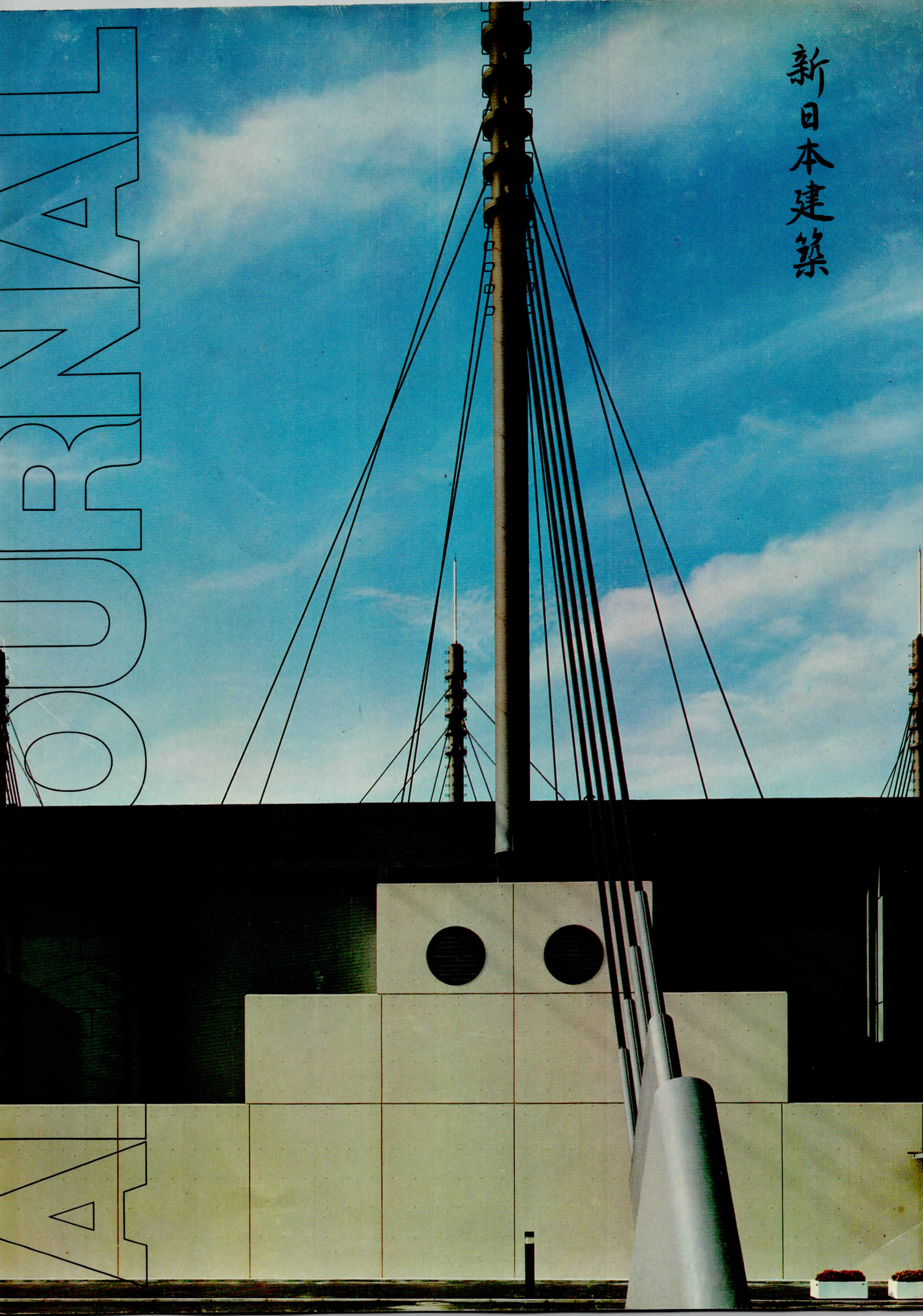


新日本建築

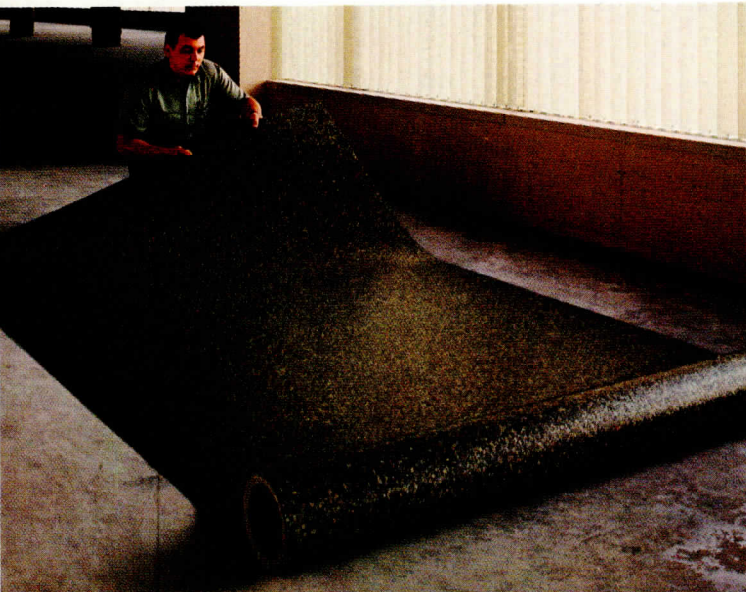
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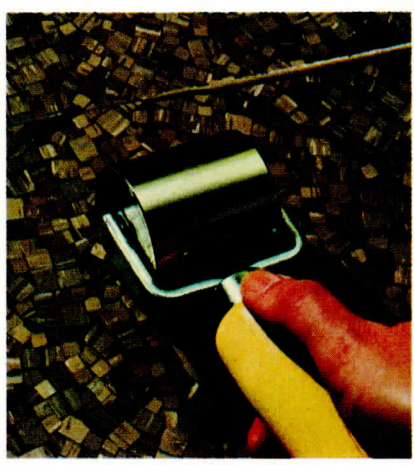
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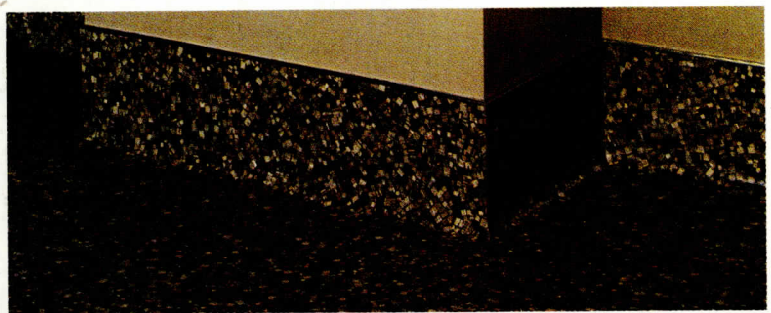


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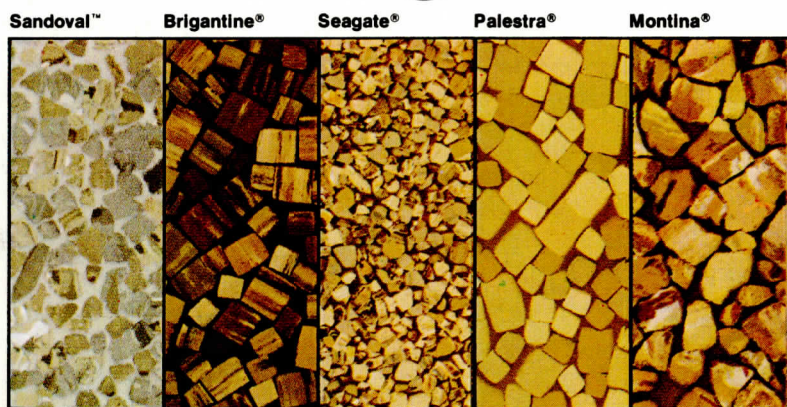
The pattern lasts and lasts.

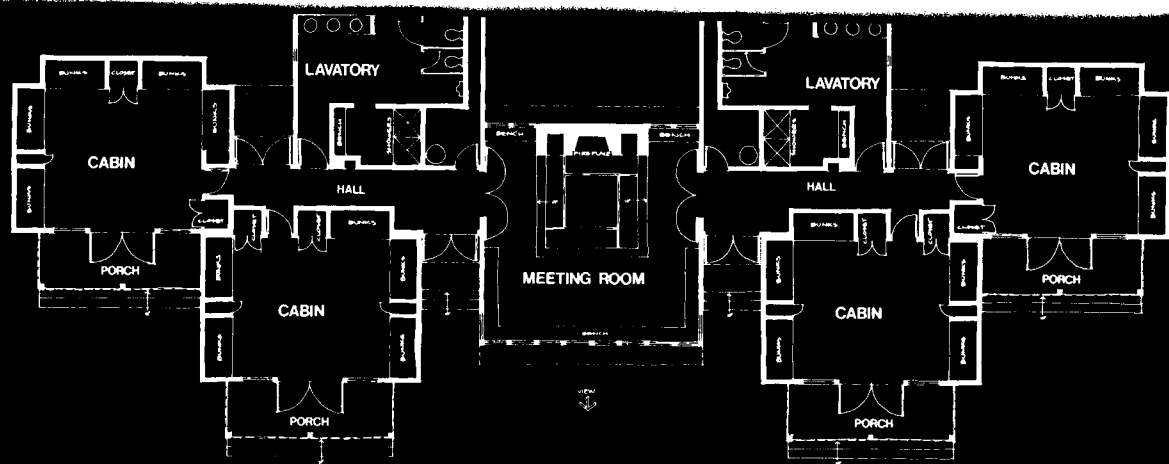
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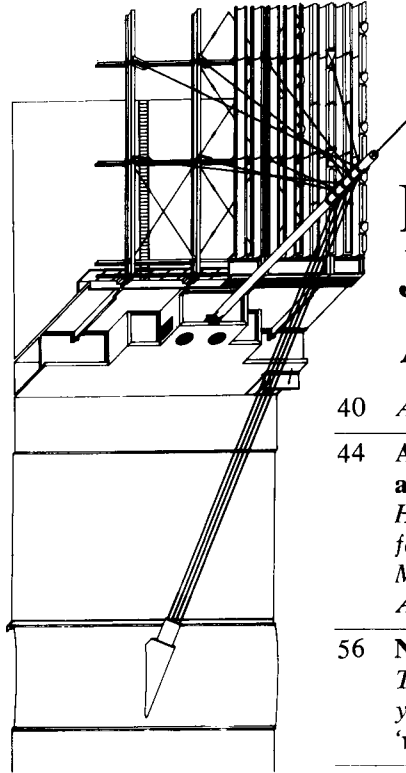
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Cover: Photograph by Masao Arai of Arata Isozaki's West Japan General Exhibition Center (see p. 44).

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E UNUM PLURIBUS.



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EVENTS

Dec. 1: Entries deadline, 1980 Professional Builder/American Plywood Association design awards program. Contact: APA, P.O. Box 11700, Tacoma, Wash. 98411.

Dec. 2-7: International Conference on Housing, Planning, Financing, Construction, Americana Hotel, Miami Beach. Contact: Jean Moffett, Florida International University, Tamiami Campus, Miami, Fla. 33199.

Dec. 2-8: International Building and Construction Exhibition, National Exhibition Centre, Birmingham, England. Contact: Interbuild, Suite 1002, 1625 Eye St. N.W., Washington, D.C. 20006.

Dec. 3: Postmark deadline for nomination forms, 1980 R. S. Reynolds memorial award for distinguished architecture using aluminum. Contact: Maria Murray, AIA Headquarters.

Dec. 3: Public meeting in Washington, D.C., on a proposed model document for code officials on solar heating and cooling of buildings. (Repeat meetings: Dec. 5, Denver; Dec. 7, San Diego.) Contact: Trinity University Continuing Education, 715 Stadium Drive, San Antonio, Tex. 78284.

Dec. 3-4: Seminar on Rehabilitation Construction and HUD Design Standards, Copley Plaza Hotel, Boston. (Repeat seminar: Dec. 13-14, Hotel del Coronado, San Diego.) Contact: National Housing Rehabilitation Association, Suite 310, 1300 19th St. N.W., Washington, D.C. 20036.

Dec. 3-4: Conference on the New Energy Legislation, Continental Plaza Hotel, Chicago. Contact: Energy Bureau, Inc., 41 E. 42nd St., New York, N.Y. 10017.

Dec. 3-4: Seminar on Energy Management in New and Existing Buildings, Denver. (Repeat seminars: Dec. 6-7, New Orleans; Dec. 10-11, Washington, D.C.; Jan. 22-23, Dallas; Jan. 24-25, Detroit; Jan. 28-29, Boston.) Contact: Association of Energy Engineers, 150 Broad Hollow Road, Melville, N.Y. 11746.

Dec. 3-4: Workshop on Cost Management, University of Wisconsin, Madison.

Dec. 6-7: Seminar on Structural Design of Plastics, Chicago. Contact: Continuing Education Office, University of Lowell, Lowell, Mass. 01854.

Dec. 7-9: Conference on Public Education Meets the Challenges of the '80s, Brooks Hall & Civic Auditorium, San Francisco, sponsored by the California Council/AIA and the Association of California School Administrators. Contact: Jacquie Howell, 1575 Old Bayshore Highway, Burlingame, Calif. 94010.

Dec. 10-11: Conference on Building Rehabilitation, San Francisco, sponsored by the National Bureau of Standards and the National Conference of States on Building

Codes and Standards. Contact: Sandra A. Berry, Building Economics and Regulatory Technology Division, Center for Building Technology, NBS, Washington, D.C. 20234.

Dec. 10-12: Design Engineering Conference/East, John B. Hynes Veterans Auditorium, Boston. Contact: Clapp & Poliak, Inc., 245 Park Ave., New York, N.Y. 10017.

Dec. 14: Registration deadline, Workshop on Human Factors in Transportation, Washington, D.C. Contact: J. K. Williams, Transportation Research Board, 2101 Constitution Ave., Washington, D.C. 20418.

Dec. 16-21: World Congress of Engineers and Architects, Tel Aviv, Israel. Contact: Israel Government Tourism Administration, North America, Congress and Conventions Department, 350 Fifth Ave., New York, N.Y. 10001.

Jan. 18-21, 1980: National Association of Home Builders annual convention and exposition, Las Vegas. Contact: NAHB, 15th and M Sts. N.W., Washington, D.C. 20005.

Feb. 7: Entries deadline, Reynolds aluminum prize for architectural students. Contact: Maria Murray, AIA Headquarters.

June 1-4: AIA annual convention, Cincinnati.

LETTERS

'Adaptive Abuse': As the administrator of the country's largest locally based historic preservation organization, I read the AIA JOURNAL with great interest. Your increasing emphasis on the retention of the old within the created environment endorses the thrust of Historic Denver, Inc.

In the August issue (p. 58), the article by Arthur Cotton Moore, FAIA, entitled "Adaptive Abuse" was especially impressive. He sounds warnings that I feel preservationists would be wise to heed. His articulate way of expressing himself, without lapsing into professional jargon, makes this an important article.

Barbara Sudler
Executive Administrator
Historic Denver, Inc.
Denver

I thoroughly enjoyed Arthur Cotton Moore's article. His observations on preservation were generally excellent and thought-provoking.

I take exception, however, to his myopic, registered-architect chauvinism. He directly implies (p. 62) that the quality of a preservation program is dependent on, and measurable by, the number of registered architects involved in it. The last time I confronted such self-laudatory elitism was in architectural school. It was a quality offensive then, as it is now. The Architect (capital "A" implied, of course)

as world savior and all-knowing seer is a concept born in self-delusion and professional prejudice.

Architects are important partners of other worthy professionals in the preservation process. They are not god-like visionaries in a world above the huddling masses. In Moore's opinion, apparently, these masses consist of "mostly historians," creatures somehow subhuman and whose viewpoint is irrelevant because they are not registered architects.

I believe in the virtues of good modern—or even postmodern (to use the latest cliché and nonword)—design in historic architectural areas. I believe that extremism in the defense of purist preservation is extremism. Yet I confess here before my mother and my countrymen that I am *not* a registered architect, even though I hold views with which Moore would probably agree. Accordingly, must I now be made an honorary registered architect? Or do I remain an apparent aberration in Moore's picture of professional preservation?

And what of those many truly registered architects wreaking visual havoc on our cities, both historical and nonhistorical, with their hack, wallpaper designs? Is there no place in Moore's tidy and complacent world view for them? Apparently not. Cloaked in the sacred mantle of Registered Architect, they have become infallible.

A small dose of reality, and a quick step off the professional pedestal, would have perfected Moore's otherwise superb article.

Jeff Dean
Madison, Wis.

Here in Baltimore we are upset by Arthur Cotton Moore's article. Moore may disagree with the position taken by one of Maryland's preservation officers, but in our view that affords little ground for attacking her "psychological state." The young lady in question is beautiful, charming and in perfect health, psychologically or otherwise.

As for Moore, we don't quite know what to make of this self-proclaimed preservation architect. He seems to specialize not in the preservation of buildings, but of facades. His scheme for the central retail district showed the demolition of

continued on page 80

Correction: In the September issue (p. 126), it was said that Kassel S. Slobdien, AIA, was a "winner" in a Nikon photo contest. This is incorrect. Nikon House in New York City has two galleries: The 62 winners of the contest had their photographs displayed in one gallery; in the adjoining gallery, there was an exhibit of 36 abstract color photographs by Slobdien. He is planning a retrospective show of his photographs (from 1960 to 1980) in White Plains, N.Y., for April 1980.

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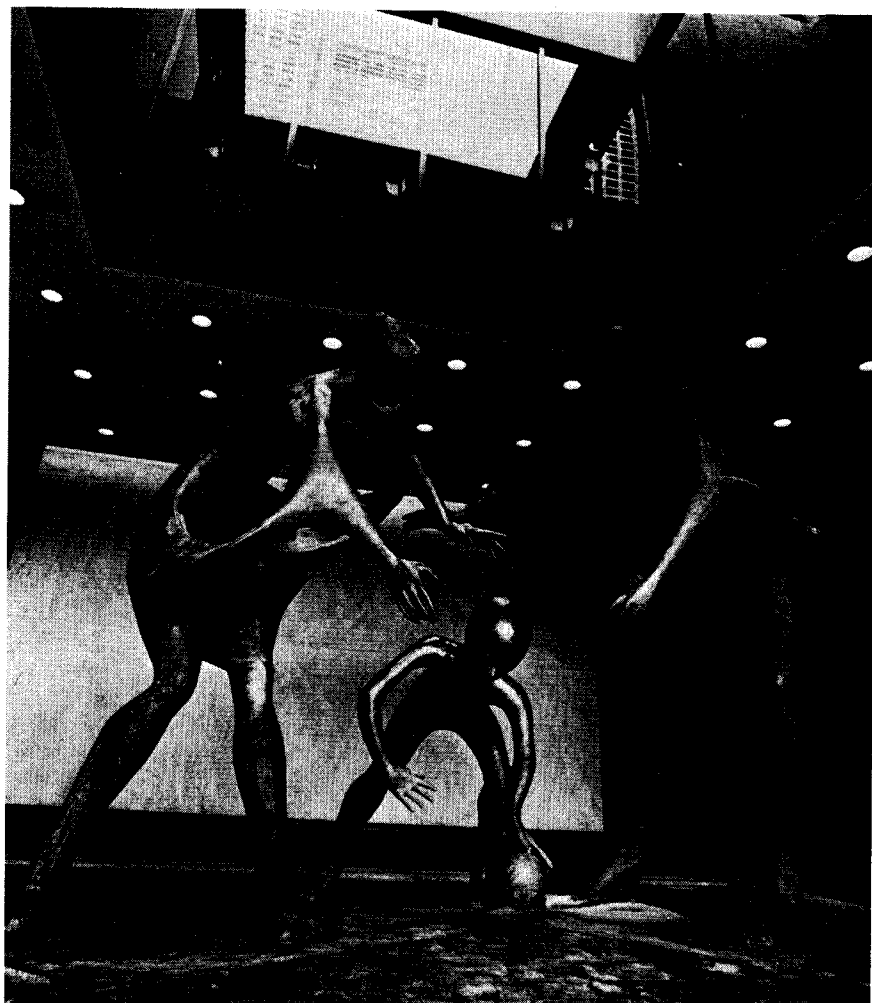
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Practice

Allergists Trace Health Hazards To the Environment of the Home

The modern concept of "kitchen-dining-family room" may promote togetherness, but it may also make you sick. This is the opinion of Robert Collier, a Colorado allergist, who spoke at a recent seminar sponsored by the Society of Clinical Ecology. "Sealing of the cooking area from the dining, living and sleeping areas makes good sense for patients whose symptoms can be intensified by odors or odorless outgassing from natural or chemical substances," he said.

The society was founded by a group of physicians who discovered that many of their patients had "elusive, often chronic symptoms that seemed to stem from the increased use of man-made materials—an increasingly chemical environment." The physicians have been joined by architects, engineers, designers, psychiatrists, biochemists, environmentalists, nutritionists and others whose work concerns the environment's relation to human beings. Papers given at the seminar bear out the findings reported by Dr. George Rand in the October issue of this magazine (see p. 38).

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Dr. Rand confined his remarks primarily to the hazards encountered in the modern office environment, but the clinical ecologists demonstrate that the home can be just as hazardous. For example, Theron G. Randolph, a Chicago allergist, believes that illness can occur in homes heated by natural gas, oil, coal and even wood. Even elements in most electric heating systems, which reach temperatures of more than 230 degrees, "fry dust." High heats also release toxic substances in paints, metals and building materials. And at "normal" temperatures, fumes can come from synthetic materials in carpets, wallboard, draperies and furniture.

You can't even go to the hospital to escape pollution, say the doctors. Patients and staff are bombarded by "internal contaminants," including toxic substances and gases which emanate from operating and emergency rooms and laboratories, as well as housekeeping and laundry supply odors from detergents, bleaches and disinfectants. The uses of synthetics in hospitals make them "disaster areas" for a high percentage of patients who have a high sensitivity to gases emitted from materials manufactured from hydrocarbons, said Dr. John H. Boyles Jr., an Ohio surgeon and specialist in environmental medicine. If patients must be hospitalized, he said, "we are subjecting them to exposures to hydrocarbon-based materials used in everything from surgical masks to sutures. Disposable gowns and 'easy-care' fabrics and surfaces have virtually replaced natural materials. How can we expect such exposures not to make our patients worse?"

Cardiovascular surgeon William J. Rea of Dallas reported on what can be done in an operating room. He is extremely sensitive to hydrocarbons and is only able to operate because the room is equipped with a tube that carries the

breath of an anesthetized patient to an outside venting system.

The society members pointed to hazards caused by the energy crisis, such as increasing dependence upon coal. But other equally threatening hazards include: indiscriminate use of certain types of insulation, particularly the liquid foam type pumped between walls to harden, and "overclosure" of buildings aimed at reducing energy losses but which also lower oxygen levels.

The conferees agreed that there is no simple answer to the problems of ecological medicine. But chemically sensitive people who want to improve their health must be willing to change their life styles, they said. "This can mean everything from deciding to give up smoking to a change of vocation and location." Those who cannot tolerate fumes from hot metals should consider moving South, for example. They also suggest that some people will simply have to do a complete remodeling job on their homes, substituting such "natural materials" as hardwood, stone and stainless steel for synthetics.

U.S. Architects Among Finalists To Design Australian Parliament

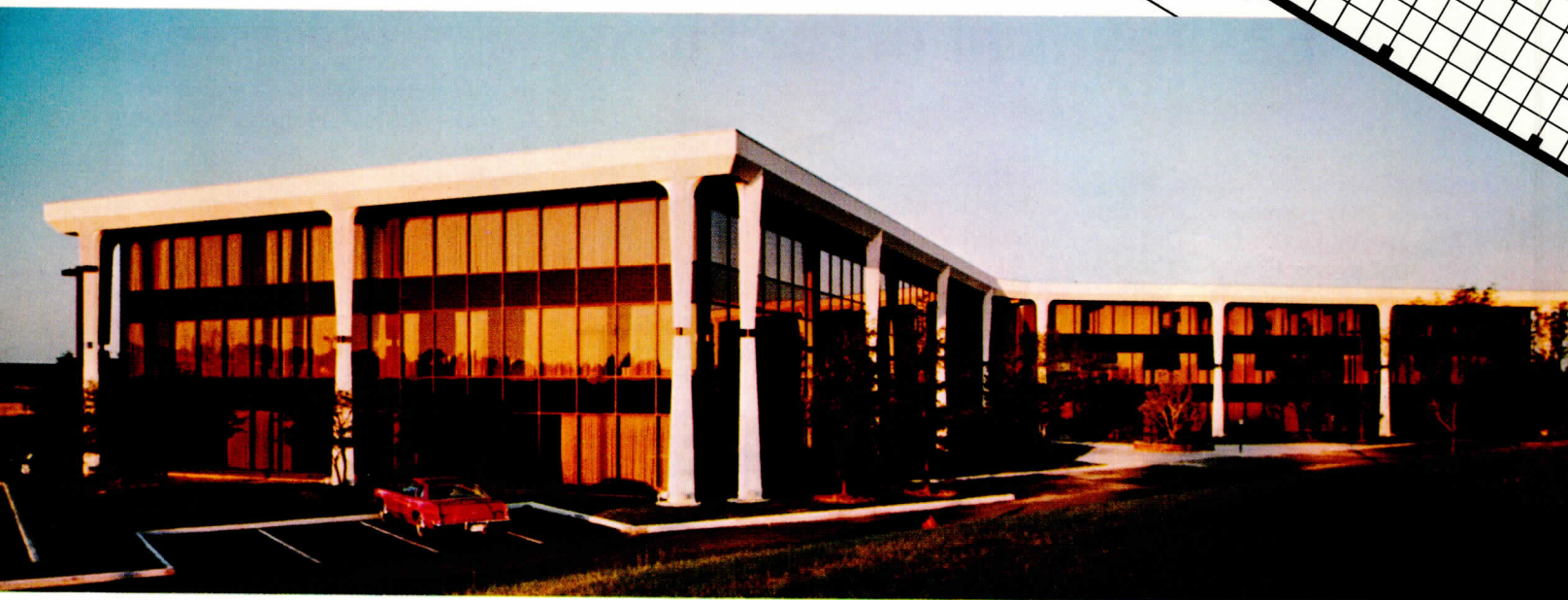
Teams of architects including Mitchell/Giurgola, Venturi & Rauch and Brown Daltas & Associates Inc. are among the 10 top prize winners in the two-stage competition for the design of Parliament House to be erected in Canberra, Australia. The competition was limited to architects who are registered to practice in Australia or who have an association with a registered architect in that country. Each of the 10 winners will be awarded \$A20,000. The Mitchell/Giurgola team, associated with Richard G. Thorp, an Australian resident in the U.S., is among the top five winners and will proceed to the second stage of the competition.

Each of the top five winners selected will receive an additional honorarium in the amount of \$A80,000. From among their number, a final architect will be chosen for the design of Parliament House, estimated to cost about \$A151 million. Designs of the prize winners will remain confidential until the conclusion

continued on page 14

Height restriction calls for unusual design approach

...steel helps provide most economical solution



How do you build a 136,558-sq-ft building on a 7.5-acre lot that's restricted by a three-story height limitation? The builders of this project, Bannockburn Executive Plaza, Bannockburn, Ill., solved the problem with a steel-framed, "Y"-shaped structure featuring 30-ft-sq bays.

"We considered most of the alphabet before settling on a basic 'Y' configuration," reports Harry Dolan, vice president for the developer, Terracom Development Group. "Ideally, a building with this much area requires about nine stories to insure optimum floor layout and depths. The challenge was to compress this height to only three stories, yet leave the site open with good sight lines."

Preliminary framing analysis (PFA) requested

Early in the final design stage, the project's structural engineer asked Bethlehem to prepare a PFA based on a 30 ft x 30 ft bay size. Earlier, the designers conducted a similar study on a concrete frame.

After the results of both studies were compared, the steel frame came away the winner. The structural engineer

reports, "Structural steel proved to be the best solution because of its economy, light weight, ease in spanning the 30-ft bays, and speed of erection." The frame was erected in about 10½ weeks at a cost of \$5.35 per sq ft. The unit weight of the steel frame was 7.5 lb per sq ft.

Construction economies were attributed to the ease by which the utilities and mechanical systems could be installed within the steel frame. Also, structural steel simplified the framing for the cantilevered balconies and the roof skylight in the center atrium.

Composite construction

ASTM A36 beams and girders are designed as simple beams. Lateral wind forces are resisted by beam-column moment connections utilizing Type 2 Construction per A.I.S.C. design specification. Single-piece, ASTM A572 Grade 50 high-strength columns were used throughout. The elimination of column splices contributed to fabrication and erection economies.

The floor system consists of 3-in. composite steel floor deck topped with 3¼-in. lightweight concrete. The floor system acts compositely with floor beams spaced 10 ft on centers. The

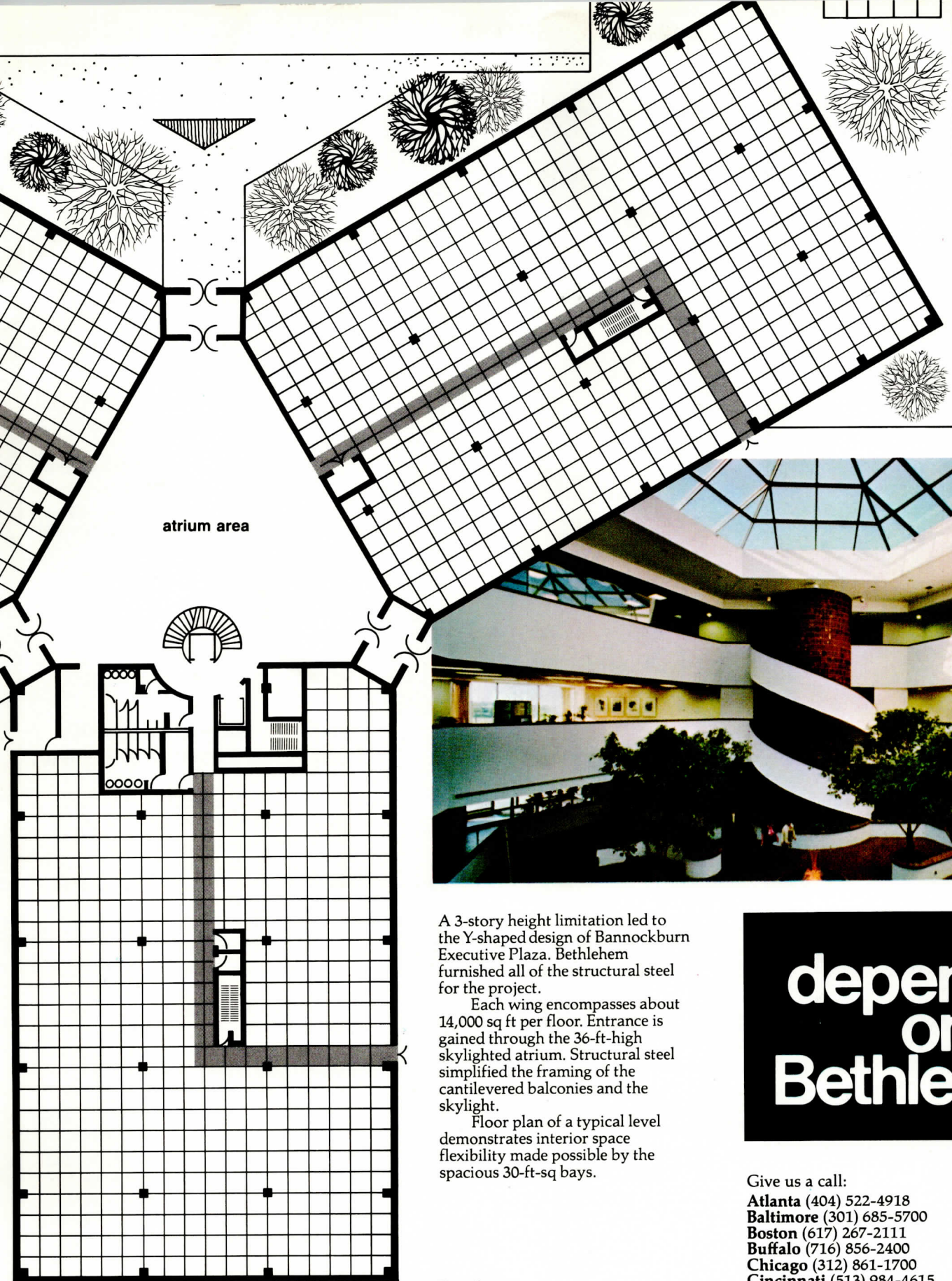
beams, in turn, are supported by composite floor girders.

