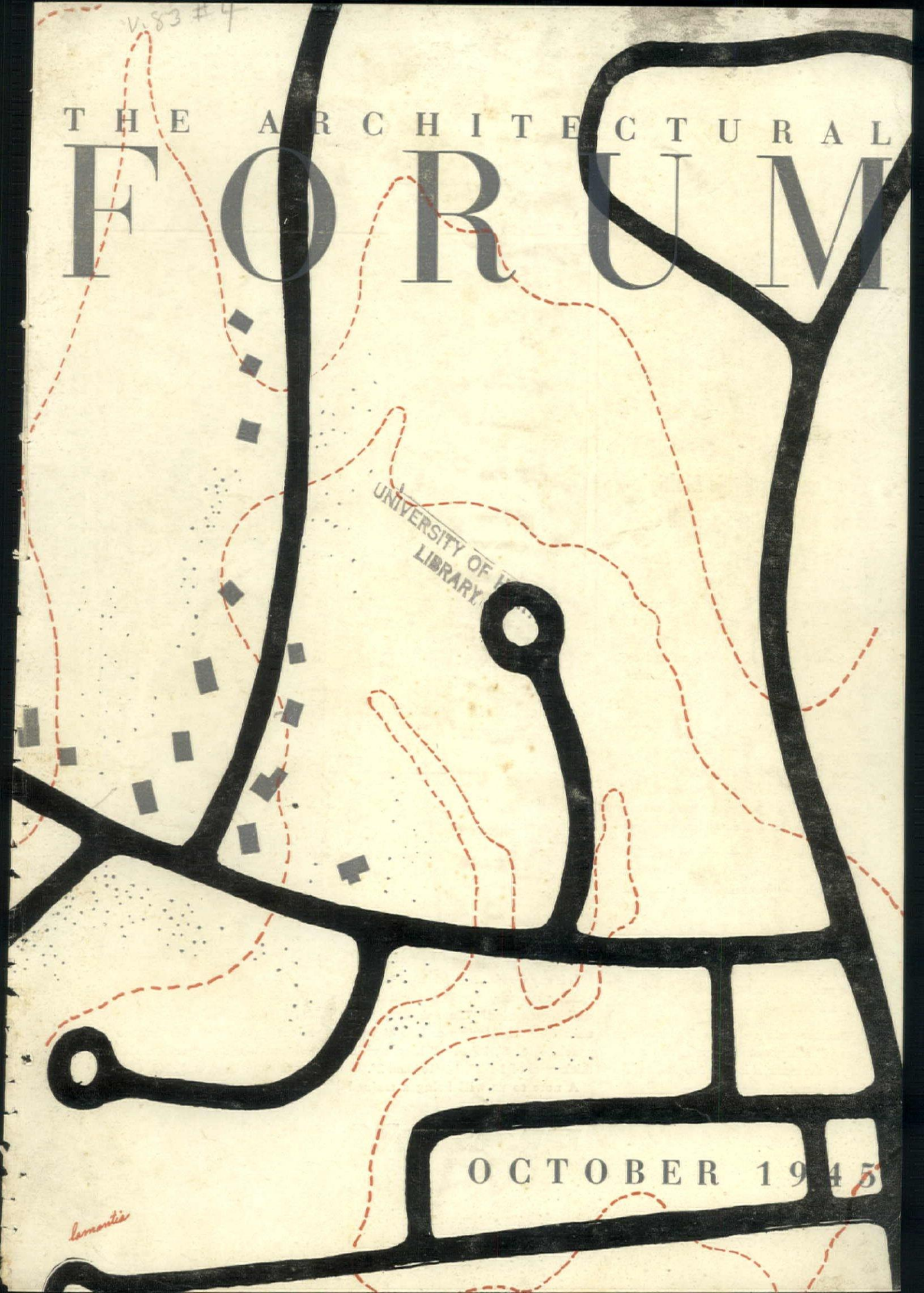
THE ARCHITECTURAL

FORUM



OCTOBER 1945

lamontia

For Modern Wall Construction . . . Specify

CEMESTO

REG. U. S. PAT. OFF.

TOP: Workman demonstrates application of Cemesto wall unit at recent Cadillac Motor Car Co. factory addition, Detroit, Mich. Cemesto is rigidly held in place on steel beams by means of easily-applied metal clips.

BOTTOM: Mechanic sinks holes in asbestos-cement batten which is securely bolted to Cemesto wall unit at joints.

You Can Adapt this Multiple-Function Insulating Wall Unit to Practically Any Job

Leading architects the country over are turning in ever-increasing numbers to Cemesto wall units—the famous Celotex cane fibre insulation board sheathed on both sides with asbestos-cement bonded to the core with waterproof, vapor-proof bituminous asphalt adhesive.

Typical of Cemesto applications is the recent factory addition at the Cadillac Motor Car Co., Detroit, Mich. On this project, as on so many others, Cemesto was selected for wall construction because it gives *all five* of these major advantages:

1. Speed and economy of application. The Cemesto wall unit incorporates in *one* material both structural wall *and* insulation. It can be pre-cut to needed sizes . . . used either vertically or horizontally.

2. Structural value. Cemesto meets normal load requirements. It is rigid and permanent and saves on intermediate supporting members and materials.

3. Weather-resistant surface. The smooth, firm 1/8" asbestos-cement surface on each side of the material is both fire- and moisture-resistant.

4. Self-finish interior surface. The light gray Cemesto surface furnishes good light reflection value . . . plus a pleasing and durable finish that requires no painting.

5. Excellent insulating value. Conductivity of the Celotex core has been established at 0.33 B.t.u. per hour per square foot per degree F. per inch of thickness.

Is it any wonder, then, that progressive architects specify Cemesto for modern wall construction? These versatile wall units are available in standard 4′ wide panels, 4′, 6′, 8′, 10′ or 12′ long, and in thicknesses of 1-1/8", 1-9/16" and 2".

A note to us will bring a trained Celotex Service Engineer to your desk . . . ready, willing and *qualified* to give you whatever technical assistance you require.

Send for our files number 4500 and 44119 for details and description of various applications of Cemesto to steel and wood. Write: The Celotex Corporation, Dept. AF-1045, Chicago 3, Illinois.

CELOTEX

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BUILDING PRODUCTS

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VOLUME 83, NUMBER 4

THE ARCHITECTURAL FORUM

OCTOBER 1945

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3. 10 cubes (up to 40) available every 25 seconds.
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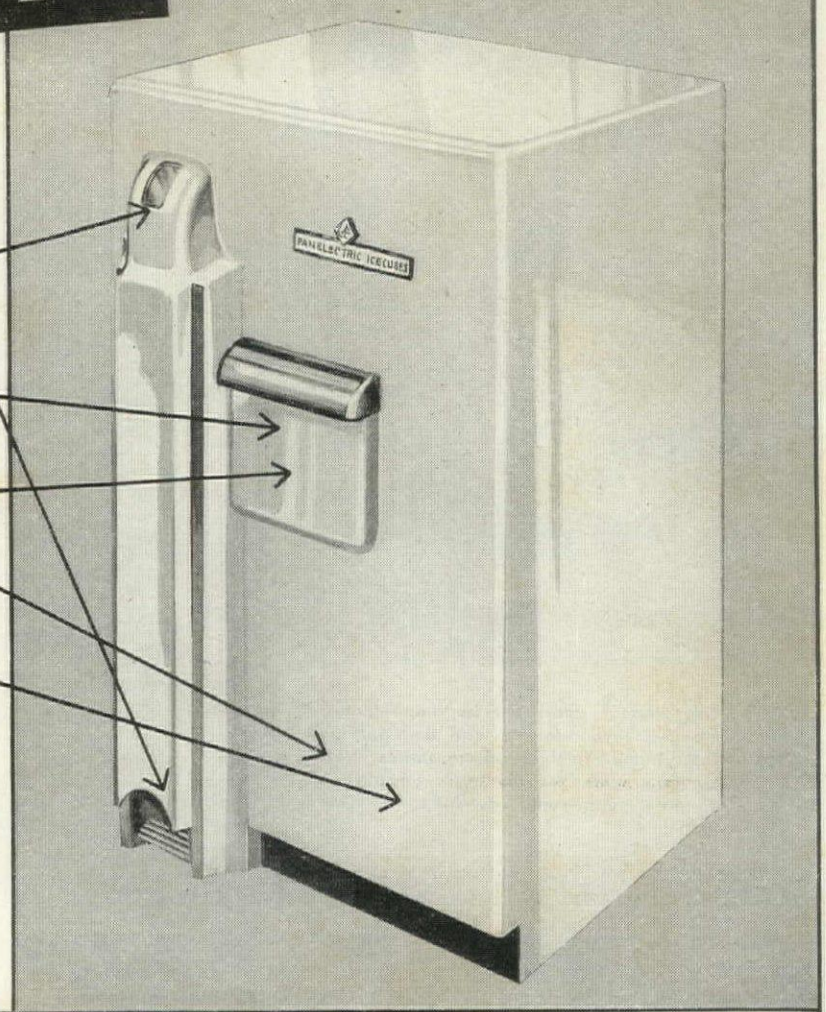
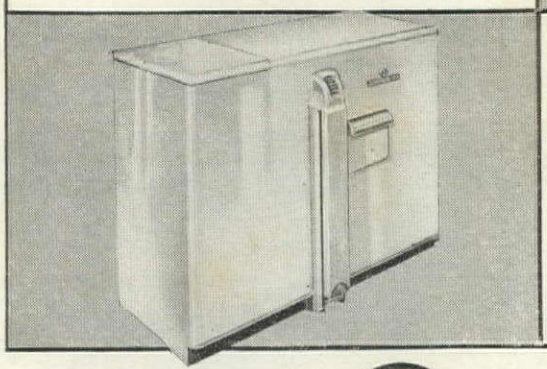
5. Absolutely silent, hermetically sealed unit.
6. Dimensions: *Standard Model*—fits snugly *under* standard-height kitchen counter—22" wide by 35" high by 25" deep.

   "On Request" Model—fits *flush* with standard kitchen counter—22" wide by 36" high by 25" deep.

   Commercial Model (#240C) for hotels, taverns, institutions, etc.—has 240-cube capacity.





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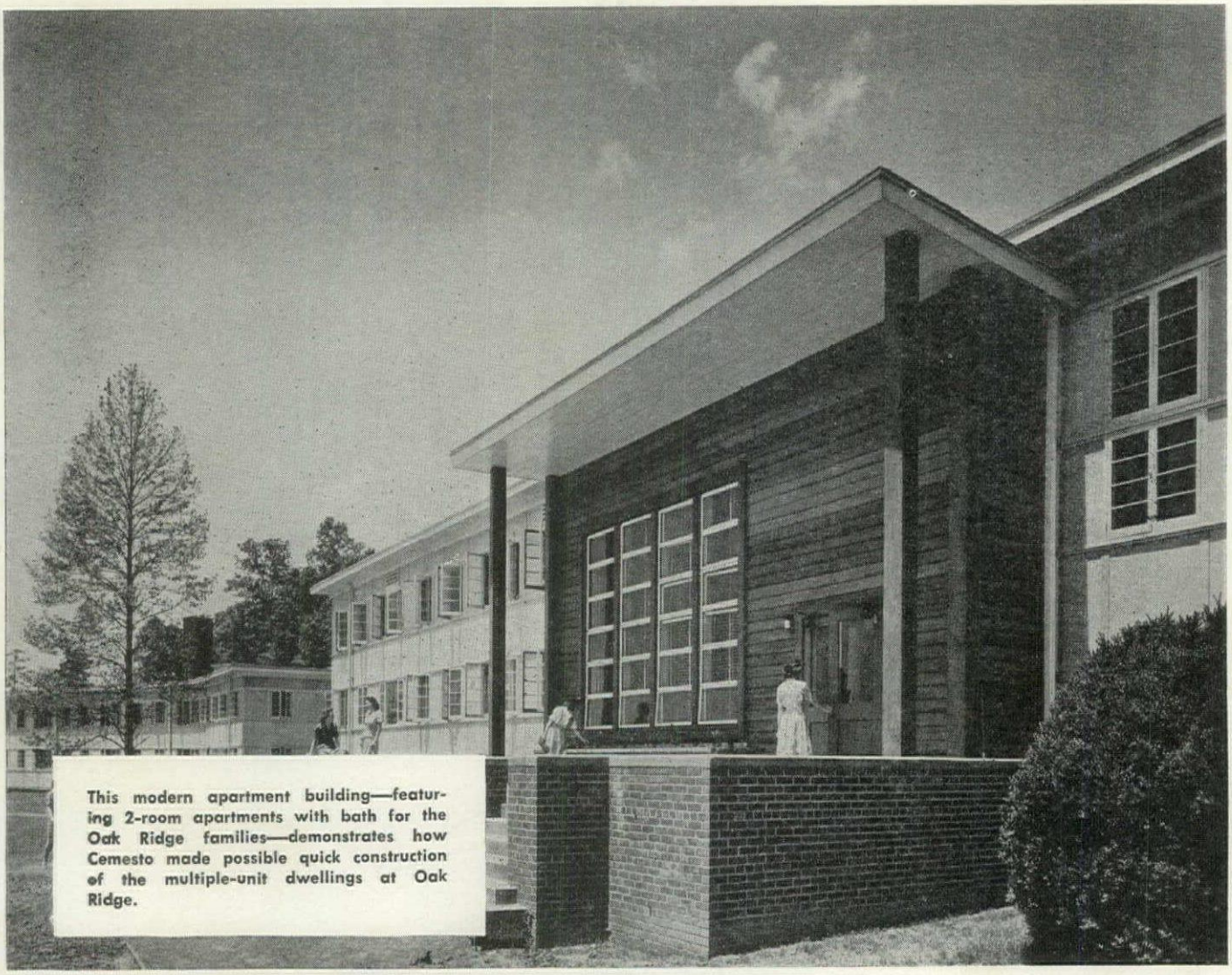
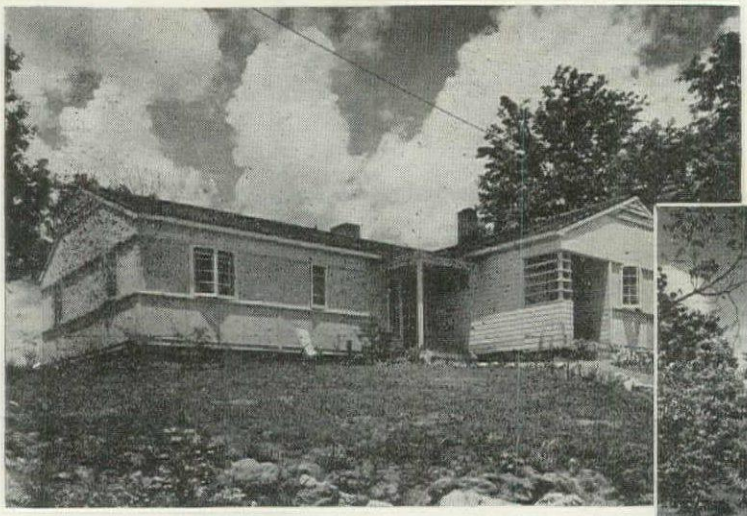
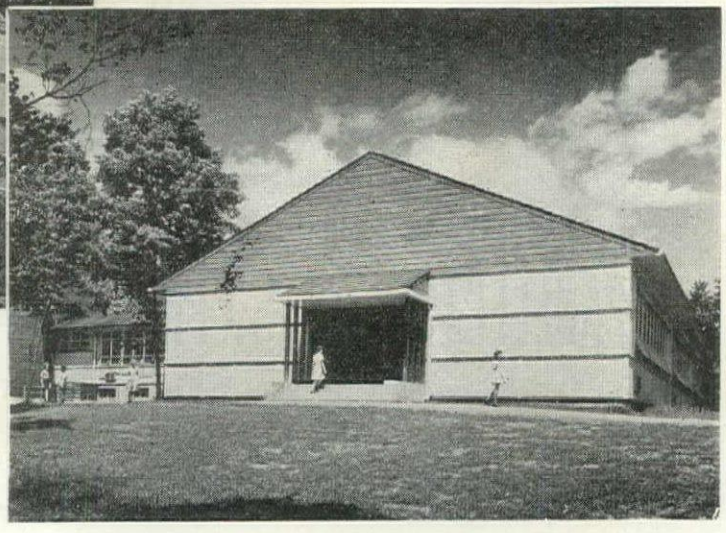


This modern apartment building—featuring 2-room apartments with bath for the Oak Ridge families—demonstrates how Cemesto made possible quick construction of the multiple-unit dwellings at Oak Ridge.



