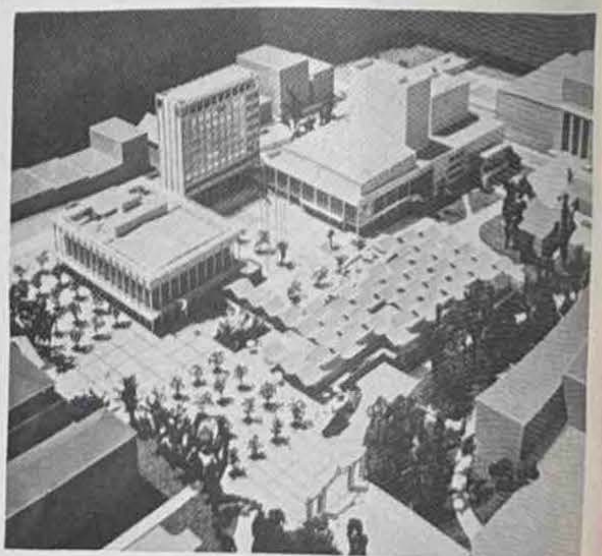
SECOND LEVEL PLAZA

and form which will create an inspiring background for the student activities of a great university.

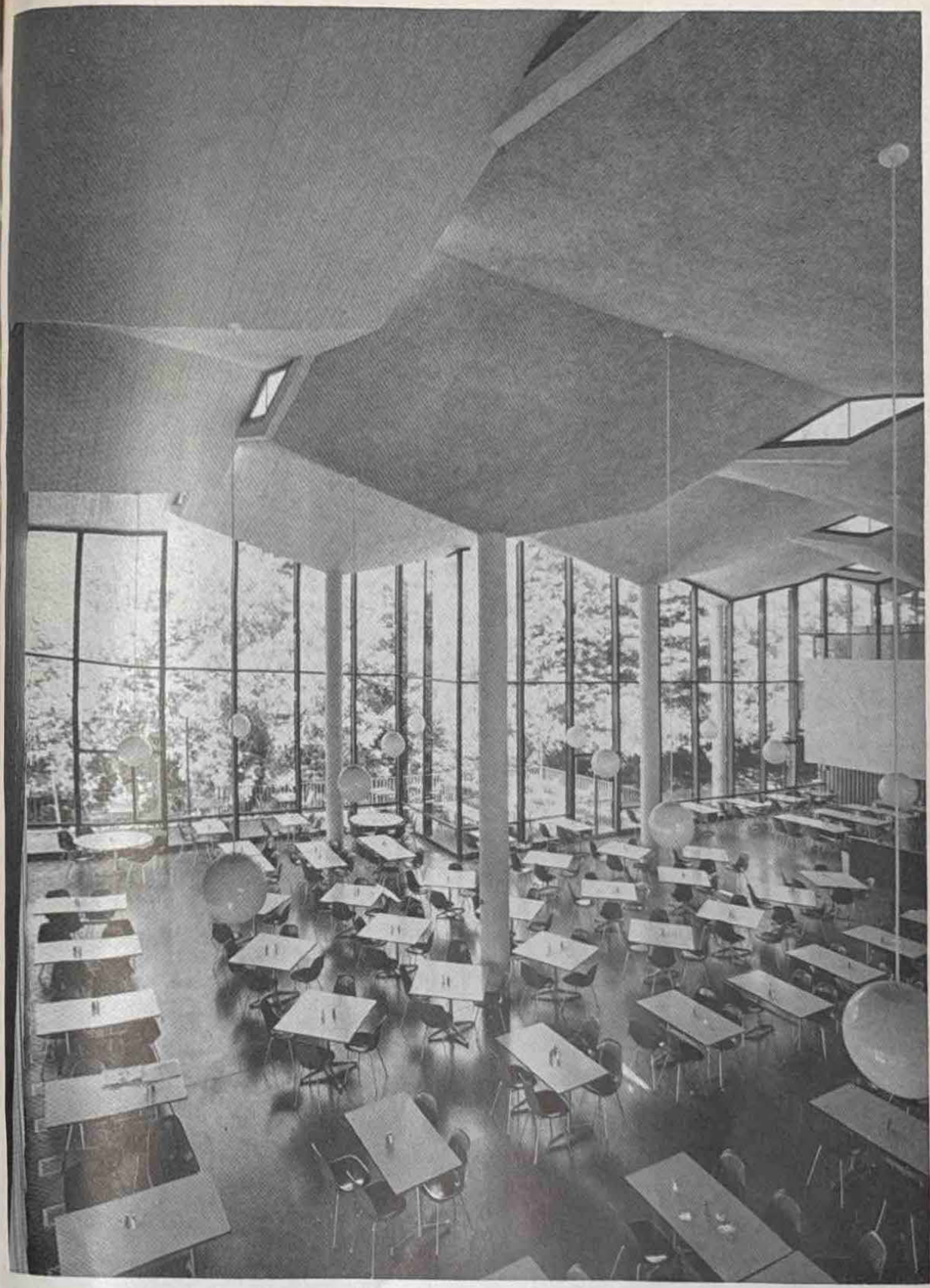
"It is the students themselves who will give the whole thing life and color. At the scores of tables in the sunshine in the square, having lunch or a quick coffee, lounging, studying or just drowsing in the sun, the students will make it their place and the buildings were planned to make them welcome."

Additional credits: Lawrence Halprin, landscape architect; Vandament & Darmsted, mechanical-electrical engineers; Maurice Sands, interior design; Dr. Vern O. Knudsen, acoustical design; Fred Schmid, food services.

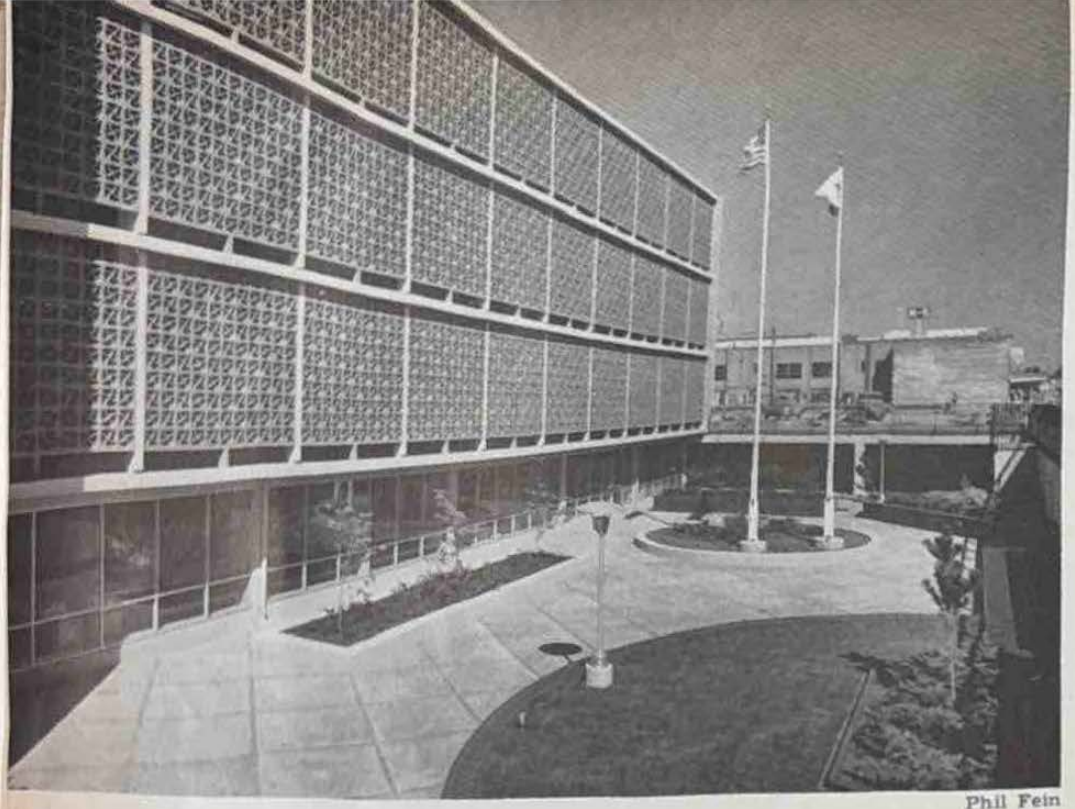
Ed. note: PA&B gratefully acknowledges that it has borrowed heavily from the California Monthly, alumni publication, whose January 1958 edition was devoted to a comprehensive analysis of the concept of the Student Center.



STUDENT CENTER'S FOUR UNITS, clockwise from lower right, are completed Dining Commons and Union, proposed Office Building (editorial offices of daily and yearbook and administrative offices of Associated Students) and Theater-Auditorium (large hall for 2,000, little theater for 500 and TV-radio training studios). Paved plaza and surrounding terraces that overlook it will be meeting place for rallies, festivals, etc., and later will be enhanced by fountains, sculpture and other art works of appropriate symbolic interest.



INTRICATE CAFETERIA ROOF seems unduly complicated, but architects comment: "The meandering creek, the informal dining and the opportunity of expressing a purely free design led us to adopt multiple hyperbolic paraboloid forms for shelter in the Dining Commons. The transparent effect of the clerestory diamond windows is an interesting result, rather than a cause."



Phil Fein

Solar screens for looks, for cutting cooling costs

CITY HALL, ALHAMBRA, CALIF.: Planned as a focal point in this Southern California community, the building has identical elevations facing two streets, eliminating any "rear." Window wall construction with aluminum-sheathed columns is used for both entry courts. Screen completely encompasses the main structure, doubling as a design element and as a sun shield, greatly reducing the load on the air conditioning system.

The Moorish-like screen is in white ceramic glaze with a greenish cast. It stands out from the building 3 1/2 ft. on all sides, is 21 ft. high, starts 9 ft. above the sidewalk level and contains over 8,000 units divided into 12x12-in. modular sections.

Offices of the $1 million structure are grouped in their relationship to each other and placed on the two floors with regard to frequency of public use. First floor contains engineering and water departments on one side and city clerk, treasurer and building department on the other, flanking a walnut-paneled lobby. Second floor houses the council chamber (with figured walnut paneling from floor to ceiling), administrative offices, city attorney and employees' lounge. Building has 48,000 sq. ft. Fully landscaped site makes provision for parking 150 cars. *Architect*: William Allen; *general contractor*: Parr Contracting Co.

Gladding, McBean & Co.



CITY HALL, MODESTO, CALIF.: Lending a colorful note to the downtown area, this four-story reinforced concrete structure features an unglazed red terra cotta solar screen on the east and west walls, shielding floor-to-ceiling glass walls and contrasting with the glazed brick tile. Solar screen reduces cooling requirements approximately 25%, an important factor in the climate of the San Joaquin Valley.

The $1.1 million building is on the site of a former hotel ruined by fire. The old structure contained a fully excavated basement over the entire site, leading logically to the creation of a garden court below street level as one of the dominant design elements. The landscaped court provides daylight and spaciousness to the ground floor which otherwise would be a basement area and affords a secluded spot for employee rest.

At street level are housed all the services which prompt most personal city hall visits: the utility and tax collection offices, building inspection and zoning and city clerk offices. A 100-seat council chamber also is located at this level, with provision for independent use and access.

Street level entrance to what is actually the second floor brings all but the fourth floor within one-story walking distance from grade. Elevator service also is available. Design allows for an additional floor. Garage (a basement and on-grade parking structure) can take three more floors. Architect: Milton T. Pflueger; general contractor: Roy Fiske Construction Co.



DIAMOND SHAPED BOX TRUSS is painted red on end facing street to symbolize client's trademark. Vertical grain 4x10 redwood plywood siding has special natural finish.

Simpson's showplace of wood products

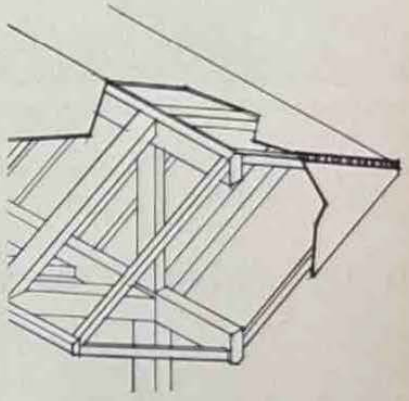
Located on a 10-acre wooded site, appropriately enough, in the new Overlake Industrial Park near Bellevue, Wash., Simpson Timber Co.'s Research Center has emerged as a showplace for its building products.

Architects Kirk, Wallace, McKinley & Associates have employed such components as glued laminated columns, folded plates, selected plywoods and a diamond box beam roof construction, unique in industrial design. The latter spans 44 ft. in one direction and 8 ft. in the other. This truss, along with the folded plates, was prefabricated and set into place.

The facility, built by Cawdrey & Vemo, Inc., comprises 22,000 sq. ft. of floor space housing the administration area, nine forest product research and development laboratories, a large pilot plant and a library.

The center marks the second major building project completed this year by Simpson. An ultramodern sawmill at Shelton, Wash., also featuring wood construction, was opened in February.

Simpson Chairman William G. Reed describes the laboratory as "achieving a new goal in our company's objectives of supplying wood products for the nation through sustained yield forest management and total utilization of trees." It will service operations throughout Washington, Oregon and California.

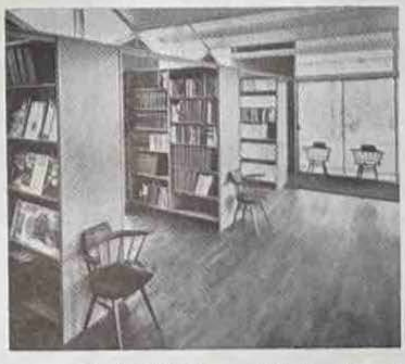


BOX BEAM consists of ½-in. plywood faced with ¾-in. resin plywood, supports 2-ton traveling crane at midpoint of 44-ft. clear span.

John Bickel photos

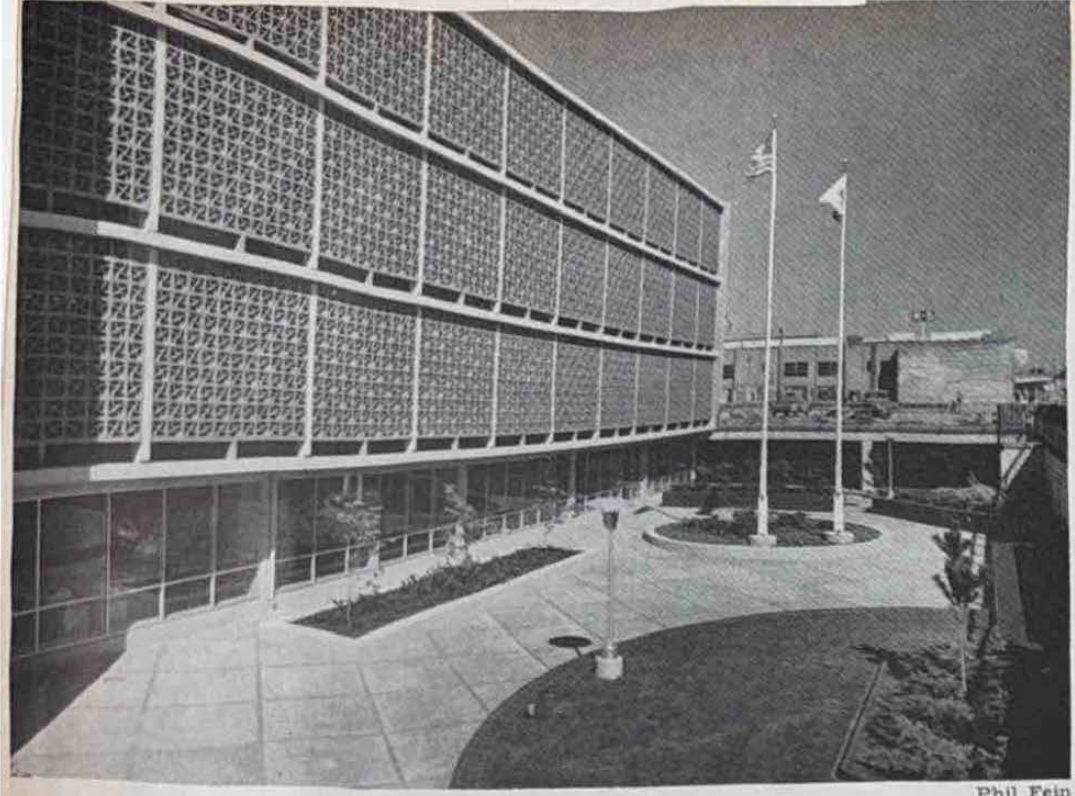


LAMINATED POSTS of painted off-white Douglas fir form "trees" with alternate panels of pastel blue and green stained glass under folded plates. Latter are slightly tilted, terminating in gargoyles to carry off rain into sunken garden below.



SIMPSON'S FORESTONE acoustical ceiling is used on interior of folded plates, as in library, to become technical information center.





Phil Fein

Project roundup

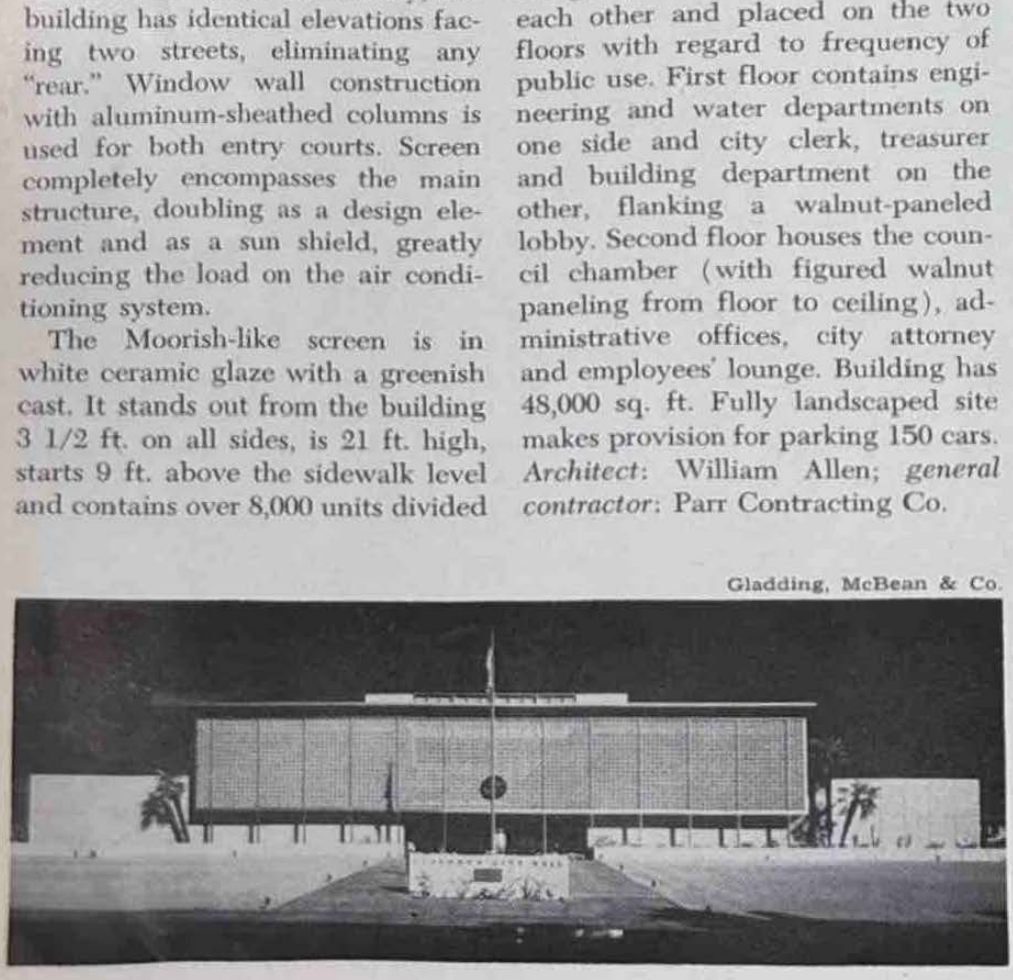
Solar screens for looks, for cutting cooling costs

CITY HALL, ALHAMBRA, CALIF.: Planned as a focal point in this Southern California community, the building has identical elevations facing two streets, eliminating any "rear." Window wall construction with aluminum-sheathed columns is used for both entry courts. Screen completely encompasses the main structure, doubling as a design element and as a sun shield, greatly reducing the load on the air conditioning system.

The Moorish-like screen is in white ceramic glaze with a greenish cast. It stands out from the building 3 1/2 ft. on all sides, is 21 ft. high, starts 9 ft. above the sidewalk level and contains over 8,000 units divided into 12x12-in. modular sections.

Offices of the $1 million structure are grouped in their relationship to each other and placed on the two floors with regard to frequency of public use. First floor contains engineering and water departments on one side and city clerk, treasurer and building department on the other, flanking a walnut-paneled lobby. Second floor houses the council chamber (with figured walnut paneling from floor to ceiling), administrative offices, city attorney and employees' lounge. Building has 48,000 sq. ft. Fully landscaped site makes provision for parking 150 cars. *Architect*: William Allen; *general contractor*: Parr Contracting Co.

Gladding, McBean & Co.



CITY HALL, MODESTO, CALIF.: Lending a colorful note to the downtown area, this four-story reinforced concrete structure features an unglazed red terra cotta solar screen on the east and west walls, shielding floor-to-ceiling glass walls and contrasting with the glazed brick tile. Solar screen reduces cooling requirements approximately 25%, an important factor in the climate of the San Joaquin Valley.

The $1.1 million building is on the site of a former hotel ruined by fire. The old structure contained a fully excavated basement over the entire site, leading logically to the creation of a garden court below street level as one of the dominant design elements. The landscaped court provides daylight and spaciousness to the ground floor which otherwise would be a basement area and affords a secluded spot for employee rest.

At street level are housed all the services which prompt most persons city hall visits: the utility and tax collection offices, building inspection and zoning and city clerk offices. A 100-seat council chamber also located at this level, with provision for independent use and access.

Street level entrance to what actually the second floor brings but the fourth floor within one-story walking distance from grade. Elevator service also is available. Design allows for an additional floor. Garage (a basement and on-grade parking structure) can take three more floors. Architect: Milton Pflueger; general contractor: Fiske Construction Co.



DIAMOND SHAPED BOX TRUSS is painted red on end facing street to symbolize client's trademark. Vertical grain 4x10 redwood plywood siding has special natural finish.

Simpson's showplace of wood products

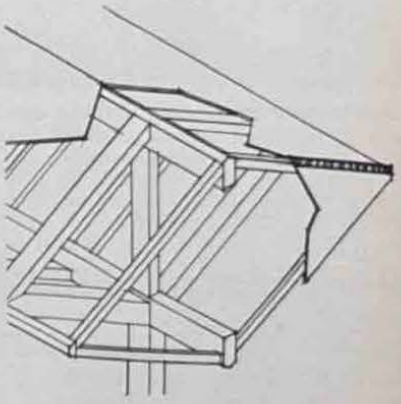
Located on a 10-acre wooded site, appropriately enough, in the new Overlake Industrial Park near Bellevue, Wash., Simpson Timber Co.'s Research Center has emerged as a showplace for its building products.

Architects Kirk, Wallace, McKinley & Associates have employed such components as glued laminated columns, folded plates, selected plywoods and a diamond box beam roof construction, unique in industrial design. The latter spans 44 ft. in one direction and 8 ft. in the other. This truss, along with the folded plates, was prefabricated and set into place.

The facility, built by Cawdrey & Vemo, Inc., comprises 22,000 sq. ft. of floor space housing the administration area, nine forest product research and development laboratories, a large pilot plant and a library.

The center marks the second major building project completed this year by Simpson. An ultramodern sawmill at Shelton, Wash., also featuring wood construction, was opened in February.

Simpson Chairman William G. Reed describes the laboratory as "achieving a new goal in our company's objectives of supplying wood products for the nation through sustained yield forest management and total utilization of trees." It will service operations throughout Washington, Oregon and California.

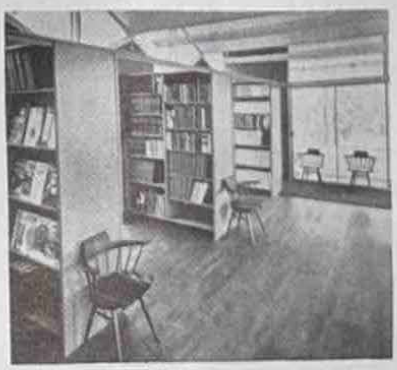


BOX BEAM consists of ½-in. plywood faced with ¾-in. resin plywood, supports 2-ton traveling crane at midpoint of 44-ft. clear span.

John Bickel photos

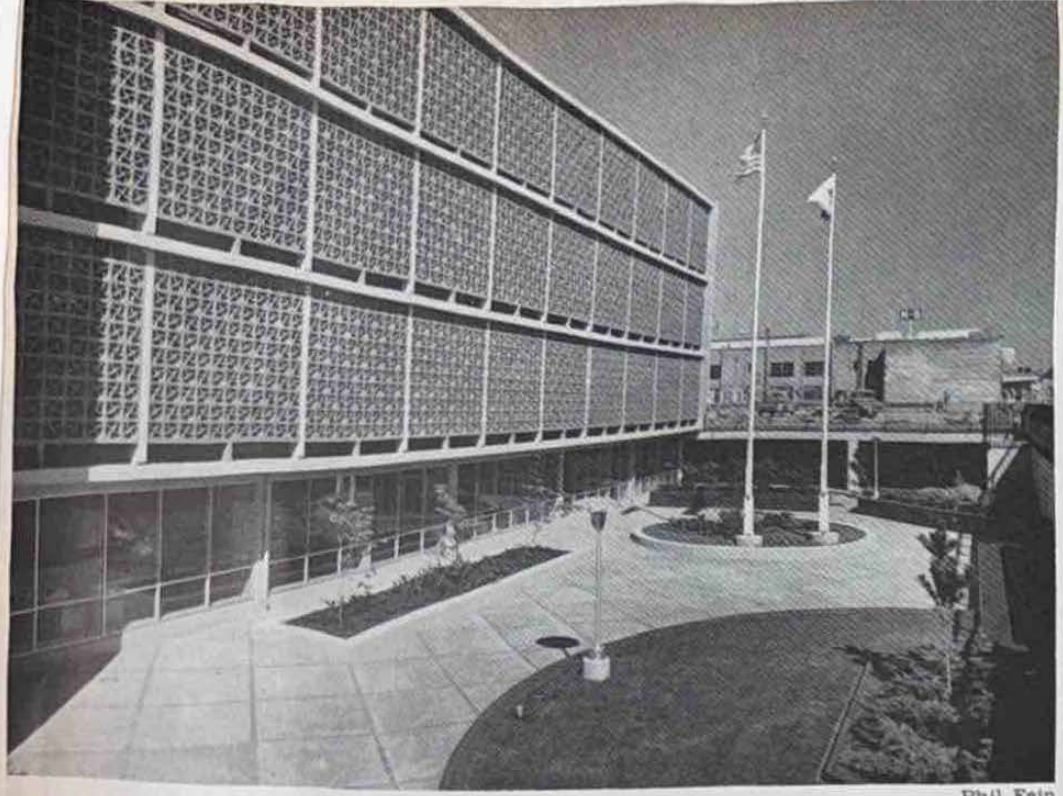


LAMINATED POSTS of painted off-white Douglas fir form "trees" with alternate panels of pastel blue and green stained glass under folded plates. Latter are slightly tilted, terminating in gargoyles to carry off rain into sunken garden below.



SIMPSON'S FORESTONE acoustical ceiling is used on interior of folded plates, as in library, to become technical information center.





Phil Fein

Solar screens for looks, for cutting cooling costs

CITY HALL, ALHAMBRA, CALIF.: Planned as a focal point in this Southern California community, the building has identical elevations facing two streets, eliminating any "rear." Window wall construction with aluminum-sheathed columns is used for both entry courts. Screen completely encompasses the main structure, doubling as a design element and as a sun shield, greatly reducing the load on the air conditioning system.

The Moorish-like screen is in white ceramic glaze with a greenish cast. It stands out from the building 3 1/2 ft. on all sides, is 21 ft. high, starts 9 ft. above the sidewalk level and contains over 8,000 units divided into 12x12-in. modular sections.

Offices of the $1 million structure are grouped in their relationship to each other and placed on the two floors with regard to frequency of public use. First floor contains engineering and water departments on one side and city clerk, treasurer and building department on the other, flanking a walnut-paneled lobby. Second floor houses the council chamber (with figured walnut paneling from floor to ceiling), administrative offices, city attorney and employees' lounge. Building has 48,000 sq. ft. Fully landscaped site makes provision for parking 150 cars. *Architect*: William Allen; *general contractor*: Parr Contracting Co.

Gladding, McBean & Co.

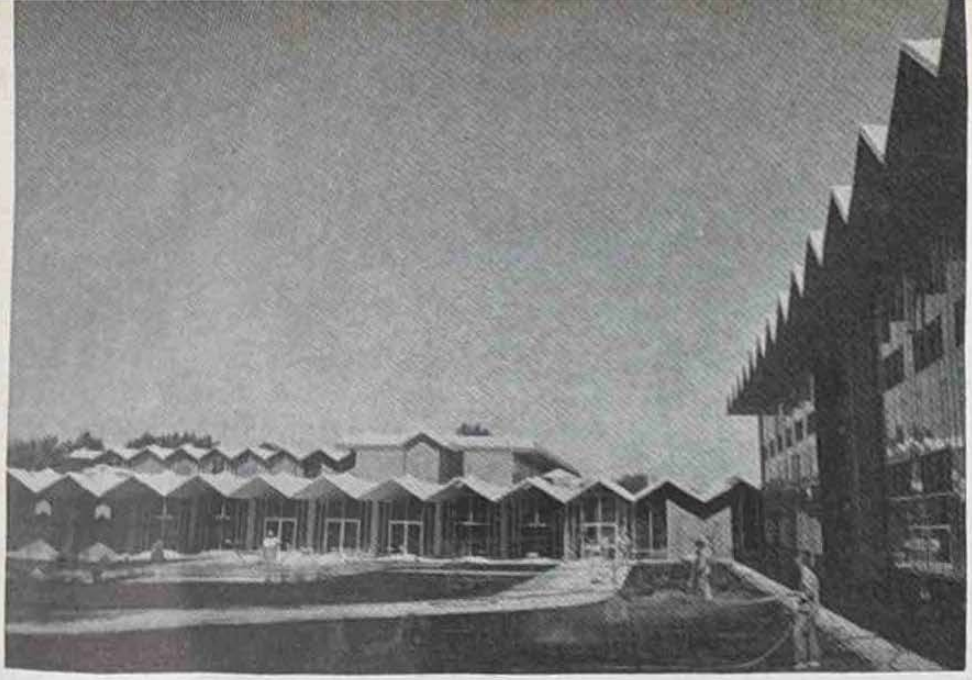


CITY HALL, MODESTO, CALIF.: Lending a colorful note to the downtown area, this four-story reinforced concrete structure features an unglazed red terra cotta solar screen on the east and west walls, shielding floor-to-ceiling glass walls and contrasting with the glazed brick tile. Solar screen reduces cooling requirements approximately 25%, an important factor in the climate of the San Joaquin Valley.

The $1.1 million building is on the site of a former hotel ruined by fire. The old structure contained a fully excavated basement over the entire site, leading logically to the creation of a garden court below street level as one of the dominant design elements. The landscaped court provides daylight and spaciousness to the ground floor which otherwise would be a basement area and affords a secluded spot for employee rest.

At street level are housed all the services which prompt most personal city hall visits: the utility and tax collection offices, building inspection and zoning and city clerk offices. A 100-seat council chamber also is located at this level, with provision for independent use and access.

Street level entrance to what is actually the second floor brings all but the fourth floor within one-story walking distance from grade. Elevator service also is available. Design allows for an additional floor. Garage (a basement and on-grade parking structure) can take three more floors. Architect: Milton T. Pflueger; general contractor: Ro Fiske Construction Co.



DENVER UNIVERSITY LOUNGE-CAFETERIA, completed in 1958 at cost of $1.5 million, serves men's and women's dormitories built earlier with folded plate roofs spanning 40 ft. To achieve desired 84-ft. span in later project, keeping same rise and chord dimension, Prescon system was used in post-tensioning shells. Architect: Edwin A. Francis; consulting engineer: Ib F. Jorgensen; general contractor: Thomas Bate & Sons.



COMMUNITY PLAZA SHOPPING CENTER, built in Boulder in 1960, has cast-in-place concrete with double T-units to form roof decking. Architect: Hobart D. Wagener; consulting engineers: Ketchum, Konkel & Hastings; general contractor: Craftsmen Construction Co.



GREELEY CAPITOL PACKING PLANT, $750,000 project finished in 1960, makes novel use of twin Ts by placing them vertically with joists toward outside. In addition, floors and roof employ same units, supported on 25-ft. span inverted T-girders and 24-ft. precast columns. All structural members are tied together by welding metal plates embedded in concrete. Architects: Nat S. Sachter & Associates; structural engineers: Sallada & Hanson; general contractor: Hensel Phelps Construction Co.

Denver in prestressed concrete spotlight

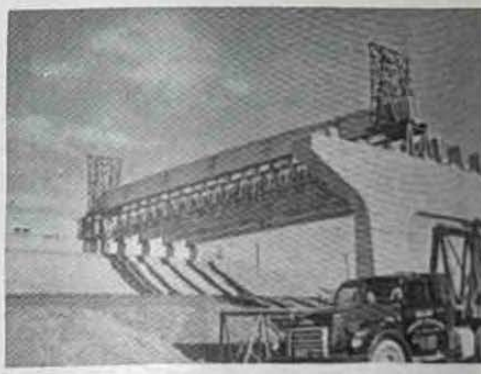
"Because of the many fine examples in the vicinity of imaginative uses of prestressed concrete by regional architects and engineers," Denver will host the industry's annual convention October 15-19 in the Brown Palace and Cosmopolitan hotels.

The impact of prestressed concrete on today's building is vividly emphasized by a rundown of some of the speakers and their topics to be discussed as part of the theme "New Opportunities in Structural Design." Among them will be Alfred A. Yee, whose Honolulu firm, Alfred A. Yee & Associates, did the structural engineering for the unusual project described on the opposite page. His subject will be "Composite Precast Concrete Connections."

Also on the program, which the Prestressed Concrete Institute has arranged in cooperation with the University of Colorado:

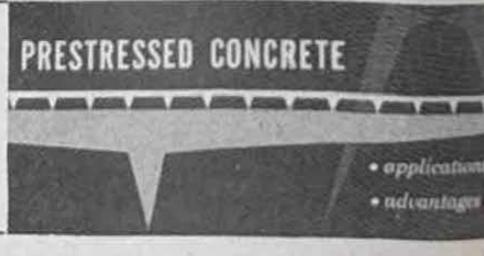
- Keynoter Thomas H. Creighton, editor of Progressive Architecture—"The Place of Prestressed Concrete in Today's Architecture."
- J. F. Enderlein, consulting engineer—"Century 21 Monorail System."
- Jack Bono, managing engineer, Fire Protection Department, Underwriters' Laboratories, Inc. — "The Philosophy of Fire Testing."
- E. Alfred Picardi, chief structural engineer, Skidmore, Owings & Merrill—"Evergreen Shopping Plaza."
- J. A. Hanson, senior development engineer, Portland Cement Association—"Optimum Steam Curing Procedures in Precasting Plants."
- Steven Galezewski, vice president and chief engineer, Rockwin Engineers — "Disneyland Monorail: Large Hotel Parking Facility."
- Frederic A. Nassaux, Frederic A. Nassaux & Associates — "Framed Structures Using Precast Segmental Elements."
- Richard G. Gewain, engineer, National Board of Fire Underwriters—"Building Code Requirements on Fire Ratings."
- Glenn S. Paxson, assistant state highway engineer for Oregon and chairman of the AASHO bridge committee—"Standardization of Precast Prestressed Concrete Highway Bridge Members."

The PCI has member plants in all the western states except Nevada, Wyoming and Alaska.



AIR FORCE ACADEMY BRIDGE north of Colorado Springs utilizes heaviest prestressed concrete girders in world, weighing 96 tons for each 120-ft. span. Prestressing was accomplished by Prescon system employing 12 tendons, each made of 16 ¼-in. diameter high tensile steel wire. Consulting engineers: L. Boduroff & Associates; general contractor: A. S. Horner Construction Co.

Written in nontechnical language, this well-designed, 20-page booklet should be especially helpful to architects, engineers and contractors in discussing the applications and advantages of prestressed concrete with their clients. Twenty-one different types of structures are described and typical units are illustrated. — Prestressed Concrete Institute, 205 W. Wacker Drive, Chicago 6, Ill.



Concrete 'trees' for Waikiki landscape

Precast "tree" columns have enabled the contractor, T. Takahashi, Ltd., to erect the major structural elements of a 15-unit, four-story hotel in Waikiki in two days, drastically reducing construction time and eliminating the problems involved in building on a restricted lot (80x45 ft.) with limited access. Total cost, including professional fees: $139,000 or $13.50 per square foot.

Each of the 10 three-armed columnar trees, 42 ft. 8 in. in height, was raised by crane into concrete piling sockets in about 15 minutes after the operation was underway. The trees were lifted from three points, hooked at the top, middle and bottom of the column, and adjusted by ropes held by workmen during hoisting.

Three trees were delivered simultaneously to the site on a trailer from the contractor's yard. While setting in foundation sockets, they were held in place by wooden braces screwed into the preset points.

On the second day, precast, prestressed 8x14-in. concrete joints, 40 ft. 6 in. in length, were placed and welded to the building trees on each side of the arms, providing support for the framework for the poured concrete slab flooring. All structural work, including floors, was completed in 30 days.

Architects Bassetti, Morse & Tatom, working with structural engineers Alfred Yee & Associates, designed the project to recall Waikiki's older, plastered buildings and, accordingly, used sand colored plaster, white concrete and dark red millwork for the exterior finish. Rough acoustical plaster, red quarry tile, dark vinyl cork and off-white textured walls form a backdrop for the interior redwood millwork. Heavy drapes replace the usual sliding doors, adding a spot of color.

Existing coconut trees have been preserved on the street side and roof planters will soften the silhouette.



FIRST DAY (8 a.m.)—Prestressed tree is raised by crane from site where three are stacked at time. Note screw-in lifting points on foreground tree, removed from column behind.



WOODEN BRACE is screwed into preset inserts in column while placement of joists continues.



WORKMAN guides placing of joist as coworker at right welds another to arm.



METAL RAILINGS on model are detailed to receive pots for ferns.

NEXT DAY (4 p.m.)—Structural work is completed on two floors. All such work, including floor laying on braced framework, was finished in 30 days.

Ben Renada photos



styrofoam bonding agent

For bonding Styrofoam insulation boards to masonry, cured concrete, metal or other surfaces, Dow has developed Styrocrete, a latex additive for portland cement mortar. The product greatly increases mortar adhesion, reduces water and water vapor transmission through the mortar and results in overall stronger and tougher mortars, according to the company. It is expected to be especially useful in low temperature installations.—The Dow Chemical Co., Midland, Mich. (No. 1)

fire door

A metal door designed to automatically close when fire starts in the building has been put on the market by Fenestra. Door has a special metal link that melts at 160 deg., a temperature higher than would be found in a building under ordinary conditions, but low enough to be sensitive to early stages of a fire. When the link melts, a spring held under tension is released and the door shuts automatically—Fenestra Inc., 11801 Mack Ave., Detroit 14, Mich. (No. 2)

aluminum siding

Latest entrant in the growing aluminum siding field is Johns-Manville with a line of vinyl-finished insulated or standard horizontal 8-in. clapboards, standard 12-in. vertical siding, accessories and decorative shutters. Insulated type is laminated with double-beveled ⅜-in. J-M backer board.—Johns-Manville Corp., 20 E. 40th St., New York 16, N.Y. (No. 3)

sliding wall

Hauserman's latest product, Operable Wall, was designed to meet the specific requirements of the school market but it should find practical use in a number of commercial, industrial and institutional applications. Full-scale sound tests show the wall to have an average loss of 39 decibels in overall ranges and 42 decibels in the all-important speech privacy range. Rockwool-backed steel panels provide a double-wall effect; continous sealing at the perimeter and at all panel joints prevents sound leaks, seals out noise. In place, the wall has a flush, permanent appearance as a floor guide holds panels rigidly in place. Work surfaces



of chalkboard and tackboard can be permanently applied. A communication panel permits easy access between divided areas. The manually operated panels are available in a variety of baked-on enamel finishes that need never be repainted and a 30-ft. wall can be stacked in an area less than 2 ft. deep.—E. F. Hauserman Co., 5711 Grant Ave., Cleveland, Ohio. (No. 4)

Italian tile

(This item, which originally appeared in September, is being rerun because of a misleading statement concerning its lightweight concrete backup.)

Using techniques and equipment imported from Italy, Basalt Rock is producing Italian type terrazzo tile for marketing in the West. It has the advantage of a lightweight concrete backup, reducing weight in high-rise wall installations. Surface aggregate varies from chips to large pieces of sawn marble, according to the architect's specifications. Wide color range and combinations come in medium and Venetian patterns.—Basalt Rock Co., Inc., Napa, Calif. (No. 5)



fireproof wood fiber tile

After investing six years and more than $500,000 in research, Simpson has developed a process which "will greatly increase wood fiber's ability to compete with so-called fireproof products made from other materials." Pyro-Chem protection, by impregnating each fiber with fireproofing chemicals, gives wood fiber acoustical ceiling tile flame spread ratings comparable to incombustible mineral tile. In tests by an independent research institute, all textures and patterns scored within the 0-25 flame spread range required for Type 1 material by most municipal codes. Pyro-Chem protection will be available in the complete line of Forestone textures and two perforated patterns. Cost is slightly more than ordinary wood fiber tile and considerably less than standard incombustible tile.—Simpson Timber Co., 2000 Washington Bldg., Seattle 1, Wash. (No. 6)

prefinished formboard

Owens-Corning's prefinished formboard when used with poured-in-place roof deck provides considerable reductions in construction costs without sacrificing finished appearance, thermal or acoustical insulating efficiency, the manufacturer reports. Product is an incombustible thermal and acoustical insulating board which serves as a form for gypsum and lightweight concrete decks. It has an embossed white plastic film facing that requires no further field painting and gives a permanent, decorative finish to exposed ceiling areas. It is available in 1- to 2-in. thicknesses and in a variety of sizes: 32x42 in. to 48 in. and 24x36 in. to 96 in., all in ¼-in. increments of length.—Owens-Corning Fiberglas Corp., 717 Fifth Ave., New York, N.Y. (No. 7)

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

OCTOBER 1961
(After November 30 write directly to manufacturer)

1 2 3 4 5 6 7

Name

Title

Firm

Address

City Zone State

• **Gladding, McBean & Co.:** Reorganization of the corporate structure creates a new products division for refractories and structural clay products which operates throughout the West without geographical boundaries. In charge is Carlton E. Goudge, vice president and formerly general manager of the Pacific Northwest division. . . . New appointments made at the Los Angeles headquarters include William F. Godejohn as senior vice president and Dr. Gurdon M. Butler and Herman A. Enemark as vice presidents. Sheridan G. Stanton has been named staff designer for architectural products.

• **Ador Corp.:** One of the nation's three largest producers of aluminum sliding glass doors has added a new window manufacturing division at its Fullerton, Calif. plant Three complete window lines—residential, intermediate commercial and monumental—are being turned out at a rate up to 25,000 units per month. Arthur A. Graves, formerly an architectural representative of Reynolds Metals Co., has been named marketing manager of the new division and Richard E. Dulebohn has joined the firm as chief engineer in charge of design and engineering.

• **Adhesive Engineering:** Dave Thompson has joined the technical sales staff of the San Carlos, Calif., firm and will work on bonding problems throughout California, Oregon and Washington.

• **Builders Brick Co.:** Ralph E. Yoder, formerly with the Structural Clay Products Institute, has returned to Seattle to join the staff of the parent firm and its Mutual Materials Division in a sales and promotion capacity. He had been attending Arizona State University at Tempe for the past two years. . . . Mutual Materials, which has opened a new plant and display area at 600 119th N.E., Bellevue, has made these appointments: Eric Hvalsoe, vice president and financial manager; Frank Steffen, sales manager; Robert Jurgena, Seattle branch manager; Tony Falcone, assistant Seattle branch manager; Charles Bakeman, purchasing agent; William Houlahan, Bellevue branch manager; and Fletchur Burrus, assistant Bellevue branch manager.

• **The Ruberoid Co.:** In conjunction with the AIA, which selected the winners, the company has awarded $10,000 in scholarships to 20 undergraduate architectural students in 14 universities throughout the country. The western recipients: John A. Berg, Arizona State University; Gary G. Pickering and Lloyd E. Platt, University of Utah; Thomas R. Hickman, University of Washington.

• **Fraser & Johnston Co.:** The San Francisco firm which has specialized in gas furnaces of all types in the residential field for 30 years now is spreading into industrial-commercial heating and cooling.

• **Fibreboard Paper Products Corp.:** Ford Wholesale Co., Inc., Pasadena, is handling Pabco roofing and asbestos-cement products exclusively in Southern California. The wholesaler expects to move into new headquarters in El Monte in October.

• **The R. C. Mahon Co.:** A regional sales-engineering office has been opened in the White-Henry-Stuart Building, Seattle, under the direction of Robert N. Boehm.

• **Robinson Brick & Tile Co.:** The Denver firm has begun construction of a $1,750,000 plant between W. Yale and W. Dartmouth avenues on the west side of the Platte River.

• **Permanente Cement Co.:** Claude E. Harper, vice president and general manager of Kaiser Gypsum Co., Inc., Oakland, and William P. Jackson, who holds similar posts with Glacier Sand & Gravel Co., Seattle, have been elected vice presidents. . . . Bulk cement distribution plants are being established in Hilo, Hawaii, and Kahului, Maui, each with a storage capacity of 2,000 bbl., the first such installations on the neighbor islands.

• **Sunbeam Lighting Co.:** Charles J. Dutcher has been appointed representative for the state of Washington, with headquarters in Seattle, and Dale Brown for Utah and Montana, with headquarters in Salt Lake City.

• **Kaiser Aluminum & Chemical Corp.:** Architect Edward H. Fickett, Los Angeles, has been retained as a consultant for its residential market development program.

• **Pricemetal Co.:** A national sales office has been opened at 569 Laurel St., San Carlos, Calif.

• **Reynolds Aluminum Supply Company of California:** A $350,000 warehouse and office building has been opened in San Diego.

• **Weyerhaeuser Co.:** Expanded promotion of its wood products division under a new marketing approach is being headed by J. P. Weyerhaeuser 3rd as manager of marketing research and merchandising. New regional managers include A. J. Daley for the Northwest and Donald Fridell for the Southwest. . . . L. R. Johnson has been appointed manager of the firm's new Seattle area.

• **Kaiser Gypsum Co., Inc.:** Lumber Supply & Warehouse Co., Seattle, has been named distributor of its Fir-Tex products in western Washington.

ASSOCIATIONS

• **National Concrete Manufacturers Association:** Block producers in Washington, Oregon, Idaho and Alaska will meet in the Hyatt House at the Seattle-Tacoma International Airport October 16-17.

• **Douglas Fir Plywood Association:** Nearly 300 executives of member mills gathered in Gearhart, Ore., for the 25th annual meeting recently to hear the principal speakers paint a rosy picture free of the black overtones of 1960. Carl T. Mitnick, past president of NAHB, referred to 1961 as the best housing year since 1950's record prosperity—with a prospect of even better things to come. New officers are John H. Martinson, Puget Sound Plywood, Inc., Tacoma, president, and Jackson Beaman, Southern Oregon Plywood, Grants Pass, vice president.

• **Concrete Products Association of Washington:** H. James Lindstrom Jr. of Superior Concrete Products Co., Seattle, is the new president.

• **West Coast Lumbermen's Association:** G. Cleveland Edgett, of Vancouver, B.C., has been named assistant to the vice president in the Portland headquarters.

• **Acoustical Materials Association:** Newly appointed directors include S. M. Lewis, Pioneer Division, The Flintkote Co., Los Angeles; W. J. Marshall, Kaiser Gypsum Co., Oakland; and J. L. Wetherby, Simpson Timber Co., Seattle.

• **National Association of Plastic Fabricators:** Henry M. Snyder, president of Sani-Top, Inc., Gardena, Calif., has been named executive secretary of the group, composed of 200 major companies in the decorative plastic laminate industry.

not specified

hawaii (heaven help her!) calls

There is no doubt that since Hawaii became the 50th state, the mainland's kinship to the Islands in general and to Honolulu in particular has steadily strengthened. More and more westerners are having a first-hand look for themselves, quite often as convention-goers. While this issue of Pacific Architect & Builder goes into the mail, for example, the Northwest Region, AIA, is convening in Honolulu, as its California counterpart did two years ago.

If the practitioners on their first visit expect to find an architecture that reflects the tempo, the culture, the climate of the Islands, they are, for the most part, sadly disappointed. The restaurant might well have come off of Los Angeles' La Cienega Boulevard, the office building from downtown Denver perhaps, the bank from Portland or Albuquerque. But more appalling is what's happening to the total environment—a fact of life that even shakes up the Islanders now and then, as it did columnist ("In One Ear") Bob Krauss in the Honolulu Advertiser a while back.

"Now that the City Council is finally getting around to rezoning Diamond Head from residential homes to apartment hotels, I think this would be a good time to suggest a few other things that need attention," he declared. Among his tongue-in-cheek recommendations:

"SUNSETS—Every night in Hawaii the sky turns a bright orange. This is a definite hazard to motorists driving in the ewa direction. It's time somebody did something about this situation! We have an incinerator, haven't we? Why not burn it at dusk so that the smoke will blot out those glaring sunsets? Let's act now!