Sales Engineering Services available

Bethlehem's frame analysis service team can be very helpful in determining the most economical steel frame for your building. Our PFA program is part of the broad range of technical and advisory services we offer.

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A 3-story height limitation led to the Y-shaped design of Bannockburn Executive Plaza. Bethlehem furnished all of the structural steel for the project.

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The climax of Pope John Paul II's recent visit to America came on Oct. 7 with the celebration of mass on the Mall in Washington, D.C. The event required the integration of a wide range of disciplines—liturgy, architecture, sculpture and landscaping.

The liturgical platform, fused by landscaping into the Mall, was placed approximately at the geometric center of the Mall, between the Capitol and the Washington Monument. Semicircular in shape, the platform was raised high to enable people to see it from a distance. It was blended into the ground by banks of chrysanthemums in the papal colors of white and yellow to give the appearance of a natural rise.

At the platform's rear was placed the reredos screen and canopy in front of which Pope John Paul presided over the celebration of the mass. The sculpture on the reredos, called "Family of Man," suggested the theme of the Pope's sermon on the family in modern life. The altar, four feet wide and ten feet long, was a solid slab of red oak, native to this part of the country. Also of red oak were the specially designed presiding chair, the ambo (pulpit) and candleholders. Vessels for the mass were of pewter, an alloy used in America's colonial days.

The architectural elements and furniture were designed by Robert Calhoun Smith, FAIA, of the Washington firm of Smith Segretti Tepper; sculpture of the reredos bas relief was by Miles Stafford Rolph; landscaping was by EDAW, Inc.

Practice from page 11

of the competition in August 1980.

The other four top winners are John Bickerdike (Bickerdike Allen Partners, London); John Denton (Denton Corker Marshall, Melbourne); Colin Frederick Madigan (Edwards Madigan Torzillo Briggs, North Sydney), and Christopher Harding Waite, Bowen Island, Von Igo, British Columbia.

I.M. Pei, FAIA, of New York City is a member of the jury for the competition. Others on the jury are Sir John Overall (chairman), Sydney; John Andrews, Sydney; Senator Gareth Evans, Victoria; Barry Simon, member of the Australian Parliament, and Leonard Stevens, Melbourne University.

The competition drew 961 registrations from 28 countries. "The five designs chosen to proceed to the second stage represent a wide diversity of architectural solutions, and we are confident that the eventual winner will be a building which is functionally efficient, properly sensitive to the Canberra landscape and excitingly symbolic of its status as Australia's foremost public building," said the chairman of the jury.

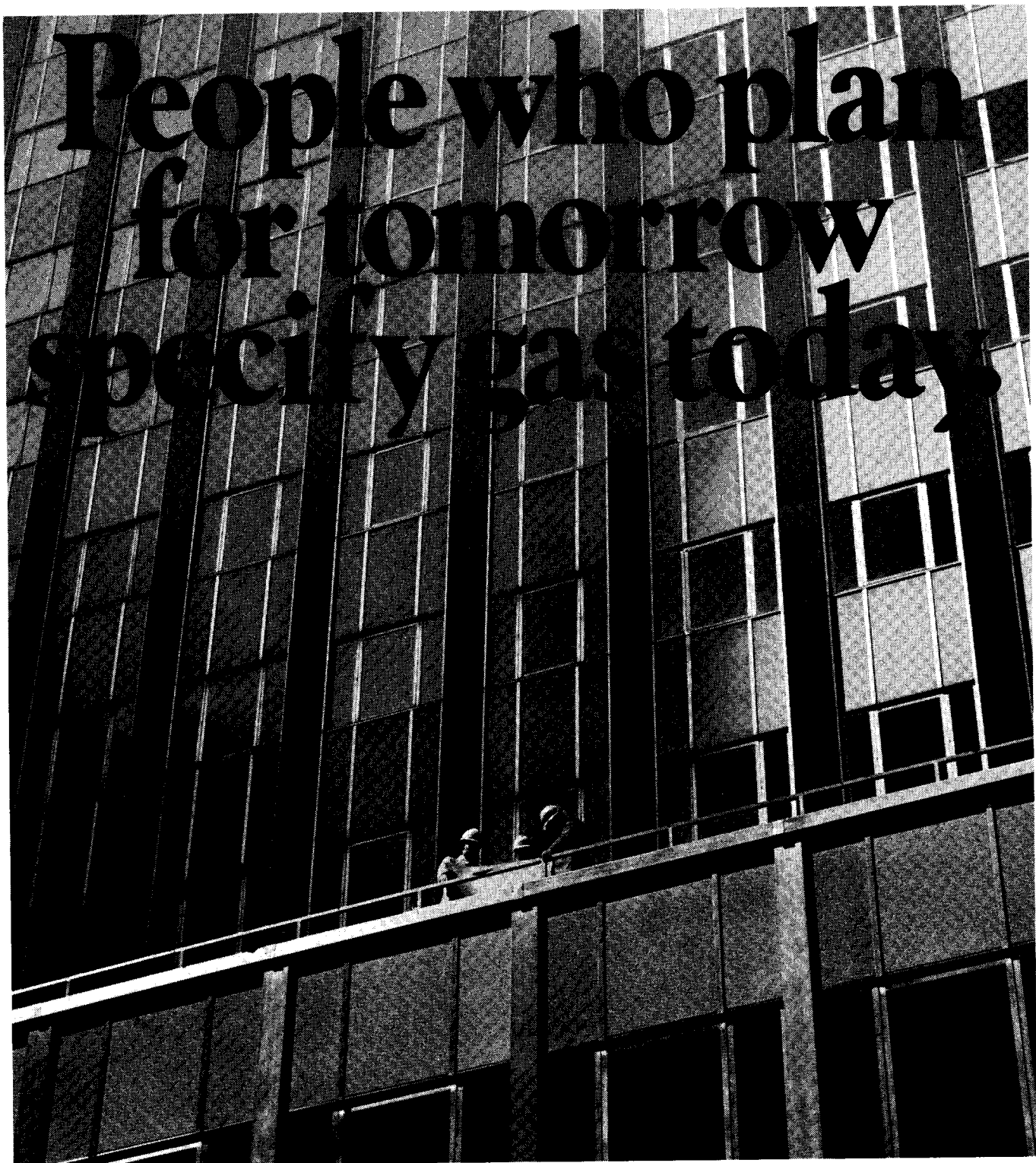
Architectural Salaries Charted In St. Louis Chapter/AIA Survey

The St. Louis Chapter/AIA and Small Enterprises Consultants (SEC) of Manchester, Mo., have issued tabulated findings of the chapter's annual architectural salary survey for 1979. A total of 34 firms responded to the survey, with 27 giving salary information which produced actual figures for 233 employees, says SEC.

The average salary ranges, by classification, are as follows, with the first figure the minimum range and the second the maximum: owner/architect (\$31,333; \$43,000); project architect (\$19,437; \$28,978); project designer (\$16,327; \$25,420); associate architect (\$15,160; \$22,322); job captain (\$16,850; \$22,273); designer (\$13,768; \$19,945); senior drafter (\$17,292; \$23,710); intermediate drafter (\$11,394; \$15,976); drafter (\$8,455; \$10,811); construction administrator (\$17,560; \$24,787); bookkeeper (\$9,874; \$16,481); secretary (\$8,155; \$11,218).


The survey results break down the average earnings in each category in firms from two to five people; six to 10 people; 11 to 20 people, and more than 20 people. In a contrast of the small firm of two to five employees with the large firm of more than 20, the survey shows that the average salary of the owner/architect in the small firm is \$28,054 (with extra compensation in the form of bonuses or profit sharing amounting to \$10,333). The salary average

continued on page 19



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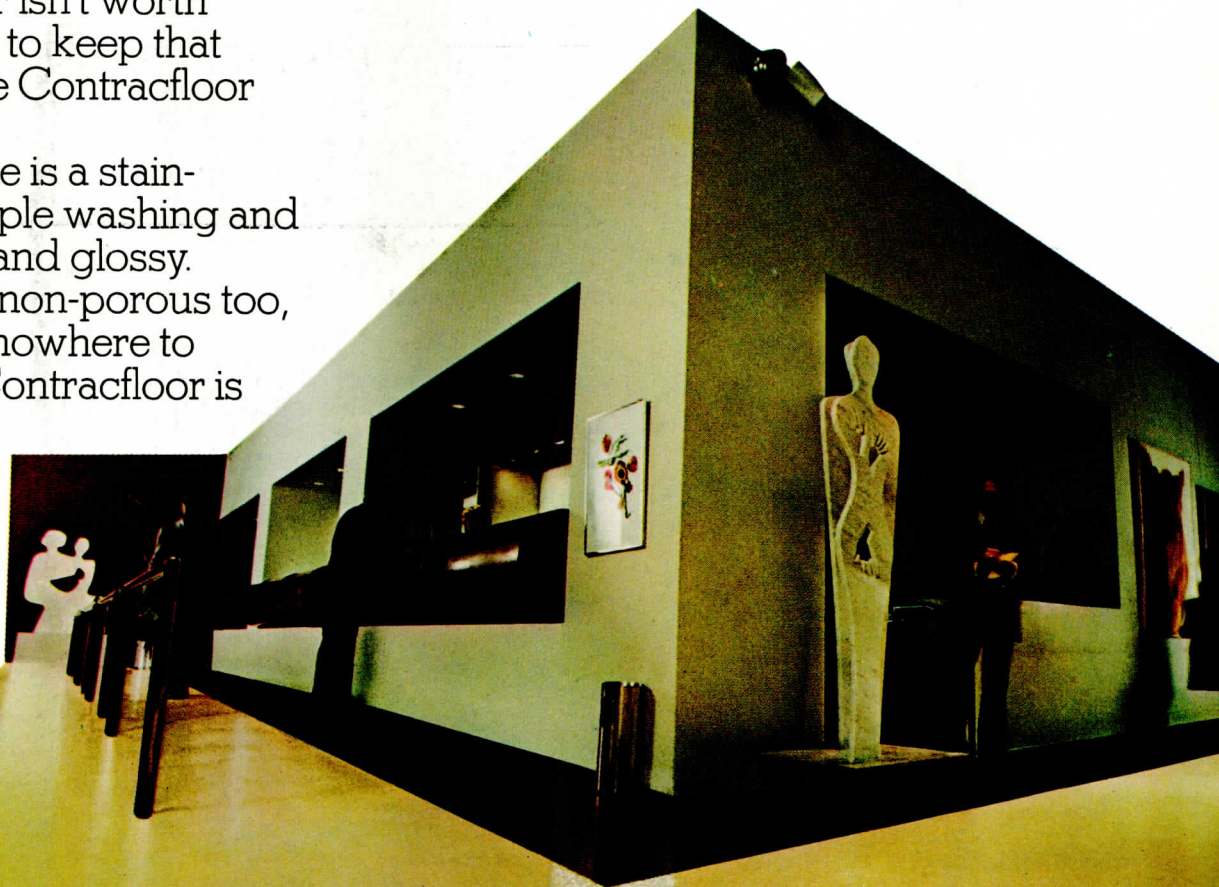
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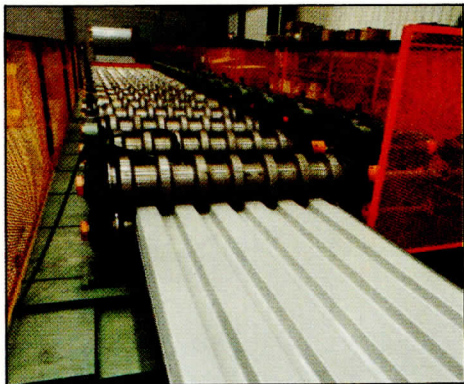


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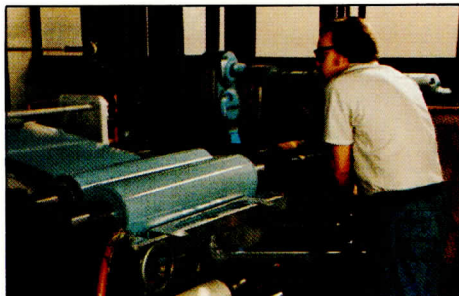
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Practice from page 14

of the large firm is \$52,800 for the owner/architect, with no extra compensation noted. The salaries of secretaries in the small and large firm are about equal, with the secretary in the small firm averaging \$9,367, with extra compensation of \$910, and the secretary in the large firm earning on the average \$9,717, with extra compensation of \$1,014.

The survey results also give a compensation comparison (current to previous year) for nine firms which responded to both the 1978 and 1979 surveys, representing a total of 74 employees in 1978 and 50 in 1979. The first figure given is for 1978, the second for 1979: project architect (\$24,623; \$27,663); project designer (\$21,387; \$21,363; designer (\$15,201; \$16,154); senior drafter (\$15,188; \$16,367); intermediate drafter (\$11,942; \$13,000); drafter (\$9,620; \$10,273); construction administrator (\$19,865; \$21,182); secretary (\$8,459; \$9,310).

Starting salaries for four-year architectural school graduates average \$10,599, for five-year graduates \$12,276.

Recent Guide Lists Data For Architectural Graduates

There are about 52,000 licensed architects in this country, including those who are retired and those who do not work as architects. Added to this number are many people who are not licensed but who work in architectural offices. There are about 36,000 students currently enrolled in U.S. schools of architecture, 19,000 of whom are enrolled in a professional degree curriculum. In 1976, 3,120 professional degrees were awarded, along with 2,275 persons receiving nonprofessional architectural degrees. Also in that year, 2,451 persons passed the various state licensing boards. These facts are given in the most recent edition of *Architecture Schools in North America*, edited by Roger Schluntz and Sarah V. Weaver (Princeton, N.J.: Peterson's Guides, 1979, \$8.95).

The book not only lists architectural programs offered by the 119 members of the Association of Collegiate Schools of Architecture, but also gives information on the mundane, but essential, aspects of the architectural profession. For example, on a nationwide basis, what can the graduate architect expect to earn in the marketplace?

The determination of the job market is a complicated matter, the publication says. Many graduates pursue other careers, and there is also the "cyclical nature of construction activity and the unpredictability of national and worldwide economics five to eight years hence."

Data to aid in making a prediction are not available.

Beginning salaries for architectural school graduates vary greatly, but a "starting range is typically \$7,000 to \$14,000 per year for a graduating class."

The book points to a survey made in 1976 of architects in Minnesota, which indicated that the average annual salary for the owners was about \$35,000 (see p. 14 for more recent data on salaries of St. Louis Chapter/AIA members). The average salary of the principal in the small firm of fewer than five employees was \$23,000; in firms of 20 or more, it was \$66,000.

The book points out that there are opportunities for holders of architectural degrees in the public sector. Sixty-six percent of architects at the federal level of GS-11, -12 and -13 earn about \$25,000 on the average. These architects work in 20 different agencies.

The advice given by the publication to those who choose to practice in an architectural office is to consider that the size and organization of the firm "will affect the nature of your job." Reference is made to a 1977 AIA survey in which it was revealed that 20 percent of the firms have one person, 56 percent have fewer than four and 82 percent have nine or fewer, 13 percent have 10 to 24 employees and only 1.1 percent have more than 75 persons. "But these large firms employ nearly 10 percent of all architects. . . . About 75 percent of all architects work in firms with fewer than 25 employees."

The publication also points to employment opportunities that exist outside architectural firms. For example, at least 3,000 people "are primarily occupied in teaching architecture—a sizable percentage of the profession."

Architectural Skyscraper Tour Tested for the Blind in Chicago

Parke Howard, public education director of the Chicago Lighthouse for the Blind, and Camille Myers, executive director of Horizons for the Blind, recently went through a test run of an architectural tour of Chicago's skyscrapers for the visually impaired. They used touch and sound to gain an appreciation of things neither of them can see. They felt the "rusticated granite of the Auditorium, the detail of terra cotta ornament on the Marquette and the cool smoothness of the steel and glass federal buildings and Civic Center," reports the Chicago Architecture Foundation, sponsor of the program.

Myers said that she could "hear the arches" of the Auditorium's pass-through, as well as the ringing of metal when Howard tapped his cane on the sculptures of Calder and Picasso.

The pilot was for a new architectural appreciation program whose final version, according to the foundation, will introduce the blind to the evolution of the Chicago skyscraper. In addition to actually feeling and hearing some of Chicago's architecture, the blind will feel small-scale models of buildings on the tour that have been prepared by architectural students at Triton College, and they will examine as well building materials, such as samples of marble and glass.

Howard said, "To learn about, and to actually feel the many building materials, to learn about and gain an insight into architectural design and to learn about the significant contributions of Chicago's architects in the developing of skyscraper structures—all served to make this a revelation to me."

These two blind people who cooperated in the test run "probably had the dirtiest fingers in town" at the tour's conclusion, the foundation reports. And Myers suggested that finger bowls at the end of future tours would be a "nice touch."

To schedule the tour, call the Chicago Architecture Foundation's ArchiCenter, (312) 782-1776.

Cassettes/Slides Feature Designers

Monica Pidgeon, recently editor of the *RIBA Journal* and, before that, of *Architectural Design*, has set up the Pidgeon Audio Visual in London for the publication of a continuing library of cassette/slides on architecture. Thus, she says, it is possible "to listen over and over again to the actual voices of leading architects discussing architecture and illustrating what they say with pictures of their own work, or that of other eminent designers."

In the first series of seven cassette/slide sets, for example, Alison and Peter Smithson who have been in architectural practice together since 1950 and are widely known for their buildings and writings, discuss "Signs of Occupancy." This refers, they say, to "how the language of architecture can indicate its use, and how it can invite the affection and the design activities of its occupiers and their successors."

They illustrate with examples of their own work, such as office buildings in London's West End and three small houses near Kensington Gardens.

Each recording comes on one audio cassette, accompanied by 24 color slides. The price for each of the seven cassette/slide sets is 35 pounds. Until Dec. 31, there is a special offer of the complete set of seven at the price of 225 pounds.

Send inquiries and orders to: World Microfilms Publications, Pidgeon Audio Visual, 62 Queen's Grove, London NW8 6ER, England.

News continued on page 22

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Circle 61 on information card

Environmentalists Fear Powers Of Federal Mobilization Board

The energy crisis has escalated the battle between environmental and energy interests. Environmentalists especially fear the super powers that Congress may bestow upon President Carter's proposed energy mobilization board, designed to cut red tape to speed the development of non-nuclear energy plants.

The Senate recently passed a bill authorizing this four-member board to shorten deadlines for federal, state and local agencies in such matters as zoning variances and air pollution permits. The board could not set aside substantive health and environmental regulations, but if an agency missed a deadline, the board could step in and make the decision for the agency. Environmentalists won one round when the Senate rejected a grandfather's clause which would have given the board power to waive any laws or regulations enacted after construction began on a priority project.

At this writing, two bills pertaining to

the board are pending in the House. The House commerce committee outlined broad powers, including the right to recommend that the President waive substantive and procedural federal, state and local laws that impede construction of an energy plant. Congress would have 60 days to veto the President's decision. The House interior committee took a more cautious approach and would allow the board only the power to speed up procedures.

Environmentalists oppose all such powers. "If what the energy mobilization board does is to put state and local agencies under so much pressure to act quickly that it is impossible to conduct reasonable analyses and negotiate that process out, it is not going to be just the environmental laws that are suspended. It's going to be that the quality of the whole declines," said Jonathan Lash of the National Resources Defense Council.

Opponents of the board ask if it is in

the nation's interest to give a small group the authority to alter federal, state and local laws. The proposed powers of the board are unparalleled in U.S. history, even in war time, environmentalists contend. David Broder, *Washington Post* reporter and syndicated columnist, denounced the energy mobilization board in a recent column: "Under the guise of speeding vital energy projects, the federal government is about to accomplish the most significant power grab in recent years. . . . The need to slice through the red tape is recognized by everyone. The question is how to do it without creating a new center of arbitrary power in Washington and destroying the responsibility the Constitution gives states and localities for the welfare of their own citizens." Opponents also question whether the true powers of the board have been sufficiently conveyed to the public. "I don't see much possibility of the EMB sinking in," Lash said, "unless you live in Billings, Mont., and there are six synfuel plants being built around you and the EMB suddenly cuts out your local and state agencies that you expected to protect you. Then you'll know all about the energy mobilization board and you'll have something to say about it." But then, say environmentalists, it will be too late.

continued on page 27

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Circle 64 on information card

A beautiful home for a cosmetics company. **ELEVATORS BY DOVER**

The new international headquarters building for Mary Kay Cosmetics, Inc. in Dallas presents an elegantly curved, gold-windowed face to its neighbors. All administrative and accounting activities of the company are housed in the 115,000-sq.-ft. facility. The eight-floor building is served by three Dover Traction Elevators, housed in an interior core. For more information on Dover Elevators, write Dover Corporation, Elevator Division, Dept. G, P.O. Box 2177, Memphis, Tennessee 38101.

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Energy from page 22

Proponents of the board—the Administration, congressmen and a coalition of business and labor—argue that it is time the nation took serious action to develop alternative energy sources without excessive delays. “The energy mobilization board offers the best hope in the short term for reducing our dependence upon OPEC oil,” said Senator Bennett Johnston. “The nation is now paralyzed by a bureaucracy that can delay vital energy projects for months and even years.”

Battle lines were drawn when President Carter announced his latest energy program. Environmentalists maintain that he designed the program with virtually no assessment of the environmental consequences.

The largest part of Carter's \$142.8 billion, 10-year plan calls for \$88 billion for synthetic development (see Sept., p. 16). “Essentially, it's the wrong thing and too much of it, too soon,” said Kevin Markey of Friends of the Earth. “He has walked on the environment both in terms of the commitments in massive synthetic fuels as well as his pushing the energy mobilization board.” The Senate has since cut the price tag for development of synthetics to \$20-30 billion and the House to \$50 billion.

Synthetic fuel development could severely affect the quality of air, water and land, environmentalists contend. The synthetic process involves liquefaction or gasification of coal. When this coal is processed, it emits pollutants, including carcinogenic materials. If enough is emitted, it could cause an increase in the earth's temperature. Strip mining can cause severe land damage. And the synthetic process uses vast amounts of water. These environmental problems could be avoided with technological development. But, as a recent Ford Foundation study, *Energy: The Next Twenty Years*, states: “The large-scale use of coal with present technology—even with significant environmental regulation of extraction, transport, burning and waste disposal—poses the prospect of increasing damage to man and the environment.”

In his last environmental message, Carter stated that the Administration remains dedicated to “clean air, clean water and the overall protection of the environment.” But environmentalists are skeptical in light of Carter's proposal for the energy mobilization board when he said: “We will protect the environment, but when this nation critically needs a refinery or a pipeline, we will build it.” Ruth Clausen, assistant secretary of energy for environmental affairs, was more specific: “Environmentalists are going to have to take a more moderate role if they want the gains of the '60s and '70s to last. They will have to understand that some of the

rules will have to be waived. There could be a considerable backlash if they are seen as being a barrier to more gasoline being available.”

Environmentalists see a glimpse of hope—that the idea of vigorous development of synthetic fuels will eventually be dropped as people realize that the environmental costs are high and that cheaper, safer and more effective alternatives such as conservation and solar energy and natural gas are available. They also hope to rally businessmen in opposition to the development of synthetic fuels because of the cost.

To fight off energy pressures as well as economic pressures, some environmentalists see their role changing in the early '80s. Instead of being the innovator of new policies to protect our air, land and water quality, they would become watchdogs to make sure that federal actions do not destroy the gains of the past decade. “The '80s are going to be a period,” says Grant Thompson of the Conservation Foundation, “when environmentalists are going to have to get much more sophisticated about economic trade offs, learn to present the cost benefit studies that really show the pluses of environmental quality in a more convincing way.”

If congressional actions of the past few months are any indication, a hard battle looms ahead. “The recent congressional decisions suggest to me that we are in a lot of danger,” said Lash. Recently Congress modified laws and changed regulations involving toxic substances, wilderness protection and timberlands. The Senate approved a bill that would make it easier for courts to overturn federal regulatory decisions and approved amendments to the strip mining law that allows states to disregard Interior Department rules. And Congress approved the Tellico Dam in Tennessee, which floods the habitat of an endangered species and thus overrules the endangered species act.

Recent Gallup and Harris polls show that the public is willing to pay for environmental quality. “I think Congress has simply misread the importance the public puts on the environment,” says the Conservation Foundation's Thompson. “Study after study shows that people are willing to pay for environmental quality. Yet, the Administration never talks about improving the environment, but about environmental constraints as if they were something to overcome.”

A recent study by the General Accounting Office reported that pollution control costs for 1970-77 were estimated at \$84.4 billion. Costs are expected to rise to \$360 billion between 1977 and 1986. The report also says air pollution results in deaths costing the nation about \$5 billion to \$16 billion per year and disease costing the nation \$36 billion annually.

Solar Demonstration Projects Shown in HUD/DOE Book

“People are beginning to think more about the climate in which they live, its influence on the amount of energy they need for heating in winter and cooling in summer, how their life styles as well as their houses influence energy use, and about what they can expect from solar energy in their location,” says the introduction to a new HUD publication titled *Solar Heating and Cooling Demonstration Program: A Descriptive Summary of HUD Cycle 4 and 4A Solar Residential Projects*. The book, brought out in cooperation with the Department of Energy, is a companion to another three, all prepared by the AIA Research Corporation.

Solar energy is rapidly emerging as a viable and cost-effective alternative to current energy resources, the publication says. “This is due not only to the growing cost of nonrenewable fossil fuels and the availability of solar equipment, but also to increasing consumer acceptance and confidence in solar heating and cooling.”

In order to help determine how to work with the sun, Congress in 1974 authorized a program which enabled builders and designers across the country to incorporate solar technology into residences and then to sell them on the open market. The \$8.5 million in grants provided for purchase and installation of equipment.

The book describes 141 solar demonstration projects in 41 states. The project summaries provide information on solar demonstrations in single-family houses, apartment complexes, schools and colleges and retrofitting of existing structures. For each project, there are data on such matters as location, climate, area of square footage, names of builder, designer and solar subcontractor. In addition to drawings and floor plans, there is a brief description of the structure and its energy concerns, as well as the solar system used. There are discussions of siting, placement of closets and windows, ventilation, insulation, solar collectors and storage.

The book is offered by the National Solar Heating and Cooling Information Center, Franklin Research Center, 20th and Parkway, Philadelphia, Pa. 19103. Other solar information may be requested from the center by calling toll-free: (800) 523-2929 in the continental U.S., (800) 462-4983 in Pennsylvania and (800) 523-4700, in Alaska and Hawaii.

Energy Homes Open to Public

Three energy efficient houses have been built in metropolitan Washington, D.C., Boston and Philadelphia to give the home buying public an opportunity to investi-

continued on page 30

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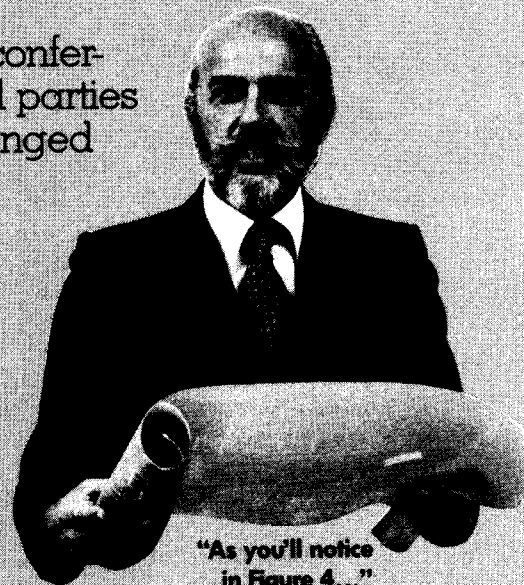
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Bell System

Energy from page 27

gate energy efficient design and construction and alternate energy systems. Each of the houses, built by Exxon Enterprises, offers numerous energy saving features, while making use of today's construction techniques and building materials.

The house in the Washington area, designed by Sverdrup & Parcel & Associates, Inc., of St. Louis, is located in Largo, Md. In the Boston area, the house designed by the Ehrenkrantz Group of New York City is located in Foxboro, Mass. The Ehrenkrantz Group also designed the house in the Philadelphia area, located in the Heritage Valley subdivision of Washington Township, N.J.

Architects, builders, bankers and the general public are invited to tour the houses. For additional information, contact: Solar Thermal Systems, Exxon Enterprises, Inc., P.O. Box 592, Florham Park, N.J. 07932.

ACSA Student Competition

A national competition for the more than 10,000 upper division students in profes-

sional schools of architecture has been announced by the Association of Collegiate Schools of Architecture, with support from the Brick Institute of America and the Department of Energy. Called "Design and Energy," the competition will emphasize energy-conscious design and the application of passive solar energy systems, using brick masonry materials. Student winners and their schools will receive cash awards totaling \$10,000.

According to ACSA, passive solar technology as a design consideration will be of particular concern in the competition's evaluation criteria. ACSA will provide participants "with a wide range of resource materials."

Members of the jury are Fred Dubin, an engineer; John Burgee, FAIA; George Hartman Jr., FAIA; Richard Stein, FAIA, and Paul Goldberger, *New York Times* architectural critic. Submissions will be received between January and April, 1980. The jury will meet on May 17.

For additional information, write: ACSA, 1735 New York Ave. N.W., Washington, D.C. 20006, or telephone (202) 785-2324.

highly effective method for responding to the community's concerns and for reaching appropriate design solutions."

Han Awal, Indonesia—"The government provides regulations, management and maintenance for community facilities, but the program is fully set up by community participation."

Adil Mustafa Ahmad, Sudan—"Community participation has stimulated the building activity in Gezira but has greatly impoverished its quality."

Lajos Jeney, Hungary—"The social requirements for social facilities are laid down in technical and economic regulations by the different ministries. These regulations are binding on the designer, the builder and the investor. . . . To formulate the real social requirements is extremely important for our country, for over the past 25 to 30 years, during the massive construction of basic and medium level facilities, it has had a severe consequence that some of these social facilities were not designed and built in full harmony with the actual social needs."

Geoffrey Hamlyn, England—"The concept of combining education and leisure in the same building has been developed in Britain in the '60s and '70s. At the Sutton Centre (an education/recreational, social facility for use by citizens of all ages), direct contact was made by the design team with individuals and organizations in Sutton, asking them what they in fact wanted."

Eugeny Yourguenson, Soviet Union—"For the city population (as well as for the country one), there are town planning standards determining the territory to be allocated to sports structures, the number of sports halls, the number of swimming pools and the number of play fields to be created in residential areas per thousand inhabitants."

Koji Kamiya, Japan—"In Japan, urban areas are densely built up, and municipal plans to build undesirable public facilities such as an incinerator plant, are subject to opposition of neighborhood citizens. . . . In many cases, an agreement reached after long and patient negotiation between city and community organizations provides that while the city builds the proposed facility, it should also provide sports and social welfare facilities in an adjacent site. For the past 10 years this has become a very popular solution in various parts of the country."