Typical of the home units for families at Oak Ridge is this good looking, functional three-bedroom house. Cemesto walls provide structural strength, durability, insulation, weather protection and beauty in one easily applied material.



A self-contained community, Oak Ridge boasted even schools for the workers' children. Cemesto wall units in this building were pre-cut to size, erected with a minimum of lost motion and time. Note the ample windows on the side for light, airy class rooms.

"ATOMIC CITY" IN RECORD TIME

"Celotex *Cemesto* speeded construction and helped conserve manpower at Oak Ridge, home of the Atomic Bomb,"

Says John Merrill of Skidmore, Owings and Merrill, the Architect-Engineers.

Behind the development of the awe-inspiring atomic bomb lie many tremendously interesting stories that can now be told.

One of these concerns the hitherto unbelievable speed with which an entire, beautifully planned, permanent city was created to provide the homes required by the thousands of workers who were to produce the history-making engine of destruction.

Imagine an area of tangled, hilly wilderness, six miles long and two miles wide, at the foot of the Smoky Mountains in Tennessee.

Within a year there was a beautiful, ultramodern city of 3000 permanent homes, complete with stores, churches, schools, theaters and the many other structures and utilities that go to provide all the comforts of modern living.

This was the miraculous accomplishment of the architects, contractors and building material manufacturers who produced the now famous atomic bomb city of Oak Ridge, Tenn. And this miracle was accomplished in large measure as a result of the pioneering developments of forward thinking minds in the building field.

Long before the start of the war, pioneering organizations had devoted much thought and money to the development of new building materials and better construction methods. Out of this experimentation and development came such new products as Celotex Cemesto and Celo-Roof, two materials which were in a large manner responsible for the record breaking speed with which the residence community of Oak Ridge was created.

Both of these products are so-called "multiple function" materials because in each case a single unit performs the functions that in conventional building methods require several materials and operations. Cemesto provides a complete exterior and interior wall containing in about an inch and a half thickness all the requirements of a good sound wall — structural strength, durability, insulation, vapor barrier and weather protection. So here, in Cemesto, is a product that fits ideally into prefabrication methods, for it is a mass produced, prefabricated panel — not a panel laboriously built up by jig-table techniques but one fed through a machine to form a product ready for the market.

Celo-Roof provides, in attractive quickly installed units, the same functions for the roof as Cemesto does for the walls.

These materials, being factory-cut to the required sizes for their positions in the building, made it possible, with the use of pre-cut millwork, to put the Oak Ridge homes together quickly. The combination of these construction methods with an almost super-human job of material and manpower planning provided, in less than the normal building time, the housing facilities required by the people who were to work on the bomb.

While far-sighted early development had these new materials ready at the time this project was begun, the job would never have been the precedent-shattering success it was without the complicated but efficient system of logistics that was formulated and carried out by the numerous organizations involved.

A new type of construction developed by the John B. Pierce Foundation was used. This applied assembly line methods, as used in manufacturing, to building construction. Instead of the house moving down a line, the various materials and workmen were systematically scheduled to be at the right place at precisely the right time so that there were no delays or lost motion.

Using the first 1000 house contract to illustrate the working of this system, a group of 13 houses was started each day. One crew of men put in 13 foundations every day, moving across the entire project until 1000 foundations were in place. Directly following them came the men who laid the floors, then those who erected the framework and so on to the final clean-up crew who carried away the rubbish, locked the door and turned over the key.

To enable labor to function smoothly, materials had to flow evenly and continuously in exactly the proper quantities from factory to building site.

The Celotex Corporation carefully scheduled production and delivery of its materials so as to assure the successful accomplishment of its part in this complex operation. A certain number of cars left the plants each day for Oak Ridge and nothing was allowed to interfere with the schedule. Celotex kept two highly trained construction men on the site at all times expediting this flow of materials and standing by to handle emergencies. Not once was there any failure in maintaining continuous construction.

Skidmore, Owings and Merrill, architects, planned and supervised construction of this remarkable city and during most of the construction period they employed over 500 draftsmen, architects and engineers in their Oak Ridge office.

The contracting firms of O'Driscoll and Groves, New York, J. A. Jones Construction Company, Charlotte, N. C. and John A. Johnson Construction Company, New York, were awarded construction contracts on the 3050 houses of the city proper.

Millions of feet of Celotex materials have gone into the structures comprising the city, but it is the exciting story of Oak Ridge housing and the manner in which the difficult problems were met that holds promise for all interested in post-war building. The organizations which participated in the creation of Oak Ridge have demonstrated that they can be relied upon to develop and produce the newest and best in building materials and methods.

CELOTEX
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BUILDING PRODUCTS

For complete information on Cemesto and other Celotex Building Products, and details as to how they may be applied to your building problem, drop a line to: The Celotex Corporation, Dept. AF-1045, Chicago 3, Illinois.

THE CELOTEX CORPORATION • CHICAGO 3, ILLINOIS

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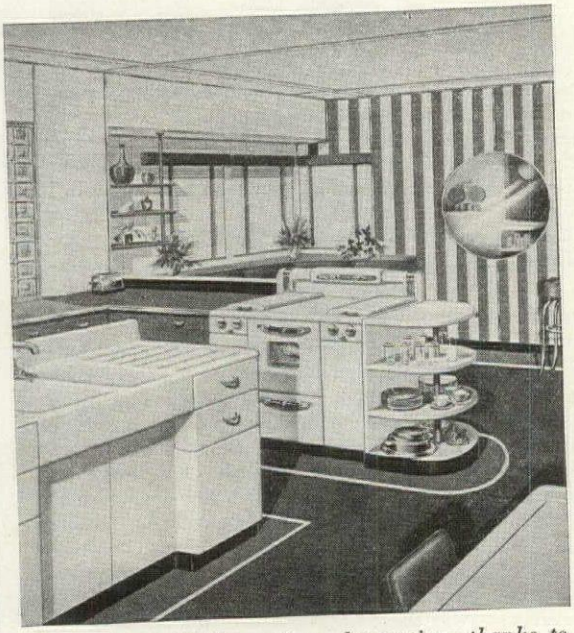
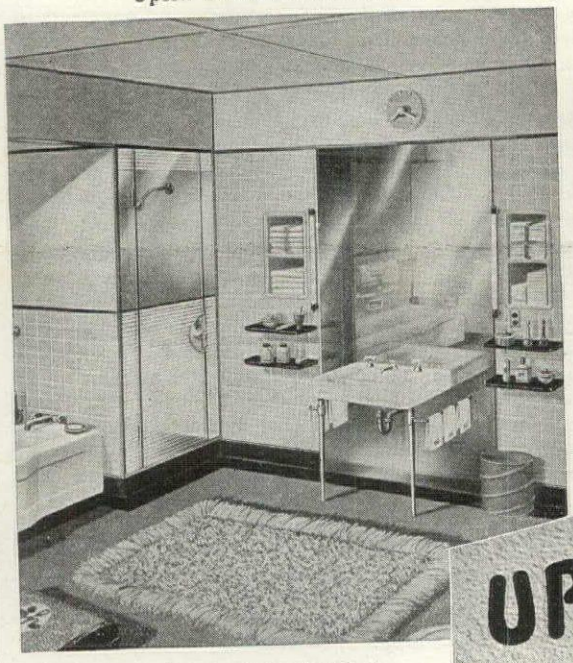


This kitchen's bright, modern, decorative—thanks to Upson Fibre-Tile.

A dreary bathroom transformed into this cheery one with Upson Dubl-Thik Fibre-Tile.



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UPSON Crackproof Panels and Upson Dubl-Thik Fibre-Tile enable you to offer clients important advantages over conventional materials and methods. They can be quickly installed as full or semi-partitions, or over old plaster. No waiting to dry, no big clean-up job afterward. One, or at most two coats of paint give well finished effect.

Remodeling is accomplished far faster, far simpler—with Upson. Even major changes can be done during occupancy.

Upson Dubl-Thik Fibre-Tile—now available for immediate delivery—offers endless advantages in modernizing kitchens, breakfast rooms, bathrooms, shops and stores. Hard-finished, fuzzless surface is non-absorbent, processed to eliminate need for sizing. Gives enduring satisfaction, permanent beauty.

Upson Crackproof Panels are not available at present. But when you can again specify them you'll be able to eliminate permanently the danger and unsightliness of falling and cracked plaster.

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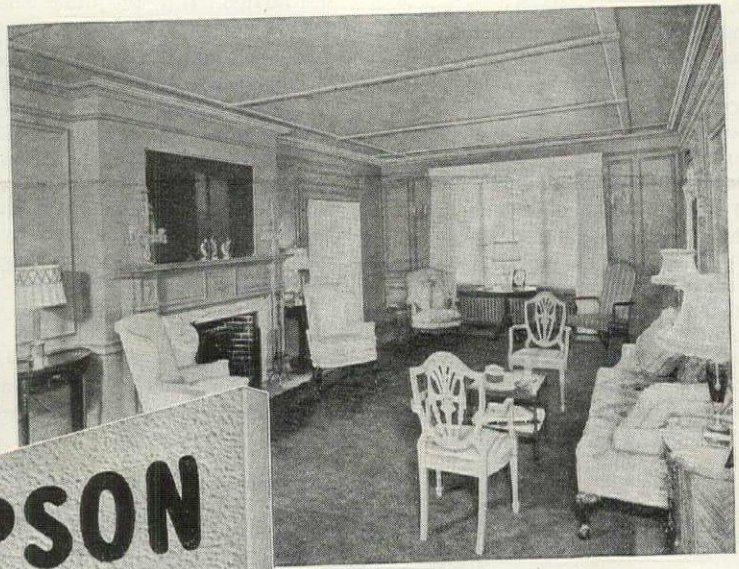

Beautiful and Crackproof this Upson Ceiling adds distinction to the room.

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UPSON PRODUCTS

PACEMAKER IN CRACKPROOF PANELS

NEWS... L-41 goes but not all lights turn green (this page) . . . Senators may probe price ceilings (page 8) . . . New FHA aids (page 8) . . . Frank Lloyd Wright spirals in Manhattan (page 9) . . . The packaged mortgage booms (page 10) . . . New city at Grand Coulee (page 28).

HALLELUJAH!

In the first month of peace many a battle began at home. But Building's biggest battle was won—L-41 was out. Priority applications went in the ash-can. On October 15 Building will be free to build whatever it pleases where it pleases, Reconversion Director John W. Snyder said.

But while builders happily tore up priority application blanks, many another fight reverberated on the building front. With lumber still the biggest question-mark in how many anxious customers will get houses this year, 60,000 AFofL lumber yard and sawmill workers struck for higher pay and shorter hours. While home equipment manufacturers vied with each other in promising first of the year delivery, a white-collar strike at Westinghouse Electric stalled plant production lines. In Cleveland an unprecedented walk-out of title examiners paralyzed $20 million worth of real estate transactions. Delivery crates piled on sidewalks and thousands of office workers took a holiday as 15,000 New York building service and maintenance employes struck, halting elevator service in 1,600 office and loft buildings. And over housebuilding like every other U. S. industry loomed the momentous struggle of the Detroit titans. If United Auto Workers and the automobile industry fail to come to a prompt agreement, wartime savings of hundreds of thousands of workers may go over the grocery counter instead of into home purchase.

Only Mayor Fiorello LaGuardia seemed to have an answer. Sitting down with building tradesmen and building contractors, the Mayor painstakingly drafted a plan to end costly job strikes. Before a single shovel turns on New York's billion-dollar works program, both wage scales and jurisdictional authority will be set by contract.

While the U. S. sought its own road in its own way to full employment and one million houses a year, building plunged ahead. New York gasped at a glimpse of the spiral-shaped model of its first Frank Lloyd Wright designed building, a museum for non-objective art to be built on Fifth Avenue. Scarcely a city failed to sprout plans for at least one new neighborhood development—among them, Cleveland, where the machinists' union organized a housebuilding cooperative. Slogan: "Collective bargaining will buy your home for less."

Robert Ingersoll, steel-maker, took honors as the first to offer the long-promised mechanical house core. Ingersoll said he would have his steel-wrapped kitchen, bathroom and heating package in production by spring. No dream house had yet appeared on the prefabrication horizon, but the industry's prevailing quiet was broken by rumbles of prefabricated movie theaters, a scheme linked as usual with Henry Kaiser, and by chain-restauranteur Howard Johnson's plan to abandon roadside cathedrals in favor of prefab diners that could move to follow traffic.

Real estate prices softened and older homes for the first time looked vainly for takers. It was clear to everybody that Building's start was at hand. There were, to be sure, a few remaining headaches. While materials producers wrangled with OPA about price ceilings, builders found it harder than ever to get supplies in an excited market. Long handicapped by labor lack, the brick industry finally got a price ceiling boost, figured that it would mean an average raise of 10 percent for all brick workers—and a lot more bricks for houses. While Washington rumor had it that Senator Robert Wagner (Dem., N. Y.) would introduce a bill seeking federal control of house prices, not many Congressmen lined up for any extension of present price controls. Here and there owner-builders worried about how to get vacant war rental housing in shape for customers. Rent ceilings still hung heavily over new apartment development. But, all in all, September marked the turn—the first month when Building substituted a gleam in the eye for an overdose of aspirin.

WASHINGTON

OBITUARY

L-41, after a troubled life of 32 months, will die almost unmourned on October 15. After that date, Building will be free to build anything anywhere. Only remaining wartime restrictions are price controls on materials and services. The building customer will re-

NEWS

place the federal government as the industry's boss.

L-41, the basic wartime building control order, died the hard way. The Office of Price Administration and the National Housing Agency had joined in a last-ditch effort to keep some housebuilding controls — particularly a permit-to-build mechanism designed to regulate house prices. The War Production Board sat on the fence — although its own surveys promised a plentiful supply of most materials and labor by the next building season. Hugh Potter, head of the inter-agency committee set up to steer building reconversion, led the drive for building freedom. Foremost among the few on the mourners' bench when L-41 expired were CIO representatives. Joined by the more excitable sector of the press, CIO shouted that an open door for housebuilding would also be an open door for inflation.

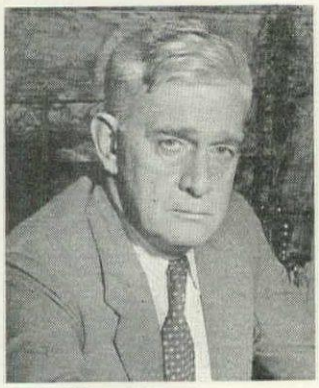
SNYDER: hero

After weeks of desk-thumping arguments, reconversion chief John W. Snyder emerged as the hero of the piece. Rushing back from a European mission, Snyder announced L-41's end just in time to halt Senatorial hearings which threatened to spotlight both building facts-of-life and Washington reconversion muddling. When news of L-41's repeal drifted down Pennsylvania Avenue to the Senate Office Building, OPA Administrator Chester Bowles, telling the inquiring Senators why OPA argued for continued housebuilding controls, stopped in mid-sentence. A roomful of building men and federal representatives reached for their hats. But best guess was that Senator Tom Stewart (Dem., Tenn.) and his colleagues (a special subcommittee of the Senate Small Business Committee) would be heard from again.

Buttonholing Senator Stewart, building men had found him a ready listener, willing to help building air its reconversion gripes—and building still had some. While the major victory had been won, price controls of materials and services remained. Many manufacturers called OPA price ceilings the biggest single threat to a quick pick-up of materials and equipment production. Many said their products were stalled under a profitless price ceiling.

OPA, on the other hand, bent every effort to hold the line on materials prices. Its dollar-and-cent repricing plan (FORUM, Sept., '45), which transferred price setting powers to local offices, brought howls of protest from both producers and distributors. But OPA, predicting that market competition would boost both materials and house price to dangerous levels, showed no sign of backing down. Said Bowles: "If we had the power, we would set ceiling prices on completed houses." While Bowles said he would ask Congress to give OPA such power, almost nobobdy thought he would get it.

Point one in Snyder's building reconversion program was "inter-agency action to increase the supply of scarce building materials." He promised: "If necessary, price and wage increases and priorities to break bottlenecks will be granted." But he also said: "OPA will strengthen price control of materials to counteract inflationary pressure." Worried by what sounded a little like double-talk, building men urged Senator Stewart to give the OPA building price program the full benefit of a Senatorial going over. At last reports, Senator Stewart was willing.



