

[A Simmons-Boardman Publication]

AMERICAN BUILDER

and Building Age

NAME REGISTERED U. S. PATENT OFFICE AND CANADIAN REGISTRAR OF TRADE MARKS

NOVEMBER, 1934

MANUAL OF MODERNIZATION AND OF NEW CONSTRUCTION

56th Year

Vol. 56—No. 11

BETTER HOMES

BETTER BUSINESS

BETTER HOMES MEAN BETTER BUSINESS. THE AMERICAN BUILDER ENDORSES A VIGOROUS HOME BUILDING AND REPAIR DRIVE IN EVERY COMMUNITY TO CREATE THE DESIRE FOR BETTER HOMES. BUILDERS, DEALERS, ARCHITECTS, REAL ESTATE MEN AND THE LOCAL DEPARTMENT STORES AND NEWSPAPERS SHOULD CO-OPERATE TO POPULARIZE BETTER HOMES.

AMERICAN BUILDER and BUILDING AGE, with which are incorporated National Builder, Permanent Builder, and the Builder's Journal, is published on the first day of each month by the

AMERICAN BUILDER PUBLISHING CORPORATION
105 West Adams Street,
Chicago, Ill.

NEW YORK
30 Church Street

CLEVELAND
Terminal Tower

WASHINGTON, D. C.
National Press Building

SAN FRANCISCO
58 Main Street



Samuel O. Dunn, *Chairman of Board*; Henry Lee, *President*; Bernard L. Johnson, Robert H. Morris, Delbert W. Smith, L. R. Putman, and R. E. Clement, *Vice Presidents*; Elmer T. Howson, *Secretary*; John T. De Mott, *Treasurer*.

Subscription price in the United States and Possessions, 1 year, \$2.00, 2 years, \$3.00, 3 years, \$4; Canada, including duty, 1 year, \$2.50, 2 years, \$4.00, 3 years, \$5.00; foreign countries, 1 year, \$4.00, 2 years, \$7.00, 3 years, \$10.00. Single copies, 25 cents each.

Member of the Associated Business Papers (A. B. P.) and of the Audit Bureau of Circulations (A. B. C.)

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The Only Way Out— Increased Production

THE American Builder has no politics. It does not care what politicians or party help whip the depression. And it does not believe that any politicians or party will whip it, either. That job must be done by the entire American people. It is still so far from done because the people have so largely left it to politicians.

This is the worst of all depressions. But there have been long and severe depressions before. Their histories have been strikingly similar. Their paramount symptom always is a *great decline of industrial production*, especially production of *durable* things—houses and other buildings, railroad equipment, power plants, productive machinery and the lumber, ore and other raw materials used in them.

The only way to end a depression is fully to revive production, especially of "durable goods."

STRANGELY enough, this never is the first thing attempted by politicians, business men or labor leaders. Invariably the remedies first favored are government or business policies intended, for the advantage of particular classes, to *change the division of the greatly reduced national wealth and income*.

Never in any country during any depression have so many policies of this kind been tried, some favored by business, some by agriculture, some by labor, as in the United States within the last sixteen months. This is why the recovery that began two years ago has slackened.

There is but one way out. All classes must unite to *increase the total national wealth and income by increasing industrial production*. Production and the commerce incidental to it are the only means of providing useful employment—the only sources of income—the only sources of necessities, comforts and luxuries for all. No policies of government, business or labor having any purpose excepting increased production and commerce will promote recovery or help a vast majority of the people.

THE National Housing Act is the most constructive recovery legislation passed because *it directly stimulates production*—production of more and better homes, and of equipment and materials used in them. The more effectively bankers, contractors, manufacturers, material dealers, wage-earners co-operate to help it increase production the more it will contribute toward revival of general business and employment.

But other kinds of business must improve to enable millions of people to spend billions of dollars on needed better housing. Other kinds of business will improve just in proportion as industrial production and commerce are increased. They will not be increased by class struggles over a greatly reduced national income, but *only by the united efforts of all to increase production*, and the national income.

We should begin to restore the national income to an amount worth fighting about before we longer impoverish one another by senseless efforts to use regimentation, inflation, wage-fixing and price-fixing to increase our shares of a national income the vital trouble with which is that it is only one-half as large as five years ago.

Samuel O. Drumm,

CHAIRMAN,

AMERICAN BUILDER PUBLISHING CORPORATION
SIMMONS-BOARDMAN PUBLISHING CORPORATION

AMERICAN BUILDER AND BUILDING AGE

Will Insured Mortgages Mean Better Homes?

THE night before Christmas is the most important night of the year in the lives of many children. For those who have to do with residential construction, the present period has points of comparison, for we are on the verge of having again that indispensable bulwark of home building . . . adequate first mortgage money.

Title II of the National Housing Act assures mortgages covering up to 80 per cent of the valuation of house and lot. Home owners will be allowed to pay off these mortgages over a period of eighteen to twenty years—a longer term than commonly used in this country. The new law sets limits against the rapacity of the former collectors of large fees, establishes reasonable interest rates, and gives legal strength for the Federal Housing Administration to enforce fair dealing in the troublesome marts of home finance. In addition, Title III assures market facilities so that home mortgages can be bought and sold more easily.

Money for Building is Certain

Home owners (and millions who dream of owning the roofs over their heads), as well as contractors, builders and dealers in the field, are aware of the new era just opening. It has taken a long time to bring reasonable hope of recovery for the giant among industries; some, like the child on Christmas Eve, are even yet afraid to believe that better times in residential construction are on the way. For those who are fearful, it must be pointed out that the National Housing Act is now law; its intent and provisions for helping the home building industry are plain; day by day additional proof appears that execution of the intent of the act is being faithfully performed. All those who have to do with home building can now say with courage and confidence: "We are going to get the money!"

And then—what will happen?

Values Must Stand up for 20 Years

Admittedly, the primary function of all dwellings is utilitarian; the general public recognizes this fact as clearly as do contractors, builders and dealers. Now, utility may be of a temporary or permanent nature; long term use is not expected of some products, whereas

other items are supposed to last for many years. The pencil is a product of excellent temporary utilitarian value. Automobiles are expected to render service for a few years and can therefore be classified as semi-permanent in utility. Homes, on the other hand, are expected to serve for many years and must have permanent utility, compared with the preceding examples, to be truly successful.

In the past it has been the custom to draw mortgages which must be refinanced every three or five years; the building and loan type of mortgage, most liberal as to time allowed for repayment, rarely covered a period longer than twelve years. Therefore, long term insured mortgages under Title II of the National Housing Act constitute a definite step forward.

Best Quality Least Expensive on 20 Year Basis

Paying a little more for a product is usually a guarantee of greater satisfaction, due to pride in possession of a better quality of merchandise and because the higher grade of material actually renders longer service. This is particularly true of the products used in home building; cheap products are most often bought to serve through an emergency period only, while permanent utility demands the best. Since homes must wear for many years, it is obvious that, with adequate funds and easier terms for repayment, it will not take long for the home buying public to understand the common sense appeal of more permanent utility and greater value. Quality, both in materials and workmanship, pays big dividends to the owner of a residential structure.

How it Figures Out

The arithmetic of the quality product is thoroughly convincing. Suppose, for the sake of argument, the cheapest item in a given case costs \$20 and the very best competitive product sells for \$100. Over the 20-year term, the higher priced item represents a difference of only \$4 per year; the cheaper item will require considerable repair or replacement during a 20-year term, and this maintenance expense incident to poor quality manufactures will result in a higher total cost over the 20-year period, than if the good product had been installed in the beginning. It is evident that adding as much as 20

per cent to the cost of a \$5,000 house in the beginning will be more than counterbalanced by savings in maintenance expense and personal inconvenience through the years.

Does it not seem reasonable, then, to predict that over the long term the National Housing Act will raise the standards in residential construction?

Competition on Price a Thing of the Past

For the first time in years, general competition on the basis of price alone will lose force and the true story of the worth of quality building products will gain power. It is quite possible that the wisest contractors, builders and dealers will now begin to feature again the good hardware, paint, lumber and other high quality materials and workmanship they have always wanted to include in all home building jobs.

Stabilization of home financing methods, as propounded in the National Housing Act, must inevitably lead to general recognition of the importance of permanent utility as a paramount factor in home building. It therefore assures higher quality in residential construction and, if further proof of this intent on the part of the Federal Housing Administration be desired, we have only to look to the FHA slogan, which reads: The "Better Housing Program."

* * *

SCARING PROSPECTS AWAY?

THIS department stood by watching the 127 workmen clambering over each other fixing up an old house at the Century of Progress Modernization Day festivities on Oct. 24. Advertised in advance that the complete job would be done in 6 hours, a huge crowd assembled to see the fun—and to learn a compelling lesson, it was hoped by the "Committee," as to the wizardry of the present day building industry in restoring value to an old building and in creating a modern home out of the most unpromising old habitation.

As we stood by watching, the incongruity of the scene characterized by two burly carpenters holding up a six-foot length of siding while a third marked it for length and then stood by as he hand-sawed it off *across his*



Part of the 127 as the job at the Fair got under way

knee, as contrasted with the Ford Exhibit just down the street, where precision power tools turn out cars by methods that astound and delight the public—the incongruity of this scene and the methods being demonstrated by those 127 building mechanics made us wonder if and how the property owners in the crowd of onlookers were being impressed.

This thought led to others: hundreds, yes thousands, of demonstration or show houses have been put up during the past few years. This publication has been represented at the dedication of many of them. Most have been put up, finished and furnished in a rush and under conditions that made either good work or low cost impossible. Efficiency in construction invariably was sacrificed or forgotten.

Why Not Exhibit Efficiency?

What an innovation it would be for some builder or local community building industry group to stage a home building demonstration to illustrate *cost-cutting efficiency* to the prospective buying and building public! The World's Fair crowds have surged through the Ford and other mechanical exhibits all summer, impressed by the accuracy and economy of the various line-assembly processes there demonstrated. Line assembly is, of course, not practical in house building except in the making of the standard parts in various factories, later to be assembled on the building site; and in the production of these standard parts, materials and items of home equipment great efficiency is being demonstrated.

Need Better Equipment

What we would like to suggest to some builder or local construction industry group ambitious to impress prospective customers, and thereby increase sales and employment, is a carefully planned building operation utilizing all such modern power tools as electric hand saws, automatic door lock mortisers, power floor surfacers, paint sprayers, "patent" miter boxes and work benches properly equipped with vise, tools, etc., and employing such efficiency cost-saving materials as ready mixed concrete, precision end-squared and end-matched lumber, large unit plywood panels, etc. On such a "demonstration house" actual costs could be announced and the buying public could be invited in to inspect both construction process and results with confidence that sales and jobs would result.

The home building industry has done plenty to discourage and to make both hard and costly the hiring of building labor and the buying of building materials. The old house rebuilding stunt at the Century of Progress Home Modernization Day made the headlines all right, and was effective showmanship. We hope the demonstration of costly craft methods employed in that day's construction did not scare away more thoughtful property owners than were attracted to the cause by the charming little house after it was remodeled.



MORE NEW HOMES

BUILDERS IN MANY TOWNS are busy, and the new FHA financing plan will greatly stimulate their work. Above is one of three homes now being built in Green Bay, Wis., by Ole P. Madsen, long time American Builder reader. The house at right is one of 6 being built by Carl J. Lang, Wausau, Wis. In Menominee, Mich., the fine home below, at right, has just been completed by John Salen, contractor. At left, below—a new brick home in Milwaukee built by William Erdman & Sons. Photos taken Oct. 1-7, 1934.



Mortgage Money for NEW HOMES

- ❑ *ADMINISTRATOR announces Titles II and III National Housing Act now in operation.*
- ❑ *APPLICATIONS urged for needed new homes.*
- ❑ *5 PER CENT 20 year home loans provided under mutual and U.S. Government guarantees.*
- ❑ *FAR REACHING appraisal and inspection system established.*

THE provisions of the National Housing Act having to do with the mutual insurance of home mortgages under U.S. government guarantees and with the thawing out of home mortgage credit have had the careful study of the Housing Administrator since his appointment early in July. Title I of the Act, providing repair and modernization loans, was put into effect August first; and now the more important and far reaching regulations and policies to control under Titles II and III are ready.

Formal announcements are scheduled for the first week in November. In the mean time AMERICAN BUILDER is able to present a general summary.

Miles L. Colean, Director of the technical department FHA, concluded a recent address before the Washington Society of Engineers with these words:

"The Federal Housing Administration has two purposes: the stabilizing of long term investment in housing, and the fostering of better housing and of lower-priced housing. I believe that the mortgage insurance principle permits these two objectives to be achieved without conflict."

Earlier in this address he outlined the realistic attitude of his department towards home building methods.

"In face of a long term insurance program," he said, "the administration must necessarily adopt a conservative attitude toward the types of construction which it will consider eligible. At the start these types will be those which have been in customary use. We see at the present moment no new methods of sufficient promise and permanence to believe that existing systems will be rapidly displaced. We propose, however, not to discriminate against new methods or materials simply because they are new, and to offer every opportunity to the sponsors of such new methods and materials to prove their suitability. A special division in my department is being set up for this purpose.

In order to be in a position to qualify for an insured mortgage, AMERICAN BUILDER is informed, the borrower must be able to meet certain conditions, as follows:

He must have a regular income, reasonably expected to continue, enough to meet the prospective payments without being required to sacrifice on other necessary

living expenses, approximately no more than he would be able to pay for rent for his interest, insurance premium and amortization, as he will also have to pay for upkeep and taxes on his property.

He should be prepared to borrow less than 80 per cent of the appraised value if possible, as that figure is a maximum.

In most sections the interest rate will be not more than 5 per cent but in certain communities, to be specified, the rate may be as high as 6 per cent because of locally higher money rates.

For a 20-year 5 per cent mortgage the borrower would be expected to make regular payments at the rate of 9 per cent each year of the original face of the mortgage, including payments on principal beginning at the rate of 3 per cent on the original amount, 5 per cent for interest and 1 per cent for insurance. As the interest decreases the amount applicable to principal increases. If 1 per cent proves to be too high for insurance the rate may be changed later but substantially all that is not required to pay for insurance losses and expenses will be credited on the principal. If no losses were incurred for insurance the accumulation would be enough to pay the entire principal in about 17 years instead of 20 years.

It is planned that the insured mortgages will be placed in groups composed of insured mortgages of similar terms and degrees of risk and that premiums for each group will be kept in a separate fund for each group. When the amount of credits for the mortgages in a group exceed the unpaid principal in the group by 10 per cent of the accumulation of premium payments, the 10 per cent would be put into a general reinsurance fund and the rest used to retire the mortgages in the group.

If the borrower obtains a mortgage for a smaller percentage of the appraised value his insurance premiums might pay off some of his principal sooner than if he had borrowed a larger percentage, because the losses are likely to be less.

Because all insured mortgages will conform to standard specifications and with the national mortgage associations in operation, it is believed that a nation-wide mortgage market will be created in which an investor in the East will be able to invest his funds in a property in the West with the same sense of security as if the loan were made on nearby property.

Rules and regulations for the long-range program for the insurance of mortgages for *low-cost housing projects* have not as yet been specifically formulated but proposals for such undertakings will be considered by the Administration on their merits whenever they may be presented.

The first release of detailed information regarding FHA plans for insuring mortgages for new homes under Title II was made on September 28 by Frederick M. Babcock, Chief, Appraisal Section, Construction and Real Estate Division, Federal Housing Administration, in an address before the American Institute of Real Estate Appraisers. Below are excerpts from this address which contain the most important points. What these procedures, when put into effect, will mean to the manufacturers, dealers, contractors and other active home building factors, remains to be seen.

"Title II of the National Housing Act," Mr. Babcock said, "contains provision for the establishment of a system of mutual insurance against losses on mortgage

Now Ready Under FHA

By BERNARD L. JOHNSON

investments. The Administration is confronted with two types of appraisal problems. In the first place, it will be necessary to make *valuations of properties*. In the second place, the Administration will find it necessary to rate mortgages in accordance with *investment hazard* for the purpose of classifying them into groups for insurance.

"We propose to use sound methods of valuation. Mortgage-lending institutions which submit loans for insurance will make their own investigations and appraisals according to their own ideas with respect to procedure. *It will be necessary for the government to make separate appraisals to assist in determining the eligibility of mortgages for insurance. We plan to train our personnel.*

"There is considerable danger in standardization of methods at the present time, especially if the adopted system is too inflexible. We believe that uniformity is desirable in all matters pertaining to principles and basic procedure *but that to extend standardization to the minute details of the process will hamper further progress.*

"Therefore we shall outline a specific valuation procedure and require our appraisers to adhere to it, but we shall leave much opportunity for subsequent refinement of methods and a reasonable latitude for the exercise of the appraiser's judgment. Appraisal by rigidly formulated procedure has been uniformly discouraging because it has been unable to make proper allowance for the many features in homes which are matters of taste, appropriateness, fashion and custom.

"It follows that the methods of valuation applicable to homes can advance precisely to the extent we are able to secure more complete and more accurate data *relative to neighborhood prospects, housing requirements, and markets.* We must know more about these environmental factors which lead toward greater or less stability in values. *Therefore, we are placing great emphasis on the importance of our data-gathering, fact-finding, and research facilities.*

"The loan-rating problem is of equal or greater significance in our work. We are offering insurance against risks incident to investment in mortgages. It is proper that the cost of this insurance *should vary in accordance*

with the risks assumed and that the better mortgages be insured at lower premium rates.

"The element of judgment enters so strongly into both valuation and loan rating that we propose to use devices to assist in the control of judgment. Representative type houses will be designated and, to a certain degree, will be used to define various grades of risk. For example, if an inspector is asked to indicate whether the architectural design of a house is excellent, good, average, or poor, he will be able to go to one or more of the representative type houses and make comparisons."

FHA TO IMPROVE HOUSING STANDARDS

FOR the two-fold purpose of eliminating, so far as possible, the risks to which mortgage loans made under the National Housing Act may be subjected, and of carrying out the obligation placed upon it by the act "to encourage improvement in housing standards and conditions," the Federal Housing Administration is preparing to establish standards as to structural and neighborhood requirements which must be complied with in all properties on which mortgages are to be insured under the plan of the act.

To this end a bulletin is now in course of preparation to guide the judgment of lenders in considering applications for mortgage insurance under the act which will also inform both borrowers and builders as to the policy by which the Administration will be guided as to the character of properties on which it will insure mortgages.

The Administration not only wants to be assured that construction carried on under its program shall be of substantial and durable character structurally, but that the buildings shall be convenient and efficient in arrangement, attractive in appearance and suited to the neighborhood in which they are located; and the same requirements will be established as to existing buildings refinanced by the use of its facilities.

In this bulletin will be indicated the qualities in a property which will result in favorable consideration, including the statement of some minimum requirements, which are not to be regarded as specifications but rather as indicating conditions the absence of which would make a property ineligible.

Better dwellings in more secure and pleasant surroundings is the objective which the Administration will endeavor to accomplish through the exercise of its power to insure mortgages.

The minimum requirements will be grouped under the heads of general and environmental factors and of minimum construction standards. In general the Administration will require that lands,

buildings, and appurtenances shall conform to all applicable laws, and local codes, ordinances and regulations. Where such local requirements are lacking or are insufficient, it is proposed that regulations to be established by the Housing Administration shall apply in relation to all properties on which insured mortgages are to be placed, with the same force that such local regulations would have.

In recognition of the fact that the value of a property is determined not only by its physical characteristics but also by the characteristics of its environment and the fitness of the property to its neighborhood, the bulletin will set forth several groups of environmental factors which may be considered in receiving and passing upon applications for mortgage insurance.

For example the Federal Housing Administration officials favor a lower proportion of lot coverage than is frequently permitted by local ordinances. They desire to emphasize as a major point in the FHA housing policy that ample light and air in all inhabited rooms is essential to the satisfaction of the occupants and hence to the long-time security of the property.

Designs which are simple and direct will receive preferential consideration.

Standards will be established in respect of the services and equipment of a dwelling which are to be considered as minimum in all respects and it will undoubtedly be required that where the general character of the neighborhood requires higher standards to assure a proper relationship, average standards of the neighborhood shall become the minimum for that locality.

The construction standards will of course require that all buildings shall be safe, sanitary and suitable for their intended use. Construction types customary to the locality in which they are to be used will be generally acceptable. Only materials and methods of proved durability and suitability for their intended purpose will be considered.

3,000 Local Renovise Campaigns

HOW would you building contractors, building trades mechanics and building material dealers like to have Uncle Sam and Mr. and Mrs. John Public out drumming up modernization and repair jobs for you? Well that is just what is going on today in more than 3,000 cities and towns, according to late reports from FHA headquarters in Washington. That many local campaigns have been organized and are functioning, hunting out the jobs and encouraging property owners and bankers to get together on "easy-repayment" insured loans for needed building improvements.

The Housing Administration estimates as of Oct. 27 are that \$70,000,000 already has been invested in home repairs and modernization work.

Reports from banks indicated that 24,270 loans, totaling \$10,485,000 had been made under the clause of the housing act which places a Government guarantee behind 20 per cent of a bank's aggregate losses.

The rate at which the volume of modernization loans (and jobs) is increasing is shown by the following tabulation of loans reported to Washington week by week:

First week.....	117	Fifth week.....	2569
Second week.....	397	Sixth week.....	2577
Third week.....	837	Seventh week.....	4008
Fourth week.....	1378	Eighth week.....	4249
		Ninth week.....	4326

On Monday, Oct. 22, there were 1,389 loans—in a single day six per cent of the entire total reported to date. On certain previous days more than 1,000 had been reported, but Monday, the 22nd, was a new peak and 45 per cent ahead of the same day the preceding week. "This thing now is gaining tremendous momentum," commented Roger Steffan, director of modernization credits, FHA. "When they start rolling as they are now, we're on our way. Even assuming that no more than about this recent figure were averaged for the period of the Act, that should mean an insured credit volume of about \$200,000,000. And surely it looks as if the real pull was just starting. To these may be added non-insured loans of banks and building and loan associations stimulated by the program. If we take the conservative figure that the volume of cash in this type of work runs three or four times the credit volume, it should mean total jobs approximating a billion dollars, resulting from the Modernization campaign, most of which might well not have been otherwise undertaken."

"Here are several striking facts," continued Mr. Steffan. "To date, 8,912 institutions including 7,700 banks, representing 80 per cent of the eligible banking resources of the country have accepted Contracts of Insurance. Some

2,430 representing 57 per cent of eligible resources have actually started reporting loans made. We must allow for the possible lag in reporting, for the fact that many loans have been approved but will not be reported until the job is finished and the money paid out; we must allow for human nature—that factor which impatient sideliners are never willing to consider but which does make it necessary to take some time to install a plan in thousands of institutions in every corner of the country."

The enthusiasm for the Housing Administration's

CURRENT STATUS PWA PROGRAM

INCREASING progress on the Public Works Administration's national slum clearance and low cost housing program was reported Oct. 21 by Administrator Harold L. Ickes.

PWA has allotted approximately \$150,000,000 for this program. Of this sum, about \$11,500,000 has been allotted to seven limited dividend corporation housing projects, and approximately \$138,500,000 has been budgeted to 39 Federal projects.

Emphasizing that the Housing Division of PWA is now moving ahead rapidly on the basis of extensive preliminary examinations into housing needs for more than 75 cities, Administrator Ickes reported that:

Of the seven authorized limited dividend housing projects, five are under construction, one has been completed, and one is about to start.

Of the 39 Federal projects tentatively budgeted, definite steps to get projects actually under way have been taken on nine large projects. These nine Federal projects, plus the seven limited dividend projects, when completed, will provide modern, urban housing of durable type for upwards of 19,000 families. The nine advanced Federal jobs involve expenditure of around \$73,000,000.

Features such as cross ventilation and good lighting are being emphasized. Apartment buildings will be of fireproof construction, built to last many years. Provision has been made in the financial set-up of each project for adequate maintenance funds to keep the buildings in first class condition.

Each limited dividend project was financed by PWA with straight loans at 4 per cent interest, amortized over long periods of years. Federal projects are financed wholly by PWA with 30 per cent of the cost of labor and materials as a grant. The remaining capitalization will be returned to the Government with interest through amortization of rents. Each project is self-liquidating, and will return its PWA financing over periods ranging from 33 to 45 years. Under

present plans, each project will be turned over to the municipality when the Federal Government's financing has been paid back.

Status of the seven limited dividend projects and the nine most advanced Federal projects follows:

Limited Dividend Project

Hillside Housing Corp., New York City—Allotment, \$5,060,000. Estimated total cost, \$5,717,871. To provide about 1,388 living units. Approximately 15 per cent complete. (Apartments)

Boulevard Gardens, New York City—Allotment, \$3,450,000. Estimated total cost, \$4,086,600. To provide approximately 957 living units. Approximately 20 per cent complete. (Apartments)

Juniata Park Housing Corp., Philadelphia—Allotment, \$1,039,000. Estimated total cost, \$1,153,607. To provide approximately 284 living units. Approximately 49 per cent complete. (Apartments)

Neighborhood Gardens Corp., St. Louis—Allotment, \$640,000. Estimated total cost, \$730,000. To provide around 252 living units. Approximately 4 per cent complete. (Apartments)

Alta Vista Housing Corp., Va.—Allotment, \$84,000. Total cost, \$100,000. Project consists of 50 small, single-family houses. Houses complete. Street improvements to be put in.

Euclid Housing Corp., Euclid, Ohio—Allotment, \$1,000,000. Project consists of individual and double houses to be erected by persons owning property with Corporation aid. Approximately 14 houses complete.

Boylard Realty Co., Raleigh, N. C.—Allotment, \$198,600. Estimated total cost, \$233,600. To provide about 54 living units. (Apartments) Ready to start.

Federal Projects

New York City—Allotment, \$25,000,000 for comprehensive program, to

Helping Builders to Make Sales

repair and modernization drive among building industry leaders is well expressed in this letter from John L. Avery of Frost Lumber Industries, Inc., Shreveport, La., to the AMERICAN BUILDER, under date of Oct. 3:

"I have just returned from about a seven thousand mile trip, through the West, looking over conditions. If anybody tells you that this Housing program is not going over you can say to them, from me, they don't know what they are talking about. It is certainly going over with a 'bang' and the only thing that will

keep it from going over in any community is the tardiness or the failure of the local business men in each community getting behind the campaign and putting it over. It will certainly go over if the local people 'put it over,' but it will not go without some effort on the part of local dealers, banks and business men."

Housing Administrator J. A. Moffett has called the contractors and builders the "key men" in this modernization campaign. Backing up this commission the FHA has issued a very interesting memorandum stating the advantages of contractor control of repairs and alteration projects:

"A general contractor who is qualified to give an accurate estimate and prepared to deliver a thorough-going modernization job complete in all its details to a property owner has a distinct advantage over the independent carpenter, mason or plumber in landing his contract.

"In consequence these independents, together with the painting, electrical sheet metal and other contractors in cities where the Better Housing movement is now beginning to operate at high speed are cooperatively banding together with each other and forming general contracting companies on a partnership basis. Early reports indicate that this united action is producing gratifying results.

"There are a number of indisputable arguments in favor of the one flat, all-inclusive estimate on the cost and the subsequent delivery in 'capsule form' of a first class job of a renovation, as against separate negotiations of contractors who are familiar only with the business of the trades they represent.

"Members of these cooperatives continue to function as leaders in the trades with which they are directly connected. They make their inspection of the properties to be repaired and improved, then prepare their bids. Instead of submitting these estimates to the property owners, however, they turn them in to the agent of the cooperatives. If the modernization job calls for the employment of painter, heater and plumber, carpenter, mason, electrician, roofer, sheet metal worker and plasterer all submit their bids to the cooperatives. When the contract is obtained and the work completed they collect their share of the total.

"The property owner likewise shares in the advantages offered by such a set-up. He knows precisely what the full job is going to cost him at the outset and deals with one instead of a group of contractors. Masons, carpenters, plumbers, etc., being members of the organization know just when the job will be ready for their workmen and lost time is avoided."

FOR LOW COST HOUSING PROJECTS

be carried out with co-operation of the Municipal Housing Authority. Under principles agreed to by the City of New York and the Authority, options are being exercised by the Federal Government in the Williamsburg area of Brooklyn. Size of this project dependent upon contributions made by the city in the way of schools, streets and park area. Other projects under consideration. Around 5,000 living units will be provided under the program according to preliminary estimates.

Chicago—Allotment, \$25,000,000 for comprehensive program. Condemnation proceedings opened against 37 square blocks in near Southwest area and against a 35 acre tract on the south side for two projects to cost 12½ and 7 million dollars respectively. New housing will consist of two-story row houses and three- and four-story apartments.

Atlanta, Techwood—Allotment, \$27,700,000. Title acquired for site and demolition of existing buildings started. To provide 603 living units (white) and dormitory quarters for Georgia Institute of Technology. New housing to consist of three-story dormitory and two- and three-story apartments.

Atlanta, University—Allotment, \$2,100,000. Title acquired for site and demolition of existing buildings started. To provide 617 living units (Negro). New housing to consist of two- and three-story flats and row houses.