Iowan Wins Craftsman Award

Svend Paulsen, a Des Moines, Iowa, tradesman/artist, is the recipient of the craftsman of the year award, given by AIA and the Building and Construction Trades Department, AFL-CIO. He is honored for his restoration of the ceiling

continued on page 35

The Institute

Community Involvement Stressed By UIA in Washington Seminar

The community should be involved in the first stages of the planning process for educational, sports and leisure facilities in an attempt to bring man back to the center of development, concluded the participants at a recent International Union of Architects (UIA) seminar in Washington, D.C.

The intent of the conference of the UIA working groups on educational spaces and sports and leisure (cosponsored by AIA and Unesco) was to explore the nature of the relationship between the architect and the community, identify important social, economic and environmental currents that today are shaping the architecture of both industrialized and developing nations and to provide an opportunity to learn about and evaluate how architects throughout the world are providing for the changing educational, cultural, recreational and other needs of the community.

"The principal aim of providing comprehensive social facilities is not merely to realize certain economies through multiple use of facilities, but rather to further the intellectual, physical and spiritual growth of individuals within a satisfactory social context," said Unesco's John Beyon of France. "In short, when a community shapes its unique social facilities around

its own cultural, political and ideological characteristics, it is taking a step toward placing man at the center of development." Beyon continued: "A good deal more time needs to be spent in communication with the users—and here I do not necessarily mean the client—than has been the case in the past. Architects must be prepared to encourage communities to participate in the design process as well as in programming. Architects must also become engaged in the problems of building use. Their works need to be frequently evaluated and refitted to meet the changing needs of the communities they serve."

During the seminar, position papers were read which reflect the diversity of the more than 100 participating architects. A sampling follows:

Aase Eriksen, U.S.A.—"Although much has been written about the importance of involving users in the design process, attempts to do this are usually superficial. . . . Our work over the last 10 years clearly demonstrates that children and adolescents can make valuable contributions to the design process. When they are allowed to be involved, school environments are produced which meet their special needs. . . . Direct community participation by adults and children is a

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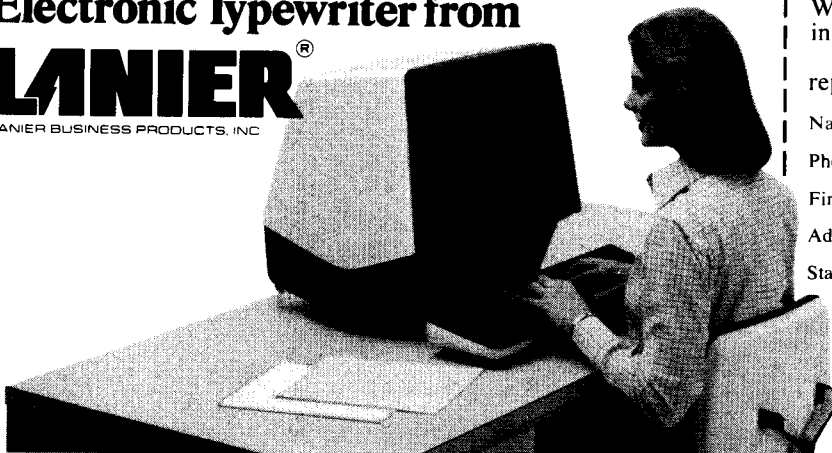
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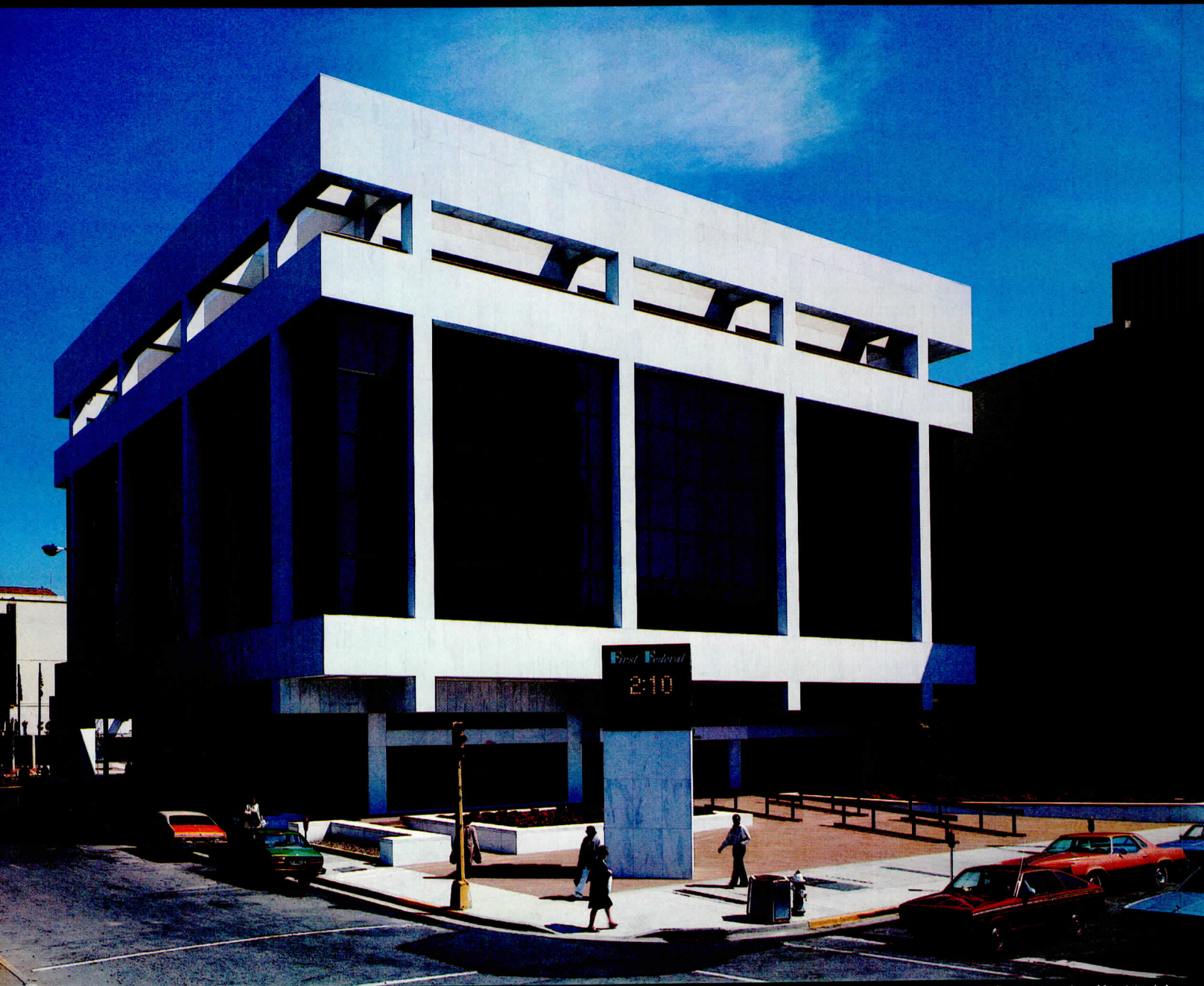
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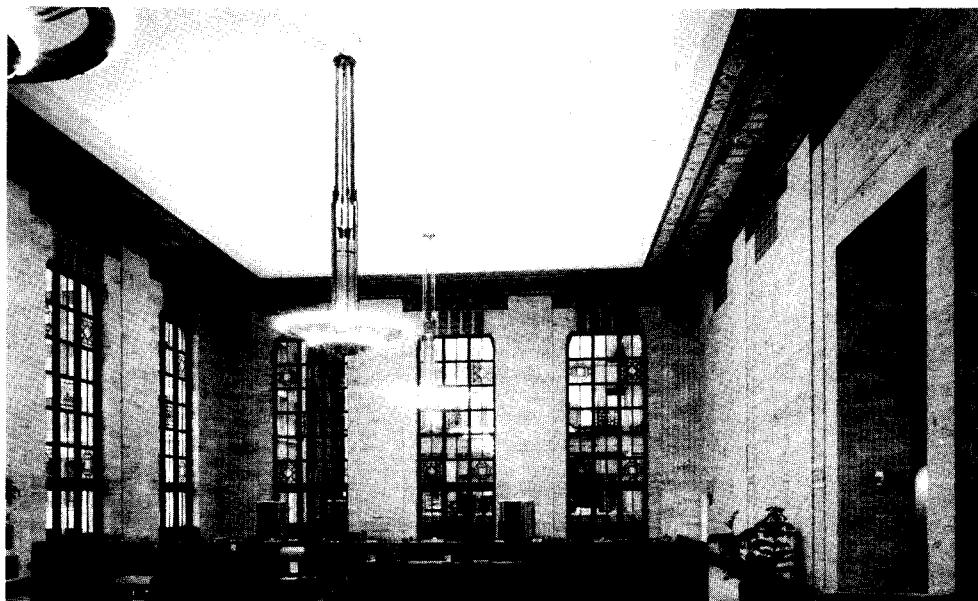
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The Institute from page 30 of the 48-year-old Valley National Bank building in Des Moines (photo above). Architect for the restoration was Charles Herbert & Associates, Des Moines.

The award is given annually in recognition of "outstanding workmanship and ingenuity displayed by tradesmen." The winner is selected from candidates nominated by AIA components and local trade unions.

The jury cited Paulsen for demonstrating "great skill in his ability to see and mix color in the application and composition of the ceiling restoration in the main banking space."

In addition to Paulsen, three tradesmen of Columbus, Ohio, were named recipients of awards of merit. They are George Martina, Victor Fabro Jr. and Clanton Edwards. They were cited for their terrazzo work in the restoration of the sanctuary of St. Joseph Cathedral in Columbus. Architects were Gilbert Coddington, FAIA, and John P. Gibboney, AIA, both of Columbus.

Serving on the jury were William Marshall Jr., FAIA (chairman); William R. Jarratt, FAIA, and Roy E. Johnson, president of the United Union of Roofers, Water Proofers and Allied Workers.

Six New SupEdGuides Released

AIA's continuing education department has published six new SupEdGuides, supplementary educational materials for interns in the practice of architecture. The new guides are: Program (D2); Site (D3); Negotiating the Owner-Architect Agreement (E1); Client Relations During Design (E2); Information Requirements in Design (E6), and Design Documentation (E7).

Two other guides (Organizing for Getting Business (C1) and Marketing Methods (C2) are scheduled to be released later this year. The final guide in the cur-

rent series of 30 (Architects' Roles, A1) is scheduled for publication early next year.

The continuing education committee requests that it be sent suggestions for new SupEdGuides to be developed in 1980. Send recommendations, as well as requests for additional information about the current SupEdGuides, to Robert Rosenfeld at AIA headquarters, (202) 785-7353.

House Urged to Implement Solar, Conservation Programs

Calling for "vigorous pursuit" of two parts of the National Energy Policy and Conservation Act, David O. Meeker Jr., FAIA, executive vice president of the Institute, told a House subcommittee that both the federal buildings solar demonstration and the federal conservation programs (covered in the two parts) are "long overdue." In his testimony on behalf of AIA, Meeker urged the House "to get these programs implemented."

Concerning Part 2, Title V, of the act on solar demonstrations in federal buildings, Meeker said that the rule should encourage passive solar applications and solar cooling. "It has been the experience of many designers," he said, "that passive solar design, often in conjunction with active solar systems, results in the most effective application of solar energy principles."

Meeker pointed to the fact that the Department of Energy and HUD have emphasized passive applications in private sector demonstration programs (see p. 27), and said that the federal buildings program should "do likewise," at the same time avoiding "redundancy or conflict" with the DOE/HUD demonstrations.

Meeker said that demonstration projects "should be selected more on the basis of life cycle costs than on payback,"

adding that because no final rule on life cycle costing has been promulgated, "new federal buildings are unable to achieve their full potential for energy conservation and solar energy." Nor have proposed rules been published on how to conduct energy audits, he said, nor how to select buildings and measure for retrofitting.

He said that energy audits can be used for two purposes: to provide data "for the development of building energy targets for federal buildings, as mandated by Part 3 of Title V," and to speed the retrofit of federal buildings and assist in setting building energy performance targets. The energy audit material, he said, "could serve as a vital check" on the hypothetical studies that have been made.

The solar demonstration rule, Meeker said, should not provide for allowable design costs to be based on a fixed percentage of construction costs. "Federal agencies have their own established regulations and practices on the cost of design services. GSA and other agencies generally use a form of cost-based compensation," he said, which is "particularly important for a demonstration program whose purpose is to take advantage of innovations." Such a program, he said, has the basic idea that "knowledge, ingenuity and creativity should be applied to change the buildings so that they make productive use of solar energy." A ceiling limit on fees for design, he said, would arbitrarily limit the ability "to apply these renewable, expandable human resources." He pointed out that both HUD and DOE "have recognized the importance of design by allocating up to half of total demonstration grant awards for design."

Meeker also said that any final regulations should be "absolutely clear that for some services involved in preparing and implementing proposals, professional architects and engineers are required."

In his testimony, Meeker said that DOE's proposed regulations on life cycle costing projected fuel prices at too low a figure. "The regulations project a 1990 world crude oil price of \$23.50 per barrel in constant 1980 dollars. The reality is that this price will be reached 10 years earlier in 1980. Such an unrealistically low price scenario prejudices the life cycle cost analysis against investments which save energy over a long period of time by making them appear less cost effective."

Meeker also emphasized that recent studies such as *Energy Future: Report of the Energy Project at the Harvard Business School* (see Sept., p. 13) have found that "vigorous energy conservation in buildings is more cost effective than development of new energy supplies, has more positive environmental impacts, more beneficial economic impacts and is more likely to succeed."

AIA Opposes Competitions In Federal A/E Procurement

The Architectural Excellence Act of 1979 (S461), which would require A/E competitions for public buildings of \$25 million or more, has been opposed by AIA. In testimony before a Senate subcommittee, George E. Kassabaum, FAIA, partner in the St. Louis firm of Hellmuth, Obata & Kassabaum Inc. and former president of the Institute, said that "design competitions overemphasize the cosmetics of design rather than the full range of services required of a team of architects and engineers." The proposed legislation, he said, is "clearly not immune to the 'beauty contest' syndrome."

The proposed amendment to the Public Buildings Act of 1959 would require at least one-half of 1 percent of the projects' cost to finance a design competition.

Kassabaum said that while competitions may have their place for monuments and single-function buildings, they are not appropriate in most government buildings "where there are complex factors to be weighed." He also said that the "best buildings can only result from the involvement of the client in the exchange of ideas between the user and the architect and review boards, which is the true design process." Further, he said, with rapidly rising construction costs, time has come to mean money, and additional time is required in a competition's "cumbersome process." He said that "too often what occurs is not so much competition but an extended design exploration with extremely high costs to those participating—high costs to both the government . . . and to architects and engineers." Because of the complexities in design competitions, cost overruns and uneven results are present, he said.

The language of the proposed legislation, Kassabaum said, "presents the likelihood of turning every large project into a formal design competition, a very expensive and time-consuming process. . . ." The potential abuse of design selection through competition, he continued, is prevented by the current selection process as set forth in the Architect-Engineer Selection Act (PL92-532), passed in 1972. This procedure, known widely as the Brooks bill approach, calls for negotiation of a contract for services to be made on the basis of competence and qualifications. AIA also supports, he said, GSA's level three procedure in the selection process. The level three process, he said, is a method of selecting an A/E firm for a

unique project on actual demonstration of design competence by recommended firms.

Kassabaum also pointed to AIA's concern about the role of the government in-house design staff. He said that AIA is "firmly committed to the employment of design-oriented registered architects in responsible positions within the federal government." These professionals, however, should be used "in areas where their services are currently most needed: project administration." This would create, he said, a collaborative relationship between the private architect and the project administrator, ensuring an efficient and cost effective design process.

In this manner, Kassabaum said, the federally employed professional would "ideally serve as the client, monitoring both the design and the inherent constraints in the entire design process including budget limitations, space needs and time schedules." Congress has within its powers the assurance of high design standards and the maintenance of quality in government projects, he said. "This will do far more to encourage quality in the built environment than would the passage of a single, prescriptive act intended to ensure 'architectural excellence.'"

State A/E Selection Actions

Last February, the American Bar Association approved a model procurement code for state and local governments to use in the selection of A/Es for public design work. Based on the so-called Brooks bill approach used in federal procurement, the code recommends that selection be made on the basis of competence and qualifications (see Feb., p. 22). Despite the milestone status that some observers give to the approval of the ABA code, debate has continued throughout the year between professionals and state and local government officials on whether state and local contracts should go to the most qualified firm or whether price bidding should be a factor in selection.

During 1979, three states passed legislation regarding selection procedures, bringing the total number of states with such statutes to 16. And although no state has followed Maryland in its enactment of a competitive bidding law in 1974, the matter of competitive bidding has arisen in several states.

Among the activities on the A/E pro-

curement front in 1979 are the following:

- Colorado was one of the three states to pass A/E selection legislation. As in the Brooks bill approach, the law calls for public announcements, review of qualifications by the procuring agency and ranking of a number of eligible firms on the basis of competence and ability and fee negotiations with the most qualified firm. An amendment to the bill gives Colorado firms preference "when qualifications appear to be equal."

- Connecticut also passed legislation which establishes a design professional selection board to choose consultants on the basis of qualification, with public announcement by the state of intent to award a contract. The bill modified legislation desired by Connecticut architects. Rather than ranking the final three or four firms, the legislation calls for submission of a list to the commissioner of administration, who will then negotiate a contract with the firm considered most qualified. Also, design professionals are excluded from participation on the selection panel. The Connecticut Society of Architects/AIA is optimistic in that the legislation at least establishes a procedure where none existed before. The Connecticut AIA will probably work for future amendments to the legislation.

- Maine legislators approved a "policy" statement for the state selection of A/Es, with procedures to be established by the bureau of public improvements. According to the Maine legislation, "procedures shall be based upon evaluation of the professional qualifications deemed necessary for satisfactory performance." The legislation applies to state projects and does not cover municipal ones.

- Massachusetts, in a dramatic departure from past A/E selection procedures, has revised the designer selection board law by administrative rule to require firms to submit sealed fee proposals. A public notice, dated Aug. 7, states that three or more finalists recommended by the designer selection board "will be requested to submit . . . a sealed fee proposal based upon a percentage of the estimated construction costs." The ruling adds that "fees are only one of the factors to be considered in the final selection process."

- Florida state legislators amended the state budget for 1980, attaching a "rider" which calls for competitive bidding for consultant services. The rider has been used by the state department of transportation in the development of a rule that would require A/Es to submit price proposals for transportation work. The department "would be prohibited from expending budgeted consultant funds" unless there was compliance with the consideration of "price for services" in the

continued on page 82

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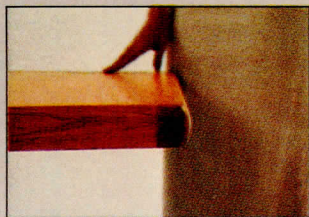


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This issue is a kind of sibling of our annual review of new American architecture. It occurred to us during the preparation of the last annual that the JOURNAL'S readers might welcome an attempt to put architecture of other nations in similar perspective.

Hence this issue on "new Japanese architecture," the first of what will be a continuing series of compilations of new work in other nations (published at no particular frequency). Editor in charge of the Japanese coverage was Nory Miller, who recently traveled to Japan as a Graham Foundation fellow. Her co-editor was Heather Willson Cass, AIA, a Washington architect who spent a year in Japan as a Luce scholar.
D.C.



For the past two decades, it was said: If you want to see American technology, go to Japan. Nowhere was this more evident than in architecture, ever since leading Japanese designers convened the International Conference on Architecture in 1960, a kind of Tokyo CIAM, and introduced Metabolism. Those plug-in megacities actually had far less influence on Japan's landscape than Europe's CIAM had on America's, though a few small examples were built. Its mainstays were the periodic expositions that served as excuses for showcases of a future that would never come. By Expo '75, the only remnant of that philosophy was Aquapolis, a last gasp by Metabolism's earliest and still staunchest believer, Kiyonori Kikutake.

Meanwhile, a new generation had grown up with different attitudes toward technology, progress and the West. Serious architects began to be more interested in smaller buildings than urban planning. Esthetics took the foreground in discussions. And revisionist attitudes toward their own history became common. Bruno Taut had come to Japan in the 1930s and praised Katsura Detached Palace for its functionalism. Twenty years later, Walter Gropius arrived, calling Japan's traditional tatami mat houses the first totally flexible, modular system. The attitudes of these Westerners and others who agreed with them had had a

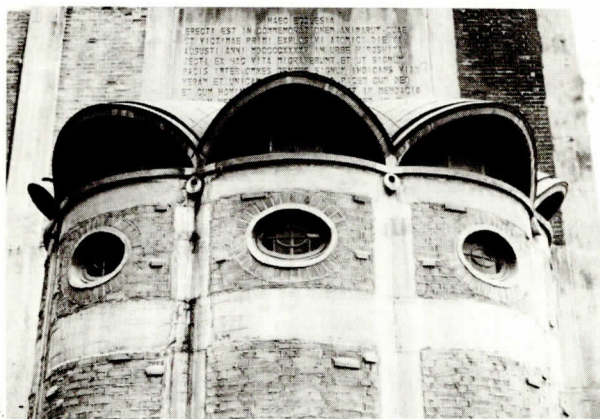
profound effect in Japan. Previously, Westerners had praised the more elaborate shrines.

But younger architects found it difficult to reconcile Taut's "functionalism" with a housing type that was too cold in winter and too hot in summer, or Gropius' "flexible system" with tatami arrangements that were dictated strictly, and without variation, by meaning. They began to see other qualities in their traditional architecture: symbolism, rhetoric, perceptual subtleties, formal ambiguities. They also began to re-evaluate the relative interest and prestige of the architects of preceding generations. Kenzo Tange had been the reigning figure. Before him were Kunio Mayekawa and Junzo Sakakura, who had worked with Le Corbusier himself and brought modern architecture to Japan. Today, there is also much interest in the divergent figures: the philosophical Seiichi Shirai, the mannerist Hiroshi Ooe, and the expressionist Togo Murano.

It is much like the re-evaluations of Gunnar Asplund, John Soane or Edwin Lutyens. In fact, in many ways, this seems to parallel much of what is going on in the centers of Western architecture as the dreams of indefinitely expanding prosperity have collided with finite resources. There is a sense of what architects can actually accomplish in terms of scale, the idea that they can't solve social problems and a reassertion of regionalism. The new appreciation of heritage and folk art began to surface in Japan in the 1950s (consider Tange's borrowing from Ise in his National Gymnasium) but, as in the West, it has become more conscious, legitimate and insistent.

What is unique to Japan is the context of modernism as a foreign import. Since the Meiji restoration in 1868, Japan has been sending envoys to research how the West did things, a pattern which escalated after World War II and goes on today. Japan's *A+U* magazine is entirely devoted to American and European architecture, with an 80 percent readership inside Japan. Likewise *Japan Architect*, an English language version of their biggest architectural magazine, is distributed, without the advertisements, abroad. Historically, Japan has reached out and pulled back, in turns, from foreign influence—first the Chinese and Koreans, later Europe and America. If the present period is a period of withdrawal, it is one still hungrily absorbing the work of Peter Eisenman, Richard Meier, Charles Moore, Aldo Rossi and many others. But this has begun to be connected to a parallel research into the roots of Japanese sensibilities.

This includes not only the younger generation but also the most active of the original Metabolist group as well, Fumihiko Maki and Kisho Kurokawa. Maki, whose Metabolist leanings



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1. Kenzo Tange, National Gymnasium, Tokyo. 2. Murano & Mori, World Peace Memorial Cathedral, Hiroshima. 3. Seiichi Shirai (with Takenaka Komuten Co., Ltd.), NOA Building, Tokyo. 4. Hiroshi Ooe, Kagawa Cultural Center, Takamatsu.



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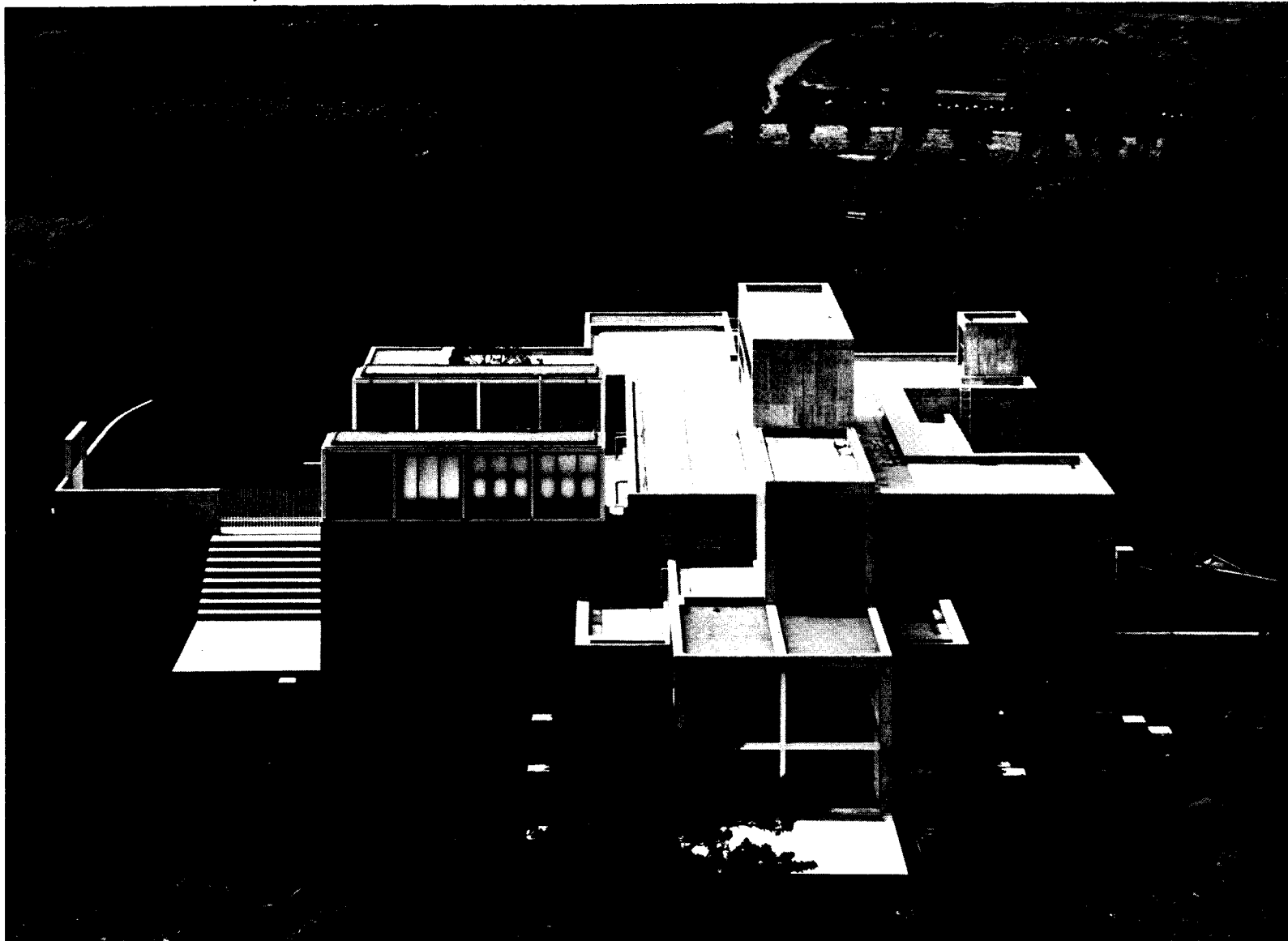
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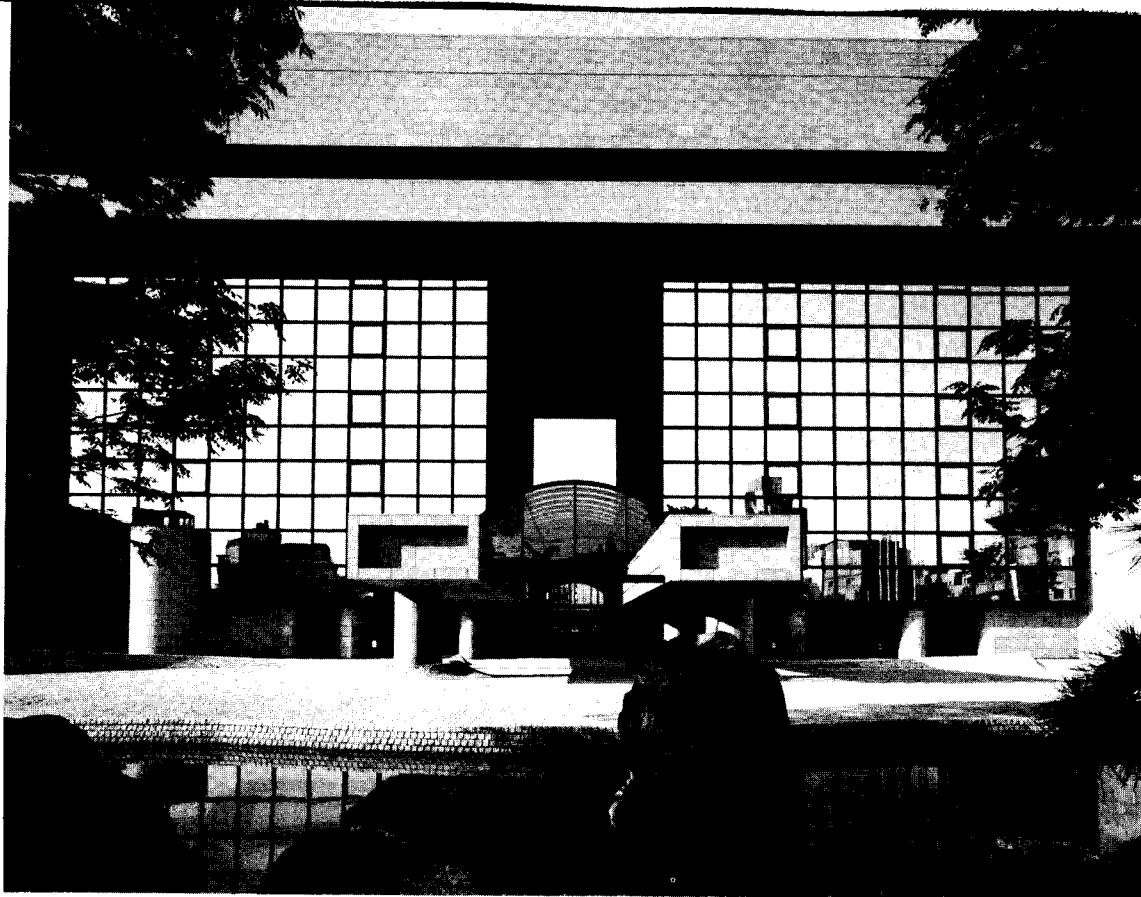
Photographs by Heather Cass



Fumihiko Maki: Elementary School, Kanazawa, Namiki (above). Iwasaki Art Museum (below).

Tohru Waki





Photographs by Tomio Ohashi

were always more an interest in urban form than in technology, has spent several years heading a research study into Japan's unique urban form. Unlike Western grids and meanderings, Japanese cities (with the exception of Chinese-designed Kyoto and Nara) consist of large areas, say a mile square, in which twisted and fragmented pathways lead through layer after layer of wrapping toward *oku*, innermost space, which continues to elude grasp. Japanese, points out Maki, saw gods not at mountain peaks but in the depths of mountain crevices. Architecturally, it has led him to a concentration on urban context, which he calls "the conditional approach," with aggregations of elements of minimal sizes; a kinesthetic approach to the making of spaces, and a linear, calligraphic quality to his latest buildings—Iwasaki Museum, and his own house.