STEWART: helpful

CREDIT FOR REPAIRS

One sign that Building was getting top clearance on all Washington fronts came last month from the Federal Reserve Board. Moving to relax its wartime grip on a beloved American custom — so many dollars down and so many dollars a week—the Board promised that restrictions on installment credit for purchase of building and home repair materials will be the first to go. Washington reconversion chiefs agree that it is high time to get a start on sprucing up the nation's war-neglected homes. But the rest of Regulation W, which has held down consumer credit as an anti-inflationary measure, will stick until reconversion is well underway. It may be a long time before customers can buy refrigerators and washing machines under prewar installment plans. Meanwhile, they may get a lot of help from the packaged mortgage (see page 10).

MORE BUILDING AIDS

The President himself last month took a hand in charting housebuilding's future. Underlining the National Housing Agency's estimate of need—1,250,000 houses a year over the next decade—the President made it clear that he expects Congress to get busy on the ways and means to help. There was no doubt that the Wagner-Ellender bill (FORUM, Sept. '45), on which hearings will start early this month, will get firm Presidential backing. There was also no doubt that the bill's broad proposals for many kinds of housebuilding aids will be vastly modified before it is presented for a vote.

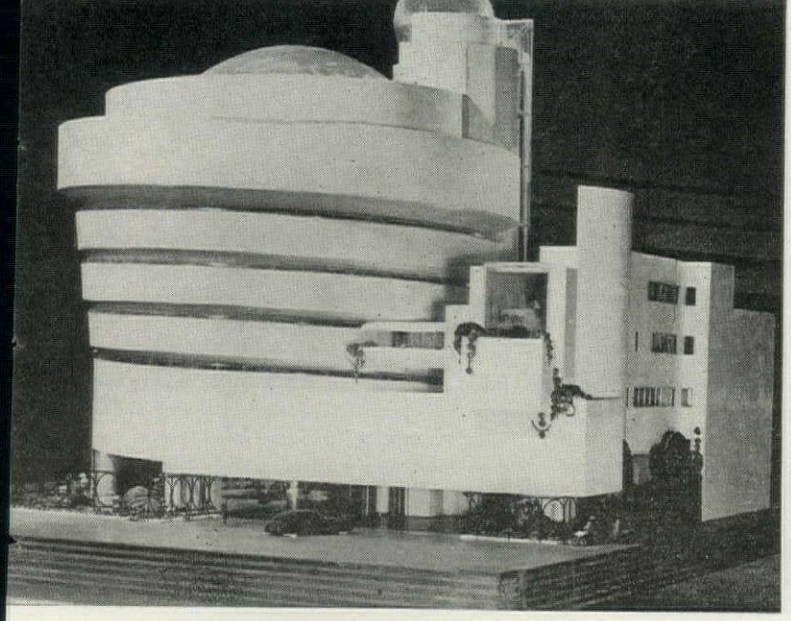
Almost every building group was hard at work on an alternative bill—most of them aimed to kill off the $100 million yearly appropriations for public housing. But best guess is that public housing will stick, while aids to private building enterprise will be greatly amplified. Last month Federal Housing Administration officials sat down to talk over with big life insurance lenders some of the proposals sure to come up. Among them: insurance coverage for 95 per cent mortgages under Title II; insurance for big rental developments up to $10 million (the present ceiling is $5 million); Title I insurance for mortgages on minimum houses costing up to $1,500. (In recent years, Title I insurance has been limited to remodeling loans).

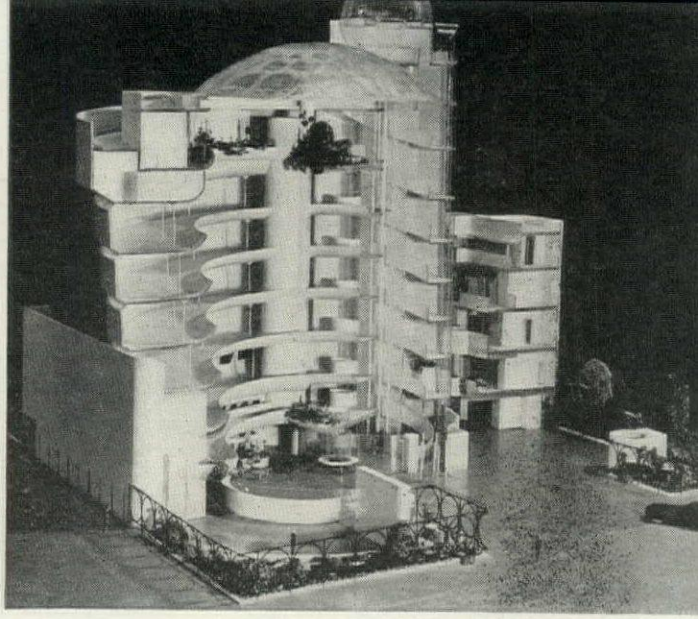
MURRAY PROBE

Among those not convinced that Building's reconversion road is now clear of bumps was Senator James E. Murray (Dem., Mont). Senator Murray and his special small business committee have been taking a measure of the immediate and long-range building bumps they see ahead (FORUM, June, '45).

In the first place, Senator Murray said, "the Office of War Mobilization and Reconversion has not yet established any comprehensive policy to facilitate resumption of building product manufacture." The committee fears that "many essential items will not be available in quantity for some time," thinks that reconversion chiefs should get busy on the matter of "rapid refilling of supply pipe lines." Labor shortage also looms. "Returning veterans and war workers will not necessarily provide the balance of construction skills needed in different localities.

(Continued on page 10)





MONOLITHIC MASTERPIECE

Unwrapping his models, Frank Lloyd Wright gave Manhattan a grudging* glimpse of its promised Guggenheim Gallery, the million-dollar structure that will provide a Fifth Avenue home for Solomon Guggenheim's famous collection of non-objective paintings (FORUM, Aug. '45). To the gaping press, Wright said sharply: "Don't call it 'bizarre'! Is a flower bizarre?"

The press and public might well be at a loss for words to describe the monolithic structure whose unbroken floor surface will stretch in a continous spiral from subterranean theater to glass-bubble roof. For the first time in building, floor slabs will be discarded. There will be a single "grand, slow wide ramp" widening as it rises for about seven stories, around which paintings will be shown. "Why stack up buildings? Why not pull them out—like a spring?"

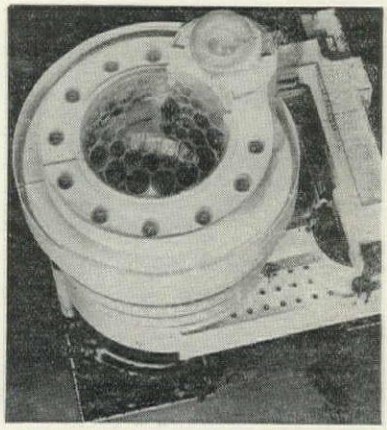
Daylight will reach all parts of the spiral through continuous ribbons of glass. "Why keep on building costly windows and doors? Why not smooth plastic surfaces?"

Ramp ceiling will be 10 ft. at the bottom, 12 ft. at the top. "Modern architecture relates buildings to human beings."

The gallery will be virtually indestructible. "If it were pulled from the ground and tossed away, the whole building would bounce intact."

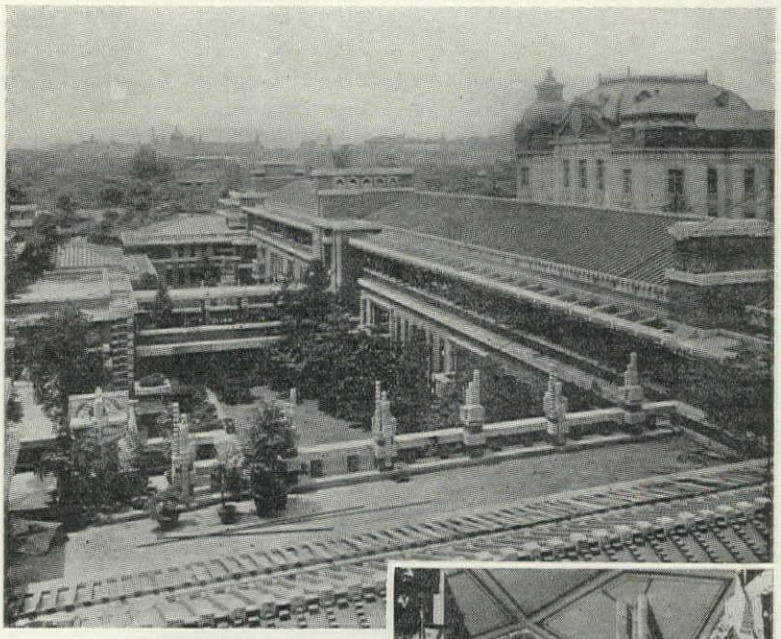
From the master who designed Tokyo's Imperial Hotel, this was no idle boast. Last month word came that Wright's earlier masterpiece, which stood through two earthquakes, had survived the bombings, too. Although some 300 incendiaries burned out the south wing and tore the roof off the Peacock Hall, the main body of the vast H-shaped, mud-floated structure is intact.

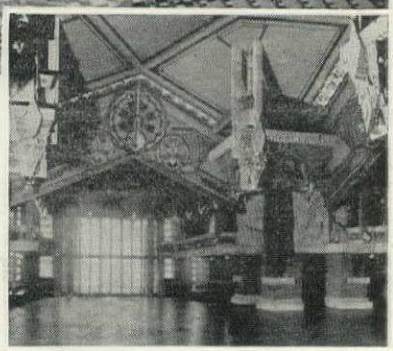
* "I must say I begrudge New York this great gift —which would fit so well in the great Middle West. But, where life is most in need of inspiration and culture is where this new impetus should be found."



GUGGENHEIM GALLERY is planned as spiral ramp, rising imperceptibly, 24 ft. wider at top than at bottom. Fast ramps are in tower at side of grand ramp, with elevators at tower center. Structure will be reinforced concrete, faced with polished marble aggregate. A floor-heated, air-conditioned vault, the gallery will display pictures on prepared bases that are part of wall. Glass dome will reflect light, need no sun-shade. Automobiles can drive through building. Wheelchairs will carry viewers along ramp.

Museum of Modern Art





IMPERIAL HOTEL is open for business, although wings show 165 gutted bedrooms, buckling floors, blistered ceilings. Outer walls, leaning against cantilevered floors, are unshaken. Red lilies still bloom in immense pool, built as fire-guard.

NEWS

(Continued from page 8)

Unions face problems of changing their work rules and of increasing apprenticeship training to add to the ranks of skilled craftsmen."

Looking farther, the committee pointed to old building headaches in a new and decisive manner that hinted the Senators may try to apply some remedies of their own. Among the items ticked off:

Uniform Credit Policy. "Construction is subject to credit policies determined by public and private agencies which largely operate independently of one another. As long as the flow of money into construction is irregular and uncertain or too costly, less construction will be done than could be done. It is, therefore, vital to determine what steps can be taken by the federal government to coordinate the policies of credit organizations."

Trade Practices. "There is undeniably a vast maze of local restrictive practices which have been built up by manufacturers, distributors, contractors, labor, and legislative interpretations. Once free of these shackles, the construction industry could produce more for less . . ."

BUILDING MONEY

STRETCHING CONSUMER DOLLARS

In the busy year of 1943, three-fourths of all U. S. families still had incomes of $3,000-or-less a year. While the U. S. hoped for a continuing level of high employment, building men remembered that the biggest part of their market still lies within the $3,000-or-less income group.

Whether or not one million houses are built every year for the next decade depends in part on how far moderate-income groups can stretch their buying dollars. Housebuilding must compete for its market with automobiles, equipment, furniture, many kinds of consumer goods. Nor can housebuilding optimistically rely on the much-touted backlog of wartime savings. For the bulk of U. S. families, this has been much less than many had believed. Families with less than $3,000 yearly incomes have accumulated only 7 per cent of all wartime savings.

New Mortgage. With competition stiffening, mortgage interests are moving to merchandise building money. One important new trend that will go far to stretch consumer dollars is the packaged mortgage, designed to hand the home buyer a completely equipped house.

Suppose John Doe buys a new house for $4,600, puts $500 down and pays the balance under an FHA-insured 25-year monthly payment plan. His payments would amount to $35. If a range, refrigerator and washer (1940 retail price —$455) were installed in his house and financed under his mortgage, John Doe would add $55 to his down payment and only $2.38 to his monthy payment, bringing it up to $37.38.

If John Doe bought the same equipment under the most favorable installment credit terms (10 per cent down and $15.80 every month for 30 months, which includes a finance charge of $64), his total monthly payment would amount to $50.80. For John Doe, a packaged mortgage would mean a $13.42 saving every month during his first three years of home ownership—or $400 extra to spend on other goods.

Changing Rules. While many lenders have for years financed easily removable

FHA-INSURED MORTGAGES IN MANY CITIES PROVIDE FOR COMPLETELY EQUIPPED HOUSE

Where state law and local practice permit and where mortgagor and mortgagee agree to consider items as real estate, the Federal Housing Administration will consider these important appliances in its valuation: Room cooler (installed), electric dishwasher, food locker for home freezing, electric garbage disposal unit, laundering equipment (electric, for sequence operation), range (free-standing, with rigid connection), refrigerator (free-standing, with plug-in connection).

The following list, taken from a schedule prepared by FHA at the FORUM's request, shows how many of these home appliances are being approved for mortgage insurance by representative state and district FHA offices. The FORUM will send a complete schedule upon request.

	ROOM COOLER	DISHWASHER	FREEZER	GARBAGE DISPOSER	LAUN. EQUIP.	REFRIG.	RANGE
BIRMINGHAM	√	√	√	√	√	√	√
CHICAGO	√	√	√	√	√	√	√
CLEVELAND	√	√	√	√	√	×	×
DETROIT		√		√		√	√
HOUSTON		√	√	√	√	√	√
LOS ANGELES		√	√	√	√	×	×
NEW YORK		√	√	√	√	√	√
PHILADELPHIA		√			√	×	×
ST. LOUIS		√	√	√	√	√	√
SALTLAKECITY	√	√	√	√	√	√	√
SEATTLE		√			√	√	√
WASH., D. C.		√		√		√	√

√=covered by mortgage. ×=covered by mortgage on rental units only.

equipment items as part of the real estate mortgage, state laws and local practices vary widely. In the past, state laws setting up mortgage criteria have emphasized that included items must be securely fixed to the property. But new laws, current lending practices and legislative interpretations are putting emphasis on the agreement between borrower and lender to consider an appliance real estate and are disregarding the hard-to-measure criterion of degree of affixation.

Nationwide Acceptance. The pace-setting National Life Insurance Co., which operates in 48 states, has already done much to push the packaged mortgage (FORUM, May '45). This big lender offers blanket inclusion of all major equipment items under the mortgage in every state, asks only for a clear-cut agreement or "expression of intention."

FHA Survey. How far the packaged mortgage has moved up in lending practices was evident in a survey which the Federal Housing Administration made last month among its state and district offices (see page opposite). In approving mortgages for insurance, FHA underwriters are guided by local lending practices. In cities where lenders have stepped ahead, the survey shows that FHA offices are considering many types of equipment as real estate. But there are many variations between cities—sometimes within the same state. For example, Jacksonville, Fla. will consider a free-standing refrigerator or range as real estate but Miami will not. San Francisco will call a free-standing refrigerator or range real estate, but Los Angeles will include them only if the mortgage covers rental units. Buffalo will include an air cooler, but New York City will not. Nor was there much logic in local practices. For example, it is customary in some cities to call a dishwasher real estate, but a washer—even if permanently installed — may not be included.

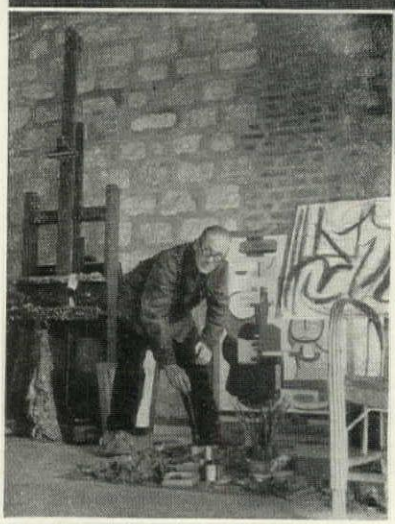
While FHA-insured mortgage do not account for all new mortgage business, they are a reliable trend index. The survey showed that in a sizeable number of cities, the packaged mortgage is already an operating reality.

TROUBLE AHEAD?