"WAIKIKI BEACH—This is a perfect example of improper utilization of Hawaii's natural resources (like having homes instead of hotels on Diamond Head). Do you realize that the sand is not only blown away by the wind and washed away by the waves but even gets tracked all over the place by careless tourists?

"TANTALUS DRIVE—For years the narrow, winding road has been a blot on modern Honolulu's reputation for progress. In fact, the whole area needs streamlining. Much of it is choked with old trees and flowering shrubs. Once Diamond Head is rezoned, this area should be studied. The trees could be bulldozed, a four-lane highway put in and the slope bult up with low-cost housing."

Come to think of it, columnist Krauss' suggestions aren't so absurd after all. This seems to be the direction our urbanization is taking everywhere. R.E.K.



ORIGINAL—Composite Copper Phenolic Wood Preservative

CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

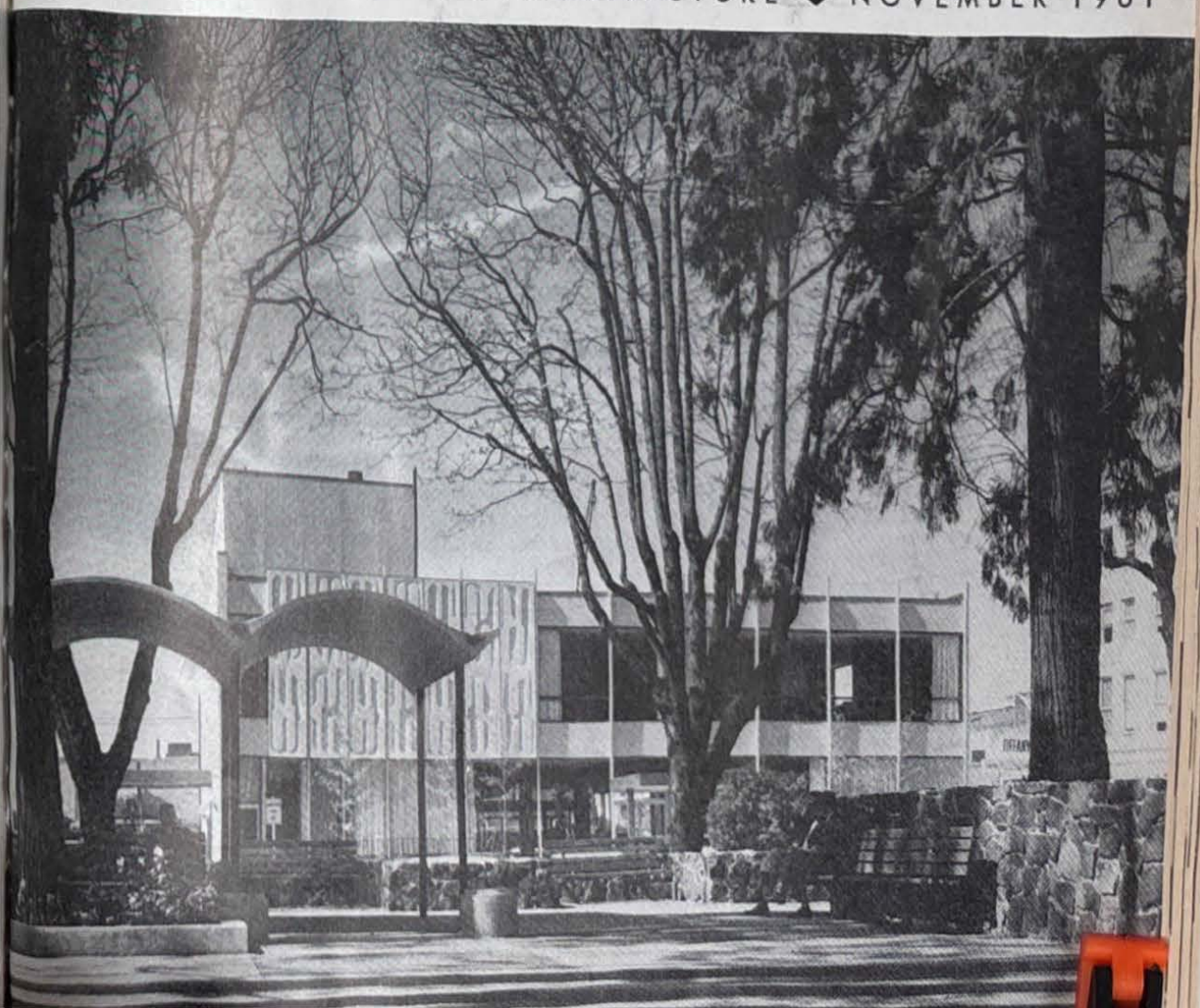
Colorado Fuel & Iron Corp.	15
Gladding, McBean & Co.	20
Haughton Elevator Co.	10
Haws Drinking Faucet Co.	13
Macomber, Inc.	18-19
Portland Cement Association	IV Cover
Rilco Laminated Products Division, Weyerhauser Co.	II Cover
Rudd & Cummings, Inc.	34
U. S. Gypsum Company	III Cover
Western Building Industries Exposition	7

Pacific Architect & Builder

Architecture
Library

UNIVERSITY OF OREGON
NOV 3 1961
LIBRARY

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ NOVEMBER 1961



not specified

hawaii (heaven help her!) calls

There is no doubt that since Hawaii became the 50th state, the mainland's kinship to the Islands in general and to Honolulu in particular has steadily strengthened. More and more westerners are having a first-hand look for themselves, quite often as convention-goers. While this issue of Pacific Architect & Builder goes into the mail, for example, the Northwest Region, AIA, is convening in Honolulu, as its California counterpart did two years ago.

If the practitioners on their first visit expect to find an architecture that reflects the tempo, the culture, the climate of the Islands, they are, for the most part, sadly disappointed. The restaurant might well have come off of Los Angeles' La Cienega Boulevard, the office building from downtown Denver perhaps, the bank from Portland or Albuquerque. But more appalling is what's happening to the total environment—a fact of life that even shakes up the Islanders now and then, as it did columnist ("In One Ear") Bob Krauss in the Honolulu Advertiser a while back.

"Now that the City Council is finally getting around to rezoning Diamond Head from residential homes to apartment hotels, I think this would be a good time to suggest a few other things that need attention," he declared. Among his tongue-in-cheek recommendations:

"SUNSETS—Every night in Hawaii the sky turns a bright orange. This is a definite hazard to motorists driving in the ewa direction. It's time somebody did something about this situation! We have an incinerator, haven't we? Why not burn it at dusk so that the smoke will blot out those glaring sunsets? Let's act now!

"WAIKIKI BEACH—This is a perfect example of improper utilization of Hawaii's natural resources (like having homes instead of hotels on Diamond Head). Do you realize that the sand is not only blown away by the wind and washed away by the waves but even gets tracked all over the place by careless tourists?

"TANTALUS DRIVE—For years the narrow, winding road has been a blot on modern Honolulu's reputation for progress. In fact, the whole area needs streamlining. Much of it is choked with old trees and flowering shrubs. Once Diamond Head is rezoned, this area should be studied. The trees could be bulldozed, a four-lane highway put in and the slope bult up with low-cost housing."

Come to think of it, columnist Krauss' suggestions aren't so absurd after all. This seems to be the direction our urbanization is taking everywhere. R.E.K.



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Colorado Fuel & Iron Corp.	15
Gladding, McBean & Co.	20
Haughton Elevator Co.	10
Haws Drinking Faucet Co.	13
Macomber, Inc.	18-19
Portland Cement Association	IV Cover
Rilco Laminated Products Division, Weyerhauser Co.	II Cover
Rudd & Cummings, Inc.	34
U. S. Gypsum Company	III Cover
Western Building Industries Exposition	7

Pacific Architect & Builder

Architecture
Library

UNIVERSITY OF OREGON
NOV 3 1961
LIBRARY

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ NOVEMBER 1961



not specified

hawaii (heaven help her!) calls

There is no doubt that since Hawaii became the 50th state, the mainland's kinship to the Islands in general and to Honolulu in particular has steadily strengthened. More and more westerners are having a first-hand look for themselves, quite often as convention-goers. While this issue of Pacific Architect & Builder goes into the mail, for example, the Northwest Region, AIA, is convening in Honolulu, as its California counterpart did two years ago.

If the practitioners on their first visit expect to find an architecture that reflects the tempo, the culture, the climate of the Islands, they are, for the most part, sadly disappointed. The restaurant might well have come off of Los Angeles' La Cienega Boulevard, the office building from downtown Denver perhaps, the bank from Portland or Albuquerque. But more appalling is what's happening to the total environment—a fact of life that even shakes up the Islanders now and then, as it did columnist ("In One Ear") Bob Krauss in the Honolulu Advertiser a while back.

"Now that the City Council is finally getting around to rezoning Diamond Head from residential homes to apartment hotels, I think this would be a good time to suggest a few other things that need attention," he declared. Among his tongue-in-cheek recommendations:

"SUNSETS—Every night in Hawaii the sky turns a bright orange. This is a definite hazard to motorists driving in the ewa direction. It's time somebody did something about this situation! We have an incinerator, haven't we? Why not burn it at dusk so that the smoke will blot out those glaring sunsets? Let's act now!

"WAIKIKI BEACH—This is a perfect example of improper utilization of Hawaii's natural resources (like having homes instead of hotels on Diamond Head). Do you realize that the sand is not only blown away by the wind and washed away by the waves but even gets tracked all over the place by careless tourists?

"TANTALUS DRIVE—For years the narrow, winding road has been a blot on modern Honolulu's reputation for progress. In fact, the whole area needs streamlining. Much of it is choked with old trees and flowering shrubs. Once Diamond Head is rezoned, this area should be studied. The trees could be bulldozed, a four-lane highway put in and the slope built up with low-cost housing."

Come to think of it, columnist Krauss' suggestions aren't so absurd after all. This seems to be the direction our urbanization is taking everywhere. R.E.K.



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Colorado Fuel & Iron Corp.	15
Gladding, McBean & Co.	20
Haughton Elevator Co.	10
Haws Drinking Faucet Co.	13
Macomber, Inc.	18-19
Portland Cement Association	IV Cover
Rilco Laminated Products Division, Weyerhauser Co.	II Cover
Rudd & Cummings, Inc.	34
U. S. Gypsum Company	III Cover
Western Building Industries Exposition	7

Pacific Architect & Builder

chitecture
brary

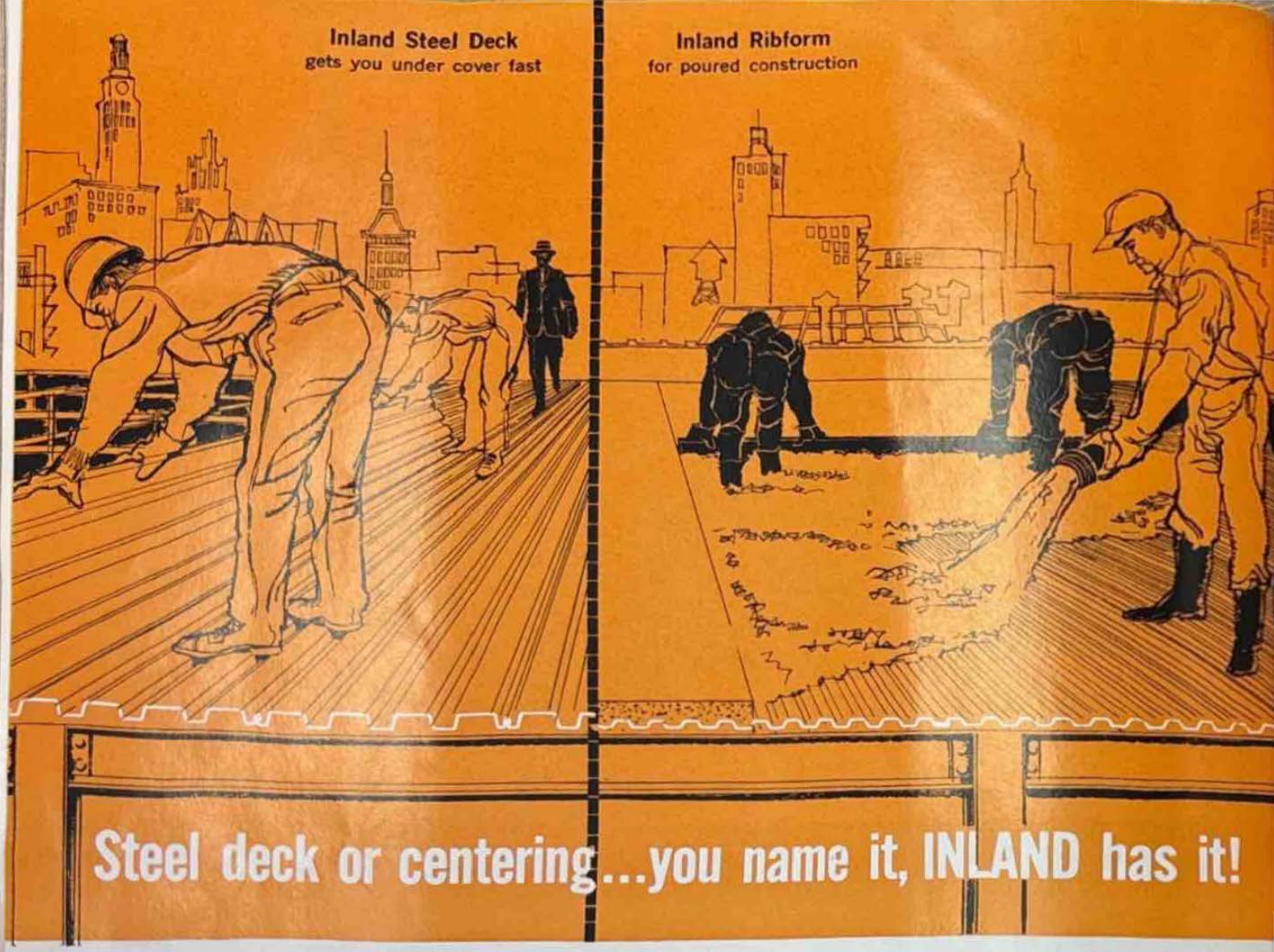
UNIVERSITY OF OREGON
NOV 3 1961
LIBRARY

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ NOVEMBER 1961

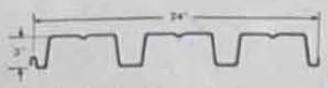


Inland Steel Deck
gets you under cover fast

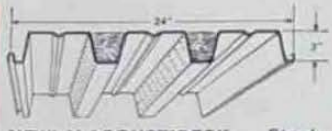
Inland Ribform
for poured construction



Steel deck or centering...you name it, INLAND has it!



NEW! N-DECK — Available in lengths from 6'0" to 28'6". Carries normal roof loads over spans up to 16'0". Especially practical for canopies.



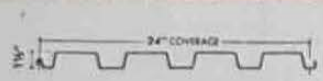
NEW! N-ACOUSTIDECK — Steel deck and acoustical ceiling in one panel. For spans to 16'0". Noise-Reduction Coefficient, .70.



A-DECK — For purlin spacings not exceeding 8'4". Narrow ribs provide deck surface that supports the thinnest or softest types of insulation.



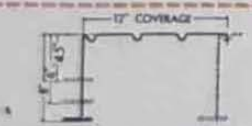
H-DECK — New! For simple spans to 20'0" — 3" and 4½" depths. Especially practical to cover walkways in shopping centers, schools, other installations. Also available in Acoustideck.



B-DECK — For spans to 10'0". Wide rib distributes metal for greater structural efficiency. Well suited for use as side wall panels.



B-ACOUSTIDECK — Two-in-one panel combines steel roof deck with acoustical ceiling having Noise-Reduction Coefficient of .70. Used for spans to 10'0".



T-STEEL—New! Galvanized only. For clear spans to 32'0". Adaptable to acoustical and flush, luminous ceiling treatments. Provides superior diaphragm to resist seismic and wind loads.



RIBFORM — High-tensile, galvanized steel form for concrete slabs over spans up to 8'0". Three types: Standard, Heavy-Duty, Super-Duty (shown).

Expansion projects and new buildings get under cover fast and economically, when you specify an Inland roof system.

Inland steel deck is easy to handle and weld in place — in any weather that a man can work. Effects of construction abuse are held to a minimum, since types A, B, C, and H decks are Bonderized, then covered with a baked-enamel primer that resists on-the-job damage. One field coat of paint over this is usually enough.

In concrete-over-steel construction, Inland Ribform supports wet concrete with minimum deflection. Rigid sheets are quickly and inexpensively attached to supports — in place, they provide a safe work platform for crews.

Write for catalog 248 — see Sweet's section 2i/Inl. For help on unusual problems, you can draw on the diversified experience of Inland sales engineers. Write or call your nearest Inland office.

member of the INLAND steel family

ENGINEERED PRODUCTS DIVISION

INLAND STEEL PRODUCTS COMPANY

Dept. K, 4045 West Burnham Street
Milwaukee 1, Wisconsin

Pacific Architect & Builder November 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA N. FOSTER
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

16 Eugene Branch, United States National Bank of Portland, Eugene: Wilmsen, Endicott & Unthank, Architects

22 Professional Office Building, Denver: Donald R. Roark, Architect

24 Colton Civic Center, Colton, Calif.: Herman O. Ruhnau, Architect

special features

14 Progress Report No. 2: Seattle World's Fair

21 Monstrosities, Monuments and Models—digest of an address by Rev. Dr. Theophilus Taylor

26 Photo Editorial: New St. Augustine's Church—Injustice at Waikiki

methods & materials

27 Phoenix Architect Devises System for Better Concrete Floors

departments

4 Building Permits
6 Project Preview
8 Building Briefs
9 The Building Month
12 T-Square Talk
28 PA&B Memo
30 Products
32 Literature
33 Manufacturers/Suppliers
34 Not Specified

VOLUME 67, NUMBER 11

Published monthly by Pacific Builder & Engineer, Inc. 1945 Yale Place E., Seattle, Wash. Subscription price: $5 a year. Controlled circulation postage paid at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Eugene Branch, United States National Bank of Portland, Eugene (p. 16)—Wilmsen, Endicott & Unthank, Architects; Tom Burns Jr. photo.

Building Permit Totals for

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dollar

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(26)	$ 220,565	$ 342,841
Alameda Co.	(169)	1,565,950	2,095,327
Albany	( )	Nil	25,827
Alhambra	(2)	20,200	585,440
Anaheim	(119)	1,522,950	2,558,795
Antioch	(20)	195,083	262,806
Arcadia	(9)	196,235	435,368
Arroyo Grnde	(14)	172,000	175,600
Artesia	(54)	742,700	965,100
Atherton	(2)	74,000	152,274
Atwater	( )	Nil	1,350
Auburn	(5)	39,000	385,106
Avalon	( )	Nil	1,800
Azusa	(3)	47,000	227,479
Bakersfield	(62)	715,100	890,631
Baldwin Park	(50)	562,850	659,425
Banning	(21)	233,508	241,915
Barstow	( )	Nil	26,902
Bell	(10)	68,500	107,750
Bellflower	(106)	766,900	1,118,380
Bell Gardens	(40)	235,900	265,280
Belmont	(17)	176,000	209,400
Benicia	( )	Nil	33,227
Berkeley	(1)	13,800	1,011,269
Beverly Hills	(65)	1,838,000	2,387,946
Bradbury	( )	Nil	2,500
Brawley	(4)	33,486	56,336
Brea	(6)	133,569	166,381
Buena Park	(23)	269,231	899,046
Burbank	(50)	405,800	1,178,720
Burlingame	(5)	126,280	359,140
Butte Co.	( )	Nil	949,000
Calexico	(2)	15,000	55,150
Campbell	(30)	335,650	378,840
Carlsbad	(21)	342,434	361,897
Carmel	(2)	42,000	49,900
Chico	(3)	39,001	62,880
Chino	(3)	48,355	91,771
Chula Vista	(234)	1,857,000	2,211,792
Claremont	(5)	104,500	192,165
Coalinga	(3)	30,000	31,300
Colton	( )	Nil	40,653
Commerce	( )	Nil	753,750
Compton	(47)	205,000	316,293
Concord	(21)	259,010	666,775
Cntra Csta Co.	(128)	2,217,872	2,986,853
Corona	(28)	281,538	377,733
Coronado*	( )	182,200	225,823
Corte Madera	(9)	171,349	191,239
Costa Mesa	(307)	4,460,972	4,703,127
Covina	(3)	28,530	3,294,360
Cudahy	(34)	241,900	267,850
Culver City	( )	Nil	80,477
Dairy Valley	(1)	18,000	53,000
Daly City	(97)	1,265,108	1,640,528
Davis	(5)	74,000	76,885
Delano	(15)	147,500	257,138
Downey	(88)	655,830	966,718
Duarte	(1)	28,000	166,080
El Cajon	(19)	324,500	975,500
El Centro	(35)	491,500	525,850
El Cerrito	(25)	271,994	425,549
El Dorado Co.	(105)	1,183,030	1,663,228
El Monte	( )	No Reply	No Reply
El Segundo	(1)	12,000	76,275
Emeryville	( )	Nil	4,250
Escondido	(3)	51,012	363,250
Eureka	(14)	222,500	592,332
Fairfield	(42)	393,838	630,204
Fillmore	( )	Nil	5,990
Fontana	(26)	231,936	261,775
Fremont	(169)	2,110,300	2,339,720
Fresno	(106)	1,030,395	1,858,021
Fresno Co.	(63)	759,478	1,293,882
Fullerton	(162)	2,604,679	3,196,520
Glendale*	( )	2,172,245	2,579,488
Glendora	(52)	722,200	778,200
Half Moon Bay	(7)	97,000	98,400
Hanford	(46)	581,695	630,066
Hawthorne	(36)	365,400	625,280
Hayward	(54)	422,100	844,355
Hemet	(3)	37,500	70,571
Hermosa Bch	(1)	9,865	73,133
Hillsborough	(5)	226,000	328,850
Holtville	( )	Nil	26,100
Humboldt Co.*	( )		49,880
Huntingtn Bch	(133)	2,120,790	2,296,661
Huntington Pk	(9)	67,760	134,605
Imperial Co.	( )	Nil	10,900
Indio	(10)	76,332	136,664
Industry	( )	Nil	1,605,000
Inglewood	(90)	920,510	1,424,647
Irwindale	( )	Nil	3,300
Kern Co.	(115)	1,310,475	2,058,411
Laguna Beach	(6)	126,000	243,285
La Habra	(38)	316,207	364,843
Lakewood	(3)	81,500	264,260
La Mesa	(9)	165,000	347,921
La Mirada	(91)	1,618,800	1,981,700
La Puente	( )	Nil	73,060
La Verne	(1)	25,000	328,605
Lawndale	(54)	434,400	514,080
Lindsay	(2)	19,000	26,794
Livermore	(15)	152,207	192,827
Lodi	(11)	154,900	325,475
Lompoc	(102)	1,230,955	2,097,175
Long Beach	(314)	2,647,280	7,697,160
Los Altos	(22)	470,210	557,313
Los Angeles	(1,673)	16,081,321	51,685,102
Ls Angls Co.	(1,203)	15,422,204	20,142,181
Los Gatos	(16)	260,500	456,520
Lynwood	(21)	170,500	254,258
Madera	(7)	73,990	99,343
Madera Co.	(11)	87,900	161,800
Manhattn Bch	(14)	220,670	296,944
Manteca	(16)	156,000	195,613
Marin Co.	(51)	1,444,045	1,681,385
Martinez	(9)	83,740	221,055
Marysville	(4)	70,500	76,950
Maywood	(14)	102,300	125,293
Menlo Park	(4)	112,000	241,940
Merced	(22)	291,335	327,095
Merced Co.	(22)	230,800	292,270
Millbrae	(39)	488,000	2,249,300
Mill Valley	(5)	93,000	244,960
Modesto	(108)	1,310,500	1,955,743
Monrovia	(9)	73,235	202,980
Montclair	(19)	167,645	201,535
Montebello	(35)	351,583	512,315
Monterey	(8)	114,200	378,780
Monterey Co.	(42)	753,730	1,064,919
Monterey Pk.	(36)	324,840	402,375
Mountin View	(88)	764,000	1,433,760
Napa	(26)	394,042	452,175
Napa Co.	(10)	168,750	306,870
National City	(10)	52,580	230,522
Newport Bch	(38)	648,350	979,693
N. Sacramento	(10)	98,610	132,146
Norwalk	(15)	100,250	398,300
Novato	(8)	179,100	193,300
Oakdale	(3)	31,820	44,926
Oakland	(250)	2,481,016	3,907,667
Oceanside	(57)	733,000	1,660,165
Ojai	(1)	82,500	183,000
Ontario	(41)	503,192	707,236
Orange	(617)	6,710,170	7,011,981
Orange Co.	(371)	6,713,252	7,434,898
Oroville	(3)	31,386	60,239
Oxnard	(178)	1,887,400	2,280,814
Pacifica	(23)	228,250	374,510
Pacific Grove	(12)	161,400	473,851
Palm Springs	(29)	609,500	874,251
Palo Alto	(7)	126,565	2,748,373
Pls Vrds Estts	(9)	358,310	386,593
Paramount	(32)	253,600	390,193
Pasadena	(69)	777,581	1,552,015
Paso Robles	(2)	30,500	48,050
Pico Rivera	(1)	12,000	106,329
Piedmont	( )	Nil	64,754
Pinole	(8)	75,318	91,003
Pittsburg	(6)	83,208	823,058
Placentia	(120)	785,320	821,040
Placer Co.	(71)	894,423	1,204,615
Pleasanton	(2)	32,100	32,960
Pomona	(61)	395,630	1,536,971
Porterville	( )	Nil	23,505
Port Hueneme	( )	Nil	10,700
Red Bluff	(1)	14,965	73,565
Redding	(1)	22,000	255,795
Redlands	(11)	142,950	355,271
Redondo Bch	(72)	634,503	1,363,951
Redwood City	(38)	285,118	451,958
Richmond	(46)	495,323	1,020,456
Riverside	(102)	1,162,400	1,768,966
Riverside Co.	(200)	2,208,315	3,511,675
Rolling Hills	( )	Nil	39,500
Rlng Hls Estts	(2)	54,000	185,950
Rosemead	(5)	67,700	103,950
Roseville	(7)	54,610	460,686
Sacramento	(89)	930,100	8,623,950
Scramento Co.	(313)	3,651,777	5,768,503
St. Helena	( )	No Reply	No Reply
Salinas	(19)	280,000	380,000
Sn Bernardino	(48)	631,906	1,505,126
Sn Brnrdn Co.	(388)	3,258,854	4,188,005
San Bruno	(42)	599,900	1,003,823
San Carlos	(16)	295,320	374,943
San Clemente	(13)	194,452	282,825
San Diego	(331)	4,069,675	7,840,909
San Diego Co.	(202)	3,328,100	4,546,996
San Dimas	(5)	73,000	78,710
San Fernando	(6)	43,500	99,795
San Francisco	(232)	4,181,457	9,917,469
San Gabriel	(4)	25,500	91,223
Sanger	(2)	26,340	93,734
San Jacinto	(5)	43,875	45,291
Sn Joaquin Co.	(20)	223,393	955,896
San Jose	(639)	6,913,414	10,293,704
San Leandro	(34)	311,000	507,779
Sn Luis Obspo	(18)	340,255	768,922
Sn Ls Obsp Co.	(44)	592,111	967,502
San Marino	(3)	164,853	274,288
San Mateo	(54)	470,000	717,198
San Mateo Co.	(17)	274,200	1,776,926
San Pablo	(51)	451,291	666,895
San Rafael	(51)	497,402	980,967
Santa Ana	(223)	2,592,549	3,169,908
Santa Barbara	(64)	844,000	1,252,006
Snta Brbra Co.	(206)	3,264,500	4,148,500
Santa Clara	(59)	616,500	1,344,701
Snta Clara Co.	(60)	1,147,050	1,967,965
Santa Cruz	(15)	209,511	399,780
Snta Cruz Co	(103)	1,185,610	1,469,700
Snta Fe Sprgs	(42)	267,400	452,609
Santa Maria	(236)	2,919,278	3,136,351
Santa Monica	(37)	1,448,576	1,861,252
Santa Paula	( )	No Reply	No Reply
Santa Rosa	(62)	537,250	836,669
Sausalito	(63)	1,357,500	1,377,850
Seal Beach	(9)	117,424	128,444
Seaside	(7)	84,000	99,080
Selma	(2)	18,324	50,539
Shasta Co.	(8)	140,380	272,673
Sierra Madre	(1)	20,900	75,890
Solano Co.	(9)	180,309	273,862
Sonoma Co.	(46)	463,099	1,140,045
South Gate	(3)	34,010	341,793
So. El Monte	( )	Nil	109,000
So. Pasadena	(33)	645,262	764,835
So. Sn Frncsco	(20)	156,600	784,500
Stanislaus Co.	(29)	315,745	525,544
Stockton	(53)	488,470	561,042
Sunnyvale	(67)	950,320	1,502,222
Temple City	(15)	186,400	257,965
Torrance	(275)	2,575,830	3,402,514
Tracy	( )	Nil	26,520
Tulare	(5)	63,700	246,177
Tulare Co.	( )	No Reply	No Reply
Turlock	(1)	17,457	54,157
Ukiah	(42)	179,700	201,017
Upland	(48)	879,950	1,039,188
Vacaville	(3)	36,400	38,836
Vallejo	(55)	578,450	793,317
Ventura	(12)	174,000	421,682
Ventura Co.	(280)	3,522,100	4,549,728
Visalia	(23)	234,414	288,736
Walnut	( )	Nil	1,700
Walnut Creek	(38)	390,500	408,570
Wasco	(2)	18,620	105,320
Watsonville	(2)	15,000	88,960
West Covina	(32)	491,250	2,137,757
Whittier	(13)	113,250	1,450,800
Woodland	(22)	236,840	333,672
Woodside	(2)	40,000	82,790
Yolo Co.	(6)	84,050	137,540
Yreka	(3)	40,000	91,210
Yuba City	(2)	30,200	103,025
Yuba Co.	(30)	261,300	277,325
Total	**(15,034)**	**$180,528,092**	**$322,540,939**

OREGON

Albany	(1)	$ 12,700	$ 215,216
Ashland	(4)	42,000	48,450
Astoria	(6)	67,050	73,243
Baker	(2)	27,000	240,809
Beaverton	(3)	39,423	160,046
Bend	(7)	84,400	97,249
Central Point	(6)	56,500	59,550
Clackamas Co.	(45)	615,295	662,215
Coos Bay	( )	Nil	248,635
Corvallis	(7)	84,000	147,464
Dallas	( )	Nil	27,966
Douglas Co.	(5)	39,900	663,150
Eugene	(58)	627,960	1,172,892
Forest Grove	(7)	73,500	564,426
Grants Pass	(2)	25,500	128,400
Gresham	(34)	222,000	344,660
Hermiston	(3)	45,455	60,981
Hillsboro	(13)	133,000	160,534
Hood River	( )	Nil	32,378
Klamath Falls	(4)	62,500	453,377

* Breakdown not available

Western States for September

Residential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
La Grande	(6)	65,678	84,550
Lake Co.	(76)	714,165	1,002,052
Lebanon	(4)	82,500	85,264
Marion Co.	(51)	587,100	900,533
McMinnville	(7)	92,000	130,055
Medford	(10)	126,500	230,684
Milton-Frwtr	( )	Nil	5,465
Multnm. Cty.	(133)	2,186,201	3,186,806
Newberg	(3)	16,595	281,349
Newport	( )	No Reply	No Reply
North Bend	(4)	30,000	59,330
Ontario	(1)	14,500	212,050
Oregon City	(5)	82,100	167,980
Oswego	(7)	153,500	274,935
Pendleton	(1)	13,000	47,890
Portland	(60)	762,125	4,173,365
Prineville	( )	Nil	4,250
Roseburg	(4)	44,276	101,364
St. Helens	(3)	25,200	34,740
Salem	(56)	423,855	753,306
Seaside	( )	Nil	142,114
Springfield	(15)	138,416	226,880
The Dalles	(5)	63,000	129,875
Wash. Co.	(76)	1,393,295	1,619,547
Total	**(734)**	**$ 9,272,189**	**$ 19,414,918**

WASHINGTON

Aberdeen	(1)	$ 14,000	$ 71,687
Anacortes	(3)	41,000	56,525
Auburn	(21)	216,000	271,974
Bellevue	(5)	124,500	220,375
Bellingham	(4)	55,000	206,387
Bremerton	(1)	15,000	95,750
Camas	( )	Nil	7,590
Centralia	(1)	21,000	59,926
Chehalis	(1)	11,000	33,329
Clark Co.	(75)	914,200	945,200
Clarkston	( )	Nil	224,171
Ellensburg	(2)	40,000	131,876
Enumclaw	(2)	20,000	56,700
Ephrata	(9)	92,000	124,475
Everett	(8)	126,180	226,012
Grys Hrb. Cty.	(10)	80,000	153,815
Hoquiam	( )	Nil	23,823
Island Co.	(9)	43,500	60,775
Kelso	(1)	14,500	67,100
Kennewick	(9)	151,000	195,689
Kent	(16)	162,017	603,232
King Co.	(384)	5,471,785	8,627,090
Kirkland	(4)	55,428	332,205
Longview	(16)	184,000	403,919
Mercer Island	(13)	324,392	394,097
Moses Lake	(2)	28,500	76,905
Olympia*	( )	96,000	335,242
Pasco	(4)	43,770	74,000
Pierce Co.	(154)	1,770,065	2,485,090
Port Angeles	(7)	92,500	98,750
Port Orchard	( )	Nil	Nil
Pullman*	( )	23,330	45,046
Puyallup	(4)	44,000	234,305
Renton	(10)	113,400	204,065
Richland	(27)	368,100	967,249
Seattle	(145)	1,905,312	6,399,759
Shelton	(2)	26,000	106,800
Spokane	(36)	584,750	826,329
Spokane Co.	(29)	474,680	834,844
Sunnyside	(1)	16,000	83,600
Tacoma	(49)	620,400	2,572,054
Vancouver	(14)	183,575	819,958
Walla Walla	(3)	42,000	90,765
Wlla Wlla Co.	(6)	86,000	92,445
Wenatchee	(3)	40,000	1,056,835
Yakima	(16)	234,076	518,118
Total	**(1,107)**	**$ 14,969,960**	**$ 31,515,881**

ALASKA

Anchorage	(22)	$ 589,449	$ 1,111,140
Fairbanks	(6)	135,000	135,000
Juneau	(3)	46,000	542,621
Ketchikan	( )	Nil	Nil
Total	**(31)**	**$ 770,449**	**$ 1,788,761**

IDAHO

Alameda	(7)	$ 81,500	$ 92,050
Blackfoot	(5)	68,000	117,655
Boise	(23)	135,400	428,965
Caldwell	(7)	110,500	840,372
Coeur d'Alene	(4)	73,210	97,782
Idaho Falls	(22)	272,722	379,355
Jerome	( )	Nil	11,450
Lewiston	(4)	34,500	80,048
Moscow	(6)	98,500	274,715
Nampa	(6)	64,500	93,045
Payette	(2)	27,600	28,900
Pocatello	(3)	68,000	133,437
Sandpoint	( )	Nil	2,650
St. Maries	( )	Nil	Nil
Twin Falls	(8)	64,500	139,550
Total	**(97)**	**$ 1,098,932**	**$ 2,719,974**

MONTANA

Anaconda	( )	Nil	$ 2,300
Billings	(41)	$ 611,750	659,792
Bozeman	(2)	40,000	49,675
Butte	(1)	3,000	32,070
Cut Bank	( )	Nil	750
Glasgow	(7)	80,450	95,600
Glendive	(2)	25,200	26,800
Great Falls	(37)	323,378	435,675
Havre	( )	Nil	73,453
Helena	(6)	97,000	337,722
Kalispell	(1)	5,000	128,750
Lewistown	(7)	67,500	71,500
Livingston	(1)	1,000	5,950
Malta	( )	Nil	Nil
Miles City	(1)	13,000	98,694
Missoula	(3)	48,400	77,415
Total	**(109)**	**$ 1,315,678**	**$ 2,096,146**

WYOMING

Casper	(20)	$ 276,500	$ 483,190
Cheyenne	(45)	533,500	637,798
Cody	(2)	23,000	150,600
Laramie	(6)	70,500	181,300
Rawlins	( )	Nil	3,500
Riverton	(2)	17,000	133,800
Rock Springs	(23)	207,000	250,000
Sheridan	(2)	33,000	61,005
Total	**(100)**	**$ 1,160,500**	**$ 1,901,193**

COLORADO

Adams Co.	(93)	$ 1,127,500	$ 1,328,810
Alamosa	(2)	21,000	41,560
Arapahoe Co.	( )	No Reply	No Reply
Arvada	(67)	901,000	1,259,766
Aspen	( )	Nil	27,800
Aurora	(59)	680,640	1,243,587
Boulder	(29)	694,710	1,468,890
Boulder Co.	(18)	233,980	395,760
Colordo Sprgs.	(83)	947,936	1,478,700
Cortez	( )	Nil	9,550
Denver	(266)	2,286,055	6,439,650
Durango	(2)	23,760	265,684
El Paso Co.	(32)	471,500	637,481
Englewood	(1)	11,000	90,094
Estes Park	(3)	23,065	274,465
Fort Collins	(43)	449,000	733,721
Fort Morgan	(2)	21,810	40,842
Golden	(6)	51,100	151,600
Grand Jction	(4)	32,500	75,161
Greeley	(95)	619,500	826,723
Jefferson Co.	(395)	3,801,602	4,993,149
La Junta	(1)	3,000	8,370
Lamar	(1)	12,000	76,500
Littleton	(34)	164,100	336,794
Longmont	(21)	239,000	318,660
Loveland	(13)	143,348	1,396,098
Monte Vista	( )	Nil	2,000
Montrose	(4)	49,752	198,970
Pitkin Co.	(3)	53,500	68,000
Pueblo	(23)	243,412	503,144
Pueblo Co.	(7)	37,300	60,300
Sterling	(1)	10,000	32,400
Trinidad	(1)	17,500	48,020
Walsenburg	(1)	4,000	11,000
Westminster	(18)	209,800	242,327
Total	**(1,328)**	**$ 13,584,370**	**$ 25,085,576**

UTAH

American Frk	(6)	$ 64,400	$ 65,690
Bountiful	(19)	287,500	352,605
Brigham City	(16)	190,529	405,529
Cedar City	(1)	28,000	295,400
Clearfield	(4)	31,000	69,700
Davis Co.	(10)	155,658	171,342
Kaysville	(4)	29,130	35,680
Layton	(27)	358,000	377,500
Logan	(7)	113,717	184,624
Murray	(24)	206,000	353,190
Ogden	(16)	401,500	2,217,600
Orem	(20)	210,984	223,076
Price	(1)	15,000	39,000
Provo	(8)	124,000	271,500
Salt Lake City	(21)	492,940	1,838,028
Salt Lake Co.	(220)	2,436,100	3,401,670
S. Salt Lk Cty.	(1)	7,000	175,073
Spanish Fork	(2)	25,000	33,500
Tooele	(10)	128,822	155,359
Utah Co.	(1)	19,280	74,230
Weber Co.	(10)	146,500	148,900
Total	**(428)**	**$ 5,471,060**	**$ 10,889,196**

NEVADA

Boulder City	( )	Nil	$ 5,993
Clark Co.	(164)	$ 2,243,013	2,994,951
Elko	(1)	8,200	36,070
Las Vegas	(146)	1,912,170	2,547,830
N. Las Vegas	(84)	646,822	809,347
Reno	(49)	701,647	1,881,670
Sparks	(19)	268,500	539,633
Washoe Co.	(25)	306,148	668,462
Total	**(488)**	**$ 6,086,500**	**$ 9,483,956**

ARIZONA

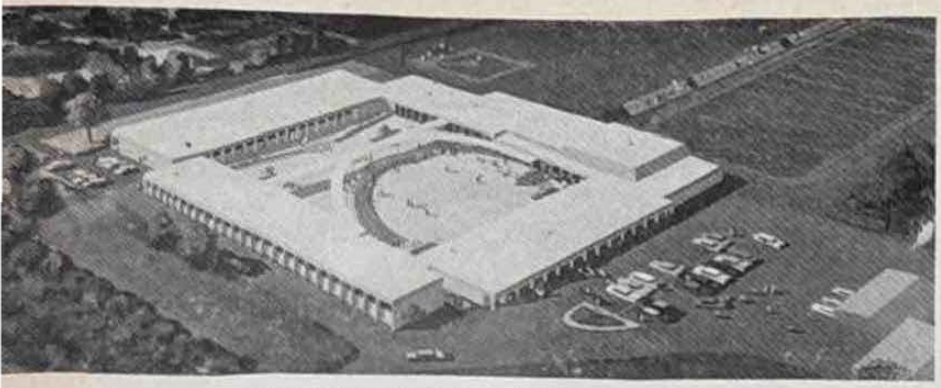
Buckeye	(1)	$ 11,000	$ 32,450
Casa Grande	(2)	16,500	33,100
Chandler	(4)	45,414	56,789
Douglas	(1)	3,500	25,800
Flagstaff	(53)	210,405	674,835
Florence	(1)	9,300	41,825
Glendale	(7)	59,800	814,320
Maricopa Co.	(205)	2,276,097	3,102,843
Mesa	(110)	1,025,362	1,491,229
Phoenix	(533)	4,292,858	10,104,577
Pima Co.	(140)	1,457,253	2,615,811
Prescott	(12)	160,545	220,780
Scottsdale	(91)	789,650	1,912,631
Tempe	(66)	664,663	907,003
Tucson	(122)	1,069,880	2,510,691
Wickenburg	(2)	19,000	26,570
Winslow	(11)	44,600	49,600
Yuma	(8)	66,000	135,540
Total	**(1,369)**	**$ 12,221,827**	**$ 24,756,304**

NEW MEXICO

Alamogordo	(1)	$ 7,000	$ 15,550
Albuquerque	(84)	1,199,732	1,836,947
Artesia	(6)	55,500	79,788
Carlsbad	(13)	166,000	261,200
Clovis	(50)	504,861	682,561
Deming	(5)	52,000	72,800
Farmington	(5)	33,896	395,732
Gallup	(10)	119,428	263,718
Hobbs	(24)	313,752	353,733
Las Cruces	(16)	187,100	199,800
Las Vegas	( )	Nil	5,600
Lovington	(1)	8,000	60,000
Raton	( )	Nil	5,000
Roswell	(64)	635,500	1,373,350
Santa Fe	(27)	327,460	846,163
Silver City	( )	No Reply	No Reply
Truth Or Consequencs	( )	No Reply	No Reply
Tucumcari	(3)	40,000	78,800
Tularosa	(1)	7,488	19,840
Total	**(310)**	**$ 3,657,717**	**$ 6,550,583**

HAWAII

Hawaii Co.	(20)	$ 495,572	$ 711,289
Honolulu	(405)	3,809,519	10,363,927
Maui Co.	(14)	168,174	672,701
Total	**(439)**	**$ 4,473,265**	**$ 11,747,917**
GRAND TOTAL	**(21,573)**	**$254,610,539**	**$470,491,335**



ORCHARD AVENUE JUNIOR HIGH SCHOOL

in Wenatchee, Wash., will house its 28 teaching stations around 200-ft. square open interior court. Containing 74,000 sq. ft., precast concrete structure will cost $1,250,000. Architects: Fraley & Leighton; structural engineers: Lyerla & Peden.



CALIFORNIA MART

will be self-contained "merchandise city" on four-acre block in downtown Los Angeles, with initial construction set for early 1962. Complex estimated to cost $50 million, will include two high-rise display office structures, 16-story hotel, separate bank, luxury motel built around swimming pool patio and auditorium-exhibition hall. Three-level underground parking facilities will be provided for more than 1,500 cars. Architects-engineers: Victor Gruen Associates.



ST. JOHN'S SEMINARY COLLEGE

now underway in Camarillo, Calif., (first phase: dormitories and administration building) employs specially designed concrete block with sandblasted finish to unify entire complex occupying 12 acres on 140-acre site. Chapel is conceived not as dominating structure but as focal point around which all seminary activities will circulate. Thus rectangular plan has been utilized, with side walls formed by series of cross-shaped columns which support vertical section of T-shaped roof beams. Architects-engineers: Albert C. Martin & Associates.

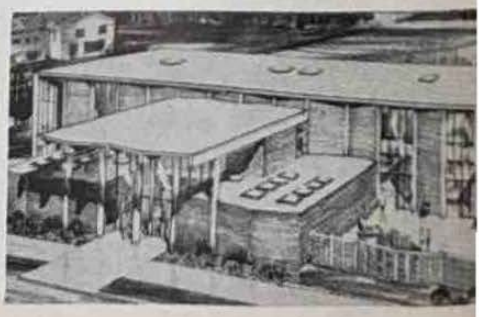


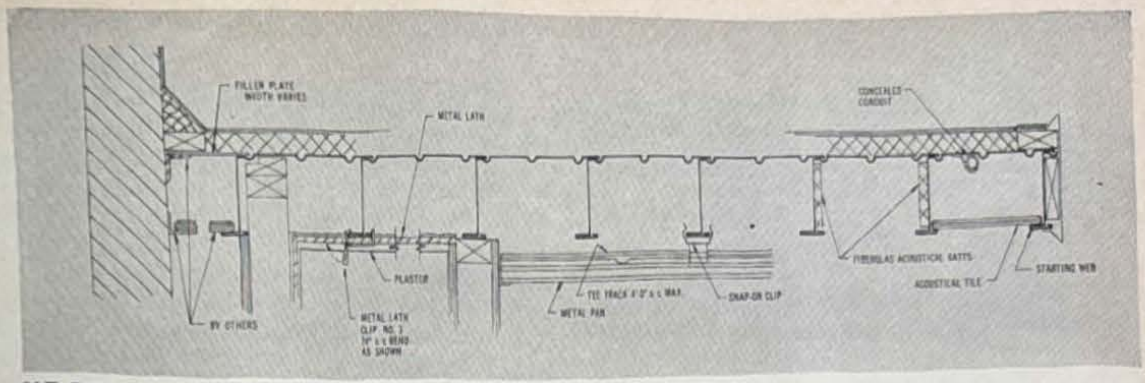
HEADQUARTERS BUILDING

for United States Borax & Chemical Corp. in Los Angeles will be reinforced concrete, nine-story structure with full basement and 300-car parking garage. Exterior columns will be included integrally within sculptured concrete grill design featured on all walls. Architects-engineers: Welton Becket & Associates.

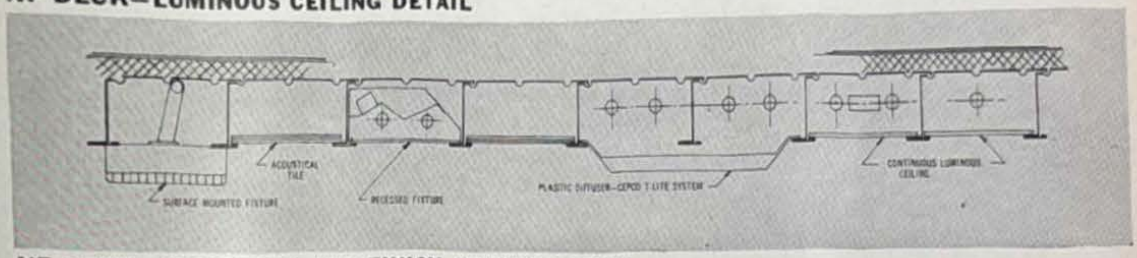
MEMORIAL POOL

proposed for Rainier School at Buckley, site of Washington's largest institution for retarded children, is being promoted in campaign by private citizens who hope to raise estimated construction cost of $221,000. Once completed, reinforced concrete structure will be donated to state. Main pool, 30x60 ft., and wading pool, 12x30 ft., will accommodate up to 190 persons. Present exercise facilities are severely limited and therapeutic value of water activity is heartily endorsed by medical and psychological departments. Architect: Dale D. Pedersen.





NF DECK—LUMINOUS CEILING DETAIL



NF DECK—ACOUSTICAL AND FINISH CEILING DETAIL

A NEW DESIGN DEVELOPMENT FOR WESTERN BUILDING . . .

Mahon-West's 12-inch wide long-span structural section

NF STEEL DECK

*NARROW FLANGE

Here's a structural section that is ready to go to work for you. It has much to recommend it—versatility, economy, a high strength-to-weight ratio, lightweight, easy erection—application-engineered by Mahon for your architectural needs. Mahon NF Deck is available in two types for simple spans to 32 feet; provides high resistance to seismic conditions. For the full story, write for new *Technical Catalog NF-61.*

OTHER MAHON-WEST BUILDING PRODUCTS

- Steel Roof Deck
- M-Floors (steel cellular sub floors)
- Long-Span M-Deck (cellular or open beam)
- Aluminum or Steel Curtain Wall
- Rolling Steel Doors

CONSTRUCTION SERVICES

- Structural Steel—fabrication and erection
- Geodesic Domes—fabrication and erection

MAHON-WEST / *2600 Monterey, Torrance, Calif.*

WESTERN OPERATIONS OF
THE R. C. MAHON COMPANY
Detroit 34, Michigan

Sales-Engineering Offices—San Francisco and Torrance, California and Seattle, Washington Representatives in other principal Western cities

MAHON

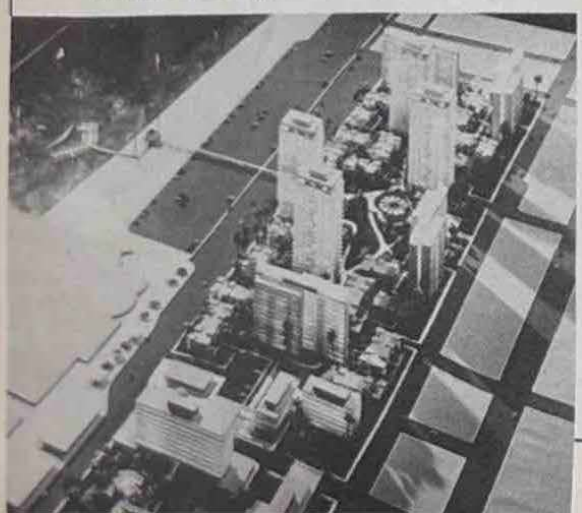
As We Go To Press . . . *Highlights & Sidelights*

THE BUILDING WEST—Permits for the first three quarters of 1961 totaled $4,454,952,154 in the 13 western states, an increase of $187.9 million (4%) over the same period last year. Pacific Architect & Builder's survey shows that California had the largest increase, $159.8 million, followed by Colorado, $50.1 million. Residential building for the first nine months of 1961 shared half the total dollar volume, $2,349,000,000, an increase of $81.6 million (4%) over 1960. California led in this category, chalking up a $74.7 million increase, with Colorado gaining $27.7 million over last year. Industrial-commercial building, at $2,105,000,000, accounted for more than its usual share of the total building volume.