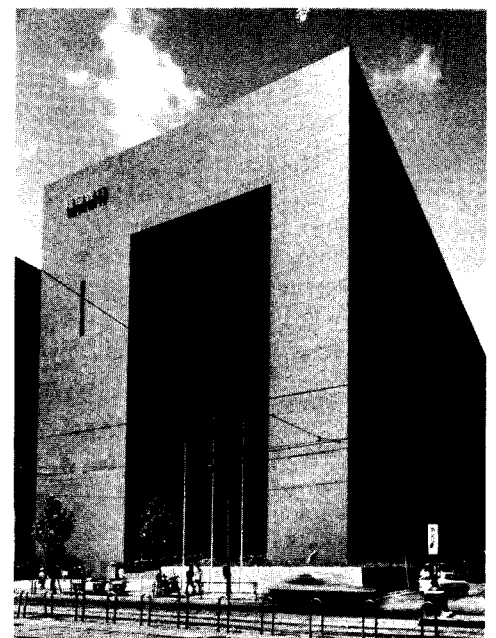
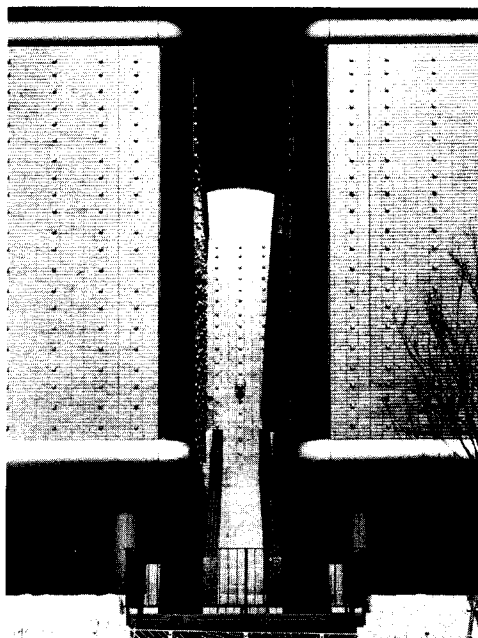
Cultural symbols, not unrelated to Japanese ideographs, have become important in his work, especially 田, as sign for window, and 厩, as sign for shelter.

Kurokawa, the Metabolist wunderkind, now operates an office of over 100 people and does some of the most prestigious work in Japan. Today, all his work is explained in terms of Zen Buddhist philosophy: *iki* (an esthetic ideal in which that which appears outwardly somber betrays inner depths of color and ex-

citement); *sunyata* (the relativity of phenomena in which dualities are illusion); *ma* (the intervals in time or space, the ambiguous zones), etc. The pervasive gray color, heterogeneous combinations of materials, inclusion of historical details and semienclosed courts of his recent projects are interpreted within this framework in a manner aggressively evocative of traditional Japanese design. Nor does it seem irrelevant that his Red Cross Society headquarters in Tokyo, for example, has stone paving detailed as a raked sand garden (which implies water), a front door like a drawbridge and a fence patterned as tree branches. The suggestion clearly refers to the feudal castles of the *shogun* period, the era of Japan's self-imposed isolationism, when much of what is considered Japanese culturally was refined.

But if Kurokawa's work is a theoretical model of nationalism, it is the buildings of a third architect which are the most influential on the emerging generation. Arata Isozaki, discussed on the following pages, is just at the prime of his career, two years younger than Maki, two years older than Kurokawa. If the younger architects divide into the radically formalist, the radically revivalist and the radically ad hoc, it is to one or another side of Isozaki that they are gathering. *Nory Miller and Heather Willson Cass, AIA.*

Kisho Kurokawa: Japan Red Cross building, Tokyo (above). National Ethnological Institute, Osaka (near right). Head Office, Fukuoka Bank, Tokyo (far right and across page).





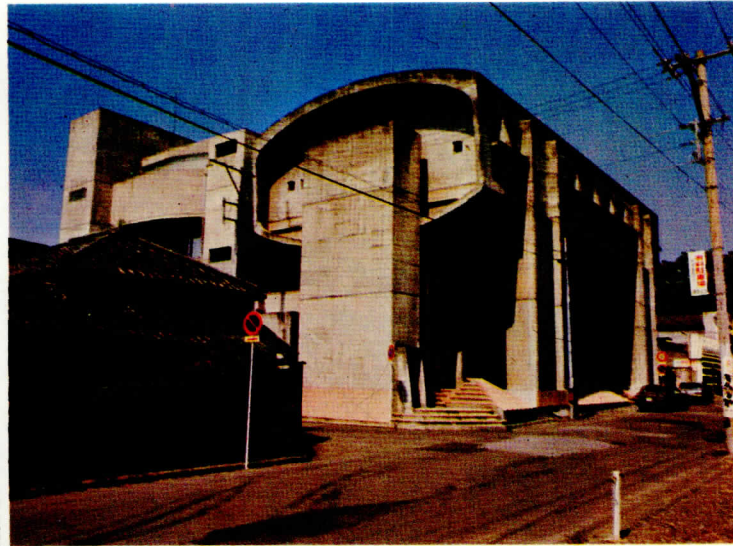
Isozaki: Exploring Form and Experience

He is a point of departure for a younger generation. By Nory Miller and Heather Willson Cass, AIA





Heather Cass



Masao Arai

The curving glass block and aluminum southern facade of Kamioka Town Hall, Isozaki's latest work (1), sharply contrasts with the Corbusian exposed concrete of his early '60s' projects for Iwata Girls' High School (2) and Oita Medical Hall (3) in Oita, Kyushu.



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It is impossible to discuss the new wave in Japanese architecture without discussing Arata Isozaki. It is not that Isozaki is its leader so much as he is the architect by which the younger generation feels it has to define itself, whether by emulation, extension or contrast.

Isozaki's early career was involved with Japan's previously major movements. His theoretical prototype for Kenzo Tange's Yamanashi Press and Broadcasting Building and his Expo '70 robot (the original R2D2) earned him a place in the Metabolism movement. And the exposed concrete, articulated box beams and bridges of the work in his home town of Oita placed him firmly within the late Corbusian beton brut tradition that for decades was synonymous in Japan with modern design.

But, having been Tange's student and younger associate for more than 10 years, Isozaki broke out on his own in 1963. Even earlier, he had shown a certain bemusement with the seriousness with which his Metabolist confreres approached their evangelical mission. His building for the Oita Medical Society, moonlighted in 1960, took the shape of a flattened cylinder suspended in mid-air. It was announced, as if seriously, as a portion of a "tube network" which would eventually "constitute a city." And its essential absurdity, standing up there all alone, was ample refutation of the wide-eyed urban designers' hope for collective products from a world of individual clients.

Isozaki's current architecture and the work he has been doing for the past half dozen years is as opposite from the supposed social panaceas of Metabolism as the heavy concrete of brutalism was from the wood and paper screens of traditional Japanese houses. His current work represents, like that of his counterparts in New York City, Milan and other Western centers, more personal explorations. There is an admitted formalism and a certain sophisticated cynicism. The subject of Japanese sensibilities is central, but neither as the "land of contrasts" antonym from Western thought nor the 1960s' "searching for syntheses." A connoisseur of food, clothes, art as well as architecture, Isozaki has traveled widely. He has also pursued studies of *Ma*, the Japanese concept of space, for his own interest and in preparation for exhibits for both Paris and New York. In Isozaki's work the complicated relationships between East and West, tradition and modernity are investigated and sometimes made fun of. But nowhere is there the expectation of a final definition. Consider his handling of technology.

Technology was long the symbol of Western accomplishment and the link with Japan's traditional structural expression was for a decade considered the key to integrating East and West. If there is a quality to Isozaki's expression of modern technology, it is anthropomorphism. There is, of course, his fascination with the high sheen and tactile possibilities of aluminum, but that, in fact, does not differ significantly from his appetite for



Heather Cass

Robot eyes in a museum made of cubes.

the more traditional materials of marble or tile. Actually, this is complicated by the fact that these are traditional materials in the West, not East, and as the distinction between modern and merely imported is less than one might imagine, there is a sense in which marble is as high-tech as metal in Japan.

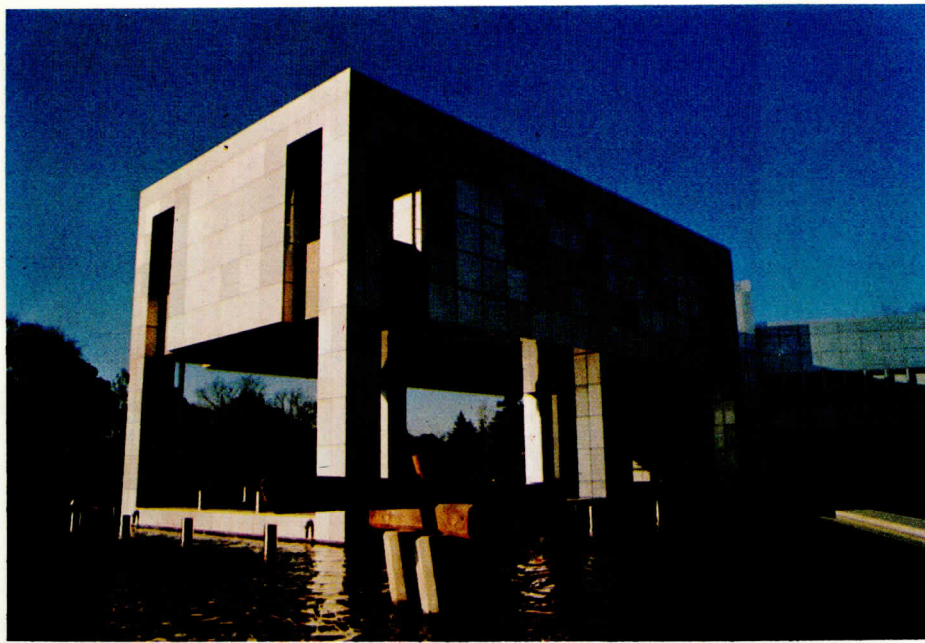
But the extraordinary thing is the way fleeting images of the face and arms of his Expo robot keep appearing like Cheshire cat smiles out of the fabrics of his buildings. At the Gunma Museum, its face greets visitors from the outside wall of the special collection wing and its air duct arms reach into the great hall. Both the front and side facades of the Fujimi Country Club are robot faces and the louvers and drain pipe at Kitakyushu Library are wittily drawn into yet another face at the bottom of the grand Spanish stairs. His series of banks and the Shuko-sha office building offer more images of faces and arms. There are few if any of his postbrutalist buildings that don't. Isozaki covers himself metaphorically by talking about how modern buildings have machines hidden within that run them and philosophically by proclaiming: "The machine has become a kind of playmate; sometimes it even performs the role of a clown." It is a joke, erotic, a reference to pagan guardian symbols, Oldenburg's mouse museum (especially at Gunma) and mixed in with Palladian window motifs. But in the hide and seek, there is as

much resentment as domestication of the machine. And it is this kind of fundamental ambiguity about the larger issues that informs Isozaki's work and intrigues the next generation.

Isozaki himself is 48 and the work of his mature period has been largely devoted to investigating possibilities in simple geometrical forms, the cube and the cylinder, which he calls neo-Platonic solids. The Gunma Prefectural Museum of Fine Arts in Takasaki, Gunma Prefecture, done between 1971 and 1974, is perhaps the most eloquent example of the cube series. Without losing its astonishing presence on the landscape or a lyrical quality to the interior, Gunma is almost a catalog about cubes, in both two and three dimensions.

Windows are provided as individual squares, ribbons of squares and grids, in various sizes, set within the gridded aluminum surface. Cubes are distributed along the ground side by side, dogleg, skewed; overlapping vertically and in depth; joined in pairs or placed individually. Despite the deftness of the formal moves, there is some of the ingenuousness of a 2-year-old picking up a shopping bag for the first time. Isozaki's total fascination with architecture—with form and material, proportion, connections—is a constant counterpoint to nihilist gestures of a sometimes overeducated truant.

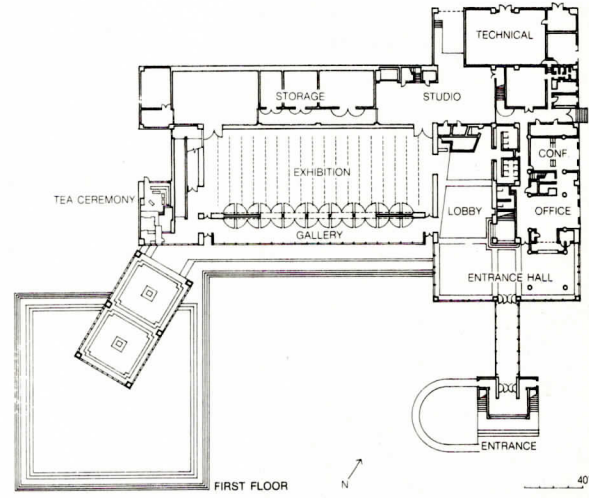
There is some of the experimenting quality in Isozaki's handling of the stairs, but it is far more impious. Isozaki takes the qualities of a grand staircase—centrality, focus, open prome-



Heather Cass

Gunma Museum is an aggregation of shiny cubic forms (1). The entry sequence, like that of traditional Japanese buildings, guides the viewer past the length of the facade before permitting entry. Views inside and out are through layers of glass or frame under the angled special wing and across the cubic entry hall to the cubic adiculae (2-5).

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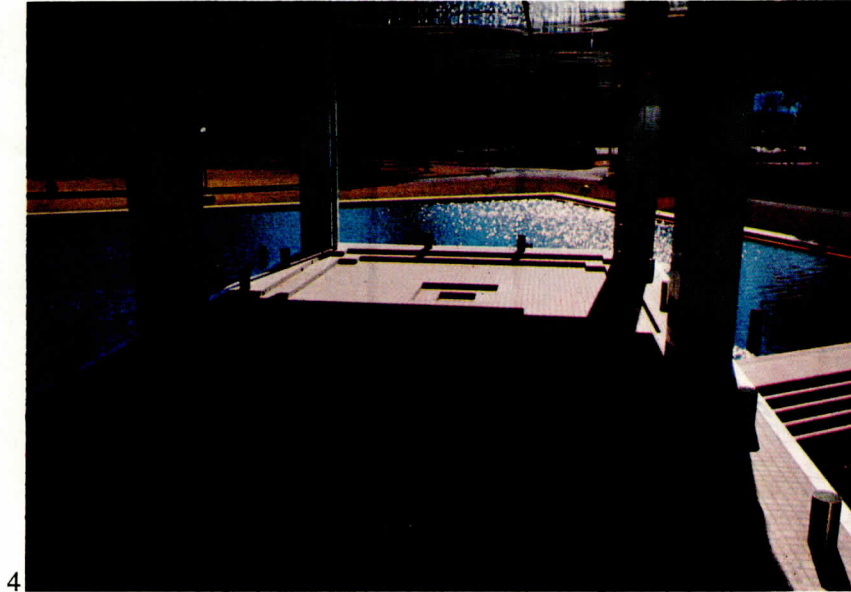
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nade, vertical circulation, vanishing point—and toys with them. There is an actual grand marble staircase that leads from the first floor to the second, but its entering point is low, crowded and off-hand, its sides are screened, and at the top it doesn't flow into the expanse of a gallery or even a corridor but is stopped by the rounded balcony of a Corbusian circular stair that sprouts up out of nowhere. Next door to this trivialized real grand staircase is a fake grand staircase, the dignified focus of the great hall. It is actually a series of marble platforms to display sculpture, not stairs, but hidden within is an elevator that does indeed go to the second floor. The composition has a kind of reverse perspective. Instead of the stair receding slowly toward a vanishing point, it is the viewer's space that does—as if the stair were doing the looking. The perspective lines are incised into the tile pattern on the floor, which not only makes the reversal more emphatic, it also picks up the angle of the skewed section of the museum. That section is devoted to ancient scrolls and is the most important room.

He is asking us to question our basic assumptions about the nature of objects. What is the essential quality of a stepped platform which defines it as a stair? What is a stair if the fake stair has almost as many stair characteristics as the real one?

The relationship of gravity and frame to the idea of cube is the major subject of the building. Within and without the great hall, Isozaki has hidden the actual weight relationships by covering the surfaces with a uniform grid and by keeping both posts and beams to the same dimensions to obscure actual load flow. To enter is to experience an extraordinary feeling of lightness which can be mistakenly attributed to the flood of sunlight from all sides. Set within another section of this weightless space is a series of aediculae, like Charles Moore four-posters, supporting cafeteria and offices. The columns of the aediculae are round and the beams are square as in Shinto shrines where the round posts symbolize nature and square beams symbolize man. The aediculae are such clear expressions of gravity that they accentuate the buoyancy of the surround.

It is the special wing that complicates the issue. Half frame, half aediculae, it also hovers between solid and void, moated castle and porte-cochère, facade and sanctuary. At its base, there are two concentric squares, one rising, one receding. Intended as suggestions of Yin and Yang, they seem a bit facile, as do the concentric square supergraphics within one lecture hall and the

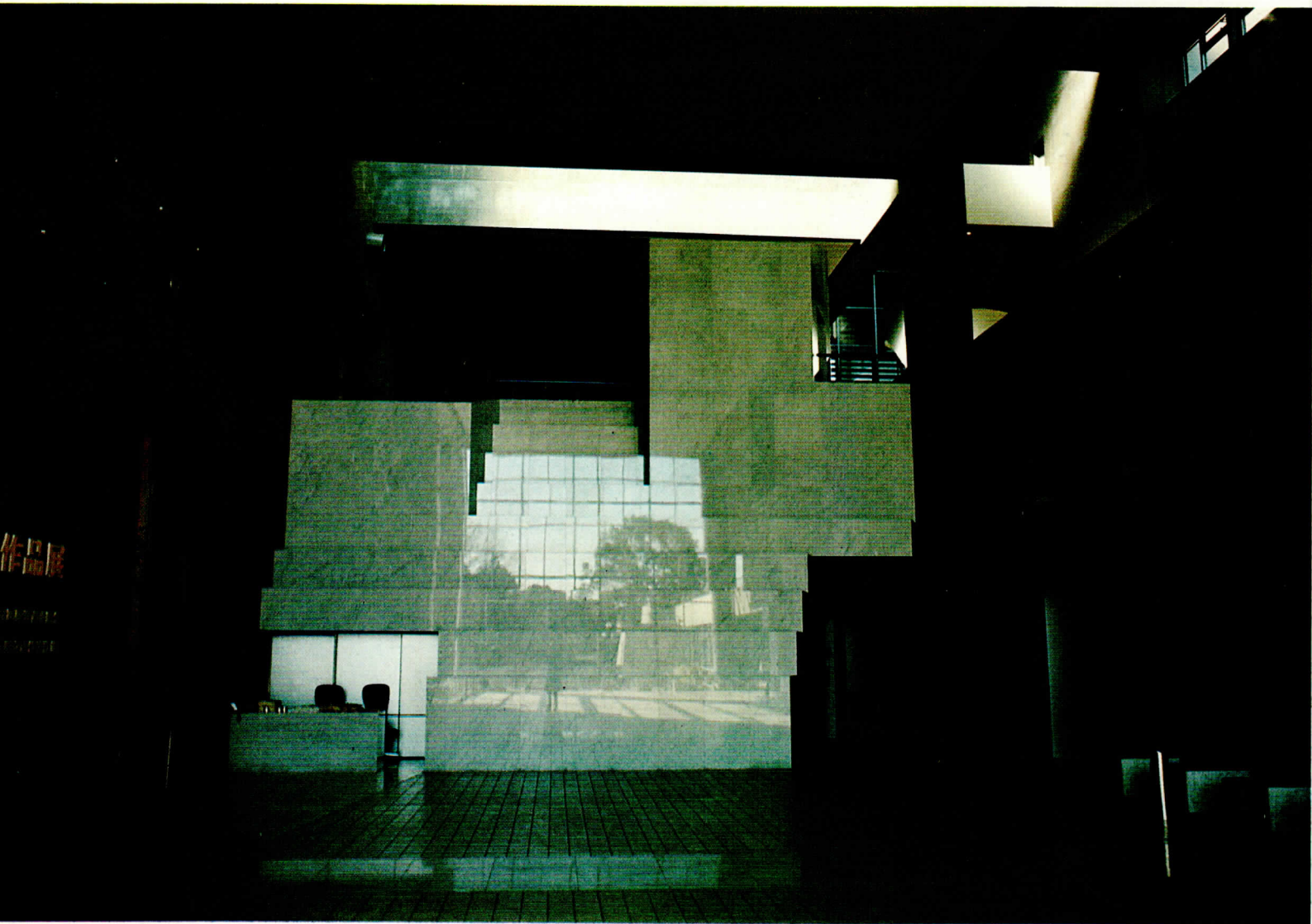


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Heather Cass

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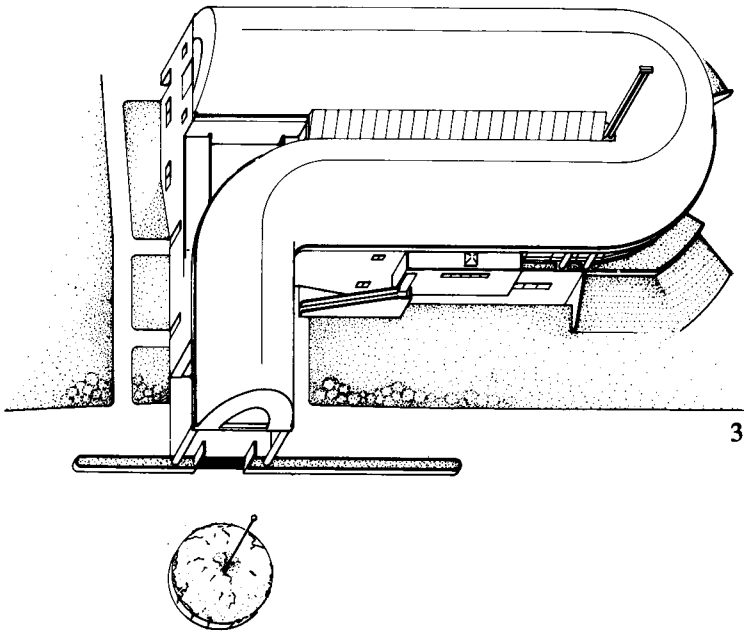
'A building as a series of overlapping metaphors.'

tilted frame graphics within the other. But then the concept of symbolic events frozen in space is what underlies the Japanese view of nature.

There is much to be said for the similarities between Isozaki's approach to architecture and that of the *sukiya* tea master architects. The Zen masters, bent on proselytization but leery of literary means, employed the visual environment—gardens, flower arrangements, pottery and the tea house itself—to stimulate the perceptions and understandings crucial to Zen belief. Their attention to detail was so heightened that grass in even large gardens was cut by a nail scissors, blade by blade. That this discipline has created a culture far more visually attuned than most is not the only point. It also affirmed a point of view that considered the discrete and specific appearance of things deceiving; that underscored ambiguity, variable interpretations, the intricacy of seemingly simple objects, intangible concepts, "architecture as the flesh of the unconscious."

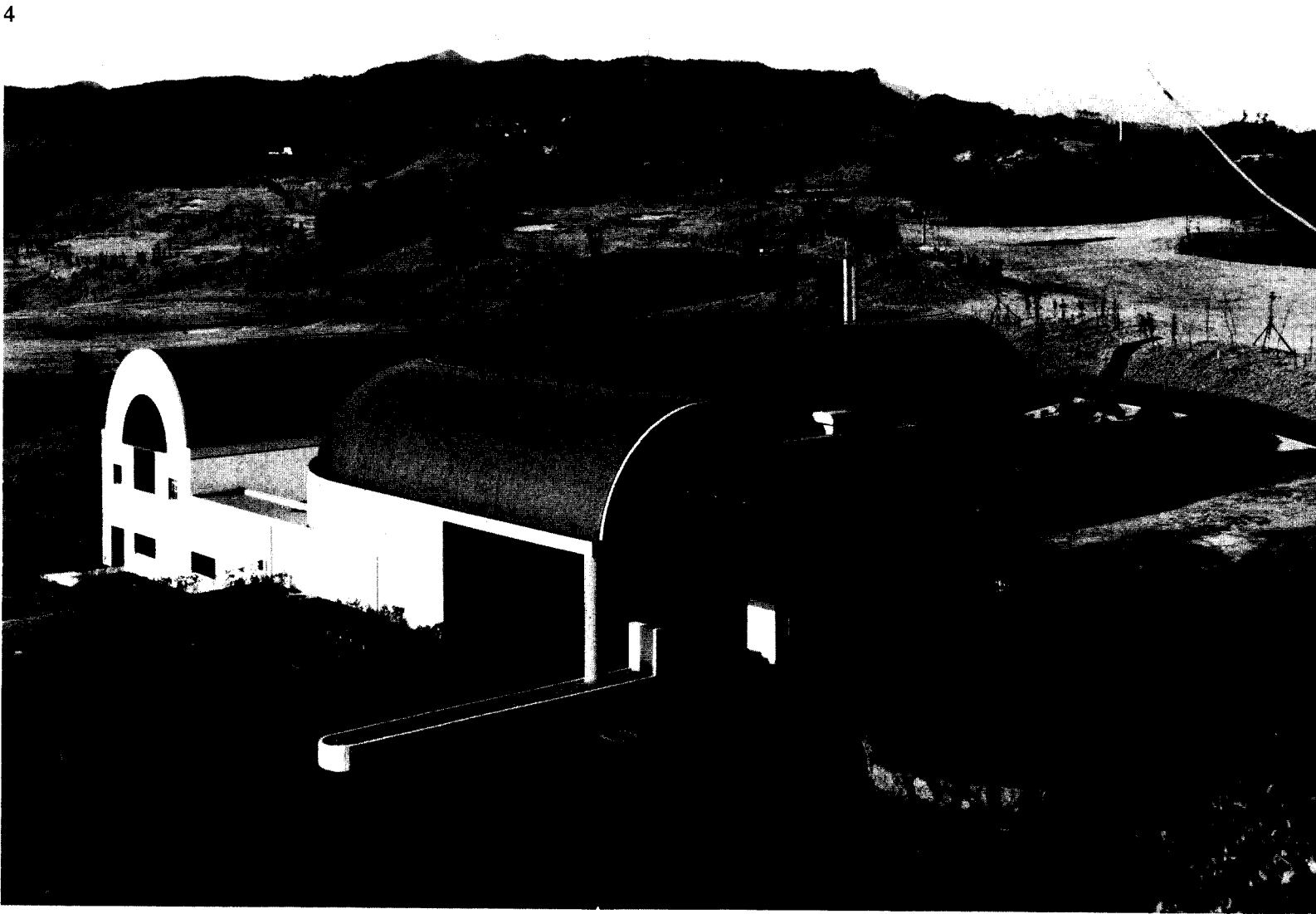
It is also true that the qualities that Isozaki shares with the *sukiya* masters—the concept of a building as a series of overlapping metaphors, the primary intention of awakening the perceptual and intellectual faculties of the people who experience it, an assumption that this stimulation of awareness, not the presentation of a point of view, is the goal—are also qualities he shares with many of his Western contemporaries, both artists and architects. It is a relationship he is aware of, often putting forward the overlap between East and West. In discussing his gridded

Focus of Gunma's entry hall is a sculptural display 'stair' (1) whose monumental presence all but obscures the real stair tucked less conspicuously behind the wall (2). Plan of the vault of the Fujimi Country Club forms a playful question mark with a 'dot' of plantings across from porte-cochère (3-4). Inside, stainless steel tie rods give a feeling of intimacy in the vaulted sitting area. Glass expanse permits broad outdoor view and contradicts Western preconceptions about the heaviness and enclosure of vaults (5).



5

Masao Arai



4

Masao Arai

Romanesque vaults in the shadow of Mt. Fuji.

surfaces, he cites simultaneously as precedent Florence's Superstudio, New York artist Sol Lewitt and *furoshiki* (the square cloth used in Japan to wrap everything). At the same time, there is sometimes a kind of contempt for undigested tradition, so the reproduced tea house within Gunma Museum is tucked away like a broom closet; and a bemusement with the way undigested Western traditions manifest themselves in Japan, which appears as a playful mixing of images. For instance, in the middle of his Fujimi Country Club, a club dedicated to golf, Isozaki sticks a ski lodge fireplace. In Japan many things are copied oddly from the West; one can be served a chocolate ice cream sundae smothered in prunes. Isozaki is making fun of his less sophisticated countrymen, but at the same time perhaps wondering: Why not, what makes the West right?

Along with Isozaki's experiments with the cube were experiments with the cylinder, generally as a semicylinder or barrel vault, of which the most thoroughly worked out examples are his Fujimi Country Club (1972-4) and Kitakyushu Library (1973-5). The semicylinder is, in some ways, the opposite of the cube. Instead of an aggregation of fragments, it is continuous movement, which some have likened to toothpaste coming out of a tube. As a form, its origin for Isozaki was in the Metabolist days of futurist cities and transportation networks. It first appears as uninflected vaults on the landscape in his Computer Aided City of 1971.

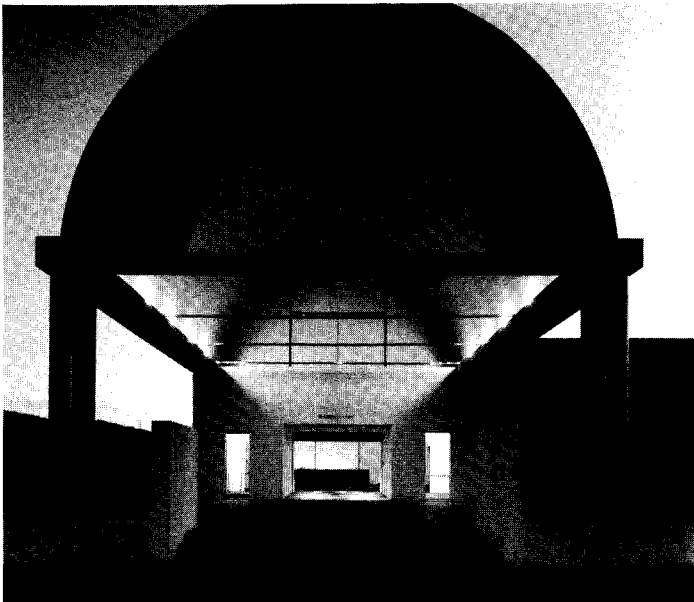
At Fujimi the vault snakes around in an undulating gesture that, with the addition of the round bed of planting across the roadway, can be read as a question mark from above. The idea of a punctuation mark as a form for building is a play on Isozaki's serious intent to use buildings as communication. It also gives Isozaki the chance to explain its meaning as questioning why Japanese play so much golf, and the rest of us a chance to consider whether it might also be a joke on the building's name. Fujimi means view of Fuji, but the mountain is shrouded in fog so much of the time that one's chances of seeing it are problematical.

For all the abstruse formalism, Fujimi's interior is graceful and compelling, a sheltering cave as contrast to the open golf course. Shiny tie rods at the base of the vault modulate its scale for those sitting down without lowering the ceiling for those standing. In an act of gravity-defying willfulness, the heavy vault has been sliced and lifted, leaving a panoramic view through uninterrupted glazing around most of the curve. At two ends the vaults have been severed abruptly. Each end (one of which is the front door) becomes a face, "a mouth through which the building can speak a variety of things." Visual dexterity is primary: The front facade splits a Palladian motif between two layers; the side reverses the motif into a mushroom form and then re-establishes it with small square windows.

At Kitakyushu Library, Isozaki was ready to expand. The plan is more ambitious—two snake hooks set in relationship to each other. The severed ends recall not only Palladio but Ronchamp, Notre Dame and Aldo Rossi. The vault is no longer imperturbable as at Fujimi. Windows and doors climb it, often in a kind of Deco layering. And in one corner, a Le Corbusier piano/Marilyn Monroe-curve cafeteria holds its own on both sides.