Here and there as lay-offs swept the U. S., FHA-insured war housing headed for trouble. In Baltimore, where unemployment came quickly to aircraft and shipyard workers, managers of privately-built war rental developments reported vacancies ranging from 15 to 40 per cent. Some families still employed are seeking cheaper quarters because of reduced pay, while others, doubled-up during the war, want more room. The manager of one big project planned to

(Continued on page 12)

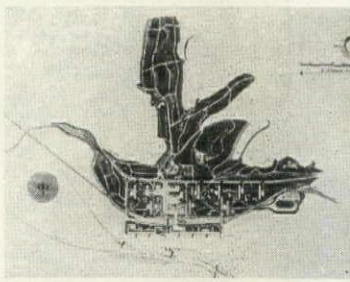
VIEWING opening (above) were: Reginald T. Townsend, French Institute; Henri Seyrig, French Embassy; D. S. Defenbacher, Walker Art Center; Stamo Papadaki, show's designer.



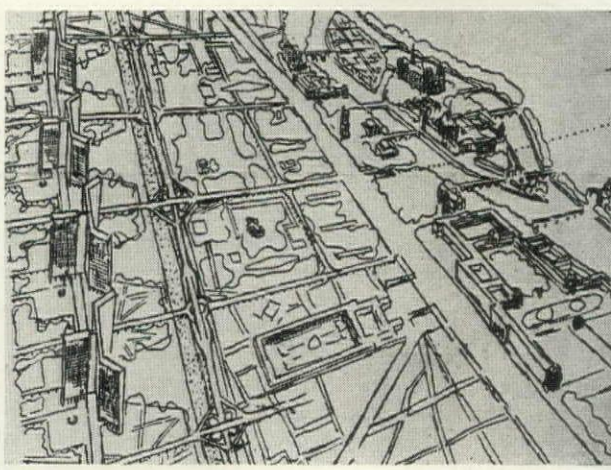
LE CORBUSIER and recent tempera.

LE CORBUSIER SHOW

Manhattan devotees revelled last month in the first comprehensive exhibit of LeCorbusier's work, which went on show in Rockefeller Center. Assembled by Minneapolis' enterprising Walker Art Center, the exhibit will go on tour as a timely introduction to the work of Europe's greatest contemporary architect, who is also a distinguished painter and writer. LeCorbusier himself is scheduled to arrive in the U. S. early next month. Apppointed to the Supreme Council of City Planning, he will have a major part in French reconstruction.



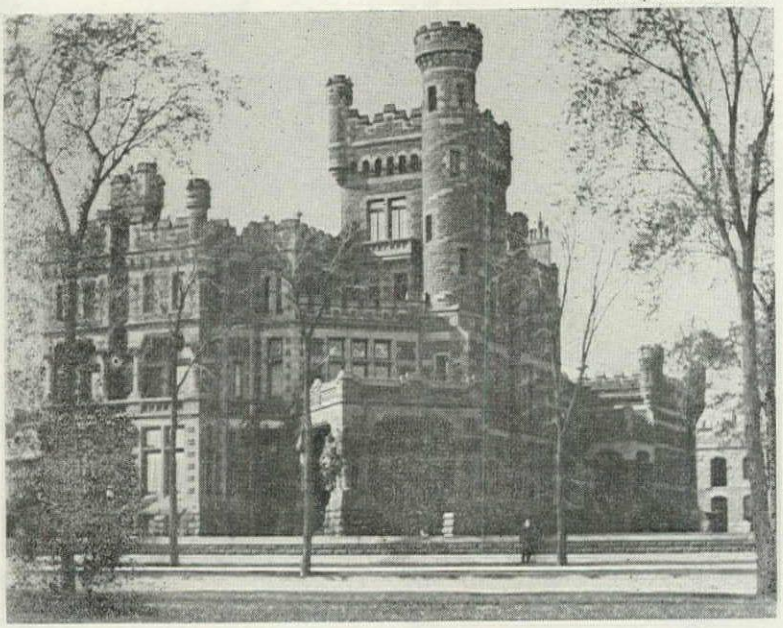
ST. DIE reconstruction plan has official approval. Rebuilding of devastated city (below) will soon begin.



RECENT SKETCH and early model for rebuilding Paris show that architect's theories are unchanged.

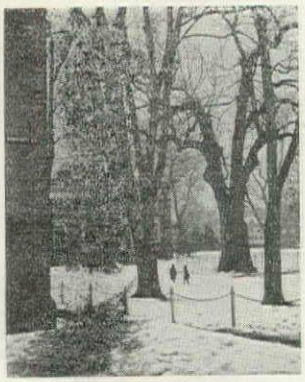
NEWS

Metropolitan Museum



LANDMARKS TO GO?

Promised new building threatened two U. S. landmarks last month. Few mourned the rococco Potter Palmer mansion, one of the few big residences which have held out against new development on Chicago's Lake Shore Drive. Purchased by two top Manhattan apartment owners—Bing & Bing and General Realty Corp.—the Palmer property may at last give way to luxury apartments.



Many protested the U. S. Navy's plans to take over St. John's campus (left) for enlarging Annapolis. The American Institute of Architects offered to show the Navy how to get more room without disturbing St. John's, while the Senate Naval Committee promised irate alumni to investigate.

(Continued from page 11)

convert three-room units to four-room units, thinks two-bedroom apartments will fare better in the rental market.

In Detroit the Federal Housing Administration launched an investigation of 1,183 FHA-insured war houses, built in the Wayne-Willow Run areas. While the *Detroit Free Press* headlined owners' charges of construction fraud, Roland McGroarty, home owner in the Avondale development and a onetime prosecutor's investigator, busily organized a property improvement association (membership fee—$5). While several hundred property owners planned to stop mortgage payments, McGroarty charged:

"The builders used water-logged lumber, cheap labor and cheap materials. Lumber joists cracked and warped so that in some cases it was necessary to cut floor supports in order to enable doors to close. Nails have popped out all over the building, cement blocks have cracked and basements are being flooded with rain water."

The frame houses sold at prices ranging from $4,200 to $5,800. Some 311 of them are now vacant. At mid-month national FHA inspectors joined local FHA men in sifting complaints while a hearing began under SEC auspices on whether licenses of builders and real estate men involved should be renewed.

LABOR

TITLE EXAMINERS STRIKE

Cleveland building and real estate trading came to a dead stop last month as a title examiners' strike swung into its fourth week without a promise of mediation. Shut down by the militant examiners are the two biggest title companies—the Land Title Guarantee and Trust and the Cuyahoga Abstract Title and Trust—which together handle 80 per cent of the city's business.

Until the several hundred organized employes return to their desks practically no title transfers can be made. New housebuilding halted, and hundreds of real estate transactions faced default. With escrowed funds frozen, tax payments were being delayed and penalties levied. With an estimated $20 million worth of business paralyzed by the controversy, the Cleveland Real Estate Board, the Mortgage Bankers Association and the Home Builders Association united in a plea to both sides for an "immediate settlement or standby agreement." So far the U. S. Conciliation Service, at work or the strike, had made little headway.

Biggest bone of contention are women employes, represented at one company by the Independent Title Workers Union and at the other by an AFofL Federal Labor Union. Present salaries for women at both companies range from $26 to $39 weekly, with the $39 roof going to women employed for as long as 20 years. Both unions ask a $6 weekly raise, while both companies have refused the raise.

Also on strike are 100 men employes, represented by the AFofL Title Examiners Union. Much better paid than the women (salaries range from $350 to $600 monthly), the men have withdrawn their demand for a $5 weekly raise. Willing to go back to work, the men hesitated at the thought of crossing a female picket line.

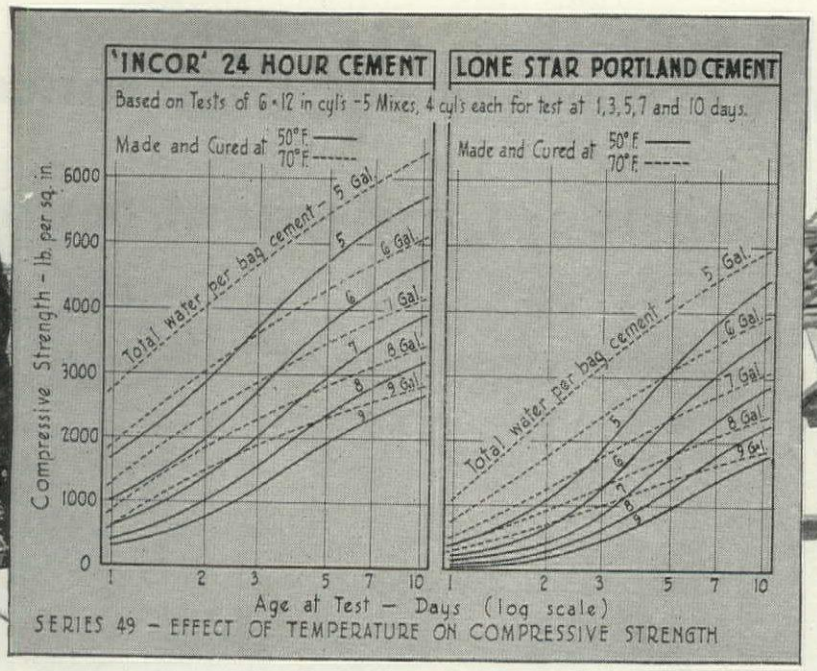
OVERSEAS

PREFABS CANCELLED

Some old-line U. S. prefabers hinted that the British murmured, "Don't think they haven't been charming — because they haven't." But the Federal Public Housing Authority cheerily insisted that British buyers had been perfectly happy with the 10,000 prefab houses so far shipped them by the U. S. Whatever the British thought about the prefabs, on which many an established U. S. producer had refused to bid, cancellation of the balance of their total order for 27,000 units promptly followed the end of lend-lease.

Hotly debated since they left FPHA design boards (FORUM, April, June, '45), the prefabs went into production last March, were rushed overseas to shelter bombed-out British workers. U. S. builders jealously eyed their oak floors and bathtubs, while disdainful producers predicted that their flimsy

(Continued on page 16)



'INCOR' KEEPS FALL JOBS ON SCHEDULE

FASTER CURING PREVENTS DELAYS, REDUCES RISK OF SUDDEN FREEZE

THIS is the in-between season, before the contractor has his tarps and salamanders on the job. Fall nights turn cold suddenly . . . temperatures often average around 50 degrees . . . concrete hardens slower and is exposed to freezing risk. Another reason for specifying 'Incor' 24-Hour Cement.

Without protection, at 50 degrees, 'Incor' concrete attains stripping strength, is safe from sudden freeze, 2 or 3 days sooner. By specifying 'Incor'*, you get better concrete, keep Fall jobs on schedule, avoid freezing risk—and give the owner earlier occupancy. Write to us at 342 Madison Avenue, New York 17, N. Y., for "Winter Concreting Book."

*Reg. U.S. Pat. Off.

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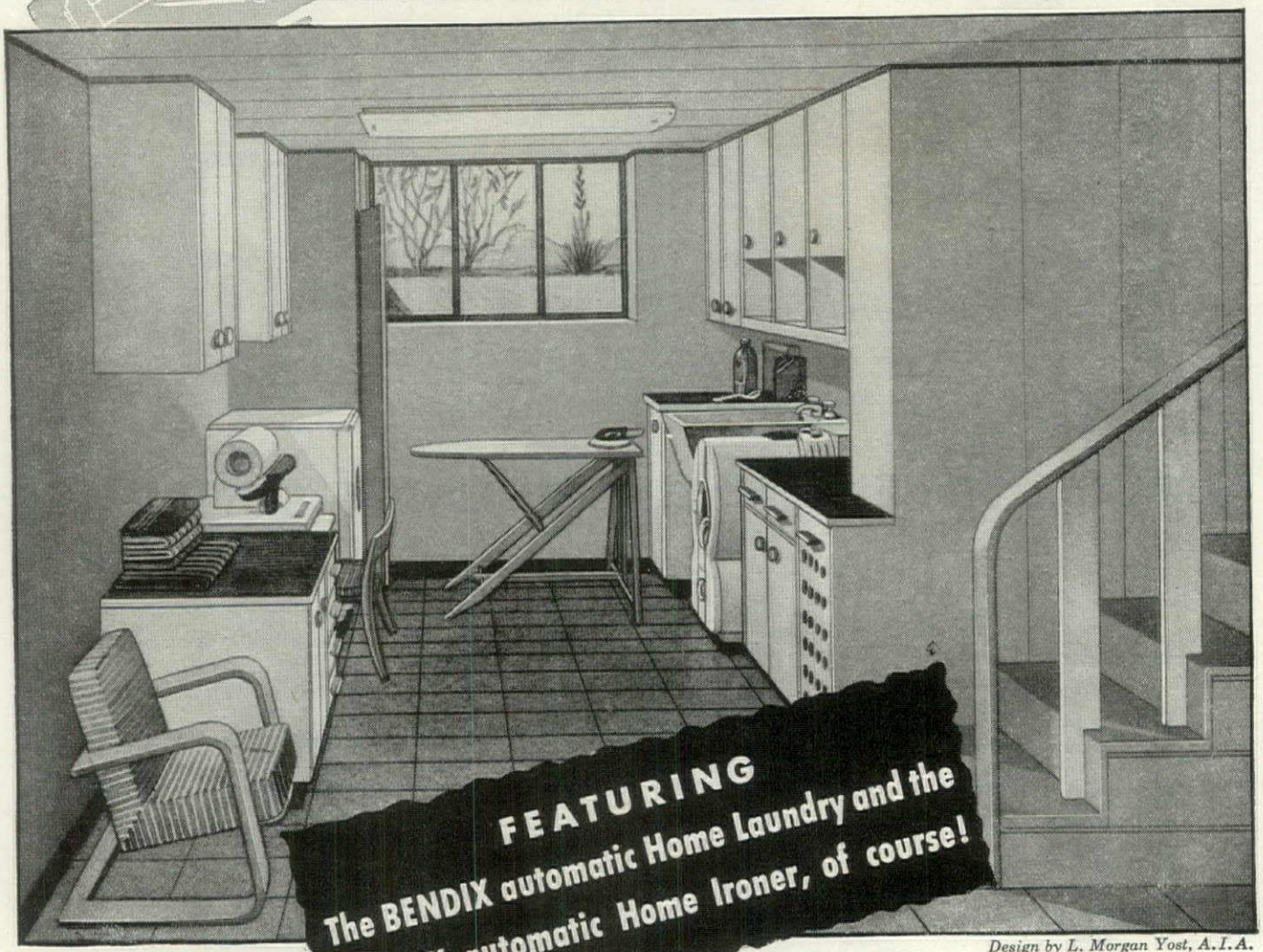
L. Morgan Yost's conception of an ideal basement laundry . . .



Design by L. Morgan Yost, A.I.A.

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These new appliances make a perfect team. The Bendix automatic Home Laundry takes but 4 square feet of floor space —washes, rinses, damp-dries, cleans itself, empties and shuts itself off, all *automatically!* No wringing, no mess, no bother.

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The advantages of these Bendix home appliances are vitally important to you who plan America's new homes. Consult your Bendix Distributor. Or write us direct if you prefer.

BENDIX automatic Home Laundry

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A new convenience home owners appreciate

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ALL-ALUMINUM ALL-WEATHER WINDOW

Makes it possible to change screens and storm panes *IN SECONDS*

The 'Orange' All-Aluminum All-Weather Window consists of interchangeable summer screens and winter storm panes that fit a permanently installed, weathertight frame.

In the fall, homeowners just lift out the featherlight aluminum screens and slip in winter storm panes. In the spring, this procedure is reversed. It is simple, easy, and takes only seconds. All changes are made safely from inside the house.

Many new features

Made entirely of ALUMINUM, this supplementary window is non-rusting, non-rotting, non-warping, non-staining. And it doesn't have to be painted! Its narrow, extruded frames in satin-finish aluminum blend with any style architecture or exterior finish. It is precision made, engineered for trouble-free operation, and styled for long-lasting beauty.

The window is available in a complete range of stock sizes. An adapter allows for variations in the size of window openings. Write today for literature that describes the 'Orange' All-Aluminum All-Weather Window in detail, and explains its many additional features.