TOP TWENTY-FIVE—Hottest spots in the West for September are the agencies listed here with dollar volume of permits rounded out in millions: **1.** Los Angeles, $51.6; **2.** Los Angeles County, $20.1; **3.** Honolulu, $10.3; **4.** San Jose, $10.2; **5.** Phoenix, $10.1; **6.** San Francisco, $9.9; **7.** King County, Wash., $8.6; **8.** Sacramento, $8.6; **9.** San Diego, $7.8; **10.** Long Beach, $7.6; **11.** Orange County, $7.4; **12.** Orange, Calif., $7; **13.** Denver, $6.4; **14.** Seattle, $6.3; **15.** Sacramento County, $5.7; **16.** Jefferson County, Colo., $4.9; **17.** Costa Mesa, Calif., $4.7; **18.** Ventura County, Calif., $4.5; **19.** San Diego County, $4.5; **20.** San Bernardino County, $4.1; **21.** Portland, $4.1; **22.** Santa Barbara County, $4.1; **23.** Oakland, $3.9; **24.** Riverside County, Calif., $3.5; **25.** Torrance, $3.4.

RESOLVING REDEVELOPMENTS—After more than six months' consideration—clouded by a considerable amount of bickering—of offers of 10 other prospective developers regarding the choice Ocean Park Project, the Santa Monica Redevelopment Agency gave the nod to the Kern County Land Co.-Del E. Webb Corp. team. In so doing, the SMRA upheld the recommendation of the Citizens Progress Committee for Redevelopment, which ranked the scheme prepared by Welton Becket & Associates first on the basis of architectural attractiveness and plan concept. Kern-Webb will erect a $55 million apartment building and commercial community on the eight-block strip of ocean front land, including four 21-story and four 13-story structures. The combine's offer was $5.8 million for the 18-acre residential site and a $103,000 annual lease rental for eight acres of prime commercial property. . . . Commissioners of the Honolulu Redevelopment Agency have appointed a team of consultants to restudy the Kukui Project, which will take four months and cost $55,500—an action which could result in the complete redrawing of the existing plan for the 75-acre slum clearance tract in central Honolulu.

MODEL FORM looking to northwest with Pacific Ocean on left.



CITATIONS FOR CALIFORNIANS—The California Council, AIA, which is winding up its annual convention in Coronado as this issue of PA&B goes to press, has awarded its Distinguished Service Citation to three men and one woman: Charles Dana Gibson, chief of School Planning, State Department of Education; Valley M. Knudsen, chairman of "Los Angeles Beautiful"; William Mooser Sr., San Francisco architect; and Harold L. Zellerbach, San Francisco industrialist and civic leader.

SOME SHEKELS FOR SC—The Olin Foundation, Inc., which has been assisting private colleges and universities throughout the nation for the last decade, has given the University of Southern California $2.2 million for a new engineering teaching and research building—a five-story brick and concrete structure.

NEGOTIATING IN NEVADA—Contracts between architects not registered in Nevada and builders who hire them for construction projects in the state are unenforceable, according to an opinion issued by Atty. Gen. Roger Foley's office. The ruling said the State Board of Architecture has the power to adopt regulations requiring out-of-state architects to qualify and obtain a license before contracting for work in Nevada. Once such a regulation is passed, the opinion held, the board would have the power to stop construction work being performed in Nevada by architects from out of state who have not complied with requirements. The opinion was written in answer to a query by Raymond Hellmann of Reno, secretary-treasurer of the state board, who said the body has had "considerable difficulty" with the registration of out-of-state architects in Nevada.

STATE (of) ARCHITECTURE IN CALIFORNIA—Fruits of a legislative victory won by the California Council, AIA, are finally being harvested as the State College Board of Trustees has assigned private architectural firms as consultants for buildings on these four campuses: Chico, Rockrise & Watson of San Francisco; Humboldt, DeMars & Reay of Berkeley; Sacramento, Dreyfuss & Blackford of Sacramento; Sonoma, John Carl Warnecke & Associates of San Francisco. . . . But the state of California still maintains a big architectural practice. A fiscal 1961-62 building program totaling nearly $106 million has been forecast by Anson Boyd, state architect.

'Vanishing boundaries': Hawaii calls Northwest architects

In the relaxed, tropical atmosphere of Hawaii, members of the Northwest Region, AIA, left their drawing boards the week of September 30-October 5 to gaze and confer philosophically upon our strange new world and to reassess their function and status therein.

Such pauses may well rescue the architect from sinking into the oblivion of conformity in expression and extinction by narrowed function or specialization as he reflects upon the mission of "the architectural profession to assume responsibility for the total man-made environment," as national AIA President Philip Will Jr. expressed it in his concluding address.

Dr. Spoehr: society

To enable conference-goers (total registration, including wives and guests: about 150) to obtain this peripheral perspective of their profession and to identify it with the vital needs of our nation, Dr. Alexander Spoehr, chancellor-designate of the East-West Center at the University of Hawaii and director of the Bishop Museum, opened the proceedings with comments upon "The Vanishing Boundaries of Society."

Dr. Spoehr brought into focus the fields of science and technology, their historically humble beginnings based upon a diversity of human development in the exploration of other civilizations. His audience was left with the challenge of the impending doom of mediocrity and uniformity in cultures, which is logically mirrored in architecture.

Questions raised by the audience in the subsequent seminar brought the panel to a discussion of the need for a greater understanding of human wants by the architect, along with a return to the wellsprings of creativity or local adaptation to functional and regional requirements without any artificial foreign artifacts.

Richard N. Dennis of Honolulu moderated this panel, as he did the other two, in which several architects joined the speaker at the podium.

Griffing: the arts

In an eloquent speech on "Vanishing Boundaries in Art," Robert P. Griffing Jr. exposed the evils of uniformity in this field, which he feels could be applied to architecture and sculpture.

The director of the Honolulu Academy of Arts began by outlining evidences of vanishing boundaries in international art exhibits which, as expressions of "drip-dry techniques, are all alike . . . and a monumental bore." He said he has discovered this same similarity and emphasis upon abstract symbolism from Japan to Milan. Griffing blamed the wealthy American collector, with a mania for contemporary U.S. art, for this odd social phenomenon which has arbitrarily set up the Museum of Modern Art as a model in fashionable circles.

In the Orient, Griffing continued, the resulting curious anomaly finds the artist (in a period when his work is bringing the greatest monetary reward) unable to sell indigenous art in his own country and frustratedly attempting to imitate U.S. abstractionism, which has become so personalized that it is incomprehensible to anyone else. This unhealthy situation has been extended further by U.S. artists who seek to incorporate Asian influence but, with a lack of the historically symbolic oriental discipline, the results are a mishmash of superficial, meaningless imitation.

Fortunately, in this dismal situation, Griffing explained that he finds hopeful signs of the times in the boredom of the international press at these exhibits, a rediscovery of artists who originated abstract symbolism and, in Asia, attempts to reflect upon their own history and culture. He said that when so many people are so monumentally bored, something would have to change and that the way is being paved for new forms away from the "junk" of today, now being relegated to the back seat so that, in a few years, it too will be old hat.



CONFERENCE THREESOME: Hugo Osterman, Seattle Chapter president; Robert L. Durham, Northwest regional director nominee; Gordon L. Bradley, Hawaii Chapter vice president.

Panel members expressed considerable concern over the deadening effect upon the arts of the international welding of monotonous patterns aped by all and hope in the wellsprings of national folk art, which Griffing affirmed can be found if one seeks it. He underlined the fact that the galleries alone are manifesting the uniformity which he deplores in art.

Dr. G. Ecke, curator of oriental art, Honolulu Academy of Arts, was a guest for the seminar.

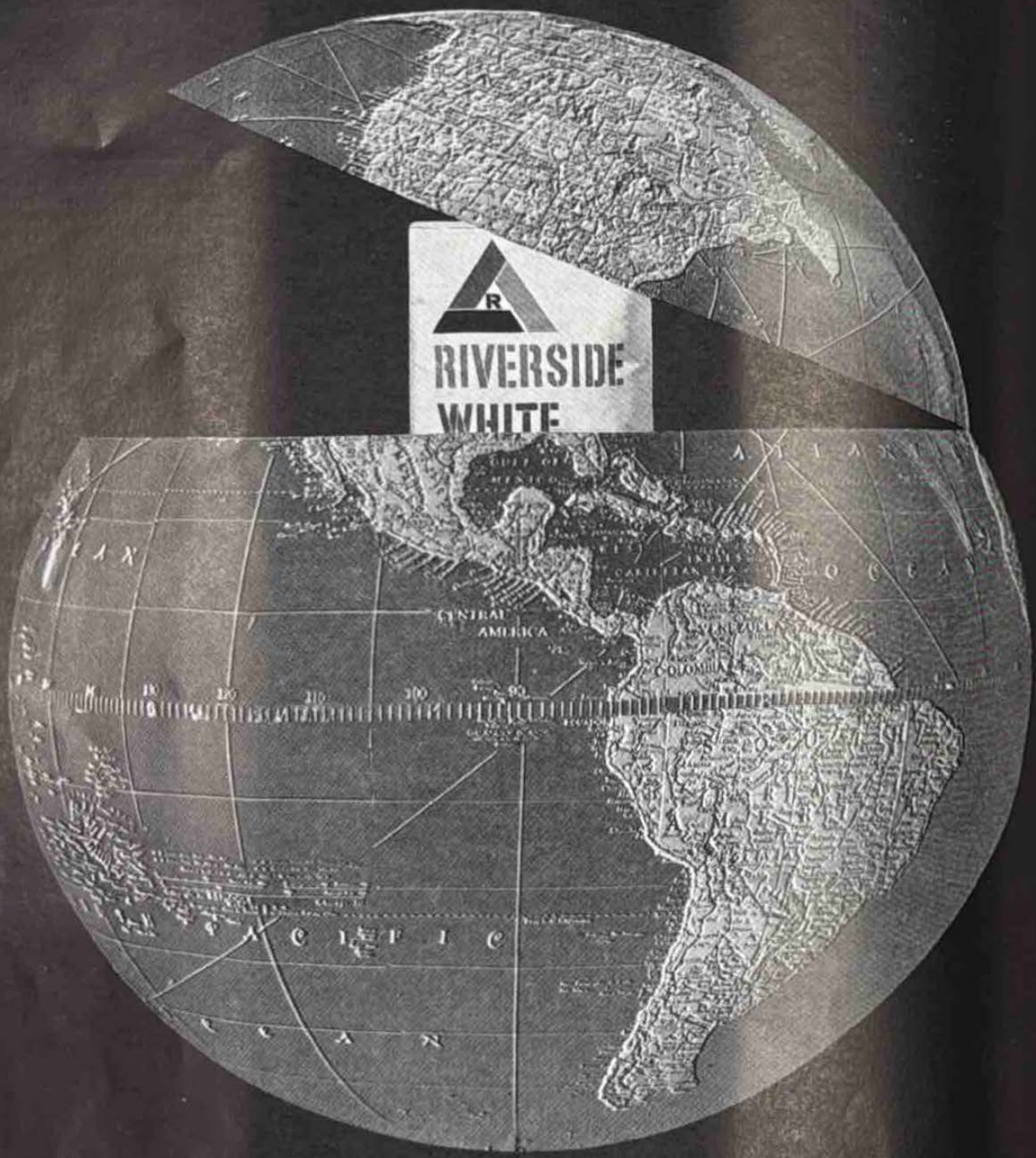
Raymond: architecture

A fellow of the Institute, Antonin Raymond of Tokyo and New York drew from his own laboratory experiences in Japan to speak on "Vanishing Boundaries in Architecture," relating this to professional practice as a whole. He emphasized the isolation of Japan from the rest of the world until the middle of the 19th century and during World War II and the leveling effects of the latter and the 1923 earthquake.

Raymond, who worked with Frank



AT OPENING SESSION: Clifford F. Young, Hawaii Chapter president; James Kealoha, Hawaii's lieutenant governor; Philip Will Jr., national AIA president; Harry Weller, Northwest regional director. Architect Antonin Raymond (insert) arrives from Tokyo to address later session.



Now from the Depths of the Earth Comes a Pure White Cement

The West's only white cement is the purest white you've ever seen. That's because Riverside is the only white cement manufactured from limestone mined deep underground in its **purest** uncontaminated state... purity that also means a **uniformity of color** never before possible. But materials are only half the story: Riverside White is a product of unique modern facilities, the most advanced white cement technology to be found anywhere.

For the architect: Riverside White means a wider range of potential applications—no longer must white cement be reserved only for "showpiece" construction. Now with a dependable source of supply nearby, you can let your imagination go!

For the contractor: Riverside White means an immediate source of uniform white cement with the workability of Riverside grey—and it means immediate technical assistance too.

For the dealer: Riverside White offers the handling convenience of palletized delivery, the reduction of costly inventories, the saving of precious warehouse space.

Now you can design more with white, build more with white!

RIVERSIDE CEMENT COMPANY
2404 Wilshire Boulevard, Los Angeles

Lloyd Wright on the Imperial Hotel in Tokyo, made the interesting aside that the project neither influenced Japanese architecture nor was the master personally influenced by that country's way of life, which he understood in form but did not relate to its source, with the exception of the open plan.

Raymond found a present tendency in Japanese architecture to have an ally during other periods of history. "Periods of revolutionary changes or disintegration of a social order or a state are found throughout the ages to be expressed in architecture by size, enormity, gigantic proportions. Witness in our time Italy under Mussolini, Germany under Hitler, and earlier Rome under the Caesars. In modern Japan the sign of the times is evident and significant. Structures are enormous, relatively to those of former days, and heavy, where economy of means would seem sensible and stolid."

"The architects who design these buildings, and these represent the majority of the younger generation, seem to be carried away by a vision of permanence, solidity, power, enormity of scale as an end in itself. This novel departure—novel since the war—seems to satisfy an inner craving, for it is stronger than reason. When explanations are called for, the arguments in favor have the childish flavor of the neophytes seeking to justify a luminous vision. The gigantic columns are required to support the gigantic beams demanding gigantic foundations and all the details fit into the picture. The handrails on the stairs are not intended for the human grasp."

Will: down-to-earth boundaries

The banquet got underway with a formal indorsement of Robert Law, conference chairman, for the presently vacant position of city planning director for Honolulu. Presiding at the affair was President Will, who at an earlier press conference likened Diamond Head's high-rise structures to "putting a hot dog stand at the foot of the Washington Monument."

The Chicago architect complimented the conference for its theme and commented on our swelling populations, technological advances, including the means to destroy ourselves by thermonuclear blast, and the addresses of the three principal speakers.

"In these times of scientific advances, social retrogression and blurred boundaries," Will declared, "I am not at all sure that I would like an art expression of such confusion and conflict. Perhaps Mr. Griffing will forgive me if I prefer to design in terms of a culture that I can envision, that could but does not yet exist in our hopes and dreams.

"Architect Raymond well illustrates a thesis of Dr. Spoehr's that great civilizations have not risen in complete isolation but that some interchange strengthens and enriches. To this statement we must add many 'ifs, ands and buts,' of course. Callous and indiscriminate importation of aesthetic superficalities is debauching."

Raymond's contention that the gigantism of today portends social disintegration reminded Will of one of Parkinson's laws which says: "It is now known that a perfection of planned layout is achieved only by institutions on the point of collapse." However, Will concluded: "For our professional survival let us hope that all institutions will not reach the conclusion that civilization does best with the temporary and expedient and that the building of fine structures efficient to purpose is the kiss of death."

Advancing on to a familiar theme, Will advocated "the widening of the scope of the practice of architecture or, to put it in terms of this conference, push back the boundaries which circumscribe and confine us to an ever-narrowing field of performance." He deplored the long list of professions now taking over the architect's duties: "Interior designers, product designers, city planners, traffic engineers, process engineers, landscape architects, structural, mechanical, electrical, acoustical engineers, plus a dictionary full of other engineers too numerous to list—and package dealers."

On the latter subject, Will said that although competition cannot be legislated out of business, in a short-range attack on the problem "an architect, with a properly organized team can duplicate on a professional service basis, plus the advantage of competitive bidding, practically all that a package dealer does."

The AIA president went on to ask this question: "Does architecture stop at the lot line? By the most direct course of cold logic all architects, both individually and collectively, must assume responsibility for more than single buildings. We must do what we can, now. Meanwhile, we will look to the preparation of the next generation. Perhaps for them we can remake architecture as the great mother of the arts it once was. Perhaps for them the boundaries will really vanish." —Beatrice M. Howell

'Politics of architecture': Reno hosts Western Mountain AIA

Eighty architects, along with 60 other registrants, convened in Reno September 21-23 to explore "Public Agencies in Community Development: The Politics of Architecture" and to confer awards upon four projects in the annual design program of the Western Mountain Region, AIA.

One of the highlights of the conference was a penetrating statement by M. Justin Herman on work of the San Francisco Redevelopment Agency, currently dealing with four projects which represent very close to a third of a billion dollars in the end product.

"I think the problem is how to make the influence of architects felt through the political system," the SFRA director said. "You know, government is merely a reflection of the American people. We don't get much better government than we want, or deserve, and by and large your government officials are not going to be interested in good architecture or good urban design more than the people are. Now, this doesn't mean to say that every government official who deals with architecture necessarily has to be an expert in it. The hard, cold facts are that the average one can't be, but he has to have some awareness and appreciation of it and he has to have some political push, some drive affecting him that makes him want to do better in this particular field.

"In the Golden Gateway competition," Herman continued, "we undertook not only an architectural competition associated with the sale of land but an intensive program of involving the community in the entire process over perhaps a six- or seven-month period. Now, the important thing, I believe, in this illustration is that because there was such a strong community feeling about how important architectural and urban design considerations were that the political leadership was able to make a decision which tossed aside an extra $3 million."

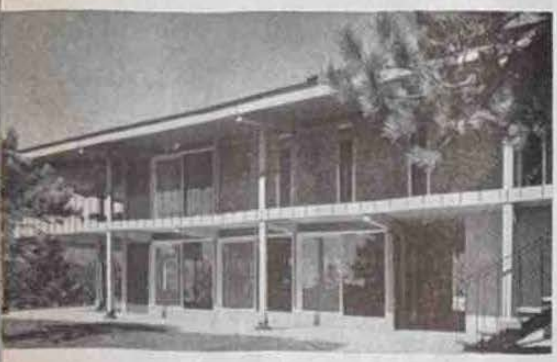
(Further comments by Herman and other speakers will appear later.)

An all-architect jury—George Rockwise, San Francisco; Donald Reay, Berkeley; and Kenneth W. Brooks, Spokane—reviewed 13 entries submitted in the design competition. They gave a First Honor Award to Donald R. Roark for the Professional Office Building (see article on p. 22) and three Honorable Mentions (see next page).

Said juror Brooks: "The design awards committee is to be commended for including in the requirements for submitting entries the provision that the architect comment on how his project was integrated into the sur-

rounding environment. Accompanying photographs were required showing views away from the building. Although the jury found it difficult to appraise this facet of the entries, the members still believed it a very worthwhile requirement because these architects entering will probably give more thought to this part of the problem in the future. In essence we have to think, talk and act in seeing to it that our architecture contributes to the overall attractiveness of our towns and cities."

Honorable Mentions



EISENHOWER GOLF CLUB HOUSE, U. S. Air Force Academy, Colorado Springs, Colo.: Langdon Morris, architect.



JOSEPH F. MERRILL ENGINEERING CENTER, University of Utah, Salt Lake City: Dean L. Gustavson Associates, architects.





EAST EXCHANGE, MOUNTAIN STATES TELEPHONE CO., Albuquerque (for solving problem of literally wrapping new building around old one): Ferguson, Stevens, Mallory & Pearl, architects.

T-SQUARE TALK

new offices, partnerships

Richard H. Dodd has opened an office for the practice of architecture at 316 Westcliff Bldg., 2043 Westcliff Drive, Newport Beach, Calif. A graduate of the University of California, he was formerly an associate in the firm of J. Herbert Brownell.

John B. Rogers and Jerome K. Nagel, Denver architects, have organized the firm of Rogers-Nagel and have named Edward A. Divelbiss and John C. Burrey as associates. The partners are in new offices at 434 Symes Bldg.

Eugene architects Wilmsen, Endicott & Unthank have opened a Portland office in Suite 801, Standard Insurance Bldg., 812 S.W. Washington St., with Gary L. Michael in charge.

William G. Heinzman and Robert W. Kindig have formed an architectural partnership known as Heinzman & Kindig with offices in the Colorado Insurance Group Building, Boulder, Colo. Heinzman formerly was associated with James M. Hunter & Associates as partner in charge of design; Kindig, who is consulting partner in the new firm, is an associate professor at the University of Colorado.

G. Stacey Bennett has opened an office for the general practice of architecture in the Union Avenue Building, Olympia. For 15 years he had been associated with the firm of Robert H. Wohleb & Associates, formerly Wohleb & Wohleb.

firm changes

The architectural firm of Montierth & Strickland, Westminster, Calif., has been dissolved, with each partner now in business for himself. Jack J. Strickland continues to practice at 7061 Westminster Ave., while George Montierth maintains his office at 4313 E. Seventh St., Long Beach.

The Boise architectural firm of Wayland & Cline is now known as Wayland, Cline & Smull, with the addition of Neil H. Smull as a partner. Other principals are C. V. Wayland and Glen E. Cline.

deaths

Fred A. Brinkman, 69, head of the Kalispell architectural - engineering firm of Brinkman & Lenon which he established in 1920, died suddenly October 8. A graduate of the University of Michigan, he was a member of the Board of Architectural Examiners and the Montana Chapter, AIA. His firm was particularly active in school construction, designing many of the buildings on the campus of Montana State University.

San Diego architect Edward G. Holliday, 70, died August 8 following a heart attack. He left a long-time practice in South Texas to establish his California office in 1949. Among his recent projects: First Presbyterian Church, El Centro, and the south chapel, St. Paul's Episcopal Church, San Diego.

new partners

William J. Bain Jr. has been named as a partner in the Seattle architectural firm of Naramore, Bain, Brady & Johanson. With the firm since 1955, he is the son of one of the four original partners and a graduate of Cornell University.

new addresses

Rumont William Hougan, architect, to Suite 7, 3500 E. Coast Highway, Corona del Mar, Calif.

William A. Trimble, architect, to 408 Marion St., Seattle, where he occupies the offices of the late William Aitken, whose files and tracings remain at this location.

Mayo, deWolf & Associates, architects, to 1010 Doyle Bldg., Menlo Park, Calif. (the firm's Stockton office continues).

James Mount, architect, to 2452 Wilshire Blvd., Santa Monica, Calif.

John S. Roel, architect, to 2385 San Diego Ave., San Diego.

elections, appointments

Washington State Council of Architects has elected Charles T. Pearson, Tacoma, president; Richard H. Eddy, Spokane, vice president; and Aaron D. Freed, Seattle, secretary-treasurer.

Alaska Chapter, AIA, which will become the 138th in the Institute when it is formally approved by the Octagon, has named this initial slate of officers: Linn Forrest Sr., Juneau, president; Wayne White, Fairbanks, vice president; Joyce Stevens, Anchorage, treasurer. Completing the executive board will be William Manley, Anchorage, and Edward Sands, Juneau, directors.

✔ Grover Starr has returned to his alma mater, Walla Walla College at College Place, Wash., as campus architect. Holding a degree in engineering, he had two years of additional work at the School of Architecture, University of Southern California, and was associated with Neptune & Thomas, Pasadena architects, since 1957.

✔ Harold Marks, former Los Angeles County administrative civil engineer, has been named head of the traffic and transportation division of Victor Gruen Associates, Beverly Hills architectural-planning-engineering firm.

✔ Washington's State Art Commission, which finally held its first meeting in October, has two architects among its appointees: Robert W. Evans of Tacoma and Kenneth W. Brooks of Spokane.

✔ The architectural jury for the nationwide two-stage competition to select an architect for Boston's new city hall will include San Francisco's William W. Wurster.

✔ Gerald D. Sorenson, architect and civil engineer, has joined the staff of Burge, Kober & Nicolais, Los Angeles architectural - engineering firm. For the past six years he was affiliated with Brandow & Johnston, structural engineering firm.

AIA HONOR AWARDS

November 14 is the fee deadline for the AIA's 14th annual program of national Honor Awards for any building in the U.S. or abroad, completed since January 1, 1957. Submissions must be received by the Octagon not later than January 19.

retirements

✔ Arthur P. Herrman will retire as dean of the College of Architecture and Urban Planning at the University of Washington next September but will continue in a teaching capacity. A faculty member since 1923, Herrman became director of the School of Architecture in 1938 and dean when the present college was formed in 1957. A faculty committee headed by Provost Frederick P. Thieme will seek a successor. Other members are Solomon Katz, Boyer Gonzales, Myer R. Wolfe and Daniel M. Streissguth.

honors

✔ Winners in the latest Northern California Chapter, AIA - Bonanza House of the Month competition are Wurster, Bernardi & Emmons, Randall House, Santa Cruz, and Hudson House, Aptos Beach; Marquis & Stoller, Green-Johnson House, Mill Valley; Morton Rader, Pennell House, Berkeley; and Germano Milono, Saunders House, Yuba City.

✔ Los Angeles architect Benjamin P. Urmston has been picked as one of 10 winners in an international contest conducted by Onan Division of Studebaker-Packard Corp. to uncover practical applications that have never been used for electric generating plants.

miscellany

✔ As part of its highly successful public relations program, the Consulting Engineers Association of Oregon is sponsoring the third annual Citizen Leadership Awards contest for state newspapers (Portland dailies excluded) which did the most to promote public improvement projects in 1961.

✔ Compilation of a statewide building industry buying guide has been proposed by the Montana Chapter, AIA, reports W. R. Ostheimer of Helena, research committee chairman. The plan is to list only manufacturers in the state by resident distributors or sales personnel.

1/25TH of the WEIGHT



NEW CARAM-MIRACLE NEOPRENE-HYPALON* ROOFING SYSTEM WEIGHS 1/25TH THAT OF A CONVENTIONAL "BUILT-UP" ROOF... INSURES PROTECTION, GIVES LASTING BEAUTY

- *Variety of Colors*
- *Flame Resistance*
- *Abrasion Resistance*
- *Versatility*
- *Cold Application*
- *Permanent Elasticity*
- *Excellent Weatherability*

New Caram-Miracle Elastomeric roofing system is the only solution to some architectural problems . . . and the best solution for many others. Weighing only 1/25th as much as conventional materials the Caram-Miracle system provides excellent weatherability against all elements and climates. It retains its elasticity and is virtually maintenance free. The Caram-Miracle system is easily applied to flat, steeply pitched or curved roofs.

WRITE FOR FREE BROCHURE

CARAM

CARAM PRODUCTS COMPANY

520 East Evergreen Avenue • Monrovia, California

* DuPont Trademark

rounding environment. Accompanying photographs were required showing views away from the building. Although the jury found it difficult to appraise this facet of the entries, the members still believed it a very worthwhile requirement because these architects entering will probably give more thought to this part of the problem in the future. In essence we have to think, talk and act in seeing to it that our architecture contributes to the overall attractiveness of our towns and cities."

Honorable Mentions



EISENHOWER GOLF CLUB HOUSE, U. S. Air Force Academy, Colorado Springs, Colo.: Langdon Morris, architect.



JOSEPH F. MERRILL ENGINEERING CENTER, University of Utah, Salt Lake City: Dean L. Gustavson Associates, architects.





EAST EXCHANGE, MOUNTAIN STATES TELEPHONE CO., Albuquerque (for solving problem of literally wrapping new building around old one): Ferguson, Stevens, Mallory & Pearl, architects.

T-SQUARE TALK

new offices, partnerships

Richard H. Dodd has opened an office for the practice of architecture at 316 Westcliff Bldg., 2043 Westcliff Drive, Newport Beach, Calif. A graduate of the University of California, he was formerly an associate in the firm of J. Herbert Brownell.

John B. Rogers and Jerome K. Nagel, Denver architects, have organized the firm of Rogers-Nagel and have named Edward A. Divelbiss and John C. Burrey as associates. The partners are in new offices at 434 Symes Bldg.

Eugene architects Wilmsen, Endicott & Unthank have opened a Portland office in Suite 801, Standard Insurance Bldg., 812 S.W. Washington St., with Gary L. Michael in charge.

William G. Heinzman and Robert W. Kindig have formed an architectural partnership known as Heinzman & Kindig with offices in the Colorado Insurance Group Building, Boulder, Colo. Heinzman formerly was associated with James M. Hunter & Associates as partner in charge of design; Kindig, who is consulting partner in the new firm, is an associate professor at the University of Colorado.

G. Stacey Bennett has opened an office for the general practice of architecture in the Union Avenue Building, Olympia. For 15 years he had been associated with the firm of Robert H. Wohleb & Associates, formerly Wohleb & Wohleb.

firm changes

The architectural firm of Montierth & Strickland, Westminster, Calif., has been dissolved, with each partner now in business for himself. Jack J. Strickland continues to practice at 7061 Westminster Ave., while George Montierth maintains his office at 4313 E. Seventh St., Long Beach.

The Boise architectural firm of Wayland & Cline is now known as Wayland, Cline & Smull, with the addition of Neil H. Smull as a partner. Other principals are C. V. Wayland and Glen E. Cline.

deaths

Fred A. Brinkman, 69, head of the Kalispell architectural - engineering firm of Brinkman & Lenon which he established in 1920, died suddenly October 8. A graduate of the University of Michigan, he was a member of the Board of Architectural Examiners and the Montana Chapter, AIA. His firm was particularly active in school construction, designing many of the buildings on the campus of Montana State University.

San Diego architect Edward G. Holliday, 70, died August 8 following a heart attack. He left a long-time practice in South Texas to establish his California office in 1949. Among his recent projects: First Presbyterian Church, El Centro, and the south chapel, St. Paul's Episcopal Church, San Diego.

new partners

William J. Bain Jr. has been named as a partner in the Seattle architectural firm of Naramore, Bain, Brady & Johanson. With the firm since 1955, he is the son of one of the four original partners and a graduate of Cornell University.

new addresses

Rumont William Hougan, architect, to Suite 7, 3500 E. Coast Highway, Corona del Mar, Calif.

William A. Trimble, architect, to 408 Marion St., Seattle, where he occupies the offices of the late William Aitken, whose files and tracings remain at this location.

Mayo, deWolf & Associates, architects, to 1010 Doyle Bldg., Menlo Park, Calif. (the firm's Stockton office continues).

James Mount, architect, to 2452 Wilshire Blvd., Santa Monica, Calif.

John S. Roel, architect, to 2385 San Diego Ave., San Diego.

elections, appointments

Washington State Council of Architects has elected Charles T. Pearson, Tacoma, president; Richard H. Eddy, Spokane, vice president; and Aaron D. Freed, Seattle, secretary-treasurer.

Alaska Chapter, AIA, which will become the 138th in the Institute when it is formally approved by the Octagon, has named this initial slate of officers: Linn Forrest Sr., Juneau, president; Wayne White, Fairbanks, vice president; Joyce Stevens, Anchorage, treasurer. Completing the executive board will be William Manley, Anchorage, and Edward Sands, Juneau, directors.

Grover Starr has returned to his alma mater, Walla Walla College at College Place, Wash., as campus architect. Holding a degree in engineering, he had two years of additional work at the School of Architecture, University of Southern California, and was associated with Neptune & Thomas, Pasadena architects, since 1957.

Harold Marks, former Los Angeles County administrative civil engineer, has been named head of the traffic and transportation division of Victor Gruen Associates, Beverly Hills architectural-planning-engineering firm.

Washington's State Art Commission, which finally held its first meeting in October, has two architects among its appointees: Robert W. Evans of Tacoma and Kenneth W. Brooks of Spokane.

The architectural jury for the nationwide two-stage competition to select an architect for Boston's new city hall will include San Francisco's William W. Wurster.

Gerald D. Sorenson, architect and civil engineer, has joined the staff of Burge, Kober & Nicolais, Los Angeles architectural - engineering firm. For the past six years he was affiliated with Brandow & Johnston, structural engineering firm.

AIA HONOR AWARDS

November 14 is the fee deadline for the AIA's 14th annual program of national Honor Awards for any building in the U.S. or abroad, completed since January 1, 1957. Submissions must be received by the Octagon not later than January 19.

retirements

Arthur P. Herrman will retire as dean of the College of Architecture and Urban Planning at the University of Washington next September but will continue in a teaching capacity. A faculty member since 1923, Herrman became director of the School of Architecture in 1938 and dean when the present college was formed in 1957. A faculty committee headed by Provost Frederick P. Thieme will seek a successor. Other members are Solomon Katz, Boyer Gonzales, Myer R. Wolfe and Daniel M. Streissguth.

honors

Winners in the latest Northern California Chapter, AIA - Bonanza House of the Month competition are Wurster, Bernardi & Emmons, Randall House, Santa Cruz, and Hudson House, Aptos Beach; Marquis & Stoller, Green-Johnson House, Mill Valley; Morton Rader, Pennell House, Berkeley; and Germano Milono, Saunders House, Yuba City.

Los Angeles architect Benjamin P. Urmston has been picked as one of 10 winners in an international contest conducted by Onan Division of Studebaker-Packard Corp. to uncover practical applications that have never been used for electric generating plants.

miscellany

As part of its highly successful public relations program, the Consulting Engineers Association of Oregon is sponsoring the third annual Citizen Leadership Awards contest for state newspapers (Portland dailies excluded) which did the most to promote public improvement projects in 1961.

Compilation of a statewide building industry buying guide has been proposed by the Montana Chapter, AIA, reports W. R. Ostheimer of Helena, research committee chairman. The plan is to list only manufacturers in the state by resident distributors or sales personnel.

1/25TH of the WEIGHT



NEW CARAM-MIRACLE NEOPRENE-HYPALON* ROOFING SYSTEM WEIGHS 1/25TH THAT OF A CONVENTIONAL "BUILT-UP" ROOF... INSURES PROTECTION, GIVES LASTING BEAUTY

- Variety of Colors
- Flame Resistance
- Abrasion Resistance
- Versatility
- Cold Application
- Permanent Elasticity
- Excellent Weatherability

New Caram-Miracle Elastomeric roofing system is the only solution to some architectural problems . . . and the best solution for many others. Weighing only 1/25th as much as conventional materials the Caram-Miracle system provides excellent weatherability against all elements and climates. It retains its elasticity and is virtually maintenance free. The Caram-Miracle system is easily applied to flat, steeply pitched or curved roofs.

WRITE FOR FREE BROCHURE

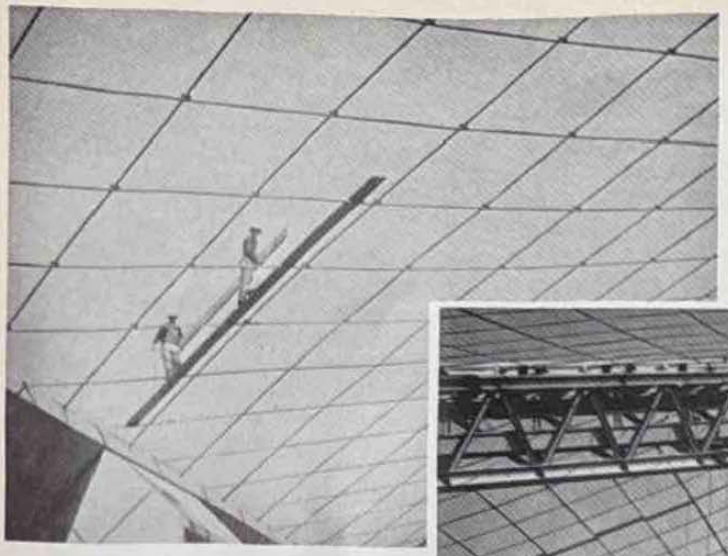
CARAM

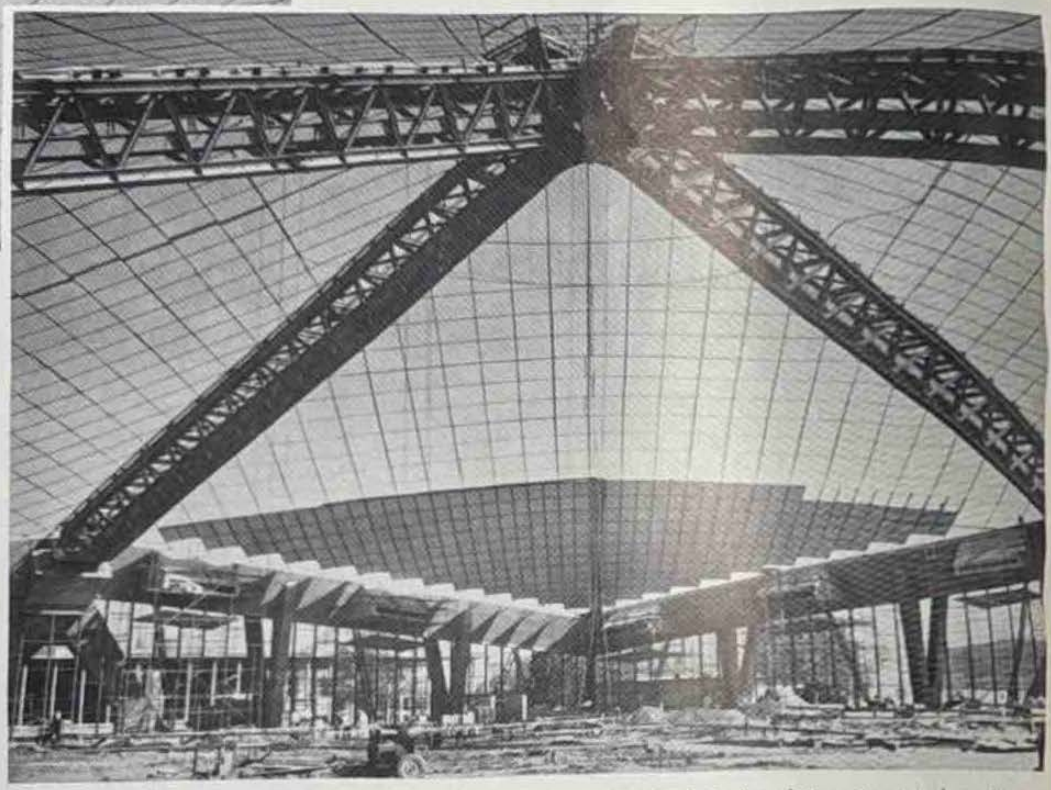
CARAM PRODUCTS COMPANY

520 East Evergreen Avenue • Monrovia, California

* DuPont Trademark

Progress Report No. 2: Seattle World's Fair





CENTURY 21 COLISEUM • Paul Thiry, architect; Peter H. Hostmark & Associates, structural engineers; Howard S. Wright Construction Co., general contractor.

PA&B staff photos



PERIMETER EXHIBIT BUILDINGS • Paul Thiry, architect; Peter H. Hostmark & Associates, structural engineers; Dahlgren Construction Co., general contractor.

When France completed negotiations in October to become the leading exhibitor among at least 35 nations of the world, Dr. Pierre Piganiol, commissioner general-designate for that country's national participation visited the site. "It is a fair striking in its unusual architecture," he observed. "You also are much further advanced in your construction than was Brussels at the same time in progress." Some of the projects the Frenchman saw:

CENTURY 21 COLISEUM • Bunched strands of cables form a pattern of squares across the 156,000-sq. ft. dome of the theme building. Sandwich panels (interior and exterior skins of aluminum on an insulating core) are clipped to the cables to form a unique roof.

PERIMETER EXHIBIT BUILDINGS • Surrounding the Coliseum is 94,200 sq. ft. of exhibit space in clear-span structures of concrete columns and end walls topped with steel truss and roof systems.



EXHIBIT-BANQUET HALL • Kirk, Wallace, McKinley & Associates, architects; Worthington, Skilling, Helle & Jackson, structural engineers; General Construction Co., general contractor.



BELL TELEPHONE EXHIBIT BUILDING • Raymond Loewy/William Snaith, Inc., designers, in association with John Graham & Co., architects-engineers; Jentoft & Forbes, general contractors.

EXHIBIT-BANQUET HALL • Although many of the principal buildings are of precast, prebuilt components, here is a conventional structure with a concrete roof poured in place and masons busy on scaffolds laying face brick filler walls.

BELL TELEPHONE EXHIBIT BUILDING • All is not steel and concrete at the fair, either. Here is one of the larger structures framed entirely in glued laminated Douglas fir.

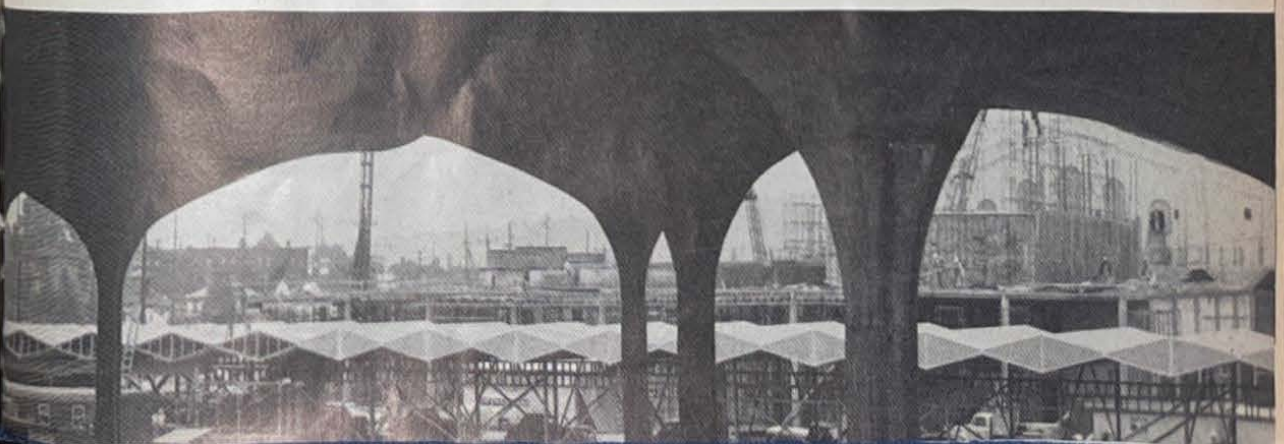
EXHIBIT BUILDINGS NO. 1, 2, 3 • Name a roof shape and you'll find it at the fair, plus a few dreamed up for the occasion. In the distance under the foreground umbrella of parabs is a box beam shelter.

SPACE NEEDLE • Old Chief Seattle, in Tillicum Place, seems to lend a helping hand as contractors top out the core shaft of the all-steel tower. Platform for a revolving restaurant will be at this 500-ft. level.



SPACE NEEDLE • John Graham & Co., architects-engineers; Howard S. Wright Construction Co., general contractor; Pacific Car & Foundry Co., steel fabricator and erector.

EXHIBIT BUILDINGS NO. 1, 2, 3 • Walker & McGough, architects; Worthington, Skilling, Helle & Jackson, structural engineers; Sound Construction & Engineering Co., general contractor.





PRECAST CONCRETE SPANDRELS produced locally from sand molds prepared by artist James Bartell are secured to flat slab with clips and positioned between aluminum mullions. Sculptured panels extend along entire west elevation (photo across page). Note handsome plaques executed by Oregon Brass Works.



SCULPTURE in courthouse square is by Tom Hardy.

Handsome neighbor joins the courthouse square

Design and build an aesthetically successful nucleus and it will attract buildings of equal stature, compelling, demanding by the very nature of its being there that just any stereotyped structure will not do. Eugene's civic center area with its new courthouse and meeting hall and rejuvenated park blocks (PA&B, Apr. '60) laid down just that sort of a challenge, for both the government buildings to come later and any commercial structures to go up on its periphery. Here in this branch bank is a fine example of the challenge picked up and fielded with taste. No doubt selection of the courthouse architectural firm to design the bank played its part in ensuring a project that would complement the over-all development. But the very existence of the courthouse square in its dressed-up form deserves its share of the credit.

Tom Burns Jr. photos

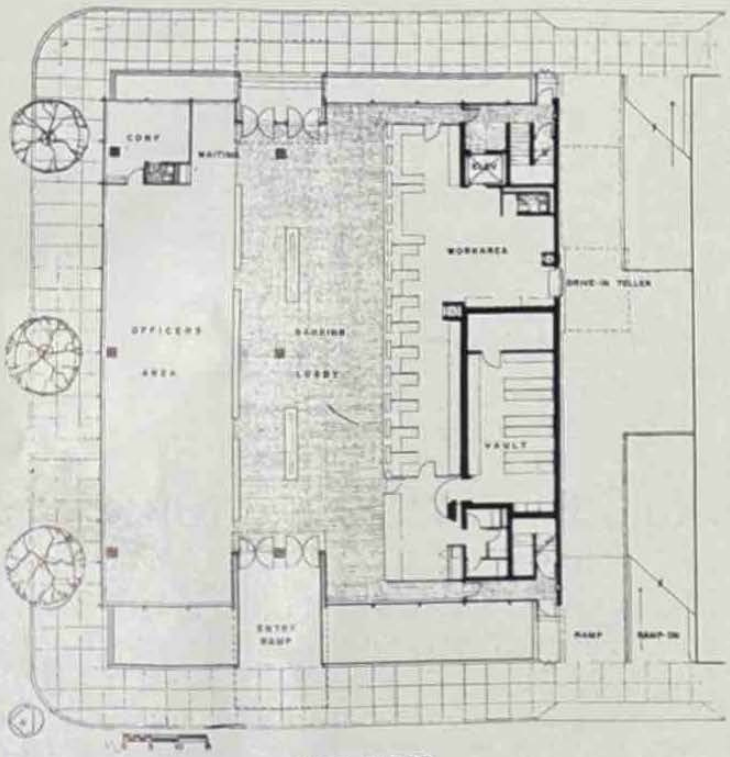


Eugene Branch, United States National Bank of Portland

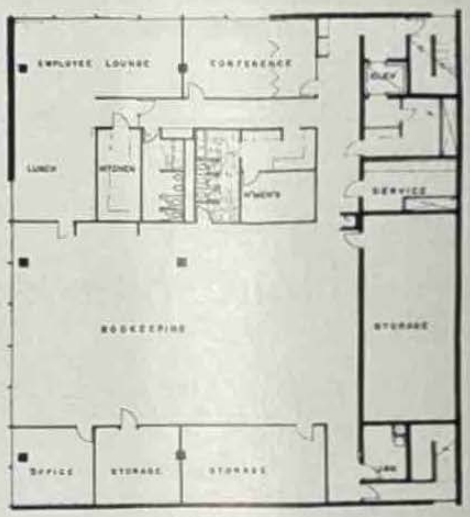
WILMSEN, ENDICOTT & UNTHANK
Architects

WILLIAM W. WILSON
Structural Engineer

GALE M. ROBERTS CO.
General Contractor



MAIN FLOOR



SECOND FLOOR

DRIVE-UP WINDOW for automotive banking is provided alongside ramps down to parking level at right.





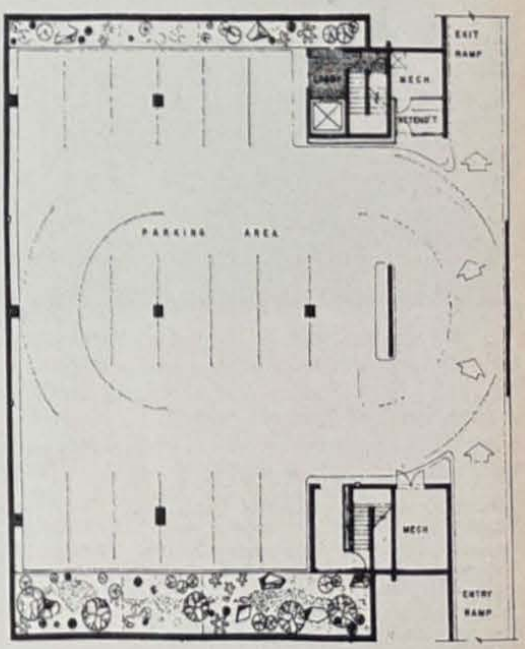
CURSE OF BASEMENT PARKING is removed by green foliage and sunlight which filters down.

THE SITE, overlooking the park block, was a natural for large expanses of glass, taking full advantage of the landscaping and fountains. Sculptured exterior panels and a liberal sprinkling of artwork—principally a large painting by David McCosh which hangs in the lobby—tie the building to the civic center development but allow the bank an individuality of its own.

Structure is set back to permit light and air wells down to the basement parking level. Out of these wells rises landscaping to shield the windows from the east and west sun and to soften the appearance of the concrete, glass and aluminum on the exterior. At the same time the glass box display of the banking operation relieves the institutional aspect, as do the tasteful walnut counters, fixtures and officers' desks.