Cleveland—Allotment, \$3,000,000. Title acquired for Cedar-Central project and demolition bids taken. Contract for demolition will be awarded in the immediate future. Project provides 799 living units (white). Three-story apartments.

Indianapolis—Allotment, \$3,000,000. Condemnation proceedings started. Project provides 1,044 living units (Negro). One-, two- and three-story flats and apartments.

Cincinnati—Allotment, \$6,000,000. Option work started. Preliminary es-

timate, 1,950 living units (white and Negro).

Detroit—Allotment, \$6,000,000. Option work started. Size of project dependent upon extent of site acquired. (Negro).

Montgomery—Allotment, \$320,000. Condemnation proceedings filled on site. Project to provide 160 row houses. (Negro).

Commenting on the program of the Housing Division, Administrator Ickes said:

"We have entered this program upon a demonstrational basis. We know the funds now at our disposal are not sufficient to wipe out slums in the United States, or even to do a complete job for one large City.

"We are, however, engaged in installing slum-clearance and low-cost housing projects in a large number of cities that will show our States and municipalities what this type of housing really means. We can wipe out some of the disease-ridden slums that have exacted enormous toll in social and economic costs and erect in their place park-like developments with bright, cheery housing to rent at little more than present slum dwellers pay.

"We can give some of our citizens who have been forced to live in slums all their lives a chance to live in healthy, modern homes, equipped with electricity and gas and those many conveniences which make living easier and happier. Each slum eliminated will mean a step forward for the city involved, and a tremendous saving through the elimination of extra municipal services required by slum areas for which they never pay.

"The Housing Division is now beginning to show the results of its careful preparation for this program through the recent months. Many weeks of painstaking research and examination were necessary to shape up our projects, and that preparation is now bearing fruit."



TWO CURRENT EXAMPLES OF HOME BUILDING photographed early in October: at left, \$20,000 home being built by Leo Lodholz, Wausau, Wis., contractor. Whitewashed brick and wide siding used; completely air conditioned. At right is attractive home being built by G. F. Peters, Green Bay builder. More than 60 homes have been built in Green Bay this year.

Home Building Work Goes On

Many New Homes Being Built in Wisconsin. Local Enterprise Creates Business

By JOSEPH B. MASON

WITHOUT waiting for better times, Government help, FHA, or some other future development, many towns and communities are doing a remarkable volume of business. Why is it that some builders in some towns are really quite busy, while others have a defeated, dismal attitude toward everything and are doing practically no work?

The answer is *local enterprise*. Home building and home improvement is a local business. When the building men of a town are active, intelligent, on their toes, open to new ideas, they are doing a good business. When they are not, they and their towns are usually dead.

It will not be the purpose of this article to attempt to prove this point, but merely to show some instances from a recent 900-mile tour of towns in the eastern half of Wisconsin representing a wide range of business activity where home building is active—surprisingly so—and how the local men are creating and maintaining this activity.

Take the city of Green Bay, for example. In this city of less than 40,000 people, more than 60 homes have been built this year. The local building interests are active, have developed small homes of a style and price in keeping with the current need. Building and loan associations are loaning money, the lumber dealers are active. A large number of the homes are in the \$4,000 to \$5,000 class, and one can drive out in the newer section of town and see a dozen or more under construction.

One of the active builders, who is an *AMERICAN BUILDER* reader of many years, is Ole P. Madsen who has three houses under construction to sell under \$5,000. In one year—back in 1928—Madsen built 17 houses. He has built 71 houses in the past ten years in Green Bay. Madsen operates on a practical basis, and works on the job with his men. He declares he gets better results that way. He uses a light truck to get around quickly from job to job, and keeps in close touch with operations.

According to Albert Manders, building inspector of Green Bay, more than 450 modernizing jobs averaging

\$550 each have been done in the first ten months of 1934.

An important factor in the Green Bay home building picture is a prominent lumberman who has adopted a program of complete home building service. He advertises widely, has his own architectural department prepare plans, and sells direct to the owner, letting contracts. While opinions as to the desirability of this procedure differ, the fact remains that this firm has done a large volume of work, and due to its ability to arrange financing through local building and loan associations, has kept a large number of men employed in home building during the depression.

Another Wisconsin city, small in size but big in building activity, is Neenah. Here more than 20 houses are under construction or have been recently completed. I talked with a large number of builders, dealers and others, and found a universally aggressive and optimistic attitude. They were on their toes, full of ideas, and experimenting with the latest in building practice and selling. It was impossible not to contrast Neenah with a town previously visited which, in many respects, has the same business enterprises but in which every lumberman and contractor interviewed talked as though he had never heard of the Housing Act, couldn't see why anyone should want to build now, and what was more, didn't care to hear any new ideas anyone else might suggest. Business couldn't help being bad in that town.

One enterprising builder, an old *AMERICAN BUILDER* reader, interviewed in Neenah was Max Kuchenbecker, who has two \$2,500 remodeling jobs under way and has recently completed a fine Colonial home.

Kuchenbecker leads a busy life—working on his job with his men during the day, and doing his planning, figuring and selling evenings. He draws all his own plans and has built many attractive houses in Neenah. He knows all about the real shortage of homes in Neenah, and on Oct. 2 was engaged in remodeling a large old home into two flats to rent to tenants already signed up. Neenah is in need of new homes, he pointed out, and the



AT LEFT, Ole P. Madsen, contractor and builder of Green Bay, Wis., as seen on the job with his light truck. He has three houses under construction, and has built 70 in Green Bay in the past ten years. At right, an HOLC reconditioning job under way at Shawano, with Charles Klebesadel, carpenter-builder, working on roof.

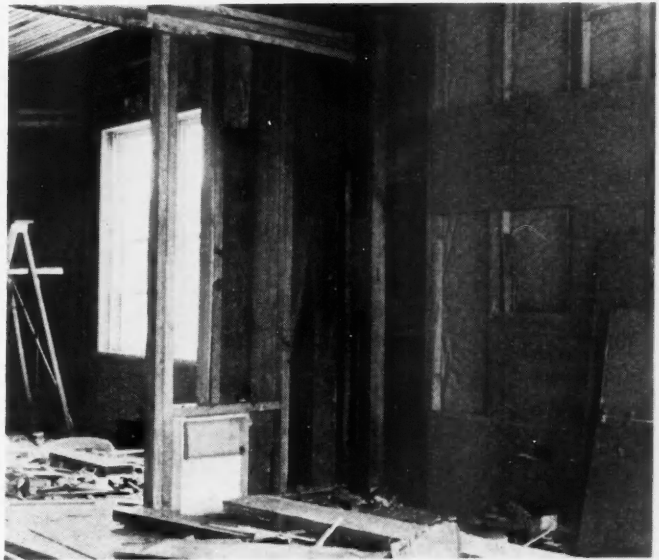
supplying of new home financing by the FHA should greatly stimulate business.

Modern Home Builders, a Neenah firm headed by Otto Lieber, local lumberman, is doing considerable building. An attractive Colonial design (illustrated on page 29) was being finished on Oct. 2 and will shortly be open for public inspection.

In Wausau, Wis., some thirty homes have been recently completed or under construction, and a large volume of modernizing. Many of the houses sell under \$4,500, are heated with forced warm air, well insulated, planned in a practical fashion. C. J. Lang, local home builder, has five houses under construction.

In Shawano, according to Charles Klebesadel, local carpenter-builder, practically every building tradesman in the city is busy. Klebesadel was active on a \$2,000 HOLC reconditioning job which called for a new roof, new foundation, exterior wall repairs and extensive interior remodeling. In Menominee, Mich., John Salen, local contractor, has just finished an unusually attractive Colonial home for Sam Wells, son of A. C. Wells, prominent lumberman.

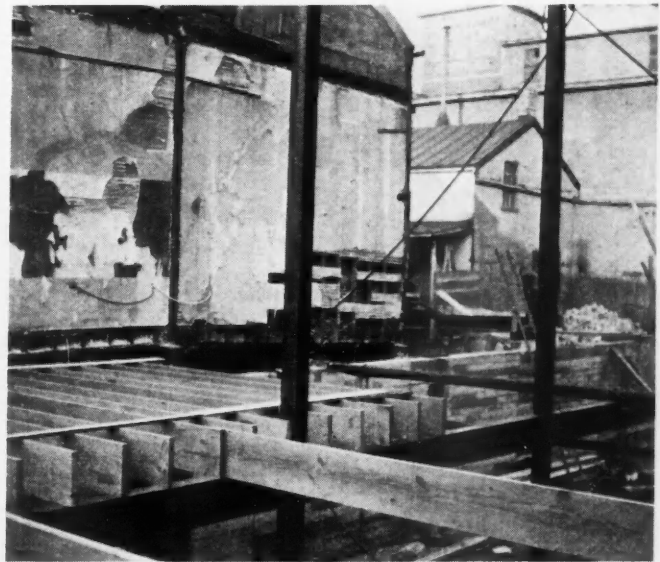
On a 900-mile tour through this area, numerous farm improvements and at least a dozen new farm homes were noted. This perhaps accounts for the fact that lumber dealers report almost universally encouraging increases in business, ranging from 100 to 300 per cent.



INTERIOR OF HOME being built by C. J. Lang in Wausau showing insulation tucked between 2 by 4's and covered with insulating board.



AT LEFT, a \$2,500 remodeling job changing old home into two flats, for which tenants have already signed up. Max Kuchenbecker, contractor, is at the window.



VIEW OF a store remodeling job in progress in Manitowoc, Wis., by Kasper Construction Co. A large volume of store improvement work is going ahead at this time.

O.K., Mr. Moffett—We'll Build More Homes—and Better Homes

So Says Harry Hurni, Kalamazoo, Mich., Builder, Who Has Sold 50 Houses in Past Four Years. Sees Big Increase.

By HARRY A. HURNI

THE Federal Housing Administration's new home financing plan will do more to bring back prosperity and the building of homes than any other legislation passed by the present administration. The insured mortgage feature will bring capital out of hiding and give to the average investor an investment over a period of years better and safer than any I know.

The plan is for the Government to insure loaning institutions to permit them to provide first mortgage money at a low rate of interest up to 80 per cent of the assessed value of the property, with the obligation amortized over a long period. It should have the active support of every builder of homes and every prospective home owner in the country.

In the last three years home building has fallen to a new low for the industry. There is an estimated shortage of nearly a million homes in the nation. In my community there have been only seven homes built in the last year, while in normal times between 400 and 500 would have been built. There is the need. The demand is there also, but it has not been met for just one reason—lack of first mortgage money at reasonable interest rates which would eliminate the need for expensive and elaborate financing. This the FHA plan proposes to supply.



ABOVE—7-room stucco home built by Harry Hurni and sold for \$11,500. He has many prospects for homes who will build as soon as FHA financing is available he declares.

BUILT DURING DEPRESSION

All homes on these pages, as well as 44 others, were built by Mr. Hurni during the depression.



ANOTHER Hurni-built home of English style in which reclaimed brick was used. It contains 4 bedrooms, a 2-car attached garage, 2 baths, recreation room in basement, and sold for \$12,000.

With the many new methods of construction and changes in the style of homes and demand for larger home sites, thousands of people are ready to build when money is made available.

Tax limitation on homes is a movement sweeping the country. With a limit on home taxes and with lower interest rates on long term mortgages, such as the FHA plan will offer, America will witness one of the greatest home building booms this country has ever experienced, and we all know that the more good owned homes a city has the more prosperous and happy that city or state is certain to be.

With the financial help of the FHA Title II and the advertising value derived from the Act which will make thousands of people home conscious, we builders and salesmen of the world's best commodity (The True American Home) should soon make this great country of ours a beehive of activity for workmen in our line and create a standard of living never before dreamed of in this or any other country.

The market is there. It is simply waiting for an opportunity to develop under favorable financial conditions.

I say this advisedly. In the last four years I've built and sold 50 homes in a community of 60,000, as hard hit by the depression as any other. The homes have ranged in price from \$6,500 to \$15,000, built on lots costing anywhere from \$1,000 to \$3,000. If there had been first mortgage money available at five or six per cent, I know from my contacts that I could have built many more homes, just as could have any other contractor.

My experience in building these homes in depression times has convinced me of three things. One is that money must be cheaper, as the National Housing Act proposes to make it. Another is that without waiting for any further progress along the road to recovery there is an ample and impatient market for the right kind of homes. The third is that in order to protect the investment it proposes to make in the homes of the nation, the Administration must take measures to protect those

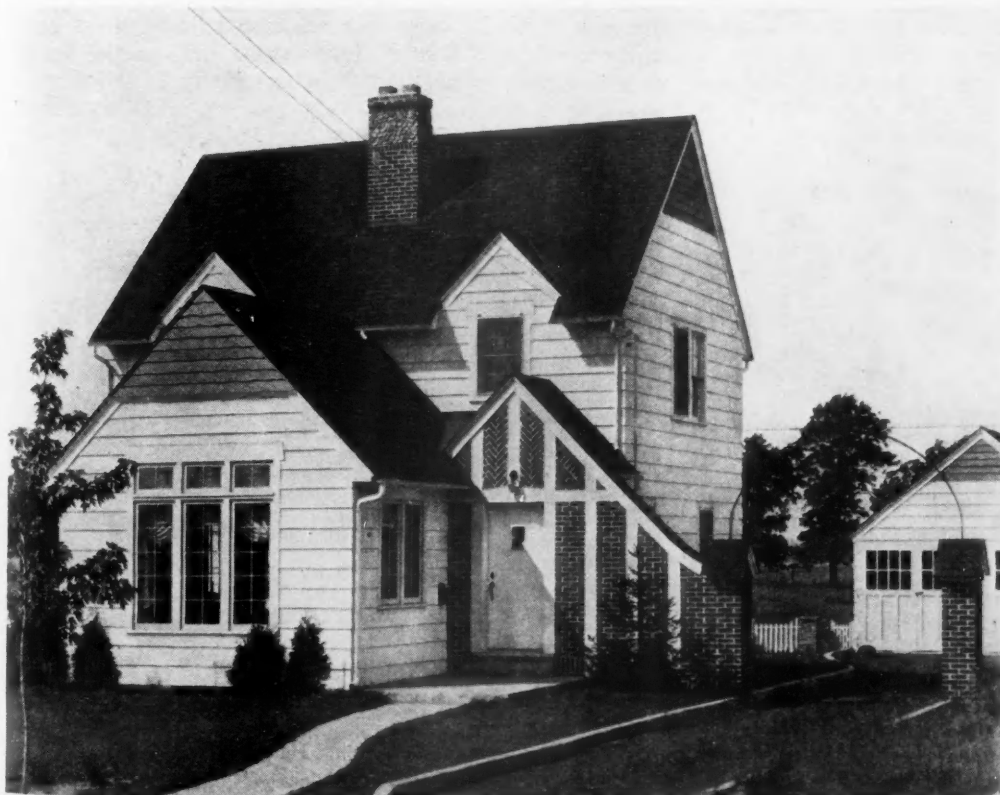
homes. In fact, there is a rising tide of demand for this protection already. These three points will bear a little investigation.

When the depression became a real, though unwelcome thing, I quickly realized that there was going to be a great shift in values, that money was going to become something that could not be trifled with any more. Everyone knows the practices in home financing followed before the crash. First mortgage money was not available at less than 7 per cent. Second mortgages were discounted anywhere from 10 to 25 per cent. The home owner was paying, when he bought his home on contract, as high as 30 and 40 per cent more than the cost of his home plus a fair profit for the builder.

With the shutting off of easy money after the crash, and the obvious determination of those investing in building to get old values, the old rules quickly became obsolete. But instead of revising the rules and going ahead, the financial Brahmins seemed to come to the conclusion there was no use trying to build homes until business had



THE STUCCO HOME above is substantial and attractive, and typical of the types of homes that will be built when FHA financing becomes available. It has a large living room, 5 bedrooms, and cost \$10,000 in Kalamazoo, Mich.



HERE IS an attractive Kalamazoo home built by Harry Hurni for a local doctor. It has a studio living room, 3 bedrooms, back porch, 2 baths, a 2-car garage, and was sold, including lot, for \$10,500.

picked up a bit and money became less of a rarity.

That was sheer stupidity, for it simply helped to plunge the country still deeper into the mire. With domestic building at a standstill, at least 20 trades and the industries serving them were paralyzed. Since in obedience to natural law there must be progress or retrogression, the building industry hit the bottom in 1932 with a bang that set a ten-year record for sickening and lifeless thuds. The slump continued unrelieved in the opening months of 1933.

Private capital went into hiding. Loans were called, bank accounts closed, and the sources of ready money shrank out of sight. Safe deposit boxes, not new homes, got the attention of those with funds. Business was bad, it is true, but there was something they could have done about it. For one thing, they could have made their money available at reasonable first mortgage rates to good risks—and they were not so few—forgetting the days of second mortgages with 20 per cent discounts, and 7 per cent interest on first mortgages. Another thing they should have done was to encourage the use of this money in building—as I suggested in my second conclusion on depression building—the right kind of homes.

Had they done these two things contractors and the trades allied with home building would have been busy all through the depression and that fit of national jitters would have been greatly alleviated. When I say the right kind of homes I do not necessarily mean the expensive sort. I had no more capital than the next builder, but I did have some unencumbered property on which I could build, and I was thus able to make attractive contract proposals to my clients.

I found that men and women would react to artistic homes, homes built not just to cover their furniture, but to harmonize with the lot and the surroundings—to appear to “belong”. I found they wanted individuality in their homes. People today have become imbued with the desire for distinctive styles. They like them in their personal appointments, and they are convinced that style is as adaptable to homes as it is to clothing. Why not give them what they want?

Good taste is always, of course, the first consideration. But that gives the builder such wide latitude that there is now no excuse for turning out a commonplace home. I offered my clients plans so individualized and so much an expression of the ideals with which they had always invested the word “home” that they were eager to see

their dreams realized in wood and stone. Further, they wanted, and I gave them sturdy construction that insured permanency, solidity, and low up-keep. They wanted included in their homes the new features, innovations a few years ago, now considered necessities.

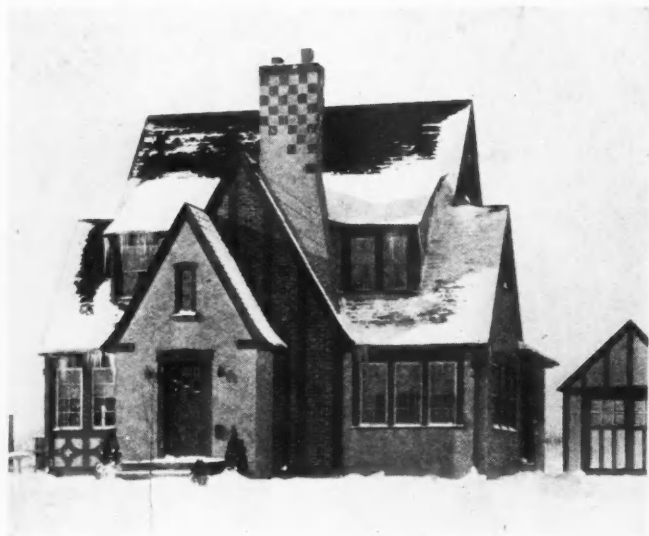
So I strove to combine beauty, utility, and individuality with reasonable economy and attractive contracts, and I got results—in the depression years. Any other builder who will follow the recipe can begin right now to do the same thing. If there had been available the cheaper money the FHA will release, there would have been a lot more building in this city than there was in 1932. For I assert most emphatically, there are prospects, plenty of them, but they must be attracted and sold with New Deal methods and prices, not the prodigal practices of the times that are definitely past. I predict that within a month after the government's plan goes into effect there will be 50 new homes under construction in this city, where only seven were built last year.

The home is the one investment today that is giving just as big a return to the owner as it did before the depression. There is today, more than ever before, a desire for well-built, well-designed homes. This is generally true in cities of from 15,000 to 200,000 population, where families are not partial to apartments. The demand is now for single dwellings, on lots 50 by 132, on the average, surveys show.

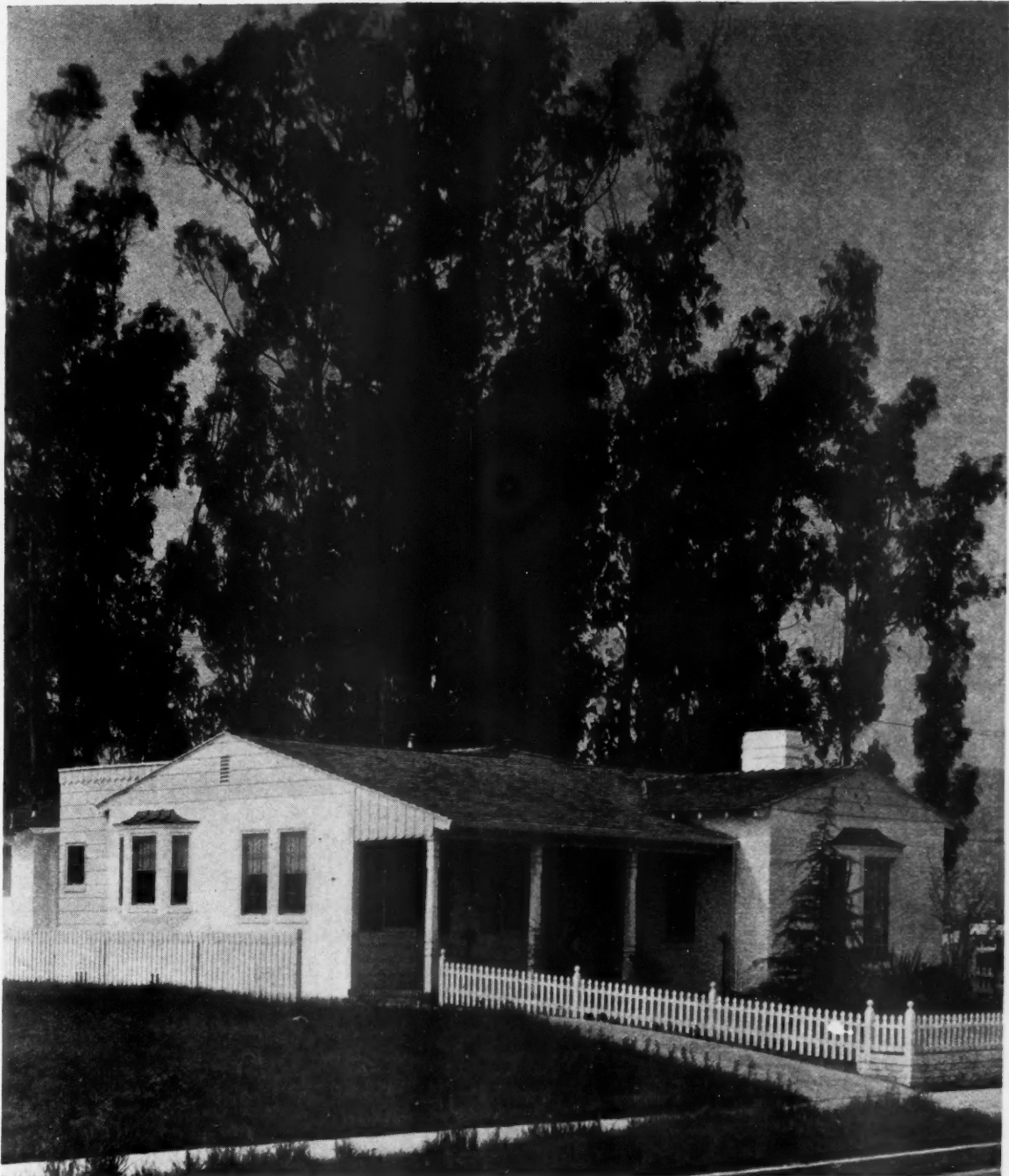
New leisure under the NRA codes is giving men time to work in gardens and yards. They are quick to take advantage of this farming instinct inherent in nearly every city breast. Give them a chance to indulge it. Another factor inclining families toward the single dwelling is the radio, for sensitive persons want to enjoy their programs without bothering their neighbors. The ban on radio after certain hours in many apartment buildings is evidence of the problem this entertainment feature has raised. Oil burners and electric refrigerators are now giving the individual home owner advantages he formerly had to turn to an apartment to obtain.

This very desire for the new deal sort of a home, however, brings me to my third point—one which every contractor considers in building a home, and which the government, with its long time amortized loans, must certainly consider. That is development in homesite areas of enterprises other than those originally intended. If anything needs government supervision, it is this phase

(Continued to page 57)



TWO MORE ATTRACTIVE HURNI-BUILT HOMES in Kalamazoo, both of English design and well built. Hurni is an advocate of sound construction and sound financing, and believes the new FHA Title II financing plan for new construction will revive home building.

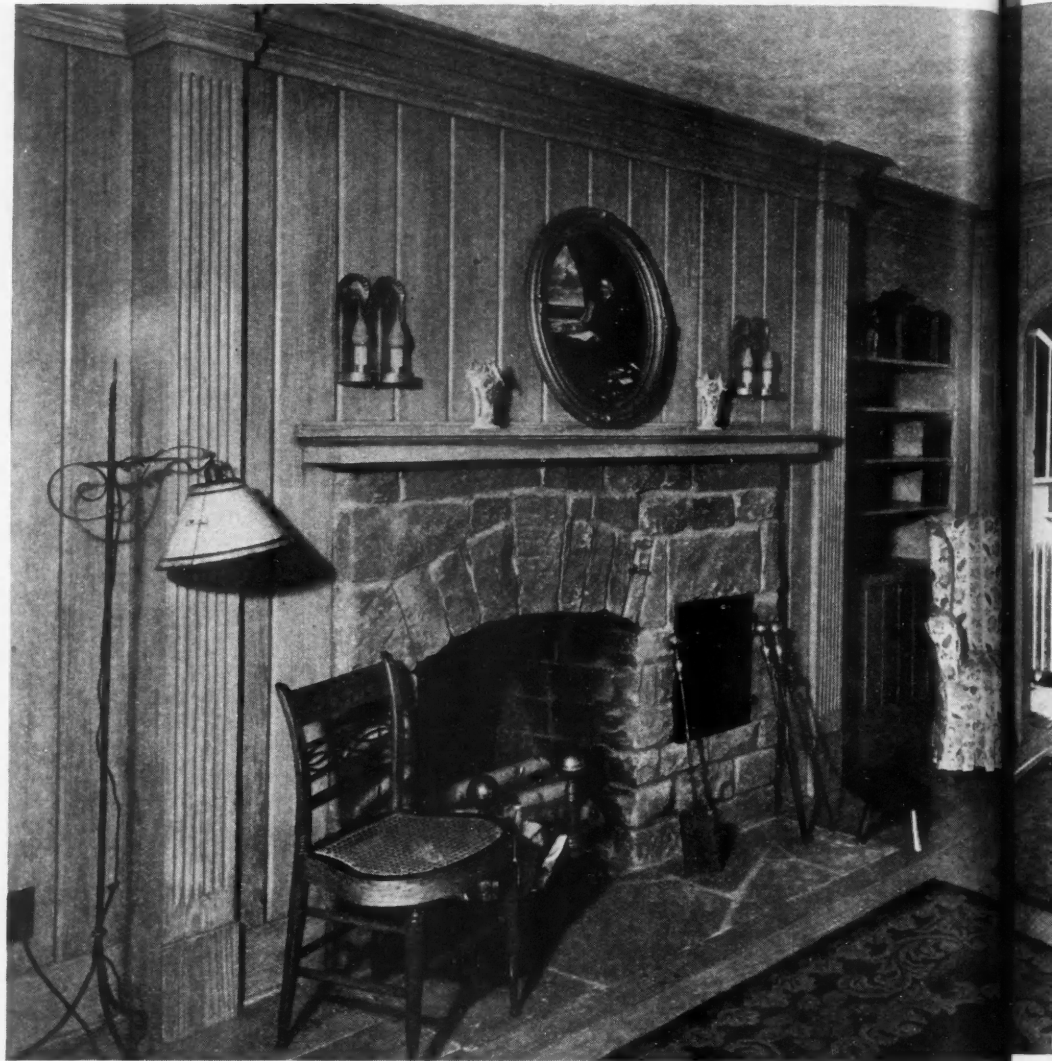


Modernizing Suggestions

Plans and Designs for New Work

GOOD ARCHITECTURAL DETAILS are the essence of good small home design and construction. Both for modernizing and for new home building, the designs illustrated on this and the following pages are especially adaptable for current building work. Illustrated above is a most attractive modern small home recently completed in Los Angeles by J. Clifford Smith, contractor. The details of this home are worthy of study for

they illustrate several important trends. Note the use of white stucco, vertical boards, white-washed brick and wide horizontal siding. The bay windows are executed in a charming and attractive fashion. Other houses on the following pages cover a wide variety of types and plans, suited to various parts of the country. Many helpful suggestions for modernizing old structures will be found in the designs.