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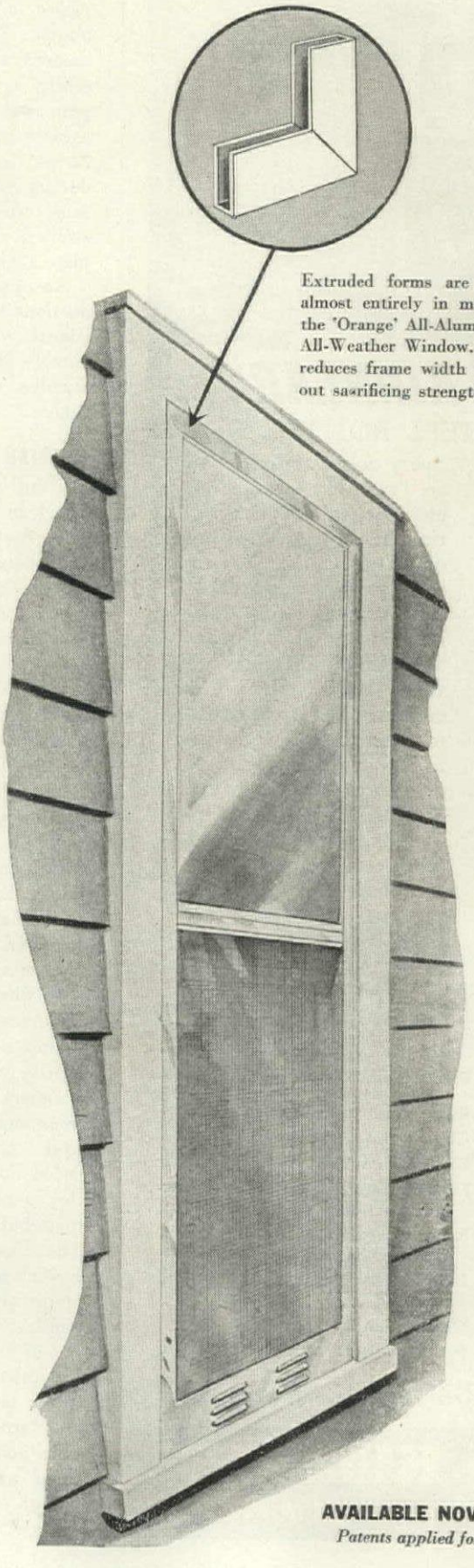
Aluminum screens made to architectural specifications
Aluminum train, boat and airplane windows



Extruded forms are used almost entirely in making the 'Orange' All-Aluminum All-Weather Window. This reduces frame width without sacrificing strength.

AVAILABLE NOV. 1
Patents applied for.

(Continued from page 12)

walls and poor construction would give U. S. prefab a permanent black-eye abroad.

Looking anxiously for favorable reaction, FPHA finally found some weak praise in the *Kent Messenger*, proudly quoted: "Theirs is rather a charming modern simplicity." The British generally agreed that the compact floor plan was excellent. But, stacked up against the steel and aluminum temporaries the British themselves are producing, the cheap ($1,700) U. S. prefabs, whose wallboard-type sheathing swelled and warped in the damp climate, took no honors.

An uncounted number of houses were on their way to ports and in process at plants when the British cancellation came. These will go into the pile of surplus war housing now looking for takers.

BRITISH REPORT

Private building enterprise and public effort in Great Britain have joined in an effective working partnership to meet housing need, according to the National Committee on Housing mission, which took a four-week long look at the current housebuilding scene from bomb-wracked London to rural Shropshire and house-poor Glasgow. Invited by the British Ministry of Health, the mission included Committee chairman Mrs. Samuel I. Rosenman, Webster B. Todd, head of Todd & Brown, construction engineers and a director of the Metropolitan Life Insurance Co., H. Adams Ashforth, head of the real estate firm of Albert B. Ashforth & Co. and a director of the Bank of New York, and Henry M. Propper, the Committee's executive vice chairman.

Nowhere did the mission find antagonism to the government's part in Britain's urgent rehousing program. British builders are not afraid of government competition. "There was unanimous agreement," the mission said, "that the private building industry could not service all income groups in the population and that government must build for the lowest income levels. The heads of the building societies (which make most of the mortage loans on privately built homes) expressed a similar view. In fact the chairman of one of the largest building societies said he welcomed the public housing program because in raising the housing standards of a family by making available good public housing the government was making a prospective purchaser for a private enterprise house."

Only flaw in the general amity:

U. S. VISITORS take a look at British building job: Webster Todd, Dorothy Rosenman, Adams Ashforth.

"Britain is still very class conscious . . . The result is that where plans are broached by the public agencies to provide for private enterprise and public housing in close proximity, the private builders can rarely be persuaded to undertake a project on such sites." Nor is there any feeling that private enterprise can have part in the big job of urban redevelopment. High land costs plus the disinclination of medium-income families to live in older city neighborhoods mean that these will have to be rebuilt with public funds as housing for low-income groups or as civic and cultural centers.

Almost nobody seemed very happy to be housed in the temporary units touted by Ministry of Works and private industry experimenters as a magic answer to urgent need. The new Labor Government, the Rosenman party believes, "views the temporary program with considerable disfavor and if at all feasible will move promptly to abandon it and concentrate all energies on permanent housing." In many permanent houses now underway the visitors found space allotted for the housewife's long-hoped-for "fridge" (much smaller than standard U. S. refrigerators) as well as an outlet for the washing machine to come.

MARKET

PRICES SOFTEN

The full-bloom market in older homes wilted last month. That much was clear from real estate dealers' discreet reports of "mild softening of prices" in a number of cities. Whether the reports were timed to revive the flagging market was anybody's guess.

Surveying real estate dealers in twelve

(Continued on page 20)

ARE YOUR FILES COMPLETE ON PLASTIC SURFACING MATERIALS?

IT IS widely believed that plastics will be used on a much greater scale in postwar building, but as to just when, where and how, ideas are often vague.

Formica knows. For 22 years this plastic decorative surfacing material has been made for architectural uses, and applied to hundreds of fine stores, shops, restaurants, public buildings, hotels, train, bus and air terminals by leading architects.

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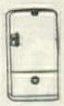
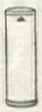
FOR HOMES AND APARTMENTS, OFFICES AND BUSINESS ESTABLISHMENTS


Household Refrigerators—in all sizes and models—including the famous Frigidaire Cold-Wall.


Electric Ranges—from small apartment models to full size deluxe cabinet models.


Fully-automatic Electric Water Heaters—in many capacities and models.


Home Freezers for freezing foods and storing frozen foods in the home.


Portable self-contained type Air Conditioners—for window installation.


Home Air Conditioners—complete in a single package.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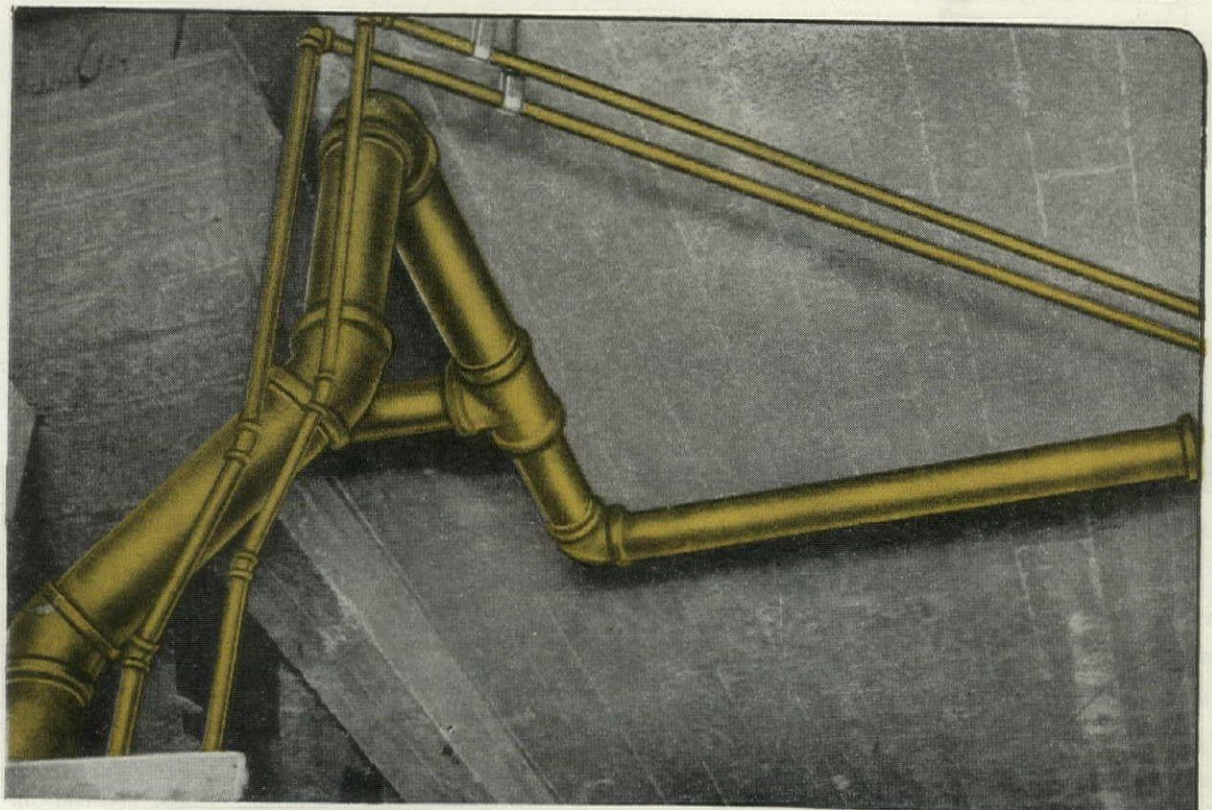

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DISTRIBUTORS IN PRINCIPAL CENTERS THROUGHOUT THE WORLD

MONTH IN BUILDING: NEWS

(Continued from page 16)

big cities, the *Wall Street Journal* offered some advice: "This may be the best time to buy a home, unless you're determined to wait for a new one." Dealers optimistically told the *Journal* that they do not expect the current price sag to last. In two months, they think, sales will be booming again and buyers may have to be content with what they can get. Said one San Francisco dealer: "When people go to a contractor and find a new home is going to cost them $7.50 a foot because of high labor costs, as compared with buying a home built several years ago for only $4 to $5 a foot, they're going to buy from us again."

Los Angeles dealers said that $50,000 to $150,000 homes in the "silk stocking" Wilshire district are still being eagerly sought, but there are few offers to sell. In adjoining neighborhoods, medium-bracket dwellings are dropping in asking price. Pittsburgh, Philadelphia and Detroit all reported the occurrence of the summer seasonal dip in home sales for the first time since the war.

Looking close, the sage *Washington Post* discerned a "disposition in some quarters to stress obstacles to revival of residential building activity for selfish reasons." Noting that the *Journal's* survey "creates the impression that the day when new homes can be bought is a long way off," the *Post* observes:

"Naturally such opinions have to be taken with many grains of salt, since real estate dealers with old houses on their hands can hardly be expected to spoil their market by heralding the advent of the new houses soon to come. Then, too, there is a disposition to delay executing new building plans in the hope that later on construction costs may decline. The answer to those favoring a waiting policy is that the sooner we accept the fact that postwar construction costs are going to be well above prewar levels and get along with planning, the greater the insurance against a postwar depression that would destroy hopes of a major revival of private construction activity."

EDUCATION

LIVING LABORATORY

Veteran students will get homes and architectural and engineering students will get a new kind of research laboratory in the 100-unit prefabricated housing project soon to spring up besides the Romanesque facades of Massachusetts Institute of Technology buildings. Setting aside ten idle acres of its riverside campus, M. I. T. will put up experimental homes where solar and radiant heating systems, air conditioning, insulation, and many new materials and techniques can be tested under family living conditions. Glass, plywood, all-steel houses and a number of prefab systems will be used. Cinder-block construction, application of chemicals for wood preservation, wider use of plastic materials, electronic controls are all listed for experimental observation.

As landlord to the many veteran students expected to take advantage of educational aid under the G. I. Bill of Rights, M. I. T. will earnestly solicit complaints, check tenant reaction against its research findings. Eventually

(Continued on page 24)

Fairchild Aerial Surveys, Inc.

VETERAN STUDENTS will rent 100 prefab houses planned for Site B on Massachusetts Institute of Technology campus. Site A may be later used for conventionally-built homes. Both will serve as experimental laboratories for achitectural and construction research.

Eljer's All-Purpose China Lavatory

Since it was introduced, the Savoy Junior has been fulfilling the exacting requirements which confront architects and builders in the construction of thousands of homes and commercial buildings.

The Savoy Junior has features which are usually found in only larger and more expensive fixtures, adapts itself ideally to single or multiple installations and is a high-quality lavatory at an economical price.

Check on all these "extras" which the Savoy Junior offers . . . Catalog No. B-3194-B.

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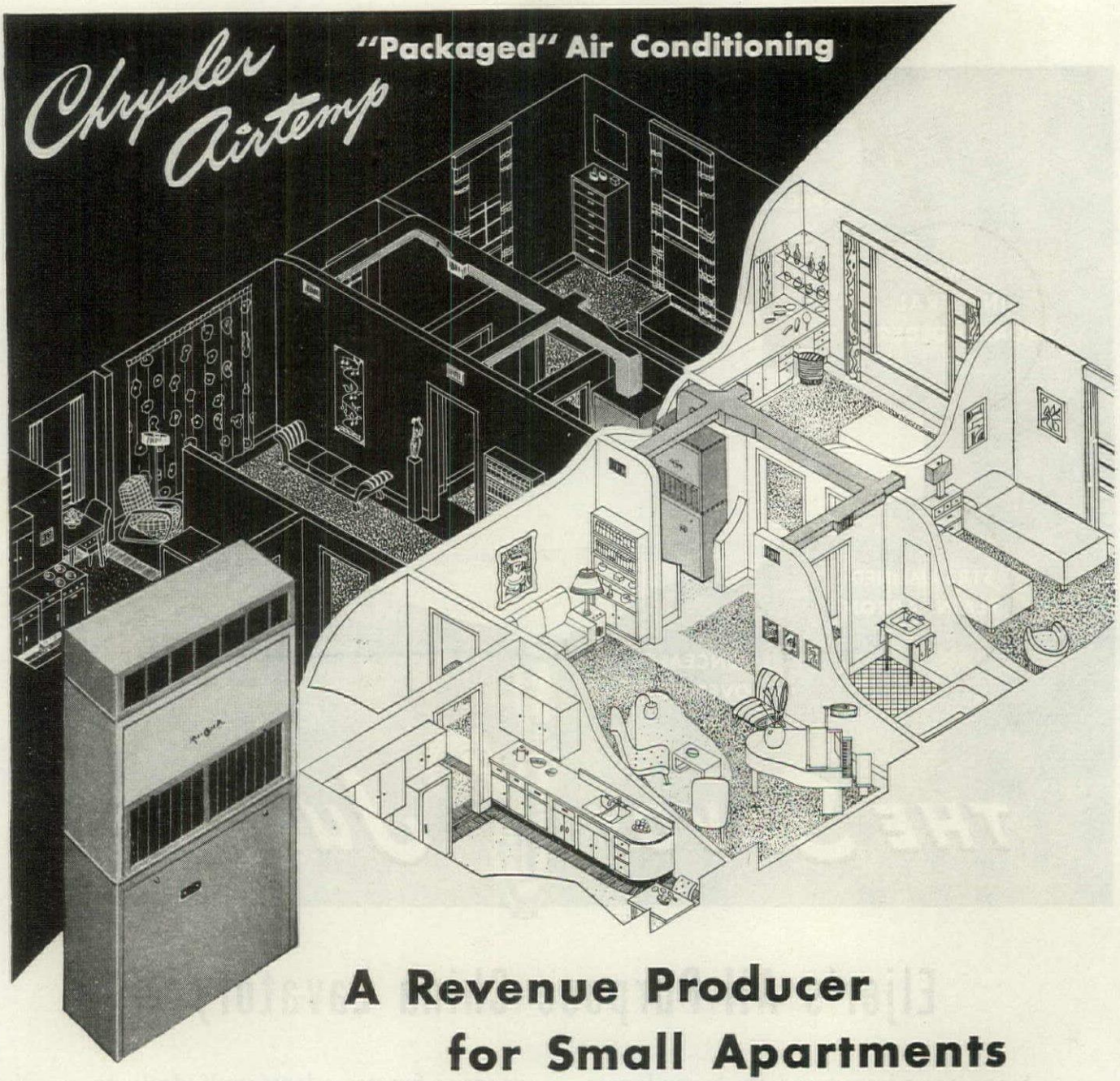

A Revenue Producer for Small Apartments

Air Conditioning can be installed in practically any apartment building to increase revenues; reduce dirt and outside noises; and provide cool indoor comfort. "Packaged" Air Conditioners, pioneered by Chrysler Airtemp. make it possible to install air conditioning step by step—one apartment at a time. These "Packaged" Air Conditioners supply clean, cool, properly de-humidified, and gently circulated air during the hot summer months. Steam coils may be added for winter heating to provide year round air conditioning. Unsightly radiators can then be removed. It will pay you and your client to investigate these dependable, trouble-free and time-tested Chrysler Airtemp "Packaged" Air Conditioners, with the hermetically sealed radial compressors. Flexible and easy to install, they can be used singly or in multiple—with or without a duct system. You can count on them for low upkeep and operating cost, too. • Airtemp Division of Chrysler Corporation, Dayton 1, Ohio. In Canada, Therm-O-Rite Products, Limited, Toronto, Ontario.