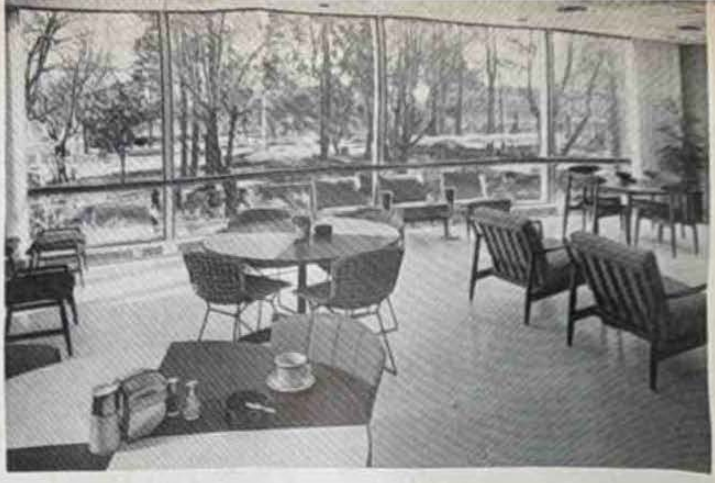
Banking level accommodates 12 teller windows, officers' area with its orange-rust carpeting, conference room and vault; second floor has accounting and proofing, storage, employee lounge and cafeteria (available for public meetings) and conference room. Hydraulic elevators serves all three levels.

Interior decorator was Lila J. Colwell; landscape architect, William G. Teufel, mechanical-electrical engineers, Marquess & Marquess.



PARKING LEVEL

EUGENE BRANCH BANK



EMPLOYEES LOUNGE and adjoining conference room are furnished with Herman Miller and Knoll furniture, look out on courthouse square.

DOUGLAS FIR PANELING and western red cedar are used considerably in public areas and conference rooms to point up area's No. 1 industry: wood product manufacturing. Lobby floor is white ceramic mosaic tile. Counters and fixtures are walnut.



OUTLINE SPECIFICATIONS

Structure: reinforced concrete waffle flat slab.

Exterior Finish: precast concrete panels designed by James Bartell and aggregate block—Willamette-Graystone, Inc.

Roof Surfacing: 20-year asbestos with pea gravel topping—(Pabco) Fibreboard Paper Products Corp.

Windows and Mullions: aluminum—Fentron Industries, Inc.

Doors: entrance: aluminum; interior: flush panel walnut veneer.

Floor Surfacing: white ceramic tile in lobby; vinyl asbestos and vinyl tile—Robbins Flooring Co.; carpeting in office areas.

Interior Finish: vinyl fabric, Douglas fir 1x4 paneling, western red cedar and plaster on steel studs; ceramic mosaic tile in toilet rooms.

Ceilings: acoustical tile suspended in aluminum T-bar system — (Minaboard) Armstrong Cork Co.

Lighting: luminous ceiling with fluorescent fixtures — Luminous Ceiling, Inc., Globe Lighting Products, Inc., Gotham Lighting Corp.

Heating and Air Conditioning: steam furnished by City Central Heat to heat exchanges for hot water supply; electronic air filters; reciprocating compressors—Trane Co.; electrical controls—Minneapolis Honeywell Regulator Co.

Plumbing: American-Standard.

Total Area: 28,128 sq. ft. (basement, 12,528 sq. ft.; main and second floors, 7,800 sq. ft. each).

Total Cost: $417,748 (including bank fixtures and landscaping).

Date of Completion: January 1961.

A digest of the keynote address presented before the 1961 National Joint Conference on Church Architecture in Pittsburgh

Monstrosities, monuments and models

by Rev. Dr. THEOPHILUS TAYLOR

ONE of the notable paradoxes of our time is that, for an institution which until the Renaissance had been justifiably recognized as a patron of the arts, the church has erected a higher proportion of monuments and monstrosities to house its life and activities than any other comparable institution in society. Nowhere on earth is this paradox thrown into sharper focus than on the American scene.

When I refer to *monuments* and *monstrosities* I mean, on the one hand, funerary memorials erected to commemorate for succeeding generations the life and contributions of someone or something that once existed but which since has become defunct; and on the other hand, edifices that are monstrous in their failure to be guided by the canons of beauty, honest construction, usefulness or anything else.

While this might have been expected in the Protestant sector of the church where Puritan iconoclasm has held sway since the English Reformation, it is no less apparent in Roman Catholicism, but for different reasons.

In Protestantism the revolt against tradition at the time of the Reformation was primarily theological, being directed at the stifling in the medieval church of its creative and self-renewing genius by an overemphasis upon the authority of tradition. In the Roman sector of the church the reaction against the Protestant revolt, in the Counter Reformation, produced a hardening and solidifying of the element of tradition.

The result was that creativity freed from the restrictions of tradition went beserk in the Protestant tradition. Like an unchecked, flagrant and cancerous multiplication of cells, it left the orderly influences of tradition behind. At the same time the Roman Church became more deeply entrenched in its tradition and like the development of a callus in defense against irritation, it shut itself off from the incentives and inspiration which imagination and adventure produce.

The architectural expression of this bifurcation may be seen in that, to all intents and purposes, when it came to the erection of church buildings, the motto, "Anything will do!" was accepted by the Protestants and the slogan, "What was good enough for Paul and Silas is good enough for me," was adopted by the Church of Rome.

Now admittedly this is an exaggerated generalization. "All generalizations are false, including this one." There have been some "monstrosities" on Rome's side of the fence and some "monuments" on the Protestant side, but Protestantism has certainly excelled in monstrosities, while Rome has led the way in the erection of monuments.

At the same time there has been some relatively good architecture in both camps. But there have been far too many monstrosities and monuments on both sides of the house and not enough good churches on either side (see "Photo Editorial" on p. 26).

Is there such a thing as a *model* church? It is my conviction that there is. One cannot point to a particular church building that stands on a given site and say, "That is a model church," if by this we mean that it could be copied cold by other congregations in different places and in each of those locations it would still be a model church. On the other hand, it is a model church for the particular congregation that built it and in its given location. No particular church building can be taken as a model in the sense that it could be slavishly copied for another congregation in an entirely different situation. Good churches cannot be turned out on an assembly line.

The architectural considerations which ought to play a significant part in the development of a model church building would certainly include the following:

1. *The church building should be functional without being merely "a religious factory."* A church must serve the various purposes of the congregation as it understands them in its immediate situation.

But there is a function which the church building itself fulfills. It ought to speak for itself. One should not have to be told that a new structure on the local landscape is a church. Obviously a building intended for church purposes should not look like a post office, a state capitol, a railway station or a theater, yet our native land is pockmarked with such miscarriages of architectural judgment and they do not all belong to the past. It takes more than a cross applied superficially somewhere to the exterior of a building to make it a church.

Students in one of our California seminaries commonly refer to one style of church building, apparently inspired jointly by the ranch house and the supermarket, as "the Save-Way school of church architecture," so designated for its close resemblance to a chain of supermarkets. It is shaped like a roller-skating rink or a "Bowlerama," snuggled up close to a brick pylon of United-Nations-building type which in turn bears a "steel-age" cross made of an angle iron of I-beams.

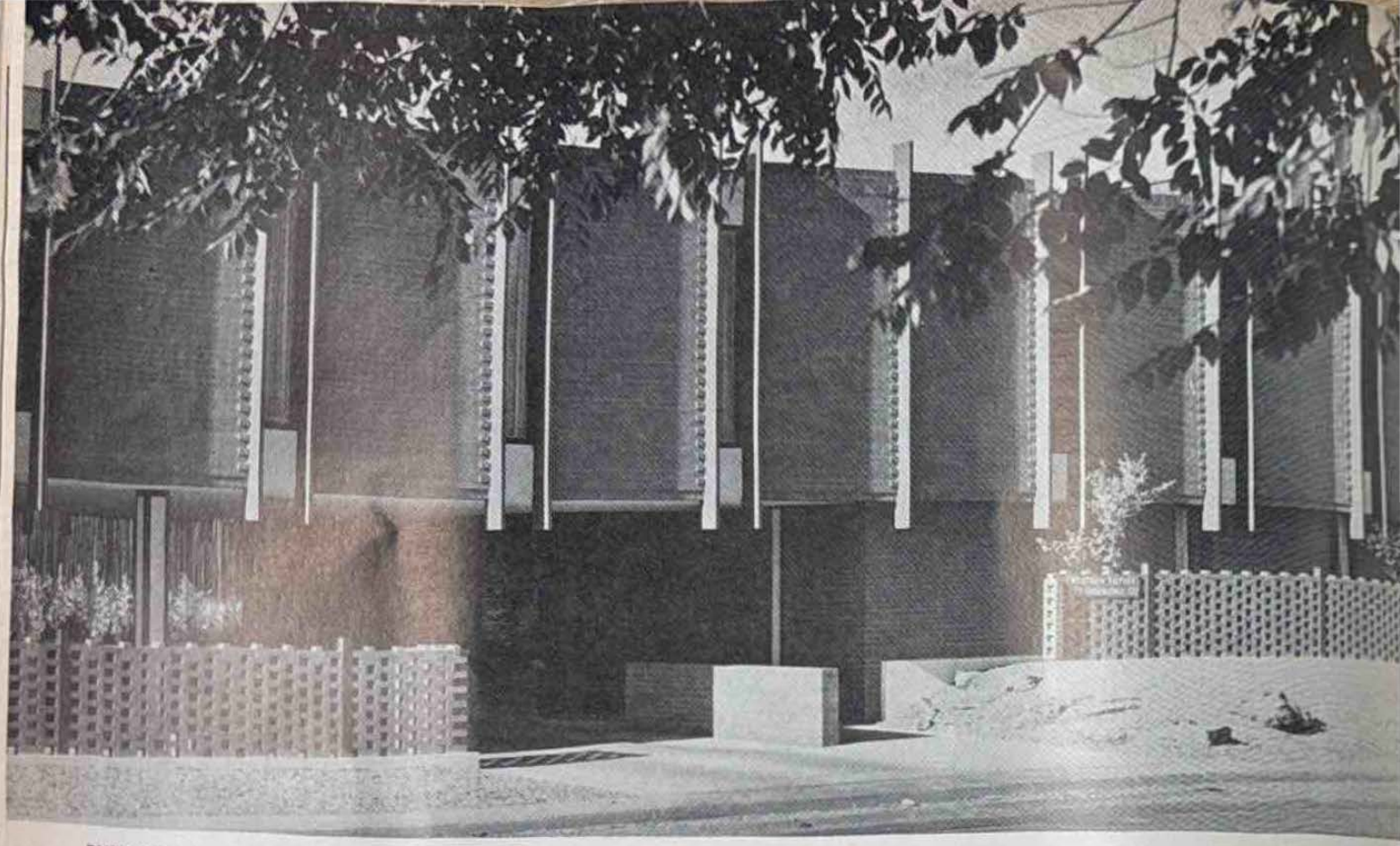
2. *The church building should be substantial and stable without permanence.* The pilgrim nature of the church and the theological considerations of Christian stewardship, together with the effects of rapid social change and the increasing speed with which buildings reach architectural obsolescence, all favor this position. Ecumenical Press Service, over a recent London dateline, reported that the Church of England finds 370 parish churches are presently not being used for regular public worship and that in the next 15 to 20 years about 420 more will fall into disuse. It is probable that the average life expectancy of the American church building does not much exceed 50 years.

3. *The church building should be pleasing and attractive.* One can, of course, worship God, hear and study His word, and have fellowship with one's Christian brethren anywhere.

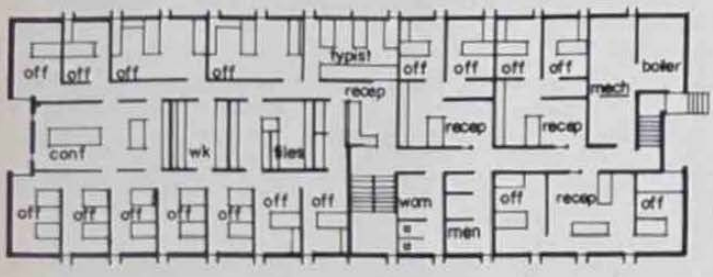
Sir Basil Spence, the British architect who has proposed a design for the new Coventry Cathedral to replace the one blitzed into rubble during the Second World War, reports that he has received upwards of 700 letters regarding his proposal. "Eighty per cent were rude; the other 20% were very rude," he declared. Architects will always be facing the kind of opposition Sir Basil has encountered because they are usually running ahead of public taste.

4. *The church building should acknowledge tradition without being archaic.* Not all that our fathers approved was bad. Tradition plays its proper role when it becomes the vantage point from which new advances may be made.

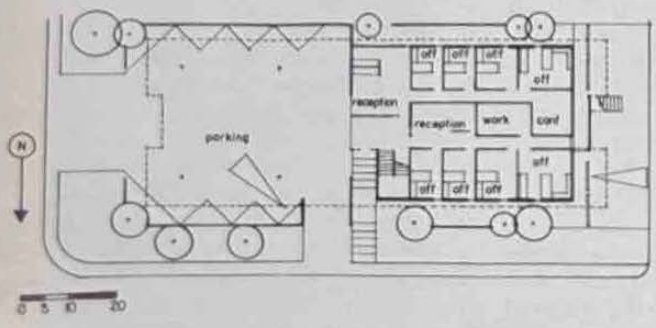
The architectural problem here is how to use both religious and architectural tradition so that it serves as the inspiration and guide to profitable new developments. It cannot, or at least should not, be allowed to throttle imagination and the spirit of adventure. What is of value in it must be reassessed by every succeeding generation and then the residue of the usable and reusable may properly become the basis for religious and architectural advance. Thus the church can and should remain traditional in the best sense of the term without being merely archaic.



ENTRANCE is convenient to parking area and its relationship to total building minumizes public corridors and space.



SECOND FLOOR



GROUND FLOOR

Orderly, restrained approach to a corner urban site

OWNER'S PROGRAM included a request for maximum logical development of a 50x125-ft. urban site with space for his accounting firm (Stone, Gray & Co., CPA's) and room for horizontal expansion of the offices and additional rental suites. Parking was to be provided for as many automobiles as possible. Budget was set at $110,000.

Solution incorporates parking for 12 cars and 2,200 sq. ft. on the ground floor, whose offices open onto small landscaped courts which are screened by pierced brick walls. Second floor of 4,600 sq. ft. houses the client's offices and three small rental suites which allow for the desired expansion. Owner's suite is designed with a double corridor and center core of common facilities used by principals of the firm in the south offices and junior accountants in the north.

Fenestration pattern was based on the module of the client's minimum size offices. Windows are narrow floor-to-ceiling openings framed by tubular steel fins for control of sun and light, so planned to afford contact with the outdoors with minimal air conditioning or glare problems. Mechanical consultants: Lindquist & Griffith; electrical, Sol Flax.

JURY CITATION issued for Colorado Chapter, AIA, which conferred First Honor Award upon project, as did Western Mountain Region, reads: "This building clearly shows that its architect had a concept and that he carried it out with conviction and consistency. Its orderly plan, reflecting the building's function, restrained use of the corner site, the unostentatious provision for parking were particularly singled out for commendation."





Professional Office Building
Denver, Colorado

•

DONALD R. ROARK
Architect

JOHNSON & VOILAND
Structural Consultants

KELLER-LOUP CONSTRUCTION CO.
General Contractor

OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete spread footings and isolated piers; frame: steel with open web joists, corrugated metal forms; floors: 2½-in. concrete.

Exterior Finish: beige colored face brick—Denver Brick & Pipe Co.; exposed structural steel and vinyl membrane finish spandrels.

Roof Surfacing: 5-ply built-up with gravel topping—Ruberoid Co.

Windows: fixed steel casement section—Truscon Steel Division, Republic Steel Corp.

Doors: solid core walnut and solid core painted birch—Federal Planing Mill; hollow metal frames—Dusing & Hunt, Inc.

Floor Surfacing: face brick; sheet vinyl—Armstrong Cork Co.; vinyl asbestos tile—Mastic Tile Corporation of America; carpeting.

Interior Finish: exposed face brick; ⅜-in. gypsum board; walnut paneling.

Ceilings: acoustical tile — Armstrong Cork Co.

Lighting: recessed fluorescent — Newman-Schranz Lighting Co.; incandescent—General Lighting Co., Prescolite Mfg. Co., Pryne & Co., Inc.

Heating and Air Conditioning: 5-zone air system with supplementary baseboard heating—Vulcan Electric Co.; air handling unit — American Blower; compressor—Trane Co.; condenser — Carrier Corp.; boiler—Ajax Boiler Manufacturing Co.; temperature controls—Johnson Service Co.

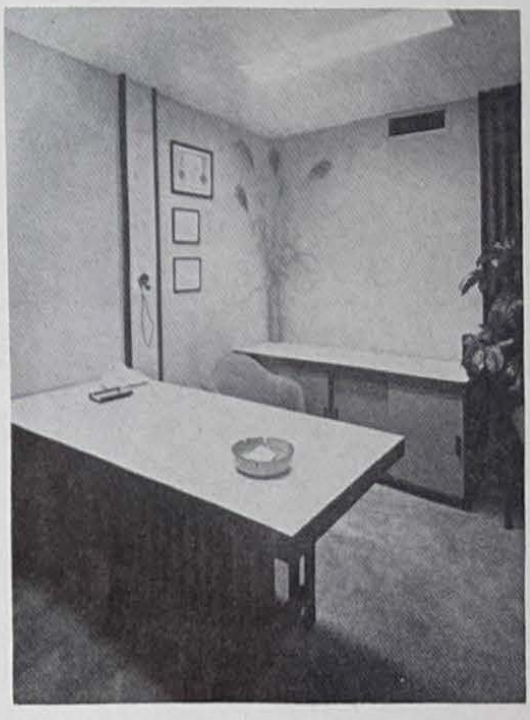
Plumbing: American-Standard.

Total Area: 6,800 sq. ft.

Total Cost: $110,000.

Date of Completion: October 1960.

SMALL CONFERENCE ROOM is part of architect's suite.

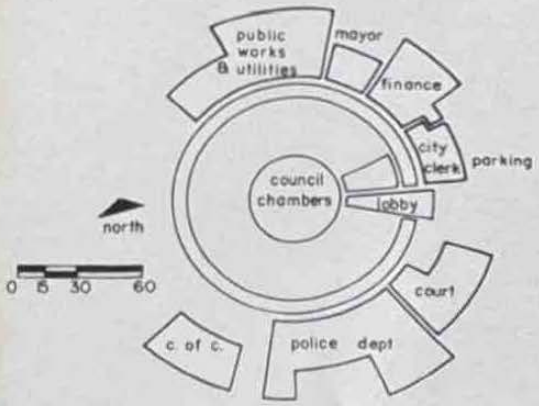


Colton Civic Center
Colton, California

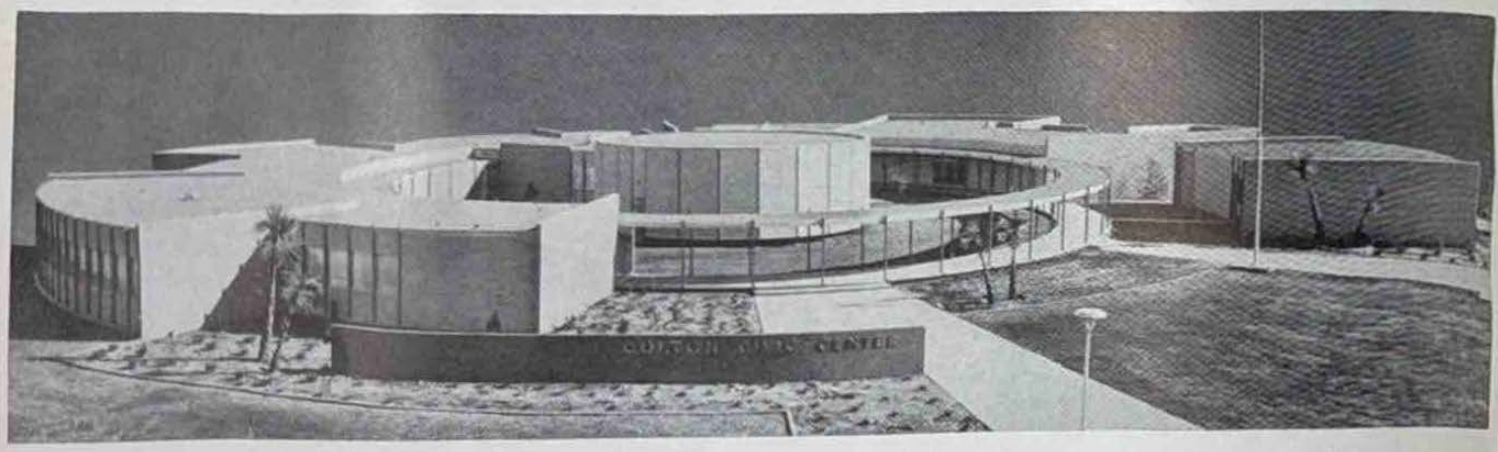
HERMAN O. RUHNAU
Architect

BRANDOW & JOHNSTON
Structural Engineers

LARSEN-RATTO CONSTRUCTION CO.
General Contractor



COMPLEX IN THE ROUND combines function, civic pride as indication of Hub City and local materials produced by large cement industry.



Circular plan for the hub of community life

SEPARATE BUILDINGS grouped around a circular covered walkway have proved to be an ideal solution in housing the varied segments of a small civic center and have become a bright, focal point of interest in this Southern California city, whose officials and citizens alike recognized the need for outstanding community improvements as an assurance of Colton's maintaining its rightful position in the state's surging scene.

The center replaces a structure long outgrown while the population expanded from 4,000 to nearly 19,000. Site too is new, about halfway between the old main business district and new postwar residential and commercial growth to the north.

Two main circulation patterns within the facility were key considerations in the basic planning philosophy. A short route of travel was needed for the public to its various points of contact – city clerk, finance department, building department, justice court, police department and chamber of commerce—plus a separate route of travel interconnecting the related departments without entering into the public areas. To accomplish this end, the architect developed a design utilizing an inner public traffic circle with various offices occupying the segments of the outer ring.

This pattern fell into three logical building divisions: the city offices with the semi-isolated council chamber, the justice court-police facilities building and the chamber of commerce. Driveway entrances for vehicular access for the public, employees and police are from secondary streets, while pedestrian access is from the major boulevard. This, in turn, dictated designation of the eastern third of the site for parking facilities, police car-to-jail access and a drive-up utility payment window.

Main entrance is located directly adjoining the parking area, opening into a lobby which is a continuation of the circular arcade that connects all of the center's facilities. Council chambers are located in the dominant, yet somewhat separated, central area for direct access without disturbing the adjoining facilities for either daytime or evening meetings. Justice court and the jail are directly connected to permit moving of prisoners under maximum security conditions.

Glenn E. Arthur was the landscape designer.

OUTLINE SPECIFICATIONS

Structure: foundation: reinforced concrete; frame and roof: reinforced concrete block; steel pipe columns; laminated wood beams — Fluor Products, Summerbell Division; floors: concrete.

Exterior Finish: painted concrete—(Chromalith) Superior Concrete Emulsions, Ltd.; painted trim—Dunn-Edwards Corp.

Roof Surfacing: built-up slag—(Premium Brand) Johns-Manville Corp.

Windows: aluminum—Ceco Steel Products Corp.

Doors: aluminum—Acme Metal Molding Co.; steel—Krieger Steel Products Co.; roll-up—J. G. Wilson Corp.; folding—(Modernfold) New Castle Products, Inc.

Floor Surfacing: vinyl asbestos tile—(Matico) Mastic Tile Division, Ruberoid Co.

Insulation: batt—Mineral Wool Insulations.

Partitions: gypsum lath and plaster on wood—Blue Diamond Corp.; toilets—Mills Co.

Interior Finish: painted plaster—Dunn-Edwards Corp.; vinyl fabrics—(Vicrtex) L. E. Carpenter & Co., Inc.

Ceilings: acoustical plaster—Zonolite Co.

Lighting Fixtures: fluorescent—Sunbeam Lighting Co., Benjamin Electric Manufacturing Co.; incandescent—Solar Light Mfg. Co., McPhilbin.

Heating: central unit air conditioning—Carrier Corp.; package equipment—Lennox Industries, Inc.

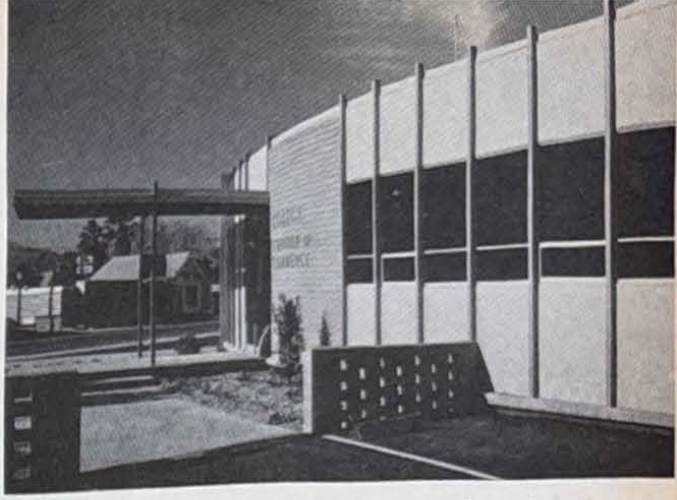
Plumbing Fixtures: Crane Co.

Total Area: 25,614 sq. ft.

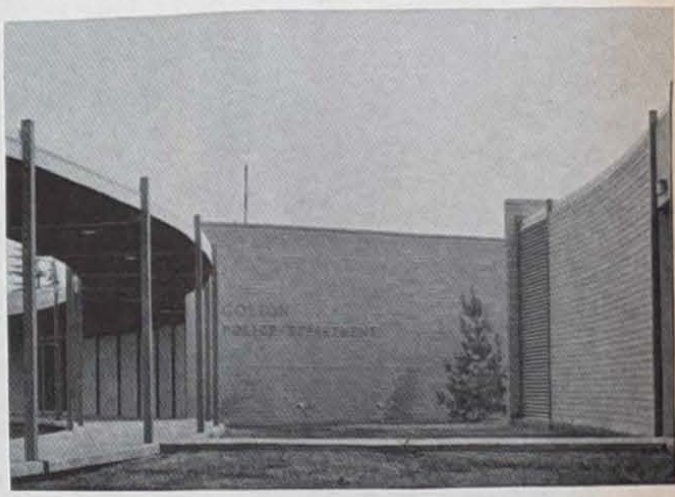
Total Cost: $469,000.

Cost per Square Foot: $18.31.

Date of Completion: February 1961.



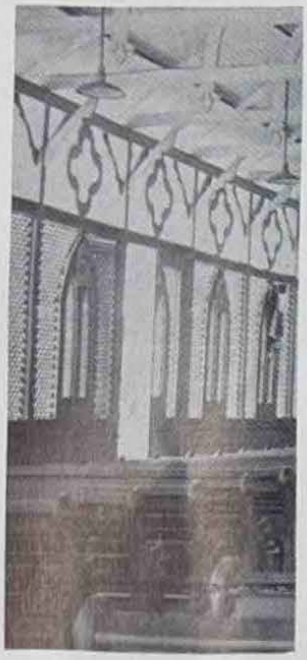
CHAMBER OF COMMERCE is integral part of center, yet featured prominently in own building, typifying relationship of city and civic activities.

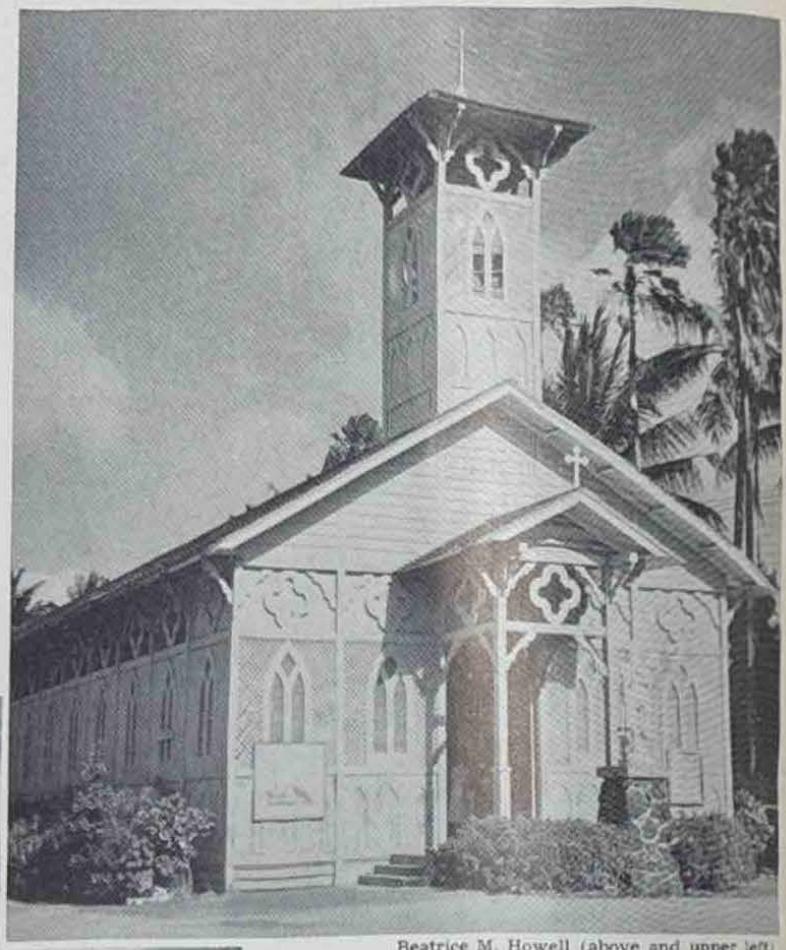


POLICE AND JAIL FACILITIES are included in complex.

COUNCIL CHAMBER is focal point of center, has sculptured wood slat fascia mounted on arched metal form over masonry walls.







Beatrice M. Howell (above and upper left)

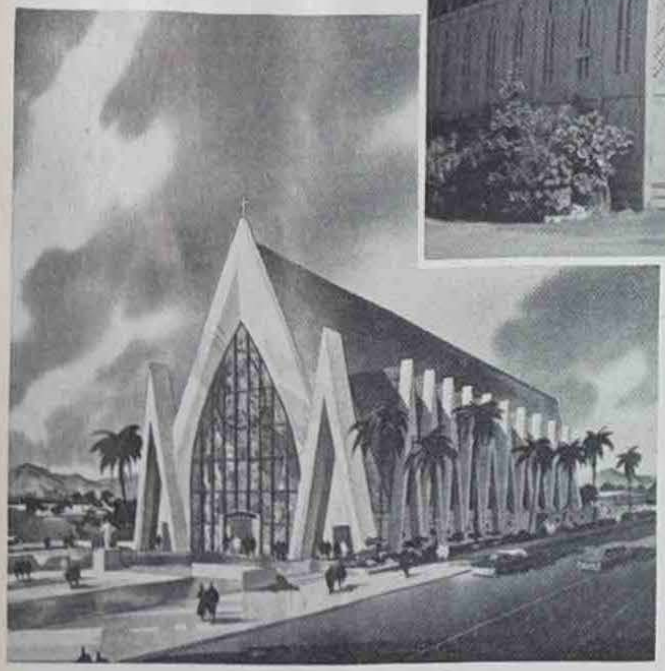


Photo editorial

NEW ST. AUGUSTINE'S: AN INJUSTICE AT WAIKIKI

Beloved St. Augustine's Church by the Sea at Waikiki has been a delight not only to its parishioners but to the many celebrities who have worshipped within its latticed walls over the past 60 years. But alas, the picturesque and highly appropriate landmark has been demolished to make way for the new edifice (architect: George W. McLaughlin) shown in the sketch above—a $1 million structure and completely air conditioned too, although artificially this time. Says the pastor in a fund-raising brochure: "The new St. Augustine's in its magnificence will compensate for the loss of the old building with its sentimental attachments." Architecturally speaking, nothing could be further from the truth.

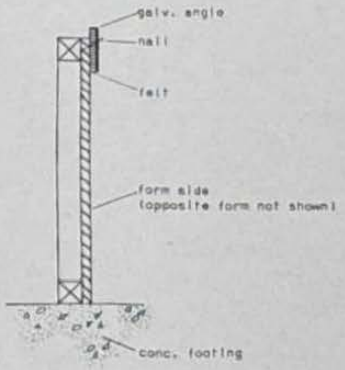
System produces better concrete floors

A Phoenix architect has devised and patented what he calls "a highly successful system" for concrete floors laid on fill on the original ground with masonry walls.

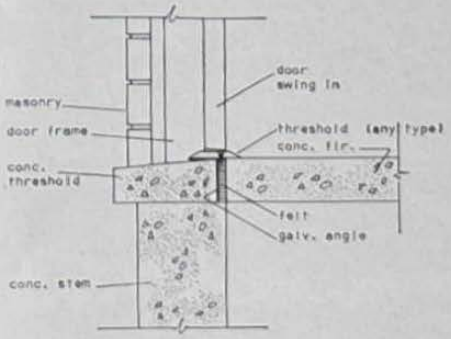
Frank B. Wallace explains that this method does not apply to frame construction which is commonly employed in some locations, possibly because of earthquake hazards.

The system and its advantages:

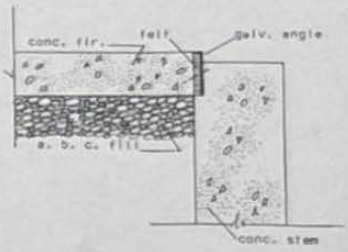
1. A light angle covering expansion felt is easily mounted on the rough form and fastened sufficiently above to level out all irregularities without moving the form. This new metal is used to guide the stem with a notched screed slightly above floor level, thus producing a positive lock for any water which may seep through the wall.



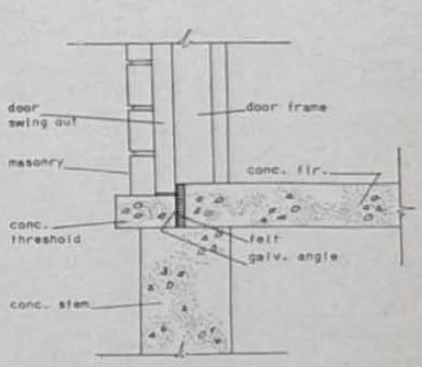
2. The smooth level and straight metal screed produce a better floor in less time than screeding off from the comparatively irregular concrete stem which has been struck off from the reused form. In the latter case, a rough spot often is reflected across most of the floor which is difficult to float out and causes an uneven distribution of the aggregate and a permanent irregularity.



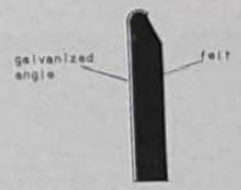
3 At doors swing-in or swing-out the angle produces better threshold details. The usual 4 in. is blocked out from the stem for exterior doors. For doors swing-in the felt and angle are allowed to run straight through; for doors swing-out the angle is cut at the door opening, moved to a position to correspond with the rabbit of the frame.



4. A slightly modified angle produces a perfect floor division.

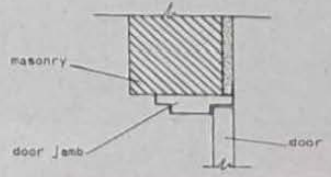


Main saving in labor consists of the ease in setting the angle and felt above the main form on the approximately level footing. Since corners are marked by use of a builder's level, main forms do not have to be wedged up. The angle and felt are tacked in place, to a tight line, with nail heads projecting for enclosure in the poured stem.



Other details, such as wood frames, cased, may be used, according to Wallace.

The architect also points out that extending the door jamb beyond the masonry provides a good plaster ground.



BUILDING PRODUCT EXHIBIT and market development centers will be built in 30 major marketing areas throughout the country by Showcase, Inc. The centers are designed to service manufacturers and builders by collating and centralizing primary marketing efforts for products and services. In addition to exhibit space, they will offer a film service, informational services, market research and promotion. Among cities selected



BUILDING INDUSTRY'S PROTOTYPE
exhibit and marketing center

are Denver, Los Angeles, Phoenix, Portland, San Francisco, Seattle and Salt Lake City. Each center will be a 64-ft. high Kaiser aluminum dome constructed by R. C. Mahon Co. Architect on the $22½ million national program is Don Muntz of Los Angeles.

—pa&b memo—

DOUGLAS FIR TRUSSES joined with split-ring connectors and weighing up to 7,000 lb. each make up the largest warehouse under one roof in the world for Waterways Terminals Co. of Portland. Covering 12½ acres, the building itself, which handles paper products from six major Northwest mills, has 546,806 sq. ft. of floor space plus a covered riverfront dock 1,253 ft. long. Ritter Development Co. utilized 2 million bd. ft. of lumber, including 627,000 sq. ft. of ½-in. plywood for the roof. Mammoth structure is supported by 21 linear miles of treated pilings.

—pa&b memo—

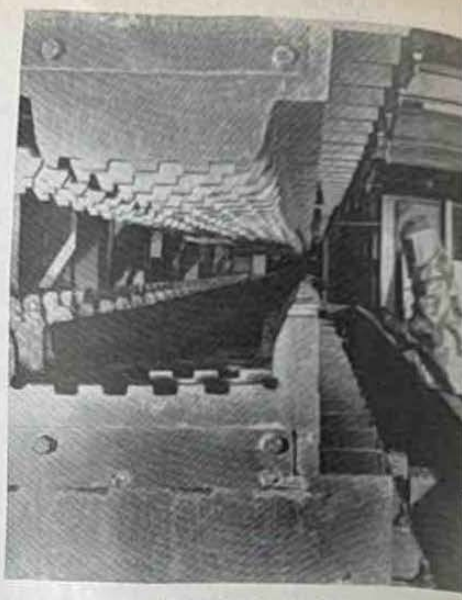
IDEAL CLASSROOM in the eyes of the Brunswick Corp. incorporates highly flexible furniture, cabinets, chalkboard and display facilities. To demonstrate, the company exhibited a full-scale model at the recent convention of the American Association of School Administrators. A noteworthy feature of the model was carpeting on the floor, which the company says absorbs sound, reduces teacher fatigue, lowers damage and maintenance to furniture and appears to have a quieting affect on the children themselves.

—pa&b memo—

FIRE-RESISTANT WOOD is being used for all exposed wood in cottages at Wesley Palms, a $6 million retirement devolopment in San Diego. To enhance appearances of the cottages, architects Neptune & Thomas designed them with beamed ceilings. The fire-protected wood was specified for the beams, rafters and spacers between roofs and sidewalks as a safety measure. Treatment process, developed by Koppers Co. and called Non-Com, is being carried out at that company's Wilmington, Calif., plant.



WORLD'S LARGEST
transit warehouse under one roof



NATION'S FIRST
tempered alloy steel shapes

ROLLED STRUCTURAL SHAPES made from quenched and tempered alloy steels are now commercially available through United States Steel Corp. The new shapes promise weight and costs savings in a wide variety of structural applications. Previously customers wishing to use quenched and tempered alloy steel structural shapes had to make their own by cutting and welding together sections of plate material.

—pa&b memo—

DRIPPY WATER PIPES in home and bulky insulation in refrigeration and air conditioning piping are the targets of a research project which developed a pre-insulated copper pipe that can be handled and installed pretty much the same as ordinary copper pipe. Developed by Quantum, Inc., Connecticut research laboratory, in cooperation with the Copper Products Development Association, the as yet noncommercialized product is made by extruding a foamed plastic around a copper tube. A ¼-in. coating will do the job of much thicker cork or magnesia insulation, the association points out.

—pa&b memo—

COMPUTER SERVICE that provides the answer to engineering problems in minutes over a telephone communication system has been pioneered in Los Angeles. Called ComputerMat, the service utilizes Autofax which permits information from punched paper tape to be relayed to and from the computer service center, eliminating what could be several days delay in transmitting the problem and answer via mail.

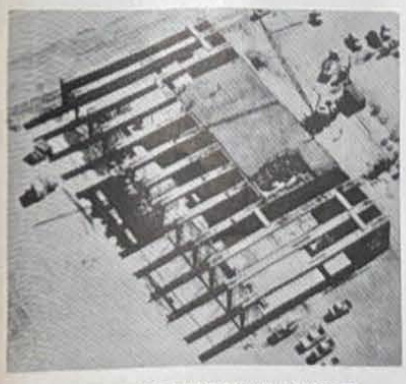
ZINC-COATED STEEL chemically treated to improve paintability while retaining its corrosion-resistance qualities has been produced successfully by Armco Steel Corp. and will be marketed as Zincgrip A, Paintgrip. This is believed to be the first spangle-free, hot-dipped zinc-coated steel chemically treated for painting that carries a 1.25 ounce class zinc coating as specified by ASTM A-93. Welding properties also have been improved. Armco says twice as many resistance spot welds can be made on Zincgrip than on regular galvanized sheets. Pilot programs indicate the product will find application in such uses as architectural partitions, shower stalls and the like.

—pa&b memo—

ALL METAL-LATH HOMES is the target of a promotion campaign inaugurated by the Metal Lath Manufacturers Association. Heretofore, the industry's chief market has been in the commercial and industrial building field and in multiple dwellings where fireproofing is a prime requisite. Now the association has turned its attention to the tract home building field in a large-scale effort to promote this system, which involves constructing plaster walls on a mesh of metal lath supported on vertical steel studs. Time savings in erecting an all-metal-lath home run from 30% to 50% with comparative reduction in labor costs, the association claims.

—pa&b memo—

PARKING PROBLEMS for a big industrial complex at Chatsworth, Calif., was solved by providing parking facilities on the roof of each of the one-and two-story units, freeing valuable land for other uses. First of the units, being constructed for Telecomputing Corp., has been completed. They feature prestressed concrete T's 120 ft. long, providing interior areas completely free of obstructions. Consulting engineers were T. Y. Lin & Associates.



SOUTHERN CALIFORNIA'S LONGEST
prestressed concrete T-units



Realock Fence... the symbol of protection

It's recognized as the economical, permanent way to protect all types of properties. Realock Chain Link Fence is widely used for municipal, industrial, residential, right-of-ways and outdoor equipment storage areas. The rugged fabric is made from top-grade steel wire that withstands lots of punishment. And every foot of Realock Fence is galvanized to prevent rust and corrosion.

For a free estimate and complete details about Realock Fence, call the nearest CF&I sales office.



Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

8329

residential acoustical door

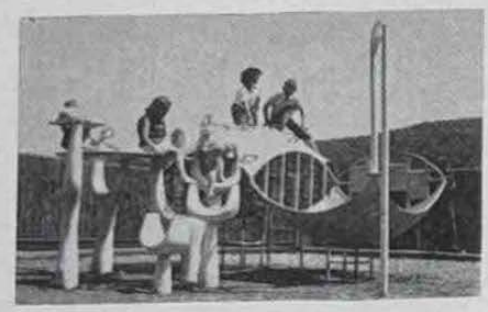
For residential and apartment use Truscon is offering a door and frame package featuring a ¾-in. sound deadener core. The slim, steel Newport door is prefinished at the plant in an off-white, baked-on coat of enamel and delivered complete with frame and all hardware, including gate type hinges which the company says permits the door to be hung in place by one person in a few seconds. — Truscon Division, Republic Steel Corp., 1315 Albert St., Youngstown 1, Ohio. (No. 1)

underfloor distribution system

A simple, compact system providing for underfloor distribution of conditioned air and electrical services has been developed by Granco and is being marketed as the A-E Floor. It can be used with any structural system. Basically it consists of a floor supported by the main structural slab. The floor rests on adjustable steel supports creating a plenum for conditioned air to be carried to floor and ceiling air diffusers. The plenum can be varied in height and can be subdivided with baffles to provide zoning of air. Within the floor a network of cells at predetermined spacing carry wires for the various electrical and power circuits. The floor is expected to promote design flexibility by providing wide choice of mechanical systems, greater electrical flexibility, choice of high or low velocity air systems reductions in building heights.—Granco Steel Products Co., 6506 N. Broadway, St. Louis 15, Mo. (No. 2)

packaged playgrounds

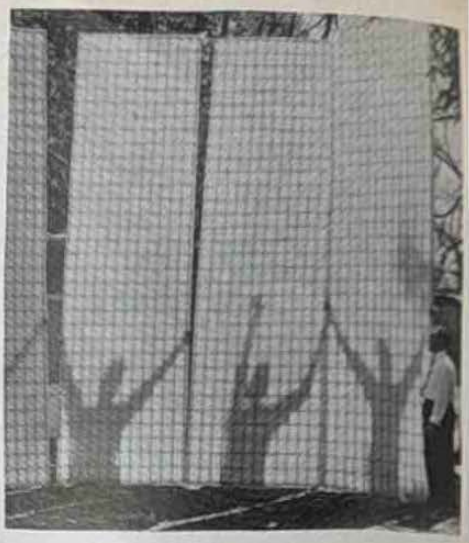
Economy of standardized pieces has been applied to the field of sculptured equipment in a line of packaged playgrounds now available in the western states. Called Playscapes, the pieces cater to the creative, imaginative child's mind in their shapes and colors, while providing such built-in safety factors as holding height to 5 ft. or lower, eliminating moving parts and setting them in compact groupings that make it possible for the playground to be located conveniently to



adult activities and supervision. Each packaged play area can draw from a collection of 32 devices providing a range from the very small to a grouping that can accommodate up to 108 children. The minimum amount of space needed and low maintenance features should make the Playscapes practical for motel, hotel and club installations, as well as larger school and park needs.—Playground Corporation of America, 16 E. 52nd St., New York 22, N. Y. (No. 3)

sound-absorbing glass

Sounds of street traffic, office machines, aircraft, factory whistles and human voices are stifled by Acousta-Pane, a safety and sound-absorbing glass developed by Amerada. Glass is treated with an interlayer that converts sound energy into small amounts of heat instead of passing it through the glass as noise. It effectively controls sound transmission in the frequency range between 1,700 to 4,000 decibels and can reduce noise intensity level by as much as 66%, the company says. Glass is available in clear, opaque, gray or blue tint and can be handled in the standard manner.—Amerada Glass Corp., 3301 S. Prairie Ave., Chicago 16, Ill. (No. 4)



translucent sandwich

A high strength, relatively low cost sandwich panel consisting of a core of plastic fiber strips on edge faced on both sides with translucent fiberglass sheets has been developed by Architectural Plastics. Cells may be colored or left functional. Arborgrid is recommended by the manufacturer for wall and roof application and as individual skylight units. It is said to eliminate many of the problems connected with heat gain and loss and control interior illumination regardless of sun angle. Shatterproof qualities are an advantage in school construction. Panels are available in a wide range of rectangular or custom shapes in sizes up to 4x 20 ft. and in thicknesses of ½ to 3 in.—Architectural Plastics Corp., 1355 River Road, Eugene, Ore. (No. 5)

gypsum partition panels

Precision-cut, spiral shaped hardwood shavings are the key to a partition system which National Gypsum says can save some 33 sq. ft. of space in an average home. The shavings are sandwiched between two fire-resistant gypsum sections for a panel 2⅜ in. thick called Spiral-Core, which requires half the space of a conventional interior wall made with 2x4 wood studs. Panel is designed for use with roof-truss construction that does not place a weight load on partitions themselves. It is placed into position on a simple floor track. Another track fastens the panel to the ceiling. Panels are connected to each other with wood blocks inserted into the core at each joint. Finish treatment for joints is the same as for conventional gypsum wallboard construction. Electric cables can be shoved through in any direction. Splines can also be inserted where needed for extra strength for such items as heavy cupboards.—National Gypsum Co., 325 Delaware Ave., Buffalo 2, N. Y. (No. 6)

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

NOVEMBER 1961
(After December 31 write directly to manufacturer)

1 2 3 4 5 6 7
8 9 10 11

Name

Title

Firm

Address

City Zone State

concealed fire escape

For two- and three-story structures, such as schools, apartments, office buildings, etc., an eastern firm is marketing a concealed fire escape that looks like a drain pipe. Called Safe-X-Scape, it can be mounted outside any upstairs window. At the flip of a catch, the drain pipe folds out into a full-sized aluminum ladder which will support 2,000 lb. It cannot be opened from the ground.—Win-Chek Industries, Moonachie, N. J., or Reynolds Metals Co., 19 E. 47th St., New York 17, N. Y. **(No. 7)**

baseboard heater

Perimeter baseboard heaters with a 277-volt rating have been added to the Wesix line to meet the needs of commercial and industrial establishments who prefer this circuit because it can produce the same power and heat output from a lower amperage over a smaller wire. The 1961 line also features a ¼-in. mesh grill at the top and bottom of the heater to prevent combustible objects and children's fingers from coming in contact with the heating element.—Wesix Electric Heating Co., 390 First, San Francisco 5, Calif. **(No. 8)**

aluminum penthouse

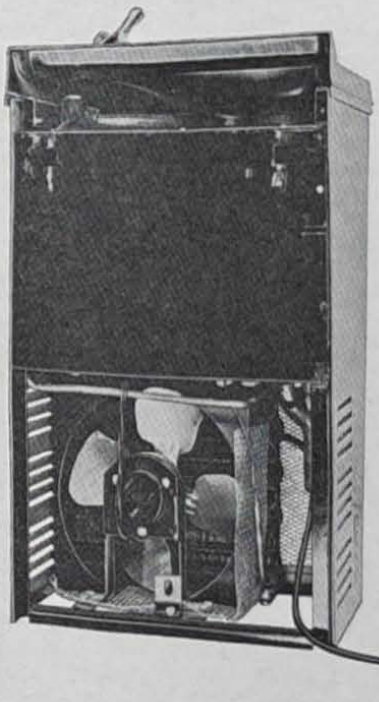
A prefabricated, extruded aluminum penthouse for handling ventilation problems through the roof cuts on-the-job construction costs, as well as reducing later maintenance costs. The C-S Penthouse has a neat-looking, weatherproof design with louver blades extending continuously around all four sides. Where air control is desired, operating louvers can be supplied in place of standard fixed blades. Automatic dampers also can be used. Roofs are designed for a minimum 30-lb. snow load and are removable for access. A wide variety of finishes and sizes are available from 2x2 ft. to large structural penthouses with supporting elements and roof trusses engineered to handle special conditions.—Construction Specialities, Inc., 55 Winans Ave., Cranford, N. J. **(No. 9)**

vinyl-coated wallboard

Gypsum wallboard with a laminated vinyl surface has been added to the Sheetrock line. Eight colors and two wood-grained patterns are integrally blended into the laminate and are designed to complement modern flooring and furnishings. Beveled edges may be left exposed to gain a panel effect for walls. Extruded aluminum moldings matching wallboard colors and patterns have been developed to serve as panel dividers, caps and corner shields. Moldings may be snapped into place or attached by flat head nails.—United States Gypsum Co., 300 W. Adams St., Chicago 6, Ill. **(No. 10)**

plastic bolsters

Plastic slab bolsters for reinforced concrete eliminate maintenance problems caused by electrolytic action of steel against steel that can result in rust bleeding through the concrete slab. The accessories, called Rustless, are made from W. R. Grace high density polyethylene which is chemically resistant and retains its strength during high and low temperature extremes. Light weight of the accessories is another advantage, both in handling and shipping. Line includes continuous slab and beam bolsters, mesh bolsters that snap into place and plastic doughnuts for holding exact clearance between reinforcing bars and form face.—Universal Builders Supply Co., Inc., 41 E. 42nd St., New York 17, N. Y. **(No. 11)**



take a last look!



this is the back of Haws wall-hung Electric Water Cooler: HWT-13

When this compact Haws Water Cooler is mounted, it'll hug the wall—off the floor!—and you'll never see this view again. As craftsmen, though, we're proud of the quiet cooling unit, the heavy-gauge steel panels, the leak-preventing silver soldered fittings, and (above all) the built-to-last craftsmanship. It's a sturdy, compact cooler with all plumbing and electrical connections concealed. Efficient!