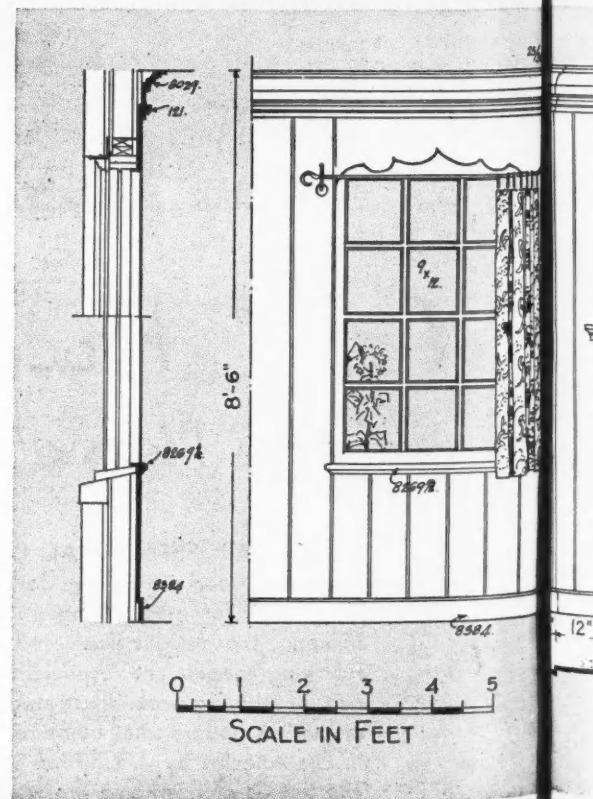


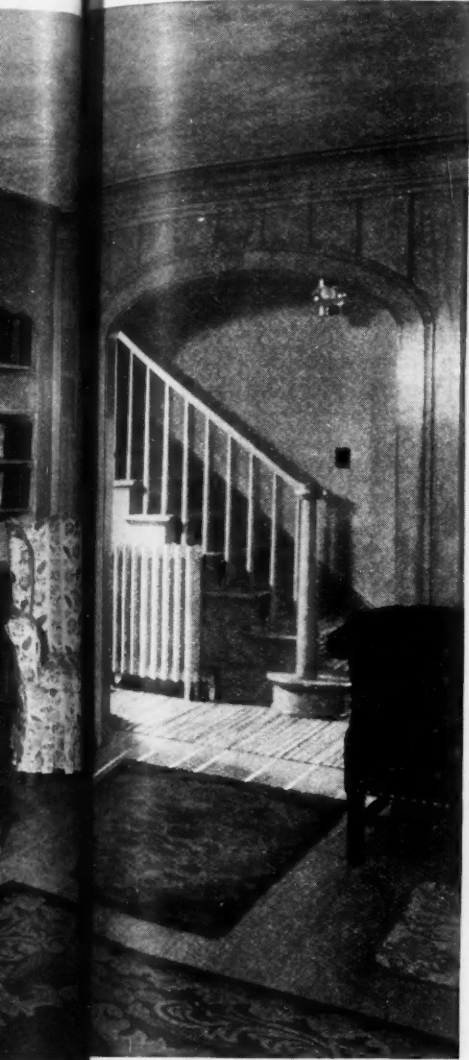
THIS DUTCH COLONIAL interior with pine paneled walls, stone fireplace and attractive built-in bookcases is recommended either for new homes or for the remodeled interiors of old homes. It is comparatively inexpensive, easy to construct.

For Interior Modernizing

WITH THE APPROACH OF COLD WEATHER, interior modernizing under the Federal Housing Administration's financing plan becomes a logical source of business. The use of attractive paneled interiors similar to the one shown above and detailed at right is on the increase. Contrary to general belief, paneled walls of this type are not especially expensive. Practically all of the pieces required may be built directly into place with paneling material regularly carried by the average lumber dealer. Standard stock mouldings are specified.

THE APPEAL OF THE DUTCH COLONIAL interior is very great. The rugged stone fireplace, carefully detailed panel work, simple mantel treatment, are universally liked. The details at right clearly show construction of the bookcases, window, pilasters and moulding.





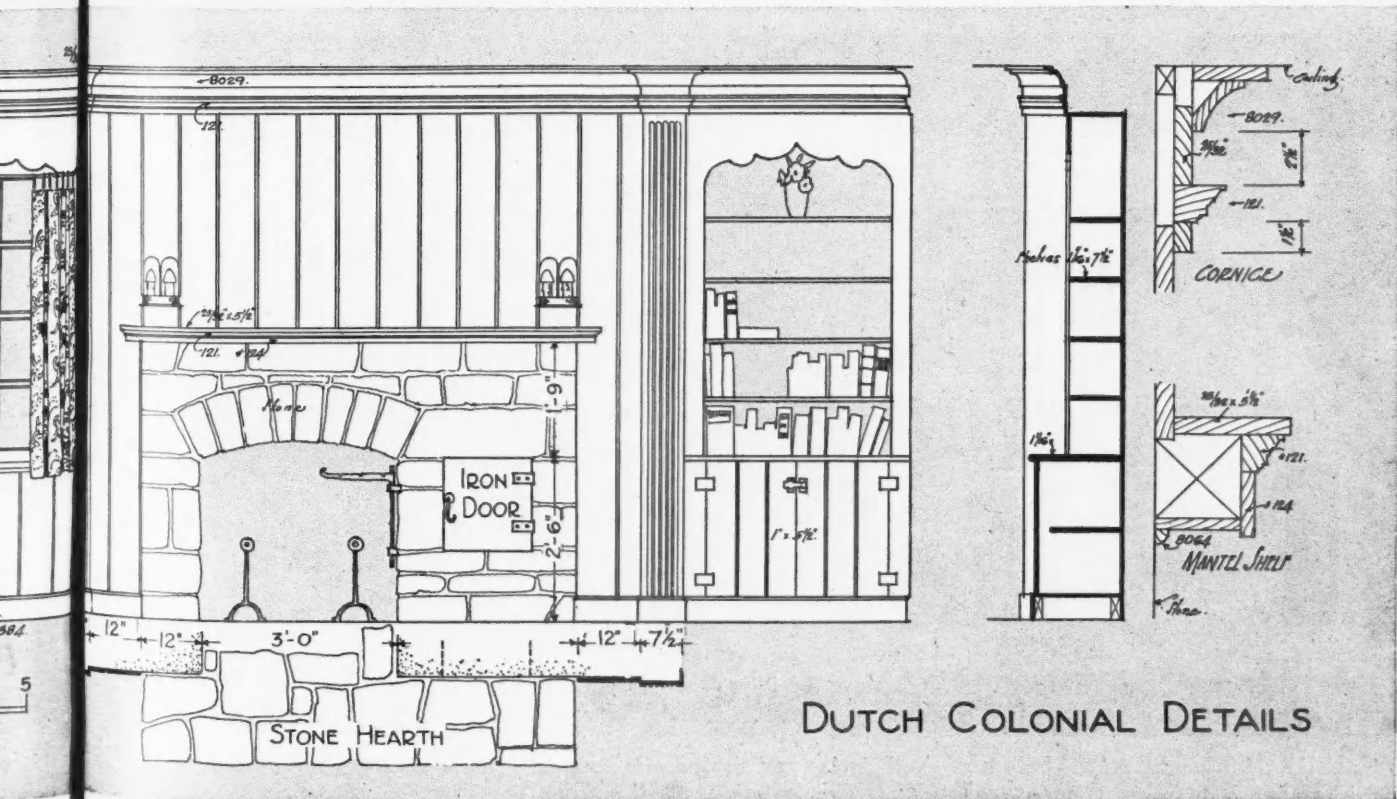
Construction Details for An Arkansas Soft Pine Interior

THE CHARMING INTERIOR illustrated at left and detailed below is of Dutch Colonial design executed in Arkansas Soft Pine. Walls are built of 1" x 8" grooved paneling, standard S4S, net width 1" x 7 1/2". Pilasters are of stock sizes according to scale shown on drawing. The drawing below provides plans for each detail, such as windows, bookcases and fireplace; for installation in a given area, these units may be repeated as required. The design may also be installed using 1" x 10" stock, if preferred, the net size of which is 25/32" x 9 1/2". Moulding numbers on the plan refer to the universally used 8000 Series Moulding Book carried by most lumber dealers.

allow to dry. Follow with a very thin coat of white lead to close the grain; allow to dry thoroughly. Apply a coat of light brown stain (color to suit) putting this on with a rag. This mellows the wood and matches any unevenness in color; wipe off with a second rag before it dries. Then allow to dry and follow with the final wax coating, rubbed to fine finish.

INSTRUCTIONS FOR finishing Arkansas Soft Pine paneling, as recommended by the Arkansas Soft Pine Bureau, Little Rock, Ark., are as follows: Apply one coat of glue size;

IN REGIONS WHERE the prevailing atmosphere is humid, the foregoing formula should be varied as follows: Instead of an initial coat of glue size followed by white lead, apply a priming coat of lead and oil colored to suit with raw sienna or umber and using a small proportion of dryer. This coat is then wiped off with a rag and allowed to dry. Follow with two coats of thin white shellac, sandpapering the first coat and working down the second with steel wool. It is then given good wax finish.

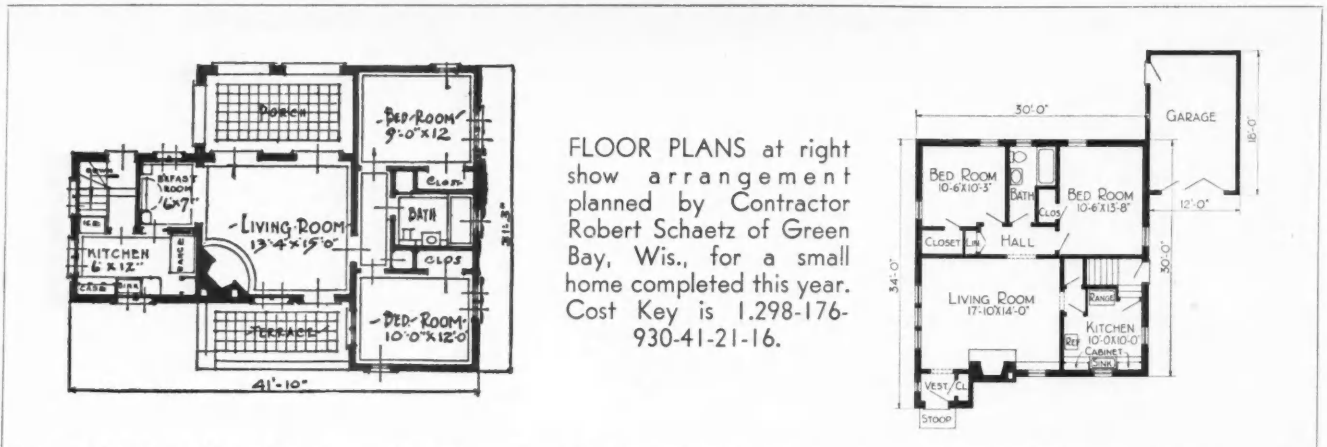


DUTCH COLONIAL DETAILS

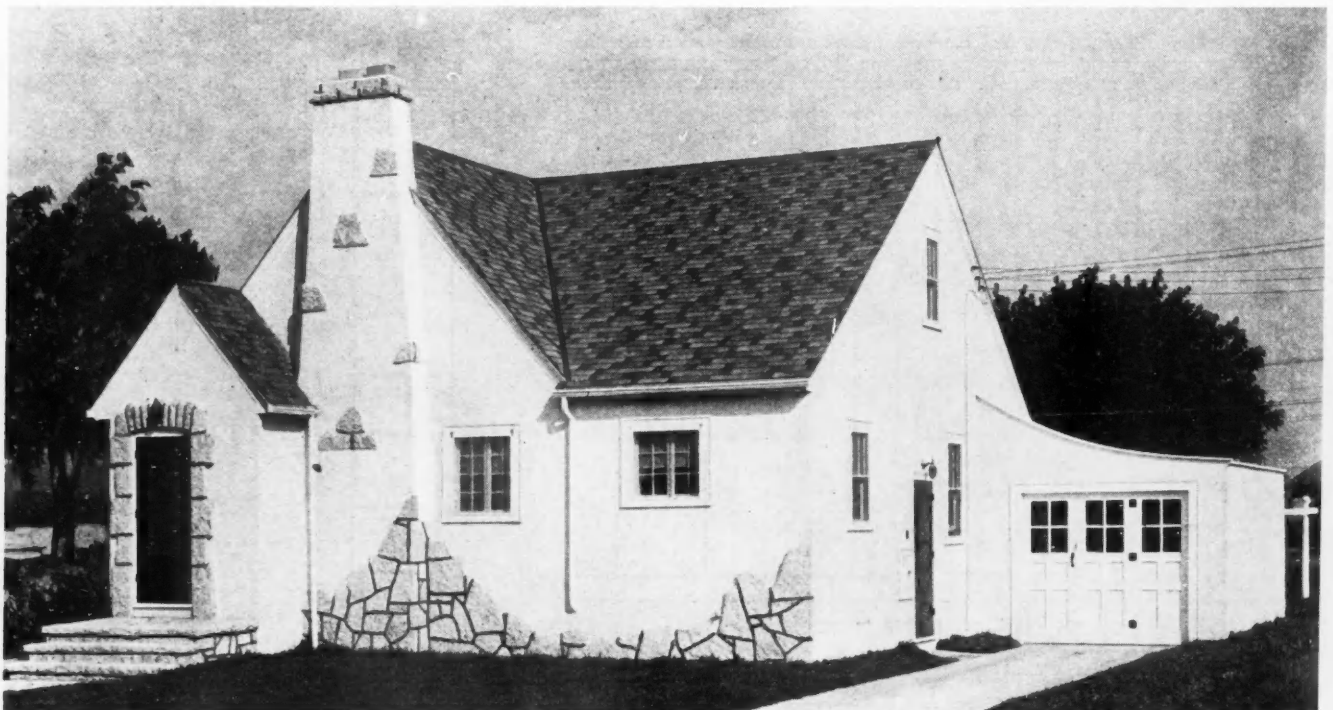


A Small Home For Southwest

IN THE WEST and Southwest, the little home shown at the left is a popular type, with its terrace or patio in front, and porch at the rear with cross ventilation through the living room. This is Design No. 4-B-6 of the Architects' Small House Service Bureau. Cost Key is 1.210-146-(813)-(36)-14-13.



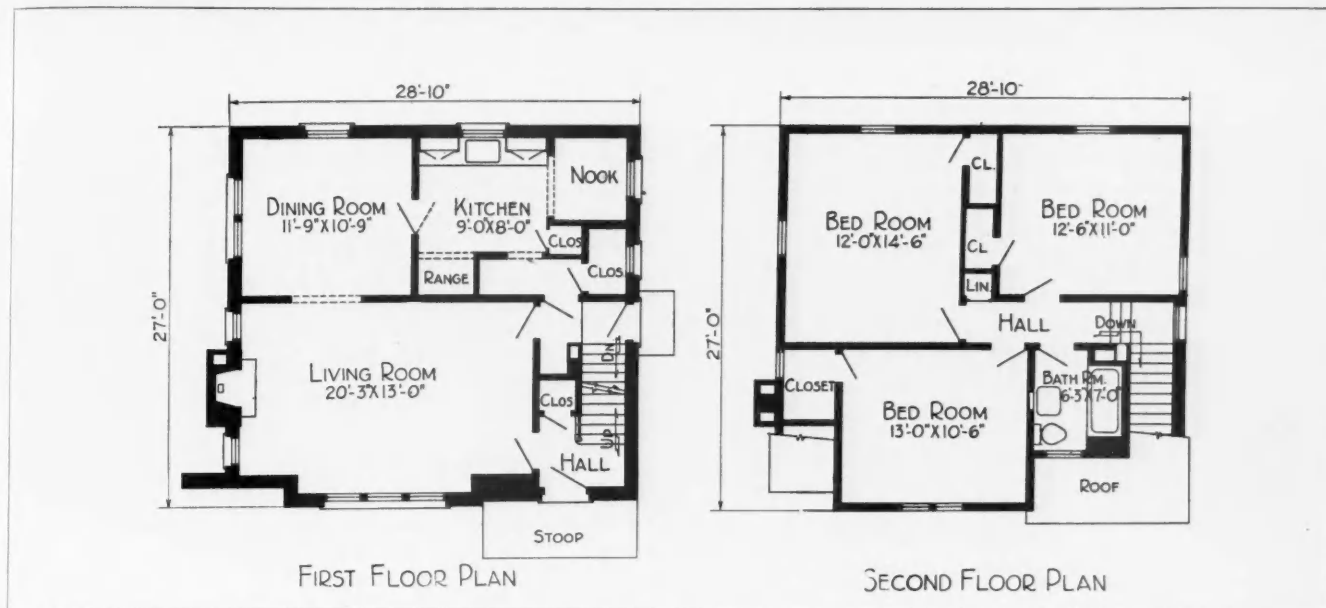
FLOOR PLANS at right show arrangement planned by Contractor Robert Schaetz of Green Bay, Wis., for a small home completed this year. Cost Key is 1.298-176-930-41-21-16.



A LOW COST HOME BUILT AT GREEN BAY, WIS., this year by Robert Schaetz. Materials were supplied by the Standard Lumber & Millwork Company. The floor plan is compact and inexpensive. Frame construction is used.

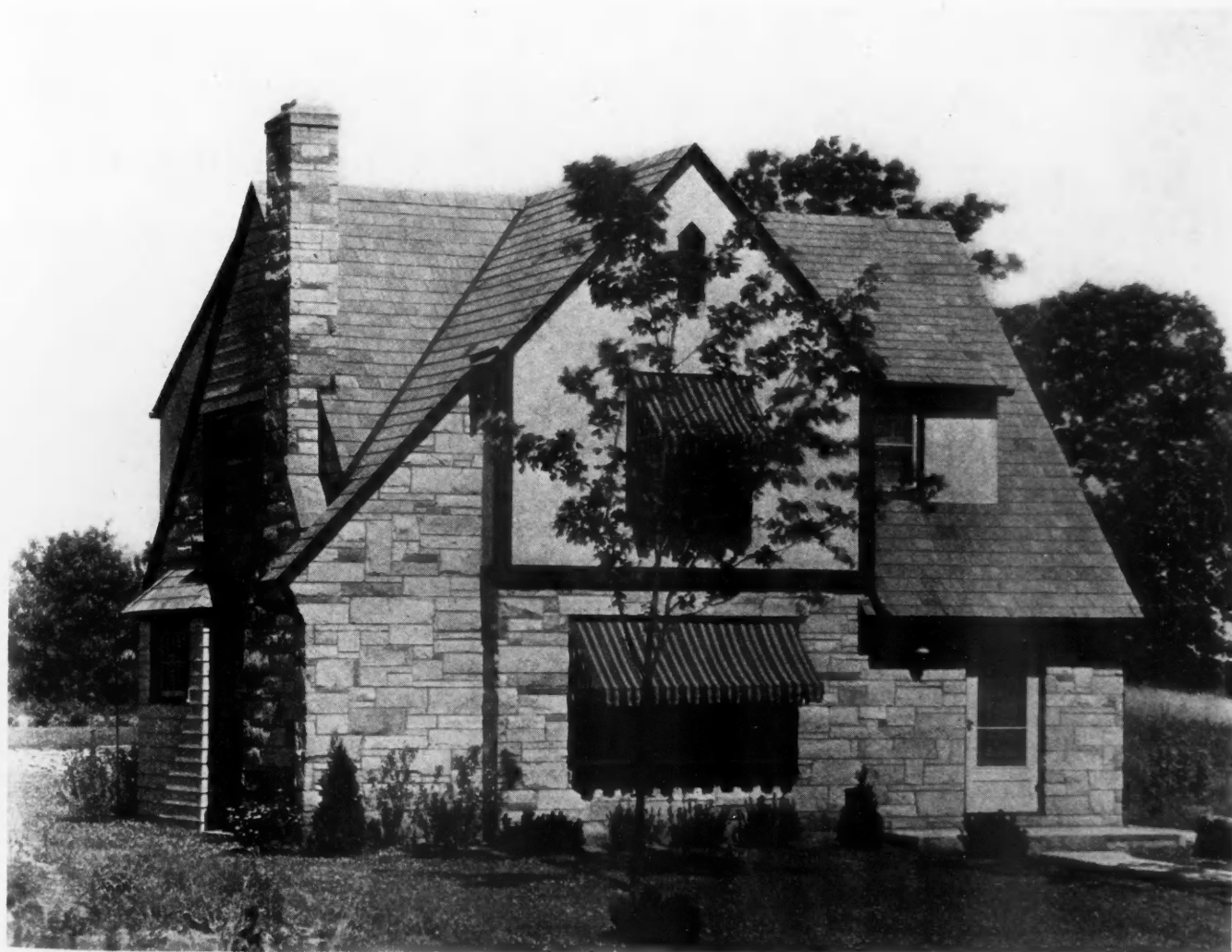
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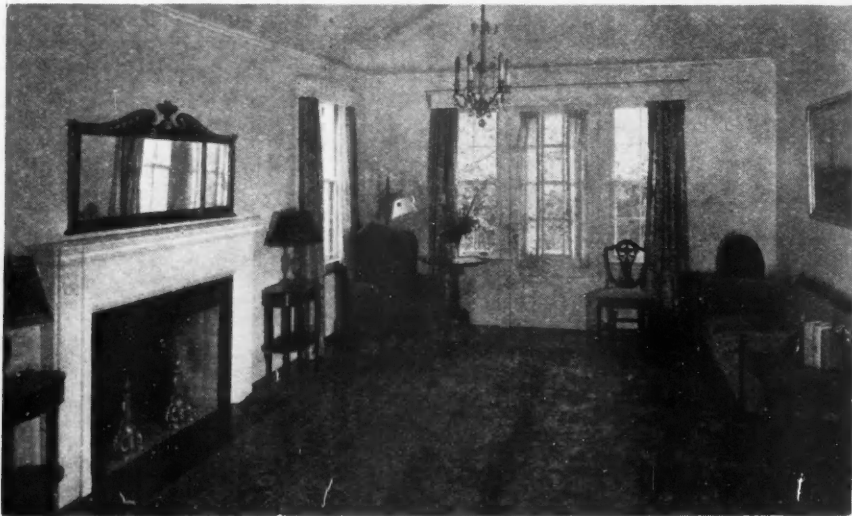
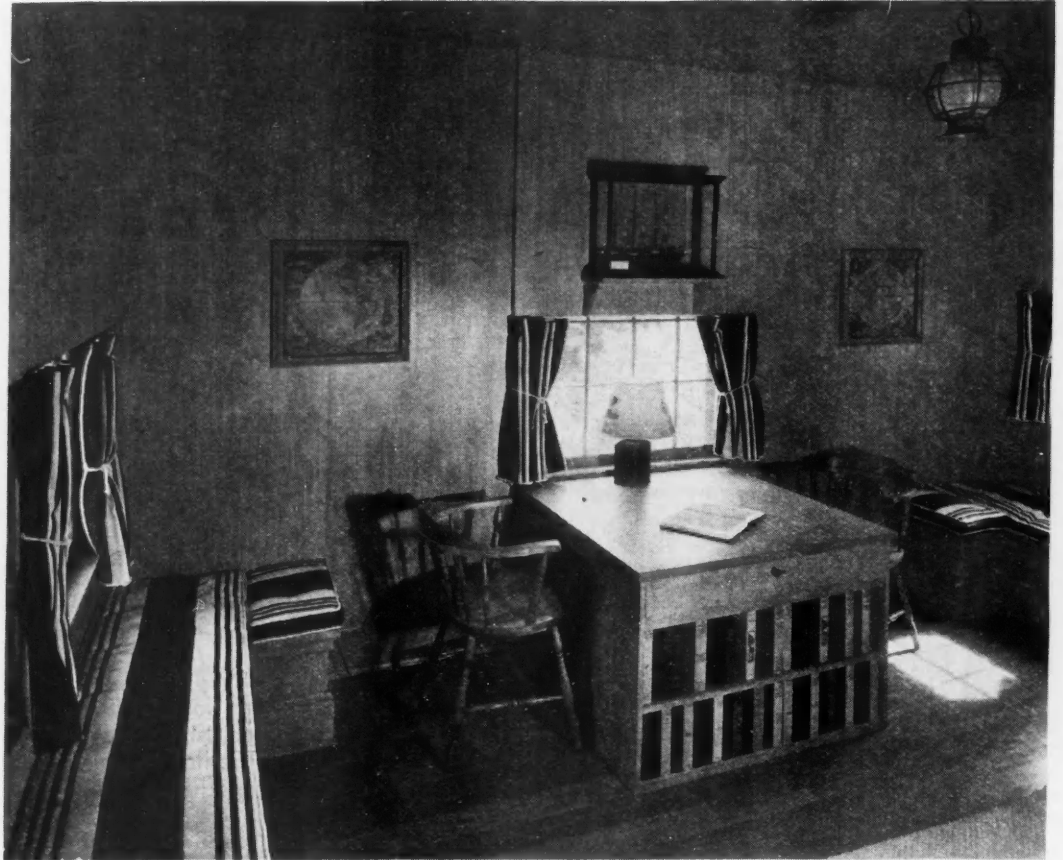


Stone, Siding, Stucco In New Michigan Home

THIS FRAME HOME BUILT BY Contractor Harry Hurni of Kalamazoo, Mich., uses stucco, stone and siding in combination. The house is air conditioned, well arranged, attractively styled by a builder closely in touch with current home needs. Cost Key is 1.442-114-768-32-21-13.



THE BOYS' ROOM of the David Crockett house shown at right is designed like a ship's cabin. Walls and ceiling are covered with paper giving the appearance of random width pine boarding. Woodwork is of natural pine. There are double built-in bunks, a double desk of pine, and pine window seats with hinged tops.

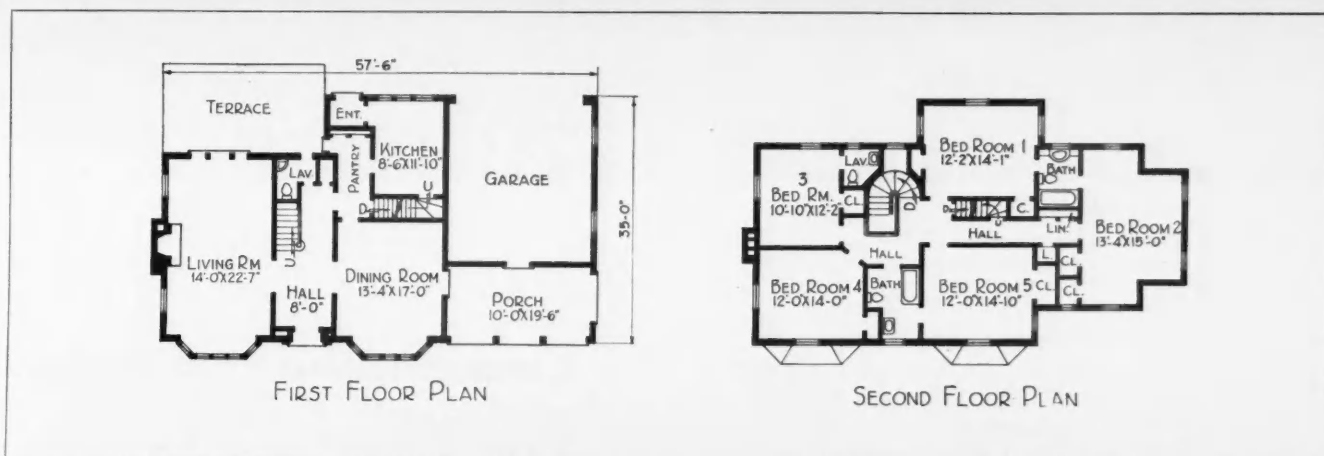


Washington, D.C., Exhibition Home

W. C. AND A. N. MILLER, Washington, D. C., home builders, erected this attractive house late in 1933 and opened it as an exhibit home. In the exterior the builders adhered to the traditional simplicity of the New England Colonial residence. The interior has been done with great skill and charm, as shown by the living room at the left, with its fine Colonial fireplace.



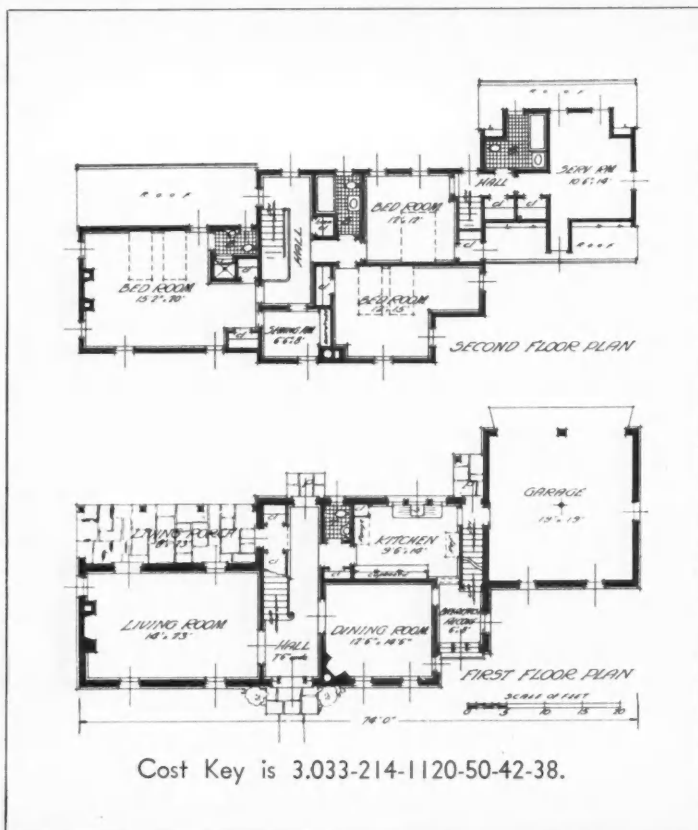
A FEATURE OF THE HOUSE is the pine paneled basement recreation room shown at the left, which is large and pleasant, with a wood-burning fireplace and concrete floors. A service stairway leads from third floor to basement. The garage is located in a wing with entrance at rear.