If weightlessness was the suggestion at Fujimi, the heaviness of the vault is, if anything, accentuated inside the library by continuous ribbing. The mixture of Romanesque vault and Gothic structure is again chocolate ice cream with prunes, but architecturally very much to the point. The whole idea of a country club is to eliminate walls, to be part of those playing outdoors but sheltered from the rain. Here the idea is to make the wall aggressively present, wrapping you up in the bowels of the library, making something to look at while you sit there for hours reading, suggesting the university Gothic of Oxford and its imitators.

Both Fujimi Country Club and Kitakyushu Library give

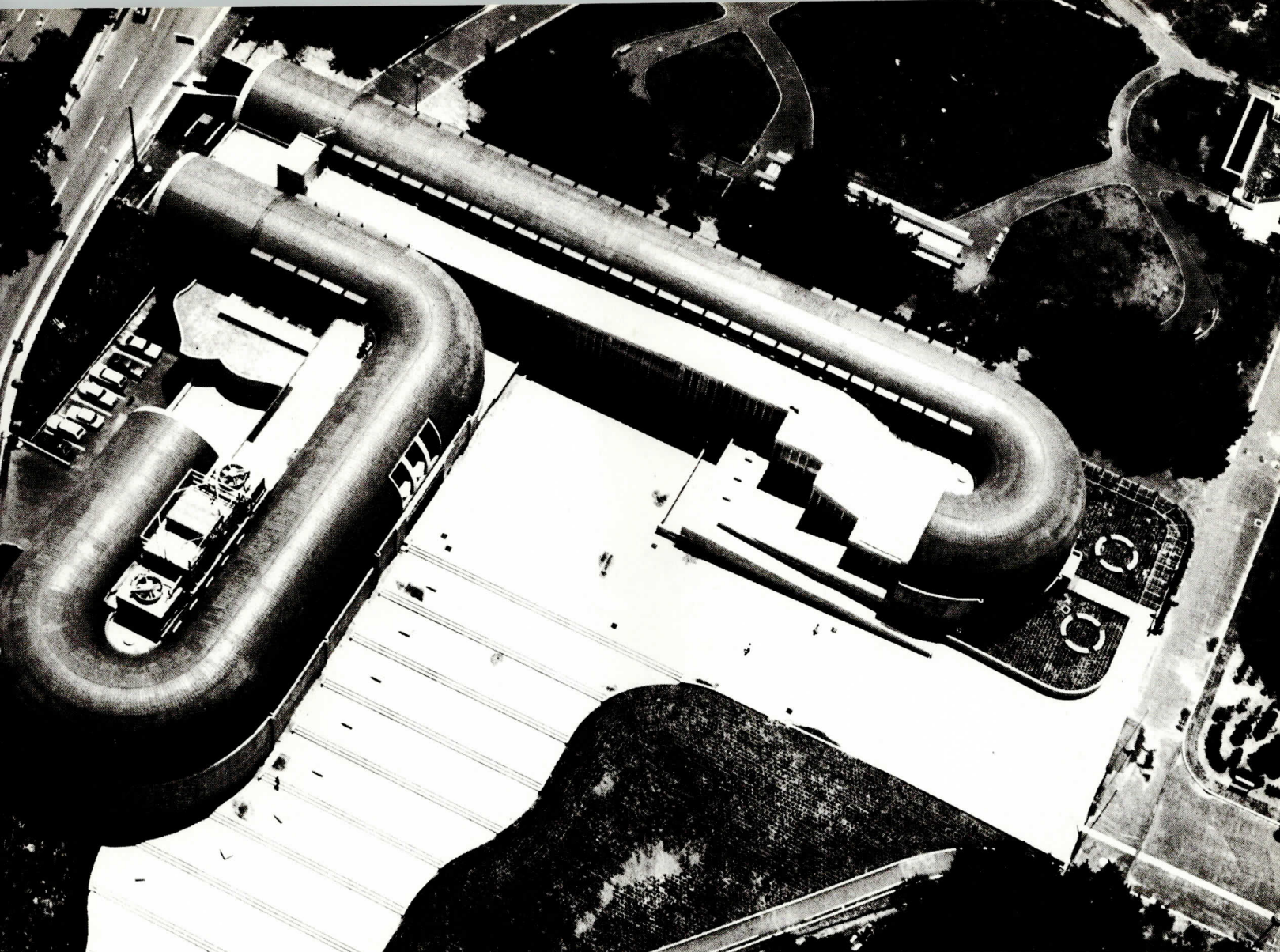


Masao Arai

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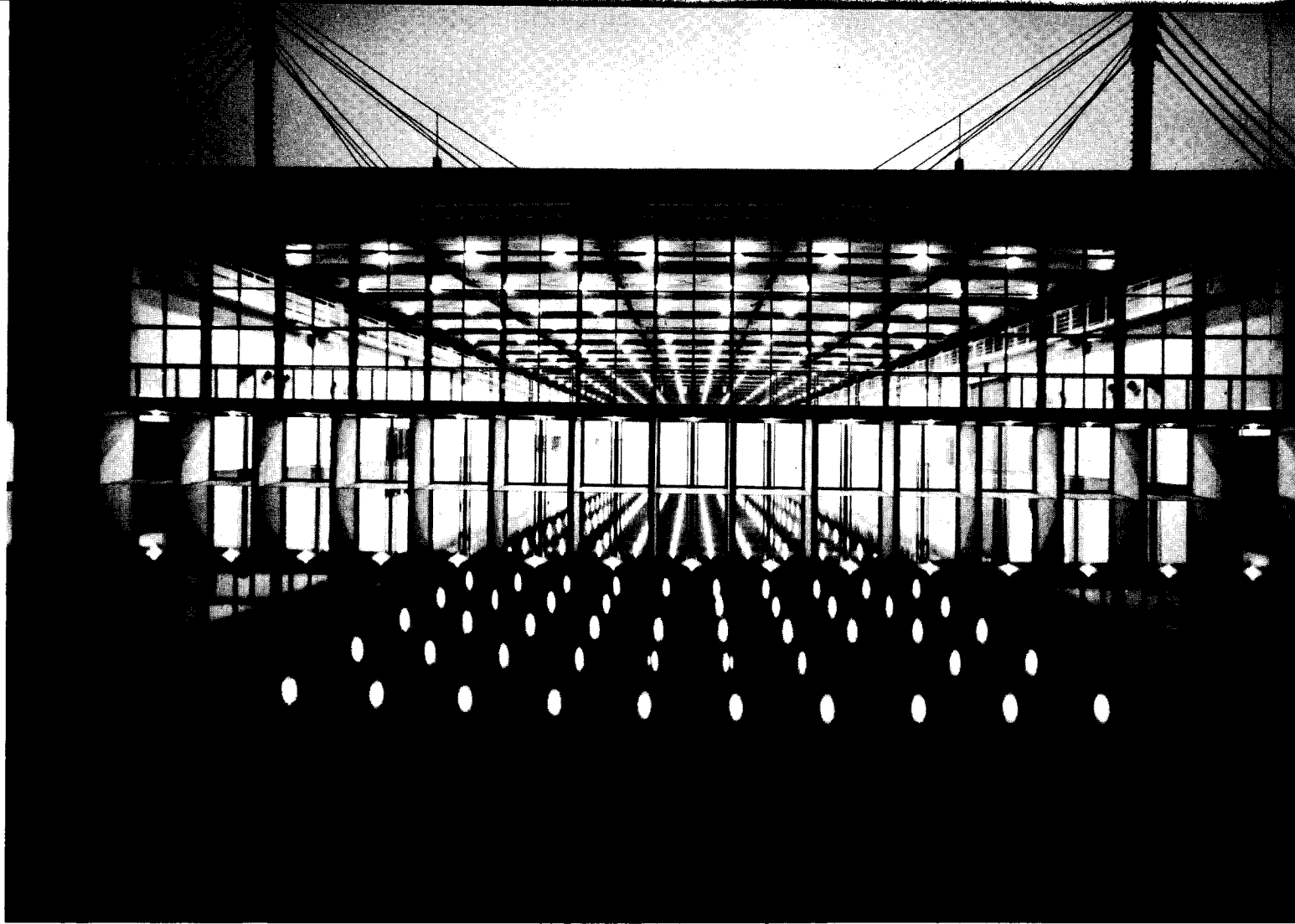
Fujimi Country Club's hidden robot and deformed Palladian motifs are suggested in the layered porte-cochère and entrance exterior (1) and the mushroom window termination of the side wall (2). The copper vaulted reading rooms of the Kitakyushu Library embrace a linear circulation ramp, a Marilyn Monroe-profile cafeteria and broad Spanish steps (3). The ribbing of the vault interior gives the reading rooms a feeling of enclosure evocative of European and American examples of collegiate Gothic architecture (4).



3 Masao Arai

4 Heather Cass





Photographs by Masao Arai

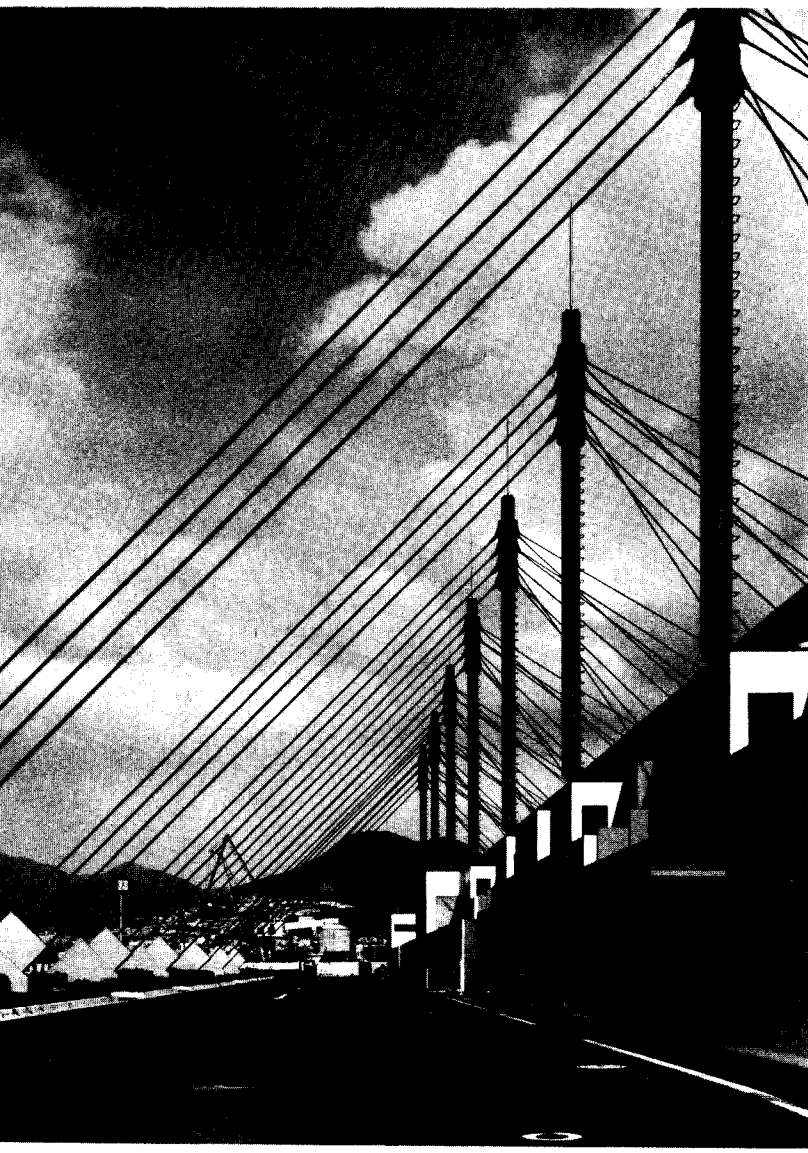
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Most recently, an assemblage of cube and cylinder.

Isozaki the opportunity to deal with the whole idea of Western imports. Both golf and books are Western (the Japanese used scrolls originally and there were no separate library buildings). Thus it is scarcely coincidental that these are the buildings for which he uses the vaults—symbols simultaneously of technology and historic European design—or the buildings in which he throws in a Richardson fireplace, rose window, Spanish steps, Marilyn Monroe curve, etc. The mixing of cultures is a long-standing aspect of Japanese life. The Japanese have adapted a technique for it in which each import is brought into the scheme but left identifiably separate. The word in Japanese for dining room is “dining room” because such specific designations are not original to the culture. And there are many examples from Italy, France, ancient Greece. At the same meal, foods which were originally Chinese or Japanese are served in bowls, those which were Western are served on plates. There is a sense in which Isozaki’s cylinder buildings are served on plates as well.

Most recently, Isozaki’s work has moved into other areas, including the combining of the cube and cylinder. His Kitakyushu Exhibition Hall (1975-77) is a little out of the mainstream for him, far more literally metamorphical. Its site is adjacent to a pier, surrounded by warehouses, cranes and a steel works. It sits among them, with the plan of an oil tanker and the silhouette of a clipper ship. The two-layer color scheme at the bottom of the masts and the repeated, articulated units break up the massive bulk. Inside, a system of skylights and vaulted plastic elements almost succeeds in filtering the light as if it were coming through water. There is an inner court behind the rounded entry building that can be flooded.

It is Isozaki’s latest building, the Kamioka Town Hall, finished last year, that is his transitional building. There have been

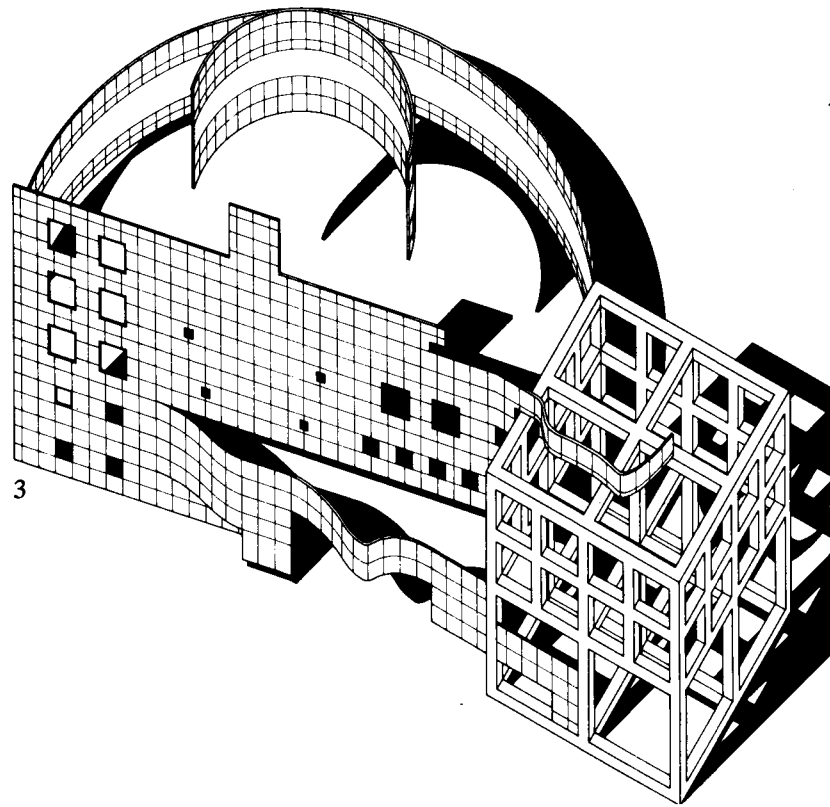


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transitional buildings before. The Head Office of the Fukuoka Mutual Bank, done just before the cube and cylinder series, is almost a collage of high-tech, greenhouse, slab towers, marble entranceway, leftover brutalist bridges. Kamioka takes on the opportunity of combining the cube and the cylinder, and, looking back to his earlier work on the Fukuoka branch banks, adds a third element—architecture as skin. On one side is a cylinder within a cylinder—this time vertical and recalling Erich Mendelsohn's ironworkers building in Berlin. The other side, the front, is aluminum tile skin, peeled away in another Marilyn Monroe curve to make an elaborate visual entry. And on the side is a cube. There are fragments of interweaving, especially between skin and cage, and a minimally established axis (by the elevator at top and its mirror image below), but the combination on the whole is reminiscent of Frank Gehry's "train wreck" buildings. In diagram, there is also a strong relationship to James Stirling's Dusseldorf project.

Each area has a specific purpose. The skin is the entry; the cylinder is the council room, and within the cage is the mayor's office. The windows are again a kind of a catalog to stimulate awareness. There are English Italianate windows, punch windows, ribbon windows, portholes, clerestories and tiny openings like the bathroom panes in Victorian houses. Inside the cylinder there is a similar kind of play between column and wall—tangential in one place, intersecting in another, supporting in a third.

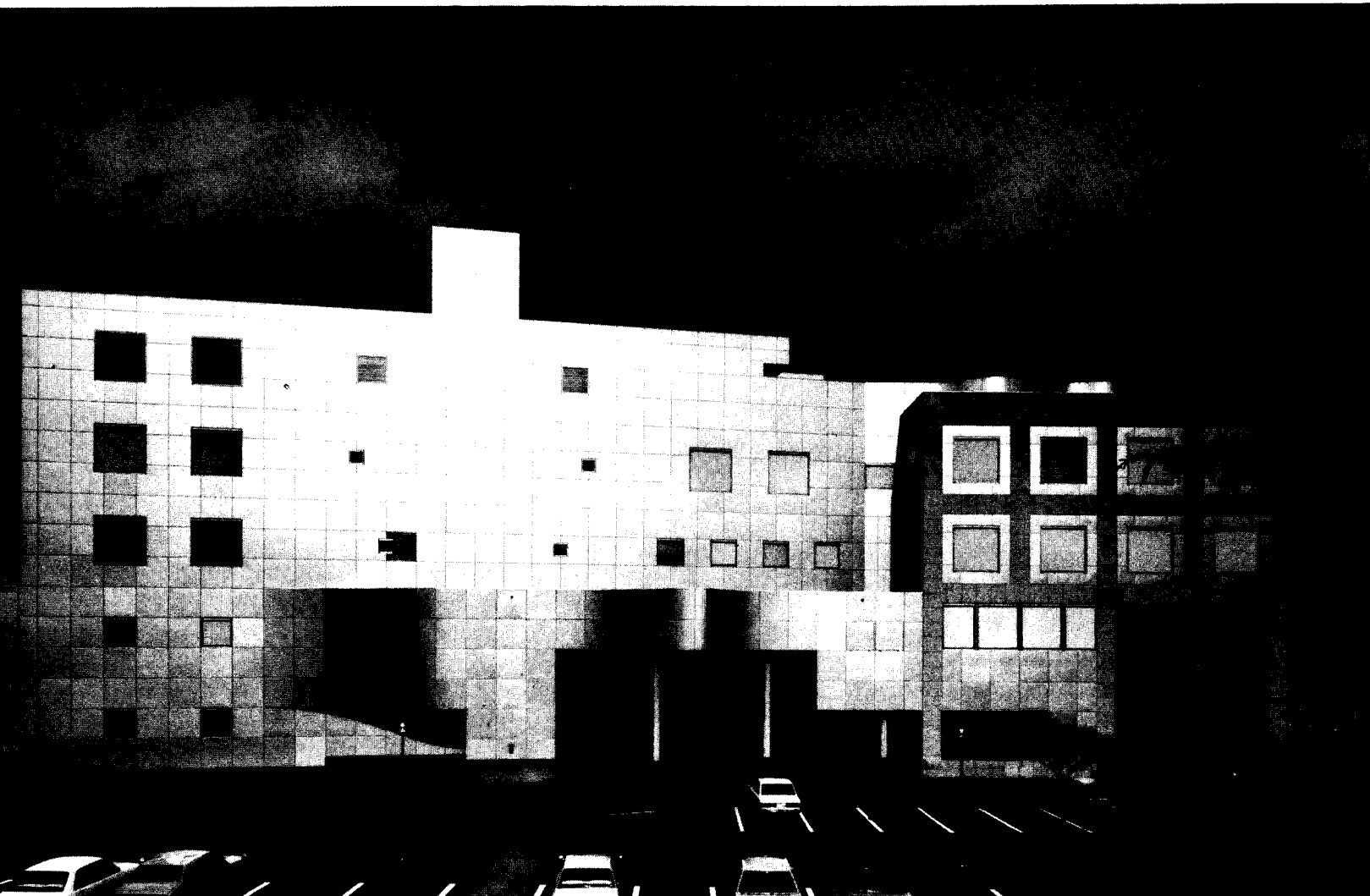
The brick plinth around the building floats the structure above, like a moat around a castle, and the extending leg of the cage becomes a porte-cochère/drawbridge setting up a dialectic with the front door, much as did the special gallery at Gunma. The columns have feet both on the inside and outside, and Isozaki did not miss the chance to adapt the exterior ones from



3

The flooded courtyard of Kitakyushu Exhibition Hall (1) is tranquil in contrast with the repetitive mast-like modules of the exterior walls (2). Skin, cylinder and cage are interwoven by Isozaki in the Kamioka Town Hall (3). Eastern elevation shows curved entrance and cubic office wing with porte-cochère (4).

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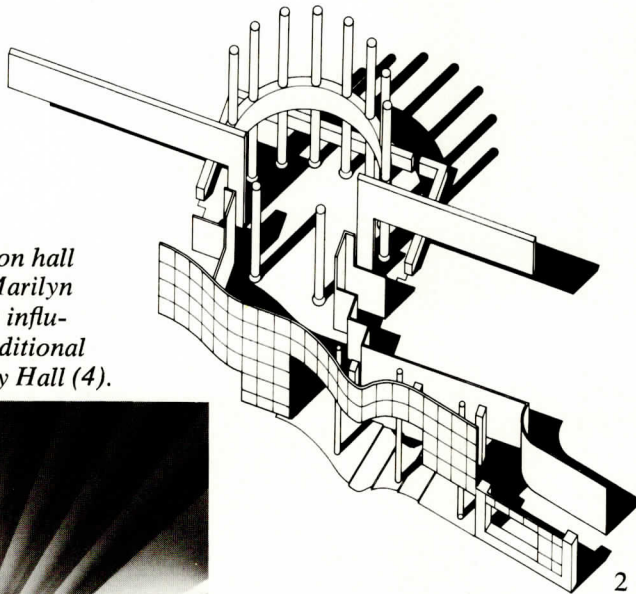




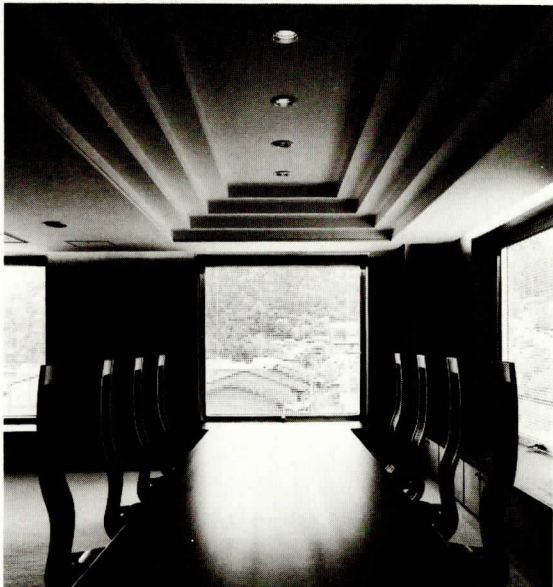
Photographs by Masao Arai

1

Semicircular columned reception hall (1-2) and carved ceiling and Marilyn Monroe-curve chairs (3) show influences of contemporary and traditional East and West in Kamioka City Hall (4).



2



3



4

The influenced are now an influence on him.

Western sources and the interior ones from Japanese. While texture has long been a subject of serious investigation by the architect, this is the first time that a carved ceiling has appeared, a detail noticeably reminiscent of Fumihiko Maki's Toyota guest house near Nagoya (and of Aalto, Maki's source).



The front door has aspects similar to Maki's Daikanyama apartment house also, and one cannot help noticing the influence of the next generation as well, especially Ishii and Fujii. That Isozaki is an inexhaustible eclectic is no revelation. It is interesting that he has now had enough of an influence on his Japanese colleagues that their work has evolved into a source for him as well.

At 48, Isozaki is still a relatively young architect. His work

continues to evolve, to assimilate Eastern and Western influences in a manner which has become a Japanese tradition (and has precedent in Japan's development of everything from Zen Buddhism to the Sony Betamax system). But what is clear already is that Arata Isozaki's approach—his exploration of form and experience at a personal level—has already taken root and is growing and developing in the next generation. □



Nine New 'Wrinkles on the Water'

They are diverse and intriguing young designers, if not yet a 'wave.' By Hiroshi Watanabe

The work of young Japanese architects, mostly in their late 30s, has begun to attract attention overseas. This is no doubt due in part to the relative quiet that settled over the Japanese architectural world after that Metabolist showcase, the Osaka Exposition of 1970, was over. The bold and oftentimes bizarre capsule and megastructure schemes gave way with some exceptions in the '70s to small-scale, down-to-earth projects that were carefully detailed and of good taste: the work of such designers as Mayumi Miyawaki and Kazumasa Yamashita. Less sensational and exotic than the Metabolists had been, they also received less attention abroad. These architects were not possessed by some utopian vision; they injected some plain common sense and Puckish humor into an atmosphere made overwrought by a decade of futurist experiments. Now, however, these architects are in turn being challenged by a new crop of designers who find their work wanting, despite all the competent professionalism.

The nine offices mentioned in this article are only some of the more interesting wrinkles in the water—they scarcely can be said to constitute a new wave as yet—and, for lack of space, I have left out several notable young architects, such as Hiroshi Hara.

Eight of the nine offices are in Tokyo. These eight belong to three different camps: Basara, the modernists and Team Zo. (Modernists is admittedly a makeshift label I have applied to a collection of architects who are reluctant to call themselves a group.) Their attitude toward Arata Isozaki is a helpful indicator of how the three are different. The modernists are the closest to Isozaki philosophically; they see their work as being essen-

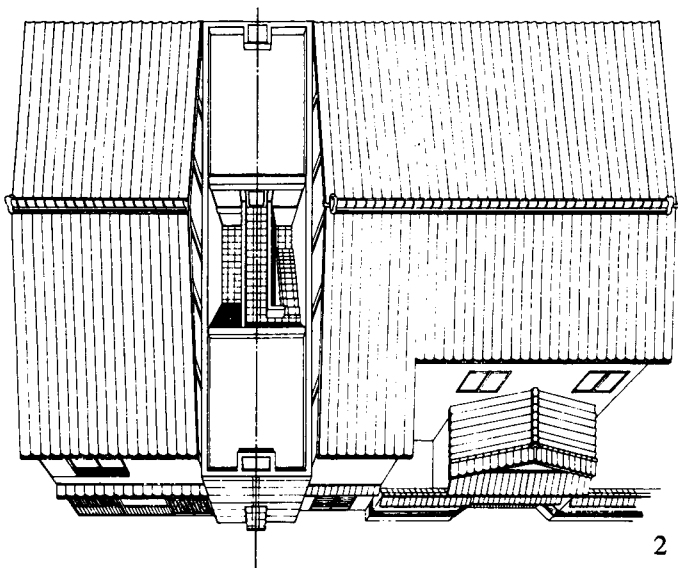
tially a continuation of the modern movement, though with their own special thematic interests. The members of Basara view Isozaki's work with mixed feelings and are trying, each in his own way, to find an alternative approach. The architects of Team Zo, on the other hand, are apt to mutter, "Arata who?"

The ninth office, that of Tadao Ando, is in Osaka; he represents what he calls a realistic approach, which may be closest to that of Fumihiko Maki.

Osamu Ishiyama's Fantasy Villa Gen-an is a kit of metal parts set in an idyllic clearing of a prefectural park (1). Tadao Ando's Azuma house is sandwiched between two traditional Osaka town houses (2). The facade is exposed reinforced concrete; the front and back portions of the house are divided by an open courtyard typical of the nagaya style (3).

Kazuyoshi Bando

Mr. Watanabe, now in private practice in Tokyo, was a correspondent for *Architecture Plus*. A graduate of Princeton, he studied in Tange's studio at Toyko University and received a master of architecture degree at Yale.



Basara

Osamu Ishiyama and Kazuhiro Ishii (both born in 1944) and Monta Kiko Mozuna and Kijo Rokkaku (three years older) have set up an informal study group called Basara. A term in fashion during the Muromachi period (1338-1573) in Japan, an era of transition from the aristocratic, Heian society to the warrior, feudal society, *basara* was used to describe unrestrained, ostentatious behavior. Implicit in the choice of the name for the group is the feeling that a more vigorous creative impulse needs to be introduced into Japanese architecture, which presumably has been devitalized by excessive estheticism, exemplified by the work of Isozaki.

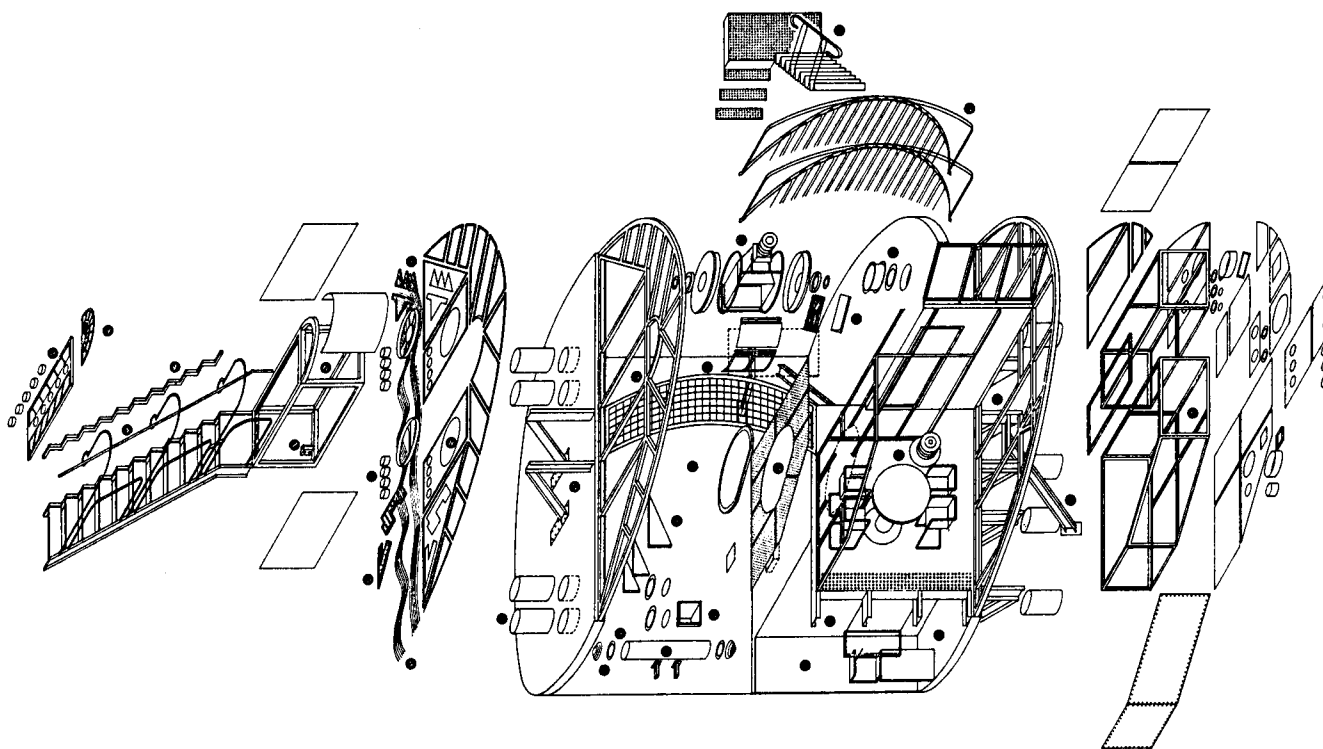
Ishiyama has built a series of cylindrical houses made of corrugated steel sheets. The seventh of these is his best known work, Gen-an or "Fantasy Villa" (1975). Gen-an has a nearly perfect site, a little clearing in the woods of a prefectural natural park, some distance from Toyohashi. The lower part of the facade is concrete, the upper steel with red rust-proofing paint, which contrasts well with the deep green foliage. There are various perforations, some of native American inspiration. A stairway with a handrail so delicate it vibrates at the slightest touch leads to the front door. The building has an air of both the primitive and the advanced, like an early radio or some other mechanical prototype which has since been replaced by a more streamlined and compact but less charming model. Walking around to

the side, one sees the corrugated sheets, of which there are 63 in all, assembled with 1,350 bolts. (Anyone can put the house together with a single wrench.)