And let's face it.....



The slim-design cabinet, finished in hammertone grey enamel and crowned with gleaming, contoured stainless steel, makes this cooler a beauty. A practical beauty with enough pre-cooled water to serve 155 persons an hour. And we have money-saving low capacity models, too!



Write for detailed specs! Ask for your copy of HAWS complete catalog and see our data in Sweet's File.

Since 1909 HAWS **WATER COOLERS**

Products of **HAWS DRINKING FAUCET COMPANY**
1441 Fourth Street, Berkeley 10, California
Export Dept.: 19 Columbus Ave., San Francisco 11, California



pa&b pick of the month

Excellent color photographs show off Rilco glued laminated arches and beams and the architect's designs in "Church Construction." While the photographs, nine in color, 27 in black and white, really tell the story, brief information is included, plus several floor plans, in the 12-page publication. Among churches depicted are the All Saints Episcopal Church, Portland, by Stuart B. Mockford; First Baptist Church, La Jolla, Calif., by Mosher & Drew; and Divine Redeemer Church School, Colorado Springs, Colo., by Toll & Milan.—Weyerhaeuser Co., Rilco Engineered Wood Products Division, 616 Professional Bldg., Tacoma 5, Wash.

LITERATURE

Overly Fire Doorater (AIA 16-A, 16-B): describes advances in design of fire door barriers and the application of new fire exit hardware; reviews the company's U/L labeled products and includes a hardware selection chart; 8 pp.—Overly Manufacturing Co., 580 W. Otterman, Greensburg, Pa.

Classroom Cabinets: provides a complete architectural specification and data guide to the company's line of classroom cabinets, wardrobes, counters and special units; a sliding door color chart is included; 52 pp.—Harmon Cabinets, Inc., Box 1464, Tacoma 1, Wash.

Floodlighting Poles: covers poles for stadiums, playgrounds, driving ranges and security areas; catalog 6; 12 pp.—Weld-Rite Co., 4417 Oakport St., Oakland, Calif.

Western Red Cedar (AIA 19-D): covers paneling, finishing, tongue and groove, paneling patterns and finishes and channel in five pieces, part of the association's "literature master plan;" pieces are standard size, three-hole punched for ease of filing; 14 pp. total—Western Red Cedar Lumber Association, 4403 White-Henry-Stuart Bldg., Seattle 1, Wash.

Johns-Manville Movable High Walls and Low Walls (AIA 35-H-6): describes and illustrates in color the wide range of possibilities with these movable partitions; 2 folders 4 pp. ea. —Johns-Manville, 22 E. 40th St., New York 16, N.Y.

Perlite Design Manual: contains technical application information on the proper mixing and placing of perlite insulating concrete with instructions for both transit and job mixing; 4 pp.; Section 1-C.—Perlite Institute, Inc., 45 W. 45th St., New York 17, N.Y.

Washroom Dispensers and Receptacles (AIA 29-J): provides a convenient reference source for planning new and improving existing washrooms; architectural drawings are included for each of the 25 different dispensers illustrated; 8 pp.—Blake, Moffitt & Towne, Box 3566, San Francisco 19, Calif.



Distributors—VANCOUVER, B. C.: Richmix Clay Products Co. • Washington: SEATTLE, Mutual Materials Co.; YAKIMA, Granger Clay Products Co.; SPOKANE, American Stone & Materials Co.; EVERETT, The H. O. Seiffert Co.; MT. VERNON, Brick & Stone Supply Co. • Oregon: PORTLAND, Columbia Brick Works; CORVALLIS and SALEM, Reimer Masonry Supply Co.; EUGENE and MEDFORD, Scobert Building Materials, Inc.

Space Dividers (AIA 35-H-6): outlines features, gives cutaway views of space divider system designed for fast assembly and easy alteration or increase; 6 pp.—Kimball Manufacturing Corp., Harbor and Mill Sts., San Rafael, Calif.

Waling & Bracing: presents most common methods in scale drawings on large sheet suitable for hanging in construction shack. Symons Clamp & Manufacturing Co., 4249 W. Diversey Ave., Chicago 39, Ill.

Lighting Selector: wheel shaped selector for picking right fixture in Calculite line for a specific application.—Lightolier, 346 Claremont Ave., Jersey City 5, N. J.

Karvalum Aluminum Grilles (AIA 14-B-6): depicts grills and screens for all types of installations, including luminous walls and ceilings; 12 pp.—Morris Kurtzon, Inc., 1420 S. Talman, Chicago 8, Ill.

2-4-1 Floor System (AIA 19-F): provides detailed design and installation data on this new subfloor-underlayment t&g panel; 8 pp.—Douglas Fir Plywood Association, 1119 A St., Tacoma 2, Wash.

Laminated Architectural Glass (AIA 26-A-5): depicts and describes design possibilities of laminated safety glass using Saflex, a vinyl butyral plastic interlayer; 8 pp.—Monsanto Chemical Co., 100 Monsanto Ave., Springfield 2, Mass.

Static Conductive Linoleum: gives specifications, installation data, cost information and maintenance procedures for this special floor covering for hospitals, industrial laboratories; 16 pp.—Congoleum-Nairn, Inc., 195 Belgrove Drive, Kearny, N. J.

Buildings for Business (AIA 19-A-1): illustrates with colored photographs and explanatory text a wide range of business buildings, each using West Coast lumber to achieve a certain design objective; includes banks, restaurants, medical clinics, motel, marina, fire station, funeral home and others; 12 pp.—West Coast Lumbermen's Association, 1410 S.W. Morrison St., Portland 5, Ore.

Built-Up Roofing Specifications (AIA 12-B): provides application information on all types with construction details and selector guide; 28 pp.—The Philip Carey Mfg. Co., 320 S. Wayne Ave., Cincinnati 15, Ohio.

● **International Paper Co.:** C. L. (Connie) Anderson, after nearly 40 years in the lumber business, has retired as general manager of the Vernonia, Ore., branch of the Long-Bell Division.

● **Soule' Steel Co.:** Stanley W. Nightingale has been promoted to the new post of general manager of the steel structures division, headquartered at the San Francisco executive offices. Other new divisional appointments: Roger Chung, assistant general manager; James Kendall, general sales manager; Leroy Elmburg, general operation manager.

● **Dow Chemical Co.:** Stepping up its California operations, the firm has begun production of polypropylene at its Torrance, Calif. plant and has begun construction on the first major laboratory buildings in Walnut Creek.

● **Stylon Corp.:** One of the nation's largest tile producers, the Milford, Mass. company has purchased Cal-Mar Manufacturing Co., Salt Lake City.

● **Fabricon Products:** John T. Watkins Jr. has been made vice president and general manager of West Coast operations, headquartering in Los Angeles.

● **Pacific Plywood Co.:** The Dillard, Ore. firm has changed its name to Forrest Industries, Inc., so that it will be more indicative of the diversified list of products it now manufactures.

● **Concrete Tie Anchor Co.:** Alder K. Smith, who joined the Los Angeles company as sales manager five years ago, has been appointed general manager.

● **Beach Manufacturing Co.:** In line with expansion and diversification plans of the Compton, Calif. firm, Kenneth Webb has been appointed sales manager of the newly formed architectural products division.

● **Granco Steel Products Co.:** New district sales manager at the San Francisco office is Richard J. Hogan. He succeeds Robert L. Skaggs who is returning to the St. Louis headquarters as manager of form and metal roof deck sales.

● **Allied Chemical Corp.:** Don A. Proudfoot, formerly with Simpson Timber Co., Seattle, as director of marketing and Lennen & Newell, Inc., has joined the Barrett Division, New York, as general marketing manager.

● **Fiat Metal Manufacturing Co.:** Production of shower cabinets, floors and related equipment is now in full swing in its recently completed building in the City of Industry, just of out of Los Angeles.

● **Congoleum-Nairn, Inc.:** Gordon Roether has been named contract and industrial sales representative, making his headquarters in Los Angeles.

● **Mineral Wool Insulations:** M. C. Juell is the new president of the Fontana, Calif. manufacturer, a division of Better Industries, Inc.

● **W. P. Fuller & Co.:** Donald E. Cluck has been appointed director of trade paint sales and marketing in the San Francisco headquarters. . . . A new glass and metal contract center has been opened at 80 Charter Oak St. to serve San Francisco and some points on the peninsula.

ASSOCIATIONS

● **Southern California Chapter, Producers' Council:** New president is Edward A. Paul of United States Plywood Corp. Other officers are William Biggar, vice president; Robert Klein, secretary; and Don Jacobson, treasurer.

● **Washington State Chapter, Producers' Council:** Merrill A. Street of Noise Control of Seattle, Inc., heads the list of officers for the coming year. Completing the slate are Don G. Fisher, vice president; Gene S. Nelson, secretary; Roland Lindstrom, treasurer.

● **Southern California Steel Council:** Hugh Mulholland, a University of California graduate with a B.S. in civil engineering, has been appointed executive secretary, with offices at 1417 Georgia St., Los Angeles. He has served as engineering representative for Daniel, Mann, Johnson & Mendenhall, architects-engineers, and manager of metropolitan sales, Armco Drainage and Metal Products, Inc.

● **American Institute of Timber Construction:** Among its officers are two West Coast men: William B. Lindberg of Woodlam, Inc., Tacoma, vice president, and Val Gardner, Rosboro Lumber Co., Springfield, Ore., treasurer.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Farth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella N. Foster, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Blumcraft of Pittsburgh	III Cover
Builders Brick Company	32
Caram Manufacturing Co.	13
Colorado Fuel & Iron Corporation	29
Haws Drinking Faucet Co.	31
Inland Steel Products Co.	II Cover
R. C. Mahon Company	7
Riverside Cement Company	10
Tectum Corporation	IV Cover

not specified

hope for our hills

Before a summer meeting of the Northern California Chapter, AIA, James Keilty of the San Francisco Department of City Planning made some observations about the relationship of hills to urban design—observations which have been expressed in the past but not as eloquently and succintly perhaps. The senior planner's remarks, which were published in the chapter's September bulletin, deserve a wider reading.

A goodly number of western communities, to a lesser degree than San Francisco, to be sure, look to their hills for their own personality, distorted though it may have become over the years through irresponsible architects and builders, city officials and so down the line. Even more disturbing is the thought that today we must be concerned with "conservation of the view," as Keilty put it. His complete statement:

"Because there are hills and water, there are views. There is the view outward from the city that embraces the Bay and the distant hills and the widely scattered urban development. It is this view that gives us a sense of the region we live in. There is the view from outside the city, or at its margins, of the dense, towering city itself. It is this view that gives us a sense of the center, the core. In the Bay area we experience our environment, we find orientation in the environment in a simple, satisfactory and exciting way.

"Within the city itself the hills, bay and ocean serve to provide us with another form of orientation. We see from one part of the city to another, we see communities and its center, its open spaces and the development that defines them. The city has a shape: it is an entity with easily distinguishable parts and we can understand it without too much difficulty, we can 'know where we are,' we can relate to the whole.

"But, because there are hills and views, we are more conscious of everything that happens. Everything is pushed up on the display rack of the hills and we are constantly aware of the new development as it affects us (if we have a view) and as it affects the view. Conservation of view is one of the peculiar headaches of San Francisco—along with conservation of a nebulously defined 'character' and conservation of a vaguely felt 'role.'

"The hills, however, do perform in San Francisco as major organizers of the urban complex and are basic to the character of the city no matter how that is defined; and it is our use of the given site that is crucial in determining what is desirable and what is reprehensible in terms of future development. The purpose of design is to exalt the site, to take advantage of a marvelous 'given'; and to do that requires that we understand the site both as an experience and as an entity to be dealt with. There should be an area of agreement among responsible builders and designers as to what is best, what forms work best and where these forms work best in this special environment.

"The role of the urban designer, therefore, is to make a sensitive assessment of the existing city and from this derive recommendations which the community, the builders and investors and owners and dwellers can consider and espouse, formally or informally, as indicating the way in which they hope their city can develop. This is the kind of agreement that produced the Italian hilltowns, the cathedral cities of France, the richly intricate cities of medieval Germany. In America, for the most part, instead of agreement or even of ideas upon which agreement might be reached, there has been a void." R.E.K.

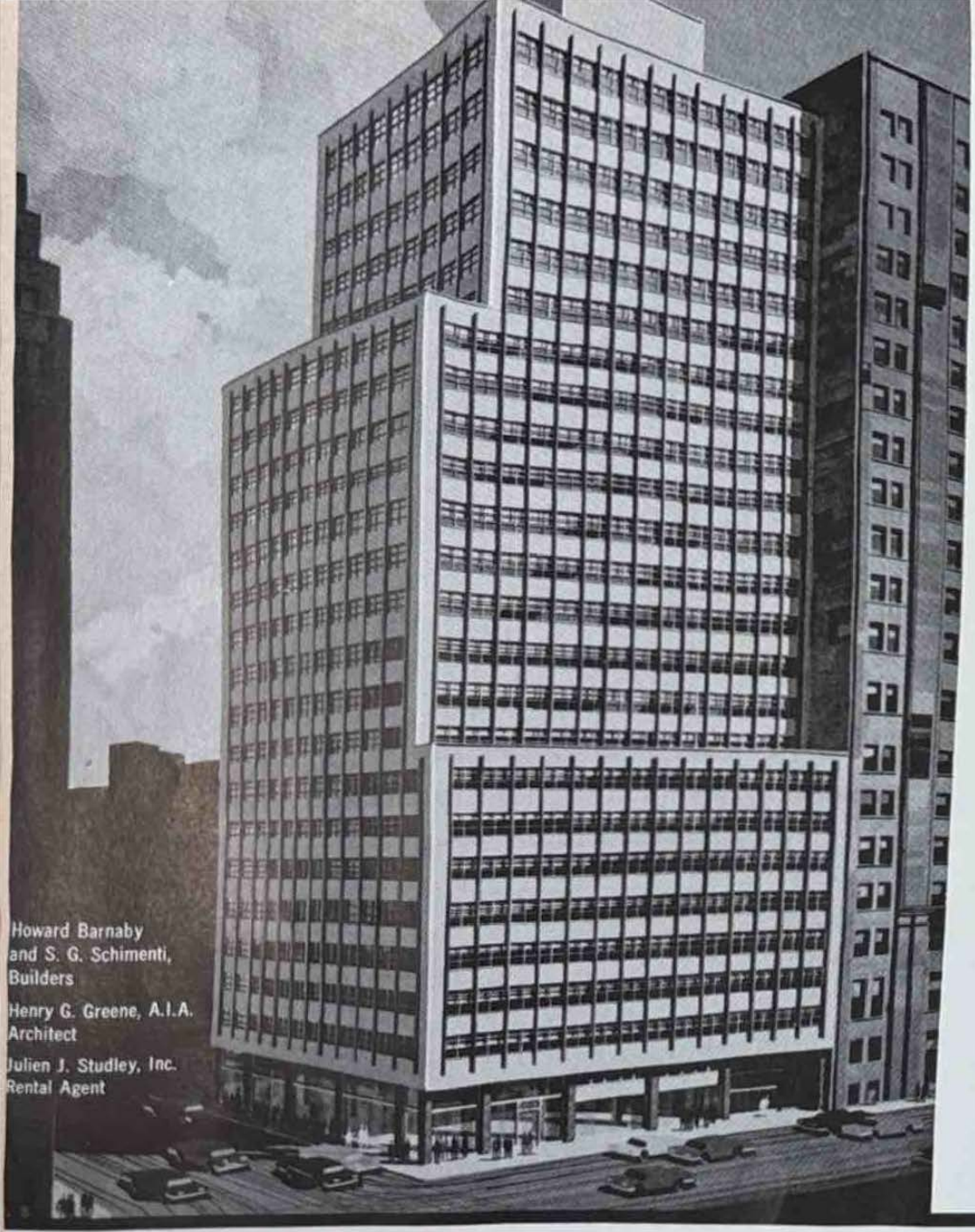
cific Architect & Builder

UNIVERSITY OF OREGON
DEC 7 1961
LIBRARY

P/A
&/B

THE MAGAZINE OF WESTERN ARCHITECTURE ◆ DECEMBER 1961





EMBLEM OF EXCELLENCE IN VERTICAL TRANSPORTATION

Haughton Automatic Elevators with Dynaflite Control

CHOSEN FOR 66 BEAVER STREET NEW YORK

Passengers will travel at 800 feet per minute, yet they'll scarcely feel any motion at all! ■ With Dynaflite, the higher speeds required for efficient handling of heavy traffic can be achieved with incredible smoothness. ■ Both acceleration and slow-down are so subtle, so finely controlled, that passengers experience comfort and security no conventional controls can provide. ■ Three elevators will serve all floors at 66 Beaver Street. Three more will operate to the 12th floor. ■ An automatic, electronic computer will constantly receive and analyze data pertaining to the amount and character of traffic, and make adjustments to match traffic needs exactly. ■ Dynaflite is a development of Haughton Elevonics*. Include its exclusive advantages in your building or modernization plans. Your local Haughton sales office will give you full information. ■ Haughton Elevator Co., Div. of Toledo Scale Corporation, Toledo 9, Ohio. ■ Passenger and Freight Elevators, Escalators, Dumbwaiters.

**Haughton's advanced program in elevator systems research and engineering, with specific emphasis on the creative application of electronic devices and instrumentation for betterment of systems design and performance. Registered in U.S. Patent Office.*

Pacific Architect & Builder December 1961

editor
ROBERT E. KOEHLER

consulting editor
A. O. BUMGARDNER, AIA

editorial assistants
ANNE HECKER
JOAN STOREY

contributing editors
WILLIAM G. QUINN
Southern California
MAY B. HIPSHMAN
Northern California
ISABELLA FOSTER CHAPPELL
Oregon
PEGGY HANSEN
Rocky Mountain
BEATRICE M. HOWELL
Hawaii

design

22 Office Building, Bethlehem Steel Co., Pacific Coast Division, Seattle: Bindon & Wright, Architects

24 Project Roundup: Two Southern California Hospital Facilities

special features

14 Progress Report No. 3: Seattle World's Fair

16 Apartment Houses as Viewed by Victor Gruen

26 Photo Editorial: Bank of New Mexico—Counterfeit Approach to Design

35 PA&B Editorial Index for 1961

methods & materials

27 Industrial Floor Construction—by D. W. Freeman

29 Los Angeles Boasts Brightest Airport in the World

29 Gas Heating Provides Bonus Classrooms in Oregon

departments

4 Building Permits
6 Project Preview
7 Job of the Month
8 Building Briefs
9 The Building Month
13 T-Square Talk
30 Products
31 Literature
32 Books
33 Manufacturers/Suppliers
34 Not Specified

VOLUME 67, NUMBER 12

Published monthly by
Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle, Wash.
Subscription price: $5 a year.
Controlled circulation postage paid at Seattle, Wash.

Full circulation and business data and advertisers' index on page 34

COVER: Wilshire Terrace Cooperative Apartments, West Los Angeles (p. 16)—Victor Gruen Associates, Architects; Gordon Sommers photo.

Building Permit Totals for

First Column Figures in Parentheses are Number of Residential Units • Second Column is Dollar V

CALIFORNIA

	# Res.	$ Value	Total $
Alameda	(18)	$ 209,212	$ 748,794
Alameda Co.	(87)	886,650	1,255,850
Albany	(1)	15,000	52,909
Alhambra	(9)	83,500	158,400
Anaheim	(776)	6,715,325	8,240,596
Antioch	(44)	374,452	414,801
Arcadia	(39)	496,927	876,659
Arroyo Grnde	(25)	311,115	317,467
Artesia	(71)	878,400	895,800
Atherton	(3)	145,000	257,141
Atwater	(2)	21,840	168,640
Auburn	(10)	97,500	190,670
Avalon	(3)	25,000	28,700
Azusa	(3)	23,700	142,511
Bakersfield	(106)	1,054,544	1,242,479
Baldwin Park	(46)	485,650	526,985
Banning	(7)	74,624	98,903
Barstow	(46)	325,550	422,453
Bell	(2)	14,000	96,908
Bellflower	(38)	260,000	587,215
Bell Gardens	(21)	168,900	330,650
Belmont	(73)	917,800	1,073,897
Benicia	(1)	1,000	7,760
Berkeley	(6)	137,952	1,082,879
Beverly Hills	(164)	4,409,000	4,861,409
Bradbury	(1)	34,000	48,500
Brawley	( )	Nil	51,325
Brea	(79)	1,382,639	1,633,219
Buena Park	(1)	12,440	989,270
Burbank	(8)	274,000	1,055,651
Burlingame	(8)	210,000	380,734
Butte Co.	( )	Nil	113,500
Calexico	(3)	17,000	42,900
Campbell	(30)	334,500	383,395
Carlsbad	(17)	132,502	177,231
Carmel	(4)	86,000	121,050
Chico	(5)	80,150	325,671
Chino	(1)	20,800	300,640
Chula Vista	(34)	208,908	3,043,717
Claremont	(57)	891,300	951,530
Coalinga	(1)	12,450	17,250
Colton	(3)	37,167	76,850
Commerce	( )	Nil	655,245
Compton	(5)	44,700	794,183
Concord	(172)	2,141,000	2,380,139
Cntra Csta Co.	(205)	3,929,182	5,008,747
Corona	(43)	585,484	796,682
Coronado	( )	No Reply	No Reply
Corte Madera	(19)	358,681	381,381
Costa Mesa	(50)	528,185	1,129,304
Covina	(8)	96,500	614,391
Cudahy	(11)	84,500	107,400
Culver City	(6)	66,000	174,256
Dairy Valley	( )	Nil	50,700
Daly City	(19)	251,270	297,566
Davis	(46)	840,000	923,640
Delano	(4)	37,000	42,410
Downey	(17)	206,360	591,295
Duarte	(30)	390,000	573,913
El Cajon	(41)	563,850	909,202
El Centro	(4)	33,000	326,186
El Cerrito	(19)	257,551	328,135
El Dorado Co.	(80)	954,010	1,087,765
El Monte	(85)	691,420	2,075,897
El Segundo	(7)	64,200	215,480
Emeryville	( )	No Reply	No Reply
Escondido	(43)	486,756	612,906
Eureka	(4)	46,500	106,297
Fairfield	(75)	567,275	688,943
Fillmore	(1)	11,496	18,276
Fontana	(8)	92,055	123,939
Fremont	(156)	2,003,300	3,516,668
Fresno	(97)	987,556	2,446,560
Fresno Co.	(59)	698,058	1,791,681
Fullerton	(48)	576,611	1,398,784
Glendale	(220)	1,849,468	2,435,857
Glendora	(8)	150,600	195,050
Half Mn Bay	(1)	12,000	90,700
Hanford	(51)	422,980	480,117
Hawthorne	( )	No Reply	No Reply
Hayward	(243)	1,455,300	1,984,335
Hemet	(59)	617,500	654,625
Hermosa Bch	(37)	281,346	336,980
Hidden Hills	( )	Nil	4,000
Hillsborough	(3)	108,000	154,300
Holtville	(1)	12,600	18,337
Humbldt Co.*	( )		16,480
Huntngtn Bch	(344)	4,854,767	6,248,279
Huntingtn Pk	(12)	87,380	105,020
Imperial Co.	( )	Nil	31,800
Indio	(1)	7,000	45,686
Industry	( )	Nil	242,900
Inglewood	(197)	1,813,000	2,175,719
Irwindale	(2)	14,700	35,910
Kern Co.	(187)	2,022,292	2,564,049
Laguna Beach	(13)	319,810	386,285
La Habra	(170)	2,467,345	2,537,242
Lakewood	(28)	268,000	507,280
La Mesa	(32)	328,605	406,282
La Mirada	( )	Nil	155,800
La Puente	(53)	356,200	420,545
La Verne	(5)	61,000	69,325
Lawndale	(81)	510,200	555,280
Lindsay	(1)	16,500	342,556
Livermore	(85)	684,254	826,574
Lodi	(13)	159,200	312,125
Lompoc	(130)	1,567,760	1,622,838
Long Beach	(208)	2,729,855	5,021,130
Los Altos	(21)	486,818	744,279
Los Angeles	(1,944)	24,387,029	71,347,507
Ls Angls Co.	(1,174)	16,233,690	20,820,633
Los Gatos	(25)	423,000	894,650
Lynwood	(60)	401,750	456,226
Madera	(5)	50,750	62,422
Madera Co.	(17)	190,595	248,535
Manhattn Bch	(40)	445,250	704,334
Manteca	(5)	46,000	169,320
Marin Co.	(78)	1,070,130	1,299,712
Martinez	(1)	17,400	467,751
Marysville	(10)	107,000	116,125
Maywood	(1)	4,000	11,910
Menlo Park	(54)	652,000	1,074,280
Merced	(53)	721,868	770,525
Merced Co.	(40)	400,380	496,562
Millbrae	(4)	94,000	271,350
Mill Valley	(11)	232,000	259,610
Modesto	(69)	891,500	1,142,105
Monrovia	(35)	310,493	391,996
Montclair	(2)	190,315	310,035
Montebello	(19)	179,530	336,908
Monterey	(10)	141,000	398,187
Monterey Co.	(136)	1,374,000	1,626,423
Monterey Prk	(22)	213,020	498,908
Mountin View	(29)	212,100	481,755
Napa	(8)	201,954	258,033
Napa Co.	(17)	244,312	410,362
National City	(75)	992,284	1,097,991
Newprt Beach	(70)	1,444,770	1,837,618
N. Sacramento	(4)	41,636	100,562
Norwalk	(42)	223,200	513,180
Novato	(8)	203,100	232,265
Oakdale	(8)	106,138	111,989
Oakland	(217)	2,128,700	5,475,282
Oceanside	(85)	1,120,000	1,542,020
Ojai	( )	Nil	40,790
Ontario	(7)	69,113	516,891
Orange	(160)	2,618,360	3,295,659
Orange Co.	(426)	7,629,646	9,006,982
Oroville	(5)	64,065	103,940
Oxnard	(90)	771,350	1,157,744
Pacifica	(22)	247,000	315,340
Pacific Grove	(23)	175,000	199,500
Palm Springs	(88)	974,500	1,540,378
Palo Alto	(6)	108,675	1,067,722
Pls Vrds Estts	(5)	195,945	223,560
Paramount	(5)	37,600	110,700
Pasadena	(19)	945,862	1,715,885
Pasa Robles	(2)	35,400	85,180
Pico Rivera	(6)	60,000	626,591
Piedmont	(1)	30,000	77,302
Pinole	(26)	345,100	452,380
Pittsburg	(1)	24,408	56,903
Placentia	(10)	76,000	97,660
Placer Co.	(69)	994,424	1,410,285
Pleasanton	(3)	46,420	51,246
Pomona	(65)	1,252,058	1,941,265
Porterville	(1)	6,000	333,439
Port Hueneme	(3)	16,000	36,875
Red Bluff	(2)	21,000	36,462
Redding	(15)	158,000	221,625
Redlands	(45)	613,800	666,048
Redondo Bech	(37)	353,109	518,649
Redwood City	(74)	489,430	669,930
Richmond	(64)	316,315	1,043,683
Riverside	(16)	187,297	1,941,669
Riverside Co.	(363)	3,958,924	5,721,708
Rolling Hills	( )	Nil	16,100
Rlng Hls Estts	(10)	297,500	365,750
Rosemead	(7)	66,600	109,333
Roseville	(7)	72,604	258,924
Sacramento	(132)	1,514,650	2,862,000
Sacramnto Co.	(315)	3,653,119	11,141,245
St. Helena	(12)	174,550	178,750
Salinas	(17)	296,768	1,068,117
Sn Bernardino	(79)	757,470	1,930,432
Sn Brnrdn Co.	(348)	2,994,623	4,078,344
San Bruno	(52)	710,000	946,073
San Carlos	(12)	240,941	370,386
San Clemente	(29)	316,955	348,805
San Diego	(629)	8,501,145	13,248,068
San Diego Co.	(143)	3,009,800	5,272,900
San Dimas	(1)	18,000	36,350
San Fernando	(25)	314,910	352,393
San Francisco	(276)	6,305,892	13,112,224
San Gabriel	(8)	88,082	150,323
Sanger	(1)	9,120	64,352
San Jacinto	(1)	14,700	16,700
Sn Joaquin Co.	(24)	210,576	710,371
San Jose	(658)	7,711,857	8,646,081
San Leandro	(97)	1,235,268	1,536,042
Sn Luis Obspo	(9)	125,973	184,224
S Ls Obsp Co.	(33)	373,882	586,521
San Marino	(1)	36,000	116,449
San Mateo	(108)	936,100	3,217,840
San Mateo Co.	(151)	1,608,965	2,154,494
San Pablo	(2)	17,000	380,099
San Rafael	(40)	554,422	1,547,204
Santa Ana	(206)	3,447,467	5,063,180
Santa Barbara	(22)	439,800	619,820
Snta Brbra Co.	(213)	3,745,800	4,254,300
Santa Clara	(77)	869,500	1,050,025
Santa Clra Co.	(47)	897,200	2,529,810
Santa Cruz	(16)	201,496	394,286
Santa Crz Co.	(114)	1,332,562	1,706,459
Snta Fe Sprgs	(1)	9,600	141,500
Santa Maria	(52)	698,555	823,835
Santa Monica	(69)	730,981	1,273,354
Santa Paula	(5)	67,720	132,746
Santa Rosa	(30)	484,550	1,101,981
Sausalito	(21)	306,390	334,340
Seal Beach	(8)	69,815	88,703
Seaside	(33)	186,000	250,680
Selma	(7)	89,628	470,808
Shasta Co.	(20)	261,714	261,714
Sierra Madre	(1)	11,500	41,925
Solano Co.	(8)	93,317	202,756
Sonoma Co.	(97)	1,114,000	1,488,019
So. El Monte	( )	Nil	175,650
South Gate	(3)	34,475	166,323
So. Pasadena	(2)	37,500	196,891
S. Sn. Frncsco	(9)	99,750	185,175
Stanislaus Co.	(41)	435,970	725,160
Stockton	(95)	877,295	1,179,180
Sunnyvale	(91)	1,447,400	1,849,804
Temple City	(29)	391,100	566,457
Torrance	(164)	2,264,108	2,753,930
Tracy	( )	Nil	Nil
Tulare	(5)	75,500	94,245
Tulare Co.	(39)	115,618	509,253
Turlock	(6)	100,555	150,085
Ukiah	( )	Nil	63,252
Upland	(29)	423,900	855,264
Vacaville	( )	No Reply	No Reply
Vallejo	(6)	97,500	237,492
Ventura	(3)	58,800	244,981
Ventura Co.	(291)	2,701,900	4,016,792
Visalia	(26)	431,790	932,694
Walnut	(1)	20,000	33,200
Walnut Creek	(156)	1,412,360	1,873,185
Wasco	(9)	176,500	184,600
Watsonville	(1)	28,760	60,237
West Covina	(12)	210,880	2,247,240
Whittier	(32)	314,500	502,620
Woodland	(8)	115,060	163,685
Woodside	( )	No Reply	No Reply
Yolo Co.	(17)	317,150	363,990
Yreka	(3)	49,000	64,582
Yuba City	(3)	31,140	75,710
Yuba Co.	(10)	78,900	124,600
Total	**(16,823)**	**$210,828,198**	**$365,060,162**

OREGON

Albany	(8)	$ 104,700	$ 164,735
Ashland	(3)	44,000	48,775
Astoria	(2)	28,640	33,255
Baker	(1)	9,000	88,375
Beaverton	(11)	179,400	560,064
Bend	(4)	53,500	99,475
Central Point	(4)	37,400	57,300
Clackamas Co.	(58)	756,500	906,049
Coos Bay	(6)	77,800	111,137
Corvallis	(12)	141,000	160,600
Dallas	(3)	44,000	96,171
Douglas Co.	(12)	128,400	142,986
Eugene	(76)	759,020	1,083,402
Forest Grove	(2)	27,000	79,985
Grants Pass	(9)	122,500	136,425
Gresham	(4)	63,600	66,700
Hermiston	(1)	13,583	18,715
Hillsboro	(9)	116,800	165,000

* Breakdown not available

Western States for October

sidential Permits Only • Third Column is Total Dollar Value of All Permits, Including Residential

	# Res.	$ Value	Total $
Hood River	( )	Nil	5,505
Klamath Falls	(1)	15,500	461,450
La Grande	(19)	191,000	214,759
Lane Co.	(95)	963,493	1,747,868
Lebanon	( )	Nil	4,195
Marion Co.	(42)	490,400	1,243,755
McMinnville	(2)	26,000	33,050
Medford	(15)	173,400	294,430
Milton-Frwtr	( )	Nil	21,147
Multnmah Co.	(94)	1,424,518	3,690,776
Newberg	(1)	11,000	608,100
Newport	(5)	39,700	72,600
North Bend	( )	Nil	25,070
Ontario	(4)	49,000	77,290
Oregon City	(4)	38,500	62,772
Oswego	(7)	145,600	298,165
Pendleton	( )	Nil	67,247
Portland	(53)	597,650	2,448,670
Prineville	( )	No Reply	No Reply
Roseburg	(4)	43,303	388,842
St. Helens	(1)	2,000	9,000
Salem	(27)	238,088	711,633
Seaside	(1)	11,000	36,500
Springfield	(10)	105,276	388,481
The Dalles	(4)	50,760	63,216
Wshngton Co.	(54)	946,843	1,447,068
Total	**(668)**	**$ 8,269,874**	**$ 18,439,192**

WASHINGTON

Aberdeen	(4)	$ 54,300	$ 77,512
Anacortes	(2)	25,700	56,170
Auburn	(3)	28,000	33,580
Bellevue	(3)	70,500	108,796
Bellingham	(4)	45,842	531,113
Bremerton	(4)	75,000	321,815
Camas	(4)	45,000	123,410
Centralia	(2)	20,000	55,294
Chehalis	( )	Nil	20,632
Clark Co.	(35)	445,750	890,064
Clarkston	( )	Nil	5,475
Ellenburg	(4)	49,400	64,205
Enumclaw	(2)	23,000	23,000
Ephrata	( )	Nil	69,825
Everett	(10)	155,357	570,794
Grys Hrbr Co.	(5)	30,500	52,275
Hoquiam	( )	Nil	20,940
Island Co.	(18)	104,300	127,623
Kelso	(1)	14,000	67,400
Kennewick	(3)	40,000	92,950
Kent	(7)	102,420	143,335
King Co.	(473)	6,968,100	10,410,570
Kirkland	(4)	48,500	54,100
Longview	(3)	45,000	206,053
Mercer Island	(18)	434,070	475,372
Moses Lake	(10)	130,300	274,900
Olympia	(6)	82,700	493,124
Pasco	(1)	12,000	82,843
Pierce Co.	(147)	1,640,735	4,852,887
Port Angeles	(2)	28,000	89,900
Port Orchard	( )	No Reply	No Reply
Pullman	(3)	32,000	47,000
Puyallup	(5)	52,500	105,250
Renton	(6)	77,735	147,733
Richland	(9)	160,550	398,437
Seattle	(65)	1,291,700	10,572,100
Shelton	( )	Nil	9,300
Spokane	(105)	1,096,700	2,282,789
Spokane Co.	(40)	706,805	1,580,880
Sunnyside	(1)	16,000	26,900
Tacoma	(42)	623,620	1,587,318
Vancouver	(6)	11,100	413,279
Walla Walla	(1)	11,000	87,696
Wlla Walla Co.	(1)	13,000	26,975
Wenatchee	(4)	46,000	173,934
Yakima	(9)	105,656	352,182
Total	**(1,072)**	**$ 14,962,840**	**$ 38,207,730**

ALASKA

Anchorage	(23)	$ 463,810	$ 792,215
Fairbanks	(2)	38,600	140,200
Juneau	( )	Nil	106,540
Ketchikan	( )	Nil	22,900
Total	**(25)**	**$ 502,410**	**$ 1,061,855**

IDAHO

Alameda	(11)	$ 137,000	$ 144,340
Blackfoot	(7)	119,300	136,100
Boise	(9)	107,000	415,030
Caldwell	(4)	70,500	84,646
Coeur d'Alene	(2)	24,380	43,230
Idaho Falls	(15)	234,274	1,741,013
Jerome	( )	Nil	8,800
Lewiston	(4)	62,000	147,836
Moscow	(6)	90,400	129,585
Nama	(8)	106,000	170,030
Payette	(4)	54,000	331,400
Pocatello	(14)	207,600	448,342
Sandpoint	(2)	93,000	98,300
St. Maries	( )	Nil	Nil
Twin Falls	(6)	57,000	138,319
Total	**(92)**	**$ 1,362,454**	**$ 4,036,971**

MONTANA

Anaconda	( )	$ Nil	$ 62,500
Billings	(31)	470,200	740,585
Bozeman	(10)	157,000	173,225
Butte	( )	Nil	2,000
Cut Bank	( )	Nil	5,800
Glasgow	(10)	142,500	199,200
Glendive	(1)	13,200	16,200
Great Falls	(25)	268,095	604,586
Havre	(4)	32,500	39,050
Helena	(11)	164,500	200,465
Kalispell	(1)	7,000	35,465
Lewistown	(5)	42,000	76,000
Livingston	(2)	16,000	21,250
Malta	( )	Nil	Nil
Miles City	(3)	46,000	143,310
Missoula	( )	Nil	201,217
Total	**(103)**	**$ 1,358,995**	**$ 2,520,854**

WYOMING

Casper	(20)	$ 267,500	$ 872,400
Cheyenne	(24)	259,000	341,069
Cody	(1)	16,000	17,500
Laramie	(9)	108,900	214,437
Rawlins	(3)	38,000	46,650
Riverton	(2)	22,000	55,500
Rock Springs	( )	Nil	15,000
Sheridan	(5)	77,000	99,853
Total	**(64)**	**$ 788,400**	**$ 1,662,409**

COLORADO

Adams Co.	(220)	$ 2,898,000	$ 4,084,525
Alamosa	(3)	44,500	69,900
Arapahoe Co.	(87)	1,748,800	4,606,257
Arvada	(101)	1,257,000	1,708,176
Aspen	(2)	27,000	100,500
Aurora	(55)	1,413,729	1,643,016
Boulder	( )	5,926	800,056
Boulder Co.	(21)	276,500	432,600
Clorado Sprgs	(62)	773,534	950,302
Cortez	( )	No Reply	No Reply
Denver	(506)	4,076,960	12,829,968
Durango	(3)	43,782	91,183
El Paso Co.	(34)	455,400	1,713,133
Englewood	(13)	60,250	485,124
Estes Park	(5)	63,400	63,400
Fort Collins	(13)	178,500	248,845
Fort Morgan	(1)	20,744	133,754
Golden	(13)	131,600	158,200
Grnd Jnctn	( )	Nil	49,897
Greeley	(20)	200,300	498,081
Jefferson Co.	(392)	3,962,614	5,491,702
La Junta	(1)	14,000	165,641
Lamar	(3)	40,000	47,000
Littleton	(24)	260,300	940,132
Longmont	(16)	177,500	198,762
Loveland	(10)	113,000	600,150
Monte Vista	(2)	11,000	30,937
Montrose	(5)	65,968	94,202
Pitkin Co.	( )	Nil	25,000
Pueblo	(31)	344,824	642,337
Pueblo Co.	(11)	69,500	121,637
Sterling	(1)	1,600	20,740
Trinidad	( )	Nil	26,605
Walsenburg	( )	Nil	Nil
Westminster	(20)	193,594	228,774
Total	**(1,675)**	**$ 18,929,825**	**$ 39,300,536**

UTAH

Amrican Fork	(3)	$ 28,000	$ 30,450
Bountiful	(8)	136,200	149,200
Brigham City	(32)	333,000	339,600
Cedar City	( )	Nil	5,550
Clearfield	(3)	36,000	53,300
Davis Co.	(2)	33,688	58,766
Kaysville	(8)	54,255	57,255
Layton	(26)	346,000	364,850
Logan	(8)	133,895	146,492
Murray	(8)	94,000	435,798
Ogden	(18)	314,620	766,400
Orem	(12)	140,320	157,170
Price	( )	15,000	90,000
Provo	(11)	125,400	767,975
Salt Lake City	(206)	2,292,037	3,415,789
Salt Lake Co.	(184)	2,275,853	4,703,144
S. Slt Lke City	(1)	9,000	38,280
Spanish Fork	(2)	25,000	34,700
Toole	(29)	316,962	350,346
Utah Co.	(8)	104,635	131,725
Weber Co.	(5)	44,000	230,200
Total	**(574)**	**$ 6,857,865**	**$ 12,326,990**

NEVADA

Boulder City	( )	$ Nil	$ 5,519
Clark Co.	(96)	1,048,502	2,582,222
Elko	( )	No Reply	No Reply
Las Vegas	(163)	2,076,024	6,614,117
N. Las Vegas	(27)	690,295	824,281
Reno	(53)	688,124	1,262,839
Sparks	(10)	111,050	146,731
Washoe Co.	(28)	538,176	664,042
Total	**(377)**	**$ 5,152,171**	**$ 12,099,751**

ARIZONA

Buckeye	( )	$ Nil	$ 1,300
Casa Grande	( )	Nil	5,700
Chandler	(6)	68,410	193,040
Douglas	(2)	13,825	28,004
Flagstaff	(36)	189,960	258,158
Florence	( )	Nil	250
Glendale	(5)	78,500	143,550
Maricopa Co.	(555)	5,021,034	5,329,336
Mesa	(86)	857,315	990,548
Phoenix	(361)	2,833,053	11,223,546
Pima Co.	(83)	906,865	1,184,502
Prescott	(12)	129,300	224,541
Scottsdale	(12)	151,700	751,045
Tempe	(89)	776,700	1,146,541
Tucson	(139)	1,114,650	2,392,262
Wickenburg	(2)	12,500	14,700
Winslow	(5)	9,000	44,000
Yuma	(5)	41,000	129,176
Total	**(1,398)**	**$ 12,203,812**	**$ 24,060,199**

NEW MEXICO

Alamogordo	( )	$ Nil	$ 14,555
Albuquerque	(91)	1,405,435	2,314,784
Artesia	(6)	32,500	68,137
Carlsbad	(7)	67,000	211,050
Clovis	(18)	198,719	970,503
Deming	(2)	13,500	20,180
Farmington	(1)	16,000	288,350
Gallup	(4)	16,300	152,000
Hobbs	(13)	213,416	259,528
Las Cruces	(12)	127,500	203,647
Las Vegas	( )	Nil	7,650
Lovington	(4)	55,500	69,850
Raton	(1)	2,000	27,500
Roswell	(95)	916,600	1,682,430
Santa Fe	(6)	76,700	363,054
Silver City	(1)	6,500	17,250
Truth or Consequences	( )	No Reply	No Reply
Tucumcari	(2)	45,000	162,075
Tularosa	( )	Nil	4,201
Total	**(263)**	**$ 3,192,670**	**$ 6,836,744**

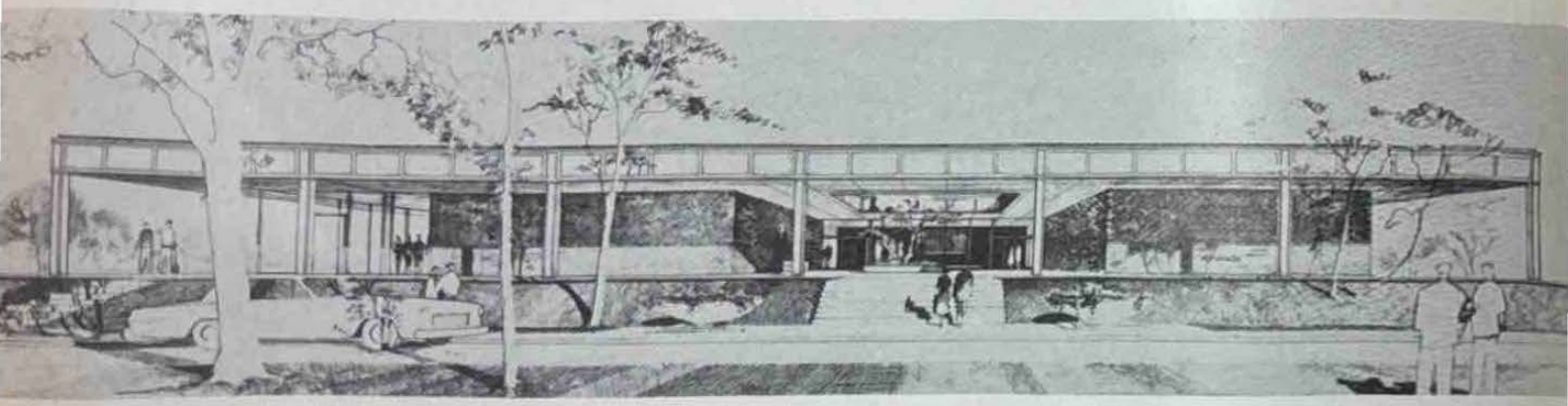
HAWAII

Hawaii Co.	(20)	$ 227,052	$ 723,643
Honolulu	(583)	5,551,898	15,189,854
Maui Co.	(10)	101,108	286,359
Total	**(613)**	**$ 5,880,058**	**$ 16,199,856**
GRAND TOTAL	**(23,747)**	**$290,289,572**	**$541,813,249**



UTAH: DISTRIBUTION CENTER

now under construction for John Wiley & Sons, Inc., textbook publishing house, will serve 13 western states out of Salt Lake City in combination office-warehouse structure. Roof will be composed of 15 reinforced concrete umbrella shells, each 34x40 ft. consisting of four hyperbolic paraboloids with central supporting column. One set of forms will be reused for entire job. Architects: Donald H. Parushka & Associates; structural engineer: George S. Nelson.



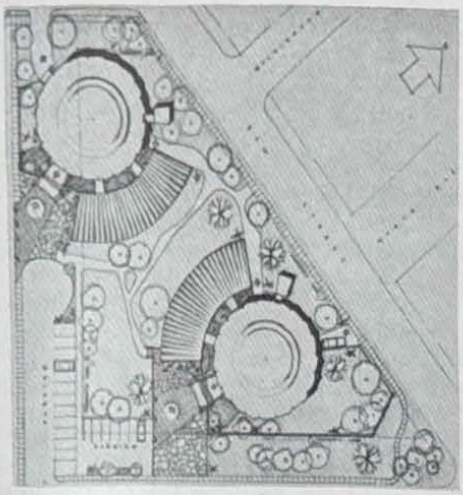
OREGON: GOLF CLUBHOUSE

for Meriwether, private residential park west of Portland along Tualatin River, will provide facilities for 500 members. Locker rooms and kitchen are enclosed in brick and form three solid areas under long-span glued laminated roof; voids between form two dining rooms, lounge, pro shop, lobby and entrance court. Lower level has club storage and space for 36 electric cars. Roof extends beyond enclosed structure to cover perimeter walk that affords access in all directions to golf course. Architects: Skidmore, Owings & Merrill.

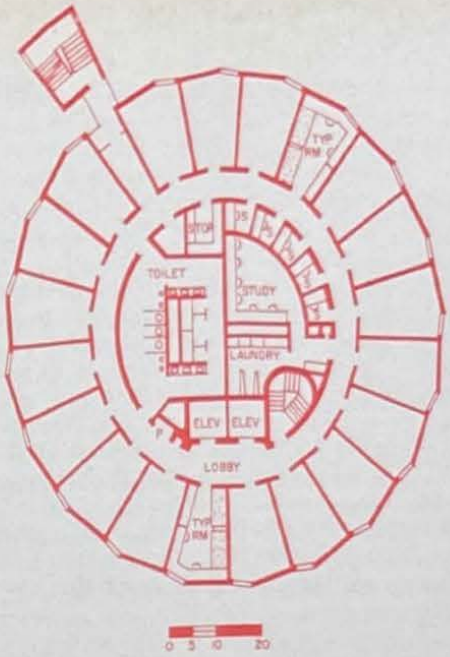


COLORADO: MEMORIAL AUDITORIUM

named after Walter P. Paepcke, Chicago industrialist who founded Aspen Institute for Humanistic Studies in 1950, will seat about 900 in $400,000 hexagonal shaped structure. Sides will be so designed that they can be opened to accommodate overflow audiences in summer season. Sloping terrain of site in Aspen Meadows will allow for above-ground deck, with dressing and orchestra rooms, lounges, toilets and utilities located underneath. Auditorium replaces famed tent which has housed Aspen Music Festival each June. Architect: Herbert Bayer



TWIN TOWER is proposed for later date.



TYPICAL FLOOR

Eastern Washington to have West's first circular dorm

When a 12-story tower to house 440 men of Eastern Washington State College at Cheney is completed late in 1962, it will not only dominate the campus but will become one of the tallest structures in the Inland Empire.