FLOOR PLAN features the wide Colonial center hall with curved stairway. Glass doors lead from living room to a large flag terrace. Cost Key is 3.106-190-1204-51-37-28.

THE TERRACE at rear, which is reached by door from the living room, forms an attractive outdoor recreation spot, looking out over the garden and lawn. The house is spacious throughout with ample closet areas, plenty of windows, light and air.

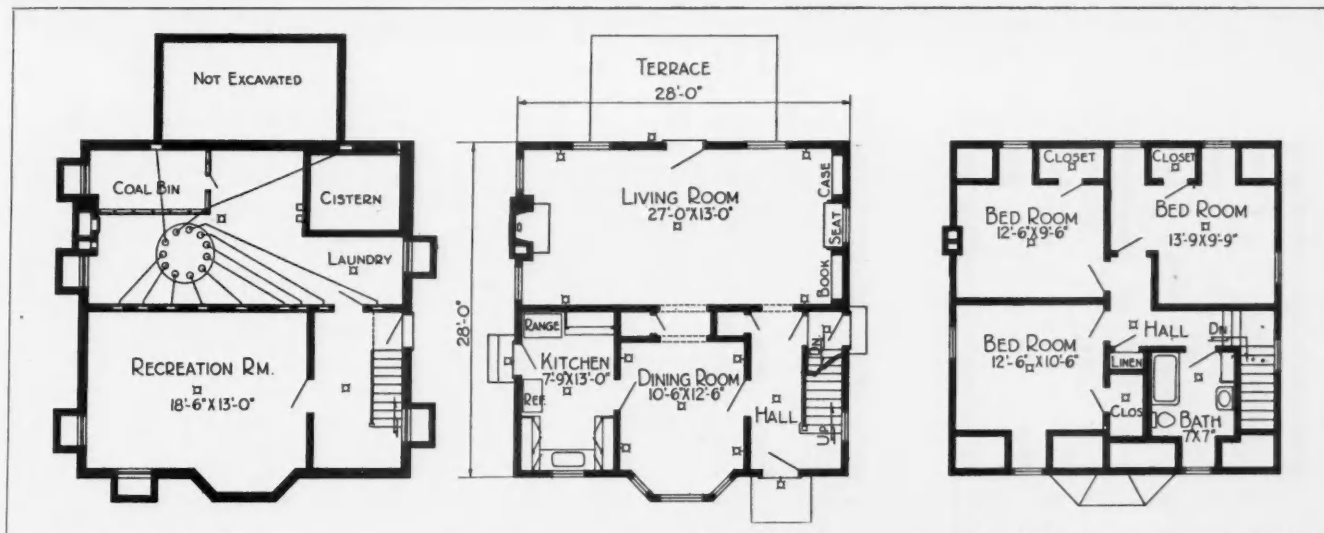




Commodious Colonial For Comfort Living

PEOPLE STILL LIKE large, well-planned homes for comfortable living, and some are building such homes, as the above designed by Architect R. C. Hunter and built by Christopher Campbell, Inc., both of New York City. The Colonial design is well proportioned, expertly carried out, with brick first floor exterior; wide siding from there up.

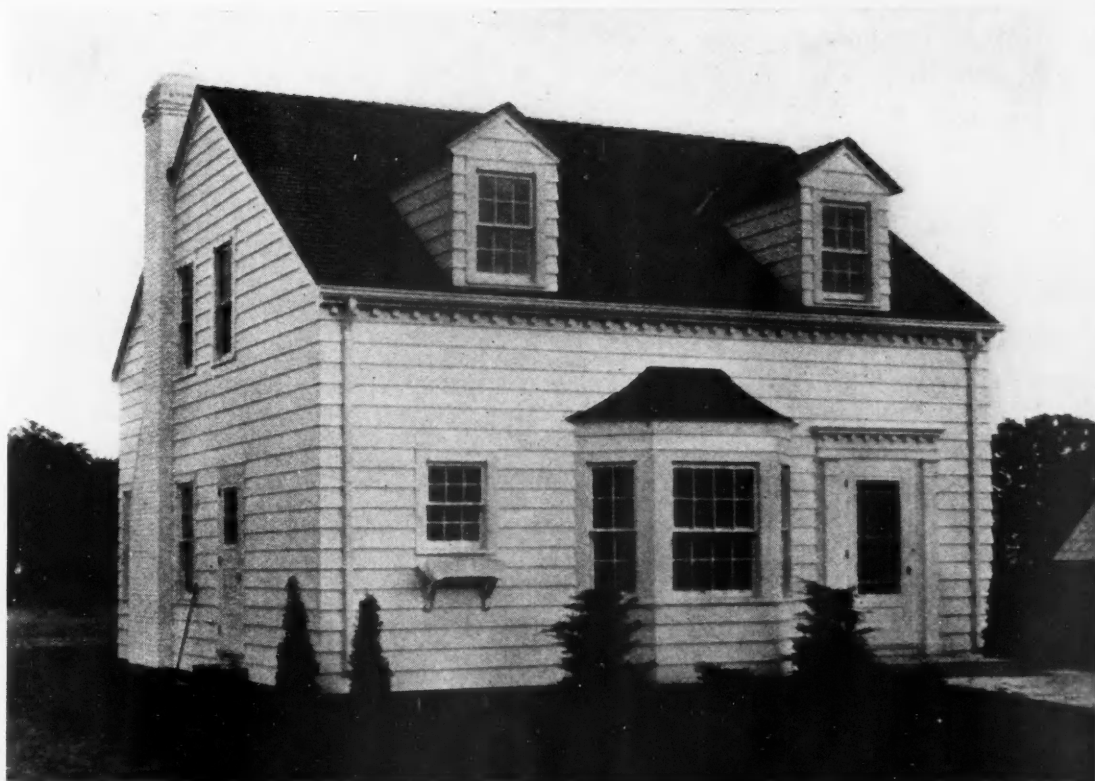
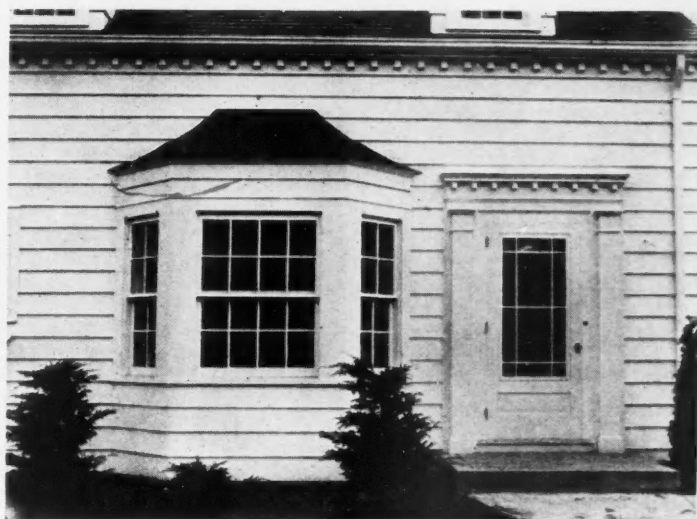
FLOOR PLANS AT LEFT SHOW how this home has been designed for the utmost in pleasant living—the large living room with living porch at rear, spacious entrance hall, dining room with fireplace, a breakfast alcove to get the morning sun, service stairs at rear reaching servant's quarters above the garage. There are three baths on the second floor, three large bedrooms besides the servant's room, and a sewing room tucked away above the stairs.

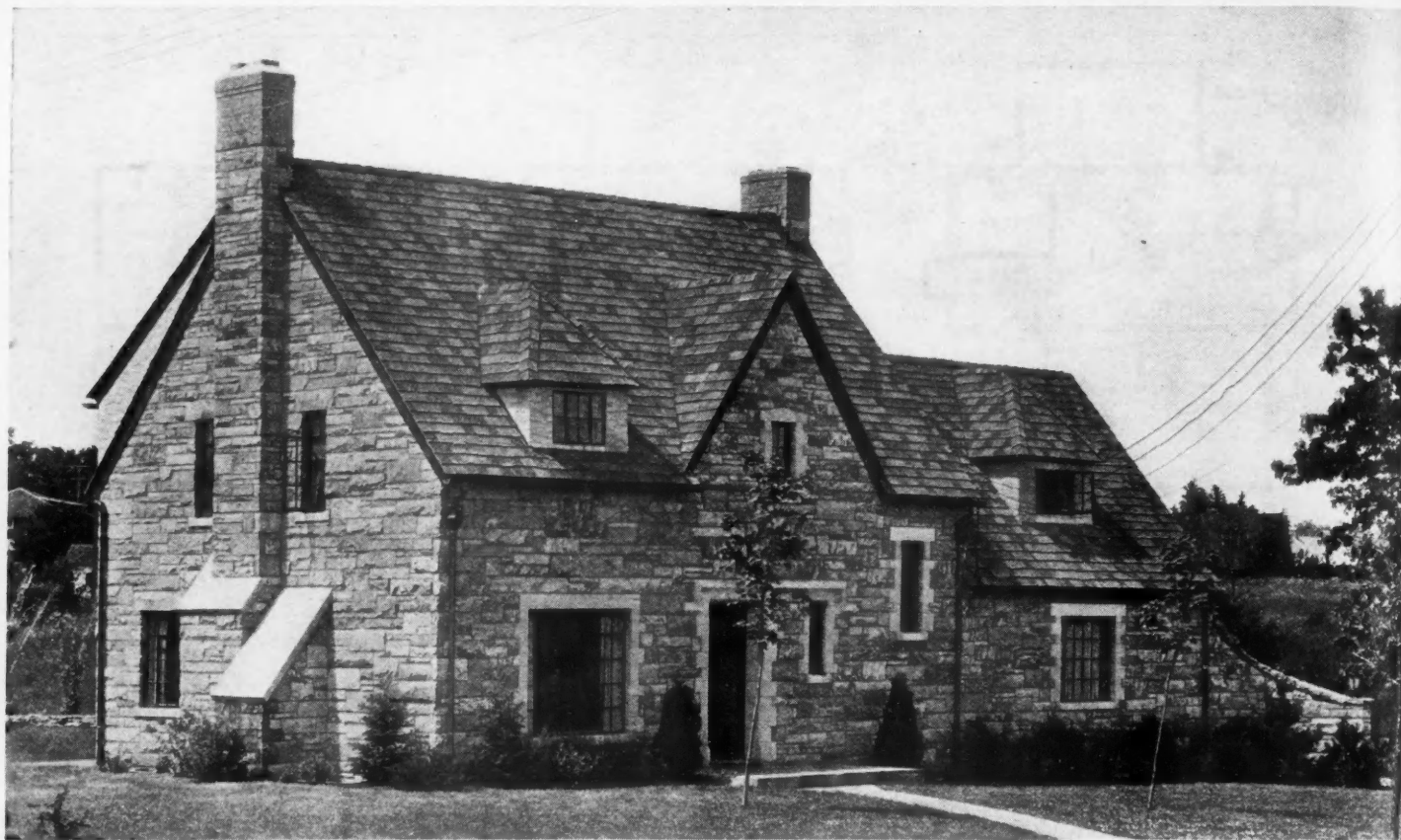


Neenah Perfect Home

IN NEENAH, WIS., Otto Lieber of Modern Home Builders so admired the St. Louis "Perfect Home" published in the June American Builder that he built a similar Perfect Home for Neenah. Here it is, photographed October 2, as it neared completion. It sells for \$6,800 with lot.

Features of the plan of especial interest are the large living room at rear and attractive bay window which gives size to the dining room. Cost Key is 1.560-116-804-34-20-13.



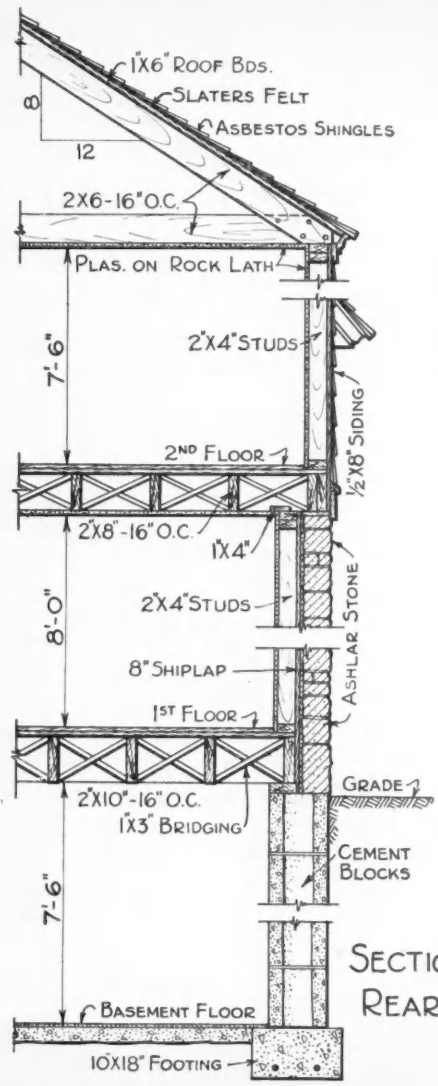


Well Planned—Well Built

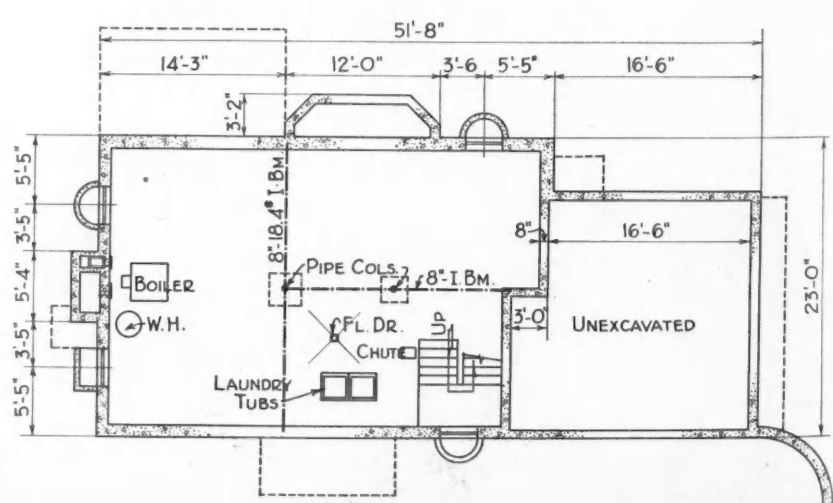
HARRY A. HURNI, KALAMAZOO, MICH., BUILDER

THIS SUBSTANTIAL AND ATTRACTIVE HOME was built by Harry Hurni in Rolling Hills subdivision of Kalamazoo, Mich., and sold for \$14,500 with lot. Examination of the construction details shows that it is built with great care and in a substantial manner. It has a cement asbestos roof, substantial stone walls, steel interior trim. Steam heat is provided by an oil burner.

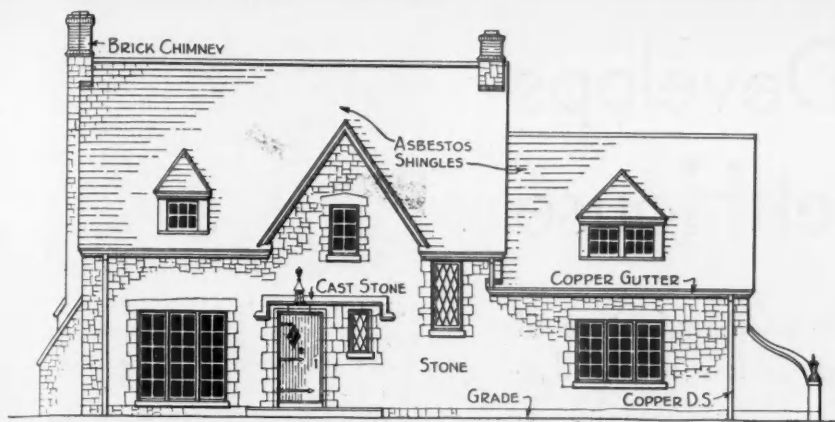
Cost Key is 1.950-156-846-38-27-19.



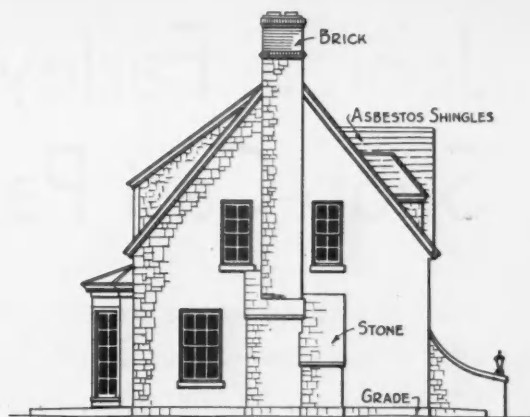
SECTION THRU REAR WALL



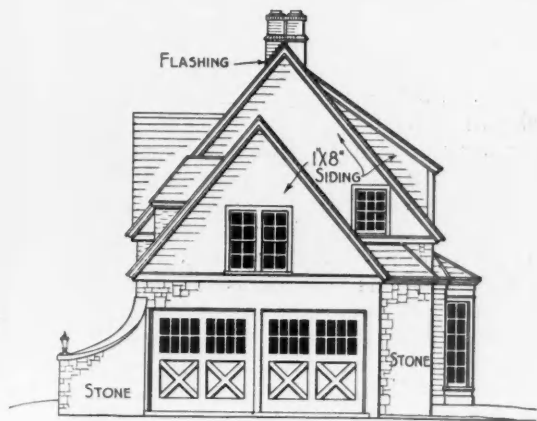
BASEMENT PLAN



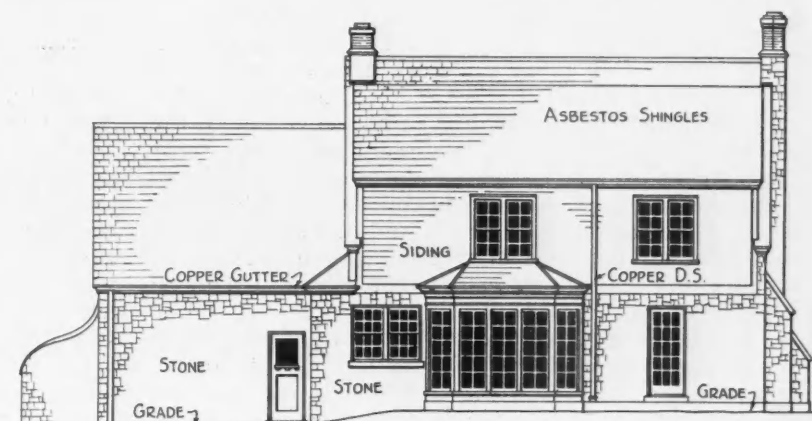
FRONT ELEVATION



SIDE ELEVATION

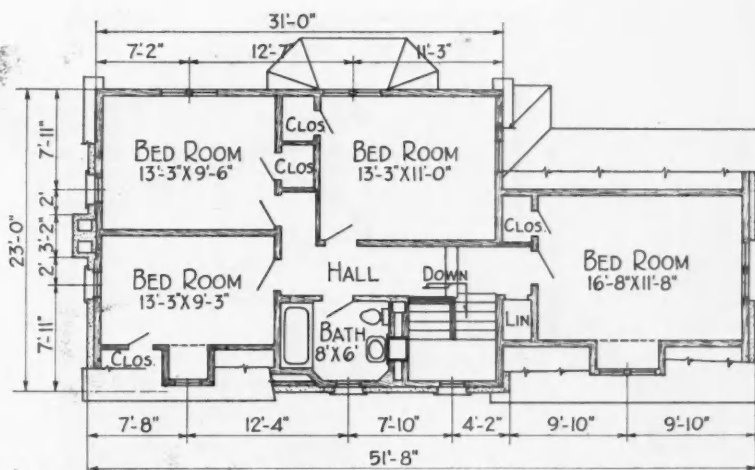


SIDE ELEVATION

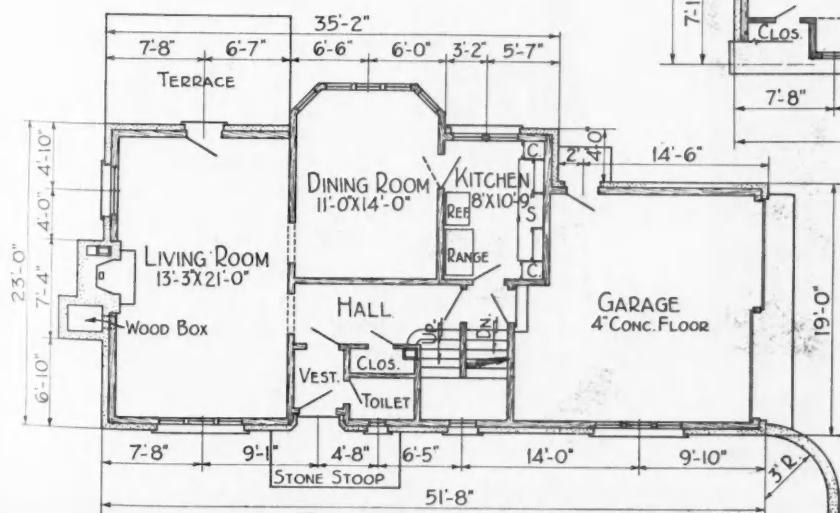
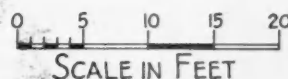


REAR ELEVATION

This is not a large house, but a well planned one. Downstairs rooms are spacious; upstairs there are four good sized bedrooms. Arrangement of garage, kitchen and entrance hall combination is good. Details include copper down-spouts and gutters, select oak floors throughout, attractive bay windows, recreation room in basement, 20 by 18 foot garage, well planned kitchen.



SECOND FLOOR PLAN



FIRST FLOOR PLAN

John J. Earley Develops Shop-Cast Panel House

Well known concrete expert turns from manufacture of cast stone mosaics for Bahai Temple, Chicago, and Justice Building, Washington, to field of the small home.

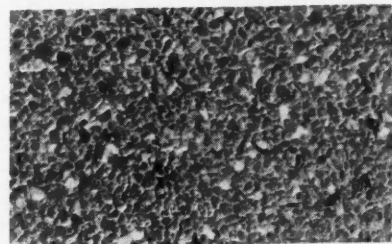
ON THE outskirts of Washington, just across the Maryland line out 16th Street, a little house is being assembled that is very likely to exert a great influence on home building in this country. It is the work of John J. Earley and is altogether revolutionary in the field of small construction, although the methods used have been successfully employed for many years by Mr. Earley in monumental structures. The colorful mosaic surfaces in concrete for which Mr. Earley is so famous give charm and permanent beauty to this small house; yet by an ingenious system of manufacture and assembly the cost is expected to be kept very low.

The plan utilizes shop-cast panels of dense, reinforced concrete, 2 inches thick, 9 feet (single story) high and up to 9 feet wide. The panels are cast face down in plaster moulds, the face consisting of colored aggregates to carry out any decorative effect desired. Window and door panels include these members of metal, complete, cast solidly in place, with proper sills, jambs and head of extra depth and beautifully colored.

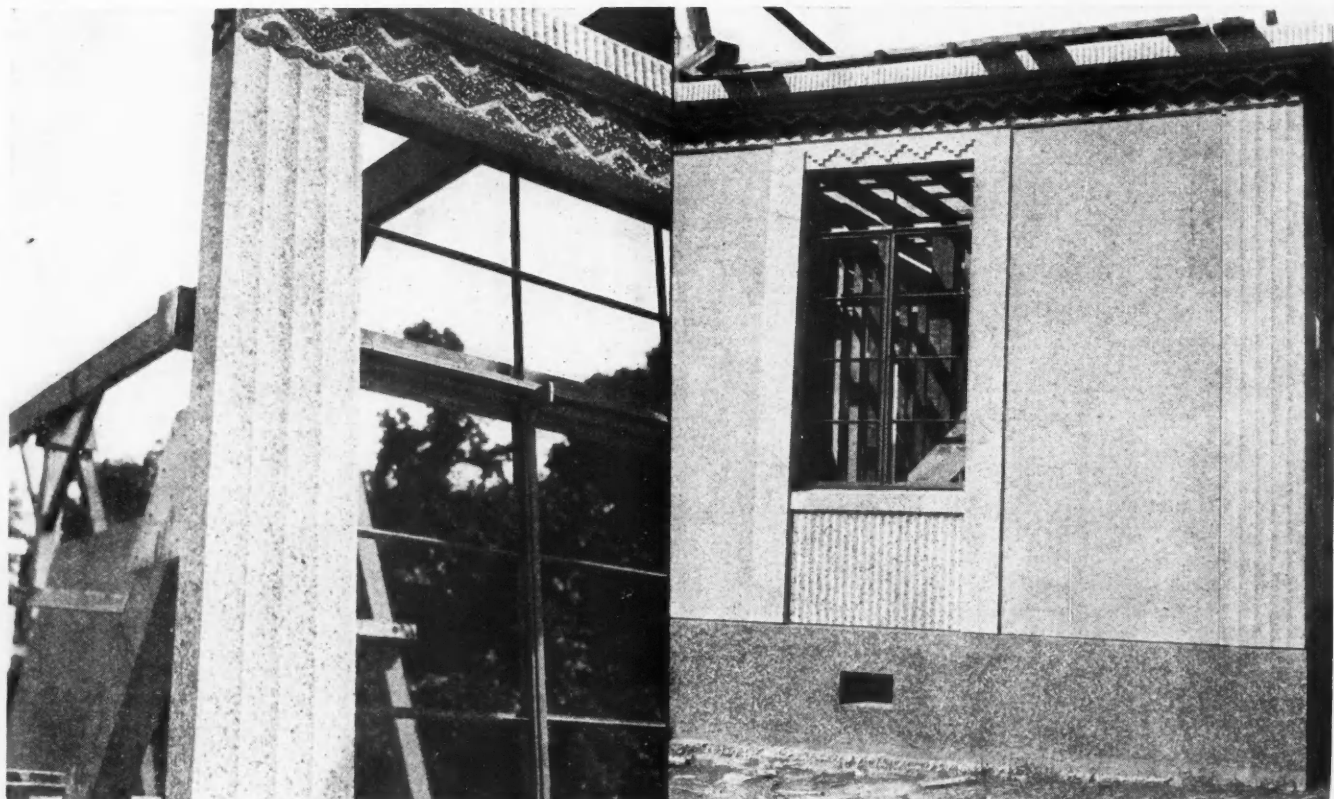
Blank wall panels and corner pilasters complete the assortment.

Transported to the job by light motor truck fitted with inclined carrying racks, these panels are easily handled and set by two men using a chain hoist on an A-derrick as shown in sketch.

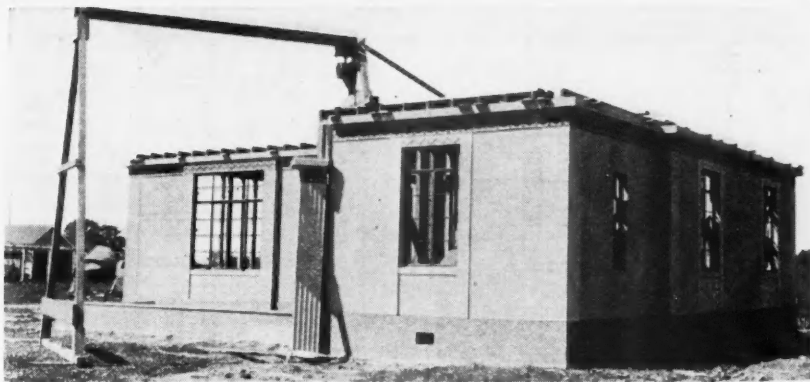
A stud frame very similar to ordinary construction is used by Mr. Earley as a temporary support for his concrete wall panels—with this difference: wherever two panels are to join and a reinforced concrete supporting pilaster is to be poured, two studs are placed 6 to 12 inches apart to act as side forms for such pilaster. Short iron rods, $\frac{1}{4}$ inch, are slipped into holes spaced about a foot apart up and down these studs. When the concrete panels are set they are wired to these rods by means of iron loops embedded in the backs of the panels. Thus the ornamental face panel and the two studs become three sides of a form for pouring the reinforced concrete pilaster from foundation to plate, which then becomes the supporting frame of the house, the wood studs no longer serving a struc-



SURFACE TEXTURE of vitreous colored aggregates. Mr. Earley has developed the art of coloring and texture in concrete work to a high degree, and produces surfaces of varying shades and color that are widely admired by artists.