Inside, there is a steel mesh bridge, very beautiful to look at and very uncomfortable to cross, which arches over the living room below to the dining and kitchen area in the back. The living room is equipped with a large stove and a stainless steel tube speaker for an audio system. The interior of Gen-an is perhaps not so much a fantasy inducing environment as it is a swell bachelor retreat.

Ishiyama was originally inspired by Kenji Kawai, "the Japanese Buckminster Fuller," who built his own house in 1962 out of steel sheets. Technology was, of course, the backbone of the Metabolist movement, but Ishiyama's technology is of a far more modest, self-sufficient sort. His work parallels the doings of the American counterculture, but Ishiyama is also attracted to the work of Bruce Goff ("although he is a super bourgeois"), Greene and Greene and European expressionists.

Where Kawai's house is strictly functional and matter of fact, Gen-an is very much "designed." Ishiyama is obviously torn between his populist sense and esthetic sensibility. His intention, he says, was to produce a general solution; instead he ended up with a specialized one. "Perhaps I am an architect after all," he says wryly.

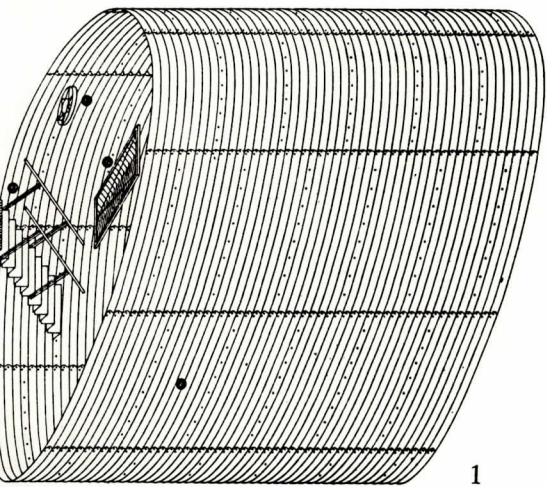




Taisuke Ogawa

2

Gen-an is a kit of parts, including 63 corrugated sheets and 1,350 bolts, which can be assembled with a single wrench (1). The spirit of the villa is at once primitive and high-tech; the steel mesh bridge(2) is reminiscent of traditional Japanese bridges (3).



1



Heather Cass

3



Basara member Monta Kiko Mozuna's Eisho-ji Zen Buddhist convent expresses his preoccupation with Tantrism, an esoteric form of Buddhism. The interior altar adicula is a series of nested geometric forms (1). On the exterior, the broken torii gate is a jarring contrast to the traditional form (2-3). Procession inside is through a linear series of geometric forms, each with a symbolic meaning. The whole is representative of one of the mandalas of Tantrism (4).

Basara, with its connotation of rude vigor, perhaps most appropriately describes the work of Monta Kiko Mozuna.

In a series of articles on "Abnormal Architecture" in the magazine *Kenchiku*, Ishiyama became interested in amateurism and Mozuna in religious art, particularly that of Tantrism.

Tantrism is an esoteric form of Buddhism, which stresses the ritualized practice of mysteries, including the recitation of spells or mantras, in order to commune with the cosmic Buddha and to realize the oneness of existence. Mandalas, which are diagrams of the cosmos, are used as aids in meditating.

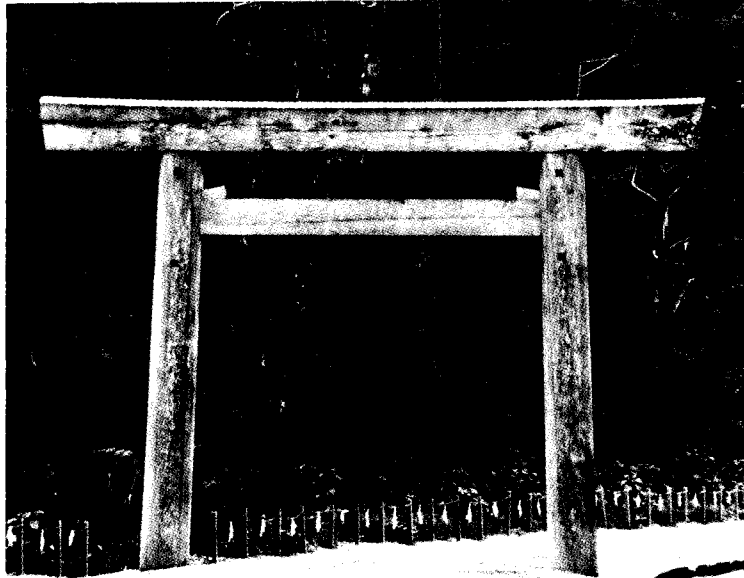
Mozuna's best known work is a house in Hokkaido called the Anti-Dwelling Box (1972). Of it, he has written:

"By dwelling box I mean a house or a shelter. The Anti-Dwelling Box is [an] answer to, and rumination and refutation of, the modern condition, which is to be surrounded by a multitude of containers, from furniture to dwelling boxes to collective dwelling boxes.

"The Anti-Dwelling Box is composed of three similar three-dimensional containers: the skin reaction box, the body response box and the environmental code box. [One is] to live and exist in between these boxes."

The smallest box, the skin reaction box, is a giant piece of furniture, which one cannot enter except through the imagination. It sits in a corner of the second, the body response box, which is, more mundanely speaking, a multipurpose room above the ground floor bedroom. The environmental code box is the exterior envelope of the building which sends out mysterious signals to the unregenerate environment. Where the Anti-Dwelling Box, a scheme of a box within a box, is based on concentric circles, *Eisho-ji* (1979), a Zen convent in Tokyo, is a linear concatenation of events. The two projects in fact illustrate two different structural principles of Tantrism, the *Kongokai mandala* and the *Taizokai mandala*.

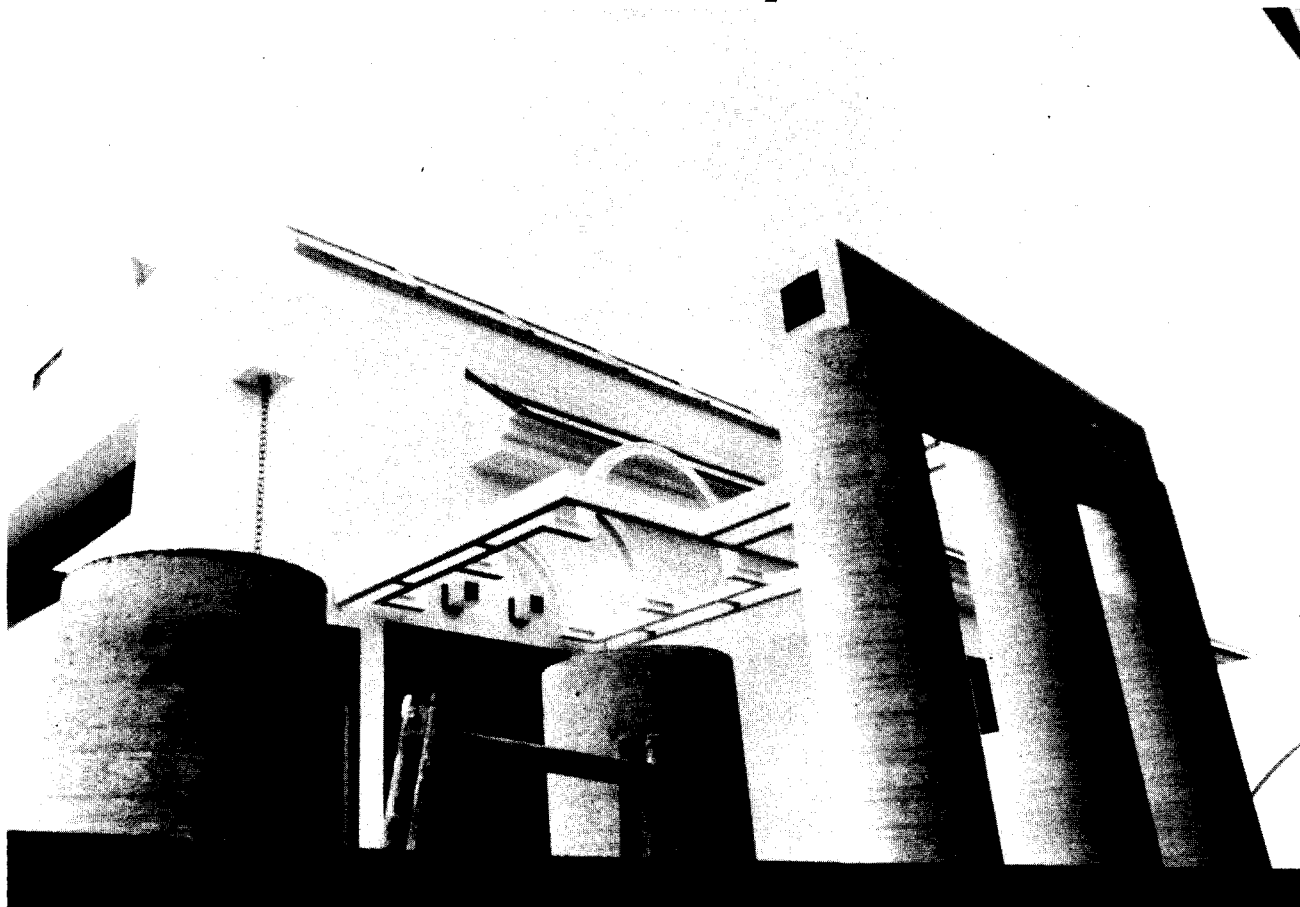
In these and other projects, Mozuna continues his ambitious, and at times mock-heroic, plan to interpret the cosmos and to mediate enlightenment. Although their styles of approach are different, Mozuna and Fujii have similar goals, the inducement of a nonrational awareness.



Yoshio Watanabe



2

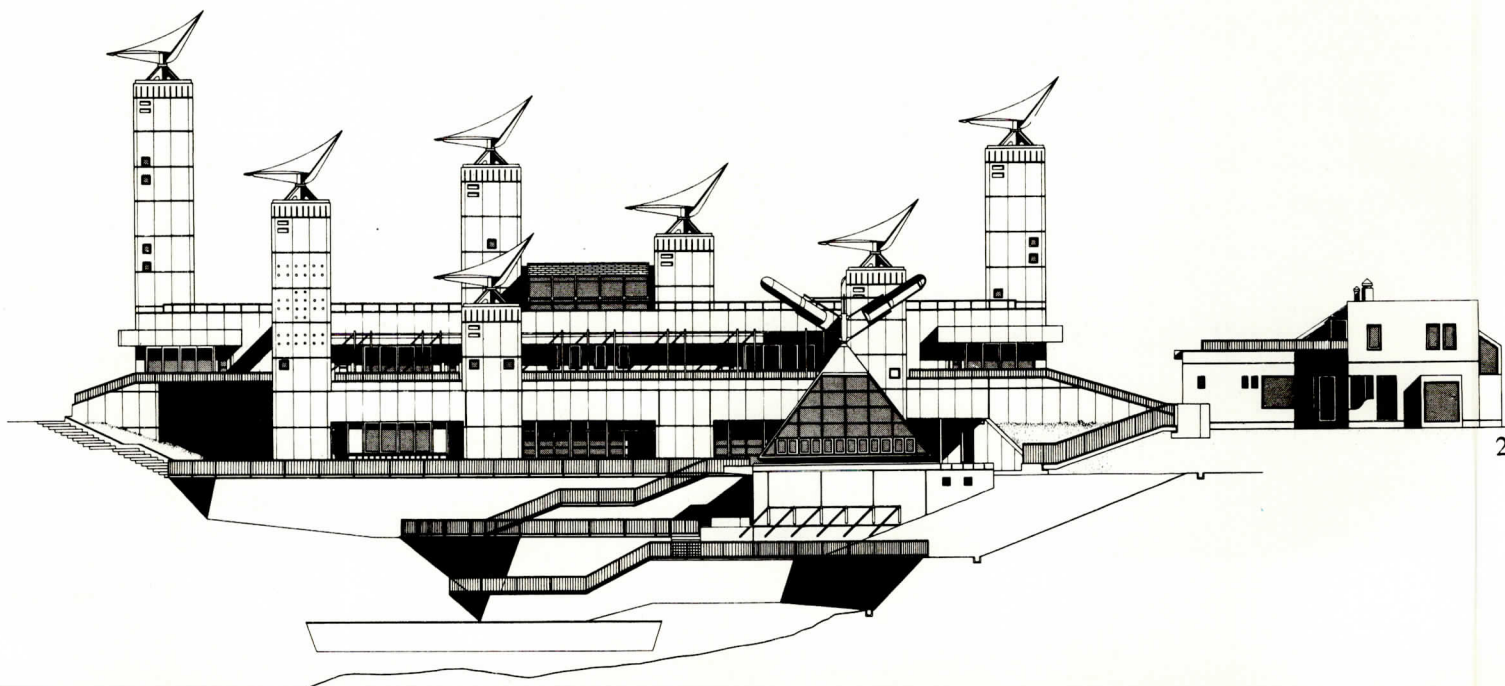


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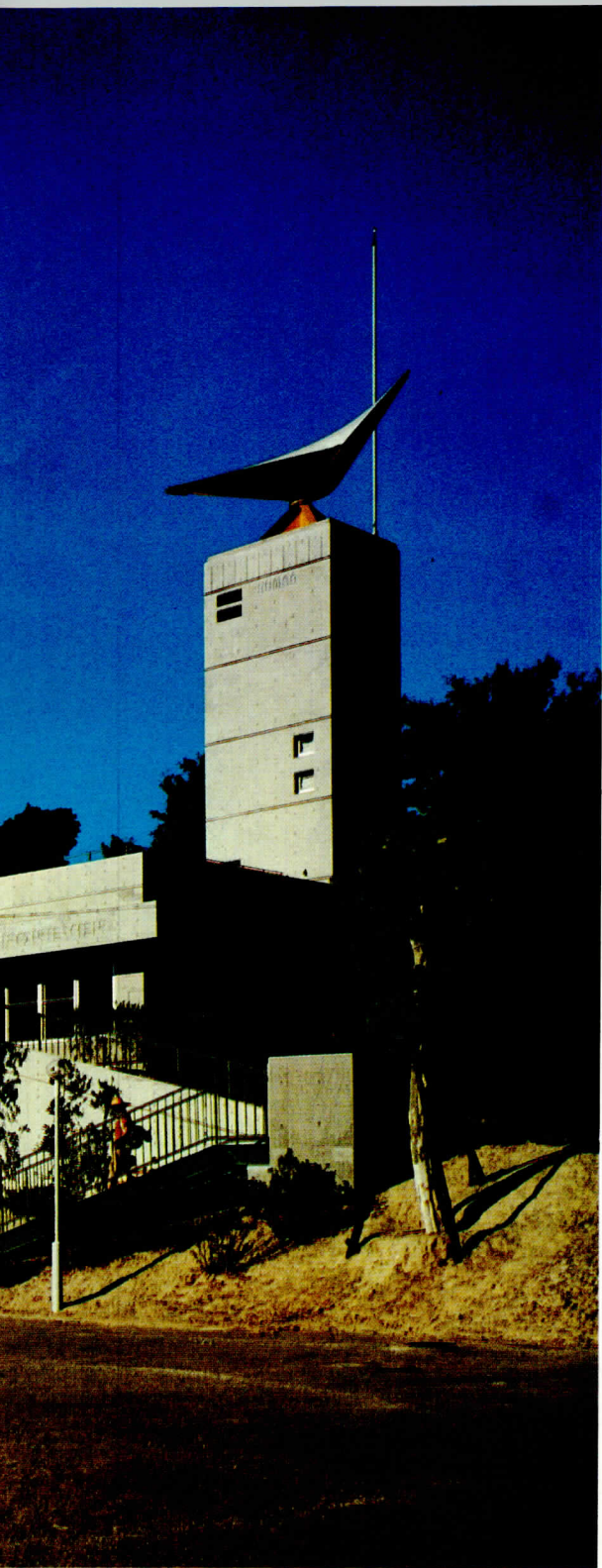


Photographs by Masao Arai

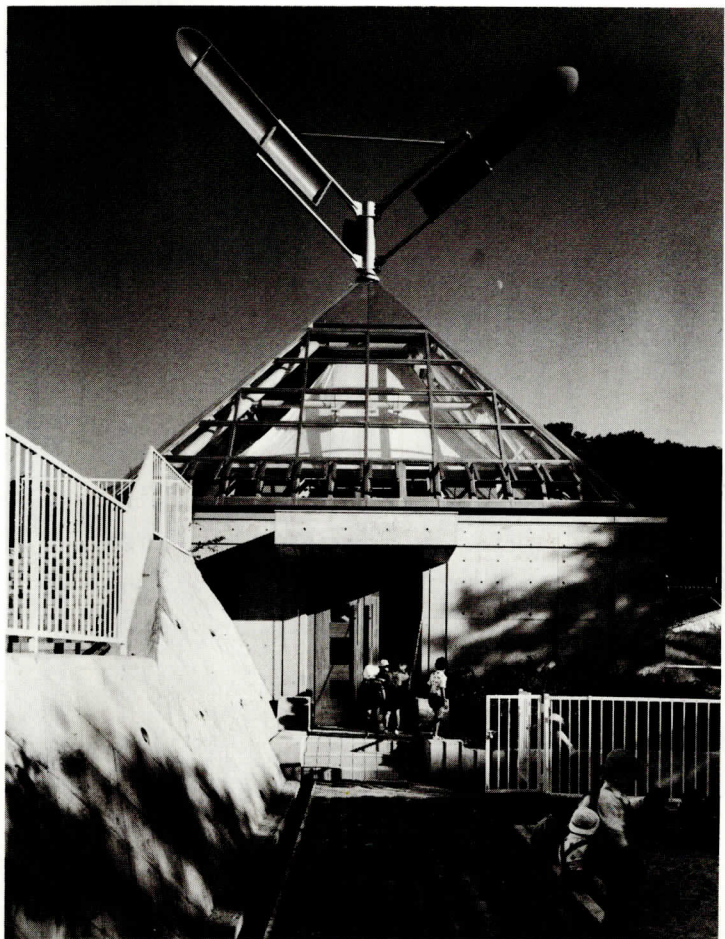
1



2



The propeller and radar-like wind sculptures mounted on top of Rokkaku's Zasso no mori Kindergarten conjure images of an outer space refueling station (1-2). 'Functional' justification of the sculpture which tops the playroom's glass roof is that its rotation powers the mechanisms of toys inside (3).



3

Kijo Rokkaku is the most intuitive designer of the Basara group. Rokkaku's Zasso no mori Kindergarten (1977) is built on top of a hill between Kyoto and Nara. The first thing that a visitor sees is the ensemble of towers that rises like Sam Gimignano's. Atop these towers of different heights are sail-like wind sculptures by Susumu Shingu. (There is a separate playroom with a pyramidal roof, on top of which is another wind sculpture, whose revolutions work several play mechanisms inside.)

The kindergarten itself is on two levels. Children can go directly to their classrooms on the second floor via a ramp and terrace. The four classrooms are arranged in pairs. A broad corridor that doubles as a play area connects the classrooms in the back, and an open well stairway leads to the ground floor where the offices and a hall are located. The planning is everywhere thoughtful if conventional. To Rokkaku's competent design, add Shingu's movable sculptures, and there is every chance of a popular success. (The school has in fact won the Isoya Yoshida prize for distinguished architecture.)



1



2

Kazuhiro Ishii's 54 Roofed Nursery (1) and House with 54 Windows (2) are commentaries on mass society delivered with the wit often associated with one of Ishii's mentors, Charles Moore.

Taisuke Ogawa

Kazuhiro Ishii says that he is interested in the gap between the individual's perception of himself and society's perception of the individual. In his House with 54 Windows (1975 with Kazuhiko Namba), which combines a house and clinic, there are indeed 54 windows, each different, within a frame structure. In his recently completed 54 Roofed Nursery, the peaked roofs, turned this way and that, are arranged atop a regular grid plan. One might interpret these projects as ironical comments on the futility of trying to be different in a mass society.

Among the modernists, one might begin with Hiromi Fujii who, by age (born in 1935), belongs with the older architects such as Miyawaki and Yamashita. He studied under Motoo Take at Waseda University, yet it is difficult to see what Take's former students, who include such different architects as Fujii and Kiyonori Kikutake, have in common. Fujii has, furthermore, spent some years in Europe, working at one time for Mangiarotti.

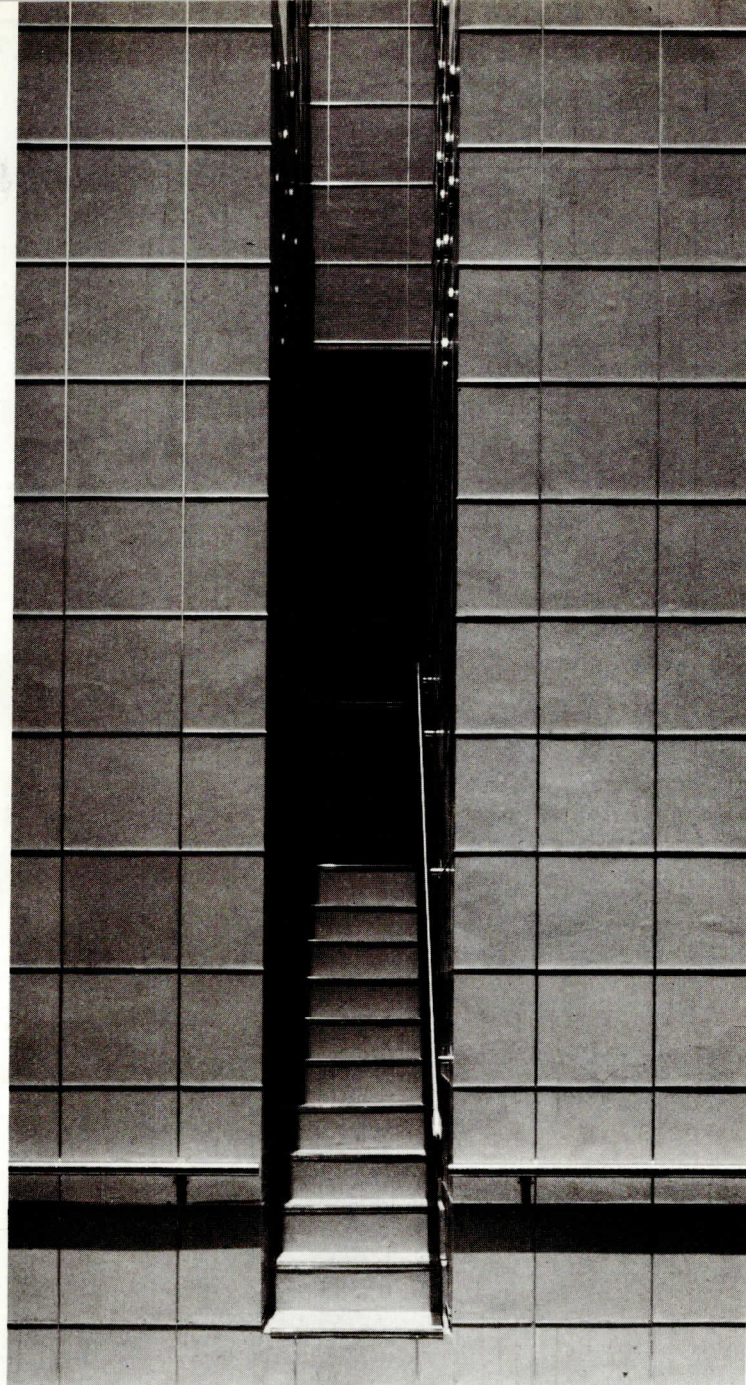
Fujii contends that architecture must be stripped of all intellectualized levels of meaning. By giving us shortcuts and easy answers, these blind us to the true nature of things, he contends. Instead, we must be forced to confront a building directly. To prepare for this existential moment, Fujii effaces his buildings of conventional symbolism, often neutralizing them through the application of an all pervasive grid pattern. To further confound the cognitive function and to make the mind receptive to this unmediated communication with the building, he employs what he calls "repetition, multitiered structure, distance and divergence." By repeating, for example, a certain form in openings, walls and spaces, he hopes to induce an unconscious, "benumbed state" in which the observer is more readily made aware of himself and his true relationship to the environment.

The exterior of a Fujii building is deceptively simple and always disturbing on further examination. Take, for example, the Miyajima house (1973). It is a three-story building, stepped back on the upper two levels. No windows face the street; the only articulation is the aluminum joint grid that covers the urethane painted surface. Stairs go up into a slit that is just off center on this nearly featureless facade.

Or take the Todoroki house (1975). At first it looks perfectly innocuous, yet one is drawn to the false perspective effect produced by the box within box on the lower left side; and the fact that it does not tally with visual effect of the rest of the facade becomes a cause of disquiet.

Fujii's interiors are so intricate and dense that it would be impossible to change one part without altering the complete composition. The individual spaces, divided by fin-like walls or indentations, refuse to meld. There is no center or evident hierarchy of spaces. Passageways are narrow—we are not encouraged to linger—there are constant stops and turns. It is obvious that we must be in some initial agreement with Fujii's intention to be able to accept a building of his.

Fujii is sometimes a visitor to monthly meetings held by, among others, Itsuko Hasegawa, Toyo Ito and Koji Taki, a critic.



Mitsuo Matsuoka

3

Modernist Hiromi Fujii rejects the Basara notion that architectural forms should be invested with symbolism. He frequently employs a neutralizing grid like the one on the Miyajima house (3) on a windowless facade. More gridding and a series of layers suggesting receding perspective give an unreal quality to the Todoroki house (4).

The modernists



Mitsuo Matsuoka

4



Photographs by Masao Arai

Toyo Ito (born in 1941) worked for Kikutake, the Metabolist architect and perhaps the most inventive formgiver of the '60s. If there is anything that Ito learned from Kikutake, it is that architecture is something that one makes and can touch. Ito, however, objects to the popular game of dividing Japanese architects into intellectual designers (primarily Tokyo University graduates) and intuitive designers (primarily Waseda University graduates)—or rather he objects to being put in the latter group. (In fact, he studied at Tokyo University.)

His house in Nakano Honcho (1976), a residential area in Tokyo, is a U-shaped plan closed at the top. One enters by the leg of the U and arrives at the end of a long, curving space which is the living and dining room. Here the only views of the courtyard are through a small window in the entrance area and a larger opening in the dining area.

The main, curved space is seen by some as being very Japanese. What they are referring to perhaps is the similarity of its effect to that of traditional Japanese spaces as in the *shoin* style, in which there is no established center and one is denied a view beyond one's immediate ken. In Ito's house too there is no center—the courtyard in the middle is simply negative space on which the house turns its back—and one is denied a clear view of the entire, elongated space.

This brings up one objection that some younger architects have to Isozaki. They see his work as being purely European in inspiration; it is, they say, not rooted in Japan. One can take exception to this view, but it is true that this generation of architects feels obliged to come to terms with its Japanese identity.

Fujii, for instance, sees parallels between his work and some aspects of traditional culture. Yet he feels that the Meiji restora-



The Los Angeles flavor one detects in Toyo Ito's PMT building (1) results both from the influence of Robert Venturi and from the character of the context. The setting, Nagoya, was rebuilt after World War II on the model of her sister city, Los Angeles. The wide, auto-oriented boulevards have the sprawling character of southern California. By contrast, the low-key and introspective quality of Ito's house in Nakano Honcho conveys the feeling of traditional shoin style dwellings (2-3).

2

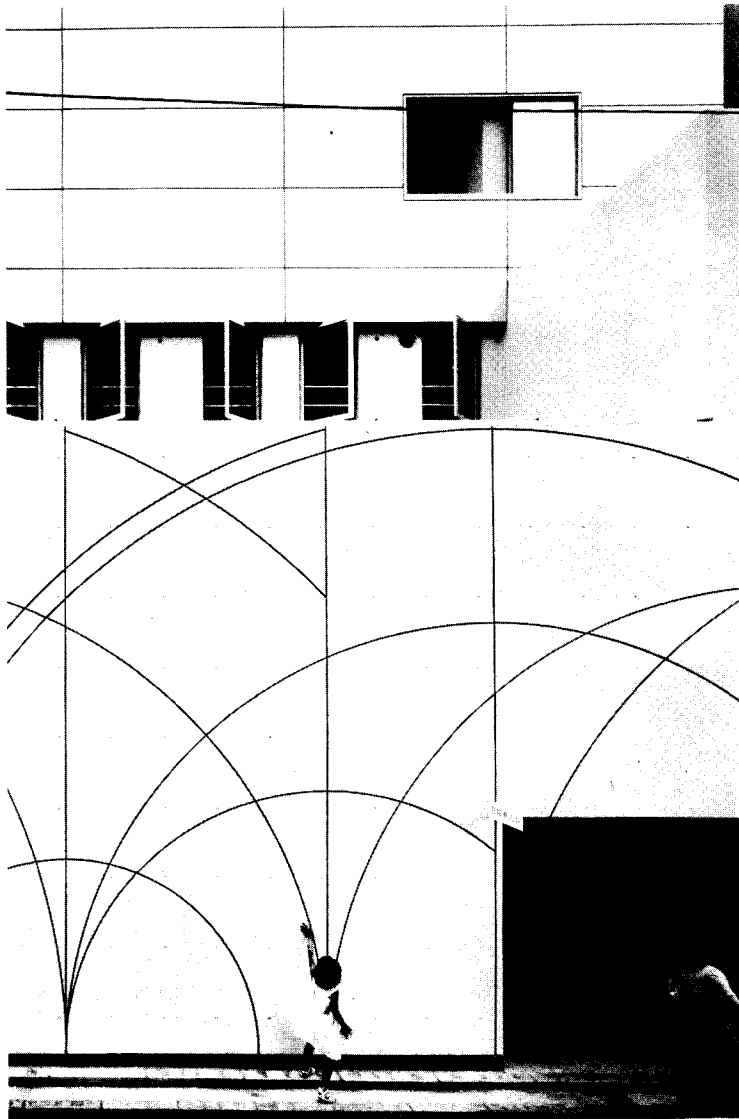
tion and the subsequent modernization have severed any direct ties to the past. Japanese-ness today can only be expressed either in a very broad sense or in very localized regionalism. The latter, which he himself repudiates, is behind the work of an office to be discussed later, Team Zo. An architect of still another persuasion, Osamu Ishiyama, claims that his is the last generation of Japanese to still have a sense of its Asian roots; those growing up today are no different in outlook from Westerners. This may be an extreme opinion, but it does point out that an interest in tradition, expressed though it may be in different ways, is common to nearly all the young architects mentioned in this article.

In Nagoya, Ito has designed the PMT Building (1978). Located on a wide, busy artery, it houses a showroom on the ground floor and offices in the upper two floors. The facade takes note of this functional division; the aluminum panel curtain wall curves inward on the ground floor and outward on the upper floors. An admirer of Venturi, Ito engages in his own complexities and contradictions. The ground floor is narrower than the upper floors in order to accommodate a driveway, yet each—the lower and upper portion—has its own implied visual center. The tension set up by the shift in centers is merely one of the intended effects of the facade. It has nothing to do with the inside of the building.