"Choice of a high-rise building was not made in order to conserve land," explains a spokesman for the firm of Culler, Gale, Martell, architects, and Norrie & Davis, engineers. "Rather the desire was to concentrate students to provide for shorter distances to classes, the library, dining halls and similar basic functions."

Twenty two-man units will be located on each of the 11 living floors. Main floor will contain the director's apartment, administration and service facilities, lounge and recreation areas. A partial basement will have trunk and general storage space and a telephone equipment room. Penthouse provides for the assembly of about 40 to 50 persons or the equivalent of one resident floor. It was decided not to develop the roof area for lounging or sightseeing because of the supervision problems.

The center service core is designed for poured-in-place concrete, the annulus for partial prestress lift slab and the fire tower with a slip form option. The idea of slip forms with the center core was abandoned because of the heavy concentration of mechanical and electrical service and equipment. Tower's exterior walls are precast concrete panels; folded plate roof over lounge-recreation wing is plywood.



SLOPING SITE allows main doors to open into lower level entry from which flight of stairs leads to first floor. Elevator service to tower begins at latter level.

Building Briefs . . . *Highlights & Sidelights*

THE BUILDING WEST—Permits for October totaled $541,813,249 in the 13 western states, a remarkable increase of $119.2 billion (24.7%) over a year ago. Pacific Architect & Builder's monthly survey shows residential building accounted for more than half the total dollar volume at $290 million, while industrial-commercial building reached $251 million. Residential volume in California soared to $210,828,198 for the month, an increase of $55.5 million over October 1960. In Colorado the residential volume exceeded $18 million, a $7.9 million gain over the corresponding month a year ago. Washington registered the third largest increase of $2.1 million in that category. Industrial-commercial building also showed a healthy rise. California totaled $154,231,964 for the month, a $27 million gain; Washington, $23,244,890, a $9 million gain. Colorado and Hawaii each increased $5 million.

TOP TWENTY-FIVE—Hottest spots in the West for October are the agencies listed here with dollar volume of permits rounded out in millions: **1.** Los Angeles, $71.3; **2.** Los Angeles County, $20.8; **3.** Honolulu, $15.1; **4.** San Diego, $13.2; **5.** San Francisco, $13.1; **6.** Denver, $12.8; **7.** Phoenix, $11.2; **8.** Sacramento County, $11.1; **9.** Seattle, $10.6; **10.** King County, Wash., $10.4; **11.** Orange County, $9; **12.** San Jose, $8.6; **13.** Anaheim, Calif., $8.2; **14.** Las Vegas, $6.6; **15.** Huntington Beach, Calif., $6.2; **16.** Riverside, County, Calif., $5.7; **17.** Jefferson County, Colo., $5.4; **18.** Oakland, $5.5; **19.** Maricopa County, Ariz., $5.3; **20.** San Diego County, $5.2; **21.** Santa Ana, Calif., $5; **22.** Long Beach, $5; **23.** Contra Costa County, Calif., $5; **24.** Beverly Hills, $4.9; **25.** Pierce County, Wash., $4.8.

CONCERNING COMMISSIONS—Two long-time associates of the late Eero Saarinen will design Oakland's new $6 million museum complex, winning out over nearly a dozen distinguished architects who were interviewed for the job, including New York's Philip Johnson and Yale's Paul Rudolph, the runners-up. Kevin Roche and John Dinkeloo, head designer and production chief, respectively, for the Bloomfield Hills, Mich., firm, have agreed to associate with Oakland architects Reynolds & Chamberlain.

ROOM SERVICE YEAR 2011 — The California State Hotel Association at its annual convention in Santa Barbara was told that it can expect rooftop lobbies to accommodate guests arriving by "jetocopter," walls that store solar energy for light and heat and moving hallways within the next 50 years. Making the prediction was Los Angeles architect Welton Becket, pointing out that "perhaps we will want to give more attention to emotional climate. As psychologists develop definite theories of how to cater to our emotional needs, we will design a hotel room that can be adjusted by the guest to his particular mood of the moment through changing light and color." Getting a bit more down to earth, Becket forsaw possible use of a highly heat-resistant coating—sprayed onto steel beams prior to erection—as an exceptionally lightweight and inexpensive substitute for the present practice of applying heavy layers of concrete around structural beams in order to fireproof them.

STATEWIDE STATUS FOR THE ARTS—Washington became the eighth state to give official recognition to the arts when Governor Rosellini called his 21-member group together for its initial meeting. The governor said he will instruct state agencies to consult the State Arts Commission, whose vice chairman is architect Robert W. Evans of Tacoma, before entering any development plans, whether for highways, buildings or improvement of the capital campus. "As a state agency," he added, "we should start with our own state departments in carrying out the job of beautification and emphasis on the arts."

HOME BUILDING: THE HOW AND THE WHY—The University of Southern California has begun a two-year research under a National Science Foundation grant which will look closely into the economics and productivity of the single-family home building industry of Los Angeles. Said Dr. Arthur L. Grey, head of the graduate program in city and regional planning, in explaining the reasons behind the study: "Economists generally rate the housing industry as low in productivity in comparison with the mechanical industries. We expect to investigate the efficiency of the local home building industry because it has consistently out-produced all other metropolitan areas in the matter of the single-family residence."

CONTRACTORS PICK CALIFORNIAN—Frank F. Burrows, Belmont, Calif., building contractor, who currently is national vice president of the AGC, was nominated for president at the mid-year meeting in New Orleans, which is tantamount to election. New executive director at the Washington, D.C., headquarters is William E. Dunn, moving up from assistant executive director to replace the late James D. Marshall who died November 3 from complications following an operation.

ABOUT AUTOMATION—Denver area architects were treated to sirloin steak or Rock Cornish game hen at the Brown Palace Hotel one day last month, not very newsworthy in itself to a profession accustomed to much wining and dining by the manufacturers and suppliers. In this particular case the complete bill of fare was served automatically. The host: Vendo Co., whose officials are acquainting architects and school officials with the possibilities of automatic cafeterias.

Californians turn 'Adios Suburbia' into 'Adios Ugliness'

The Hotel del Coronado was a perfect setting for the theme of the 16th annual convention of the California Council, AIA, October 18-22: "Adios Suburbia? — New Glamour for the Center City."

For although the grand old hotel built in 1888 has been given a new face, there is no mistaking the fact that the Victorian architecture stubbornly persists in spite of the elegance of the new entrance and the disappearance to the attic of the famous rocking chairs that once greeted visitors from the front porch. After every speech and panel discussion that hopefully said goodbye to suburbia, the participants returned to reality and looked at the Hotel del Coronado only to think: "The new makeup and face lifting might help the old girl, but she is still age 73."

Perhaps the theme seemed even more puzzling to convention-goers from Los Angeles as they read their Thursday morning paper to see that ground was broken for the bright and vivacious 20th Century City, far away from the center city.

Yet if these thoughts prevailed, they did not dim the hopes of the architects that something could be done to give our cities a much-needed shot in the arm to keep them from deteriorating beyond repair.

Without a doubt the most enthusiastic reception was given to the address of the new dean of the University of Southern California's School of Architecture, Samuel T. Hurst. In a sensitive speech he contended that suburbia, "a 20th century phenomenon, had reached the point of diminishing returns."



HURST

Dean Hurst did not try to give proof that a shift back to urbanity was occurring; rather he pursued the premise that urban living is more promising and new glamour is all that it needs. No doubt many of his listeners who visualized short walks to the office, a well-planned city where was still a feeling of belonging to a community, a city where beauty and cultural joys were available, would readily give up the hour-long trek to work breathing suffocating gas fumes and viewing the rear end of a two-ton truck.

No one could argue with Dean Hurst when he said "growth, distance, time, poor planning and overspeculation have brought about the suburb to the near limit of its attractiveness." No one could deny "poverty, squalor and disease, ugliness and ignorance have no place in the city and that the ultimate concern of the city is man's humanity to man." No honest person could deny "the whimsy, exhibitionism and wastefulness of today's architecture."

Yet Dean Hurst's rhetoric could not fully shake the doubt from some minds that depreciation-minded tax structures, still unsolved transportation problems and a society that prefers the unrealistic television westerns could be overcome to such an extent that there would be a restoration of "love and order" in the center city. There can be little argument that the suburbs have reached out so far that a return to the center city is inevitable, but will it be a welcome return and will we have the energy and willingness to accept the challenge of a battle that will surely be a frustrating one: to put "heart" in the center city? With the idealistic leadership of such men as the young (41) Dean Hurst, we almost believe it might be possible.

Panel discussions such as "The Architect and the Modern City" with top authorities speaking to the nearly 1,000 registrants emphasized the problems and solutions in preparing the center city for 24-hours-a-day living. Architect Charles A. Blessing, director of city planning for Detroit, outlined that city's urban renewal program. Mockups of proposed schemes showed some promising answers, but others would undoubtedly create the problems that already exist all over again, only in a different area. In a slide presentation, Blessing made an effective argument for architects to heed nature's beauties in their designs.

Much of the convention program, under the direction of Charles E. Fry, had to be changed because of cancellations and substitutions, but the Los Angeles architect kept pulling speakers out of his hat. When Mexican architect Guillermo Rossell, chairman of the Border Town Planning Commission, was unable to attend, Mexico's president sent in his place Carlos Contreras who read Rossell's speech. When Carl Feiss, planning and urban renewal consultant of Washington, D.C., cancelled, San Diego Planning Commissioner Victor Lundy (not to be confused with the Florida architect) took his place.



HOTEL'S GARDEN AREA takes on carnival-like air as 79 exhibitors set up shop in brightly decorated booths and California State Polytechnic College students erect gazebo of masonite panels and hold daily film festival.

One speaker who did show up and drew one of the largest crowds was William Zeckendorf, president of Webb & Knapp, Inc. Discussing "The Developer and the Modern City," he rightfully pointed out that the problem of suburbia was much different in Los Angeles and Southern California than in New York. "Here," he explained, "the suburbs have enveloped and absorbed and grown into the city and the city into the suburbs." Zeckendorf claimed Southern California has no city and no suburbs; instead it is all one and the lack of imagination and cohesion has permitted effusion and a situation that can only end in a psychotic population.

However, Zeckendorf offered some remedies too. Pointing out that the ratio of land cost to the total cost of the project for a single family house is higher in Los Angeles than in any other place in the U.S., he said this was not due to big land prices but to the fact that it costs so much to do some very unimaginative kind of work. Instead of a cut-and-fill form of mass housing, Zeckendorf said he believes any 100 acres being developed for 250 families at great cost and destruction to nature could house those same families on one acre, leaving 99 for the development of a parklike area and still preserving the natural beauty of the land. But few developers have the esthetic appreciation of a William Zeckendorf. One might rightfully wonder if some wouldn't use the 100 acres for 25,000 verticalized projects unless definite controls were rigidly imposed.

Zeckendorf gave sound arguments that good site use and planning could be profitable for the investor as well as the community. Since his firm practices what it preaches, it is at least an encouraging sign that some developers are moving in the right direction.

A very sobering problem was con-

sidered during the last panel meeting on professional practice, moderated by Herman Charles Light of Los Angeles and a member of the national AIA committee. Robert E. Burns, San Francisco attorney and legal consultant for the CCAIA, outlined the architect's responsibilities which seemed almost frightening to most of his audience. Judgments handed down in the past few years would bear out his opinions, but the architect's responsibilities have become so far reaching that there seems to be little legal refuge for the head of architectural firms.

Victor O. Schinnerer, insurance broker and a consultant to the Octagon on its liability insurance program, cited case after case where judgments were made in favor of the client and not the architect. There was little argument that the inadequately insured architect is playing with possible financial ruin.

The Institute had not forgotten its biggest area of membership and was represented by its executive director, William H. Scheick, as well as its first vice president, Henry L. Wright of Los Angeles. (Wright has been nominated for the presidency by at least three chapters, including Pasadena.)

Director Scheick stated something that Californians have known for many years—that they are pioneering a path of chapter and state organizational activities and performance for much of the AIA to follow. The majority who heard Scheick speak or chatted with him during the convention realized that the Institute has a dynamic leader, willing to listen to new ideas, presenting a few of his own, but never forgetting that it is action that really counts.

As is their custom, the three California chapters of the Producers' Council teamed up to sponsor a convention speaker, London architect James Stirling, who showed slides of such projects as the Preston rehousing and the Flats at Ham Common. Though the British magazine, Architectural Review, lauded the latter as "an attempt to face the economic realities of dwelling construction in England today and to extract from them an architecture that is workable in plan and grouping and an esthetic that is effective rather than merely sufferable," the results left most of the Coronado viewers rather cold.

The Flats at Ham Common were built at the edge of Richmond Park, which gives some relief to the towering apartment dwellings, not unlike Le Corbusier's design. The Preston project showed rows of brick apartments that seem to belie the fact that they had replaced something less beautiful. While his schemes for these projects might well fit the sociological needs of Britain, there seemed to be no helpful solutions for the architects of the U.S.

Summing up, the CCAIA convention was an unqualified success. Much was said that the architects could take home with them to better serve their community. But perhaps the most important thing was the camaraderie and the freshly restated knowledge that within every architect is a kindred spirit to build a better world. It may not be "Adios Suburbia" but "Adios Ugliness and Waste." It is certain that all left Coronado with new hope for a better architecture and a better California.

—William G. Quinn

CALIFORNIA FAIR BOARD TO SCREEN CONSULTANTS

In a nationwide invitation the California State Fair Board is seeking the services of a consulting firm to provide management and design advice on construction of a new fair and exposition on a 1,000-acre site on the American River in Sacramento. Applications for an audience before the board were to have been received at the State Fair office, Box 2036, Sacramento, prior to 5 p.m. December 1.

Firms surviving the initial screening will be requested to appear in Sacramento early in 1962. The firm selected will not be eligible for any participation in the further development of the fair or peripheral areas except as an adviser or agent to the board. An appropriation of about $7 million is available for the job.

Two California steel bridges cited for esthetic qualities

A movable bridge over the Sacramento River at Rio Vista, Calif., has been designated as one of the four "most beautiful opened to traffic in the U.S. during 1960." The annual competition of the American Institute of Steel Construction drew 89 entries from 27 states.

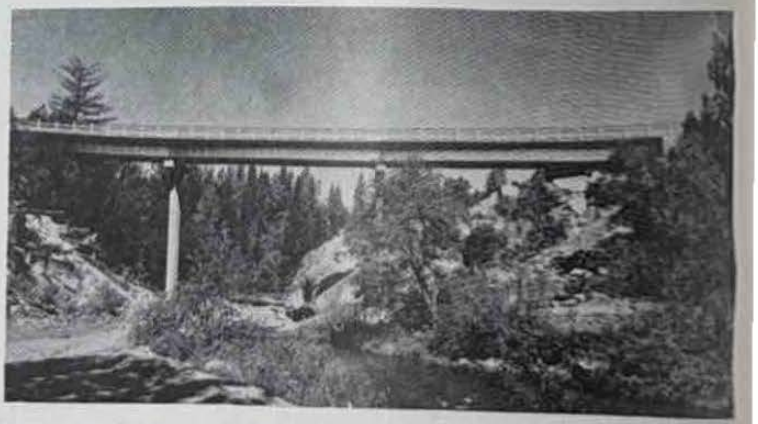
A second project in California won an honorable mention for bridges with spans under 400 ft., costing under $500,000.

The Rio Vista Bridge was cited for its straightforward design. Unlike most lift bridges, these two towers are "decorative as well as functional, providing stark contrast with the horizontal line established by the approaches," the five-man jury said.

Among the jurors was Prof. Glenn W. Holcomb of Oregon State University and president of the American Society of Civil Engineers. Others were architects A. L. Aydelott, Memphis; George Lindstrom, Chicago; and Geoffrey Platt, New York; and Thomas S. Buechner, director of the Brooklyn Museum.



RIO VISTA BRIDGE, over Sacramento River. Designer: Bridge Department, Division of Highways, State of California; fabricator: Judson Pacific-Murphy Corporation Division, Yuba Consolidated Industries, Inc.



NORTH FORK CONSUMNES RIVER BRIDGE, eight miles southeast of Placerville, Calif. Designer: County of El Dorado; fabricator: American Bridge Division, United States Steel Corp.

Major Line Space-Saver KITCHEN

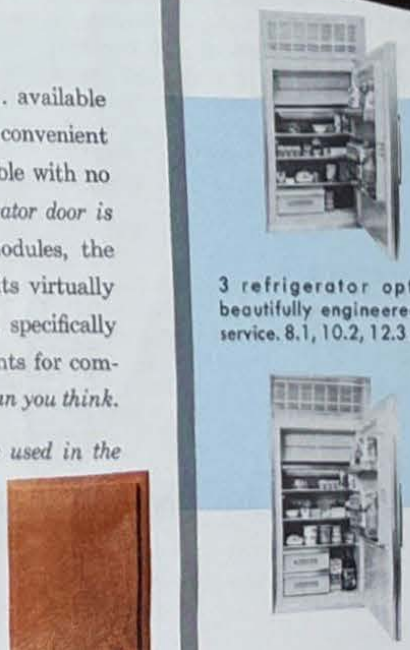
Designed for functional efficiency in limited space

COMPACT AND COMPLETE FROM 79" OVERALL



Gorgeous wood . . . solid wood . . . available in four lovely finishes. Note that convenient eye-level refrigerator, easily accessible with no stooping. (*On the average, a refrigerator door is opened 80 times a day.*) In 3" modules, the wonderfully flexible Space-Saver fits virtually any shape or size. It's engineered specifically to architect and builder requirements for compact kitchens . . . *and it costs less than you think.*

Send for finished samples of woods used in the Major Line Space-Saver. →



3 refrigerator options beautifully engineered for service. 8.1, 10.2, 12.3 cu. ft.



Space-Saver Kitchens, installed in Bayview Manor, Seattle, Wash., specified by John Graham and Company, Architects-Engineers, Seattle-New York.

Major Line
PRODUCTS CO., INC.
Hoquiam, Washington

sidered during the last panel meeting on professional practice, moderated by Herman Charles Light of Los Angeles and a member of the national AIA committee. Robert E. Burns, San Francisco attorney and legal consultant for the CCAIA, outlined the architect's responsibilities which seemed almost frightening to most of his audience. Judgments handed down in the past few years would bear out his opinions, but the architect's responsibilities have become so far reaching that there seems to be little legal refuge for the head of architectural firms.

Victor O. Schinnerer, insurance broker and a consultant to the Octagon on its liability insurance program, cited case after case where judgments were made in favor of the client and not the architect. There was little argument that the inadequately insured architect is playing with possible financial ruin.

The Institute had not forgotten its biggest area of membership and was represented by its executive director, William H. Scheick, as well as its first vice president, Henry L. Wright of Los Angeles. (Wright has been nominated for the presidency by at least three chapters, including Pasadena.)

Director Scheick stated something that Californians have known for many years—that they are pioneering a path of chapter and state organizational activities and performance for much of the AIA to follow. The majority who heard Scheick speak or chatted with him during the convention realized that the Institute has a dynamic leader, willing to listen to new ideas, presenting a few of his own, but never forgetting that it is action that really counts.

As is their custom, the three California chapters of the Producers' Council teamed up to sponsor a convention speaker, London architect James Stirling, who showed slides of such projects as the Preston rehousing and the Flats at Ham Common. Though the British magazine, Architectural Review, lauded the latter as "an attempt to face the economic realities of dwelling construction in England today and to extract from them an architecture that is workable in plan and grouping and an esthetic that is effective rather than merely sufferable," the results left most of the Coronado viewers rather cold.

The Flats at Ham Common were built at the edge of Richmond Park, which gives some relief to the towering apartment dwellings, not unlike Le Corbusier's design. The Preston project showed rows of brick apartments that seem to belie the fact that they had replaced something less beautiful. While his schemes for these projects might well fit the sociological needs of Britain, there seemed to be no helpful solutions for the architects of the U.S.

Summing up, the CCAIA convention was an unqualified success. Much was said that the architects could take home with them to better serve their community. But perhaps the most important thing was the camaraderie and the freshly restated knowledge that within every architect is a kindred spirit to build a better world. It may not be "Adios Suburbia" but "Adios Ugliness and Waste." It is certain that all left Coronado with new hope for a better architecture and a better California.

—William G. Quinn

CALIFORNIA FAIR BOARD TO SCREEN CONSULTANTS

In a nationwide invitation the California State Fair Board is seeking the services of a consulting firm to provide management and design advice on construction of a new fair and exposition on a 1,000-acre site on the American River in Sacramento. Applications for an audience before the board were to have been received at the State Fair office, Box 2036, Sacramento, prior to 5 p.m. December 1.

Firms surviving the initial screening will be requested to appear in Sacramento early in 1962. The firm selected will not be eligible for any participation in the further development of the fair or peripheral areas except as an adviser or agent to the board. An appropriation of about $7 million is available for the job.

Two California steel bridges cited for esthetic qualities

A movable bridge over the Sacramento River at Rio Vista, Calif., has been designated as one of the four "most beautiful opened to traffic in the U.S. during 1960." The annual competition of the American Institute of Steel Construction drew 89 entries from 27 states.

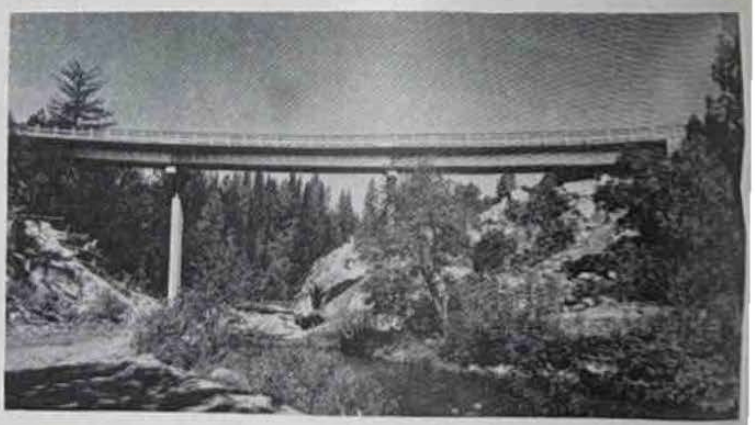
A second project in California won an honorable mention for bridges with spans under 400 ft., costing under $500,000.

The Rio Vista Bridge was cited for its straightforward design. Unlike most lift bridges, these two towers are "decorative as well as functional, providing stark contrast with the horizontal line established by the approaches," the five-man jury said.

Among the jurors was Prof. Glenn W. Holcomb of Oregon State University and president of the American Society of Civil Engineers. Others were architects A. L. Aydelott, Memphis; George Lindstrom, Chicago; and Geoffrey Platt, New York; and Thomas S. Buechner, director of the Brooklyn Museum.



RIO VISTA BRIDGE, over Sacramento River. Designer: Bridge Department, Division of Highways, State of California; fabricator: Judson Pacific-Murphy Corporation Division, Yuba Consolidated Industries, Inc.



NORTH FORK CONSUMNES RIVER BRIDGE, eight miles southeast of Placerville, Calif. Designer: County of El Dorado; fabricator: American Bridge Division, United States Steel Corp.

Major Line Space-Saver KITCHEN

Designed for functional efficiency in limited space

COMPACT AND COMPLETE FROM 79" OVERALL



Gorgeous wood . . . solid wood . . . available in four lovely finishes. Note that convenient eye-level refrigerator, easily accessible with no stooping. (*On the average, a refrigerator door is opened 80 times a day.*) In 3" modules, the wonderfully flexible Space-Saver fits virtually any shape or size. It's engineered specifically to architect and builder requirements for compact kitchens . . . *and it costs less than you think.*

Send for finished samples of woods used in the Major Line Space-Saver. →





3 refrigerator options beautifully engineered for service. 8.1, 10.2, 12.3 cu. ft.



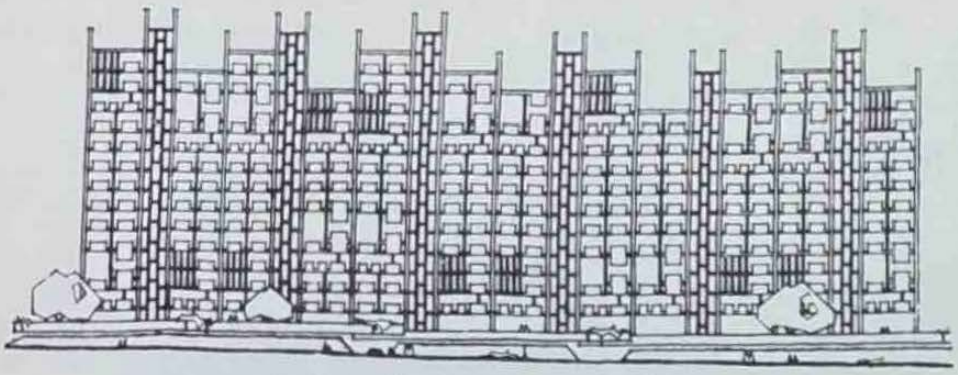


Space-Saver Kitchens, installed in Bayview Manor, Seattle, Wash., specified by John Graham and Company, Architects-Engineers, Seattle-New York.

Major Line

PRODUCTS CO., INC.

Hoquiam, Washington



RED ROCK WAY HIGH-RISE APARTMENTS

Cohen and Levorsen emerge as architects for Red Rock Hill

Peninsula Apartments, Inc., successful bidder at $4,525,000 for 22 acres on San Francisco's Red Rock Hill, has picked the design of two local architects, B. Clyde Cohen and James K. Levorsen, for the 900-unit project.

The commission is a real feather in the cap of the two ex-Anshen & Allen men, both in their early 30s, who teamed up with H. J. Brunnier, structural engineer; Keller & Gannon, mechanical - electrical engineers; and Ecko, Dean & Williams, landscape architects.

Cohen and Levorsen were among four finalists in a nationwide competition sponsored by the San Francisco Redevelopment Agency to determine the most practical and attractive use of the land, which is in the Diamond Heights area just off the Market Street-Portola Expressway, about 10 minutes from the Civic Center. One of the conditions of the sale was the ultimate use of one of the four plans.

The winning syndicate is made up of Irvin J. Kahn and Norman R. Smith, principals of the San Diego University City development; Milton Gordon of Los Angeles; and Leo and Walter Minskoff of New York. Kahn estimated the entire project would require a $20 million expenditure besides the cost of the land.

The scheme devised by Cohen and Levorsen calls for 340 apartments in low-rise structures and 640 in high-rise towers. The latter are composed of segments which vary from seven to twelve stories in height and are connected to form chains of structural units which follow the street pattern. The resulting linkages undulate in both plan and elevation and are developed as form protected outdoor areas for public use. The varied height of the tower segments is correlated with the topography and with the surrounding apartments to insure maximum view for all rental units. Low-rise structures form similar linkages and include two apartment levels over a parking level.

By eliminating central corridors, each high- and low-rise apartment unit extends through the full depth of the building and provides opposite exposures and separate balconies or decks for both living and bedroom areas. This concept of full-depth apartments will command maximum rentals with the range recommended by SFRA.

The high-rise apartments are of reinforced concrete construction with vertical furred walls containing all plumbing, mechanical and electrical risers. This system allows the use of flat slab floor construction and results in a 9-ft. floor-to-floor height. Low-rise wood frame apartments are located on the existing benched areas.

14 California firms will plan state college campuses

Assignments as consulting architects for California's 18 state college campuses have gone to 14 private firms and the Division of Architecture, which will be responsible for planning at Alameda, Fresno, San Francisco and San Jose. The others (PA&B's list was not complete at press time last month):

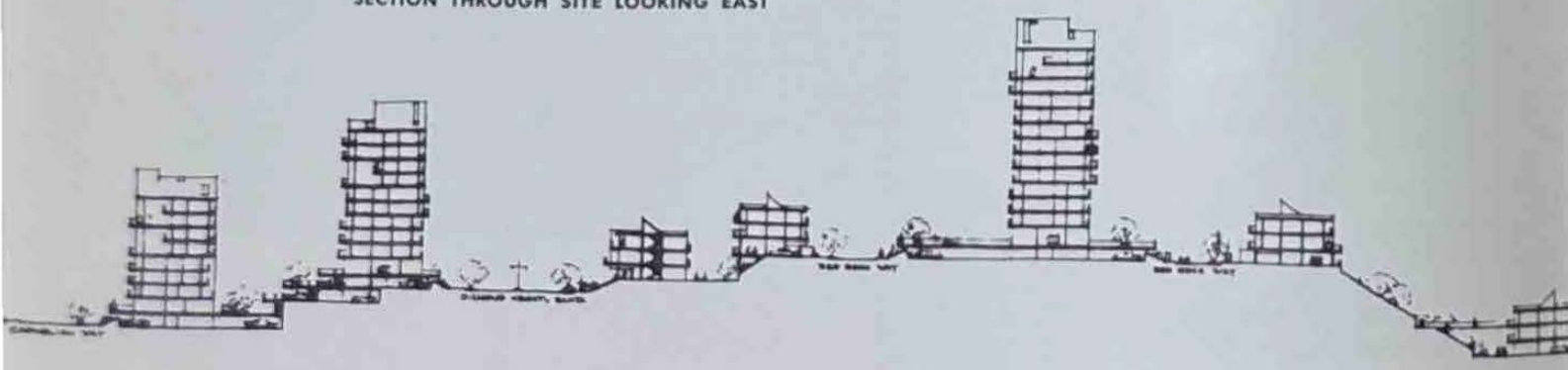
California Polytechnic (Kellogg-Voorhis campus): Kistner, Wright & Wright; Cal Poly (San Luis Obispo campus): Falk & Booth; Chico, Rockrise & Watson; Humboldt: DeMars & Reay; Long Beach, Killingsworth, Brady & Smith; Los Angeles: Honnold & Rex; Orange: Smith, Powell & Morgridge; Sacramento: Dreyfuss & Blackford; San-Bernardino-Riverside: Albert C. Martin & Associates; San Diego: Frank L. Hope & Associates; San Fernando: Allison & Rible; Sonoma: John Carl Warnecke & Associates; South Bay: Jones & Emmons; Stanislaus: Reid, Rockwell, Banwell & Tarics.

The State College Board of Trustees also has assigned individual buildings on the various campuses to these architects: Kitchen & Hunt, San Francisco; Arendt, Mosher, Grant, Santa Barbara; Robert Stevens, Fresno; Kenneth S. Wing, Long Beach; Maynard Lyndon, Los Angeles; Woodford & Bernard, Los Angeles; Burnett C. Turner, Los Angeles; Campbell & Wong, San Francisco; Higgins & Root, San Jose; Cark, Stromquist, Potter & Ehrlich, Palo Alto; Spencer & Lee, San Francisco; Gardiner A. Dailey, San Francisco; Corlett & Spackman, San Francisco.

The Division of Architecture also has specific projects on five campuses, along with working drawings for presidents' residences.

In all, the Division of Architecture has about 60% of the new work, while private architects have the remaining 40%, comments Charles Luckman, Los Angeles architect who heads the trustees' committee on planning.

SECTION THROUGH SITE LOOKING EAST



new offices

Kempton W. Russell has opened an office for the practice of architecture at 5359 College Ave., Oakland.

firm changes

The San Diego architectural firm of See & Knowles has become Raymond M. Knowles & Associates, with offices remaining at 4460 Park Blvd. where it specializes in religious and educational projects. Walter C. See, 57, died August 14. He was a graduate of the University of Illinois.

deaths

Eric W. Johnson, 63, Stockton, Calif., architect-mechanical engineer and a principal in the firm of Johnson & Mortensen, died November 6. A native of Sweden, he was graduated from the University of California and went to Stockton in 1923, opening his own office six years later. He was a member of a team of architects who designed the $5 million San Joaquin County Courthouse, bids on which were opened three days after his death. He held membership in the AIA, the Civil and Professional Engineers and the Engineers Club of Stockton.

Percy H. Lenon, 56, partner in the Kalispell, Mont., architectural-engineering firm of Brinkman & Lenon, died November 8. Just a month previous, Brinkman succumbed to a heart attack. A member of the AIA, Lenon was a graduate of Montana State College and did additional work at the University of Washington. He was employed at Bremerton, Wash., in federal housing until World War II, completed a tour of duty in the Navy and returned to Kalispell to establish with Brinkman the firm that bore his name.

retirements

William Symmonds has retired from Carmel, Calif., architectural practice and plans to live abroad for several years.

new addresses

Roger Merill Van Frank, architect, to 1243 East 21st S., Salt Lake City.

Donald W. Richardson, architect, to 805 Liberty St. N.E., Salem, Ore.

Lubin, McGaughy & Associates, architects and consulting engineers, to 909 Halekauwila St., Honolulu.

Ken White & Associates, architects, to Bank of Aurora Building, 9000 E. Colfax, Denver.

Schoell & Geritz, architects, to 317 14th St., Del Mar, Calif.

M. E. Harris Jr., architect, to Suite 702, El Paso Natural Gas Bldg., 315 East Second S., Salt Lake City.

REYNOLDS AWARD

Nominations will be accepted until December 18 at the Octagon for the 1962 annual $25,000 R. S. Reynolds Memorial Award, the largest prize in architecture. The winner also receives an original piece of sculpture designed by a prominent contemporary artist. An architect may be nominated by anyone, including himself.

elections, appointments

Alaska Chapter, AIA, has picked Edwin B. Crittenden of Anchorage as its initial president. (The slate of officers published last month was erroneous.) Others are Linn A. Forrest Sr., Juneau, vice president; F. Wayne White, Fairbanks, treasurer; Joyce Stevens, Anchorage, secretary.

Colorado Chapter, AIA, has elected Jerome K. Nagel to assume the presidency the first of the year. Other new officers, all from the Denver area, are Rodney S. Davis, vice president; T. J. Moore, secretary; and James H. Johnson, treasurer.

Robert R. Ferens, associate professor in the University of Oregon's School of Architecture and Allied Arts, has a one-year leave of absence to serve as supervising architect of the Volta Dam in Ghana, one of the largest projects of its kind in the world.

Roscoe C. Hildebrandt, formerly district structural engineer with the Seattle office of the Portland Cement Association, has joined the firm of Olsen & Ratti, Seattle structural engineering consultants. Prior to his 6½ years with the PCA, Hildebrandt was employed by the Seattle Engineering Department and the bridge division of the Washington State Highway Department.

David Gebhard, former director of the Roswell Museum who also served as editor of the New Mexico Chapter, AIA, monthly publication, has assumed a similar post at the Art Gallery of the University of California, Santa Barbara.

competitions

Architects in Edmonds, Wash., and Provo, Utah, each have received $500 as regional winners in the Horizon Homes competition sponsored by the Portland Cement Association. In addition to copping the Pacific Coast states title with a house designed for builders Stewart & Potter in Lynnwood, Dan Miller also was runner-up in the national judging which involved 82 entries throughout the U. S. Dixon & Long took top honors in the Rocky Mountain region with a house which Leland J. Wells built for Arthur Powell in Lehi. Los Angeles architect Edward Fickett was chairman of the five-man jury included L. Morgan Yost, architect, Kenilworth, Ill.; Neil A. Conner, director of architectural standards, FHA, Washington, D.C.; Andy Place, builder, South Bend, Ind.; and William J. Moreland, president of the NAHB.

Jury for the two-stage competition to design a new governor's mansion in Sacramento will consist of architects Lutah Maria Riggs of Santa Barbara (also named first woman member of the California State Board of Architecural Examiners), Gardner Dailey of San Francisco and Dean Pietro Belluschi of MIT; and Dr. Stephen C. Pepper, emeritus professor of philosophy at the University of California, and Frank W. Kent, director of the Crocker Art Gallery, Sacramento. December 6 is the deadline for the first submissions.

allied arts

A public building in Seattle (other than museums or galleries) will finally get a piece of art by Mark Tobey, who in October became the first American to have a one-man show at the Museum of Decorative Arts of the Louvre. He will return home about the first of the year to begin what he considers the most important work of his career: a mural for the Opera House now under construction at the Civic Center-World's Fair site.

San Francisco architect John S. Bolles has established an art gallery at 206 E. 50th St., New York, that will specialize in exhibiting the work of contemporary West Coast artists. The initial show, however, which opened November 16, is a collection of Italian art which Bolles put together in Italy.

ARCHITECTS NOTE: OFFICE SPACE

FURNISHED West Los Angeles architectural office. Excellent facilities. Use of conference room. Private ent. 600 sq. ft. $125 month. GR 8-0531 or eves. EX 1-2868

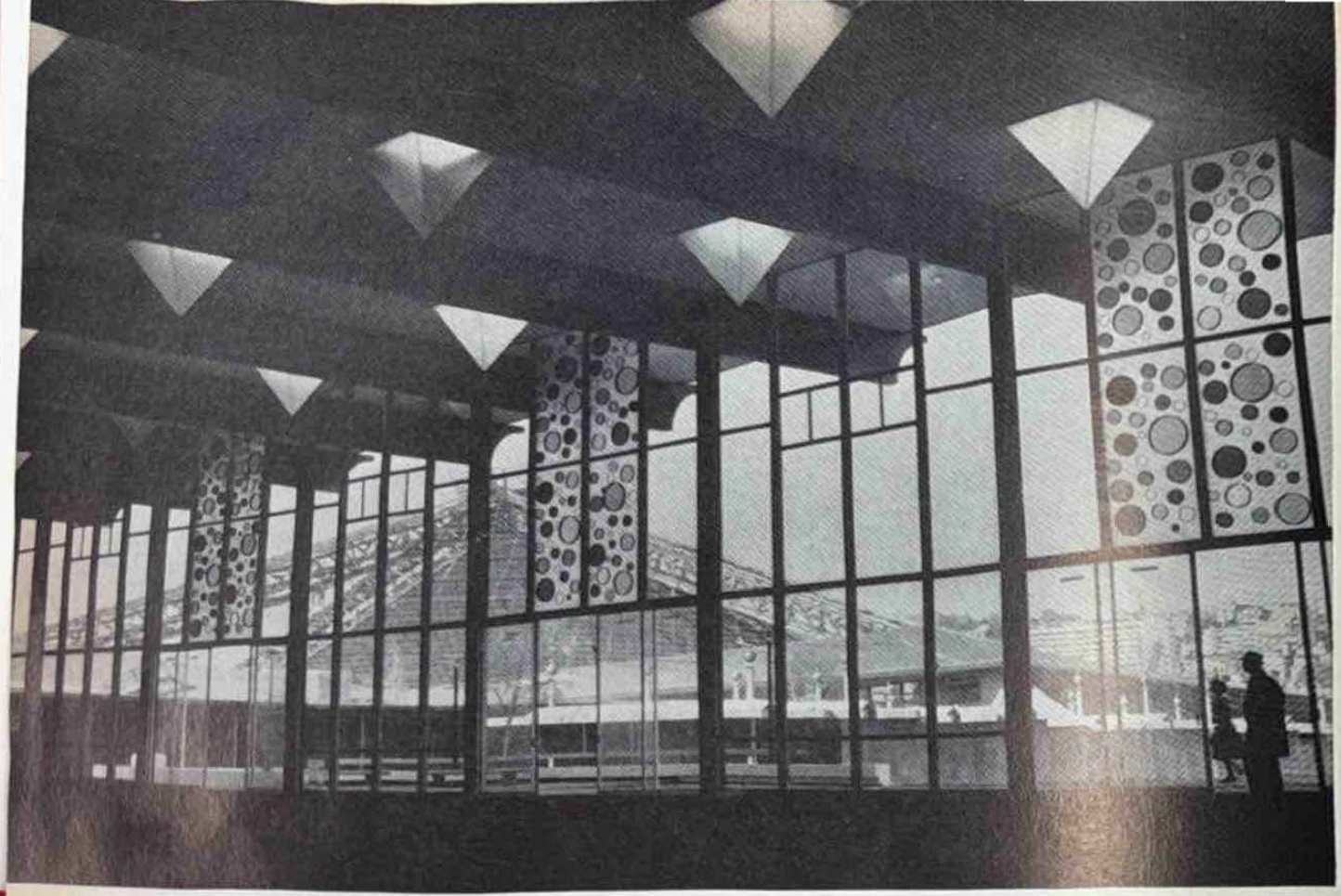
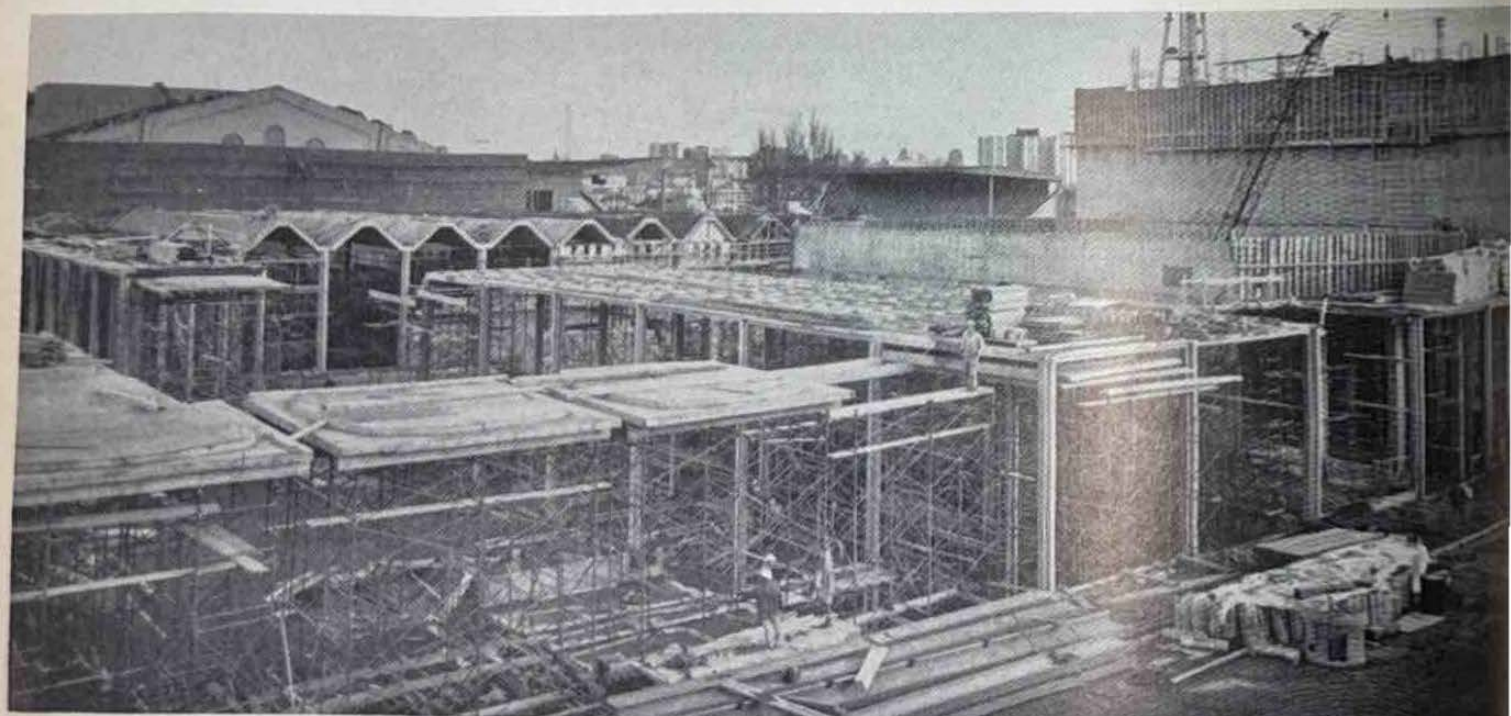


EXHIBIT BUILDING NO. 37 • Robert B. Price, architect; Horace J. Whitacre & Associates, structural engineers; Sellen Construction Co., Inc., general contractor.

Progress report No. 3: Seattle World's Fa

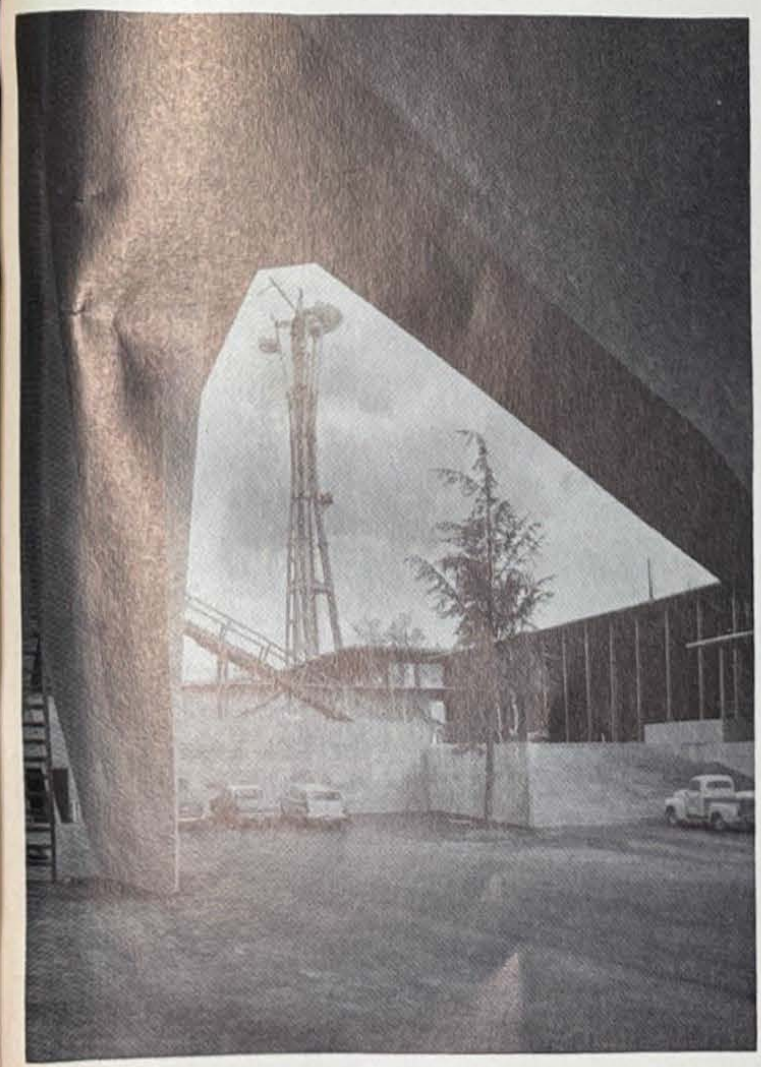


PLAYHOUSE (foreground) and EXHIBITION HALL (center) ..• ..Kirk, McKinley & Associates, architects; Worthington, Skilling, Helle & Jacks structural engineers; General Construction Co., general contractor.

OPERA HOUSE (rear) • Priteca & Chiarelli, architects; Worthington, Skilling, Helle & Jackson, structural engineers; Brazier Construction C general contractor.



SPACE NEEDLE • John Graham & Co., architects-engineers; Howard S. Wright Construction Co., general contractor; Pacific Car & Foundry Co., steel fabricator-erector.



The 1962 Seattle World's Fair already is attracting 10,000 requests a week for room reservations (Expo-Lodging Service Co., 312 First Ave. N., Seattle 9, Wash.), has surpassed $166,000 in advance ticket sales and is almost sold out of exhibit space, the board of trustees was informed at its annual meeting last month. Meanwhile, with less than five months to go to the April 21 opening, construction activity was picking up steam as indicated by these projects:

EXHIBIT BUILDING NO. 37 • If the first unit of the World of Commerce and Industry is setting the pace for the show, visitors will be in a festive mood from the start. This happy building, carnival-like in its restrained way, provides a post-free space under its 24-ft. high roof. Rows of pyramid-shaped skylights bring even more color into the 70x277-ft. structure. Sliding glass doors will lead out to a landscaped approach. In the background looms the Century 21 Coliseum, which is shaping up as the fair's most significant structure.

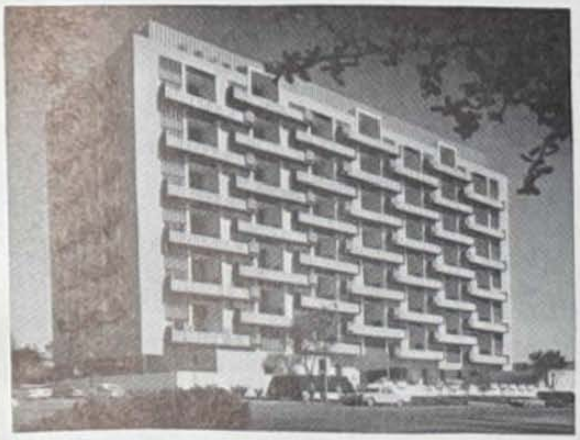
PLAYHOUSE, EXHIBITION HALL, OPERA HOUSE • These three buildings along with the existing Arena will form the nucleus of Seattle's Civic Center. Al four units will be connected by a 30-ft. high covered walkway, courtyards and vestibules and all will be faced with brick: sepia for the Opera House (remodeled Civic Auditorium), pearl gray for the other three. To the south will be the exhibition mall with its already celebrated fountain, subject of an international competition sponsored by the city fathers.

SPACE NEEDLE • Without a doubt this is the structure which is capturing the imagination of a public eagerly awaiting to ascend one of two elevators for dining out and/or a revolving view of the mountains, Puget Sound and glittering city that will virtually defy description. Framed by a huge buttress of the Coliseum in the overall view at the 500-ft. level, the all-steel tower closeup shows the outrigger brackets which will support the restaurant floor. Each section of the ring beam has seven such brackets. Still to come: 9-ft. deep ring girder holding the mezzanine floor and observation platform above, the turntable itself and another set of outrigger brackets extending 9 ft. farther out than those already in place.

Photos: PA&B staff (upper left and right); Forde (lower left and right).