LEFT—WINDOW PANEL at casting yard suspended from overhead track preparatory to loading on truck. **Right—window panel assembled** with blank wall panels and corner pilasters on the poured foundation at the building site.



THE LITTLE EARLEY HOUSE just outside of Washington as it looked on Oct. 10. It contains five rooms and will be covered by a low-slope hip roof. The exterior sparkles with color. Diagram sketches below show how shop-cast panels are handled and the supporting stud frame built.

tural purpose but merely acting as nailing blocks for attaching the inside wall surface, which can be of any desired material.

The importance of this small house development as viewed by Mr. Earley is indicated by a statement he made on Oct. 24, on the occasion of the Preview of the Earley mosaic ceilings in the new Department of Justice building at Washington held under the auspices of the Washington Chapter of the A.I.A. He said:

"These mosaic ceilings, as you see them in place, mark the end of a long period of intensive development of architectural concrete and the beginning of a new period of great promise. Their development began fifteen years ago with the concrete retaining walls of Meridian Hill Park here in Washington, in which our studio attempted for the first time to solve the problem of improving the appearance of cast concrete by exposing the pebble aggregates. That development has continued during the ensuing years with the experience gained in such monumental constructions as Lorado Taft's Fountain of Time at Chicago, a replica of the Parthenon at Nashville, a group of churches headed by the Shrine of the Sacred Heart in Washington, the Louisiana State University at Baton Rouge and the Bahai Temple at Chicago.

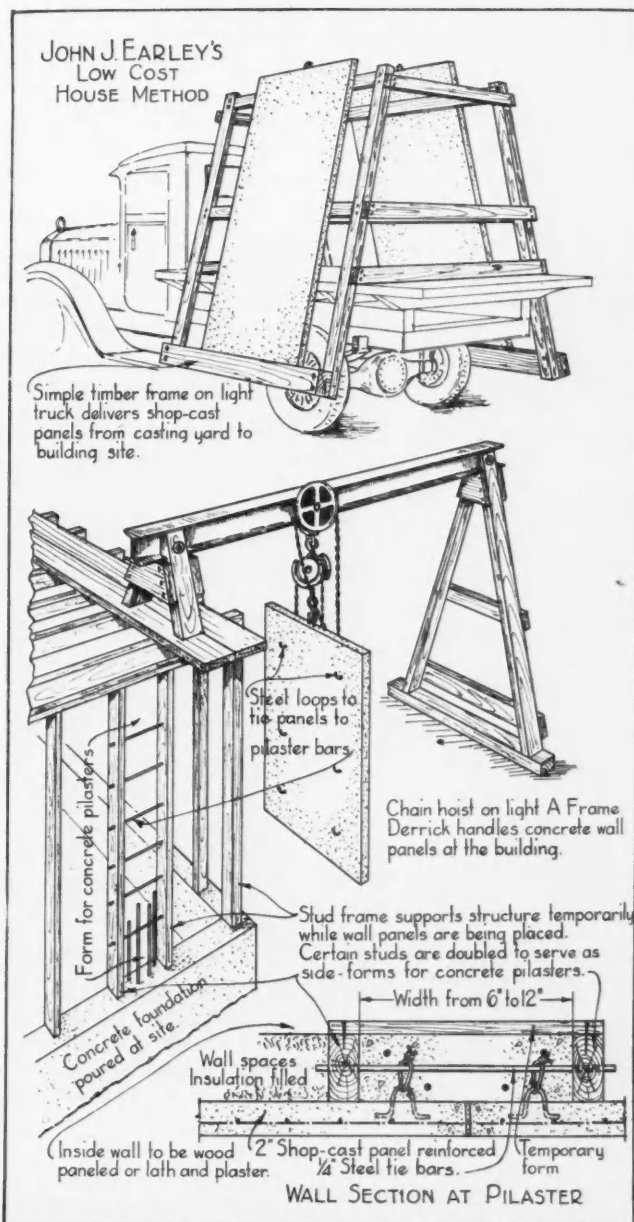
"In that period the mosaic character of architectural concrete has been slowly perfected by a gradual improvement of the technique for controlling the particles of stone which make up the surface. The research work which was necessary to solve the particular problem presented by each of these projects in turn, made it possible to perfect this control of the surface colors by bringing these stone particles more closely together, by minimizing the interference with their color by the cement which holds the particles together, and by enabling us to adhere more closely to the exacting demands of mosaic designs."

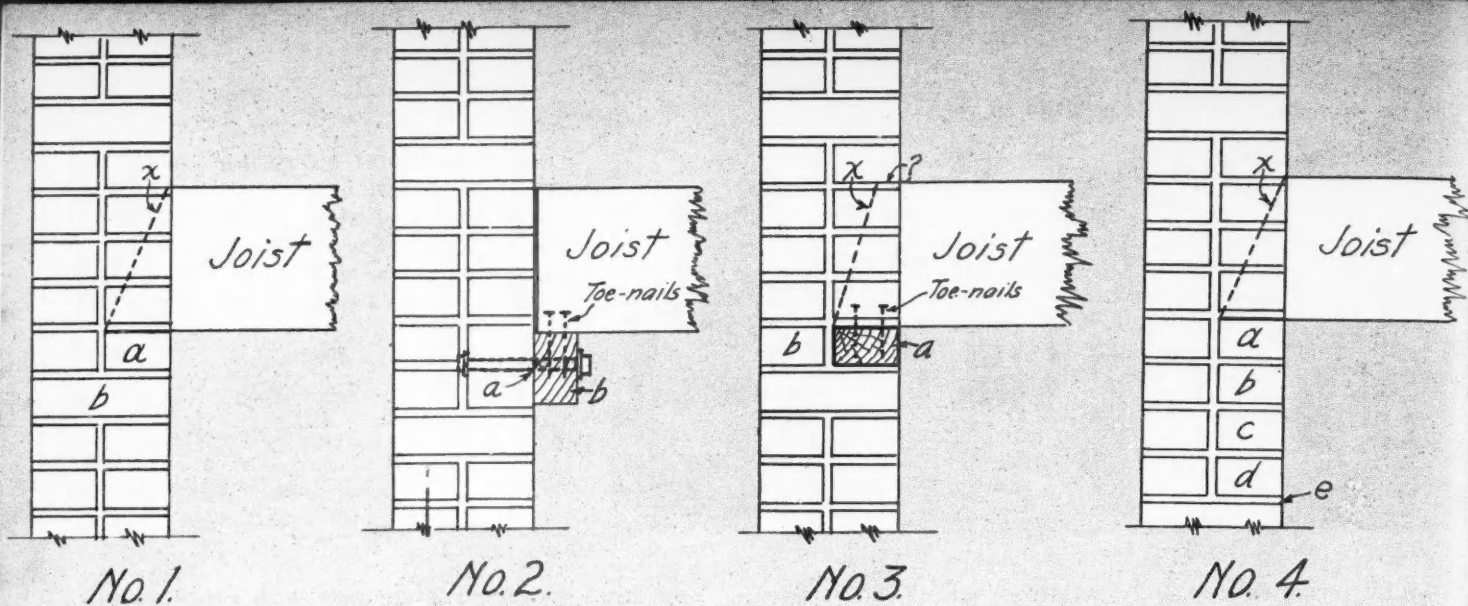
"It has been the happy experience of our studio to find that throughout this work economy and quality have gone together step by step. Each year has added new improvements in appearance and with each improvement has come a greater economy. The precast panels which comprise at the same time the architectural finish and the forming for the structural concrete are the technical contributions to architectural concrete made by the mosaic ceilings in the new home of the Department of Justice. They promise to be the initial step in another period of development.

"Our studio did not stop with this development when we completed these ceilings for the Department of Justice. In keeping with the spirit of the times and, we believe, in co-operation with the Administration's plan to improve the housing conditions of the nation, we have applied these precast panels to the solution of the small house problem. In the suburbs of Washington, we are building a modest home in which precast panels

of reinforced architectural concrete with exposed aggregates are used as walls. These panels represent the same high artistic beauty, the same permanence, and the same freshness of color and design that we believe distinguish the mosaic ceilings in this building.

"It is a great satisfaction to us that the work which was done in these gorgeously colored mosaic ceilings has helped to perfect a technique which should now make it possible to put enduring beauty into the walls of the humblest subsistence homestead."





Some Common Construction Errors and How to Prevent Them

By OSCAR G. KNECHT

Chief Building Inspector, San Diego, Calif.

WE frequently read of cases where some building has collapsed or a partial failure occurred. A careful inspection of these failures usually discloses a flaw in the material, or improper construction. The fact that a newly built building does not fall down is no evidence that the structure is well built or safe. A severe wind storm, earthquake or small overload may cause at least a partial failure. A few common errors and their remedy are shown in the accompanying drawing.

Figures (1) to (4) are cross sections through ordinary eight-inch brick walls. Figures (1) and (4) show respectively the right and wrong way of supporting floor joists. In Fig. (1) you see the joist resting on a stretcher course (a), which in turn rests directly on a header course (b). (a) distributes the load and (b) bonds the wall together near the joists. Fig. (4) shows the joist resting on the four stretcher courses (a), (b), (c), (d). This should not be permitted, because there is a tendency to fail by pivoting about the point (e) during vibration or during a severe wind storm.

Fig. (2) shows a common method of bolting a 3 x 4 ledger (b) to a brick wall. Nine times out of ten the bolts are too far apart, due to the habit of guessing the size and number. $\frac{5}{8}$ -inch bolts 16 inches o.c. are frequently specified, regardless of span or load. Initial failure usually occurs when the brick crushes at the edge (a) Fig. (2). Even though the bolt extended through the wall, crushing at (a) would occur just the same.

We will now make an investigation of a bolted connection of this kind. The safe crushing strength of good brick masonry is about 300 pounds per square inch, and the average safe crushing strength of Y.P. or fir at right angles to the grain is 340 pounds per square inch. In this case the bolts must be designed relative to the crushing strength of the brick. An empirical rule is to assume

that the bolt bearing area extends four diameters into the masonry. Consequently, the bearing area for a $\frac{5}{8}$ -inch bolt is $4 \times \frac{5}{8} \times \frac{5}{8}$ or 1.5625 sq. in. The fact that the bolt extends more than 4 diameters into the masonry is of little consequence insofar as the bearing area is concerned. The working strength for each bolt bearing on the brick masonry is now seen to be 300×1.5625 or 468.75 pounds.

For our problem we have assumed 2 x 10 No. 1 common Y.P. joists 16 inches o.c. spanning a distance of 14 feet. Each joist will support a total uniform load of 2000 pounds, 1000 of which will be supported by the ledger and a $\frac{5}{8}$ -inch bolt when the bolts are spaced 16 inches o.c. Consequently, there are an insufficient number of bolts. If one $\frac{5}{8}$ -inch bolt is good for 468.75 pounds the bolts (Fig. No. 2) *must be spaced 7½ inches o.c. in order to safely support the loads above mentioned.*

Figure (3) shows a common method of resting joists on a continuous 2 x 4 wooden plate (a), which is laid up in the wall and takes the place of a row of brick. This should never be permitted, especially in 8 and 12 inch walls. The wooden plate will shrink and the brick immediately above have nothing to rest upon unless the wall tilts a trifle. In the case of an eight-inch wall there will be only a 4-inch wall thickness at (b) Fig. (3) after the wooden plate (a) shrinks. The remedy for this error is shown in Fig. (1) a.

At x Figures (1), (3) and (4) is shown common methods of fire cutting the joists. Figures (1) and (4) are correct. Figure (3) is absolutely wrong, though often used. For obvious reasons the fire cut shown in Fig. 3 is of no value. The top of the joist should not extend more than $\frac{1}{2}$ inch into the masonry.

The question of joist anchors will not be treated in this article. However, it may be well to mention that the anchors should not stop in center of an 8-inch brick

wall. They should extend through the wall with plate on exterior, or be especially designed to be embedded in the horizontal joint in the exterior row of brick.

In Fig. (5) we see a steel shelf angle bolted to a reinforced concrete beam. Placing the bolts horizontally, without calculating the correct spacing, often causes crushing at the point (a) and a partial failure may result as shown in Fig. (6). This is another case of an insufficient number of bolts, on account of the common practice of assuming the size and spacing of bolts. The fact that the bolt extends an unusually long distance into the concrete does not help matters at (a), Figures (5) and (6). See Fig. (7) for a simple remedy.

The anchor screws or spikes shown at (b) Figures (5) and (6) often miss the joists, because in many cases the holes are drilled in the steel angle without knowing the exact location of the joists. The method shown at (b) Fig. (7) will avoid this difficulty.

Fig. (7) shows a common and correct method of securing the shelf angle to the reinforced concrete beam. There is no crushing at (a) and the allowable shear on the bolt can easily be developed by the hook (c) and the adhesion of the concrete. The wooden shelf plate is bolted to the angle and the joists can always be toe nailed to the plate, regardless of joist spacing.

A common method of framing wooden joists and beams together is shown in Fig. (9). The wooden shelf strips are shown bolted to the beam. We frequently find an insufficient number of bolts in this type of connection also, in which case a partial failure at least may occur, as shown in Figure (10). In Figure (10) the wooden fibers have crushed at (a), thus allowing the bolt to bend as shown. It is well to keep the top of girders lower than the top of the joists, as indicated at (X), Figures

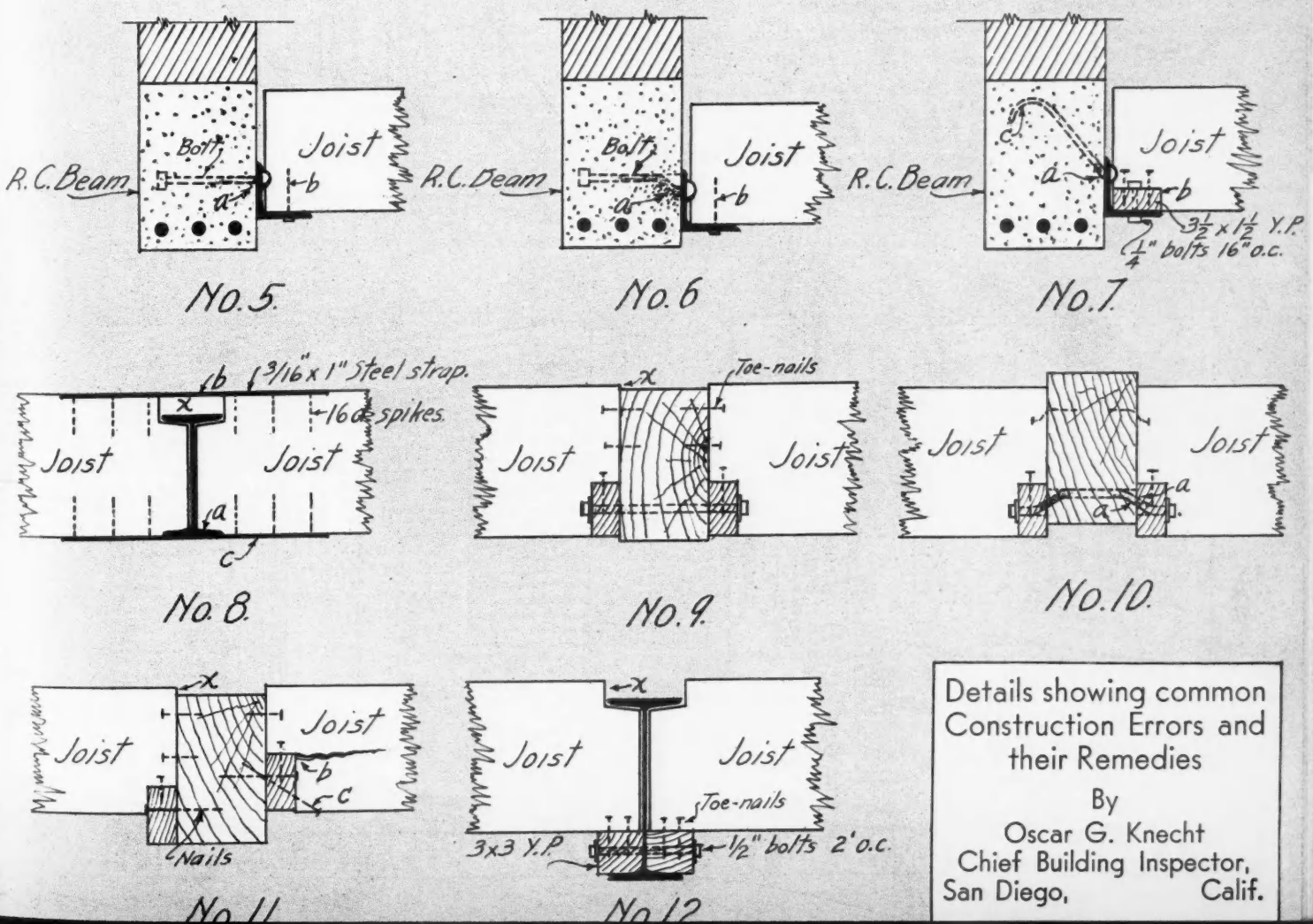
(9) and (11). Otherwise, in the event that the joists shrink more than the girder, the floor will have a hump or high place immediately above the girder.

Unless the joists are over size relative to the load supported, it is bad practice to notch the joists over the wooden shelf strips a greater distance than $\frac{1}{4}$ of the joist depth. In Figure (11) note the failure indicated at (b). This is what may be expected when the joists are notched too deep. The long toe nail shown at (c) Figure 11 should not be relied upon when joists are to be loaded to full capacity.

Figure (11) shows the wooden shelf strips nailed to the wooden beam, instead of being bolted thereto. As an example, we will investigate the number of nails required for a typical piece of framing. In Figure (11) we will assume a joist span of 10 feet. The joists are 2 x 8 No. 1 Com. Y.P. spaced 2' o.c. Each joist supports a total uniform load of 1800 pounds, 900 of which will be supported by the shelf strip. A 40 d. nail has a safe lateral resistance of 225 pounds. Consequently a 900 pound load every two feet will require the shelf strip to be secured with 40 d. nails spaced 6 inches o.c.

In Figures (8) and (12) we have shown two common methods of framing wooden joists and I-beams together, Figure (8) shows a common method of resting the joists on the bottom flange (a). Usually this is not a good method, on account of the narrow sloping steel flange. This method may be successfully used for light loading only, provided that a steel strap (b) be properly secured across the top of every other pair of joists, as shown at (b). Where there is danger of excessive vibration, impact, severe winds or earthquake shock the bottom tie strap (c) should be added to every other pair of joists.

(Continued to page 57)



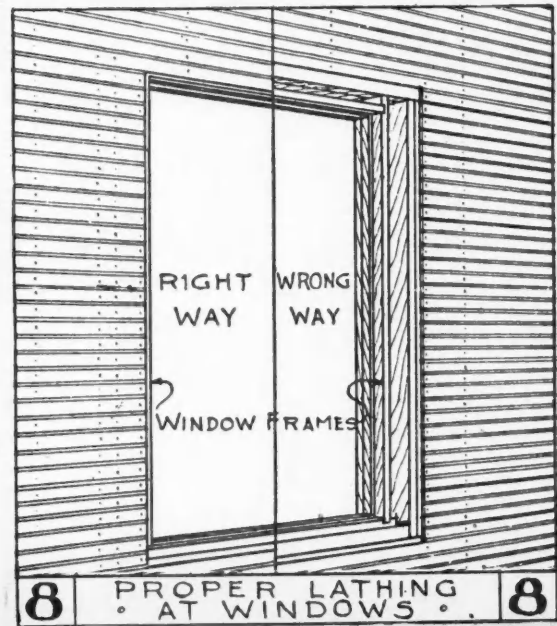
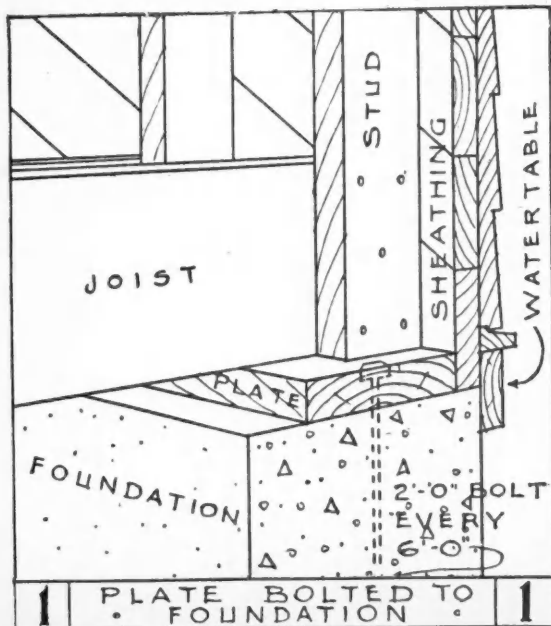
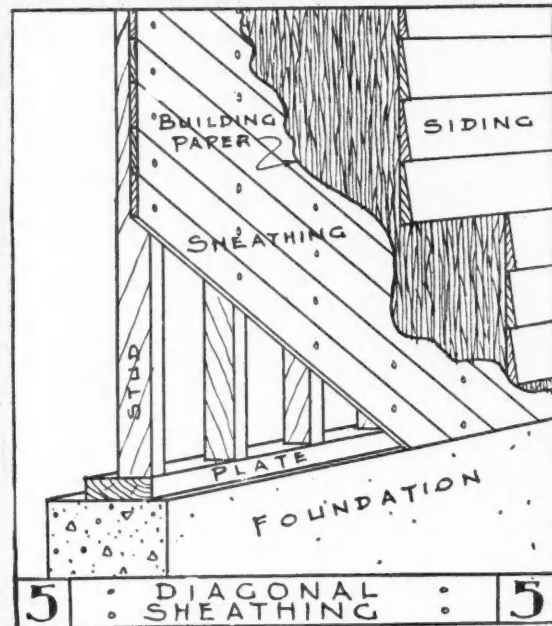
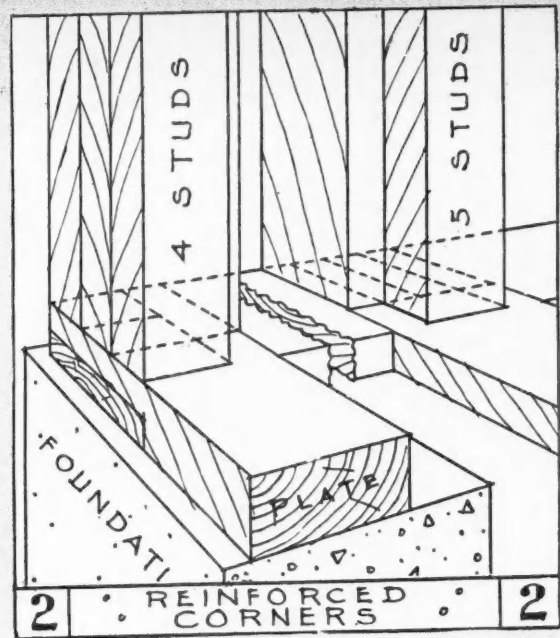
Details showing common Construction Errors and their Remedies
 By
 Oscar G. Knecht
 Chief Building Inspector,
 San Diego, Calif.

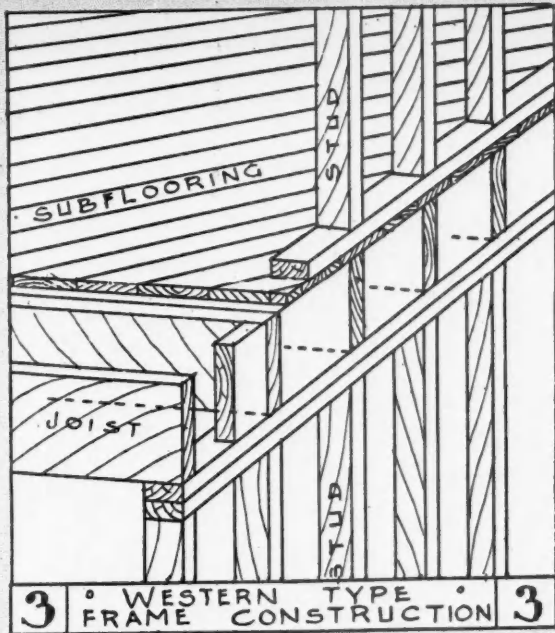
CORRECT WOOD CONSTRUCTION

AS DETAILS of the Federal Housing Administration's plan for financing new home construction on a long term basis are announced, it becomes apparent that **quality** construction will be demanded at every turn. Eighteen and twenty year loans demand permanent, honest construction, good design, careful workmanship.

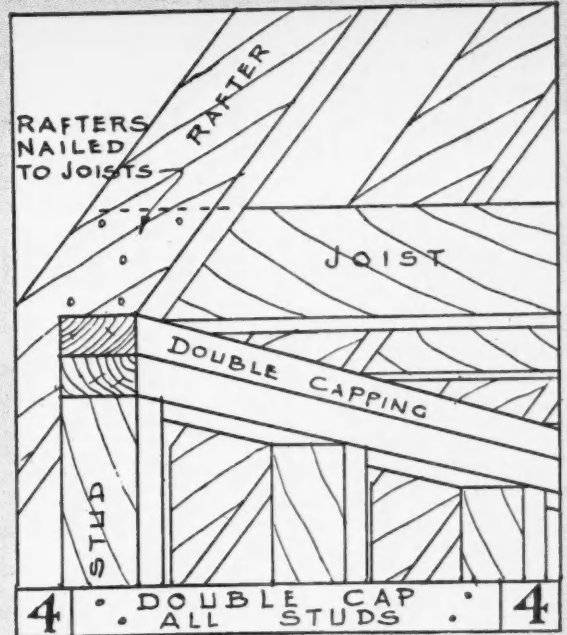
CONSTRUCTION DETAILS on this page are prepared by the Arkansas Soft Pine Bureau to illustrate 10 points of correct wood construction. Each of the 10 details concerns a vital spot in the lumber house. To insure seasoned boards and dimensioned pieces, kiln dried flooring, finishing, paneling and moulding of correct moisture content, trade and grade marked lumber should be specified.

THE DETAILS ILLUSTRATED follow best current standard practice and are emphasized at this time because neglect of such details as these has resulted in bringing homebuilding into disrepute in the past. Wise builders today will follow high standards such as these set up.

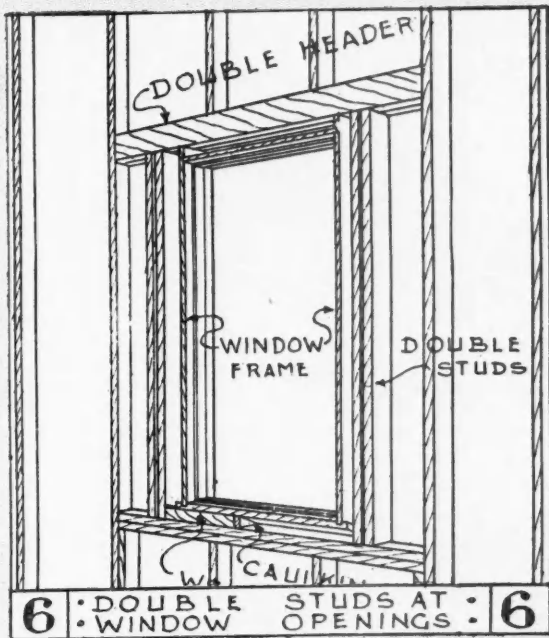




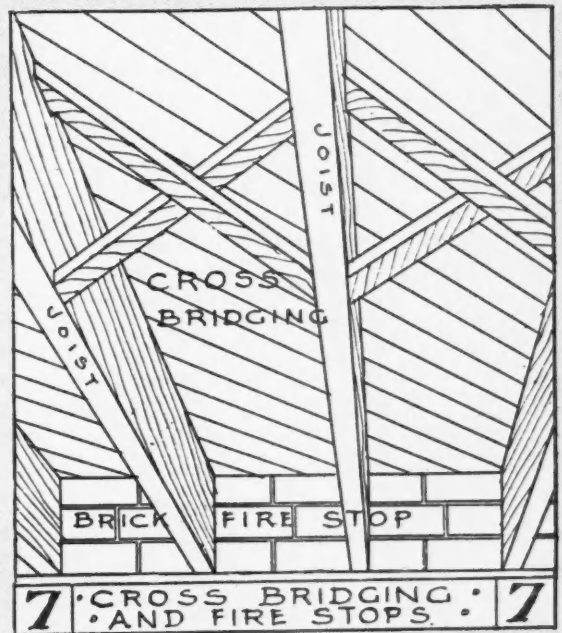
3 • WESTERN TYPE FRAME CONSTRUCTION • 3



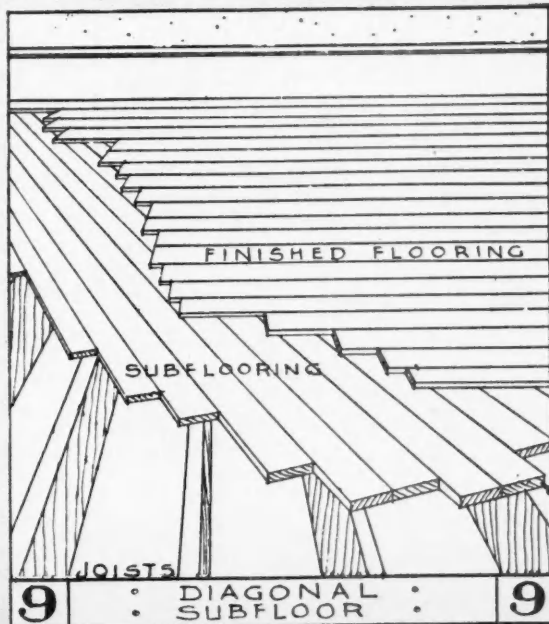
4 • DOUBLE CAP ALL STUDS • 4



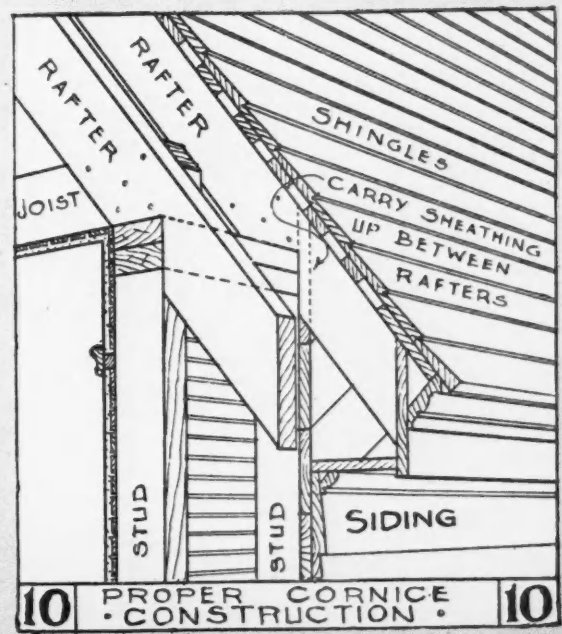
6 • DOUBLE STUDS AT WINDOW OPENINGS • 6



7 • CROSS BRIDGING AND FIRE STOPS • 7



9 • DIAGONAL SUBFLOOR • 9



10 • PROPER CORNICE CONSTRUCTION • 10

Old Schools Can Be Reclaimed

Horace Mann School, Franklin, Mass., Teaches a Lesson in Modernization

THE problem of altering and modernizing school houses became acute during the depression period, few communities having available funds for extensive improvements, although advances in educational equipment and procedure have completely outmoded the school buildings constructed around 1900 or earlier. Today these old school buildings present a difficult yet intriguing problem to the modernizer.