Invest in Your Future—Buy Victory Bonds—"Listen to the music of Andre Kostelanetz Thursdays, C.B.S., 9.00 p.m., E.S.T."

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HEATING • COOLING • REFRIGERATION

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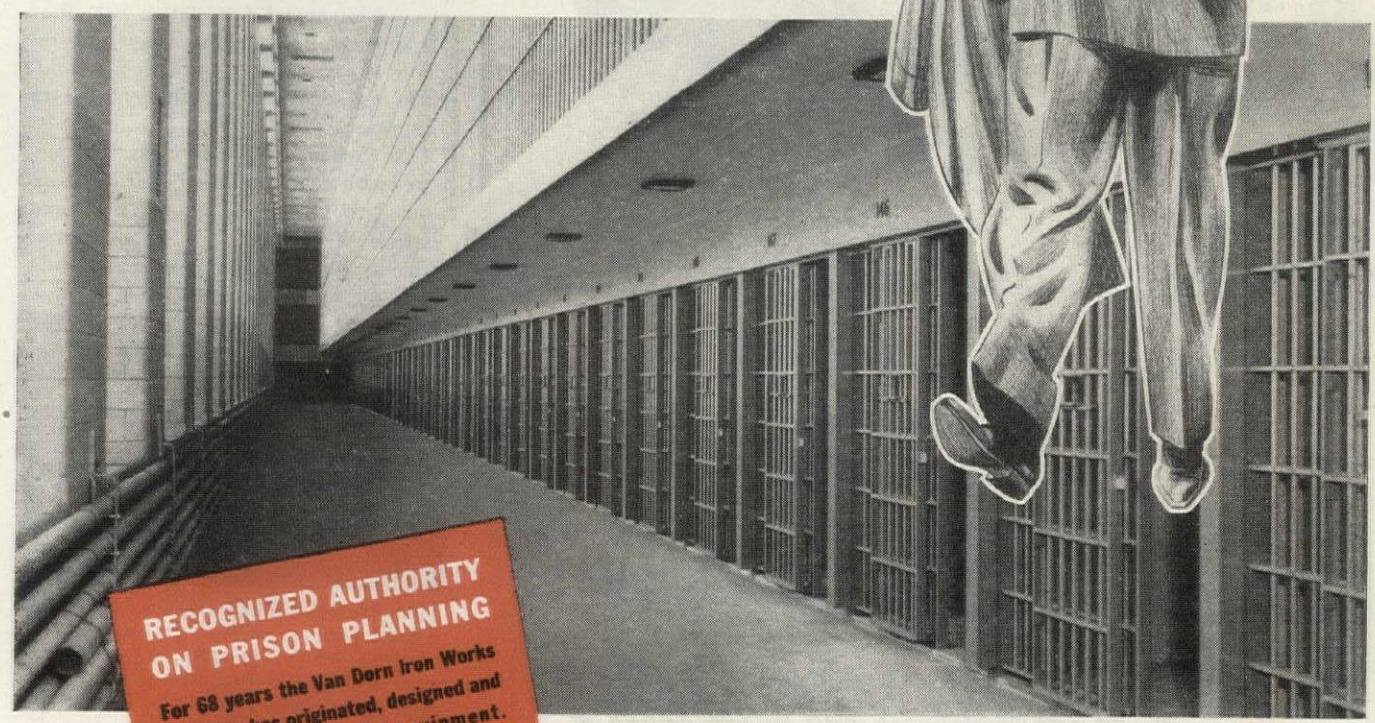


RECOGNIZED AUTHORITY ON PRISON PLANNING

For 68 years the Van Dorn Iron Works Company has originated, designed and built prison and jail equipment.

● On any kind of prison project . . . large or small . . . new construction or modernization . . . call in a Van Dorn engineer for consultation. Van Dorn engineers work with architects and builders in developing plans, and in the erection and equipping of modern, efficient prisons.

In its more than two generations of specialized experience in jail and prison construction, Van Dorn has helped plan and produce more prison projects than any other organization in America.

The Van Dorn organization can be depended upon for authoritative information and assistance in prison design and layout. Extensive manufacturing facilities and complete shop equipment, plus the most modern erection methods assure prison structures of maximum efficiency and safety.

Ask a Van Dorn prison expert to call at your convenience. He will bring you helpful, up-to-the-minute information and render every assistance possible.

THE VAN DORN IRON WORKS CO.

2685 EAST 79TH STREET • CLEVELAND 4, OHIO

(Continued from page 20)

the Institute plans to supplement its prefab laboratory with an additional development of several hundred permanent homes to rent to graduate students and instructors.

Educational research, said William Wilson Wurster, dean of the School of Architecture and Planning, must lead the way to better housebuilding.

LONDON REFRESHER

U. S. architects in uniform are getting a close-up look at how British designers are tackling reconstruction problems. This is part of the ten-week refresher course offered for U. S. servicemen by the Architectural Association School of Architecture in London. About 100 students are enrolled, all practicing architects or architectural students before the war.

The School combines classroom lectures with actual building operations intended to give each student first-hand experience in brickwork, carpentry, joinery, plumbing and other building trades. A nearby bombed-out site has been acquired for these building experiments, and representatives of the various building trades assist in linking building theory to building practice.

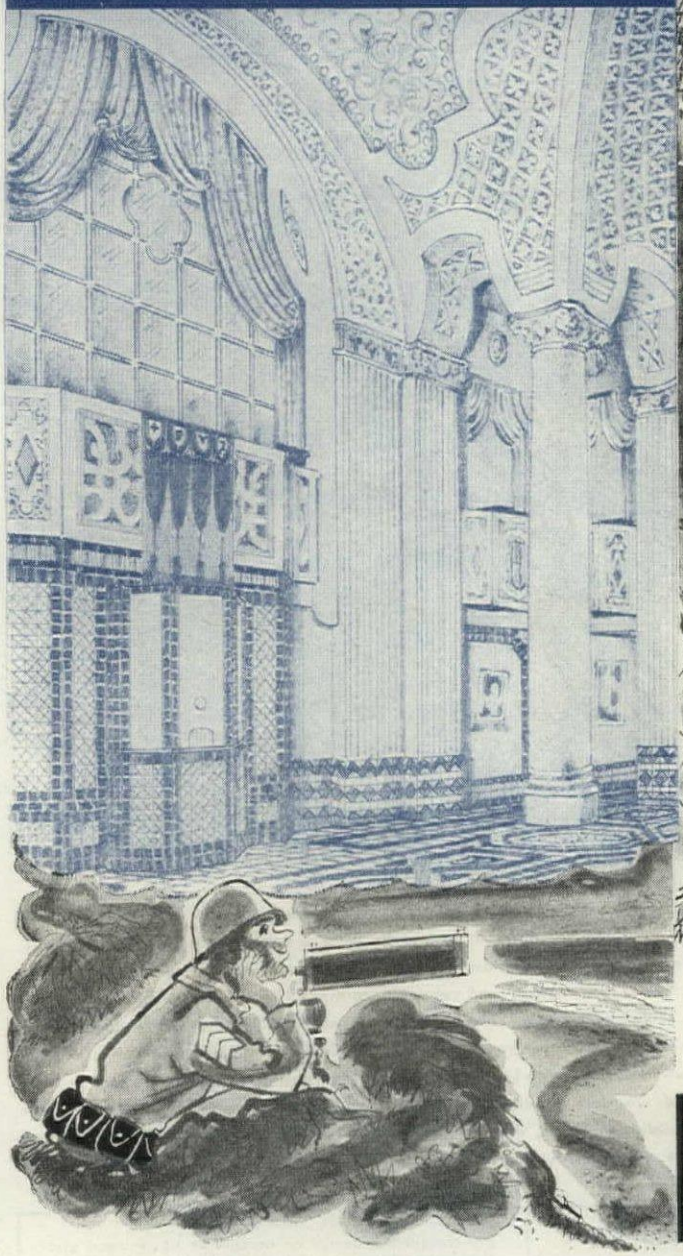
U. S. Army Signal Corps

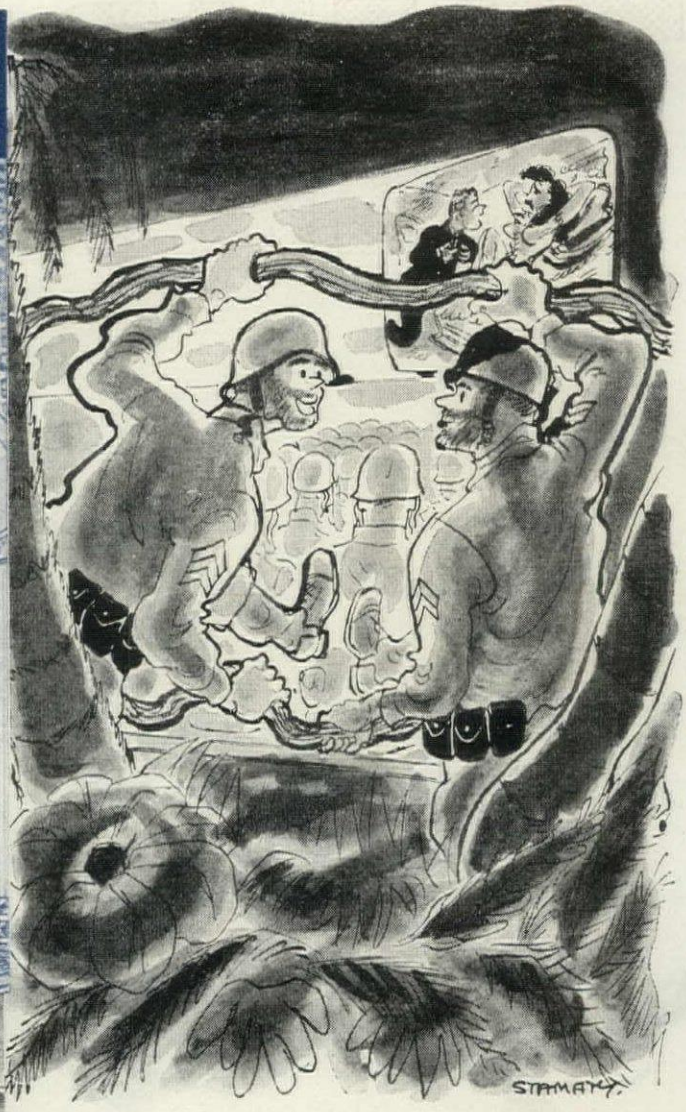
SOLDIER-ARCHITECTS brush up at London school. (Above) M/Sgt. Charles W. McClintock, Williamsport, Pa., discusses a resort project with Pfc. George W. Harju, New York. (Below) Cpl. Roderick E. Warren, Detroit, and instructor Cecil Stewart.

The School's principal, R. Gordon Brown, who served as a major in the First Allied Airborne Army, finds U. S. servicemen eager students. "The administrative staff" he said, "complain that the students arrive before the cleaning staff in the morning and that the

(Continued on page 28)

★ *What they dream about*





"That song—'Always'—reminds me of my Suntile theater lobby . . . it's good for life, too."

★ WHAT THEY SEE...

Theater-goers quickly shift their acclaim from current stars to new personalities. Day after day, year in and year out, new productions must be presented to attract audiences. But a distinctive Suntile lobby is one feature that always invites patrons.

The lifetime beauty of a Suntile theater lobby strikes a satisfying note of permanence in an ever-changing scene. Color-balanced Suntile lends itself readily to original design effects . . . sturdily withstands the ravages of time and use . . . retains its warmth and freshness always.

When the final curtain rings down, a Suntile lobby will still be as beautiful, as pleasingly practicable as it was on opening night. Specify Suntile in your plans now. We will soon be making it again.

Suntile
Bright with color-Right for life

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The Ideal Installation For Life-long Satisfaction

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★ THIS SERIES IS BASED ON AN IDEA SUGGESTED IN LETTERS WRITTEN BY CPL. LOUIS A. PERKOVIC OF THE ARMY ENGINEERS IN THE SOUTH PACIFIC. AN IDEA THAT RATES HIGH WITH MEN OVERSEAS IS TO HAVE FOLKS AT HOME WRITE THEM DAILY THE V-MAIL WAY SO START THE V-MAIL HABIT TODAY.

TREND

to decentralized living, a community life ::: and wood and glue construction

New thoughts on America's postwar living pattern are emerging. With them new building techniques are being born, too.

Instead of the vortex type cities, the trend is toward decentralized communities, each grouped around its own production center, with schools, recreation, marketing and service facilities . . . where lots of light, fresh air, elbow room, beauty and convenience make living more enjoyable.

This new freedom of living has expressed itself in new architectural design, notable for its generous use of Laucks Construction Glues and modern plywood bonded with Laucks waterproof plywood glues. Architects and builders did wonders proving those products and procedures on many wartime building projects, despite severe restrictions of materials, time, costs and the arbitrary location requirements.

Where are Laucks glues used in new community building?

In laminated arches and beams for: community halls, public buildings, theatres, super-markets, churches, hangars, garages, natatoriums, etc.

In plywood for: exterior and interior walls, for sheathing and subflooring, for decorative paneling, for fixtures, for all types of prefabrication, dry-built and stressed cover construction.

For complete information on the use of plywood and glue in construction, address "America's Glue Headquarters," where more than twenty years of experience in making better glues for plywood and building construction give us practical "know-how" that you can utilize for the asking.

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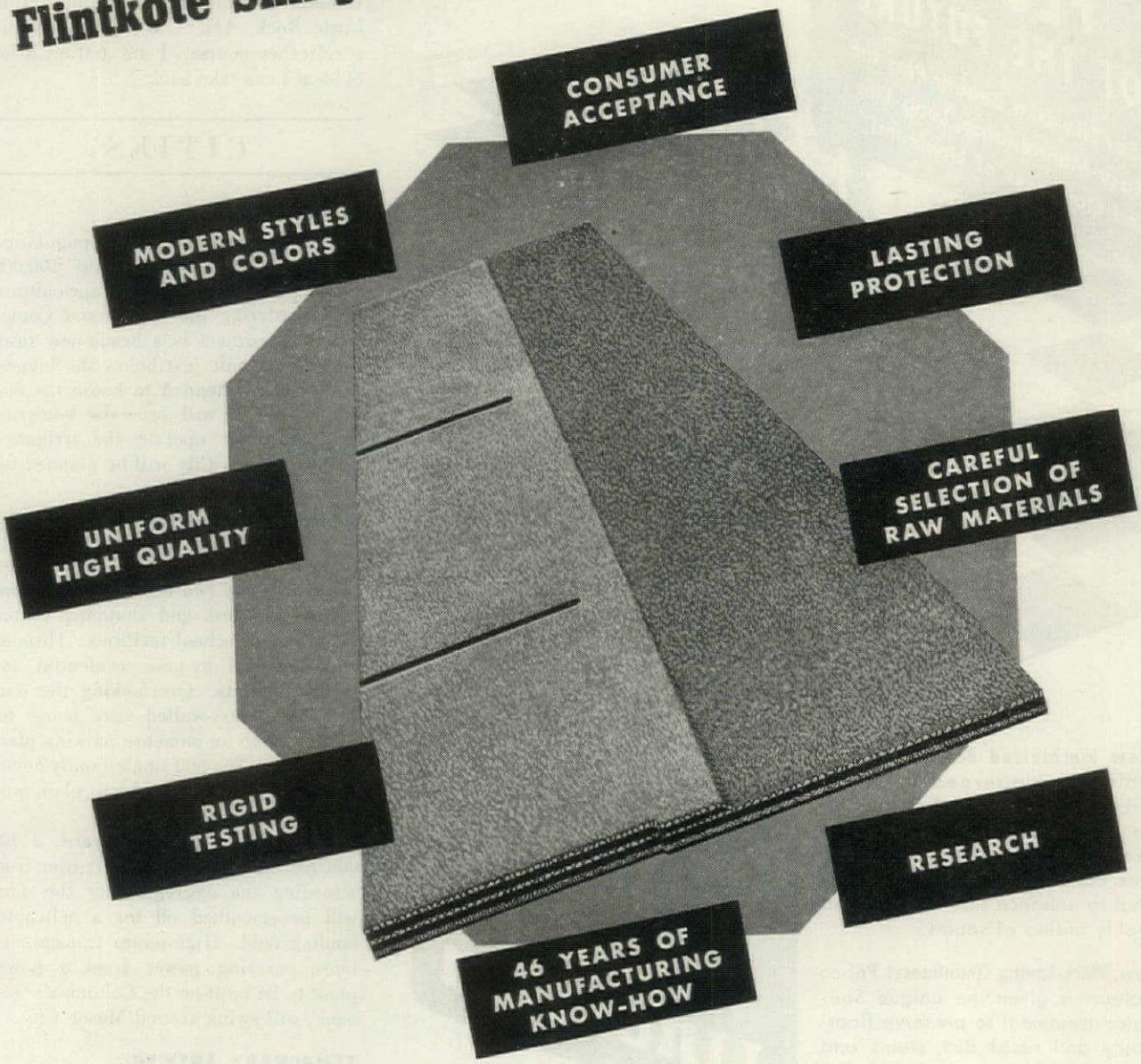

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(Continued from page 24)

only way to get them out at night is to turn the lights off at the main switch."