Both the exterior and interior architectural elements are composed of simple planar forms which Ito calls *morphèmes*. This reductionism he sees both as an extension of modern architecture's purist approach and an accommodation to one's natural tendency to see the city in terms of its surface effects.



3



1

Itsuko Hasegawa (like Ito, born in 1941) worked for Kikutake and then studied under Kazuo Shinohara, a well-known architect of houses. Shinohara takes traditional Japanese folk houses—simple sheltering forms which are subdivided as necessary—as his starting point, but his architectural elements have been so refined and stripped of details that they have become nearly abstract.

Hasegawa has built a series of houses which reflect her background and orientation. In the house in Midorigaoka (1975), a simple rectangle is halved by a diagonal wall, resulting in two attenuated wedge-shaped spaces. In the house in Yaizu (1977), a triangular prism is subdivided.

The Tokumaru Children's Clinic (1979) in Matsuyama is Hasegawa's largest project to date. The first and second floors are devoted to the clinic, the third is for in-patients and nurses' quarters, and the top two floors are for the doctor and his family. Here, curved internal partitions at each floor are played off against the simple rectilinear block.

The building is set back a little to provide light for the half sunken first floor which is intended to be a gallery and waiting room. The light is filtered through a serpentine wall of glass blocks. The second floor is for consultation rooms, and the walls of these are a series of curved segments, forming a long, scalloped waiting area. The residential floors above are likewise composed of curving white walls, a series of separate wall segments that are sometimes concave and sometimes convex. There are hardly any doors in the family areas, and the result is a flowing, continuous space that expands and contracts in an unabashedly lyrical manner.



3



Photographs by Tomio Ohashi

2. *Itsuko Hasegawa's preoccupation with geometry is revealed in the playful compass line arcs etched in the concrete wall (1) which defines the street and separates the sidewalk from the sunken first floor of Tokumaru Children's Clinic (2). Inside, curving walls play off against the simple rectilinear overall mass (3).*



Team Zo

Team Zo ("Team Elephant") was begun in 1971 by former Waseda University students Reiko Tomita, Yasuichi Otake, Hiroyasu Higuchi and Tsutomu Shigemura. They had all studied under Takamasa Yoshizaka and had worked in the Yoshizaka design group called U-ken, in particular on what might be Yoshizaka's representative work, the Seminar House (1965).

Yoshizaka worked for Le Corbusier in the early 1950s, but although his buildings have Corbusian elements, they are still distinctly his own. He preaches "discontinuous continuity," which he defines as "an atmosphere in which individual elements remain independent and yet participate in the whole. In the context of social groups, that means that each member's individuality is protected, though the group has its own identity; in the context of a building, it means floor, wall and ceiling each asserts itself and yet compose a space."

Yoshizaka is distrustful of methodology, explaining: "Methodology is both an advantage and a disadvantage. For example, the creation of something like *kiwari* [the traditional rules of proportion] made possible the widespread achievement of architecture up to a certain level in Japan . . . but the spread of *kiwari* also checked creative ambition to some extent."

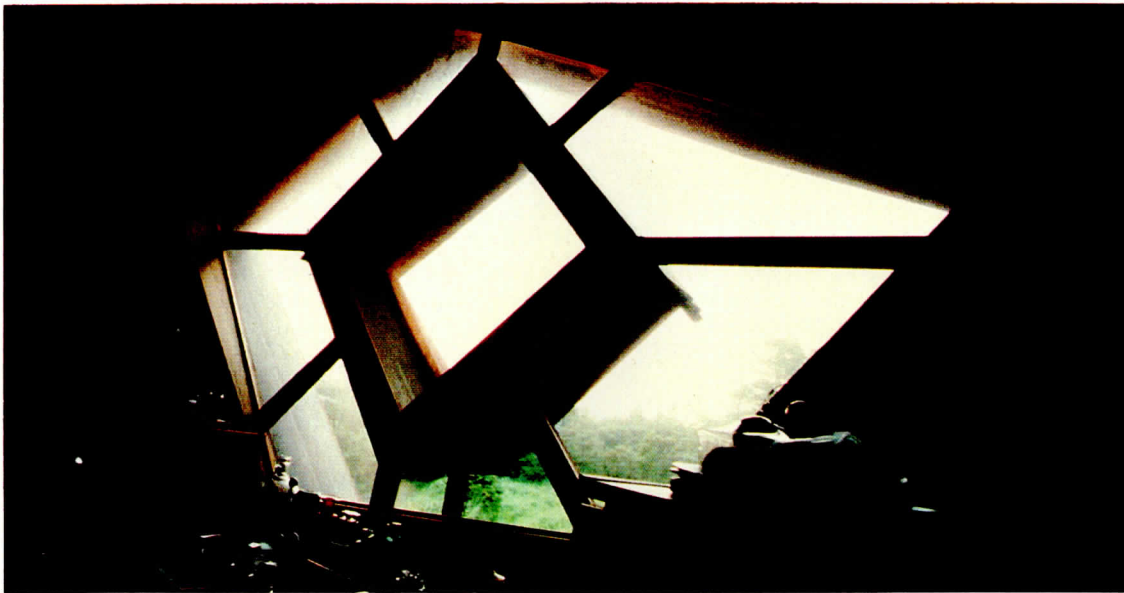
Yoshizaka is not a solitary phenomenon at Waseda. Perhaps the man most influential in setting the tone of the school of architecture there was Wajiro Kon (1888-1973), who pioneered the study of folk houses and contemporary urban, middle and lower class society. His study of the latter is notable for his empathy and indefatigable curiosity. Then there is Kenji Imai, another famous Waseda graduate and teacher, who introduced the work of Gaudi and Steiner to Japan.

Team Zo's work is also characterized by attention to details, idiosyncratic forms and, most evidently in Okinawa, a populist concern.

The wood crafted interior of Team Zo's Domo Celakanto has a Western style living room as well as a raised traditional tatami area (1-2). The dominant feature of the facade is a fish-eye window over the kitchen sink (3-4).

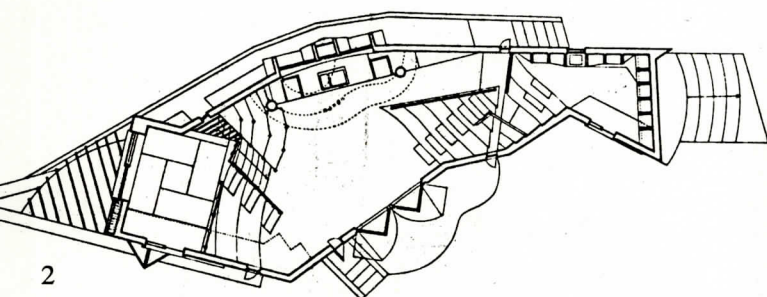


3



Photographs by Shuji Yamada

4



2

Team Zo's houses have distinctive images: Domo Barrela (barrel), Domo Celakanto (fish) and Domo Arabeska (flowers). Perhaps such explicitness in imagery is necessary to unify a building when the interest of the designers is by inclination drawn to matters of detail.

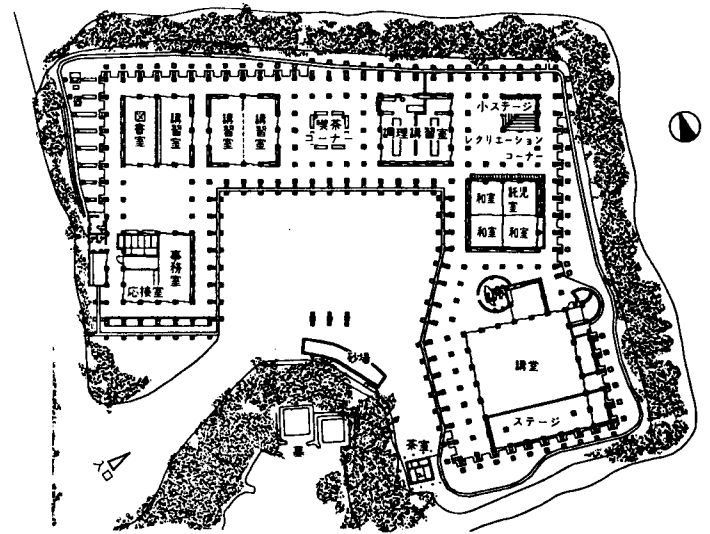
Domo Celakanto (1975), whose owner is a magician, is located on a hillside in Kamakura. The exterior of this fish image is dominated by a large eye—a window over the kitchen sink—and a gill-like projection, which is the bedroom. Entrance is via the fish's tail, and one arrives in the dining area and kitchen space at the center of the house. Steps up in the direction of the head of the fish lead to a sitting area and steps down take one to a bedroom. Doubling back toward the tail, up some stairs, leads to a study.

The building is an exuberant, inspired display of details held together by a strong overall form.



Photographs by Shuji Yamada

2



Since 1971, Team Zo has done work in Okinawa, including the Central Community Hall (1975) for Nakijin, a community of several villages with a total population of 11,000. The center is barely visible from the road, except for the red columns (now fading to pink) that support a roof overgrown with wood rose. The center is U-shaped in plan, enclosing a courtyard which is closed off by an old tomb mound. The most conspicuous feature of the center is the forest of 276 columns. These are concrete block with concrete poured in the center.

The center includes a hall seating 300, a recreation corner with a small stage, a nursery, various meeting rooms, a library, a refreshment area and a cooking lesson area, besides offices. Only half of the total covered area is enclosed; the rest provides shelter from the rain and strong Okinawa sun. A careful study of traditional community patterns in the area and the available technology has produced an economically built yet memorable building.

From the pragmatism of Ando to the Tantrism of Mozuna, from the biological imagery of Team Zo to the Cartesian geometry of Fujii—young Japanese architects have very different philosophies and styles. There often seem to be as many “isms” as there are architects. After a period of well-designed, unassuming buildings, we are again entering an era of assertiveness and rhetoric. Metabolism was the dominant movement of the '60s. It is not yet clear which if any of the positions mentioned above will dominate the '80s. □

The organic flower theme of Domo Arabeska is carried out in the interior stair (1) and exterior entrance details (2). The filtering of light through a sea of fading red columns at Nakijin Community Center (3) is reminiscent of traditional Buddhist temples in Nara. The 276 columns surround and unify the diverse community center functions and provide welcome shade in Okinawa's hot climate.



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As We Seem to Others: U.S. Places and People

America Observed. Paul Hogarth and Stephen Spender. New York: Clarkson N. Potter, Inc., 1979. 127 pp. \$25.

The poet Robert Burns wrote: "Oh, would some power the gift give us/To see ourselves as others see us!/It would from many a blunder free us/And foolish notion!" These words come to mind with this book in which two Englishmen combine their talents provocatively and handsomely. Artist Paul Hogarth's satiric art is buttressed by the graceful prose of Stephen Spender, one of the most admired of contemporary writers.

"The world knows America and Americans better than it does any other people," says Spender, "and certainly better than America knows the world." This may be due to the influence of Hollywood, he says, but it is caused as well by the "American attitude that all human behavior can be understood, analyzed, discussed, extracted and examined. There are no parts of body and soul so hidden that they cannot be unscrewed, taken out, named, washed, oiled, put back."

Spender says the thing that strikes him about our architecture, clothes, life style and even our faces is that we are really playacting in front of scenery. "American buildings seemed dressed for the part, or rather for a whole lot of parts, changing in different places. Again and again, in America, buildings seem a frantic scramble to fit themselves into the landscape."

He does not mean to imply, he says, that there are not American cities "in which a style dominates the surrounding landscape and crystallizes as a place with a certain look of civilization. Triumphs in stone, glass and steel of true American magnificence, the Chicago waterfront, buildings in Washington, D.C., and San Francisco, do suggest completeness, just as there is beautiful untouched landscapes and ocean, which contrast with the general inchoate sprawl."

Hogarth and Spender move through America, from coast to coast, stopping on the way in the South and the Midwest and Texas. Spender writes of the "visible excitement of the place as place" in New York City. He finds the buildings in Philadelphia to "have the dignity of the prose of the Declaration of Independence and the Federal Papers." Washington "makes

the greatest pretensions to representing American civilization," but it has no "viscera—a center that is a confluence of all its beauty and amenities."

Houston to Spender is an "immensely dynamic expanding city rushing into the future." But when the unsophisticated are asked what goes on in Houston, they say, "shopping centers." Chicago "tries tremendously hard, against tremendous odds." Its "real and lasting triumph . . . is that the area extending a few miles inland from the lake and seven or eight miles



'The further west one travels in America the more difficult it is to tell who is an authentic Westerner and who is just acting a role. In Arizona, New Mexico and California I have seen many people dressed as cowboys, but I am not sure which were the real ones.'

along its shore contains a historic anthology of the most splendid architecture in America. . . ."

For Spender, "Everything in California is large scale: great coastlines, huge estuaries, long beaches, mountain ranges, desert plains." Los Angeles, the "most amorphous of American cities," was made "pre-eminently for the automobile," while San Francisco is the "picturesque city, with all its postcard features." The Golden Gate Bridge is "one of the most beautiful achievements of engineering in the world. It lifts up your eyes—sometimes with the result of their seeing it like a rainbow unconnected with the earth between cloud rifts—and it leads your imagination to pagodas, bamboo structures of extraordinary lightness, green branches of pine trees to the foggy ocean edge, the Orient."

Spender summarizes his impressions of American cities by saying: "New York, Washington, Chicago, San Francisco, Houston—these are the termini where America dreams of the shape of its civilization. The first three look toward—and rival—Anglo-Saxon Germanic and central Europe. San Francisco and Houston seem today the most interesting because they leave this Nordic Europe behind, look south to Mexico and Spanish America and east to Japan and the rest of Asia."

If you are searching for a book to give a "thinking" friend, buy this one, but read it before you give it away, if you can bring yourself to part with it.

Planting Guide to the Middle East.

Aubrey Van-Ollenbach. New York: Nichols Publishing Co., 1979. 154 pp. \$35. **Landscape Design for the Middle East.** Edited by Timothy Cochrane and Jane Brown. London: RIBA Publications, 1978. 160 pp. \$16.50. (Distributed in this country by ISBS Inc., P.O. Box 555, Forest Grove, Ore. 97116.)

With all the construction going on in the Middle East, it is appropriate that books would appear on landscape design to enhance the architecture. These books point to the fact that the problem in landscape design in that part of the world is intense summer heat, lack of water and brisk winds. Both books, first published in England, will be of great interest to the American architect who has commissions in the Middle East.

Over recent years, says the author of *Planting Guide to the Middle East*, we've learned a lot about oil and politics in that area, but not much information has been forthcoming about what plants will survive to make the area more environmentally hospitable. It has been assumed, he says, that the range of vegetation is restricted because of hostile environmental conditions.

Van-Ollenbach, a horticultural expert whose tours of duty in the Middle East have covered a period of more than 10 years, has assembled available data on trees, flowering and foliage shrubs, climbers and creepers and tuberous and herbaceous plants capable of existence—and survival—in the Middle East. For each form of vegetation, he gives a description, its preferences, susceptibility to heat, saline tolerance, water requirements, resistance to wind and how it is propagated.

continued on page 78

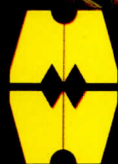
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Detailed appendices give further helpful information in tabular form on plant selection criteria.

Landscape Design for the Middle East is based on proceedings and papers of two symposia held in England. It also gives lists of suitable plants, but it is more theoretical in approach than Van-Ollenbach's book. Included are papers by authorities on such topics as the role of the landscape architect, the design of open space, irrigation techniques and maintenance.

Both books add considerably to the subject. One of the papers in the last book discussed makes a most valid point. The author points to a dilemma: "Our concerns for what belongs to a place and its physical characteristics, to a people and their traditions, and for function and economy, are at odds with the wishes of the people we are trying to serve." But once the landscape architect comes to terms with tradition and the harsh conditions of the Arabian peninsula, perhaps the desert will bloom appropriately.

Environmental Design Evaluation. Arnold Friedmann, Craig Zimring and Ervin Zube. New York: Plenum Press, 1978. 225 pp. \$22.50.

Design evaluation, the authors of this

book say, is a new area of study on which there is little specific literature. Hence, they offer the book in fulfillment of a need. Avoiding a theoretical approach, they have arrived at a format of case studies. The abstracts of evaluations, the authors say, have been done so as to not alter the meaning of the particular study nor to leave out salient points.

The introductory chapter discusses design evaluation, going into the major conceptual issues. A concluding section of the book suggests future directions in evaluation, gives a methodology, discusses such critical issues as sampling, reliability, validity and methods and discusses briefly the ethical concerns in evaluation.

There are three other major chapters, the first of which presents evaluations of interior spaces. The case studies abstracted concern an office landscape, a dormitory, subway stations, a hospital and a fine arts center. Following is a chapter on the evaluation of buildings as systems, and here are offered case studies on environments for the mentally retarded, a housing project and national parks visitor centers. The next chapter, on outdoor spaces, undertakes evaluations of a campus space, a bank plaza, an urban park, a housing site and planned unit developments.

In each instance, the case study heading

gives the title of the project, names of researchers, methods used, description of the project and information source. There is also a selected bibliography for those who want to read further on design evaluation.

Encyclopedia of Architectural Technology: An Encyclopedic Survey of Changing Forms, Materials and Concepts. Editor: Peter Guedes. New York: McGraw-Hill, 1979. 313 pp. \$24.95.

There are more than 500 entries by various contributors, including architects, in this encyclopedic work. It covers the stylistic periods of architecture, building types, structure, mechanical and environmental systems, materials and tools and techniques. There are also more than 800 illustrations to accompany the text, which is kept as nontechnical as possible. It is not a book to read at one time.

The index is essential to its use, and it is not always adequate. For example, if your interest is landscape and external space, there is a lengthy discussion, but you will not find the word "landscape" in the index, nor "space." To find it, it is necessary to refer to the table of contents in the front of the book. It, fortunately, is rather complete. Nor are the articles signed, although there is a list of contributors after the title page. □

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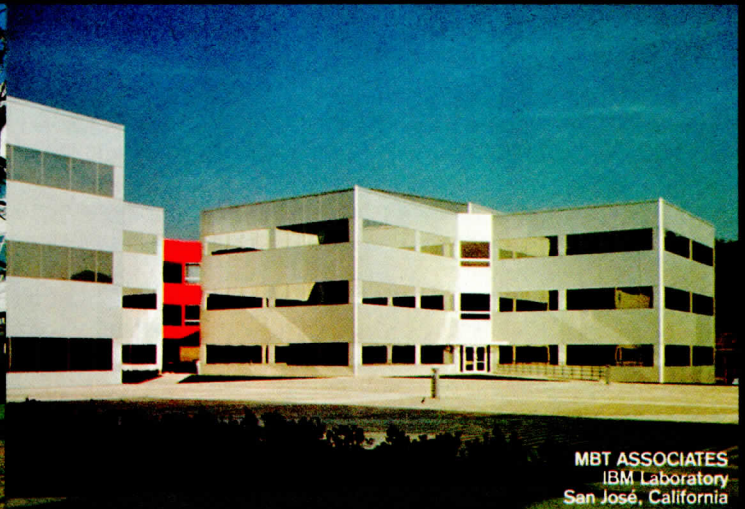
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Letters from page 6

almost an entire block for a regional shopping mall of a type normally found in the outer reaches of suburbia. Left standing, however, were the facades of some late 19th and early 20th century buildings—remnants of antiquity perhaps. The sorry business recalls the criticism made more than 50 years ago by the Institute's 1924 committee on community planning (Clarence S. Stein, chairman): "It is not architecture that the American city needs under the present mode of development, but scene-painting."

John C. Murphy
Attorney at Law
Baltimore

On page 61 of the article on "Adaptive Abuse," it is stated that "many 'preserved' buildings in isolation have an almost startled look, as if they were a guilty survivor of some holocaust." What these words imply is that the survivors of holocaust were guilty. I wonder if the author really means this.

Purnima Gupta
Chicago

The Author Replies: Although the poverty of much architect-created effort in our cities referred to by Mr. Dean is acknowledged in the "Adaptive Abuse" article, and is the subject of a book I'm working on called *The Architecture of the Absurd*, of which the article is a part, he recapitulates the fallacy of the power of professional architects. He seems angry that I emphasize the importance of design and the absence of professional architectural input in preservation.

What I am talking about, rather than an assertion of the omnipotence of architects, is their relative impotence in even matters involving the preservation of architecture. Why I emphasized *registered* architects is that this is the only available test of practical, "in the world of real compromises" experience. It is therefore remarkable and telling that two federal agencies—the Advisory Council on Historic Preservation and the Office of Archeology and Historic Preservation—who daily review actual, inherently compromised, practical architectural projects, have such a radical imbalance between architect and historian reviewers. I have the greatest respect for historians, but in architectural design review at ACHP a proportion of one registered architect to 25 others, mostly historians, tells us a great deal about the historicism of the preservation movement and its unfamiliarity with the problems of practical environmental design.

Mr. Murphy of Baltimore apparently is not aware that there were two competing proposals for the retail district in his city. One did involve more demolition and might be said to draw some analogies to a "regional shopping mall of a type nor-

mally found in the outer reaches of suburbia," in his words. Ours, however, was the *other* proposal which stressed a conservationist approach. The present direction being pursued by the city is a supposed compromise between these two opposing views.

Official policy to retain some facades as a last ditch effort if the buildings cannot be maintained by some future developer was the result of agreements between city and state preservationist groups and city agencies in which we were not involved. The preservationist officer's quotation on saving buildings ("you do not kill your children, even the ugly ones") undenied by Mr. Murphy was introduced to show the extent of counterproductive emotionalism in some preservation efforts such as the equation of inanimate structures with the lives of children.

And in response to Mrs. Gupta. A common emotional/psychological reaction of survivors of terrible tragedies has been widely reported to be one of guilt, i.e., "Why was I not taken?" Since urban renewal was for our older downtown buildings a kind of architectural holocaust, I used the phrase to heighten the effect, nothing more.

Arthur Cotton Moore, FAIA
Washington, D.C.

Exception Taken: The review in the Mid-May issue (p. 264) of my book, *Supermannerism*—for better or worse, the only summary of 1960s architecture that we have at present—does a doublethink disservice to the readers. Instead of description or information, the reviewer [R. Leonard Miller] offers itchy oneupmanship. But more important, he misses main points.

If there is one strong contribution that the book makes to the discussion of what the reviewer calls "the fabled New Haven-Philadelphia axis," it is tracing the origin of that axis to its forceful emergence at Princeton. There Louis Kahn and Jean Labatut first strongly influenced the work and thought of Robert Venturi, Charles W. Moore, Hugh Hardy and others. The axis should be referred to as the New Haven-Princeton-Philadelphia axis. The reviewer should bend his axis to rest on Princeton.

Then he states that the book posits that the seminal invention of the 1960s was supergraphics. The book goes to great lengths to make clear—both in the placement of the discussion of that exercise and in the history of the ultimate dismissal of that technique by its originators—that supergraphics was merely one playful decorative device within an overall series of new attitudes. It is erroneous to imply that I think it was seminal.

But more important is the reviewer's presumption that the subtitle of the book

—*New Attitudes in Post-Modern Architecture*—is a publisher's decision. I take full responsibility for that decision and I justify it on the grounds that the term has been used by the art world for over 25 years to describe art since the 1950s.

That prominent spokesman for the postmodernism of the 1970s, Robert A. M. Stern, has himself traced the use of the word (*Harvard Architectural Review*, September 1979) to Arnold Toynbee's prominently "influential" use in 1954 and earlier, in 1945, to Joseph Hudnut, who was dean of Harvard's graduate school of design during Walter Gropius' chairmanship. Clearly there have been postmodernist rebellions against modernism since the early work of those distinguished Harvard graduates of the 1940s—Johnson, Rudolph, Johansen, et al. The term postmodern—to have greater value and longer usage than designating only a 1970s investigation—should, I feel, be recognized as referring to that overall period from 1949 to 1980—that is, to the successive rebellions against the high modernism of 1922-1940. "Supermannerism" might come to designate the 1960s' subperiod as a precursor of that final burst of recognition and supremacy in the 1970s, but it is surely a part of the overall postmodernist revolution.

Finally, if the Yale reviewer attacks the book as a memoir, why does he conclude the review with inside Yale gossip in that vein? If *Supermannerism* is memoir as the reviewer suggests, then his memory indicates significant lapses.

C. Ray Smith, AIA
New York City

The Reviewer Responds: Regrettably, C. Ray Smith seems to find humor and mixed messages to be good fun in architecture and dirty pool in criticism.

Smith's lapses admittedly tempt needling. His larger enterprise—architectural writing that combines the contemporaneity of journalism with the depth of history—compels praise. Smith, as he points out, is not only the only person doing this, but he can do it damn well. This is why it is so important that he not get distracted. His ontological argument for postmodernism, as an example, is enough to make anyone itchy. Sure, you can apply terms about art criticism and linguistics and gaming theory to architecture, but the fact remains that until quite recently "postmodernism" in architecture has been a tiny tail of work wagging a very big intellectual dog.

I fully agree about Princeton. Happily, unless the projection of my map is off, no bending is required to put Princeton on the axis. Newark, too, is sitting there, waiting.

R. Leonard Miller
Washington, D.C.

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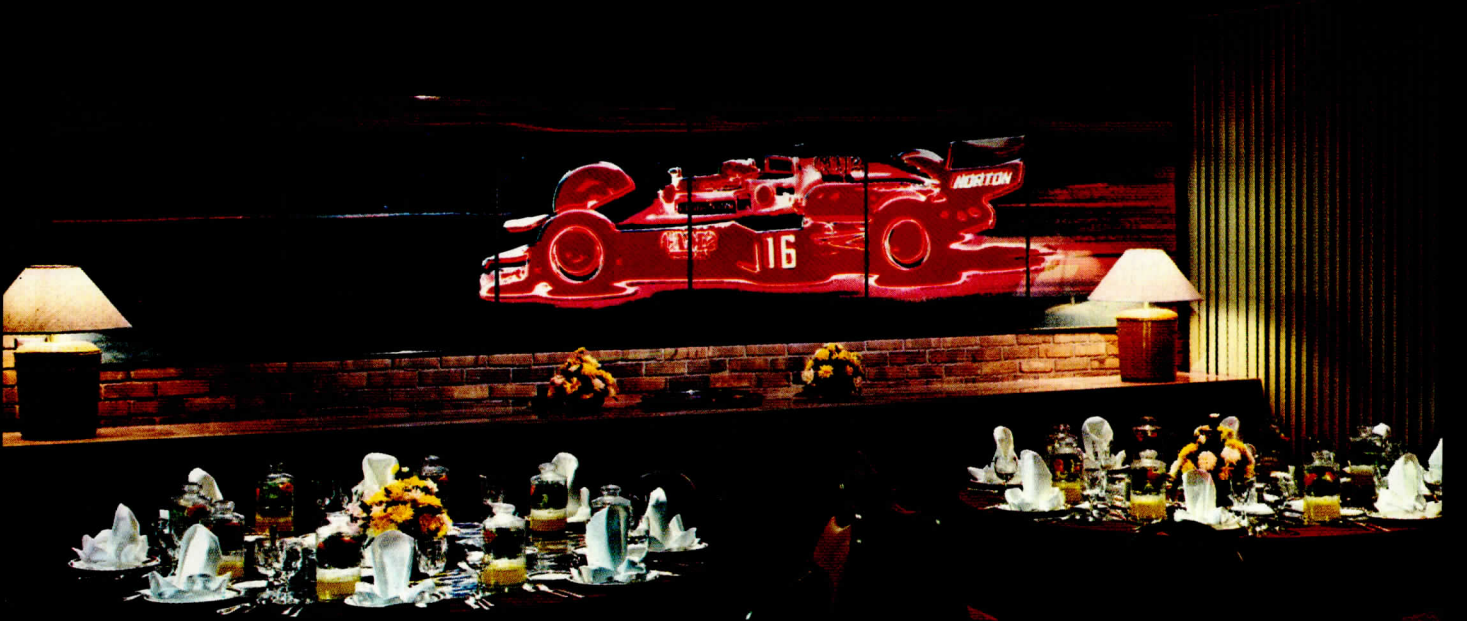
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Government from page 36

selection process. The amendment may be in conflict with the state's consultant competitive negotiations act, which requires A/E selection for state and local work to be made on the basis of competence and qualifications rather than price bidding. The Florida Association of Architects/AIA has joined with other professional associations in protesting the transportation department ruling.

• Alabama's state building commission issued a memorandum which said that state institutions and public school boards would be required to select at least three A/Es, secure technical and price proposals and award the contract to the lowest bidder, "unless extraordinary circumstances preclude" such a manner of selection. Several months ago, Governor Fob James expressed opposition to the selection of A/Es on the basis of competitive bidding. The Alabama Council of Architects/AIA, also in opposition, has been working with state engineering groups on the matter. Meanwhile, the governor has appointed Rex Rainer, state highway director and an engineer, to investigate selection procedures. At a meeting in Mobile on Oct. 10, Rainer said that the "unfortunate memos" issued by the state building commission were no longer in effect. He assured A/Es that services on state contracts would not be determined

on a low-bid basis, but on ability.

• New Jersey does not currently have a selection law. Selection of A/Es is by administrative rules. The state's division of building and construction recently announced a ruling that would require price proposals to be submitted. A/Es in the state protested the ruling so vigorously that the state agency scheduled a Nov. 1 public hearing at the convention of the New Jersey Society of Architects/AIA. Arrangements were made for witnesses from the federal government and from states with A/E selection laws to testify on behalf of the federal procedure.

• Virginia's joint legislative audit and review commission released the results of a study of the capital outlay process which pointed to "numerous deficiencies" in A/E selection procedures. John E. Wilson, FAIA, of Richmond was appointed as a public member of a legislative committee undertaking a study of selection procedures. Public hearings were held by the committee in August and September, and Wilson says that a "work session" will be conducted as a result of the hearings and that a report will be prepared for the next legislative session. The principal objection to the status quo on the part of legislators, says Wilson, is the "concentration of work in a small number of offices." He foresees some changes in the A/E selection process in Virginia, such as pub-

lic announcement of the intent to use professional services, but with final decisions on selection probably being made by individual state agencies.

• In Georgia, the governor's office will be working with A/E groups next year to develop a selection procedure and/or legislation. An interprofessional committee has been formed in Mississippi which is endeavoring to address the subject of A/E selection in that state. As a result of publicity in the media which called attention to the "political nature" of A/E procurement in Tennessee, the state building commission is seeking recommendations for revising A/E selection procedures.

A/E procurement procedures have "serious implications for the practitioner involved with public sector work, as well as implications for AIA policy and future positions on A/E selection at the state and local levels," says Elizabeth Chalmers, who heads AIA's state government affairs department. Consequently, a meeting with the department and various AIA components was called for late in October (too late for coverage in this issue of the JOURNAL). The aim of the discussions was to seek ways in which AIA can best support component efforts and give both short- and long-term assistance in finding solutions/directions for the selection of A/Es for public design work.