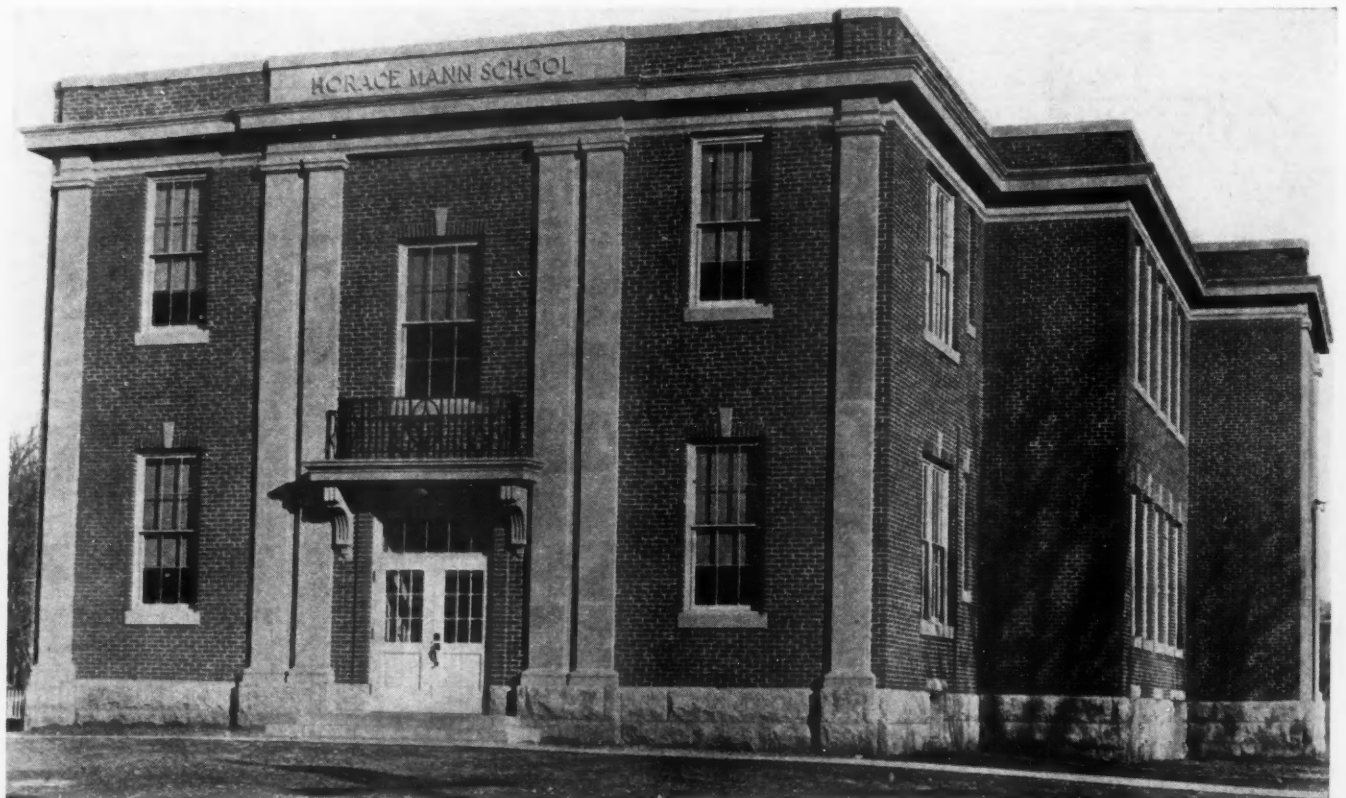
An excellent example of a school house transformation is the Horace Mann School located at Franklin, Mass. The old structure, erected in 1891, had faithfully served the town for many years; but 1934 educational demands classified the old building as obsolete and unsatisfactory. Popular opinion had so far condemned the old school that it was evident a few more years would see its complete abandonment.

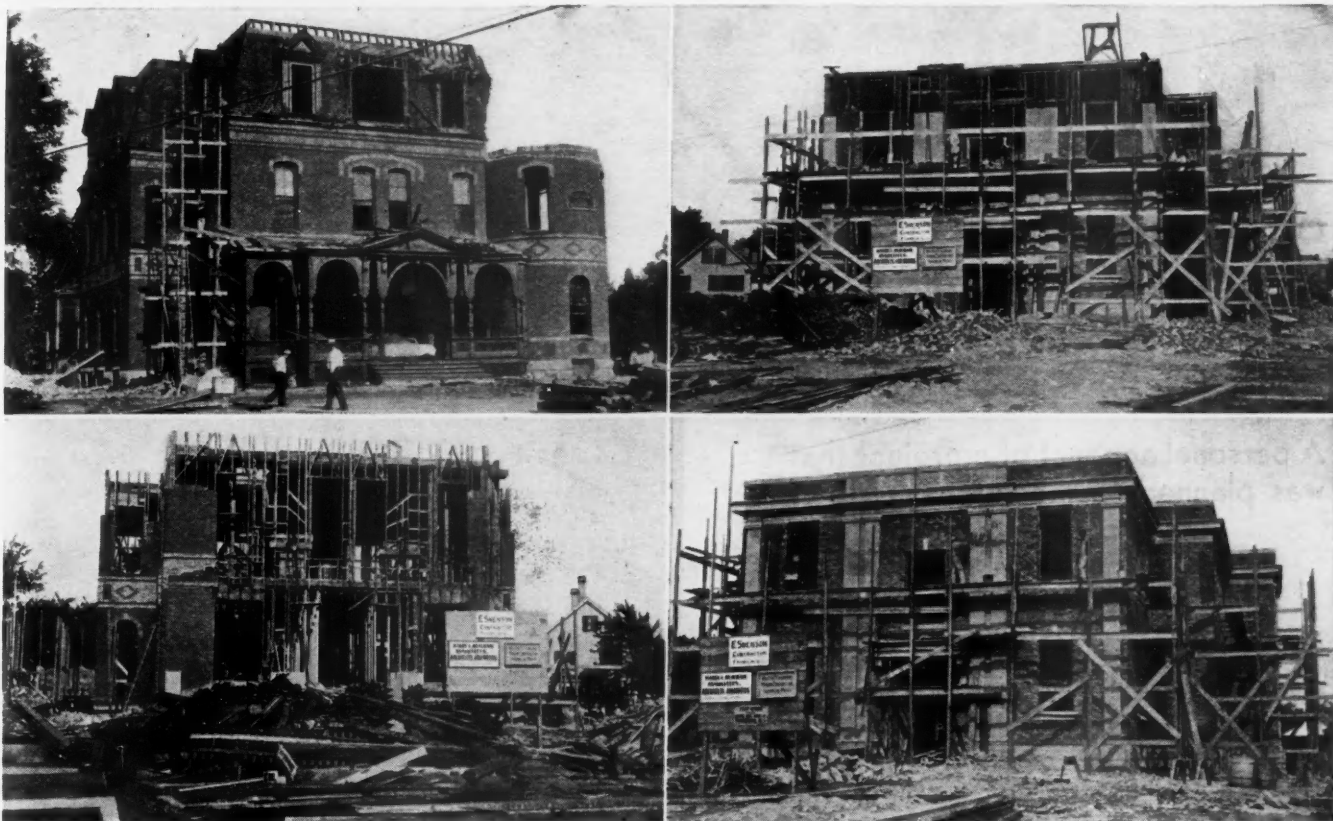
To discover whether the old building could be renovated and changed to meet modern needs, school authorities of Franklin called upon the Harry L. Meacham Associates school architects and engineers, of Worcester, Massachusetts. "We want to bring the old building up to date," said the Franklin folks, "and it must be made to accommodate more pupils; yet we must keep the cost down as much as possible."

After a thorough examination of the existing building and study of the local problems, the Meacham organization announced that considerable material could be salvaged from the existing building and that making allowance for such savings they were prepared to execute the changes required for a total of \$40,500. A Town Meet-

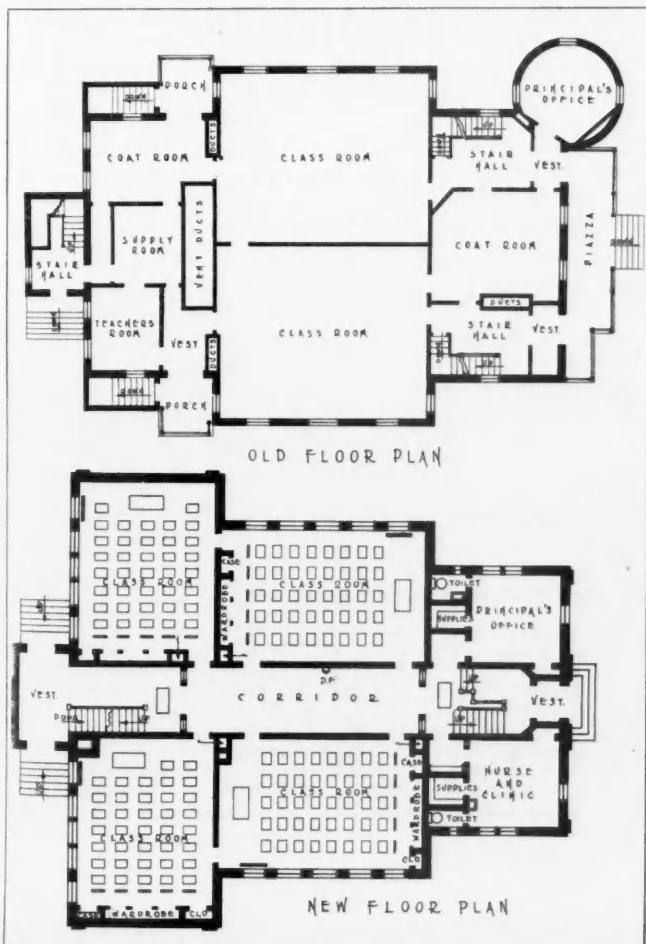


Horace Mann School, Franklin, Mass. Above, before rebuilding; below, after rebuilding.





BELOW, OLD FLOOR PLAN of Horace Mann School before modernization was started, and revised floor layout after Meacham Associates operated. Above, progress photos of tearing down and rebuilding.



ing was held and this appropriation voted.

Reference to the plans reproduced herewith will reveal the fact that only a small increase was made in the size of the building, whereas the appearance was changed so greatly as to make it difficult to recognize any similarity between the old and the new buildings.

In the salvaged materials old brick proved a big money saver for the town. The old mansard third story was removed and the new flat roof laid directly on the old third floor, which procedure also proved economical to construction costs. Exterior walls are of brick with floor and roof construction of wood. Stairs are of steel with corridor and stair hall walls of fireproof construction, giving the building a Class B rating.

Interior trim and millwork are of North Carolina pine, blackboards of slate, with all classroom ceilings acoustically treated. The building is completely equipped with a central fan system of ventilation, fire alarm system, program bells, electric clocks, etc., and each classroom is wired for radio reception.

Total cost of alterations, additions and other modernization was kept within the appropriation. Basic modernization work amounted to \$35,338, new equipment cost \$2,792, and architects' fees, bonds, etc., totaled \$2,370, making the total cost \$40,500. The changes, as revealed by the drawings and photographs herewith, developed a modern 8-classroom school building having a capacity of 361 pupils, a pupil station cost of only \$112, which certainly represents a remarkably low cost.

Associated with the Harry L. Meacham organization, functioning as architects and engineers, were S. Swenson and Walter P. Laundre, Contractors, both of Franklin, the Ciccone Cast Stone Co., of Providence, R. I., and the Sawyer Lumber Co., of Worcester, Mass.

Many other communities might well learn from the experience of Franklin. Serious consideration of the reclamation of old school buildings ties in with the intent and purposes of the Federal Housing Administration to promote repair and modernization work of all kinds.

14% PAID

on remodeling of old homes into apartments

A personal account of a project that was planned to meet the needs of the local community

By **KARL E. MORRISON, A.I.A.**
Shutts and Morrison, Erie, Pa.



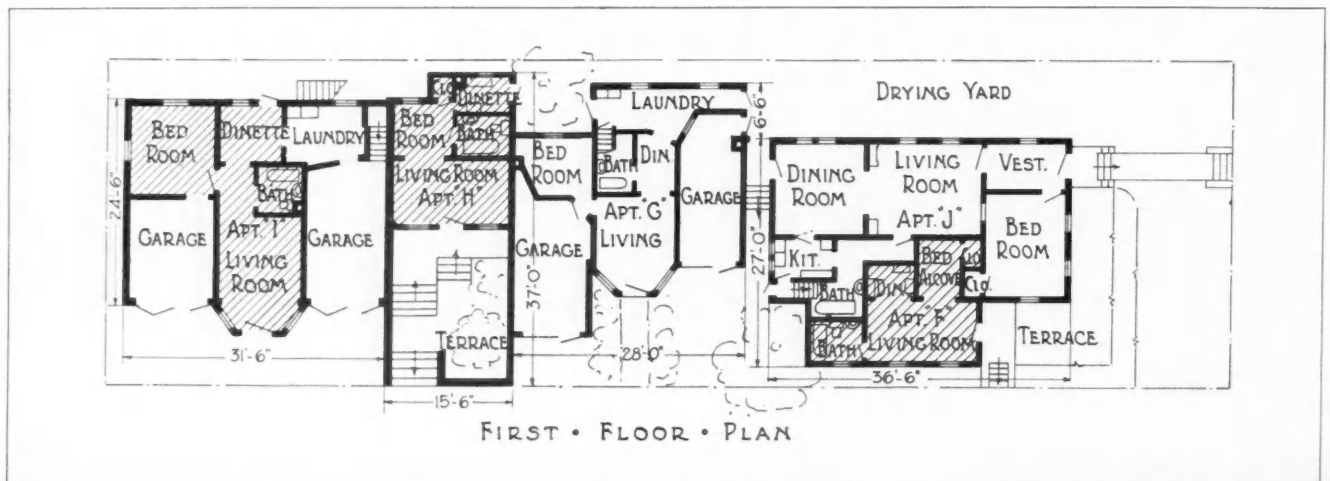
IN 1926 I purchased the property at the southwest corner of Twenty-Second and Perry Streets, Erie, Pa. The size of the lot is 38.25 x 135 feet. Originally (about sixty years ago, and up to the time I purchased the property) there was a story and a half cottage, cellarless, and porchless, the rear of the lot being a garden. The property rented for twenty dollars a month, in good times.

I first improved the property by building a large apartment over a three-car garage in the extreme rear facing Perry Street. The front cottage being quite dilapidated was soon vacant. I remodeled it completely, adding the front room, placing the bathroom on the first floor, covered the outside walls with insulation, and with 24-inch shingles 10 inches to weather over the clapboards. I used clear grade oak flooring, and enameled completely over new finish. Then I found I had really spent a little too much for a good investment, so I built in between the two, with garages under Apartment B. During the depression (I am still at it) I built Apartment F; then Apartment G; then squeezed in Apartment H, to order, for a school teacher; then built Apartment C for another teacher; then split the original large apartment into

Apartments D and E; meantime roughed in the plumbing and heating for Apartment L, and for one in the finished attic above D and E. Apartment I is now almost completed and three tenants want it. Apartment K is in the future, being at present a garage.

As will be noted from the sketch plans, all apartments have three rooms and bath, being entirely separate, distinct, and distinctive. Each apartment has a separate bedroom. Bed closets are not popular in Erie. In the larger apartment living rooms, bed davenport provide additional bedroom space.

Children are not entirely taboo, but two on the premises at a time are the limit. Some of the suites have been honeymoon suites. The average length of occupancy is six months. One tenant has lived in her apartment six years. Apartments are all rented completely furnished, with no leases, except one which is rented unfurnished on yearly lease. Furniture is uniformly high grade with overstuffed living room suites, walnut occasional chairs,





FROM a \$20 a month cottage, this property was developed into the row of apartments pictured at left, now fully rented and earning 14% on the investment. Shutts and Morrison, Erie, Pa., are the architects.

gateleg walnut or mahogany tables, etc. Replacements gladden the hearts of tenants. I pay one-half the gas and electric bills, so they are uniformly kept down.

In decorating, I wallpapered some; antiqued the rough cast plaster finish in some, especially on the curved ceilings. Usually each apartment has a built-in bookcase, medicine cabinet, towel cabinet, spice cupboard, ironing board cabinet, dish cabinet, shoe cabinet, etc. Some have mantels, radios and electric clocks. All have refrigerators, a few electric. The apartments are thoroughly insulated between floors and partitions. Each apartment has two entrances to comply with the State law, and are entirely separate. Water was originally on a flat rate basis; now it is metered. And now a summary of the investment:

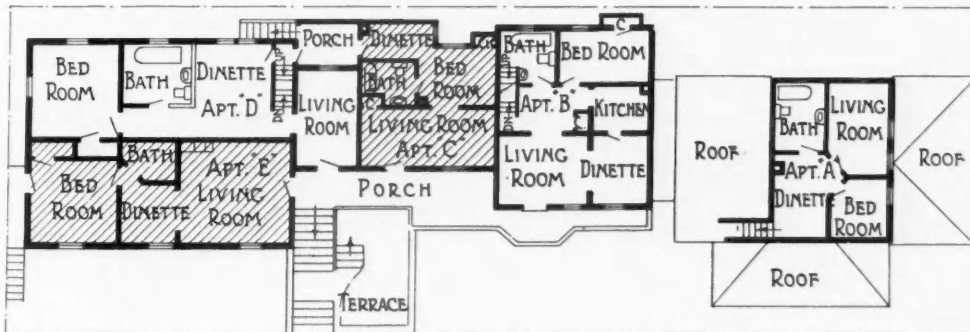
Original investment: cost \$3,000; annual revenue \$240. Expenses: taxes and insurance, \$54; repairs, \$40; water, \$16. TOTAL: \$110. Annual revenue, \$240, less annual expense of \$110 leaves balance of \$130, or 4%.

NEW INVESTMENT

	Cost	Monthly revenue
Original cost	\$ 3,000.00	
Apt. J	2,000.00	\$ 40.00
Apt. F	1,500.00	25.00
Apt. A	600.00	15.00
Apt. G	1,000.00	21.00
Apt. B	2,000.00	30.00
Apt. C	800.00	18.00
Apt. H	600.00	30.00
Apt. D	2,000.00	25.00
Apt. E	2,000.00	25.00
Apt. I	600.00	20.00
	\$16,100.00	\$249.00

ANNUAL EXPENSES

Taxes & Insurance	\$220.00
Repairs	120.00
Water	45.00
Electricity	80.00
Gas	138.00
	\$603.00
Annual receipts \$249.00 x 12 months	\$2,988.00
Less annual expense	603.00
NET REVENUE, or 14%, plus, on investment	\$2,385.00



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Re-styling Restores Value

WHEN a residential structure has presented the same appearance for a number of years, the owner is apt to tire of the old home place. Consequently, changing the appearance may prove a powerful argument for contractors to use in obtaining the modernization contract.

From the business viewpoint, changing the appearance may result in greater profit because it will increase the total amount to be spent for the job, although the added cost may not discourage the owner because the new appearance will appeal to him so strongly.

Good business promotion would seem to indicate that every prospective job be examined with the thought of re-styling, at least to the extent of improving the general appearance. If architectural changes are involved, the owner may be more susceptible to the contractor's sales talk if some sort of visualization is afforded; a photograph or drawing can be made of the existing structure, then a tissue sheet overlay, tinted with the proposed

colors, and showing the contemplated changes, visualizes the effect which will be obtained. Many contractors and dealers are using a service of this kind to help them "sell" the idea of modernization; this kind of selling is particularly effective in conjunction with the credit plan of the Federal Housing Administration.

The combined "before and after" photograph reproduced above pictures the home of Mr. H. L. Whiting of Olympia, Washington, where old patent stucco was removed to make way for Cabot's stained "Fitite" shakes furnished by the local Hyak Lumber & Millwork Company. As can be seen from the photograph, the home was constantly protected during modernization and afforded an excellent opportunity for owner and neighbors to watch the transformation day by day; this is an excellent example of re-styling without major structural or architectural changes. It suggests possibilities for business in other localities in many different parts of the country and can be used to stimulate interest of prospects.

LETTERS from readers

on all subjects

Facts, opinions and advice welcomed here

An Architect Challenges Mr. Gordon

To the Editor:

Mr. H. S. Gordon, of the Kenwood Realty & Home Building Co. of Cincinnati, Ohio, at least clearly states his convictions regarding architects.

I like that. It's the way I write my specifications! Brings everything right out into the open.

Nothing would give me more pleasure than to sit down on a pile of 2 x 4s and talk over the situation with Mr. Gordon. We would get somewhere, I fully believe.

Mr. Gordon gives architects credit for being artists and he believes that they should stick to larger and *more artistic* work (than residence work).

The principal reason that the larger work *is* more artistic is due to the fact that too many architects *do stick to it*, and fail to offer their services for the smaller residence work. Therein, woe be it, lies the reason for so many sadly neglected, and *inartistic* houses.

I reserve the right to define as "artistic" that which is exceedingly well done—whether it be ploughing a straight furrow, making a perfect joint, or creating an excellent design.

Let the farmer-artist plough and the builder-artist go about his business—artistically; and let the architect design.

Every man to his calling, says I, and let him do his very best for the *benefit* of each other.

The implied statement in Mr. Gordon's letter, that houses designed by architects cost *extra* money, I very much resent.

Frankly, if the efficient use of space, and the efficient use of materials, in my designs should fail to save *more than my fee* over the average carpenter-planned or realtor-planned house, I would certainly hide my head in shame.

Nevermore would I lay claim to the title "architect."

HUGH M. McCLURE, Architect.

Organization Movement Progressing

Cleveland, O.

To the Editor:

Your article "Who Represents the Builder?" that appeared in the September issue was read before our Council and our members want you to know that we appreciate your co-operation with us in our efforts to organize the residence construction contractors. It surely was a fine article.

We feel your periodical can exert a tremendous influence in helping us to band together for the purpose of giving the public better construction and service.

There are many more things that should be done and we know with your support we will go places.

HUGH G. SELBY, Secretary,
Cleveland Residential Builders Council.

"Already a Subscriber"

Birmingham, Alabama.

To the Editor:

As State Director for Alabama of the Better Housing Program of the Federal Housing Administration, I have your letter of the 11th asking about a subscription to the AMERICAN BUILDER. For your information, I am already a subscriber, and have been for a number of years.

May I take this occasion to congratulate you on your very constructive and progressive publication, and to particularly commend your very helpful and comprehensive cooperation in the Better Housing Program.

ROBERT JEMISON, JR., State Director,
Better Housing Division of the National Emergency Council,
Field Agency of the Federal Housing Administration.

(Continued to page 46)

Why ARCHITECTS select Genasco



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LETTERS Dept.

(Continued from page 45)

To Underwrite Home Construction Quality

Philadelphia, Pa.

To the Editor:

Government supervision over speculative building may remedy the evils of the "jerry builder."

With the "New Deal" in banking regulations, a similar movement could be attached to building regulations. A National Building Code has been advocated for many years by the various technical societies. I propose a National Building Underwriters Board, very similar to the present Fire Underwriters Board, which was organized in 1897 by the Fire Insurance Companies in co-operation with the technical societies and allied trades. With large insurance companies sponsoring such a movement, united action of allied trades may be more easily accomplished. Some protection should be provided to the home purchaser and mortgage investor in our future building. Some assurance should be accurately certified to bring quality of materials and workmanship, better design, durability against weather, climate, fire, shrinkage, wear and tear and obsolescence, into the construction of the small home.

Classification of the construction, routine inspection as work progresses, required by law, would enable the Building Underwriters Board to issue a certificate setting forth in detail the quality of construction. Penalties for poor construction would encourage the builder to include sound construction, rather than cover up poor construction with the usual gadgets and veneer of good looks. New gadgets and innovations are highly advertised and the builder is required by the sway of public opinion and demand to include them in order to be successful and still remain under the price demand of the public.

The conscientious speculative builder cannot compete with the jerry builder, and unless the merits of good sound construction are regulated under national control, the evils of the past will continue.

HAROLD P. MUELLER, *Builder.*

Cost of Estimating and Bidding

Pawtucket, R. I.

To the Editor:

There is one phase of contracting which I feel should receive careful and intelligent consideration, and that is the cost of presenting estimates on plans submitted. As conditions now exist, a set of plans is given to a contractor only after he has made a cash deposit. There are arguments for and against this system, but nevertheless it exists. Often, also, a contractor submitting a bid must submit a certified check, made payable to the owner, to guarantee that, if awarded the contract, he will faithfully execute the work. It is true that in some instances a bid bond is accepted, which lightens the burden somewhat, but still presents an expenditure which is lost, should a contractor be an unsuccessful bidder.

The actual cost of estimating is a very important item which cannot be overlooked. This varies, of course, in direct proportion to the extent of the work at hand. The fact remains, that when an architect invites a contractor to estimate, he is inviting him to spend real cash, with no assurance of a return.

Does it not seem fair then, that some method should be devised to reimburse a contractor, for at least a portion if not all, the expense incurred in estimating and presenting bids? How shall we arrive at a fair allowance to give the contractor for estimating? Naturally a flat sum is out of the question since on a very small project it would be high and on a very large building it would be entirely inadequate. Suppose we allow 25% of the bidders a definite percentage of the accepted bid? This seems fair to the owner as well as to the contractor. To illustrate: Sixteen bids are received for a certain project, and the lowest responsible bid is \$85,000. Twenty-five percent of the bidders are to be repaid for estimating, and the estimating allowance is say, one-quarter of one percent. Then the four lowest bidders would receive an estimating allowance of \$212.50 each. This might not, and probably would not cover the entire cost of estimating, but it would at least take some of the burden off the backs of the contractors.

WILLIAM J. KERWIN, JR.,
Of C. L. Madison Co., Industrial Engineers.



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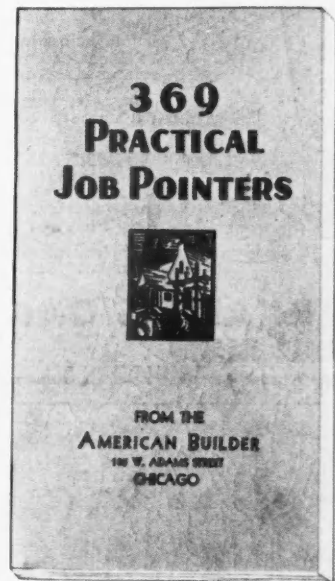
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192 pages; handy pocket size 4½x8½. More than one hundred practical construction-minded men have furnished ideas for this book including clever ways and means for handling lumber, brick, steel, stone, etc. Waste products and materials are brought to life and put to work: obstinate doors, windows, walls, roofs and many such subjects are handled in some novel manner. Each and every "kink", or "pointer" clearly described and illustrated by the individual contributor.