Said student Corporal Ken Cole, 26th Infantry Division and an architect from Little Rock, Ark.: "It's darn good as a refresher course. I am getting a lot of ideas I can take back."

CITIES

POWER TOWN

First major sign of a new population movement expected to bring 100,000 families into the reclaimed agricultural land bordering the vast Grand Coulee irrigation project is a brand-new town soon to be built just below the biggest U. S. dam. Intended to house the federal staff who will supervise construction and later operate the irrigation project, Mason City will be planned for a population of 3,000.

Bureau of Reclamation engineers are now making plans for an integrated community, where residential neighborhoods will rim two central plazas—one for the business and shopping center, the other for school facilities. Through highways will by-pass residential and school districts. Overlooking the dam will be a glass-walled vista house for tourists, with an immense parking plaza in the rear. The 600 single-family homes will be built from one basic plan, with exterior variation.

In the community backyard, a 10,000,000 cu. yd. sandpile, left over from screening the aggregate for the dam, will be smoothed off for a helicopter landing field. High-power transmission lines, carrying power from a power plant to be built on the Columbia's west bank, will swing around Mason City.

TEMPORARY ANSWER

Swollen New York could see no end to its housing troubles. Not even retiring Mayor Fiorello LaGuardia knew where he would find a roof to put over his head when he moves out of Gracie mansion. To harried Joseph Platzker, whose job is to hunt down vacancies for homeless New Yorkers, the month brought a new worry. Workers who left for Oregon and California war plants want to come back to Manhattan, sent over 100 applications for apartments. Troop-laden ships daily added veterans to the line-up of housing hopefuls. Even if shovels turned tomorrow on new building, it was easy to see that New York's housing pinch would not ease for many months to come.

It was time, the conscientious Citizens

(Continued on page 32)

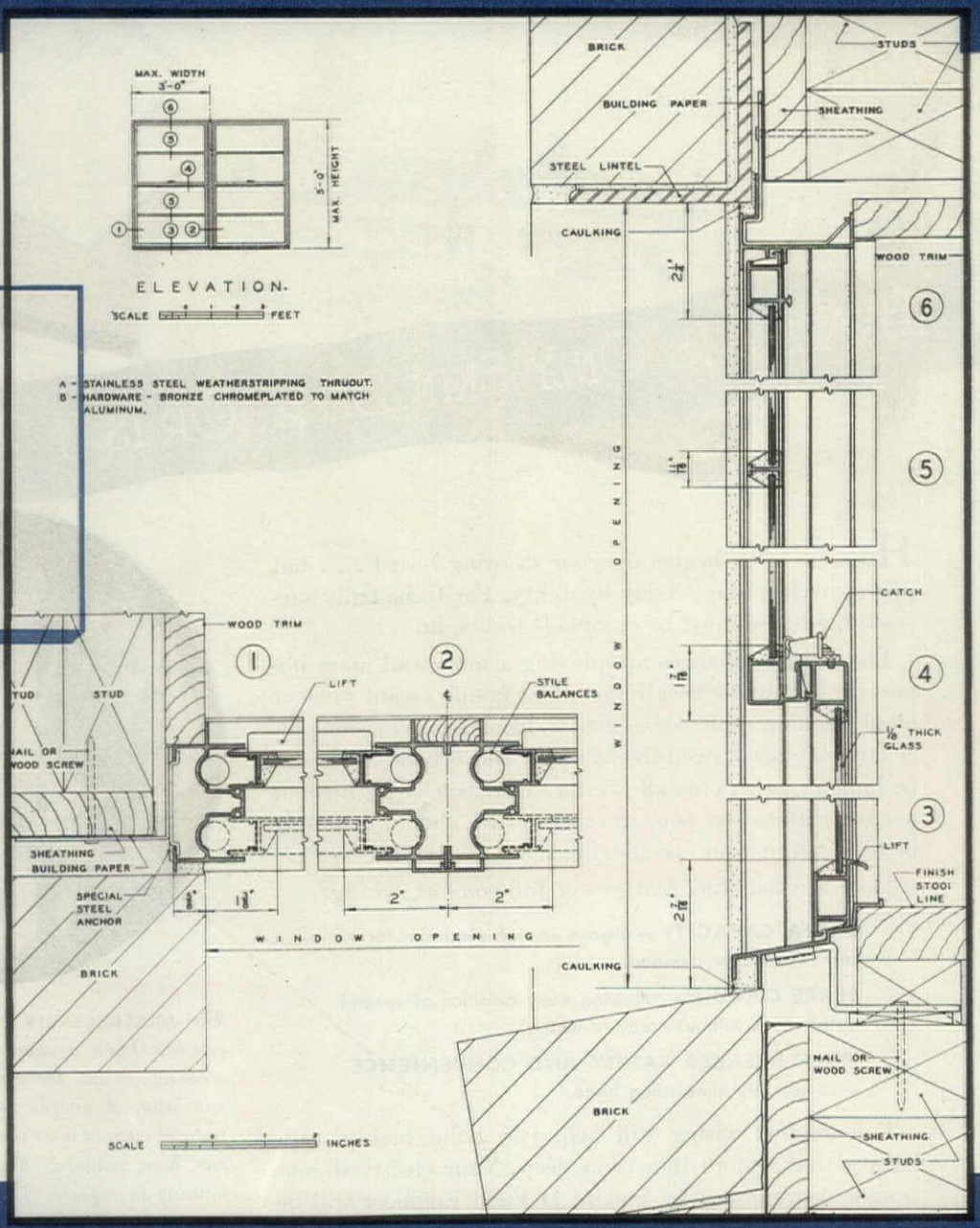
FOR RESIDENCES AND APARTMENTS

SPECIFY THESE LOW COST

ALWINTITE ALUMINUM WINDOWS

DETAILS OF ALWINTITE ALUMINUM DOUBLE HUNG RESIDENTIAL WINDOW

SERIES DHA-O



Use these modern ALWINTITE Aluminum Windows for any residential structure you design. They are now in production for early delivery and will be available in 9 stock sizes. They embody many patented features found only in expensive custom-built windows. Write today for complete information.

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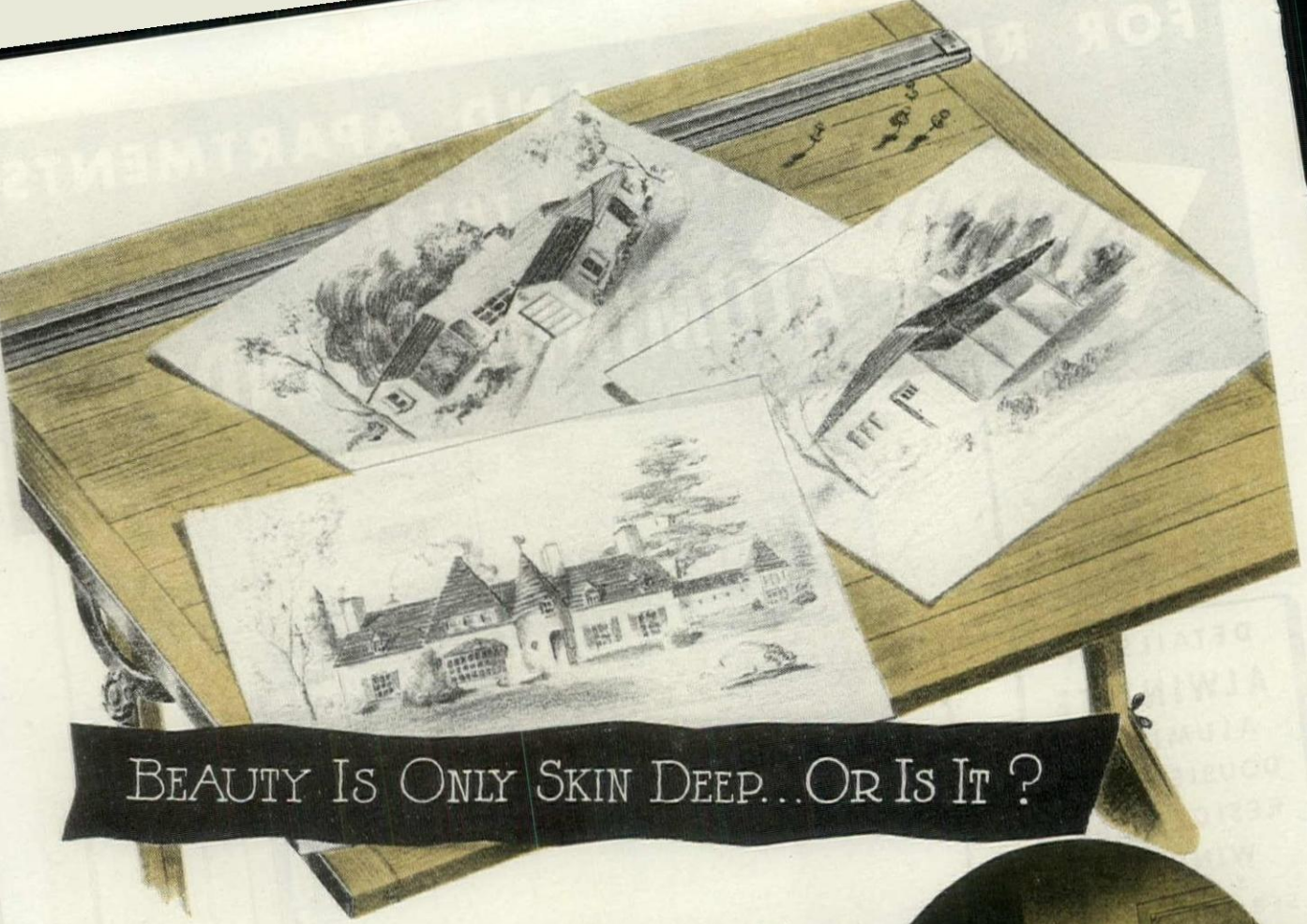

BEAUTY IS ONLY SKIN DEEP...OR IS IT ?

HOME BEAUTY begins on your drawing board . . . but proves itself in day-to-day livability. For to be truly successful, a house must be enjoyable to live in.

Electrical appliances are playing a more and more important part in modern living. Most families want some or all of the new appliances—air conditioning, television, all-electric kitchens, deep-freeze units, and others. Some will be built in, others installed later. That is why *full-comfort wiring*, planned on your drawing board, should definitely be included in your specifications.

Here are the chief features of full-comfort wiring:

EXTRA CAPACITY—always enough electricity for any reasonable demand.

SPARE CIRCUITS—allowing easy addition of special installations without costly re-wiring.

MULTI-BREAKER SAFETY AND CONVENIENCE—completely eliminating fuses.

Full-comfort wiring will help you build houses with beauty that's more than skin deep. Your electrical contractor or your nearby Square D Field Engineer will be glad to work with you . . . and show you exactly the Square D Multi-breaker installation each home needs.

The MULTI-BREAKER *eliminates fuses completely. When a short-circuit or dangerous overload occurs, the circuit is cut off automatically. A simple movement of the lever restores current after the cause of the overload has been removed. There are no delays—nothing to replace. The Multi-breaker costs little more than fusible equipment . . . on many installations costs less.*

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THE ARCHITECTURAL FOR


in floors, too...
IT'S THE Finish THAT COUNTS!
and the Postwar Winner will be New FACTORY FINISH on Bruce Finished Floors!
8 WAYS BETTER THAN ON-THE-JOB FINISHES!
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Yes! It's the Finish that Counts in Floors
TOMORROW'S HOME BUILDERS are learning today the many advantages of this modern flooring... through millions of colorful, convincing messages in leading magazines. Watch for them in the Saturday Evening Post, Better Homes & Gardens, American Home, House & Garden, Small Homes Guide, and other best-read home magazines.
BRUCE
America's Beauty Floors
BRUCE FINISHED FLOORS

(Continued from page 28)

Housing Council thought, for "bold, decisive action." Promptly the Council aired its opinion: the city must take steps to erect temporary houses. Already equipped with streets and utilities, the Flushing World's Fair grounds was a handy and logical location. The temporaries would not only relieve the current housing pinch, but also would help out families who will be displaced by slum-clearance and rebuilding projects soon to start.

The Federal Public Housing Authority, with plenty of vacant houses on its hand, indicated that it would be glad to move in some temporaries to help out New York. But by month's end, no invitation had come from Mayor LaGuardia.

REPAIR-OR-RAZE

In 1941 an aroused Baltimore backed municipal action to force landlords to renovate or tear down slum properties. But when the war tide of inmigrant workers swelled the city's population and housing shortage mounted, Baltimore was forced to decide that a leaking roof was better than no roof at all.

After V-J day Mayor Theodore McKeldin lost little time. Last month the Mayor was out climbing tenement stairways, poking into back alleys. In East, West and South Baltimore he found plenty of Negro homes that "violate all the laws of sanitation and all the regulations of the Bureau of Buildings." Calling a meeting of city officials, the Mayor got ready to crack down on offenders, asked the Bureau of Buildings to inspect property.

"Bouncing landlords," said Dr. Huntington Williams, commissioner of health, are the chief obstacle. Owners of slum property are frequently hard to locate. By the time they are traced, the properties have changed hands.

While most of Baltimore applauded the Mayor's repair-or-raze campaign, few thought it was a basic answer to the problem of slum living, looked more hopefully to the city's new Land Redevelopment Commission whose job is to open the way for private enterprise rebuilding. At the very least, the Mayor's trip through the tenements had underlined the big slum clearance job now squarely before Baltimore and every other U. S. city.

Approvingly the *Baltimore Sun* noted the "growing public awareness of the shocking conditions existing in slum areas." Endorsing the municipal government's responsibility for compelling slum owners to improve their properties, the *Sun* marked this step as an important "change in social philosophy."

ANOTHER EXAMPLE OF JOHNSON
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Denver, Colorado
Architect: The late J. B. Benedict

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Since 1931, when the residence for Mrs. Ella M. Weckbaugh was completed, individual room temperatures have been controlled automatically by a complete Johnson system. A total of 24 thermostats operate valves on the 35 radiators and provide modern comfort and big fuel savings. Big fuel savings help the budget.

The air we breathe! What is more important to the comfort and health of each of us? Everyone is beginning to realize the importance of proper control of temperatures in homes, as well as in offices, schools, public buildings and factories.

Perhaps Johnson Control for individual rooms in the home suggests an idea to you. Talk it over with a near-by Johnson engineer. Without obligation, he will make a survey and recommendations, in cooperation with your heating contractor. Johnson temperature control can be installed in older homes or in those under construction. Johnson is a nation-wide, self-contained organization, designing, manufacturing and installing Johnson control systems. JOHNSON SERVICE COMPANY, Milwaukee 2, Wis. Direct Branch Offices in Principal Cities.

JOHNSON *Automatic Temperature and Air Conditioning* **CONTROL**

DESIGN • MANUFACTURE • INSTALLATION • SERVICE

Getting 1300 foot-candles from a 100-watt lamp . . .

WITH AN

Alzak *Aluminum Reflector

This Navy operating room light made by Edwin F. Guth Company, St. Louis, Mo., is another example of the job Alzak aluminum reflectors are doing in delivering maximum efficiency and control.

It is used in the surgery on board ship where maximum lighting is vitally important. From a 100-watt lamp, this Guth light delivers over 1300 foot-candles on the operating table 48 inches below. This amazing intensity results in spite of a heat filter which absorbs 24% of the light.