A new look at the city: apartment houses as viewed by Victor Gruen

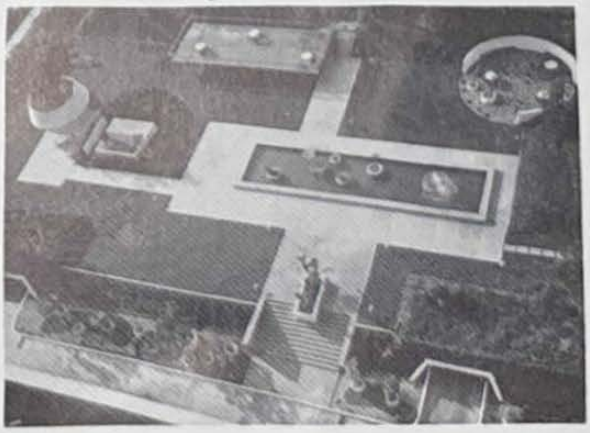
"We have a long way to go in our thinking about the architecture of apartment houses, but architects are frustrated by economic conditions. Rooms are too small, ceilings are too low and partitions are too thin. There is obviously a gap between our desire to live well and to live cheaply. Architects must search out ways to build more efficiently and the construction industry must find ways to utilize our know-how instead of trying to build as we did 50 years ago." So says Victor Gruen, whose fame as a planner of shopping centers and entire communities for that matter has spread throughout the world. More recently he and his associates have been paving the way in the design of more livable, more imaginative large-scale apartments based upon a "genuine and sympathetic understanding of human needs." In the past two years Gruen's firm has applied this philosophy to a related building type (and therefore included here): a protoype program for a chain of motor hotels. The architects's thoughts on apartment house planning and what this means to the city are presented in the following article based upon an interview conducted by Southern California Editor William G. Quinn.



WILSHIRE TERRACE consists of 112 four-, five-, six- and seven-room cooperative apartments in 14-story reinforced concrete structure. Landscaped garden is above parking garage, completely underground due to zoning requirements. Conveniences of fine hotel living include restaurant, swimming pool, valet and maid service, barber and beauty shops.



Gordon Sommers photos



A new look at the city: apartment houses as viewed by Victor Gruen

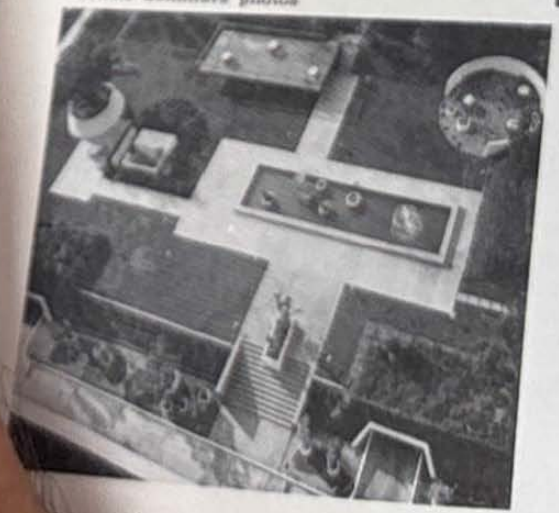
"We have a long way to go in our thinking about the architecture of apartment houses, but architects are frustrated by economic conditions. Rooms are too small, ceilings are too low and partitions are too thin. There is obviously a gap between our desire to live well and to live cheaply. Architects must search out ways to build more efficiently and the construction industry must find ways to utilize our know-how instead of trying to build as we did 50 years ago." So says Victor Gruen, whose fame as a planner of shopping centers and entire communities for that matter has spread throughout the world. More recently he and his associates have been paving the way in the design of more livable, more imaginative large-scale apartments based upon a "genuine and sympathetic understanding of human needs." In the past two years Gruen's firm has applied this philosophy to a related building type (and therefore included here): a prototype program for a chain of motor hotels. The architects's thoughts on apartment house planning and what this means to the city are presented in the following article based upon an interview conducted by Southern California Editor William G. Quinn.

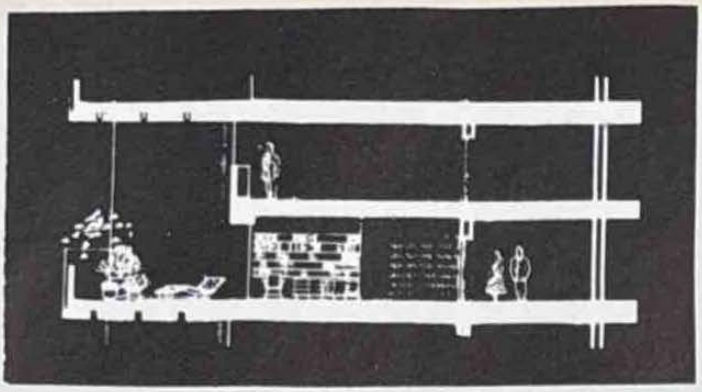


WILSHIRE TERRACE consists of 112 four-, five-, six- and seven-room cooperative apartments in 14-story reinforced concrete structure. Landscaped garden is above parking garage, completely underground due to zoning requirements. Conveniences of fine hotel living include restaurant, swimming pool, valet and maid service, barber and beauty shops.

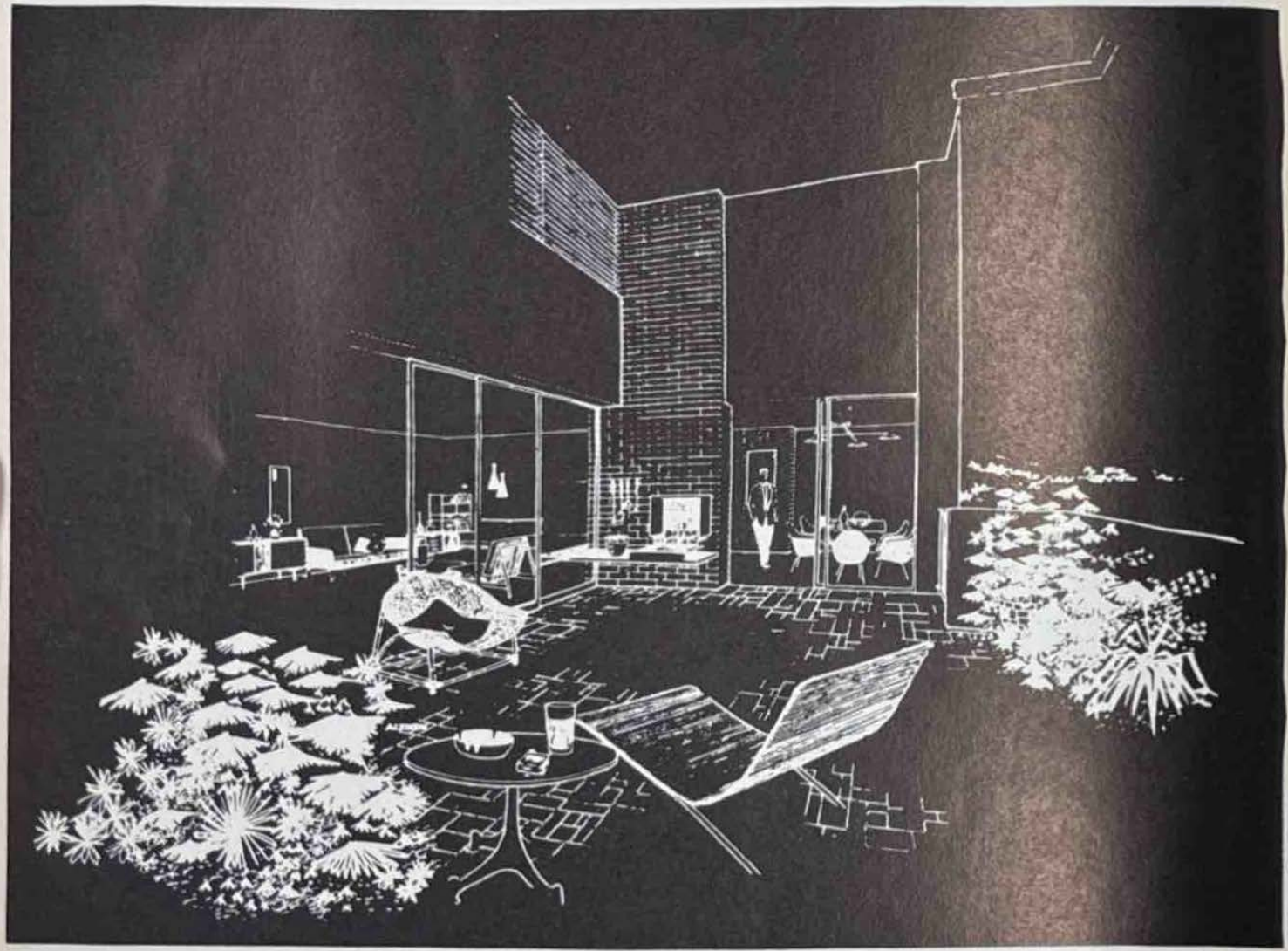


Gordon Sommers photos





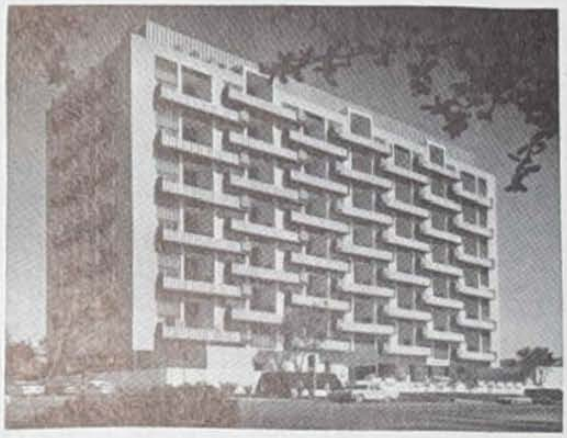
SECTION THROUGH TYPICAL APARTMENT



OUTDOOR LIVING AREA, 18x17-ft., large enough to permit leisurely lounging, barbecuing and entertaining is key to Wilshire Terrace plan. By means of staggered arrangement of apartments above and below on each floor, patio is two stories permitting maximum openness and ample penetration of sunlight through glass walls behind. No patio can be seen from any other unit.

A new look at the city: apartment houses as viewed by Victor Gruen

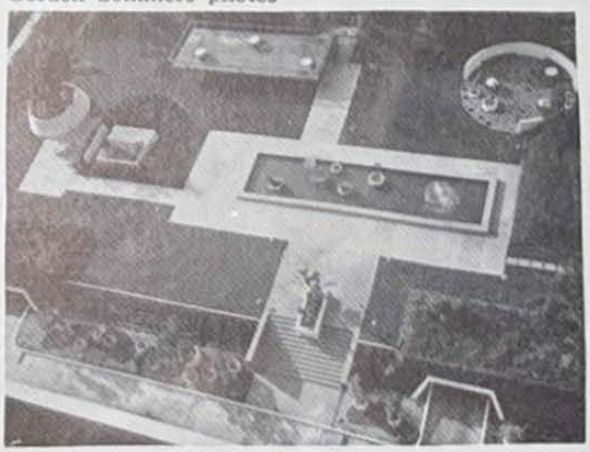
"We have a long way to go in our thinking about the architecture of apartment houses, but architects are frustrated by economic conditions. Rooms are too small, ceilings are too low and partitions are too thin. There is obviously a gap between our desire to live well and to live cheaply. Architects must search out ways to build more efficiently and the construction industry must find ways to utilize our know-how instead of trying to build as we did 50 years ago." So says Victor Gruen, whose fame as a planner of shopping centers and entire communities for that matter has spread throughout the world. More recently he and his associates have been paving the way in the design of more livable, more imaginative large-scale apartments based upon a "genuine and sympathetic understanding of human needs." In the past two years Gruen's firm has applied this philosophy to a related building type (and therefore included here): a protoype program for a chain of motor hotels. The architects's thoughts on apartment house planning and what this means to the city are presented in the following article based upon an interview conducted by Southern California Editor William G. Quinn.



WILSHIRE TERRACE consists of 112 four-, five-, six- and seven-room cooperative apartments in 14-story reinforced concrete structure. Landscaped garden is above parking garage, completely underground due to zoning requirements. Conveniences of fine hotel living include restaurant, swimming pool, valet and maid service, barber and beauty shops.



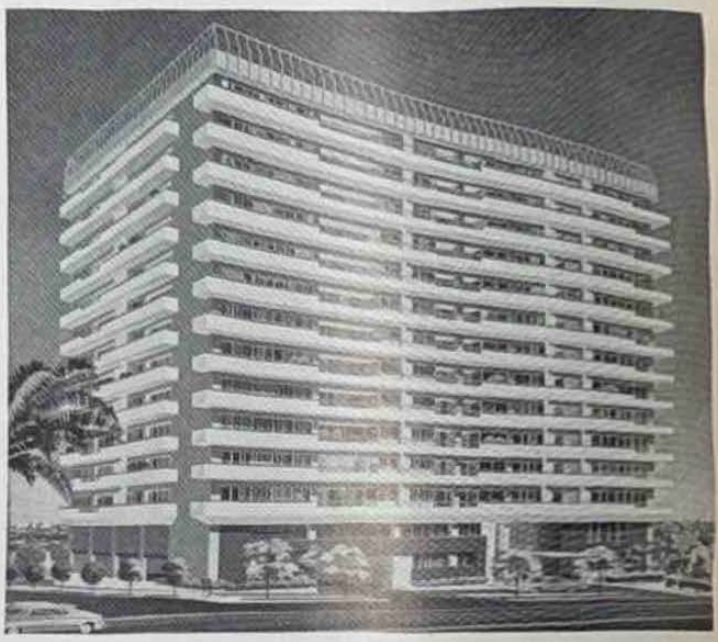
Gordon Sommers photos





PARK WESTWOOD TOWER is first high-rise apartment building in Westwood Village, quiet residential area with retail stores, restaurants, churches, libraries and excellent transportation within radius of only three blocks. Special features in 144-unit, 13-story structure: electric heat pump air conditioning, higher-than-standard ceilings, acoustically isolated units, sliding wall room dividers, rooftop laundry.

DOHENY TOWERS, 13-story, 85-unit building, is within short walking distance of Sunset Strip. Each floor has seven units, five of them averaging 1,600 sq. ft. and the other two in excess of 2,000 sq. ft. Basement parking on two levels provides space for at least 128 cars. Spacious entertainment room for tenant use is at street level. Landscaped recreational area has full-size swimming pool on roof.



"Sameness in our apartment planning is not justified. Height and site uses can be endless if we use our imagination."

Los Angeles has been called many things by many people. Humorists and the not-so-humorous have poked fun at this sprawling metropolis with its thousands of shopping centers, its poorly planned areas and its stubborn insistance on being a "city with a rural atmosphere."

Sociologists have long noted the Angeleno's desire to own a little piece of land with its mortgaged home—striving to make it look like a country estate on a 50x100-ft. lot. As land values skyrocketed, the "ranches" moved further and further out of the heart of the city. The highway department followed happily along with its concrete ribbons, digging up golf courses and parks or knocking down anything that came within its path. When Los Angeles was saturated with communities within communities, the ever-searching, land-hungry citizenry turned to Orange and Ventura Counties. The tireless commuter began measuring the drive to work in hours instead of minutes.

What the critics failed to see—and some still have blurry vision on this score—is that this was one of the greatest population booms in the history of the world. Los Angeles had no time to become a city because like any youngster it just had not reached its full growth. That full growth has just about taken place and now Los Angeles, with its new maturity, is looking around at the population influx mess and is trying to do something about it.

One of the first architects to realize that Los Angeles would some day become a true city was Victor Gruen, whose architecture and planning have often led others from the path of clutter to one of organization. Gruen saw that the flight from the city could not go on forever; that soon the rush to outlying areas would have to reverse itself. Time has proved him right. So right, in fact, that even a statistician would have to agree. For the first time apartment house living is becoming popular in Los Angeles. The change has been so complete for the last two years that multiple dwelling permits have outweighed single dwellings.

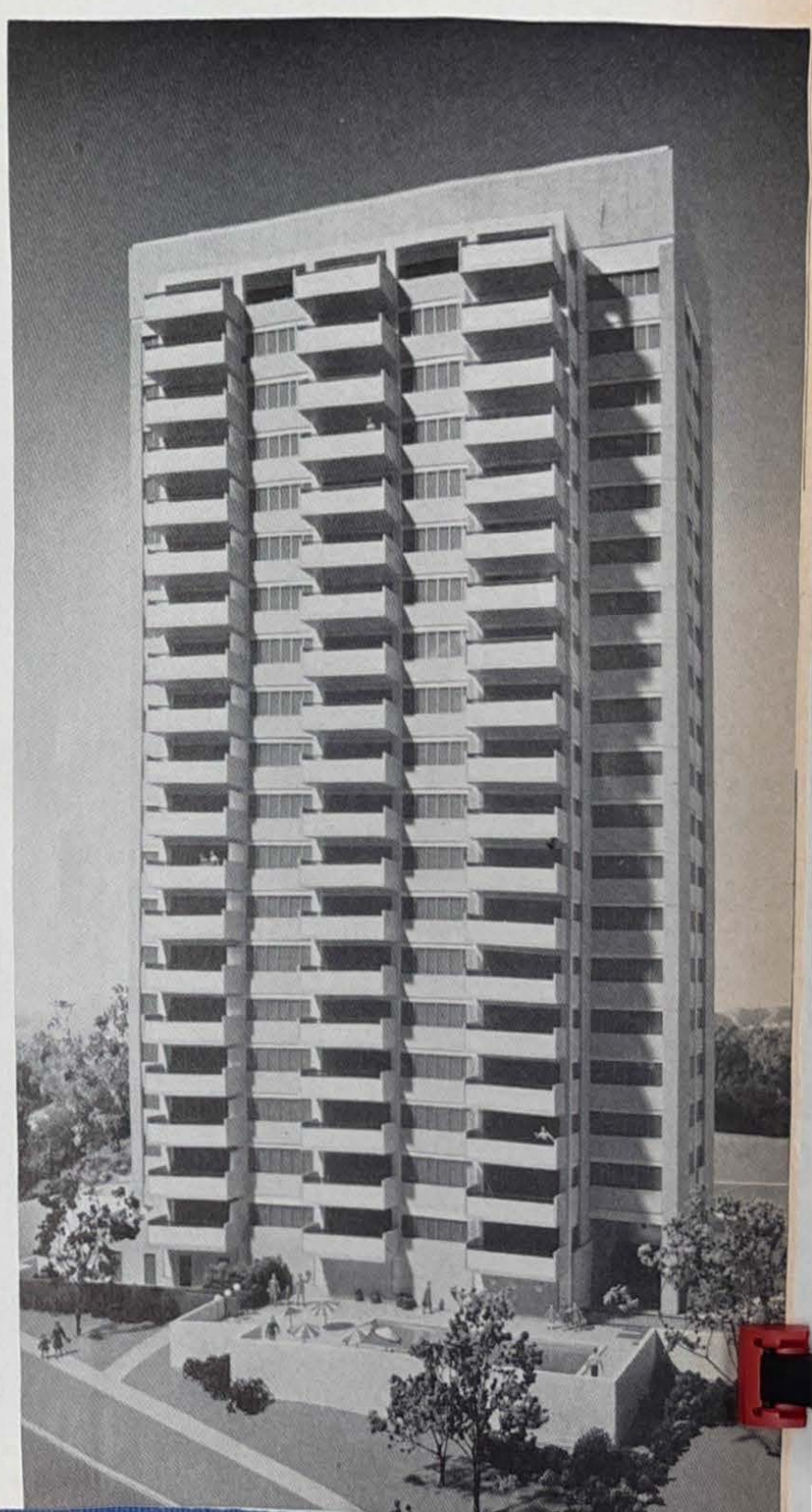
Although much of Gruen's efforts have been directed toward the luxury cooperatives, the apartment living move has affected all economic groups. Such projects as the plush Wilshire Terrace and the Park Westwood Tower overlook the sections of Wilshire Boulevard that favor the happy rich. These luxury buildings

with their green space, patios and roomy suites are a great financial success.

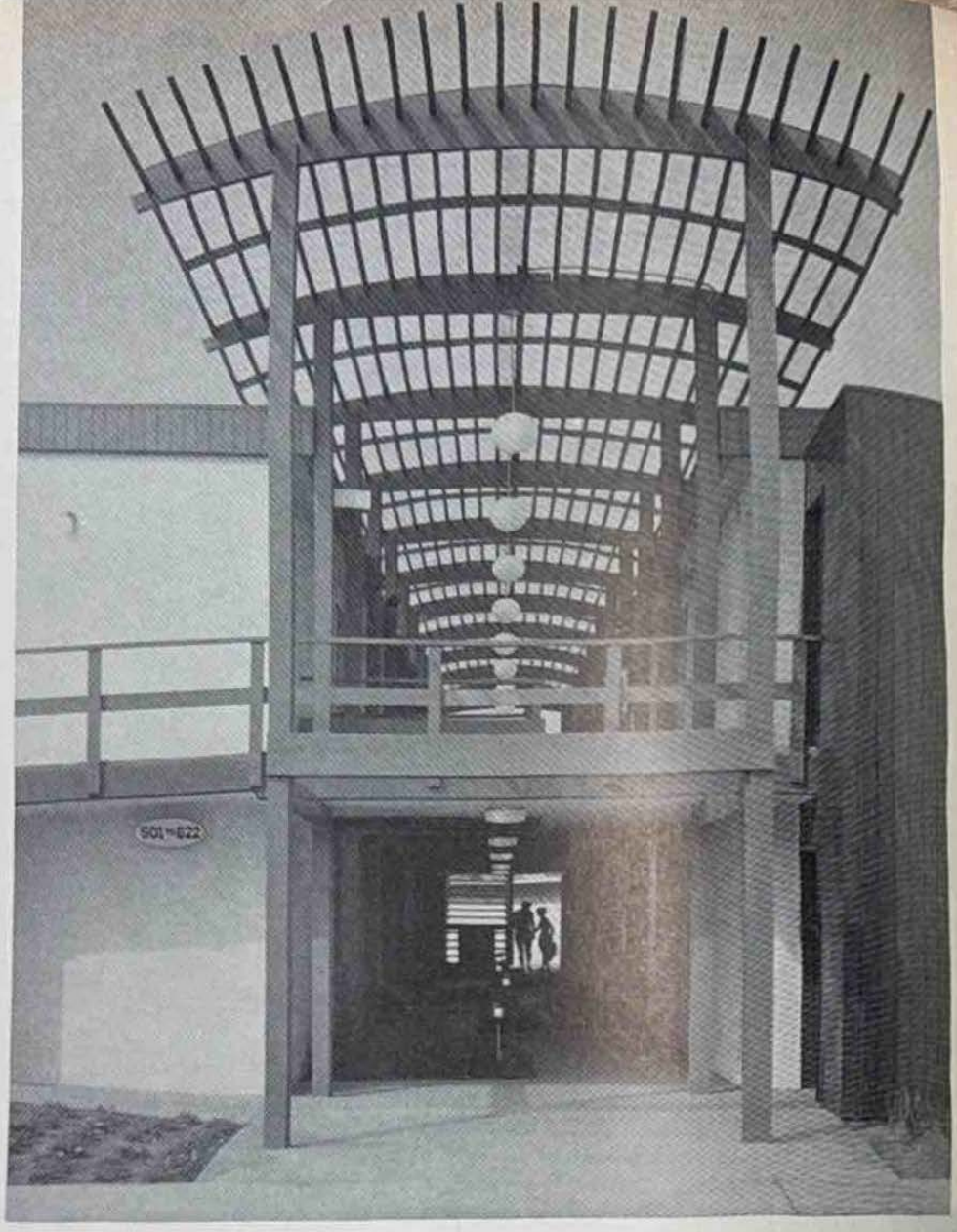
Why do these tenants give up a large mansion with parklike gardens and swimming pools for an apartment? Gruen answers by saying they had such large homes it took a staff of servants and gardeners to maintain them. The wealthy, he points out, might put up with these problems to maintain a home as long as they were rearing children, but in later years the commuting and help situation no longer seemed worthwhile. The cooperative apartment house offers privacy and comfortable living without the headaches.

The not-so-rich have become tired

"We are running out of green and open spaces. The one-family house is becoming a luxury we cannot afford."

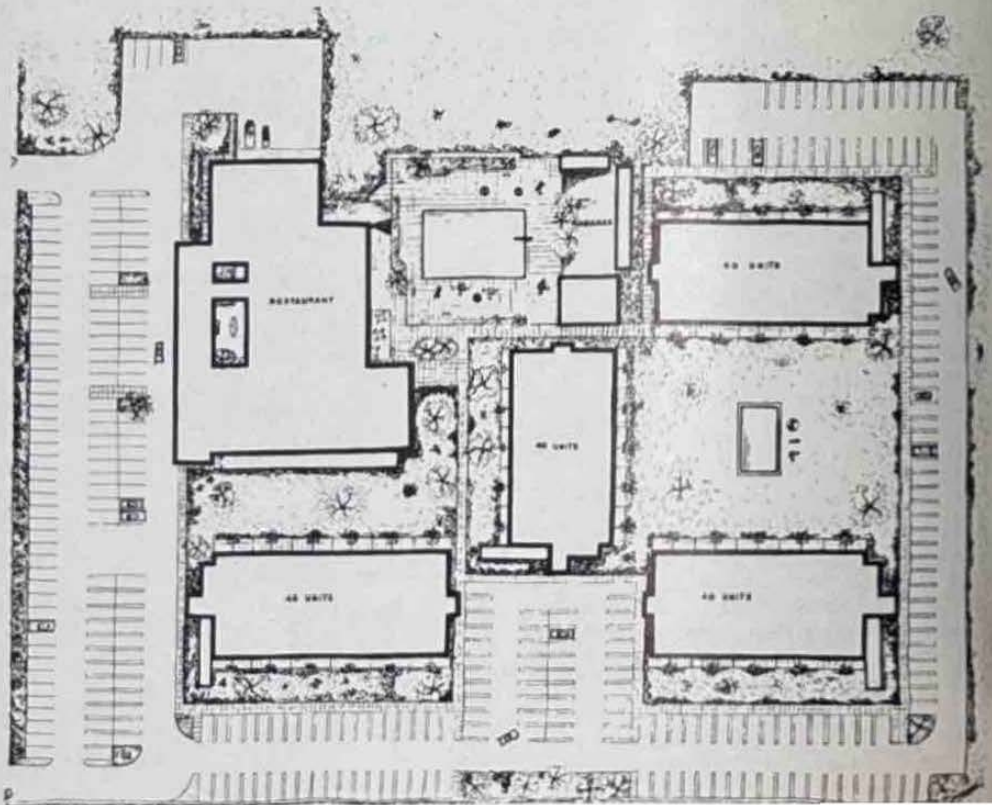


WILSHIRE-COMSTOCK WEST is 20-story project of 109 apartments varying in size from 1,300 to 2,200 sq. ft., with one-, two- and three-bedroom units. Tenants will enjoy full view of mountains, sea, cityscape and adjacent country club grounds from projecting terraces faced with ceramic tile. Extensive gardens will surround building.



PLASTIC ROOF STRUCTURE over each of four guest buildings allows light to penetrate to ground floor hallway through railed openings.

"Victor Gruen Associates was retained by Hotel Corporation of America two years ago to develop a prototype program for a chain of two types of motor motels. This program established certain principles and design criteria which were fully accepted by the client . . . especially that of creating a quiet and enjoyable environment for the motorist, removing him from the noises and disturbances of the highway. It arranges all rooms in such a manner that windows are directed toward a landscaped area with swimming pool and other amenities. True to the overall concept, the project clearly separates landscape and autoscape."



of the nerve-racking commuting over endless hours of freeways, Gruen continues, and have also turned back to city living. The average citizen in Los Angeles found his time for family life and recreation was taken up following exhaust fumes to and from his place of employment.

Gruen explains that the return to the city is by no means a mass evacuation of suburbia. He warns, however, that if the recentralization of the city does not take place as expected, then no rapid transit system now being discussed in Los Angeles will become a reality.

A European by birth, Gruen naturally deplores this country's waste of land. Says he: "Land is irreplacable. It cannot be imported from other places and we have to use it economically and in a manner in which it can serve us best." To the westerner, who is accustomed to talking in terms of wide open spaces, this thought becomes almost revolutionary.

The "more space for space's sake architects" also are the victim of Gruen's needle. "It is a misconception that a little more land around an apartment house necessarily means more privacy," he adds. "We have proved it is possible by skillful planning to arrange apartment houses closer together and yet give the tenants more privacy." Looking at some of his completed projects it is obvious he has proven his point.

Unfortunately, the majority of projects that come from the boards of Victor Gruen Associates are those that only the wealthy can afford. What about the middle-class or the laboring family? It is true that in Los Angeles today multiple dwelling permits outrank single dwellings, but what kind of living do they provide? Few are designed by architects; few afford privacy, patios or garden areas as Gruen's do. All too few developers support his philosophy that "space around the building is equally as important as space within." The majority of new apartments have blacktop driveways, inaccessable garages and uninspiring views of busy boulevards.

To attract more people to the city, Gruen believes we must create new neighborhoods offering a variety of living unit types for all tastes and pocketbooks–from low cost housing to luxury apartments. "We must," he insists, "put the pedestrain back into our society by giving the city dweller nearby shops and places to walk."

Even the most cynical must recognize the signs that Los Angeles is maturing. A new music center and theater as well as a museum in the downtown area are now in the planning stage. Rapid transit systems are proposed, discussed and rediscussed daily. High-rise apartments are going up almost as fast as office buildings. The move is back to the city. But the question still remains: when more and more travel-weary do-it-yourselfers return, will it be to a dynamic, well-planned Los Angeles filled with garden apartments or will it be a hodge-podge that will soon turn into another shameful row on row of slums?

If Los Angeles listens to Gruen and his colleagues who share his faith and vision, the return may not always be Utopia, but at least it will be a more orderly, better place in which to live.

HCA CHARTERHOUSE MOTOR HOTEL has rampways leading from ground level to second floor guest rooms to facilitate electric baggage carts.



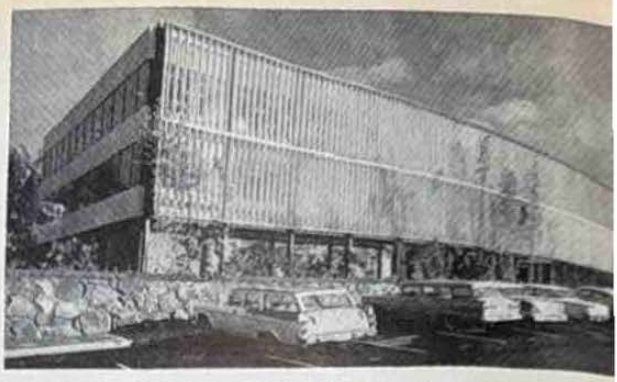
Office Building
Bethlehem Steel Co.
Pacific Coast Division
Seattle, Washington

•

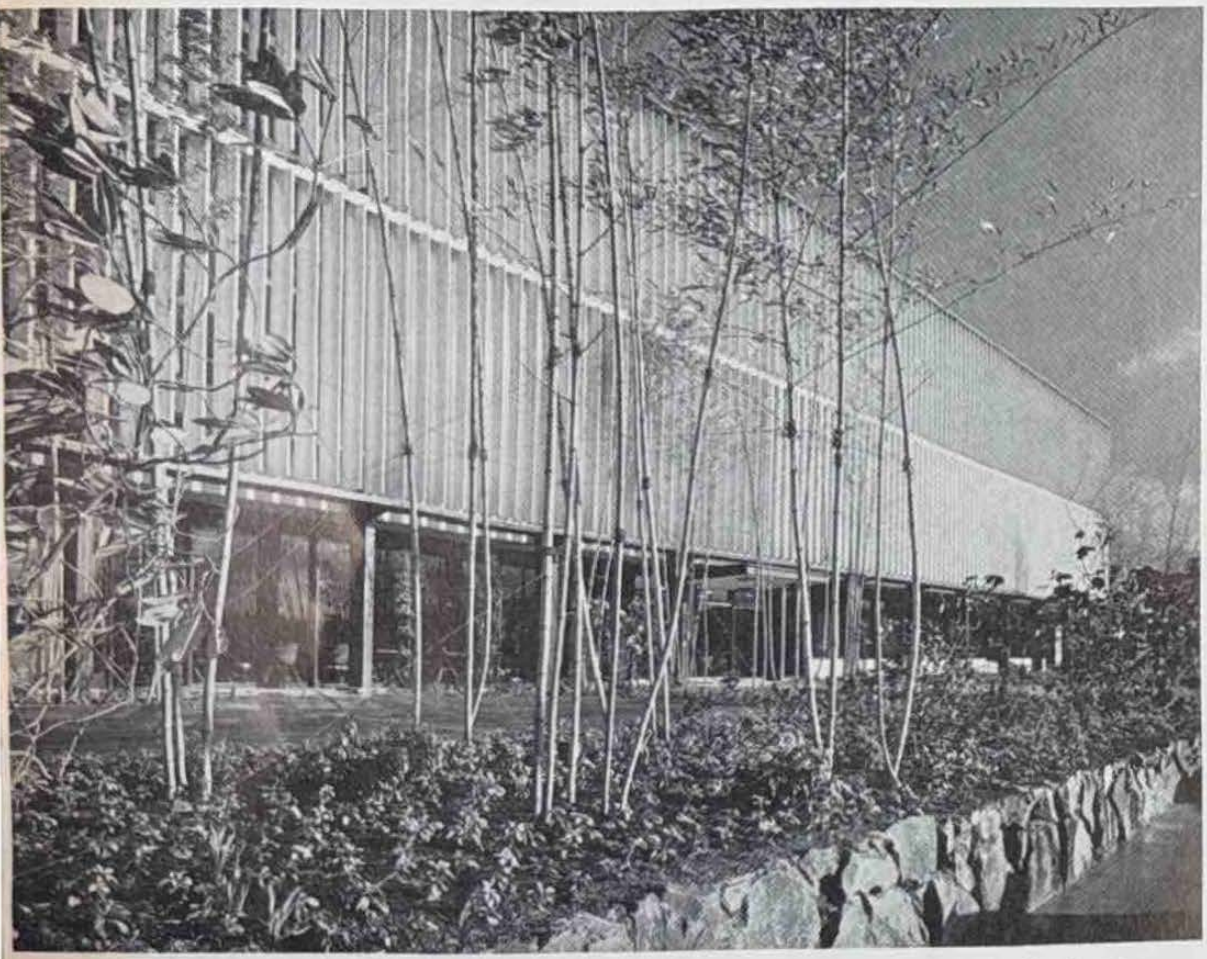
BINDON & WRIGHT
Architects

ANDERSEN-BJORNSTAD-KANE
Structural Engineers

JOHN H. SELLEN CONSTRUCTION CO.
General Contractor



WEST ENTRANCE from parking lot is at lowest level or first



BAMBOO PLANTINGS and partially depressed parking area minimize sea of cars from cafeteria view.

An appropriate projection of steel company's image

A SIMPLE RECTANGULAR STRUCTURE, this three-story office building is planned on a 7-ft. module with horizontal cast stone spandrels to complement the long, vertical sun louvers and exposed peripheral supporting columns. Steel, of course, is a key material: columns and beams, louvers, window frames, stairway members.

Perimeter columns are set out 2 ft. from the east and west walls, creating a pleasing design element and a maximum of flexibility inside. Exterior of the first floor



MAIN ENTRANCE is at second floor due to topography of si

is faced with a random-size basalt stone; spandrels of upper floors are faced with small units of a cast material embedded with polished stones.

Site is on a gentle slope near the company's main fabricating works. Extensive landscaping in the parking lot, which accommodates 186 cars, and around the building provides a parklike atmosphere, unusual for industrial district projects.

First floor contains a lobby, cafeteria, kitchen, dining room, employment office, toilets, storage and switchboard rooms. A curved stairway constructed of precast terrazzo treads and supported by a single steel stringer connects first and second floor lobbies. Large planting here is a focal point of interest. Second and third floors house offices of the various departments, (sales, engineering, accounting, etc.). Except for core and permanent walls which are concrete with plaster, all interiors are movable partitions.

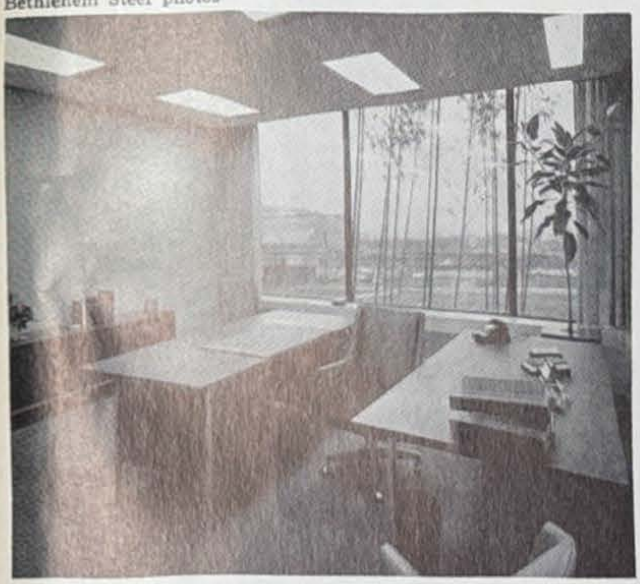
The building, which brings together employees from five widely separated locations, is completely air conditioned.

Mechanical engineers were Bouillon, Griffith, Christofferson & Schairer; electrical engineers, B. A. Travis & Associates; landscape architect, William G. Teufel; interior furnishings, Arthur Morgan Designers, Inc.

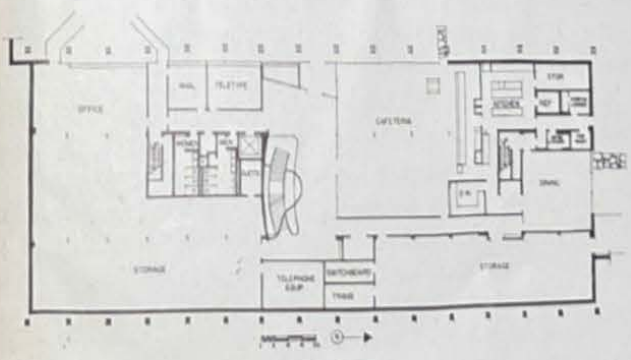


STRUCTURAL STEEL is painted dark gray, spandrels are natural off-white.

Bethlehem Steel photos



FIBERGLASS DRAPERIES control sun in offices not protected by louvers.



FIRST FLOOR

OUTLINE SPECIFICATIONS

Structure: footings and foundation: reinforced concrete; frame: structural steel columns and beams; floor and roof: 3-in. steel floor decking with concrete fill.

Exterior Facing: random-size basalt stone on first floor; Fulget on upper portion.

Windows: ¼-in. polished plate, heat-absorbing gray glass; painted steel frames.

Entrance Doors: stainless steel.

Interior Finish: concrete with plaster for core and permanent walls; movable partitions for interior offices.

Floors: polished terrazzo in lobbies and cafeteria; vinyl-asbestos tile in office and corridor areas; glazed ceramic tile in toilet rooms.

Heating and Air Conditioning: gas fired package boiler; air conditioning serviced by induction units below windows on perimeter, supply and exhaust grills in ceiling in interior areas.

Total Area: 53,000 sq. ft.

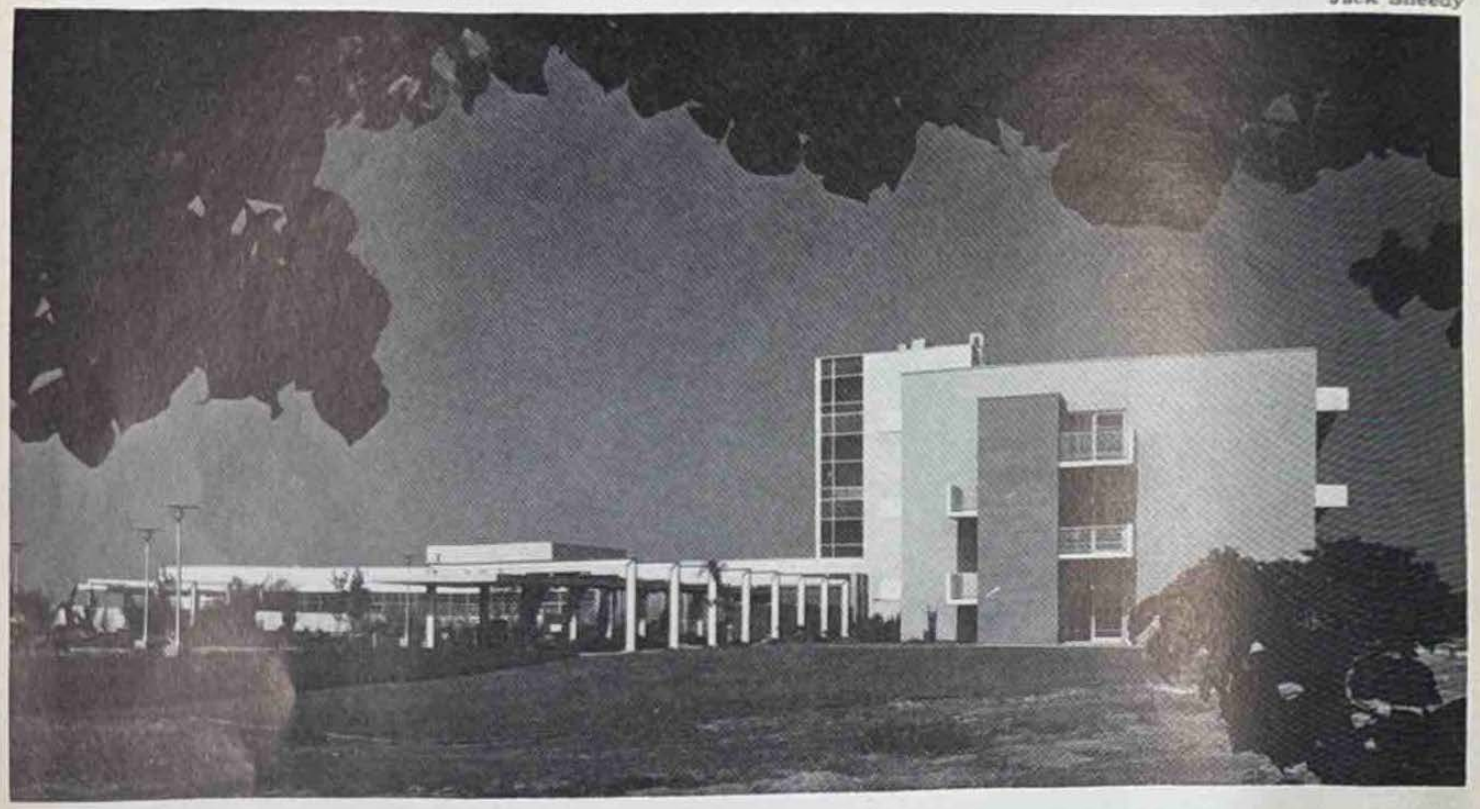
Cost per Square foot: $24 (exclusive of fees).

Date of Completion: November 1960.

Two Southern California hospital facilities

ENTRANCE COURT opens off visitors' parking area and is protected by lightweight concrete canopy supported on steel bents placed to complement squared mass pattern of building's three block segments.

Jack Sheedy



WHITTIER PRESBYTERIAN INTER-COMMUNITY HOSPITAL, WHITTIER, CALIF.: Three individually specialized building units linked together for necessary traffic provide continuity without the confusion of interfering functions. Main four-story block is the nursing wing; one-story center building contains administrative offices, emergency, obstetrics and surgeries; third section contains cafeteria, kitchen, storage and mechanical equipment and is located to the rear and on a lower level.

All three units are simple blocks in design with a straightforward use of concrete over steel framing, brick, glass and painted steel bents for canopy supports, fitting in well with the semi-rolling site and a background of orange orchards and natural shrubbery. Removable walls with open concrete joints provide for expansion in several directions.

To boost morale of both patients and visitors, cheerful lighting, furniture, wall and floor coverings and decorative accents brighten up lobbies, hallways and rooms. Cafeteria is designed to double as a meeting place for community activities. Colors are coordinated with furnishings to help avoid an institutional appearance. Glass walls lead to an adjacent enclosed patio which may be utilized for extra dining or recreational space. Suspended ceiling here is of folded plate design which conceals side lighting.

Sun control is achieved by incorporating tinted glass, interior draperies and overhangs. Because of the hot Whittier summers, the hospital is completely air conditioned. Conventional velocity multizone system is used for the service core. High velocity induction system often found in hotel design is employed for the nursing wing because it provides zone control for each room, eliminates the possibility of return air contamination spread to other rooms and simplifies mechanical requirements. This is the first time such a system has been used in a West Coast hospital.

An unusual touch is a sheltering wall at the entrance, blocking off the view of first floor nursing units and providing mounting space for displaying ceramic plaques bearing names of donors of funds or special services. Hospital totals 104,000 sq. ft. Cost with equipment was $3,216,548 or $17,293 per bed (186) equipped. Architects-engineers: Daniel, Mann, Johnson & Mendenhall and J. Dewey Harnish; general contractor: Steed Bros.

MATERNITY WING, DONALD N. SHARP MEMORIAL COMMUNITY HOSPITAL, SAN DIEGO: Hospital staff members have nick-named this wing the "Stork Club," referring no doubt to such extras as patio areas outside patient rooms, an exterior nursery viewing window and a contemporary children's playground. However, these are all a part of a planned attempt to provide an environment making the time of birth a relaxed and natural part of a family's life and an experience that can be shared in part by all its members.

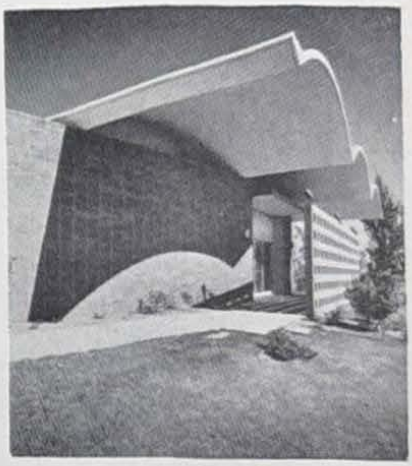
Wing is a separate one-story unit dependent on the main hospital only for basic services and administration. Further segregation to protect from possibility of cross infection is afforded by a floor plan that divides into three divisions—labor and delivery rooms, nursery suite and patient rooms—with a minimum of cross traffic flow.

Structure is primarily of reinforced concrete and concrete block with concrete barrel vaults over the delivery and nursery areas, a form which allows for greater distances between supporting walls and columns, for more flexible grouping of rooms and for long cantilevered overhangs to protect visitors.

The 34,848 sq. ft. accommodates 60 patient beds, nine labor rooms, six delivery rooms, 12 nurseries with 92 bassinets and related servicing requirements. Nursery is divided into eight-bassinet rooms, which allows grouping of all babies born in any one day and a cleaning and holding period after these infants have been discharged. Architects-engineers: Frank L. Hope & Associates; structural engineers: John Ruskin & Associates; general contractor: G. L. Cory, Inc.



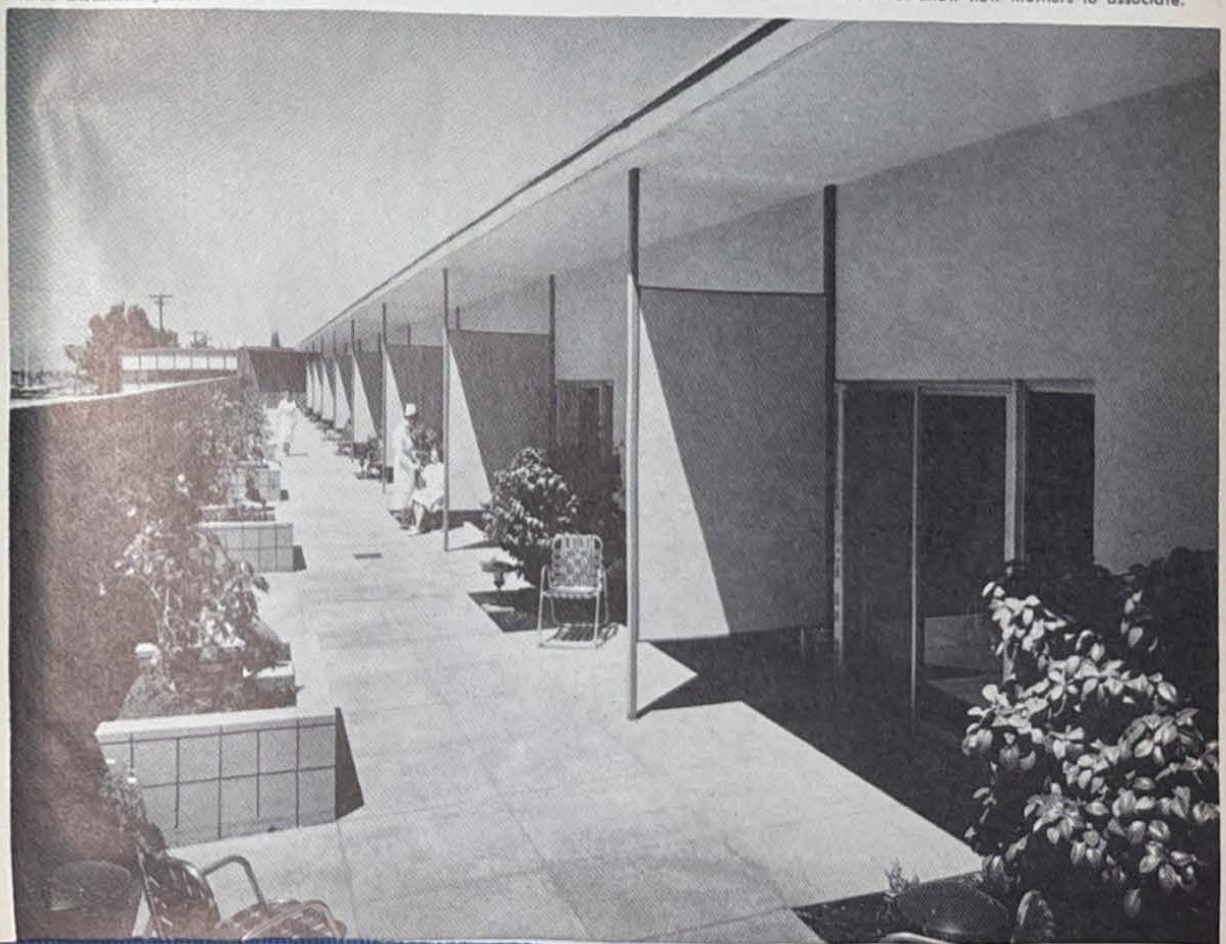
EXTERIOR WINDOW WALL allows children to view nursery without danger of contagion.