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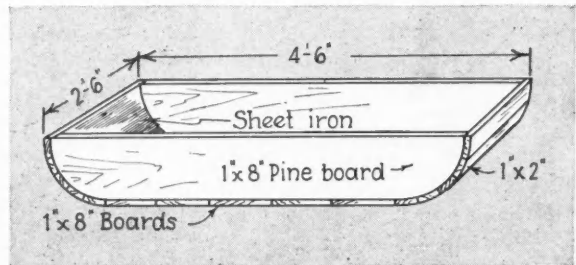
A READERS' EXCHANGE of tested ideas and methods, taken from their own building experience. Two dollars or a year's subscription to American Builder is paid for each item published. State business connection or trade.

Handy Small Mortar Box

I AM a small town builder and have many uses for a small mortar box which I made from some waste pieces which most every contractor has in his shed.

I took two pieces of pine 1" x 8" x 4' 6" long, rounded the ends as shown in sketch, and nailed a piece of sheet iron on the bottom and then placed another bottom over it of 1 x 2's at ends and 1 x 8's in middle. I used galvanized nails throughout as water would soon rust common nails.

I find this a very light and handy box for those small jobs. —ARNOLD DAVIS, Contractor, Diamond Pt., N.Y.



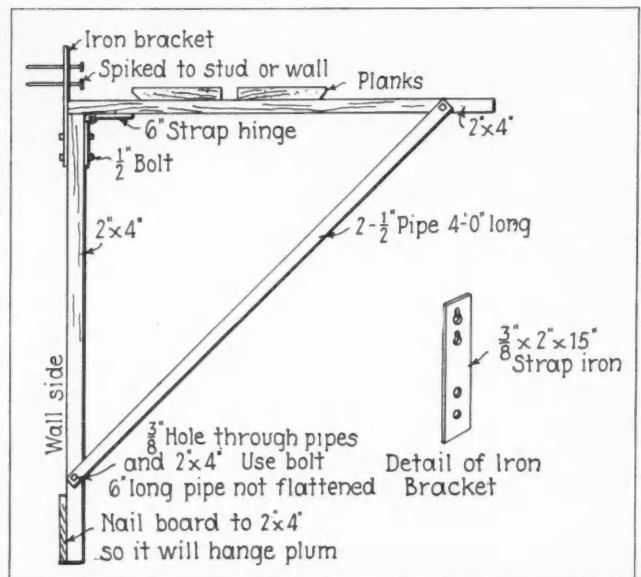
Handy mortar box made from scrap pieces.

Practical Scaffold

I AM enclosing a sketch of a home made scaffold bracket that has proved very satisfactory to me.

I use two 2 x 4's supported by a pair of 1/2" pipes 4 feet long. It can be folded by taking top or bottom bolt out of pipe so it will fold together. It then can be tied together with wire till again used.

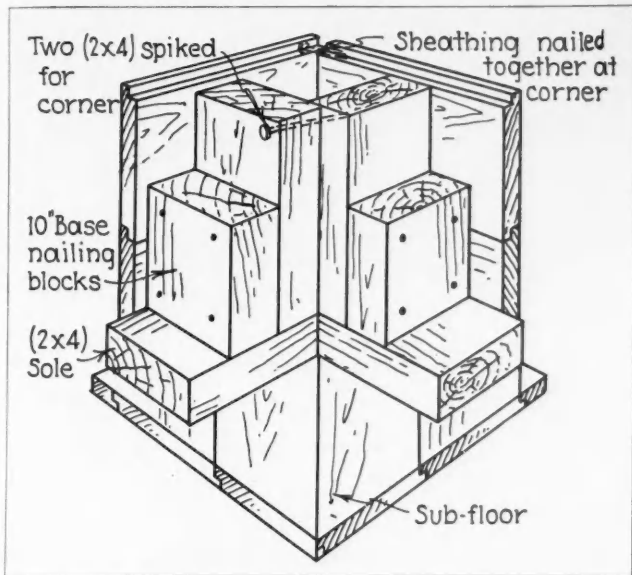
After bracket is on the wall, lay the scaffold planks on where they are desired, and stick an 8 penny nail through the plank in the 2 x 4 and it will not swing sideways.—R. J. BEEHN, Builder, Newfoundland, Pa.



1/2" pipes used on scaffold supports

Catt's Corner

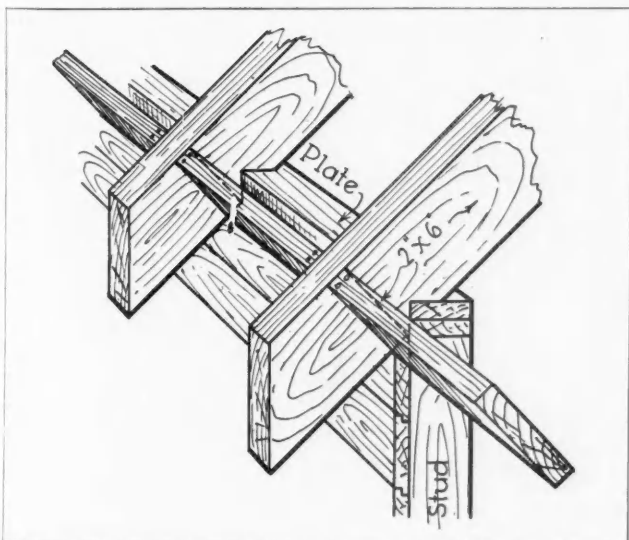
IN looking over your Practical Job Pointers, I find many ideas on corner construction for a frame house. Here is my idea of making a corner without using three studs and a lot of strips. My drawing shows minimum usage of studs with maximum strength. Two studs are spiked together to form the corners. Two 10" base blocks are then nailed against the studs, resting on the sole plate. These nailing blocks are used to nail the lath, grounds and baseboard to.—JOE CATT, Chatham, Ont., Can.



A Simple Open Cornice

I AM enclosing a sketch showing my improved method of finishing an open cornice.

This method eliminates fitting a frieze board between the rafters which is difficult and always consumes a lot of time. I use a piece of the same material as rafters and cut both ends square the length of the distance between the rafters where they are nailed to the plate, and drive the piece in tight so that the inside edge is even with outside of sheeting. The piece is set square with rafter and that closes up the space between the roof and the side of the building, and also squares the rafters. The finish can be either a narrow frieze board or a cove mould, which is all that is needed. This also does away with hard places to paint.—WESLEY FIGART, Builder, Altoona, Pa.



Open cornice eliminates fitting frieze board



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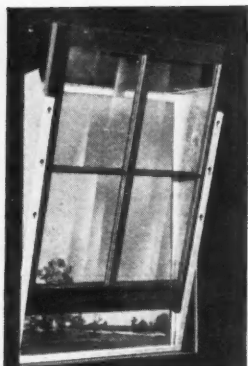
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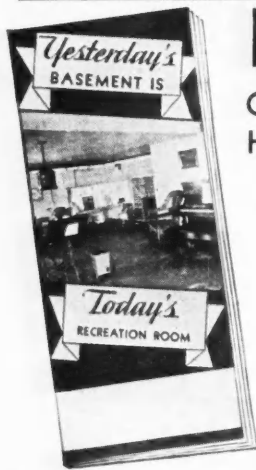
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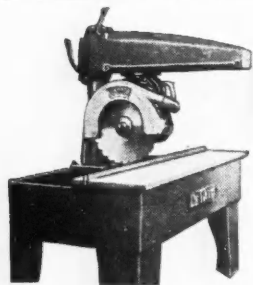


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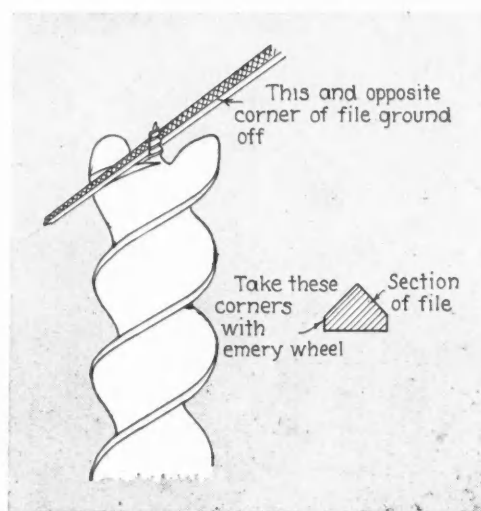
Lancaster, Penna.

Best Way to File Bits

MANY carpenters and electricians file their bits on the back side and thereby stub them off so much as to be practically useless. Bits should be filed on the worm side and at an angle slightly steeper than the pitch of the worm.

A good "bit" file is easily made from an extra thin taper three corner file. Merely grind off two edges on an emery wheel about square with one side. Take off just enough to get rid of the "file" action on these edges, for the corners or angles get into the worm and also the lip and "chew" them all up. The extra corner is left (as is) to patch the worm in case it hits a nail. The extra slim taper file is small enough to get into most bits.

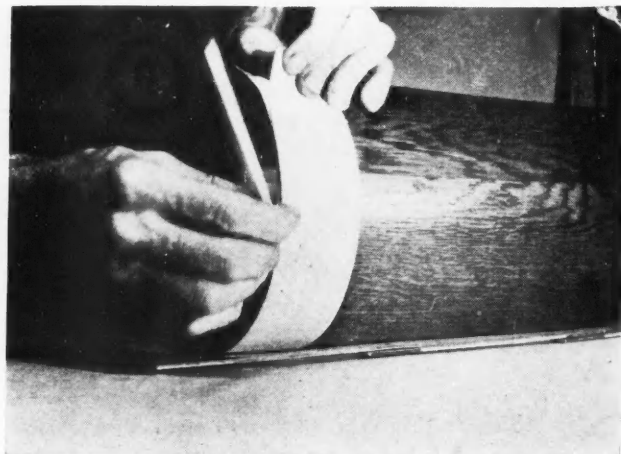
Bits filed in above manner will continue good for years and, what is more essential, cut well. I have a No. 12 bit which I use for "locking" doors. It was bought in 1924 and although it has worn and been sharpened so that the worm is $\frac{1}{8}$ " longer than normal, it cuts easier and better than a No. 12 bought recently, because the manufacturers file them on the back.—RALPH JACKSON, J. H. Jackson & Son, Portland, Me.



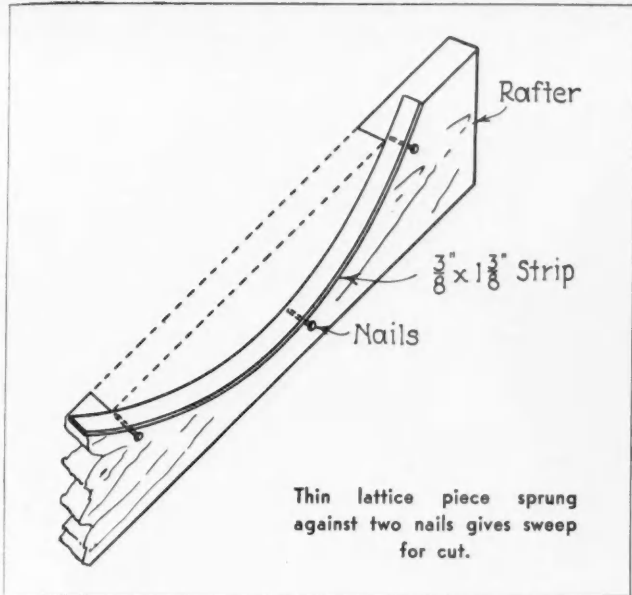
Worm side of bit filed with slim taper file ground off on two sides.

Marking Circular Cuts

TO mark the irregular end of a round column for trimming, a true guide line can be scribed with the aid of a cardboard strip, as shown in my photograph below. The marking edge of the cardboard must be absolutely straight. When placed at the proper sawing point, the paper is pulled tightly until the joining edges form a true straight line. The cardboard is held in such a position until an all-around mark is made with a pencil. This pencil line is easily followed with the saw for a straight cut.—RAY J. MARRAN, Kansas City, Mo.



Paper band to give true guide line for cutting.



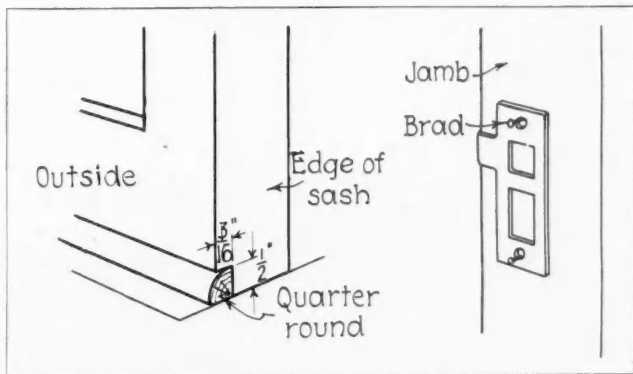
Laying Out Curve

TO lay out sweep in roof, or any oval shaped piece of work, I find a piece of lattice strip or any thin, narrow piece of wood sprung against nails, as in the enclosed drawing, is a very simple and quick way of doing it. I hope to see this in your Practical Job Pointers page.—W. D. BRAINERD, Contractor, East Hampton, Conn.

Tight Porch Window

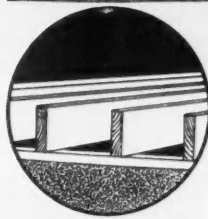
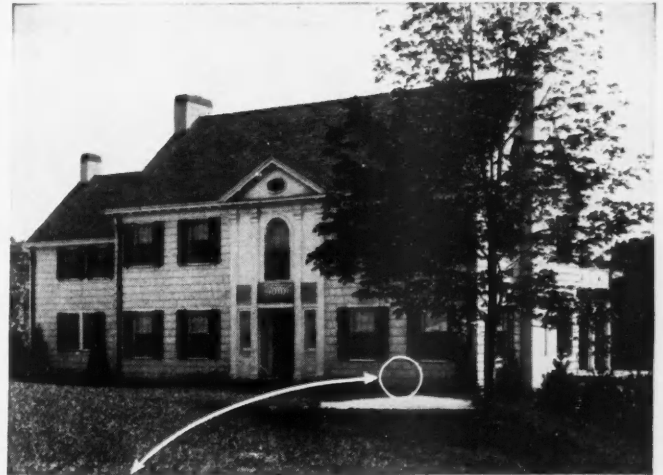
TWO practical pointers are shown in my sketch below. At left is shown my way of making porch windows weather-proof at the bottom, when they are hung on hinges. Use quarter round, notched in as shown, with good coating of white lead underneath.

Oftentimes it is troublesome to hold the keeper for door lock in place on the jamb to mark it for mortise. I hold it on with brads (see sketch) through screw holes and mark around with knife, cutting depth of mortise with the grain of wood. Remove and chisel out the usual way.—HORACE T. HILTS, Builder, Black River Falls, Wis.



BETTER CONSTRUCTION METHODS

TWO IMPORTANT ARTICLES in this issue deal with better construction methods. Do you agree with the methods given? Can you suggest better ways? Send your ideas, with drawings, to "Practical Job Pointers."—THE EDITORS.



Termite damage at this point can be stopped by a PROVEN PRESERVATIVE

UNTREATED wood near the ground is always vulnerable to attacks by termites (white ants) as well as decay. Home owners are becoming quite familiar with this hazard. They want protection. The only real assurance which can be afforded them is the pressure treatment of lumber with a preservative of proven value.

The damaging effect of termites on wood has been known for hundreds of years. A library could be filled with published discussions of this loss and methods for stopping it. But out of all the experience with termites and decay only two recognized standard preservatives have emerged—creosote oil and zinc chloride. AmCreCo lumber is available, pressure treated with these proven preservatives. There is no question about the effectiveness of such protection.

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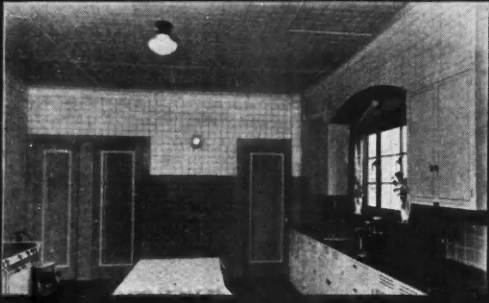
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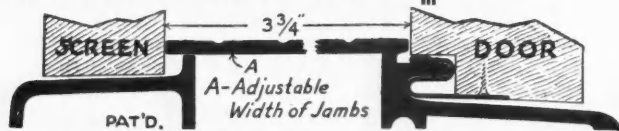
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THE lustrous beauty of tiled walls at a fraction of the cost for material and installation... that's sales-making **MARSH TILE**, the sanitary, long-lived, easily-cleaned wall-finish in large-sized, burnished sheets. **MARSH TILE** can be speedily installed over old walls, using ordinary wood working tools. Send for descriptive folder with full details. Write to the exclusive manufacturers of **MARSH TILE**, **MARSH WALL TILE COMPANY**, Dover, Ohio.

MARSH TILE

ACCURATE



A NEW SADDLE for OUTSWINGING DOORS

These new saddles for outward swinging doors and French windows provide weather proofing results not obtainable before. Three different designs are available. Accurate Strip equipment includes weather proof saddles of many varying designs to meet any conditions of sash or door construction. Write for complete information.



METAL WEATHER
STRIP CO.

Box 111,
216 East 26th St.,
New York, N. Y.



This marvelous machine completely solves the problem for renovating masonry buildings, walls, etc. It fuses a plastic mixture to any masonry surface. This plastic material water-proofs and fills all cracks. It can be applied in varying thicknesses desired and in 30 colors and shades. Process proven by over six years of actual use under all conditions and in practically every climate.

OFFERS BIG EARNINGS

Many operators report costs of only 8c to 10c with sales at 20c to 35c per sq. yd. The profit on one order often pays for machine. Now the big government renovating campaign and the increasing demand for color offers large profits in your territory. Machine furnished on free trial and easy payments. Territory protected. Learn about this wonderful machine and what it has accomplished for others. Send for complete data. Write today.

COLORCRETE INDUSTRIES, Inc.
500 Ottawa Ave., Holland, Mich.



NEW PRODUCTS

FOR FURTHER INFORMATION about any new product write the American Builder Information Exchange, 105 West Adams Street, Chicago, Ill.

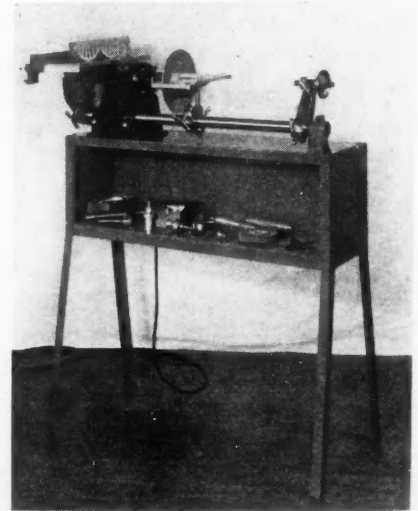
New Home Workshop

CLAMPING arrangement makes possible rapid changing from one attachment to another. New combination machine is designed by the General Electric Company to do all kinds of operations in wood and the softer metals. Including attachments, tools and steel cabinet, the machine is packed in a box 38 inches long and a foot square. When set up it occupies a space 18 by 38 inches.

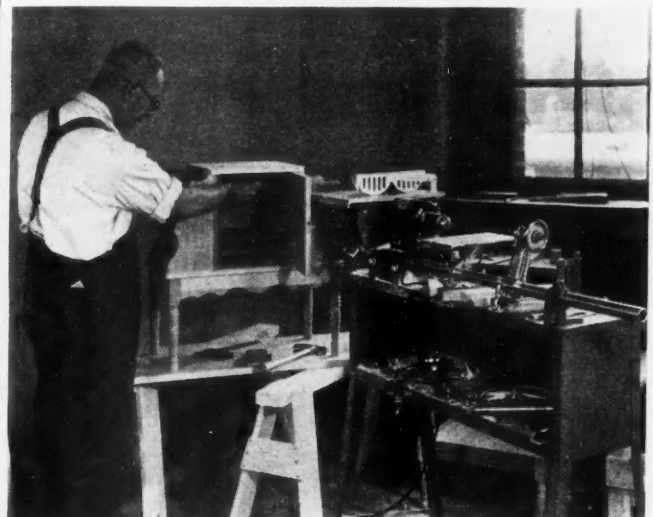
Designed for home or professional use, the new machine does a wide range of operations efficiently, is being marketed at slightly under \$100. Included in the operations are the following:

- (1) Turns wood, with a limit of 9 inches diameter for face-plate work.
- (2) Takes lengths of 30 inches between centers.
- (3) Readily turns brass and aluminum.
- (4) Sands flat surfaces and contours.
- (5) Scroll work on wood up to 2 inches thick.
- (6) Scroll work on metals including sheet iron.
- (7) Drills both wood and metal.
- (8) Makes mortises and tenons.
- (9) Drills accurately-placed dowel holes.
- (10) Cuts rabbets and grooves.
- (11) Grinds and buffs.
- (12) Other operations depending upon the needs of operator.

Parts are amply proportioned to withstand maximum pressure. Saw is high grade hollow ground; chuck is full sized industrial type of half-inch capacity.

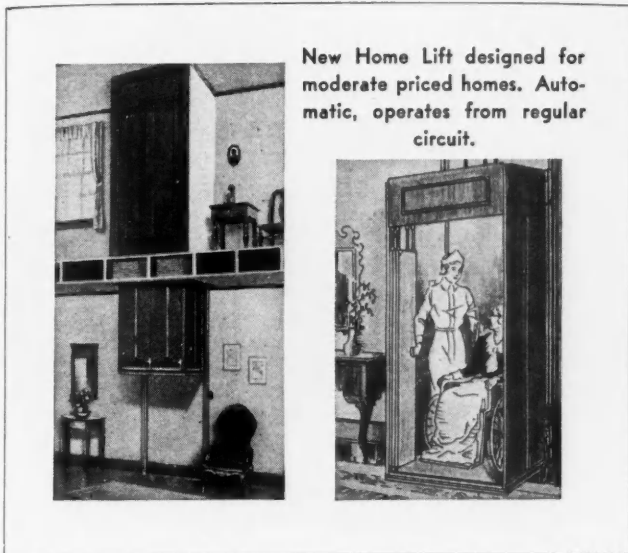


Compact new combination machine does all kinds of operations in wood and softer metals.



Residential Elevator

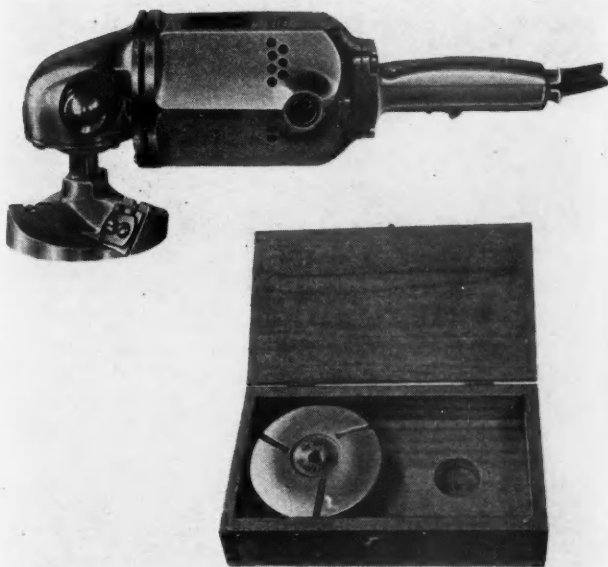
ELEVATOR is automatic, entirely self-contained, operates from regular lighting circuit. Shaft is completely enclosed on second floor. No enclosure necessary on first floor and no space wasted. Comes down directly into the hall or room with door closed. Built by the Shepard Elevator Company of Cincinnati, the home lift is easy to install, inexpensive both in cost and to operate. Originally intended as an invalid's elevator, the new unit has been perfected for moderate priced homes as a selling feature of particular appeal to aged people and people with weak hearts.



New Home Lift designed for moderate priced homes. Automatic, operates from regular circuit.

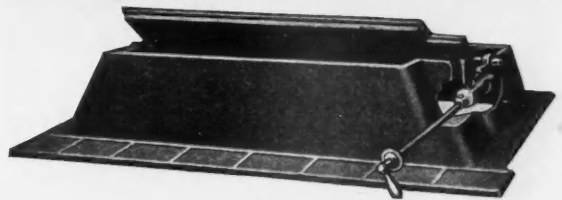
Portable Rotary Planer

PLANER has heavy duty driving unit with two planer heads, one for gouging and one for surfacing. Planer heads consist of shaped disc 5 inches in diameter in which are set three planer blades held by screws. Blades are adjustable for deep or shallow cutting. Saves costly labor on work done by hand or with jack plane or adz. Unit is portable, light weight, fast in operation. Practical uses include smoothing and fitting joints in concrete forms; rough-surfacing wood floors; beveling and shaping planks, beams and heavy timber, etc. Manufactured by Black & Decker Mfg. Co., Towson, Md.



Portable power planer bevels and shapes planks, beams, timbers as well as lighter woods.

PEERLESS



When Planning F.H.A. Modernizing Jobs Include a Fireplace

When called in on a job of modernizing, suggest a fireplace. You will be surprised how easy it is to sell your client the idea.

No single item adds more beauty, charm and livability to the home.

Peerless Dome Dampers assure successful operation of wood or coal burning fireplaces. You have three models to choose from—Rotary Control—Poker Control and Chain Control. Built of heavy stove plate cast iron, they will last indefinitely.

We have a booklet of fireplace designs, with complete instructions on how to build successful fireplaces. It will be a big help to you in selling your clients. May we mail you a copy free of charge?

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This remarkable machine cuts costs as quickly and as surely as it cuts wood! Does the work of five ordinary machines—eighteen different everyday jobs—faster and at less cost! Cross-cut saw, rip saw, jointer, shaper and router—five machines in one . . . at the cost of one. Ball-bearing throughout. Write for full particulars.

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61 Main Street Hackettstown, N. J.

THE 20th CENTURY WOODWORKER

STATEMENT of the ownership, management, circulation, etc., required by the Act of Congress of March 3, 1933, of AMERICAN BUILDER AND BUILDING AGE, published monthly at Chicago, Illinois, for October, 1934.

State of Illinois } ss.
County of Cook }

Before me, a Notary Public in and for the State and county aforesaid, personally appeared Bernard L. Johnson, who, having been duly sworn according to law, deposes and says that he is the editor of the AMERICAN BUILDER AND BUILDING AGE and that the following is, to the best of his knowledge and belief, a true statement of the ownership, management, etc., of the aforesaid publication for the date shown in the above caption, required by the Act of August 24, 1912, embodied in section 411, Postal Laws and Regulations, printed on the reverse of this form, to wit:

1. That the names and addresses of the publisher, editor, managing editor, and business managers are:

Publisher, American Builder Publishing Corp., 105 West Adams St., Chicago. Editor, Bernard L. Johnson, 105 West Adams St., Chicago. Managing Editor, Joseph B. Mason, 105 West Adams St., Chicago. Business Manager, Robert H. Morris, 105 West Adams St., Chicago.

2. That the owners are:

Simmons-Boardman Publishing Company, 30 Church Street, New York, N. Y.; Simmons-Publishing Corporation, 30 Church Street, New York, N. Y.; Stockholders of 1 per cent or more of the total amount of stock are: I. R. Simmons, 1625 Ditmas Avenue, Brooklyn, N. Y.; P. A. Lee, Hopatcong, N. J.; Henry Lee, Hopatcong, N. J.; E. G. Wright, 398 N. Walnut Street, E. Orange, N. J.; S. O. Dunn, 105 West Adams Street, Chicago, Ill.; C. E. Dunn, 3500 Sheridan Blvd., Chicago, Ill.; B. L. Johnson, 105 West Adams Street, Chicago, Ill.; W. A. Radford, 407 S. Dearborn Street, Chicago, Ill.; L. B. Sherman, 375 Sheridan Road, Winnetka, Ill.; Mae E. Howson, 105 West Adams Street, Chicago, Ill.; Spencer, Trask & Company, 25 Broad Street, New York, N. Y. General partners of Spencer, Trask & Company are: E. M. Bulkley, Acosta Nichols, Cecil Barret, C. Everett Bacon, William R. Basset, F. Malbone Blodget, Henry S. Allen, Henry M. Minton, William Kurk Beckers, Arthur H. Gilbert, all of 25 Broad Street, New York, N. Y.; Percival Gilbert, William E. Stanwood, John T. Nightingale, all of 50 Congress Street, Boston, Mass., are General partners. Henry A. Colgate, Special Partner, 25 Broad Street, New York, N. Y.; S. Bayard Colgate, Special Partner, 15 Exchange Place, Jersey City, N. J.

3. That the known bondholders, mortgagees, and other security holders owning or holding 1 per cent or more of total amount of bonds, mortgages, or other securities are: None.