News continued on page 86

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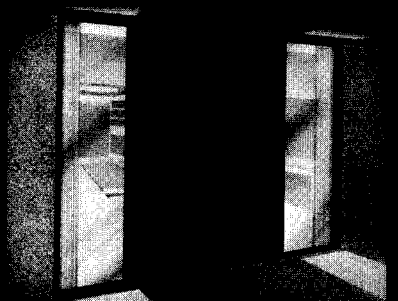


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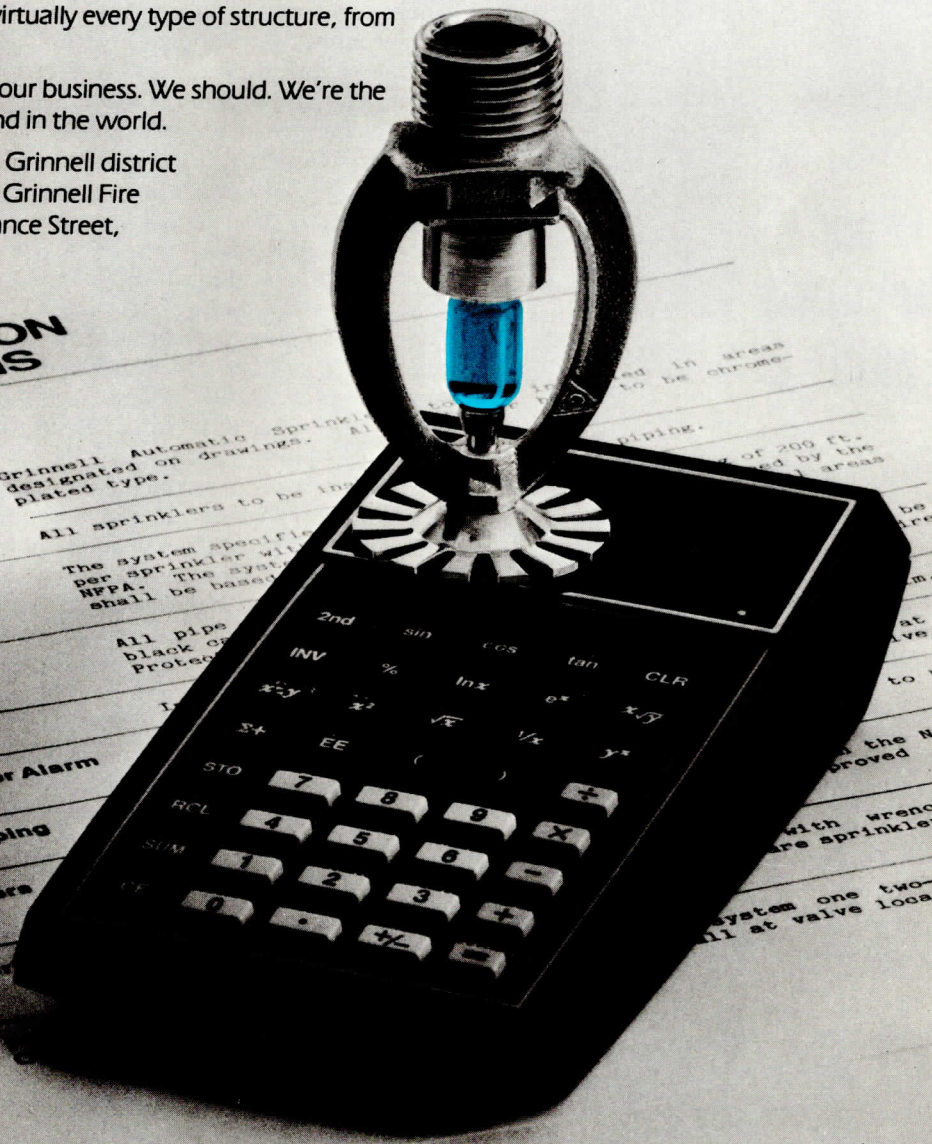
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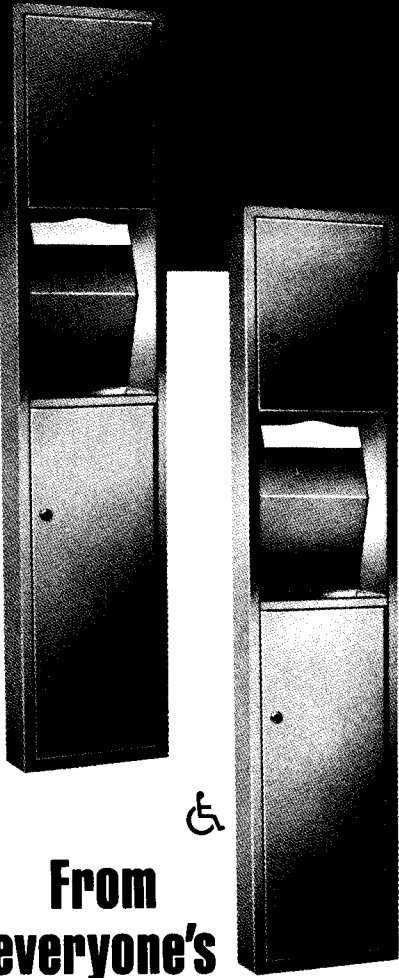
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Business/City Partnership Seen As '80s Urban Policy Direction

Mobilizing private investment in the cities must be the primary goal of the nation's urban policy in the '80s, said Stuart Eizenstat, director of the White House domestic policy staff. Eizenstat spoke to a group of mayors at a recent national urban policy conference in Washington, D.C., sponsored by the U.S. Conference of Mayors, the National League of Cities and HUD.

Eizenstat emphasized that the first urban policy of the Carter Administration only charts the path. To implement that, said Eizenstat, the nation will have to face the realities of the '80s: long-term high inflation, rising energy prices and problems related to a federal budget deficit.

The Carter Administration will announce a second urban policy sometime next year. Eizenstat suggested that it will be patterned after the previous policy. "The key principles guiding the urban policy will be to target funds, use limited federal resources in the most effective way to leverage private funding and emphasize jobs and structural employment. The urban policy must have a long-range focus on economic development." The Administration, added Eizenstat, will examine the state share of general revenue sharing and countercyclic revenue sharing.

Harry Cisneros, city councilman in San Antonio, Tex., agreed with the need for a city/industry partnership. "The problems of the cities are the same problems of industry. We need to coordinate industrial retooling and retooling of the cities. Industrial retooling could spur city re-birth." Cisneros said the fiscal crisis in the nation's largest cities is often due to the drain of revenue to suburbs. He suggested that city governments examine the fiscal arrangements between city and suburbs to see if the tax structure should be changed.

The need for better education, housing, health care and jobs was stressed by Jessie Rattley, first vice president of the National League of Cities. She and others warned against dislocation: "What have we gained if cities are better places to live but we drive poor people out?" Rattley suggested the following: More attention should be given to the effects of federal policy to ascertain whether existing legislation is working. Cities should be approached as total units. What does the city do for people in a specific place? City government can influence the business sector. There could be tax measures for business to accumulate capital to create new enterprises and jobs. Cities can work with private utilities for energy conservation. New urban government forms should be developed to better match reality, set specific goals and see that they are accomplished.

Cities should start to do comprehensive energy planning, she said.

Robert Embry, assistant secretary of HUD, emphasized the need for an impact analysis of how governmental programs affect cities. Mayor Richard Carver of Peoria, Ill., agreed: "We must take into account all elements that affect our cities, such as federal actions, state actions, incentives or 'disincentives.'"

'Attack on Energy Waste' Waged By New Transportation Secretary

Secretary of Transportation Neil Goldschmidt has sent to Congress legislation which he calls a "three-pronged attack on energy wastefulness." The Transportation Energy Efficiency Act of 1979 is proposed for (1) meeting the growing public demand for mass transportation, (2) making more efficient use of private vehicles and (3) improving fuel efficiency and automobile safety through research. Secretary Goldschmidt emphasizes that the act is a companion measure to the Administration's proposal to tax profits created by decontrol of the domestic oil industry and to create, with the revenues, an energy security trust fund. He says that the bill would provide \$16.5 billion over 10 years for federal transportation programs.

The money would be divided into these categories: \$13 billion for investment in bus and rail mass transit systems "to meet the unfilled and growing public demand," which is expected to increase as fuel for private vehicles becomes more expensive; \$2.5 billion for making better use of private vehicles through carpooling, vanpooling and other energy saving measures; \$800 million for research to involve the "best talents of industry, universities and government" in the development of new technology for more fuel efficient cars during and beyond the 1990s, and \$200 million for applied research to improve automotive fuel economy after 1985.

It is estimated that under existing legislation and programs, federal grants of \$27.5 billion will go to urban transit systems during the next decade. Under the proposed legislation, federal funding would increase to \$40.5 billion with the new monies coming from the windfall profit taxes. The amount, combined with a \$9.5 billion local share, says the Department of Transportation, would raise capital investment in the 1980s to \$50 billion—double the \$25 billion spent in the 1960s for the lunar landing program.

According to DOT, \$12.1 billion of the new mass transit funds would "be made available as discretionary capital grants for increased bus purchases, bus rehabilitation, extension or construction of existing or approved rail mass transit systems and related facilities such as passenger

terminals or shelters." The remainder of the new funds—\$900 million—would increase the budget of existing programs to fully authorized levels.

New Senate Building Refunded

The House and Senate have agreed to appropriate \$52.5 million for continued construction of the controversial Hart Senate office building, putting its cost ceiling at \$137.7 million. Last year, the House refused to extend funds for the building on Capitol Hill, criticizing such features as a rooftop garden restaurant, saunas and gym. The Senate had appropriated \$57.5 million, with a \$142.6 million ceiling, but accepted the House figures.

Designed by the architect of the Capitol and John Carl Warnecke & Associates, the building will house 50 senators, their staffs and committee staffs. Exterior materials will be like other Capitol Hill buildings—marble facade, copper roof—but the Hart structure will be a contemporary design rather than classical. Open offices are planned. The appropriation is part of a land and water resources bill, which also includes appropriation for the Tellico Dam in Tennessee, and was signed into law by President Carter.

Urban Parks Receive \$17 Million

Grants in the amount of \$17 million to park systems in 44 cities and counties have been announced by the Department of Interior under authorization of the Urban Park and Recreation Act (PL95-625). Congress has authorized \$725 million for grants to urban areas over the five-year life of the program, the first appropriation of \$20 million having been made in July.

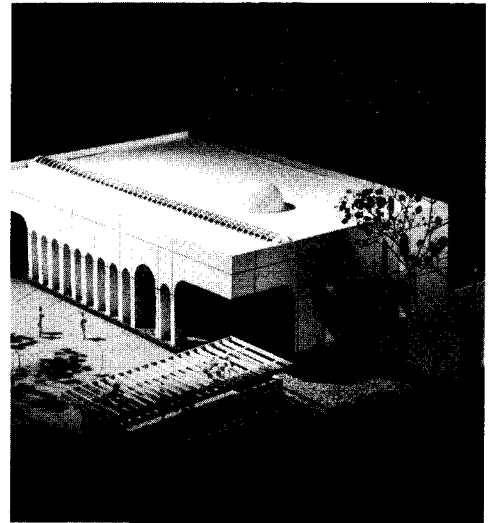
The program provides matching grants to local governments in three categories: rehabilitation grants for renovating, expanding or developing existing outdoor or indoor recreation areas and facilities; innovation grants to demonstrate cost-effective ways to enhance park and recreation opportunities at the neighborhood level, and recovery action program grants to aid in the preparation of resource and need assessments, coordination, citizen involvement and policy development activities.

The grants program, administered by the Interior Department's Heritage Conservation and Recreation Service, is aimed at "retrieving opportunities to enjoy the urban environment," says Interior Secretary Cecil D. Andrus. "These projects embody the very meaning of conservation in the city. Recreation is necessary to a thriving city environment—an environment where people not only work well, but live well too."

Embassy Building Group Shown

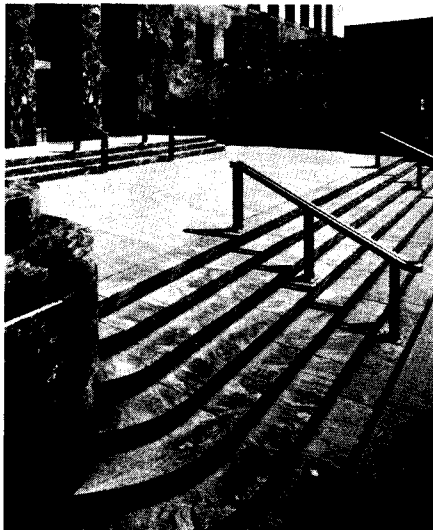
Embassy row in Washington, D.C., famous for its display of foreign and American architecture, is to be augmented by International Center, an area set aside for future foreign chanceries.

Land for new embassy buildings is increasingly scarce or restricted and the need has steadily increased since World War II. So in 1968, the National Capital Planning Commission proceeded with plans to transform the former National Bureau of Standards parcel on upper Connecticut Avenue into a center for foreign chanceries, having been authorized by legislation in 1966 and by a presidential direction in 1967. The first plan

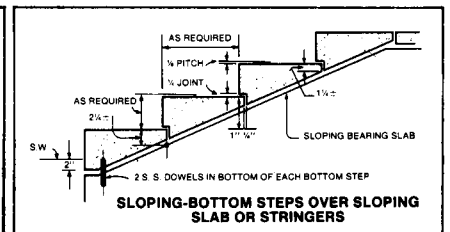
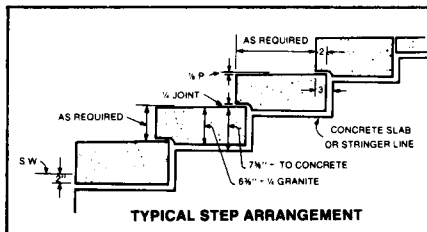


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Government from page 87

was to acquire a multiblock segment north of Washington Circle, but the cost proved prohibitive.

Recently, the first five building proposals were approved by the Department of State, the Commission of Fine Arts and the planning commission for the following chanceries: Ghana (architect, Brown & Wright and Vik Adegdite of Ghana); Israel (Cohen & Haft, Holtz, Kerxton & Associates); Yemen (Georgetown Design Group); Bahrain (The Architects Collaborative, p. 87), and Kuwait (the New York City office of Skidmore, Owings & Merrill).

To give cohesion to the center, the landscaping of each chancery must be integrated with the master plan. Maximum height of the buildings has been set at four stories. Attempts have been made to design a contemporary structure which reflects the national heritage of each sponsoring country while supplying at the same time the services required by a chancery. All but one proposed building have atria.

The plans for the approved buildings and other projected developments on the site are on display at the Octagon through Dec. 30.

News/Awards

Barnes Wins Sullivan Honor, Is Cited for Use of Masonry

Edward Larrabee Barnes, FAIA, whose architectural practice is headquartered in New York City, is the recipient of the 1979 Louis Sullivan award for architecture, given every two years by the International Union of Bricklayers & Allied Craftsmen. The award is made by a jury chosen by the union and AIA and honors a practicing U.S. or Canadian architect "whose work is deemed to best exemplify the ideals and achievements of the late Louis Sullivan, the father of modern architecture."

Over the years, the jury said, Barnes' "buildings have been uniformly sensitive to their surroundings, restrained in their use of materials, thoughtful and clear." John T. Joyce, secretary of the union, said that "Barnes is one of those architects who knows what masonry can do, who is confident in his use of materials and who applies masonry in ways that are at the same time traditional and fresh."

Members of the jury to make the award were Lewis Davis, FAIA (chairman);

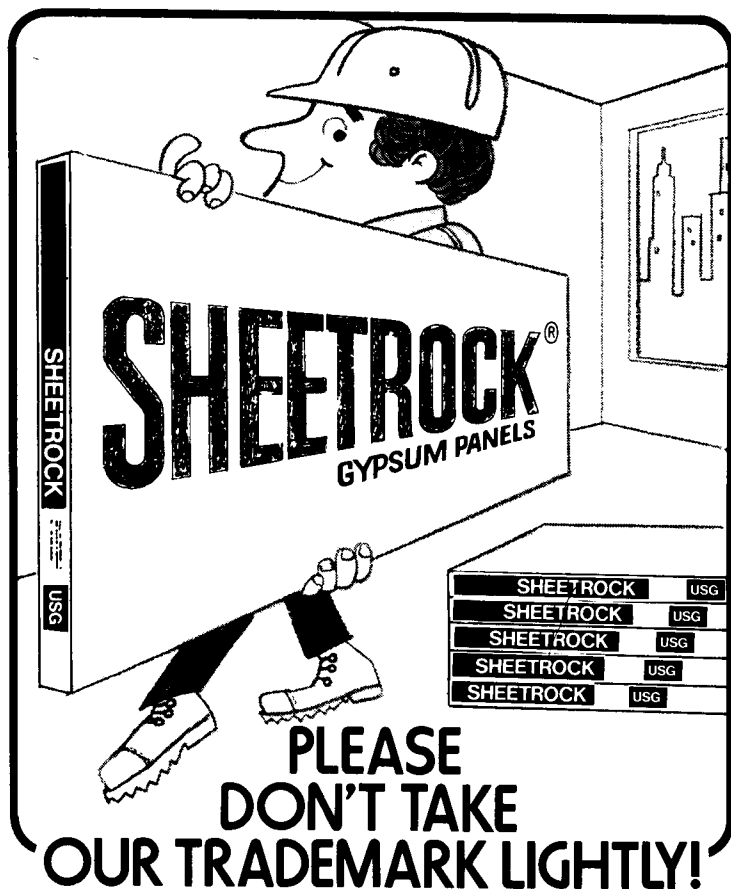
John H. Burgee, FAIA; Donald Singer, AIA; Arthur Erickson, Hon. FAIA; Barton Myers of Barton Myers Associates; Alton Parker, AIA associate member, and Jonathan Foster, student at Harvard University.

Previous winners of the Sullivan award have been Ulrich Franzen, FAIA; Hartman-Cox; Philip Johnson, FAIA, and Davis, Brody & Associates.

Kahn Collection at Pennsylvania Gets \$21,000 from Bricklayers

The International Union of Bricklayers and Allied Craftsmen honored the late Louis I. Kahn, AIA gold medalist, at its general board meeting in San Diego recently. More than \$21,000 in contributions by masonry groups was presented to the University of Pennsylvania for the preservation, cataloging and display of the Louis I. Kahn architectural collection. The collection, owned by the Pennsylvania Historic and Museum Commission, is on permanent loan to the university (see Sept. '78, p. 39).

"Louis Kahn's untimely death five
continued on page 92



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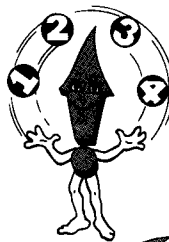
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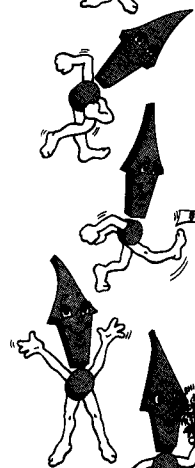
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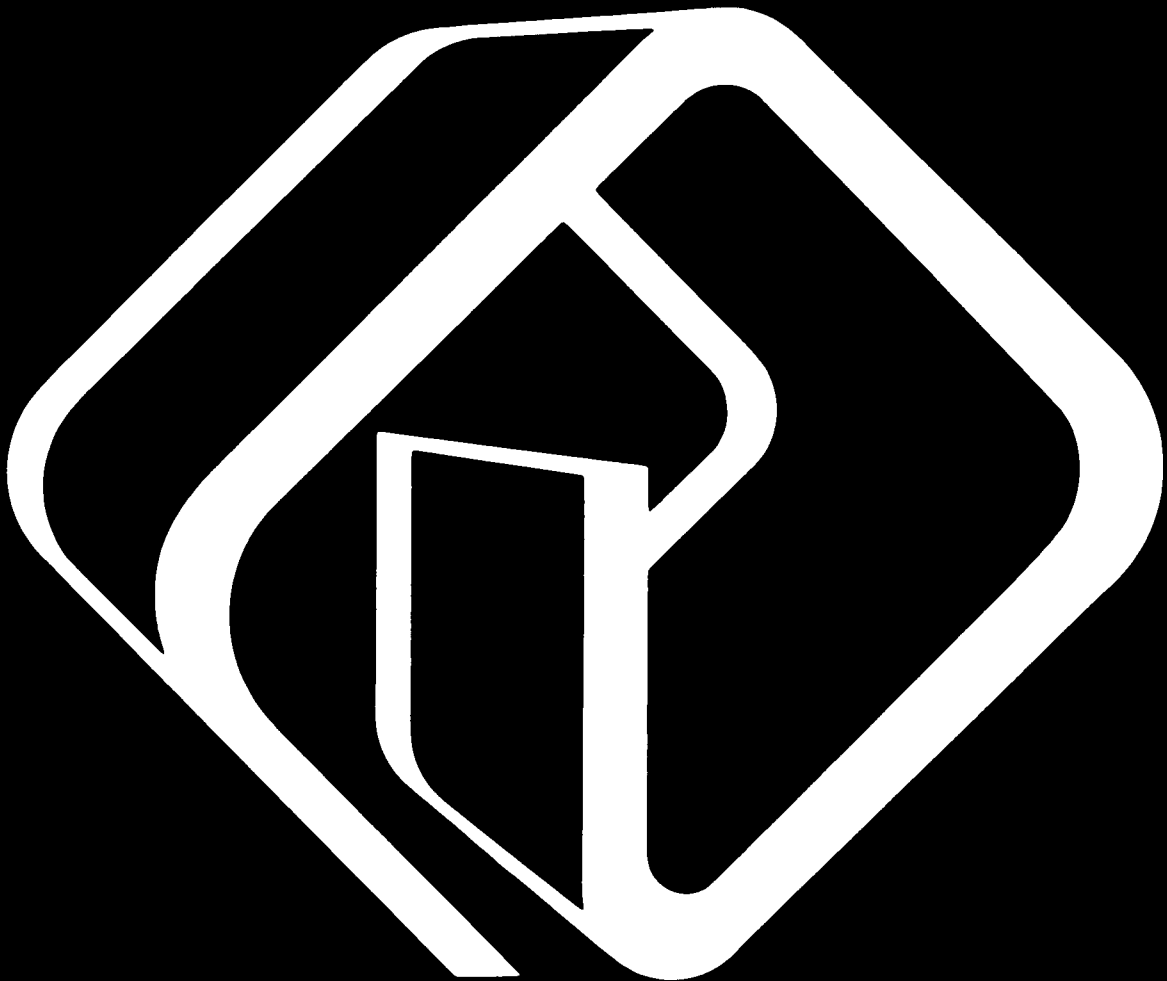
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Awards from page 88

years ago robbed us of a chance to pay appropriate homage to him when he was alive," said John T. Joyce, BAC secretary. "It seemed inevitable to me, though, that an opportunity should be created some time, some place, for masonry to pay its respects."

In honor of the occasion, BAC invited one of Kahn's clients to be present—Dr. Jonas Salk, founding director of the Salk Institute in La Jolla, Calif., designed by Kahn. "Great architects deserve great clients, but they don't always get them. Louis Kahn was fortunate to have Dr. Jonas Salk as his client. And Dr. Salk was fortunate to have Louis Kahn as his architect," said Joyce.

In response, Dr. Salk said that out of the relationship of client and architect "grew a friendship and an association that transcends almost any that one could experience. . . . Lou Kahn took advantage of all of the opportunities that were presented to him, and I had the good fortune to have had an opportunity to work with him where he honored the opportunity and produced a masterpiece." Dr. Salk said that Kahn had once told him that of all the structures with which he had been associated, the only one to "exceed his expectations was our institute."

In accepting the honor for Kahn, Peter

McCleary, chairman of the university's department of architecture, said that the "legacy of Kahn as a teacher in this country and elsewhere is unequaled, and Lou had a great respect and love for teaching. It was clear in his bequest that after his death, his drawings, designs and documents be made accessible to students of all ages and degrees."

The Kahn architectural collection contains, said McCleary, 300 of his major drawings, 4,000 working sketches and five sketch notebooks. "We have 10,000 drawings from his office, 41 models and 75 boxes of photographs and thousands of other slides. Actually, those file boxes, rather than being photographs, are really the documents and letters related to each contract."

When the collection first came to the university, it was estimated that \$50,000 would be needed for remodeling the building to house the collection and \$150,000 for preparation of materials.

'Innovations in Housing' Cited

Dale R. Leyse, a member of the Spokane, Wash., firm of Steve Ronald & Associates, and Daniel L. Griffith, associated with the firm of Tan, Brookie, Kundig, have received the first award in the 1979 "innovations in housing" awards program. One of

the key elements in the winning design is an all-glass greenhouse along the southern side of the house. The design will be constructed as a single-family home later this year. There were also six citations of merit and a special citation of merit.

The awards program was established in 1978 by the American Plywood Association and the magazines *Better Homes & Gardens* and *Progressive Architecture*.

Members of the jury were Robert Burley, FAIA; James A. Murphy, *Progressive Architecture*; Charles Patmon III of Patmon Co., Inc., Stockton, Calif., and Noel B. Seney, *Better Homes & Gardens*.

'Religious' Buildings Honored

The Interfaith Forum on Religion, Art and Architecture has selected two projects for honor awards in its 1979 architectural design awards program. The winners are Walton, Madden, Cooper, Inc., of Riverdale, Md., for the design of the Julia Bindeman Suburban Center, a private school in Potomac, Md., and Lawrence D. Cook, AIA, of Falls Church, Va., for the Columbia Retreat, a place for groups from a large congregation, in Winchester, Va.

Merit awards have been presented to Anderson, DeBartolo, Pan in Tucson, Ariz., for St. Mary's Convent in Tucson; *continued on page 94*

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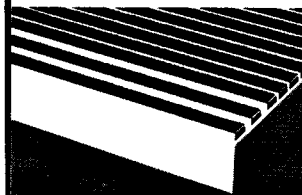
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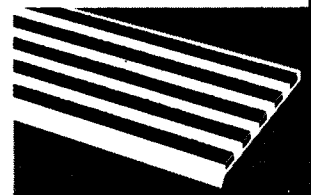
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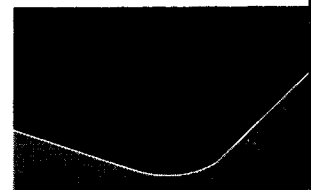
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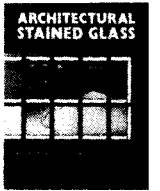
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Awards from page 92

C. Edward Ware Associates, Inc., Rockford, Ill., for Christ Church of Oak Brook, Oak Brook, Ill., and Brixen & Christopher, Salt Lake City, for the Synagogue for Congregation Kol Ami in Salt Lake City. Armstrong, Torseth, Skold & Rydeen, Inc., of Minneapolis received an honorable mention for the design of St. John Neumann Catholic Church in Eagan, Minn.

Judging occurred during the 40th national interfaith conference in Phoenix. Jurors were Pietro Belluschi, FAIA (chairman); Robert C. Hershberger, AIA; Calvin C. Straub, FAIA; Rabbi Albert Plotkin, Father Brian Fenlon, and Edward A. Sövik, FAIA.

Fitzpatrick Award to Economist

Nathaniel H. Rogg, the late chief economist and executive vice president of the National Association of Home Builders, is the posthumous recipient of the F. Stuart Fitzpatrick award, given annually for "outstanding individual achievement in the unification of the building industry." The award is sponsored by six organizations, AIA among them.

In selecting Mr. Rogg, who died in February 1979, the jury said that he was a "talented economist whose skills in mediating and representing the interests of both the public and private sectors were invaluable in the days of litigious conflicts between government and business." He was praised as well as the chief initiator of the national housing goals, a concept which has led to the construction of thousands of dwelling units for those in need. "His ability to form the whole picture from the minute details and statistics was an inspiration to the decision makers in the nation's largest and most complex industry," the jury said.

The award was made in October during Build Expo '79 sponsored by the Producers' Council, Inc., also one of the sponsors of the award. The other four participating associations in the awards program are Associated General Contractors, Building Research Advisory Board, NAHB and National Institute of Building Sciences.

DEATHS

Bill Chafee, Denver

Henry James Hastings, Santa Barbara, Calif.

Daniel A. Hopper Jr., Irvington, N.J.

Albert J. Huber, FAIA, Philadelphia

G. H. Ketcham, Riviera Beach, Fla.

Joel Lyns, Miami

Eric Menke, Washington, D.C.

F. H. Naegela, Venice, Fla.

Roland Pierson, South Pasadena, Calif.

Robert Pratt Jr., Pasadena, Calif.

Beverly Robinson, Washington, D.C.

Daniel Salcedo, Galveston, Tex.

Fred Treffeisen, New Rochelle, N.Y.

Draver Wilson, Los Angeles

Gio Ponti, Hon. FAIA: Probably best known for his design of the Pirelli skyscraper in Milan, Italy (1955-58), which was erected around a hidden structural concrete core by architect/engineer Pier Luigi Nervi, Mr. Ponti was also acclaimed for the design of two Montecatini Co. office buildings in Milan (1936 and 1951) and for the building for the faculty of mathematics at Rome University City (1934). Catholic in his painting and designing talents, his works included ships' interiors, costumes and scenery for Milan's La Scala, light fixtures, silverware, furniture and porcelain. Mr. Ponti, who died on Sept. 15 at the age of 87, also taught at Milan University's school of architecture and was publisher of the Italian magazine of design, *Domus*. He designed a showroom for Alitalia airlines in New York City, as well as an auditorium in Manhattan's Time-Life Building.

Joseph P. Richardson, FAIA: A senior partner in the Boston firm of Shepley, Bulfinch, Richardson & Abbott Inc., Mr. Richardson was president of the Boston Society of Architects/AIA in 1968 and a director in 1968-69. His firm won AIA's firm award in 1973 for its consistent production of "distinguished architecture." Among its designs are many buildings at Harvard University and Smith and Wellesley Colleges, as well as the renovation of Trinity Church. Mr. Richardson, who died on Sept. 14 at the age of 66, earned bachelor's and architectural degrees from Harvard. His public services included membership on the Brookline, Mass., building commission. During World War II, he was a commander in the Navy, winning the Bronze Star.

BRIEFS

An annual recognition program is announced by the National Endowment for the Arts' design arts program "to capitalize on a \$23 million investment in small seed grants that the program has awarded since 1966." Eligible for entry is any grant given between 1966 and 1978. Deadline for entries is Dec. 3. Contact: Design Arts Program, NEA, 2401 E St. N.W., Washington, D.C. 20506.

The University of Southern California's school of architecture and the City of Los Angeles have been awarded a contract from the Solar Energy Research Institute to study the development of a "solar envelope" zoning concept that would ensure access to the sun for newly constructed buildings in dense urban areas. Research

aspects are being conducted by Ralph Knowles and Richard Berry of the USC faculty.

Cacheted envelopes with the "Architecture USA" stamps are available from AIA's department of publications marketing. The cachet was designed by Artmaster of Louisville, Ky., for AIA. The price is four for \$1, and orders must be prepaid.

"**Acoustics and the Open Plan**," written by James E. Sulewsky, AIA, gives some excellent guidelines to the designer of offices. Write for a copy from: American Seating Co., 901 Broadway N.W., Grand Rapids, Mich. 49504.

James Rush Jarret, AIA, of New York City is the recipient of the Arnold W. Brunner scholarship for 1979, a national annual grants program administered by the New York Chapter/AIA. He will work on a proposed book on Pope Sixtus V and the creation of baroque Rome.

Robert Lee Wold, AIA, of Grand Rapids was recently re-elected chairman of the Michigan State Board of Registration for Architects, Professional Engineers and Land Surveyors, the youngest chairman in the board's 40-year history.

The Occupational Safety and Health Administration has issued a paperbound volume that lists all the general industry safety regulations employers must follow. The price is \$6.50. Contact: U.S. Government Printing Office, Washington, D.C. 20402. Order by no. 029-015-0054-6.

New mandatory requirements for life cycle cost analyses in all new and existing federally owned and leased facilities will be explained in a series of upcoming regional workshops sponsored by the Department of Energy and conducted by the National Bureau of Standards. For information, contact Rosalie Ruegg, Center for Building Technology, Building Research A319, NBS, Washington, D.C. 20234.

A 12-volume "**Universal History of Architecture**," in the making for 40 years, has been published in the Soviet Union. The work of Soviet specialists, the edition has many "firsts" to its credit, according to the information officer of the USSR embassy in Washington, D.C. Copyright to some volumes has been bought by foreign book publishers.

Roland A. Gallimore, AIA, who died in 1977, is the first recipient of an award established in his name by the Interior Design Council. He was a principal in the firm of Geddes Brecher Qualls Cunningham. Individuals or firms to receive

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