BARREL VAULTS over delivery area emphasize elevation facing highway.

Julius Shulman photos

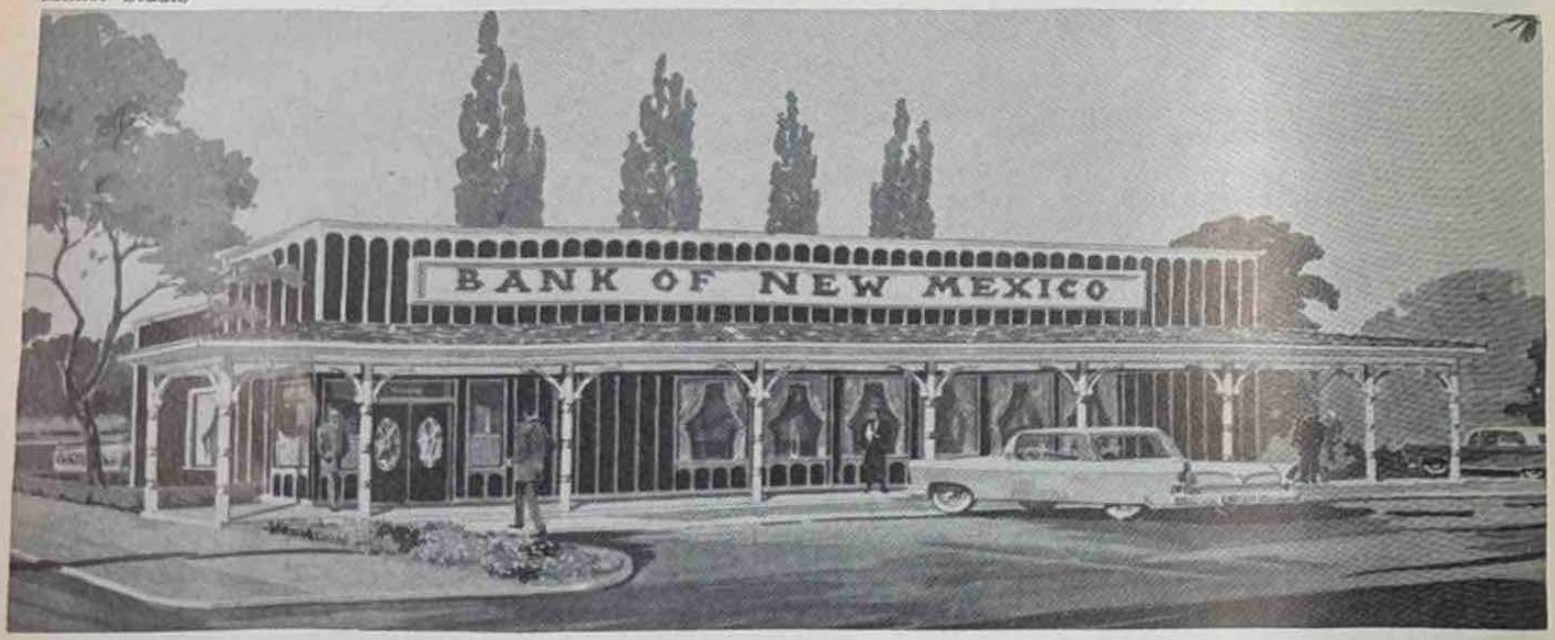
PATIENT ROOMS open onto patios which are private as far as outside visitors are concerned but allow new mothers to associate.



BANK OF NEW MEXICO: COUNTERFEIT APPROACH TO DESIGN

The building shown in the sketch below is not part of a Hollywood movie set; its construction is scheduled to begin this month in the three-block Princess Jeanne Shopping Center area referred to as "one of Albuquerque's most important commercial districts." The strange reasoning behind the why of this $100,000 structure (architects-engineers: W. C. Kruger & Associates) is best

Milner Studio



explained by quoting from the publicity release issued on behalf of the client:

"Arthur A. Atherton, president of the bank, said the Princess Jeanne office will represent a radical departure in bank architecture. . . . The western design was chosen because Princess Jeanne addition is 'a new area with many modern buildings.' Atherton said he felt the 'early American or Gay '90s style serves as a pleasant contrast and is certainly unique to the city.'

"The west face of the building will be bordered by a wide wooden porch topped by an overhanging roof supported by 12 carved pillars or columns. Recessed windows will face onto the porch. Atherton said decor of the new office will be supported on the interior. Lighting, carpeting and other decorative fixtures will be finished in old western or 'before the turn of the century' style."

Where, one wonders, does the responsibility really belong for such an ungenuine concept?



ABRASION AND IMPACT of heavily loaded lift trucks and small-diameter hard wheels must be absorbed by floors.

methods & materials

by D. W. FREEMAN

Industrial floor construction

Floors are unique among building components in that they are called upon to take the continual wear and tear of rolling equipment, pallets being dragged, pushed and dropped, attack by aggressive liquids and the thousand and one other abuses to which they are subjected. This is all in addition to their structural job of supporting machinery, stock and dead load items.

In view of this, the floor of a building, most especially one of commercial or industrial occupancy, must be given the same consideration and planning as is devoted to air conditioning, layout or electrical provision. Merely to design a floor solely for its structural loads is to overlook many of its most important functions. The results of such shortsightedness are all too evident throughout the country — floors that are cracked, dusting, scaling, rutting and otherwise failing to satisfy all but the structural requirements. The vital role played by the floor in the conduct of the business in the building then becomes painfully clear. Remedial measures are, of course, available but they are considerably more expensive in terms of money, time and inconvenience than putting in the right floor in the first place.

As a matter of fact, the difference in cost between installing a floor that will be a source of trouble and frustration and one that will perform well for the life of the building is only pennies per square foot.

Mr. Freeman is Seattle branch manager of The Master Builders Co.

choosing a floor

Experience over the years has produced reliable, proven floor designs for virtually every condition encountered. Unfortunately, floors often go in that do not reflect such an awareness of the service-dictated needs.

Since even covered floors require 3,000-3,500 psi. concrete (ordinarily the standard strength for structural needs), we can choose a strength for our floor mix based solely on the anticipated traffic and exposure. The strength of the mix is a good take-off point for a floor design since many of the desirable wearing qualities are closely related to it. It is, however, as we shall see, by no means the only matter that must be considered.

COVERED FLOORS: Granting sound, hard aggregates (a highly important proviso), concrete floors to be covered with some other material, such as tile or carpeting, can be built satisfactorily with a 3,000-3,500 psi. mix. By this we mean a floor with a



METALLIC AGGREGATE SHAKE should be applied by leaning low over slab and letting it sift through fingers evenly.

concrete surface of 3,000-3,500 psi. Often the concrete bleeds to such an extent that fines and laitance are brought to the top of the slab and the water/cement ratio at the surface is raised greatly. The result is a floor in which the weakest concrete is at the surface, precisely where it must bear the greatest wear. The result is a weak, dusting surface. And, because the slab will be permeable, water seepage causes tiles to curl and become detached.

Make sure that the concrete for your floor is such that bleeding will be minimized and that it will develop the proper strength. Test cylinders are of dubious value in this aspect of floor construction since the ends are ground or capped before being tested; and the quality of the crucial wearing zone thus is not reflected in the test.

EXPOSED—MEDIUM AND HEAVY DUTY: Floors that are to be exposed and subject to foot and/or truck traffic should have concrete of 4,500-7,000 psi. strength. A highly important fact to remember in the construction of exposed concrete floors is that it is the aggregate that must withstand the bulk of the wear and tear of traffic. Even very high compressive strength cement paste has poor abrasion resistance. It is the aggregate which lies at the surface of the floor that absorbs abrasion and impact.

If your floor is to experience only light foot traffic or occasional pneumatic-tired hand trucks, a well-washed, graded, sound quartz or crystalline granite aggregate bound by a strong cement paste will often suffice, granting proper construction procedures, including proper curing. Frequently, however, conventional aggregates simply are not economical for floors. Although offering some penny savings in first cost, they soon tip the scales heavily in the other direction as the need for retopping or tearing out and recasting arises.

A number of specially quarried or manufactured aggregates are on the market today, including emery, trap rock and those made from metallic and nonmetallic materials. Trap rock and emery offer good abrasion resistance but leave something to be desired in impact strength. When traffic is to be mainly pedestrian, they will often prove to be quite satisfactory. If hard wheeled or heavy vehicular traffic is expected, however, one of the metallic aggregates specially manufactured for such service will provide considerably greater wear resistance.

In connection with choice of aggregate comes the matter of delineating the floor areas in which it is to be used. This aspect of floor design might seem relatively simple on first glance. But in this age of space flexibility, today's office area might very well be tomorrow's manufacturing area. When deciding the type of floor for any particular area in a proposed building, it would be wise to consider the long-term expansion plans as well as the initial floor layout.

And, as you would engage an air conditioning consultant or an electrical engineer for those aspects of your plans, just as surely an expert on floors should be called in to advise on the type of construction needed to satisfy the various floor needs of the plant being designed. For floors — continually in use and continually in sight — speak eloquently of the care and knowledge expended on them by their designers and builders.

construction practices

In addition to the usual desirable concrete construction practices (many of which take on increased importance in casting floors) and the few special ones already touched upon, there are some additional points that should be heeded.

Joints in floor construction are an art to themselves. And, as in every art, there are differences of opinion regarding them and healthy "discussion" centered about certain points. They even touch upon terminology, viz., what are meant by expansion, isolation and construction joints. Whatever the outcome of these discussions, it is widely accepted that it is advisable to use joints to separate or isolate floor slabs from walls, footings and columns and from slabs of different thicknesses or shapes to avoid random cracking at these points. Large slabs should be divided by joints into 20- to 25-ft. squares to assure controlled cracking in these joints. If random cracking occurs, the cracks will soon spall to impair seriously the performance of the floor.

Concrete of a special consistency is needed to produce a good floor. You won't be able to fully determine it with a slum cone either. Experienced contractors can tell a good floor mix by its "feel." It will be workable enough to finish easily but stiff enough to avoid segregation and bleeding. The latter point is especially important in floor work since, as was pointed out previously, tough aggregates are needed at the surface for abrasion resistance. For this same reason, over-trowelling or early trowelling is a particularly bad practice in floor construction.

Curing of floors should begin as soon as they have stiffened enough to support the paper, matting or whatever is used and it should continue for at least four days, preferably a week. This is highly important in preventing dusting, strength loss of as much as 50%, damage from acid attack and aggregate pull-out.

maintenance

No building superintendent would think of neglecting a regular, planned program of washing and waxing his tiled floors or sweeping and washing his carpeted areas. And yet, concrete floors, subjected to vastly greater and heavier traffic, are often ignored completely, with the exception of sweeping away the debris that collects on them. Fortunately, concrete floors stand up remarkably well in many cases despite this neglect, thanks to their innate strength and impermeability. Any concrete floor, however, will give even better service if just a little effort is expended on its maintenance.

If aggressive liquids are likely to be spilled on floors, they should be flushed with water periodically, depending upon the amount spilled and the nature of the liquid. In dealing with aggressive substances, the most important factor is obtaining a floor that is as impermeable as possible. Concrete of high porosity allow infiltration of the liquid into the slab with subsequent rapid disintegration of the concrete. A high quality concrete properly placed and cured is the best avenue to impermeable floors.

However, there are waxes and chemical hardeners available which help to decrease porosity. They enhance the ability of concrete floors to resist the intrusion of dirt and stains, as well as aggressive liquids. Waxes coat the surface with a dirt-repelling substance effective in themselves for areas of light traffic.

Random cracks should be repaired as soon as they are detected, especially if they are to be subjected to traffic. If they are not repaired, spalling soon occurs and necessitates more extensive, expensive work. In repairing cracks, all loose aggregates and cement paste should be scraped away until sound, clean concrete is exposed. Afterwards, all edges should be square-cut. Then a nonshrinking filler material should be rammed into the opening. Keep traffic off until the material has fully hardened.

Concrete floors, slab-on-grade and structural, are serving throughout the world under a multiplicity of conditions: homes, garages, factories, stores, barns and many others. It is a tribute to concrete's versatility and durability that it can successfully solve the needs of such varying installations. With a little care and attention you can have a concrete floor that will serve your client faithfully for the life of his building.

Gas heating provides bonus classrooms on Oregon job

Individual gas furnaces shaved enough off the basic bid price to provide four additional classrooms at the Dry Hollow Elementary School in The Dalles, Ore.

Furnaces were installed under a roof overhang on a cement deck outside each classroom and protected from direct wind and rain by individual 6-ft. wide concrete block walls, a type of installation that was relatively inexpensive and will simplify later expansion.

School includes 20 classrooms, gymnasium - auditorium, stage - cafeteria, kitchen, dressing rooms and administrative areas for a total of 40,484 sq. ft. Bid for gas heat was $494,663, compared to $545,372 for construction utilizing heat pumps.

Heating and plumbing contract which went to Twiss Plumbing & Heating Co. for $2.06 per square foot included 24 Fraser-Johnston upright furnaces, a horizontal furnace for the administrative area and two horizontal blower duct systems using duct heaters in the cafeteria and gym.

Design temperature of the school was minus 10 deg. and heat loss calculations 47,000 Btu/rh. for corner classes and 37,000 Btu/hr. for others. Furnaces are controlled by individual room thermostats and are equipped with automatic dampers so that class-



CONCRETE WALL 6 ft. wide protects furnaces.

room ventilation is supplied through the furnace.

Units modulate to supply up to 1,200 cfm. of fresh air for each room and relief air is exhausted through return ductwork to the outside. Roof fans handle exhaust from kitchen, lavatories and dressing rooms.

Building, designed by architects Edmundson & Kochendoerfer and engineer R. Evan Kennedy, is of frame construction with concrete slab floors on grade. Roof is of exposed wood beams with an insulated 2-in. deck.

Despite the low power rate in the area, it is believed that quick morning pickup and maximum temperature setback at night will keep the heating bill comparable to what electrical heating would have been.

General contractors were Juhr & Sons; W. Bruce Morrison was heating system engineer.



NEW CONCEPT IN AIRPORT LIGHTING combines eight-unit star clusters, 480 in all, for 5,000-car parking facility and light bands (insert) for 65 acres of ramp area.

Los Angeles boasts brightest airport in the world

Two unusual lighting systems are being installed at Los Angeles International Airport's new $70 million terminal. To illuminate key aircraft ramp areas, four bands of light designed as an integral part of each building will encircle the top of the seven satellite structures. In the car parking area 60 sleek 57-ft. poles supporting eight-unit star clusters of mercury-vapor luminaires will provide illumination level about five times as bright as most downtown streets.

The light bands, designed by consulting engineer J. S. Hamel, will provide 35 footcandles of light directly in front of and surrounding each satellite, diminishing to approximately one-two footcandles at the 300-ft. mark, without distracting glare, an important safety feature. Fixtures, built in to eliminate poles or other protruding supports, are basically of extruded anodized aluminum, selected both as blending well with the structures and avoiding sea air corrosion. They are faced with clear ¼-in. plexiglass panels and have reflecting surfaces of polished aluminum.

Parking area poles, designed to architecturally match the building complex, are spaced 160 ft. apart with each set of eight luminaires producing 416,000 lumens of light.

Overall architectural and engineering work was performed by the Joint Venture for the International Airport, composed of Charles Luckman Associates (coordinating architects), Welton Becket Associates and Paul R. Williams & Associates. General contractor is Robert E. McKee; electrical contractor for the ramp area lighting, Fischbach & Moore; and for the mercury-vapor luminaires, Sherwin Electric Co. Bands of light are General Electric T-10, 1,500-milliampere lamps in fixtures manufactured by Columbia Lighting, Inc. Poles are by Pacific Union Metal with General Electric luminaires.



PARKING AREA is divided into four segments surrounding Theme Building (at rear), 135-ft. high structure housing gourmet restaurant suspended at 80 ft. with observation decks above.

urethane roof panels

For flat built-up roofs, especially those requiring maximum insulating efficiency, Barrett is marketing an insulating panel made up of rigid urethane foam coated on both sides with roofing membranes. Panels are 3x4 ft. and range from .8 to 2 in. thick. They are said to be thinner and weigh less than other types of material with comparable insulating qualities. Factory lamination provides an immediate walk-on and work-on surface and prevents warping. Panels do not absorb water or roofing bitumen, will not expand, contract or change shape. They can be applied directly in the hot roofing bitumen and mopped with hot pitch or asphalt.—Barrett Division, Allied Chemical Corp., 40 Rector St., New York 6, N.Y. **(No. 1)**

long-span joist

A nailable, lightweight, but structurally strong joist suitable for spans up to 60 ft. is expected to find wide use for roof framing in school and commercial construction. Called Truss-Joist it was developed by a Boise architect and is being manufactured by Trussdeck Corp. there and Lumber Manufacturers in Portland. Truss-Joist is delivered at the jobsite completely fabricated. Top and bottom chord are Douglas fir, webbing is of electrical welded steel tubing. It is manufactured in parallel chord and pitched upper chord. Lower chord is cambered and can be given enough camber to provide an arch. In large industrial buildings Truss-Joists can be used as a purlin to provide a building with columns spaced much further apart than in conventional construction. It is well suited for providing a flat deck roof with a low rise in buildings where a high rise truss would be unattractive. Because of its light weight, erection does not require heavy cranes.—Lumber Manufacturers, Inc., 2041 S.W. 58th Ave., Portland 1, Ore. **(No. 2)**

outdoor lighting units

For pedestrian malls, front entrance drives, swimming pool areas and the like, General Electric is offering a post-mounted fluorescent fixture, believed to be the first such luminaire on the market. Design cants into the sky with simple, straightforward lines



that should blend well with today's architecture and landscaping. Unit is designed to be mounted at 10 to 20 ft.; produces 6,900 lumens of light from 150 watts of electric power. This fixture is one of several recently added to GE's line in a move to capture a share of the area lighting market. All units are designed for low mounting height and are available in aluminum and five optional colors. Units for both mercury and incandescent are of simple, canopy design. Floodlights also are offered.—General Electric Co., 3325 Wilshire Blvd., Los Angeles 5, Calif. **(No. 3)**

glass door safety tape

To help reduce accidents involving sliding glass doors, Ador is now applying an aluminum metal tape strip on the glass portion, making it the first manufacturer distributing on the West Coast to incorporate such a safety device. Tape's reflective qualities will make it visible in the dark, as well as during daylight. All doors glazed at the main plant in Fullerton, Calif., will have the tape affixed. A tape kit will be sent with doors shipped to branches and distributors for field assembly.—Ador Corp., 2345 W. Commonwealth, Fullerton, Calif. **(No. 4)**



plank-size tile

To reduce application time and provide more design flexibility, Kaiser Gypsum has added an acoustical tile plank 16 in. wide and 10 or 12 ft. long. The product, called Fir-Tex Acoustical Plank, has the standard ½-in. thickness. It is painted white and offered with either a pin-punched or fissured pattern. Finish is washable and Class C flame resistant. Joints on the long edges allow concealed nailing or stapling. Plank size also lends itself to wall use.—Kaiser Gypsum Co., Kaiser Co., Oakland 12, Calif. **(No. 5)**

colored luminous ceiling

Irregular surface design of Texture-Luminus, a vinyl ceiling panel, produces a textured pattern, accented by color if desired. Ceiling utilizes a cube-cell structure in its pattern, perforated or nonperforated. Color, any of five pastels, is located on the center membrane of the panel only. Or units are available with black applied to irregular surface area to accentuate the textured pattern.—Luminous Ceilings Inc., 3701 N. Ravenswood Ave., Chicago, Ill. **(No. 6)**

air diffusion system

Armstrong has developed a ventilating acoustical ceiling which allows conditioned air to flow directly into the room at equal pressure and velocity through thousands of tiny perforations in the ceiling material itself. The system is expected to both improve air conditioning efficiency through its blanket disbursement of air and reduce installation costs. It eliminates need for conventional diffusers, a substantial amount of ductwork and usually requires a less shallow plenum space. Ventilating perforations in the acoustical material are blended in with the surface design and cannot be distinguished in the installed ceiling. Down pressure of air also exerts a cleaning effect on the ceiling. The System is offered in Travertone, Minatone, Minaboard, Acoustical Fire Guard tile and Acoustical Fire Guard lay-in units.— Armstrong Cork Co., 4710 Stevens St., Lancaster, Pa. **(No. 7)**

Reader Service

Pacific Architect & Builder
1945 Yale Place E., Seattle 2, Wash.

Please send without obligation the data about the products listed on these pages.

Circle item numbers you wish:

DECEMBER 1961
(After January 31 write directly to manufacturer)

1 2 3 4 5 6 7

Name

Title

Firm

Address

City Zone State

LITERATURE

Installation Specifications (AIA 23-G): gives complete data on installation and maintenance of the company's resilient floor coverings, Wondertop all-purpose surfacing material and bulletin board cork lines; includes adhesive chart covering all the products, federal specifications chart and tile calculation chart; 64 pp.—Congoleum-Nairn, Inc., 195 Belgrove Drive, Kearny, N.J.

Noise Control, Privacy, and Signature Movable Partition: discusses current theories of sound transmission and reduction in all types of walls, illustrated by comparison charts and graphs; 43 pp.—The E. F. Hauserman Co., 5711 Grant Ave., Cleveland 5, Ohio.

Insulation Efficiency Cost Report: shows how a small difference in insulation efficiency can add up to a large operating cost increase; 4 pp.—Ric-wil, Inc., Barberton, Ohio.

Standard Specifications for Industrial Luminaires: presents RLM (Registered Luminaire Manufacturers) standards for both incandescent and fluorescent reflectors.—RLM Standards Institute, Inc., Box 754, Meriden, Conn.

Perlite Lightweight Concrete Aggregate (AIA 3-D-3 and 37-B-2): gives specifications, load test data, typical mix designs, etc.; 4 pp.—Perlite Institute, Inc., 45 W. 45th St., New York 36, N. Y.

Hospital Lighting Manual: gives recommended lighting levels for 112 areas, suggested lighting layouts; 24 pp.—Day-Brite Lighting, Inc., 6260 N. Broadway, St. Louis 15, Mo.

Motel Motifs: presents dozen design ideas utilizing Masonite products by Arthur Swanson, specialist in motel architecture; 16 pp.—Masonite Service Bureau, Suite 2037, 111 W. Washington St., Chicago 2, Ill.

Symons Steel-Ply Forms: catalogs forms and accessories and explains the firm's system with case history uses; 24 pp.—Symons Clamp & Manufacturing Co., 4249 W. Diversey Ave., Chicago 39, Ill.



pa&b pick of the month

In this handsome 18-page booklet (AIA 17-A), four basic types of Pac/Wall systems are analyzed in a refreshingly candid approach to the overall subject of curtain wall construction. Module selectors, drafting standards and installation photographs contribute to its usefulness.—Pacific Curtainwall, Inc., 730 W. Esther St., Long Beach 13, Calif.

for PERMANENT PROTECTION
LASTING BEAUTY
EASILY APPLIED...



CARAM

SPECIFY CARAM-MIRACLE NEOPRENE-HYPALON* ROOFING SYSTEM

WRITE FOR FREE BROCHURE

New Caram-Miracle Elastomeric roofing system is the only solution to some architectural problems . . . and the best solution for many others. Tough and resilient, The Caram-Miracle roofing system is the only practical answer to maintenance-free coatings for steeply pitched or contoured roofs. The Caram-Miracle system provides excellent weatherability against sunlight, ozone and severe climates. The versatile roofing system weighs only 1/25th that of a conventional "built-up" roof. The Caram-Miracle system is easily applied to flat, steeply pitched or curved roofs.

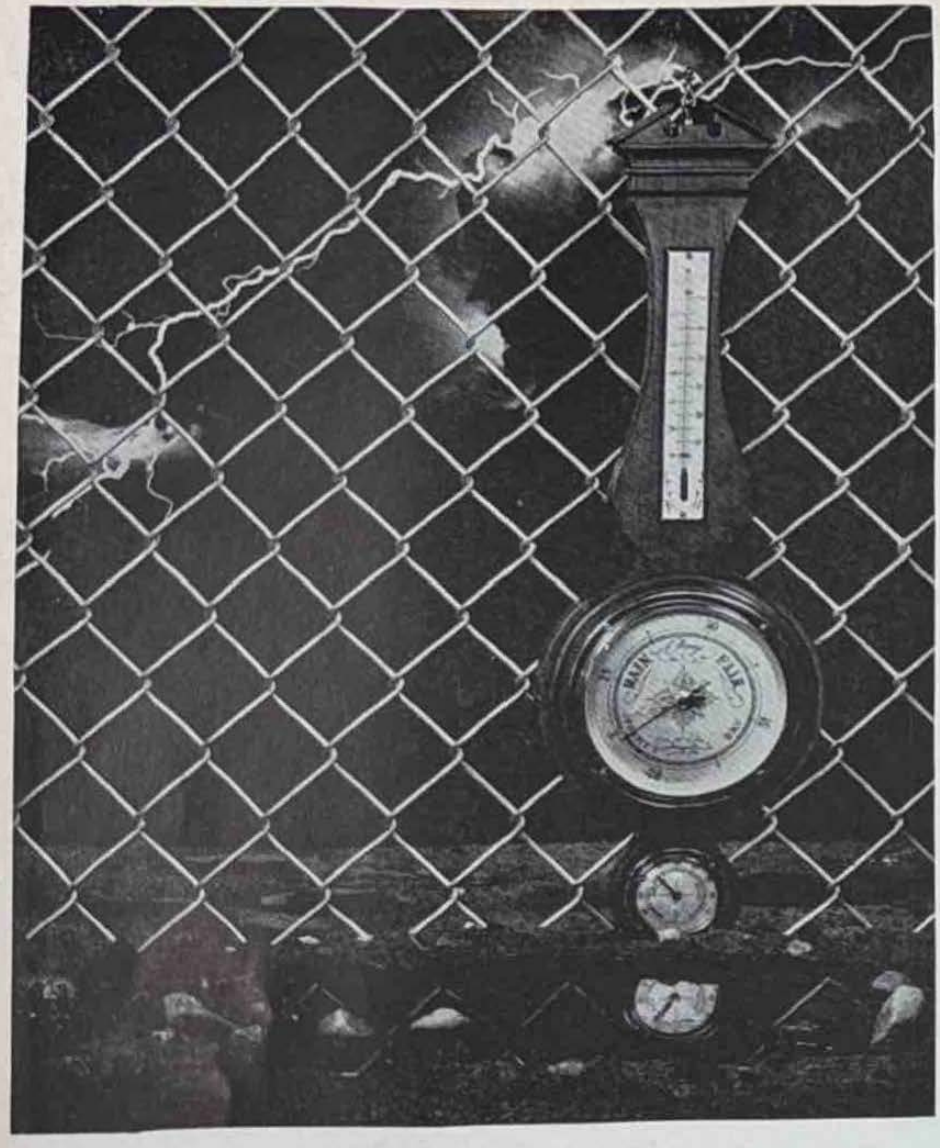
- *Lightweight*
- *Variety of Colors*
- *Permanent Elasticity*
- *Abrasion Resistance*
- *Flame Resistance*
- *Excellent Weatherability*

CARAM PRODUCTS COMPANY

* DuPont Trademark

Post Office Box 119 • Monrovia, California

CARAM



FORECAST: VIOLENT STORMS...BUT

Realock Fence will resist the foulest weather

That's because Realock is made from top grade steel wire, and is completely galvanized, making every foot thoroughly resistant to weather and corrosion. Realock Fence is a one-time investment that requires minimum maintenance.

For all enclosure jobs—from playgrounds to industrial sites—specify Realock Fence. Easy to erect, it's also ideal for right-of-way installations and for protection of equipment stored outdoors. Call the office listed below for full details and for prompt delivery.



THE COLORADO FUEL AND IRON CORPORATION

Los Angeles • Oakland • Portland • San Francisco
Seattle • Spokane • Denver
Salt Lake City • Phoenix

BOOKS

Creative Color. By Faber Birren. Reinhold Publishing Co., 430 Park Ave., New York 22, N.Y. 1961. 128 pp. $10.

Intended primarily for the artist and the commercial designer, the architect too will find inspiration in the author's thesis: a knowledge of perception is the springboard to a far more inventive use of color in art today. Conclusions reached through the psychological approach are reduced to fairly simple principles, aided by thoughtfully presented illustrations.

Blueprint Reading: An Interpretation of Architectural Working Drawings. By William J. Hornung. Prentice-Hall, Inc., Englewood Cliffs, N.J. 1961. 129 pp. $6.65.

"Primary purpose of this book is to teach blueprint reading in a practical manner, omitting theoretical explanations not entirely associated with the building industry," says the author, director of the National Technical Institute, assistant director of the Institute of Design and Construction and faculty member of New York University.

Architectural Drafting. By Herbert F. Bellis and Walter A. Schmidt. McGraw-Hill Book Co., Inc., 330 W. 42nd St., New York 36, N.Y. 1961. 118 pp. $5.50.

Simple, practical and up-to-date presentation for those who have little knowledge of the field. Complicated explanations, engineering and computation tables have been purposely omitted.

The Consulting Engineer. By C. Maxwell Stanley. John Wiley & Sons, Inc., 440 Park Ave. S., New York 16, N.Y. 1961. 258 pp. $5.95.

Only book presently available in this field, it is divided into two main parts: the first concerned primarily with the consulting engineer's professional relationships to his client, to other consultants and to the public; and the second dealing with internal problems of a consulting practice.

Modern Physics Buildings: Design and Function. By Dr. Ronald Palmer and William Maxwell Rice. Reinhold Publishing Corp., 430 Park Ave., New York 22, N.Y. 1961. 324 pp. $13.50.

Report compiled under the auspices of the American Association of Physics Teachers and the American Institute of Physics surveys the problems confronting designers of physics buildings and sums up the experience of architects, physicists, administrators and engineers in planning physics buildings in the U.S. and overseas. The book is devoted primarily to college physics structures.

• **Plywall Products Co.:** New Northwest sales representative is G. E. (Jerry) Charles.

• **Formica Corp.:** Two companies are distributing its decorative laminated plastics in Hawaii: A & B Commercial Co. in Kahului, Maui, and Kauai Commercial Co. in Eleele, Kauai.

• **Wallpapers, Inc.:** Simon Barth has been appointed vice president and sales manager in the Oakland home offices.

• **Pittsburgh-Des Moines Steel Co.:** Emerson P. DePuy has been assigned to the West Coast offices, working out of Santa Clara, Calif.

• **United Technical Industries:** A "significant new marble find" in Southwest Utah has led to the establishment of a new division, Western Marble, with A. Nathan Boss as manager.

• **Filon Plastics Corp.:** C. E. (Sam) Bass has been promoted to western division sales manager of the Hawthorne, Calif. manufacturer of fiberglass plastic building panels. . . . New distributors are Stylemaster Patio & Building Products, Gardena, Calif., and Georgia-Pacific Corp., Great Falls, Mont.

• **General Electric Corp.:** W. L. Batty Jr. has been promoted to the post of manager of the western district of the silicone products department, located in Downey, Calif.

• **Sun Chemical Corp.:** To streamline the operations of its A. C. Horn Division, with a plant in San Francisco, the parent company has sold the assets of the contracting division to Psaty Bros., Long Island City, New York.

• **Ekco Products Co.:** Jack Russell has been appointed to the presidency of the Worley & Co. division in Whittier, Calif. Russell has been in various sales and administrative capacities for the firm for the past 18 years.

• **Burgess-Manning Co.:** Educators Furniture & Supply Co., Seattle, has been named distributor for Washington, Oregon, Montana and Alaska and part of Idaho.

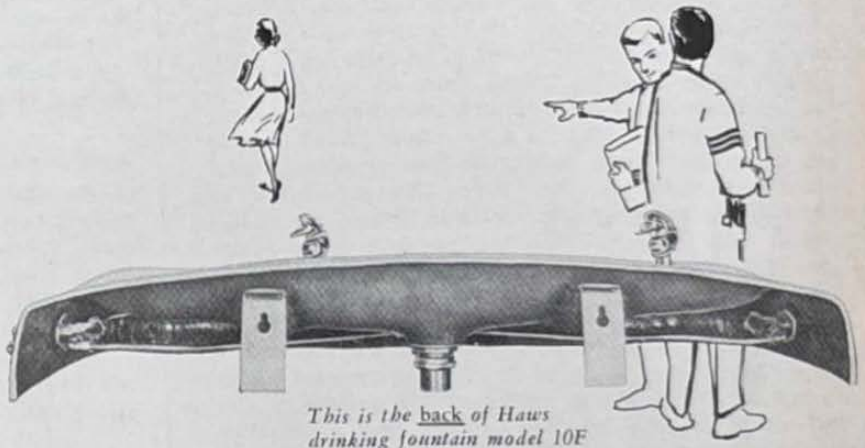
• **Johns-Mansville Corp.:** William J. Scott, former sales representative for the pipe division in Los Angeles has been appointed district manager for distributed sales at Seattle. Scott succeeds C. J. Rossio who has been transferred to the Los Angeles district as special representative for the industrial insulations division.

• **Reflectal Corp.:** Coinciding with a nationwide marketing program, Robert W. Heller has been appointed western regional representative for Alfol insulation. His territory will include Arizona, California, Idaho, Montana, Oregon, Utah, Washington and parts of Wyoming.

• **Builders Brick Co.:** The Seattle-based firm and its Mutual Materials Division has formed a marketing department with Ralph E. Yoder as manager.

• **The American Hardware Corp.:** William Gertz has been appointed as customer relations representative for the subsidiary, Kwikset Sales and Service Co., Anaheim, Calif.

• **Alsynite Division:** Among its new distributors are Butler Johnson Corp., Oakland, and Morrison-Merrill & Co., Pueblo, Colo.



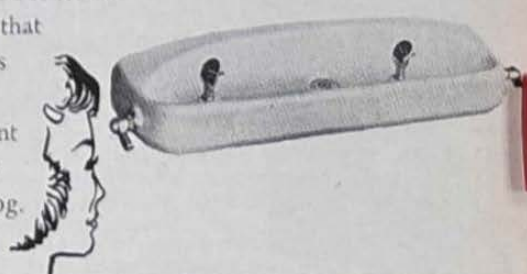
This is the back of Haws drinking fountain model 10F

Look at the Back for a change!

From the front Model 10F is a beauty in colorful fiberglass — but it is HAWS **unseen** quality that truly backs it up. Careful craftsmanship is from the inside out! This dual-bubbler model, heat and pressure laminated with reinforced fiberglass, has hidden features: exclusive flow controls, vandal proof accessories, easy-to-use wall hangers and overall strength.

And let's face it....

As the passer-by sees it, Haws Model 10F has all the styling distinction that makes HAWS the unanimous choice for beauty.
Specification sheets will be sent on request — or write for the complete HAWS 1961 Catalog.



Since 1909 HAWS **DRINKING FOUNTAINS**

a product of
HAWS DRINKING FAUCET COMPANY
1441 Fourth Street — Berkeley 10, California
Export Dept: 19 Columbus Ave., San Francisco 11, California

not specified

the real h in housing

Two unrelated episodes in the last two months have reminded us how much can be gained by an exchange of ideas between American and European architects, particularly in the field of housing. For while the former may lead the way with sleeker, lower cost and more imaginative designs, the latter can teach a lesson or two about site planning, scale and, above all, the human element. These different aspects were pointed up by Los Angeles architect Edward H. Fickett returning from a five-week tour of Italy, France, Switzerland, Germany and England, and Swedish architect Bo Boustedt during a nine-week tour of the U.S.

Fickett, who also attended the International Conference of Architects in London and the International Housing Exposition in Copenhagen, observed that economy of space has received great emphasis in high-rise, self-contained apartment buildings but that "individuality and luxury appointments have been by-passed in low- and middle-income markets." This is not to say, however, that apartment neighborhoods are unattractive. He explained that residential units are carefully placed in relation to existing trees, rock formations or natural land contours to allow for "these green areas which add so much to the neighborhood." Fickett praised the inclusion of small shops within or adjacent to large apartment houses; in some cases planners are earmarking plots near each project where the residents may grow their own vegetable or flower gardens.

Boustedt, who was a featured speaker at the White House Conference on Aging in January, stopped off in Seattle to show housing officials, AIA members and students in a series of slide lectures how a homelike atmosphere is retained within the organizational structure of an efficient institution. He should know of what he speaks for close to 100 homes for the aged have been built to his plans, executed in offices in four different cities.

Boustedt goes directly to the heart of the problem, without too much concern for esthetics per se. Hence, the facades themselves become somewhat uninteresting but they have a real sense of belonging to their immediate surroundings, which always includes a courtyard and quite often a piece of sculpture. For as the architect so emphatically explains, senior citizens are more interested in the bud on a bush or the children at play down the street than the big view of mountains, seascape or whatever. Inside, Boustedt's houses are characterized by their intimate spaces: charming entryways, broken corridors, dining tables for four or six, heartwarming fireplaces and, last but not least, the handsome Swedish furniture, much of it specially designed for its users. R.E.K.



CUPROLIGNUM

(KOO-PRO-LIG-NUM)

Gives wood *lasting* protection against dry rot, mildew, toredos, limnoria, termites, white ants, wood lice, fungoids, parasites. Easy to use—brush, spray or dip—dries *fast*—excellent base for paint. Ask for it by name. Insist on . . .

CUPROLIGNUM

ORIGINAL—Composite Copper Phenolic Wood Preservative

RUDD & CUMMINGS, INC. • SEATTLE 99, WASH.

Pacific Architect & Builder

Published by Pacific Builder & Engineer, Inc.
1945 Yale Place E., Seattle 2, Wash. EAst 3-7007

N. B. CHAPIN, President
ROSCOE E. LAING, Vice President, General Manager
LLEWELLYN F. WING, Secretary-Treasurer

Serving the men who design, engineer and construct the important buildings, large and small, in the 13-state West—California, Oregon, Washington, Alaska, Idaho, Montana, Wyoming, Colorado, Utah, Nevada, Arizona, New Mexico and Hawaii

HOME OFFICE
Norman Erickson, Advertising Manager
Phyllis E. Forth, Production Manager
Frances S. Eggan, Circulation Manager

LOS ANGELES
William G. Quinn, Box 31, North Hollywood, TRiangle 7-1769

SAN FRANCISCO
May B. Hipshman, 1620 Montgomery St., EXbrook 7-6544

PORTLAND
Isabella Foster Chappell, 2525 S.W. 16th Ave., CApitol 3-4945

SALT LAKE CITY
Peggy Hansen, 3790 Lois Lane, CRestwood 7-4606

HONOLULU
Beatrice M. Howell, Box 8048

Circulation Information: Eligible for controlled free circulation are active registered architects, structural engineers and selected building contractors and specialty subcontractors in the states listed above. Paid subscriptions are $5 a year.

BPA

Pacific Printing Co.

ADVERTISERS

Caram Manufacturing Company	31
Colorado Fuel & Iron Corp.	32
Haughton Elevator Company	II Cover
Haws Drinking Faucet Company	33
Macomber, Inc.	III Cover
Major Line Products Co., Inc.	11
Portland Cement Association	IV Cover
Rudd & Cummings, Inc.	34

Pacific Architect & Builder

Cumulative Index of Editorial Content

Volume 67—January through December 1961

Design

(Name following project is that of the architect unless otherwise specified)

Residential

	Issue	Page
Downieville, Calif., Filmer Summer House—Francis Joseph McCarthy	August	30
Glendale, Calif., Norman G. Gottfredson Residence—Walter H. Koziol, Designer	January	28
Honolulu, John T. Jacobsen Residence—John T. Jacobsen	July	20
Laguna Beach, Calif., John Robertson Residence—Killingsworth, Brady, Smith & Associates	February	24
Northern California, Alway Cabin—Johnson, Hawley & Associates	March	17
San Diego, Homer T. Delawie Residence—Homer T. Delawie	March	20

Commercial

Alameda, Calif., The Galleon Restaurant—Campbell & Wong	May	13
Alameda, Calif., Tidewater Oil Co. Distributing Station Office—Albert Hunter/Shig. Iyama	February	26
Casper, Wyo., Guaranty Federal Savings and Loan Association Building—Robert Wehrli	March	18
Eugene, Branch Office, United States National Bank of Portland—Wilmsen, Endicott & Unthank	November	16
Denver, Professional Office Building—Donald R. Roark	November	22
La Jolla, Calif., La Jolla Fashion Center—Edward H. Fickett	April	27
Los Angeles, Knoll Associates, Inc., Showroom—Knoll Planning Unit, Designer	September	28
Los Angeles, Welton Becket & Associates Home Office—Welton Becket & Associates	August	21
Newport Beach, Calif., Stuft Shirt Restaurant—Ladd & Kelsey	May	18
Portland, Totem Pole Marina—John Storrs and Simon Stanich	March	22
San Francisco, Fireman's Fund Insurance Co. Home Office Landscaping—Eckbo, Dean & Williams, Landscape Architects	September	26
Seattle, Dublin House Restaurant—Roland Terry and Philip A. Moore	May	16
Seattle, Office Building, Bethlehem Steel Co., Pacific Coast Division—Bindon & Wright	December	22
Seattle, Publishing-Printing Plant—A. O. Bumgardner & Partners	January	14
Tacoma, Bowlero Lanes—Marshall W. Perrow	July	18

Educational

Albuquerque, Armijo Elementary School—Stanley & Wright	June	21
Bellingham, Wash., Western Washington College of Education, Student Union Building—Bassetti & Morse	June	19
Berkeley, University of California, Student Center (Union and Dining Commons)—Hardison & DeMars	October	21
Laupahoehoe, Hawaii, Laupahoehoe School—Fisk, Johnson & Perkins, Ossipoff	June	28
Norwalk, Calif., Cerritos Junior College—Kistner, Wright & Wright	March	14
Price, Utah, Carbon High School—Edwards & Daniels	June	26
Provo, Utah, Brigham Young University, Industrial Education Building—Dean L. Gustavson Associates	August	28
Santa Barbara, La Colina Junior High School—Arendt, Mosher, Grant	June	24
Wilbur, Wash., Wilbur Elementary and High School—Kenneth W. Brooks & Associates	September	21

Public

Berkeley, Fire Station No. 4—Ratcliff & Ratcliff	January	24
Colton, Calif., Colton Civic Center—Herman O. Ruhnau	November	24
Eugene, Lane County Fairgrounds—Stafford, Morin & Longwood	July	12
Newport Beach, Calif., Beach Shelter—Blurock, Ellerbroek & Associates	April	26
Portland Memorial Coliseum—Skidmore, Owings & Merrill	April	21

Scientific

Santa Barbara, Calif., Hoffman Science Center—William L. Pereira & Associates	July	16

Architects' Offices

Los Angeles, Charles Luckman Associates	January	30
Los Angeles, Welton Becket & Associates	August	21
San Francisco, Knorr & Elliott	May	20

Project Roundup

Designed for a society on wheels: College Carwash, Pasadena, Calif.—Smith & Williams; Citizens Motor Bank, Clovis, N.M.—James A. Burran Jr.; Gas Station, Alameda, Calif.—Roy Anderson, Designer	May	22
Solar screens for looks, for cutting cooling costs: City Hall, Alhambra, Calif.—William Allen; City Hall, Modesto, Calif.—Milton T. Pflueger	October	28
Two Southern California hospital facilities: Whittier Presbyterian Inter-Community Hospital, Whittier, Calif.—Daniel, Mann, Johnson & Mendenhall; Maternity Wing, Donald N. Sharp Memorial Community Hospital, San Diego—Frank L. Hope & Associates	December	24

Methods/Materials

Air Force Academy Chapel's steel skeleton	March	24
Concrete floor system devised by Phoenix architect	November	27
Concrete, structural and sculptural, for 13-story American Cement Corp. Building, Los Angeles	May	23
Concrete "trees" for Waikiki landscape—structural elements of 15-unit, four-story hotel	October	31
Curtain wall of blue Italian mosaic tile for 22-story Wilshire-Flower Building, Los Angeles	July	23
Denver in prestressed concrete spotlight	October	30

Electronic computer adapted to building frame analysis — January 32
Hollow floor system serves dual purpose, heating and air conditioning, in bank job (Puget Sound National Bank, Tacoma Branch) — May 27
Honolulu's rotating sky restaurant — February 29
Individual heat pumps installed in William Walker Elementary School, Beaverton, Ore. — July 25
Industrial floor construction—D. W. Freeman — December 27
Liquid spray foam tested for home insulation — July 25
Los Angeles boasts brightest airport in the world — December 29
Paint—what you need to know about the five types—S. O. Jones — May 25
Precast columns speed parking garage erection in Beverly Hills — April 29
Precast panels and grills form exterior of Seattle's Temple De Hirsch — June 34
Preframed floor panel system (Insta-Floor) developed by Douglas Fir Plywood Association — January 31
Roof system (Trofdek) develops space at low cost for Michel Marx's San Francisco residence — August 31
Roofing a prestressed concrete plant (Concrete Technology, Inc., Tacoma) — March 26
Simpson Timber Co.'s Research Center, a showplace of wood products — October 29
Sprinkler systems—why they're absent from one architect's buildings — July 24
Tilt-up method cuts stone facing costs on Albany (Ore.) Democrat Herald Building — September 29
Today's materials, techniques express early symbolism in structure and design of First Methodist Church, Glendale, Calif. — July 24

Other Articles

Practice of Architecture

Apartment houses as viewed by Victor Gruen — December 16
Better design in the '60s: clients are people too — January 41
Monstrosities, monuments and models—Rev. Dr. Theophilus Taylor — November 21
Paul Thiry—PA&B Profile — February 13

Job of the Month

Campus Heights (El Camino), Calif., College of San Mateo's new campus—John Carl Warnecke & Associates — July 6
Carmel, Calif., Peninsula Community Hospital—Edward D. Stone — September 16
Cheney, Eastern Washington State College Dormitory—Culler, Gale, Martell, Norrie & Davis — December 7
Portland, suburban office complex — Lewis Crutcher — January 13

Photo Editorial

Bank of New Mexico: counterfeit approach to design — December 26
Monorail: an exciting approach to Seattle World's Fair — September 17
New St. Augustine's: an injustice at Waikiki — November 26
Pan-American Freeway pedestrian bridge: a step in the right direction — July 22

Authors

Bergsma, Donald J.—AIED convention report — January 27
Bush-Brown, Albert—"The Image of the City" by Kevin Lynch — February 32
Freeman, D. W.—Industrial floor construction — December 27
Jones, S. O.—What you need to know about paint — May 25
Mumford, Lewis—Culture of the city — June 12
Taylor, Rev. Dr. Theophilus—Monstrosities, monuments and models — November 21

Conferences and Conventions

AIA annual convention, Philadelphia — June 12
AIA, California Council annual convention, Coronado — December 9
AIA, Northwest Region annual conference, Hawaii — November 9
AIA, Western Mountain Region annual conference, Reno — November 11
DFPA sponsors retirement housing conference, Tacoma — January 10
Western Conference on Prestressed Concrete Buildings, San Francisco — January 32

News

AASA annual architectural exhibit cites 11 West Coast school building plants — April 15
AIA, California Council, leads private architects in battle against state legislative measures — March 8
AIA, Southern California Chapter hears address by Bruce Goff — March 9
Advisory Council on Building Codes has three westerners — July 10
AIA, Spokane Chapter annual design competition — August 16
AIA, Colorado Chapter first Honor Awards program — October 11
AIA, Hawaii Chapter annual Honor Awards — March 10
AIA, national Honor Awards — April 8
AIA, Oregon Chapter annual Honor Awards program — April 13
AIA, Southwestern Oregon Chapter first Honor Awards program — February 8
AIA, Washington State Chapter annual Honor Awards — January 11
AIA, Western Mountain District Honor Awards — January 6
AISC competition honors five western buildings — August 14
Architectural examiners face suit in New Mexico — September 12
Building standards measure is defeated in California — September 13
Century 21—construction begins on Space Needle — May 8
Century City project (Calif.) to have star-studded cast — September 12
Church Architectural Guild awards to seven West Coast entries — June 14
Condominium seen as answer to San Francisco housing — October 12
Construction Bidding Practices Conference formed in Southern California — September 12
Eugene, City Hall design competition won by Stafford & Morin & Longwood — April 12
Honolulu—Queen Emma controversy continues — March 6
Honolulu Queen Emma Gardens decision reversed — May 8
Hurst, Samuel T. named dean of the School of Architecture, University of Southern California — August 12
Marin post office, Phoenix house keep Frank Lloyd Wright in the news — July 10
Pereira begins master planning of 93,000-acre Irvine Ranch — January 8
Red Rock Hill developer picks design by Cohen and Levorsen — December 11
Red Rock Hill (San Francisco Redevelopment Agency) narrows field to four — August 11
San Francisco Redevelopment Agency tries new business technique on Red Rock Hill competition — September 11
Santa Monica's reversal on Ocean Park bids creates storm — September 11
Seattle Civic Center Fountain international design competition—sculptural landscape wins for Japanese architects — April 11
Seattle Freeway—irate Seattleites have their inning — May 8
Sunset-AIA Western Homes Awards program honors 32 houses — October 12

Miscellaneous

AIED convention report—Donald J. Bergsma — January 27
Contemporary architecture by University of Illinois graduates — August 26
Culture of the city—Lewis Mumford — June 12
"Image of the City" by Kevin Lynch—a book review by Albert Bush-Brown — February 32
Seattle World's Fair progress report
No. 1 — October 16
No. 2 — November 14
No. 3 — December 14