4. That the two paragraphs next above, giving the names of the owners, stockholders, and security holders, if any, contain not only the list of stockholders and security holders as they appear upon the books of the company but also, in cases where the stockholder or security holder appears upon the books of the company as trustee or in any other fiduciary relation, the name of the person or corporation for whom such trustee is acting, is given; also that the said two paragraphs contain statements embracing affiant's full knowledge and belief as to the circumstances and conditions under which stockholders and security holders who do not appear upon the books of the company as trustees, hold stock and securities in a capacity other than that of a bona fide owner; and this affiant has no reason to believe that any other person, association or corporation has any interest direct or indirect in the said stock, bonds, or other securities than as so stated by him.

BERNARD L. JOHNSON,
Editor.

Sworn to and subscribed before me this 27th day of September, 1934.

[Seal] ANNE A. BOYD,
(My commission expires Dec. 10, 1935.)

NEWS OF THE MONTH

Building Activities and Meetings

Property Repairs Doubled

REHABILITATION and improvement of neglected property of all kinds is growing into a national program, according to Thomas S. Holden, vice president of F. W. Dodge Corporation. Contracts for alterations and additions to all classes of structures have doubled in volume this year as compared with last year. In the 37 eastern states the amount of such work recorded in the first 9 months of this year was \$277,878,300, compared with \$139,418,000 for the corresponding period of 1933.

Ruberoid Announces Finance Plan

THE Ruberoid Company of New York has announced a new Non-Recourse Finance Plan for home modernization loans under the National Housing Act. It has similar features to the old Ruberoid plan, but at government rates. Financing will be handled through a new organization, the R and S Purchase Corporation.

The new plan is available to all dealers and applicators who have established a reputation for good workmanship. Those applicators who are already approved qualify to use this plan immediately. Those not approved can make application with a local dealer or their nearest Ruberoid office.

The plan under the National Housing Act as outlined is:

1. NO RECOURSE except that Applicator is required to guarantee workmanship, etc.
2. Notes will not be purchased unless the value of Ruberoid materials represents not less than 25% of amount to be financed.
3. Interest charge to be at the Government rate of \$5 discount per \$100. No down payment required. Loans to be repaid in equal monthly installments from one to three years.

When the price for modernization work has been agreed upon, loans may be secured as follows:

1. Contract and agreement (signed by both husband and wife).
2. Property Owner's Credit Statement—Government FHA Form-3A signed by both husband and wife.
3. Character Credit Report—From local credit agency. (Applicator pays for this and cost is refunded if and when note is purchased.)

All of the above are sent to the nearest office of the R and S Purchase Corporation which advises promptly of credit approval. When job is completed, home owner fills in Completion Report and Note. Both are forwarded to the R and S Purchase Corporation. Check including cost of credit report will be sent by return mail to contractor.



Contractor E. J. Schickli of Louisville, Ky., got more inquiries in 10 days with this sign than in the whole previous year. Truck tours different parts of city every afternoon

35 States Fight for Lower Taxes

A TOTAL of 35 states now have a definite campaign upon one or more points of the six-point program for real estate tax relief adopted by the National Association of Real Estate Boards in January 1933.

Of the 35 states, 16 have taken as a central point of their campaign a proposal for a constitutional or statutory over-all limitation upon the total rate leviable on general property, 17 take other points of the program. Over-all limitation is urged by the Association as a forcing measure for widening the tax base.

Seven states already have an over-all limitation. Of these, six now have active campaigns in progress for the spreading of school costs to a wider base. The Association urges that school costs be transferred in greater measure from local governments to the state, since the state may effectively levy on forms of wealth which cannot be reached by local government units.

* * *

Home Costs Reasonable

"OUR LITTLE NEWSPAPER," published by the Wisconsin Retail Lumbermen's Association, Milwaukee, Wis., carries an interesting table on residential costs in its Oct. 15 issue. The following table is presented for a story and one-half frame house in Milwaukee.

	Cost April 1929	Cost August 1930	Cost March 1932	Cost Sept. 1933	Cost Feb. 1 1934	Cost Sept. 1 1934
Excavating	\$ 100.00	\$ 65.00	\$ 50.00	\$ 55.00	\$ 80.00	\$ 95.00
Mason	601.39	530.50	490.00	550.00	565.00	590.00
Millwork	875.27	790.00	645.00	815.00	815.00	649.00
Lumber	917.76	790.00	673.00	902.78	1,028.00	919.25
Carp. Labor	614.66	554.66	400.00	425.00	650.00	490.00
Plastering	355.00	325.00	325.00	350.00	365.00	376.00
Plumbing	483.00	475.00	400.00	450.00	485.00	470.00
Heat & Tin	250.00	210.00	200.00	223.00	250.00	228.00
Painting	400.00	335.00	280.00	300.00	375.00	235.00
Finish Hdw.	58.00	38.00	38.00	42.00	42.00	45.00
Rough Hdw.	39.95	39.00	35.00	37.00	37.00	20.00
Wiring	98.00	88.00	85.00	87.00	95.00	90.00
Tile	45.00	34.00	34.00	37.50	45.00	25.00
Gas Service	34.45	34.45	32.00	32.00	54.00	54.00
Elec. Fixtures	80.00	60.00	50.00	55.00	67.00	40.00
Shades	30.00	20.00	20.00	25.00	30.00	20.00
Surveying	8.00	8.00	8.00	8.00	10.00	10.00
Insurance	37.25	37.25	37.25	37.25	52.00	40.00
Permit	5.60	5.60	5.60	5.60	5.60	8.00
	\$5,013.33	\$4,349.46	\$3,807.85	\$4,437.13	\$5,050.60	\$4,404.25

Higher Rents Aid Building

A SHARP stiffening and upturn in residential rents throughout the country is shown in a survey just completed by the National Association of Real Estate Boards.

"Outlook for real estate is the most favorable we have had in years," reported every letter written in response to the Association's request for rent news.

LEONARD P. REAUME, DETROIT, vice president of the Detroit Trust Company, states: "Residential rents in Detroit, including family residences, flats, and apartment buildings, show an average rate of 5.6 per cent higher than that of six months ago, with a remarkable recovery in occupancy, which I estimate as now up to normal.

"Occupancy in rental properties, as shown by a survey of over 10,000 units in all sections of Greater Detroit, is back to the 1929 figures. In fact, they are a fraction of 1 per cent higher than the 1929 percentage. Recovery is greatest in low cost properties."

IRVING B. HIETT, TOLEDO, says: "Residential rents have advanced in the last year to the extent of 20 per cent. Our low point of rentals was in the early spring of 1933. There is still a good supply of apartments, but about the first of this year well located houses in first class repair became almost 100 per cent occupied. Causes of change are: undoubling of doubled families; bettered family income; drift of new people to the city and of former residents back to the city.

"The outlook for real estate is more encouraging than at any time for years. Good prospect of many people building homes as soon as can secure financing."

DONALD T. POMEROY, SYRACUSE, N.Y.: "In apartment houses there has been a remarkable cut-down, this fall, in vacancy. Average vacancy in so-called modern apartment houses a year ago as shown by survey was 20 per cent. Today it is less than 5 per cent, and in many, many cases apartment houses are 100 per cent rented. This condition has resulted in a raise in rents

Only WITH



CAN REPLACEMENT BE MADE SO INEXPENSIVELY...EASILY

● This radically different device transforms hard-to-operate doors into modern, overhead operating doors—in a few hours and for a few dollars. "Over-the-Top" Door Equipment is just the thing for remodeling jobs released under the National Housing Act. With the old doors fitted into the opening, the hardware is quickly bolted in place. Low ceilings are no problem—"Over-the-Top" Door Equipment requires only 3 1/4" above the standard opening. There is a size for every opening. Write for complete information. FRANTZ MANUFACTURING CO., Dept. AB-11, Sterling, Ill.



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Fast 3 1/2 S Trainers. Power Load Tilters 3 1/2, 7, 10S. Non-Tilt 7S to 56S sizes.



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SPEED-O-LITE FLOOR SURFACING MACHINES

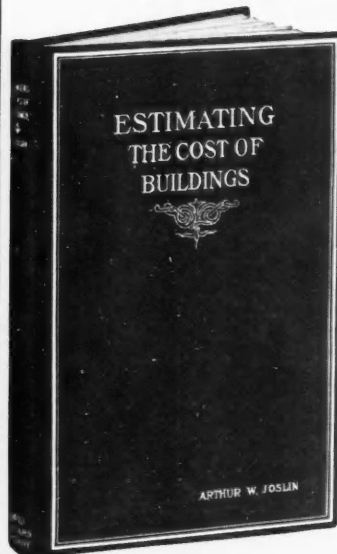
Cut your costs, lower your bids, secure the jobs. The new "Speed-O-Lite" will help you. It is the latest development in electrically driven, lightweight, high-speed floor sanders, weighs but 80 lbs. complete. Fully guaranteed. Get information on our easy purchase plan.

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Estimating the Cost of Buildings

By ARTHUR W. JOSLIN



Third Edition,
Revised and Enlarged

5¾ by 8½ Inches, Flexible Fabrikoid
211 Pages, 41 Illustrations, PRICE \$2.50 POSTPAID

American Builder and Building Age
30 Church Street, New York, N. Y.

This volume gives simple practical methods for estimating the cost and superintending the construction of a house or building of moderate size from a set of plans. It describes practically and in detail every step in the procedure. It covers plan reading, taking off quantities, estimating the cost of labor and materials, estimating the cost of alterations and an excellent system for keeping track of the progress of the work. Special forms which the author used in keeping accurate record of time, material and tools in executing building contracts are illustrated and their use explained.

from \$2.50 to \$5.00 per unit."

FRED M. LORISH, CHICAGO, (Swan, Lorish & Caspers, Inc.) states: "During the past year vacancies of 1932 were cut in half. Occupancies are now somewhat above normal. Occupancy in the South Shore district is between 97 and 98 per cent, and the scarcity of available attractive apartments has resulted in a rental increase averaging 10 per cent in 90 per cent of our October first leases. Rent delinquencies have been cut about 35 per cent."

CARLTON SCHULTZ, CLEVELAND: "A distinct housing shortage is in the making, but the demand is for quarters at a price which will not justify building. The largest demand is for small steam-heated apartments at less than \$40 per month rent."

JAY HEARIN, TAMPA, FLA.: "Increases averaging 10 per cent have been put into effect on residential and apartment house properties in Tampa, effective Oct. 1. There are fewer vacant houses and apartments than at any time since 1925. Sales have increased wonderfully within the past 30 days."

EDWARD G. HACKER, LANSING, MICH.: "Rental rates in this community are 25 per cent higher now than they were six months ago."

THE MILWAUKEE REAL ESTATE BOARD, Fortney Stark, secretary, reports that not in four years have so many buildings been 100 per cent occupied. Rents have been increased moderately in individual instances, the increases rarely more than \$5.00 a month.

ARTHUR S. KIRK, DES MOINES, (Chamberlain, Kirk Company): "Increase in rentals of about 10 to 20 per cent is taking place. For apartments, mostly in the rent range of \$46 to \$65 per month. Rents for cheaper quarters are about the same level as in the past months. So are the rents for the bracket above \$65. Improvement in residential occupancy is vast."

GLENN W. McFALL, WICHITA, KANS. (Glenn W. McFall Company): "Recent improvement in occupancy has been accompanied by an increased rental scale for whole rental market."

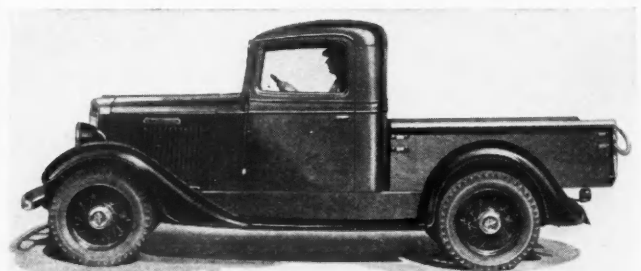
Shortage of Small Homes

LAWRENCE MILLER, DALLAS: "Just three or four months ago the seven-year downward trend in rentals stopped, veered around, and began to go the other way. Trend is now definitely upward. Shortage in cottages and duplex apartments renting from \$25 to \$50 per month. To new tenants these rent at advances of 10 to 20 per cent above rents prevailing a few months ago."

W. I. HOLLINGSWORTH, LOS ANGELES (of W. I. Hollingsworth and Company): "Noticeable improvement in the real estate situation in Los Angeles. Not nearly as many vacancies as there were a few months ago. Single-family residences difficult to obtain. Demand for duplex and apartment house properties has been very marked, and there is a reasonable increase in rental income in almost all instances."

THE HARTFORD, CONN., REAL ESTATE BOARD, by Z. K. Burr, secretary: "Very unusual and active rental market starting about four weeks earlier than usual and continuing strong. In a few cases we have made 10 per cent advances for a few apartment houses."

NEW INTERNATIONAL TRUCK



ILLUSTRATED ABOVE is the new Model C-1, ½ ton six cylinder International motor truck which has many new features including deep frame reinforced with numerous cross joints, powerful low operating cost motor, chrome steel axle shafts, streamlined hood and cowl. This was erroneously credited to another company in publication in the October American Builder, page 60. It is manufactured by the International Harvester Company, Chicago.

Construction Errors

(Continued from page 35)

Figure (12) shows a more logical method of resting the joists on wooden shelf strips, properly bolted in place. This method is recommended when the joists and beams are to be subjected to heavy loads. The joists should be toe nailed to the shelf strips. When diagonal sub-flooring is not used to tie across the top, metal straps, as shown in (b) Figure (8), should be used.

Note that ample space (X) is allowed between top of joists and top of steel beams, Figures (8) and (12). This will permit the joists to shrink. Otherwise, when the joists shrink the upper steel flange would project above the level of the joists.

SEND IN YOUR IDEAS

If Better Building Methods interest you, send your ideas to Practical Job Pointers department so others may learn and profit.

O.K., Mr. Moffett—We'll Build

(Continued from page 20)

of home building. How vital that need is can be seen in some section of almost any American city.

Property values are destroyed, cherished homes spoiled and abandoned and neighborhoods ruined by the erection of one off-color, ugly or inappropriate building. A home is a slave to its surroundings, as has often been pointed out. Every investor, every bank or lender of money, every honest home owner in our cities, has generally been at the mercy of the careless, ignorant or vicious builder operating on the adjacent vacant lot. Every vacant lot today in an unprotected section carries a threat of ruin to its neighbors. This is the cause of one of the greatest economic losses of our time, but it can be eliminated as soon as the public learns how to protect itself. Control would substantially increase property values and invite better investments.

In this connection there is another phase of home building the government should take in hand. That is the prevention of "jerry" building. Every contractor knows what it is, and the home builder, who is more or less dependent on the honesty of the contractor, should be protected from the unscrupulous operator. Poor materials, actual substitution of inferior or weaker members in order to cheapen material costs, evasion of specifications, and shoddy workmanship—these and a dozen other schemes to increase dishonestly the margin of profit should be ruthlessly obliterated.

Where such practices obtain the result is a home that is not worth to the owner, the assessed valuation he is forced to place upon it. It results in costly plants from the up-keep standpoint, with constant repair bills, and a feeling of dissatisfaction and discontent—anything but the atmosphere that should surround the place men and women want to call home.

On the whole, the careful student of the times must admit there is a very definite and real need for just the thing the administration proposes. The market is there, the need is there, and there is—as I have found in this community—a large number of men and women eagerly waiting for the opportunity to build permanent homes. The very obvious and immediate benefits of this piece of New Deal legislation should make it instantly popular.

The administration, as well as every student of civic affairs, knows that the shortage of new homes is putting a tremendous burden on local city finances. Every city must create a certain amount of new, taxable property to absorb the loss from depreciation and demolition. This new bill is one definite and upward avenue for cities in financial difficulties, where the municipal bankruptcy bill is simply an opportunity to accept gracefully the philosophy of despair.

Under this bill's provisions, the builder who has a reputation for probity and dependability will find ample opportunity for the use of his talent and the way wide open to a steadily increasing business. There is no trick about it. It is simply the New Deal applied to an age-old business, and the result is progress.

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Comfortable
with
Gimco
ROCK WOOL
HOME INSULATION
and
Increase Your Profits



Going to bed is one way of being comfortable, but the best way is to insulate with Gimco. Save 30% to 40% of home owners fuel bills and add to their winter comfort with the insulation designed to give greater customer satisfaction and greater dealer profits.

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Use AMERICAN Sanders—for light weight, great capacity, low cost, beautiful floors. Send for information on complete line.



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EASY TO INSTALL—WRITE

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CABINET
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Includes 16" band saw,
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rip and crosscut saw.

Without Motor

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Selected List of Manufacturers' Literature

For the Service of Builders, Contractors, Architects and Dealers

THE publications listed on these pages may be obtained without charge either by using the coupon, listing the numbers of the catalogs desired and mailing to AMERICAN BUILDER, 105 West Adams Street, Chicago, or by applying on your business stationery to the manufacturers direct, in which case kindly mention this publication. Either the titles or the numbers may be used in ordering. This list is an editorial feature for convenience of our readers.

INSULATION AND WOODWORK

GENERAL INSULATING AND MFG. Co., Alexandria, Ind.

1023—**Insulation**—Three bulletins on Gimco Rock Wool entitled "New Comfort for the Modern Home at Any Temperature," "Gimco Rock Wool Sealal Bat Building Insulation," and "Bulletin No. 100" telling what Gimco Rock Wool is and how it is made. These bulletins are illustrated and have a strong consumer interest and appeal in addition to the technical data given.

UNITED STATES GYPSUM Co., Chicago, Ill.

1024—**Insulating Board**—"Interiors of Red Top Weatherwood" is a de luxe brochure of 32 pages and covers, illustrating many decorative wall finishes and ceiling panel arrangements using Weatherwood fibre insulating board. Suggestions for modernizing and restyling many types of business and public buildings are also presented.

ARKANSAS SOFT PINE BUREAU, Little Rock, Ark.

1025—**Wood Paneling**—"New Interiors for Old." A beautifully illustrated 16-page booklet accompanied by 3 architectural detail sheets showing paneled interiors recommended for Arkansas Soft Pine use. A valuable selling tool in the hands of any dealer, contractor or architect.

THE BRECHER Co., INC., 443 W. Jefferson St., Louisville, Ky.

1026—**Wood Mantels**—New catalog illustrating 69 designs of wood mantels photographed just as they would appear in the home. Catalog especially prepared for architects and building contractors.

CARR, RYDER & ADAMS Co., Du-buque, Ia.

1027—**Millwork**—General catalog on "Bilt-Well" millwork, giving specifications, details and full data on windows, doors, frames, mouldings, blinds, cabinets and stairs.

ROBBINS FLOORING Co., Rhineland, Wis.

1028—**Block Floors**—"Ironbound Floors" are described in an 8-page profusely illustrated circular covering the construction, usage and method of installing these wood block floors.

AMERICAN ROOF TRUSS Co., 228 N. La Salle St., Chicago, Ill.

1029—**Roof Trusses**—Information on roof trusses of all kinds, including

wood, composite wood and steel, and steel trusses, including specifications and detail drawings. Church trusses and special wood trusses to order for community buildings.

W. L. EVANS, P. O. Box 186, Washington, Ind.

1030—**School Wardrobes**—"Evans Vanishing Door" is an 8-page catalog, illustrated, presenting data on Evans vanishing door wardrobes for schools, clubs, community buildings, gymnasiums, etc.

ORNAMENTAL PRODUCTS

UNITED STATES PLYWOOD Co., INC., Flexwood Division, 103 Park Ave., New York City

1031—**Wood Paneling**—"Now You Can Decorate with Flexwood" is an illustrated folder showing how to use choice cabinet woodwork and paneling in rare wood at moderate cost.

KLISE MFG. Co., INC., Grand Rapids, Mich.

1032—**Ornamental Mouldings**—Information regarding carved wood mouldings, carvings, balusters, newels and all other ornamental woodwork, including samples.

ORNAMENTAL PRODUCTS Co., Detroit, Mich.

1033—**Composition Carvings**—"Lignine Carvings" are presented in a 48-page illustrated catalog listing 4,000 designs, including scrolls, rosettes, panels, capitals, pilaster caps, etc., now available in composition carvings.

ALUMINUM Co. OF AMERICA, Pittsburgh, Pa.

1034—**Aluminum Paint**—"Specifications for Aluminum Paint" for many purposes are presented in a new technical bulletin.

METAL WORK

THE EDWARDS MFG. Co., Cincinnati, O.

1035—**Interlocking Roofing**—"Edwards Loxseam" described as the first fundamental improvement in interlocking roofing in years is fully illustrated in a new circular.

REPUBLIC STEEL CORP., Youngstown, Ohio

1036—**Century of Progress**—Republic Steel at A Century of Progress is illustrated in a big rotogravure 12-page picture section of both practical and

curious interest to building contractors, architects and dealers.

DETROIT SHOW CASE Co., Detroit, Mich.

1037—**Store Front Construction**—"Full Sized Desco Details" presents a full story of Desco Metal store front construction.

SHRAUGER & JOHNSON, Atlantic, Ia.

1038—**Sheet Metal Windows**—Basement windows of the low cost sheet metal construction are featured in a new catalog along with Shrauger & Johnson's barn windows and roof windows.

MESKER BROS. IRON Co., 424 S. Seventh St., St. Louis, Mo.

1039—**Metal Windows**—Information regarding the Mesker casement windows is presented in a 40-page catalog giving specifications, installation details, methods of screening, hardware and standard sizes.

LOGAN Co., 420 N. Buchanan St., Louisville, Ky.

1040—**Iron Railings**—The Logan iron railings are presented in a 12-page catalog showing designs for inside stairs, porches, balconies and steps.

LALLY COLUMN Co., Cambridge, Mass.

1041—**Columns**—Information regarding the Lally steel shell concrete filled columns, caps, bases and necessary details is contained in an 80-page catalog.

CREX PATENT COLUMN Co., 2300 S. Springfield Ave., Chicago, Ill.

1042—**Crex Columns**—Information regarding the Crex steel sheet concrete-filled columns is presented in a 24-page catalog showing construction and application to various types of buildings, safe loads, etc.

BUILDING EQUIPMENT

ELECTROVENT CORP., 5247 Western Ave., Detroit, Mich.

1043—**Electric Ventilators**—"The Secret of Perfect Home Ventilation" is a 16-page catalog showing photographs of installations in various rooms, with description of materials, capacity, etc.

AMERICAN BLOWER CORP., 6000 Russell St., Detroit, Mich.

1044—**Air Conditioner**—"Sirocco Conditioner" is a 24-page catalog giving complete description of year-round air conditioning unit, including 8 detail drawings.

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Good Estimating Books

New Building Estimators' Handbook

By William Arthur

The data in this book applies to all classes of building construction. A complete set of tables covers all phases of estimating. Use of a flat rate of a dollar per hour for mechanics and sixty cents per hour for laborers enables the estimator to readily adapt these tables to any local rate.

1930. 15th edition. 1056 pages, 480 illus., 600 tables, 31-page index, 5x7 $\frac{1}{2}$ inches, flexible binding, gold edges, \$6.00

The Building Estimator's Reference Book and the Vest-Pocket Estimator

By Frank R. Walker

These new books contain estimating and cost data on all classes of building construction, from the smallest house to the larger fireproof structures. Complete itemized estimates on everything from excavating to painters' finish, all compiled so that it may be used in any locality regardless of local wage scales or material prices. Complete data on the use of new time and labor saving tools, shows contractors how to reduce their labor costs.

1931. 7th Edition. 1500 pages, Profusely Illustrated, 4 $\frac{1}{2}$ x6 $\frac{1}{2}$, Flexible Binding. The Vest-Pocket Estimator, 2 $\frac{1}{2}$ x5 $\frac{1}{2}$, 220 pages, Flexible Binding. \$10 for both books.

Estimating Building Costs

By Frank E. Barnes

A practical handbook planned to aid the contractor and estimator in determining the amount of labor required and to supply prices of labor and materials useful in checking estimates. Where possible the data is put into tables for quick reference. Includes appraisal of buildings.

1931. 3rd edition. 656 pages, 203 illus., 4 $\frac{1}{2}$ x7 inches, flexible, \$5.00

Estimating Building Costs

By William Arthur

This is a digest of the author's "New Building Estimators' Handbook", designed for beginners and others who desire a less technical and shorter work. It is confined to smaller buildings and gives a fair idea of what others have accomplished in a certain number of hours and what amount of material is required for the different parts of a building.

1928. 3rd edition. 239 pages, 29 illus., 91 tables, index, 4 $\frac{1}{2}$ x7 inches, flexible Fabrikoid, \$2.00

Appraisers' and Adjusters' Handbook

By William Arthur

The material in this book is a continuation of the author's "New Building Estimator's Handbook", designed primarily for insurance appraisers and investment company valuers. The first part covers the square and cubic foot costs, percentages of the various kinds of work, comparisons and approximate estimating. The second part shows how the detailed costs may be found, and explains the calculation on a basis of hours and quantities. Numerous tables are given for quick reference.

1924. 633 pages, 68 illus., tables, 4 $\frac{1}{2}$ x7 $\frac{1}{4}$ inches, flexible, \$5.00

Estimating Building Costs

By Charles F. Dingman

A practical manual showing how to analyze the construction job, apply cost data adjusted to existing conditions and arrive at an accurate cost estimate. It covers costs for material, labor, haulage, overhead, equipment and all operations from excavation to roofing on all kinds of building construction.

1931. 2nd edition. 277 pages, 23 illus., 138 tables, pocket size, flexible, \$2.50

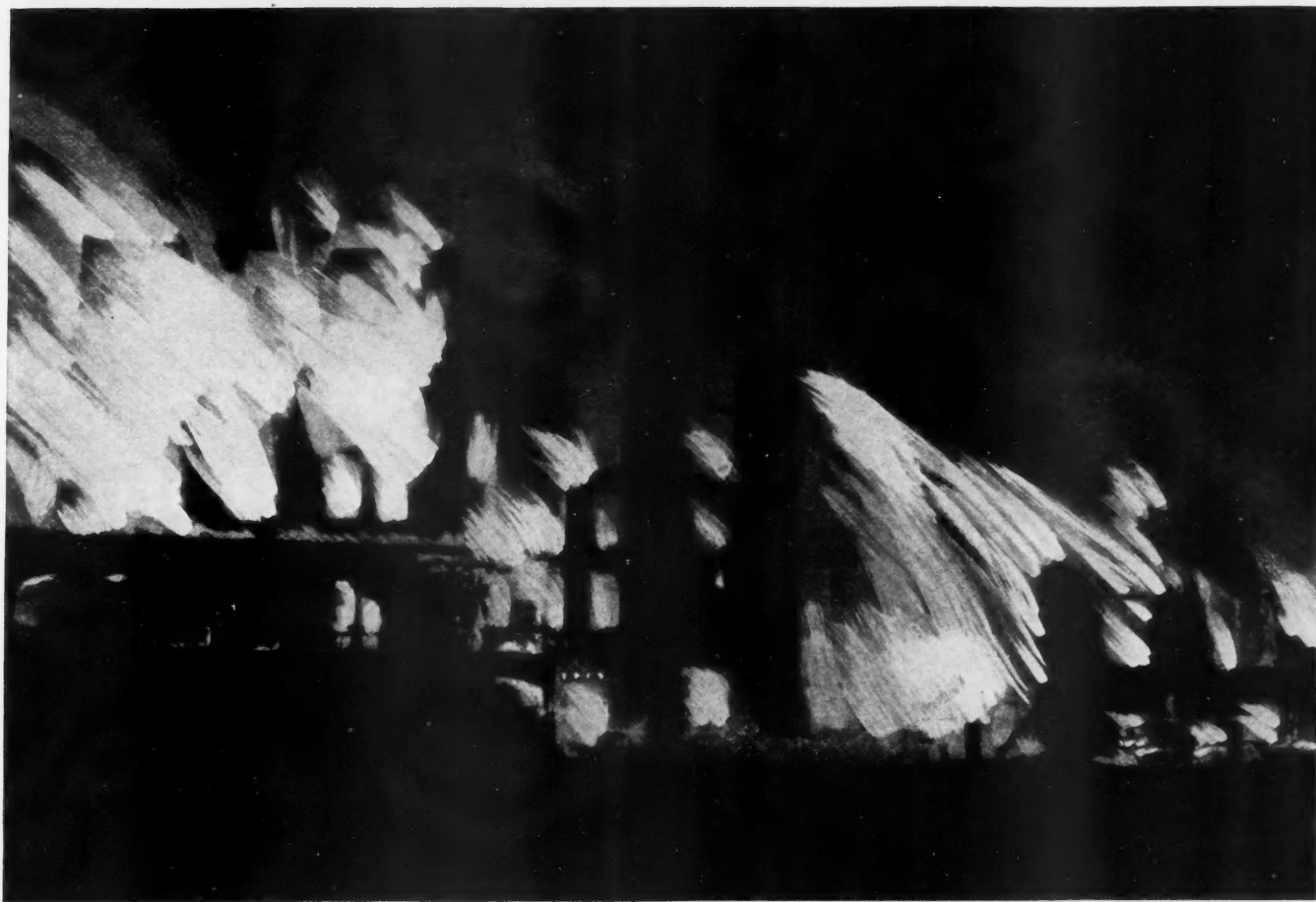
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