Alzak reflectors are made in various finishes for indoor and outdoor lighting, for spot illumination and diffuse. Your reflector manufacturer can furnish Alzak reflector finish to meet your special requirements. ALUMINUM COMPANY OF AMERICA, 1944 Gulf Building, Pittsburgh 19, Pennsylvania.

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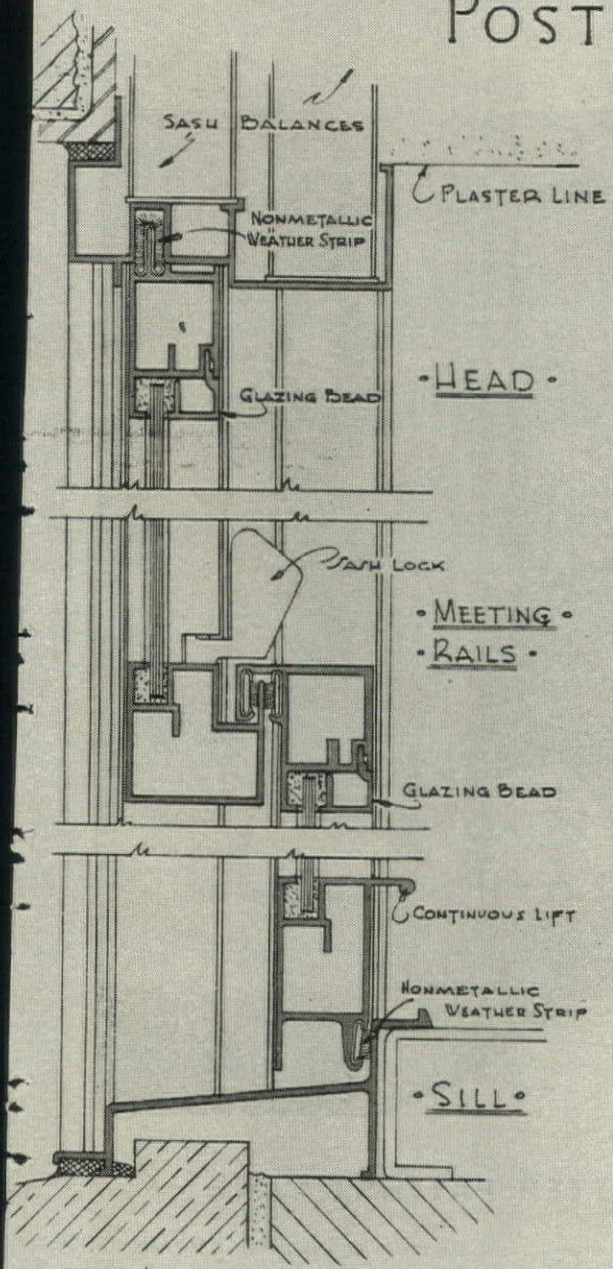
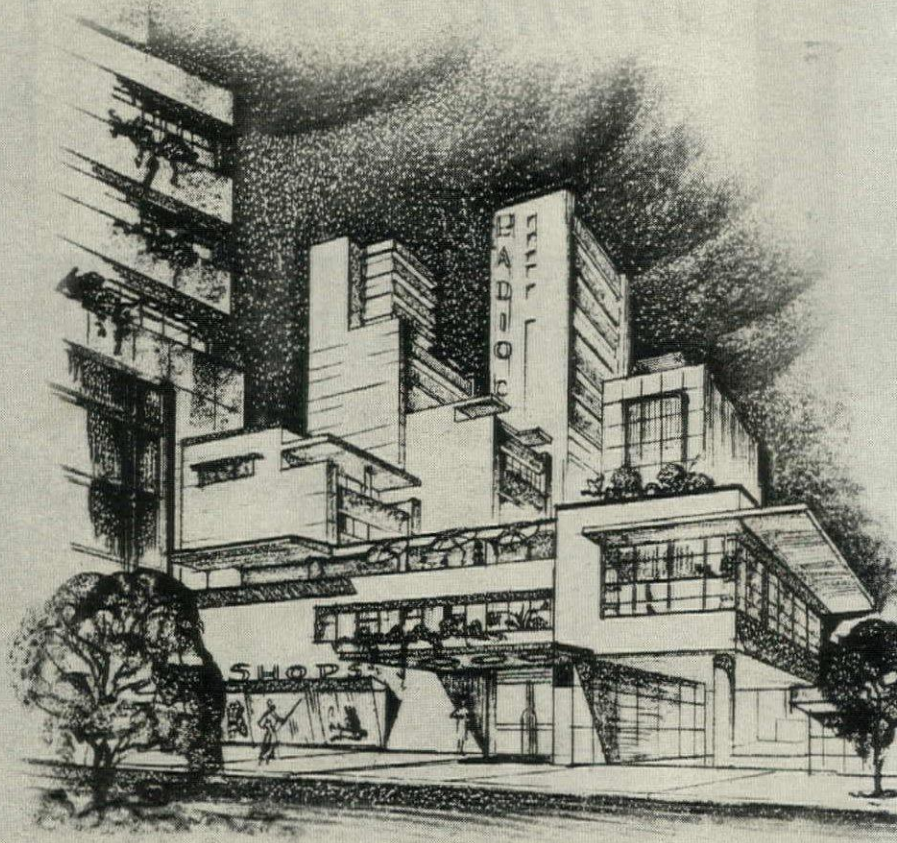
ALCOA ALUMINUM

POST-WAR DETAILS





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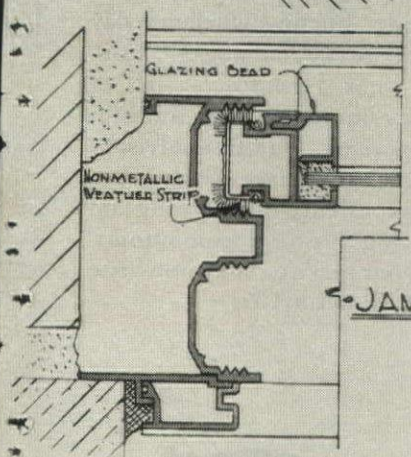
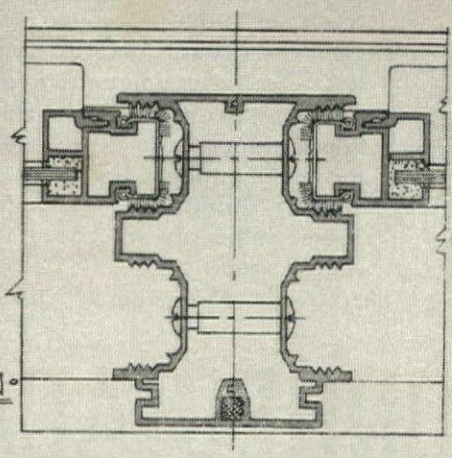
THIS SNUG FITTING, EASY OPERATING "DOUBLE-HUNG" WILL SOON AGAIN BE AVAILABLE AT PRICES THAT COMPARE FAVORABLY WITH WINDOWS OF MATERIAL THAT REQUIRE PAINTING · · · · · · · · · ·





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SPECIFY AND DETAIL

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THE ADAMS AND WESTLAKE CO. ELKHART, INDIANA, U.S.A.

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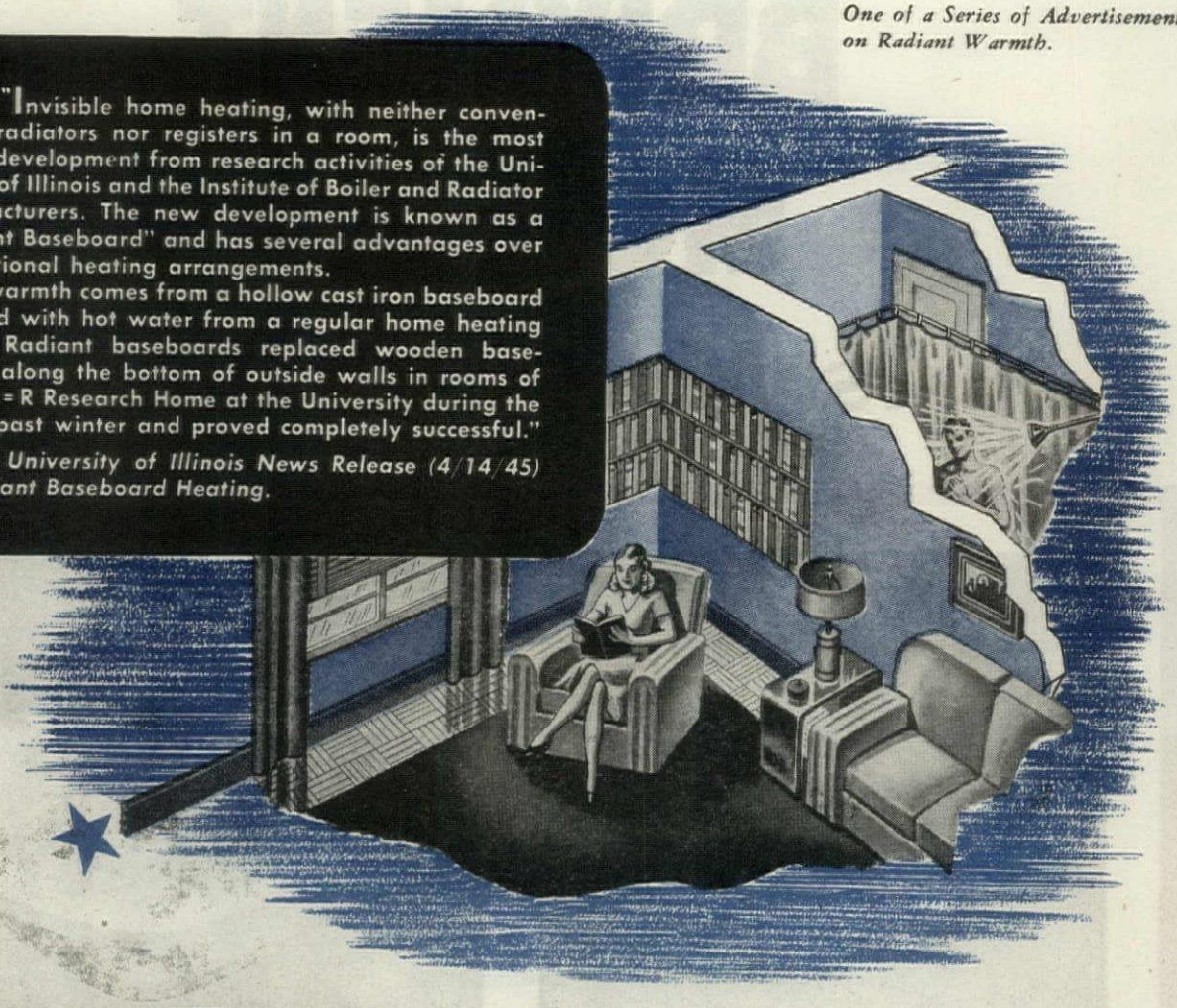
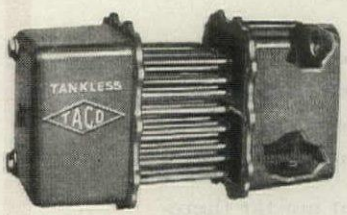
Room warmth comes from a hollow cast iron baseboard supplied with hot water from a regular home heating boiler. Radiant baseboards replaced wooden baseboards along the bottom of outside walls in rooms of the I=B=R Research Home at the University during the severe past winter and proved completely successful."

From a University of Illinois News Release (4/14/45) on Radiant Baseboard Heating.



Better Heating - Better with Taco

. . . PLUS PLENTIFUL YEAR-ROUND DOMESTIC HOT WATER



TACO TANKLESS HEATER

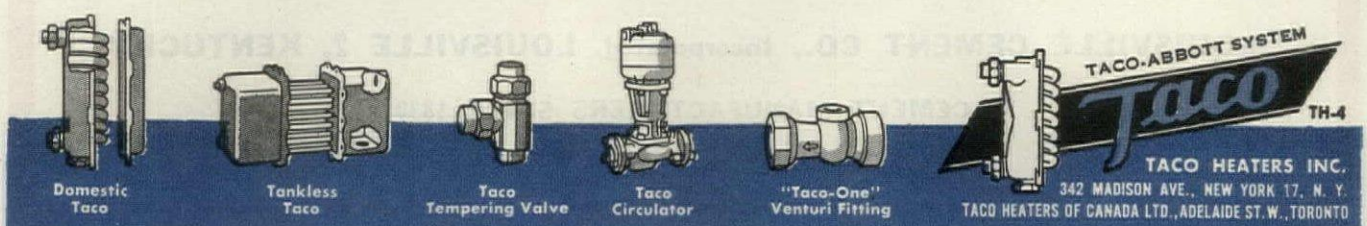
Take full advantage of these newly developed Radiant Baseboards (which the I=B=R and the Univeristy of Illinois so enthusiastically endorse) by installing them with a "Taco-One" Venturi System with a Taco Circulator and Venturi Fittings. Then you can be sure of positive flow; gentle, even heat; quick response to thermostat demands.

This unusual system of home heating can also give you the benefits of year-round domestic hot water—with a Taco Tankless Heater. This heater assures a plentiful supply of crystal clear hot water—and eliminates expensive installations of cumbersome "summer water heaters".

There is a Taco Tankless Heater for every home and commercial requirement. Taco Products will help you in your job of "Building Better Homes".

The architect, wholesaler and contractor can forget such an installation as soon as it is complete. The home owner will remember it—pleasantly.

See your wholesaler or write Taco Heaters, Inc.



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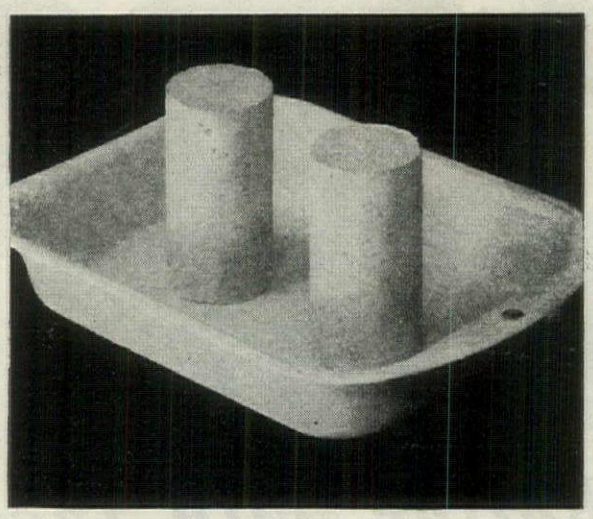
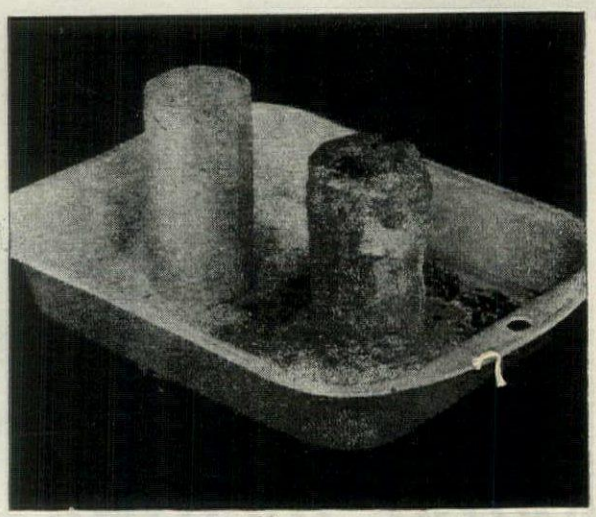
342 MADISON AVE., NEW YORK 17, N. Y.
TACO HEATERS OF CANADA LTD., ADELAIDE ST. W., TORONTO

BRIXMENT MORTAR

Is More Durable



To compare the durability of two mortars, make a cylinder or block of each, let them "cure" for a month or so, then freeze and thaw them forty or fifty times, with a little water in the pan (the freezing unit of your electric refrigerator will do). Try this with Brixment mortar!



—AND DURABILITY MEANS

PERMANENT STRENGTH AND BEAUTY

For permanent strength and beauty, mortar must be *durable*—must be able to withstand the alternate freezing and thawing to which it is subjected many times each winter.

Brixment mortar *is more durable*. This greater durability is due partly to the strength and soundness of Brixment mortar, and partly to the fact that Brixment is waterproofed during manufacture. This waterproofing helps prevent the mortar from becoming saturated —therefore protects it from the destructive action of freezing and thawing.

Walls built with Brixment mortar therefore *retain* their original strength and appearance. . . . Even in parapet walls and chimneys, where exposure is particularly severe, Brixment mortar will almost never require repointing.

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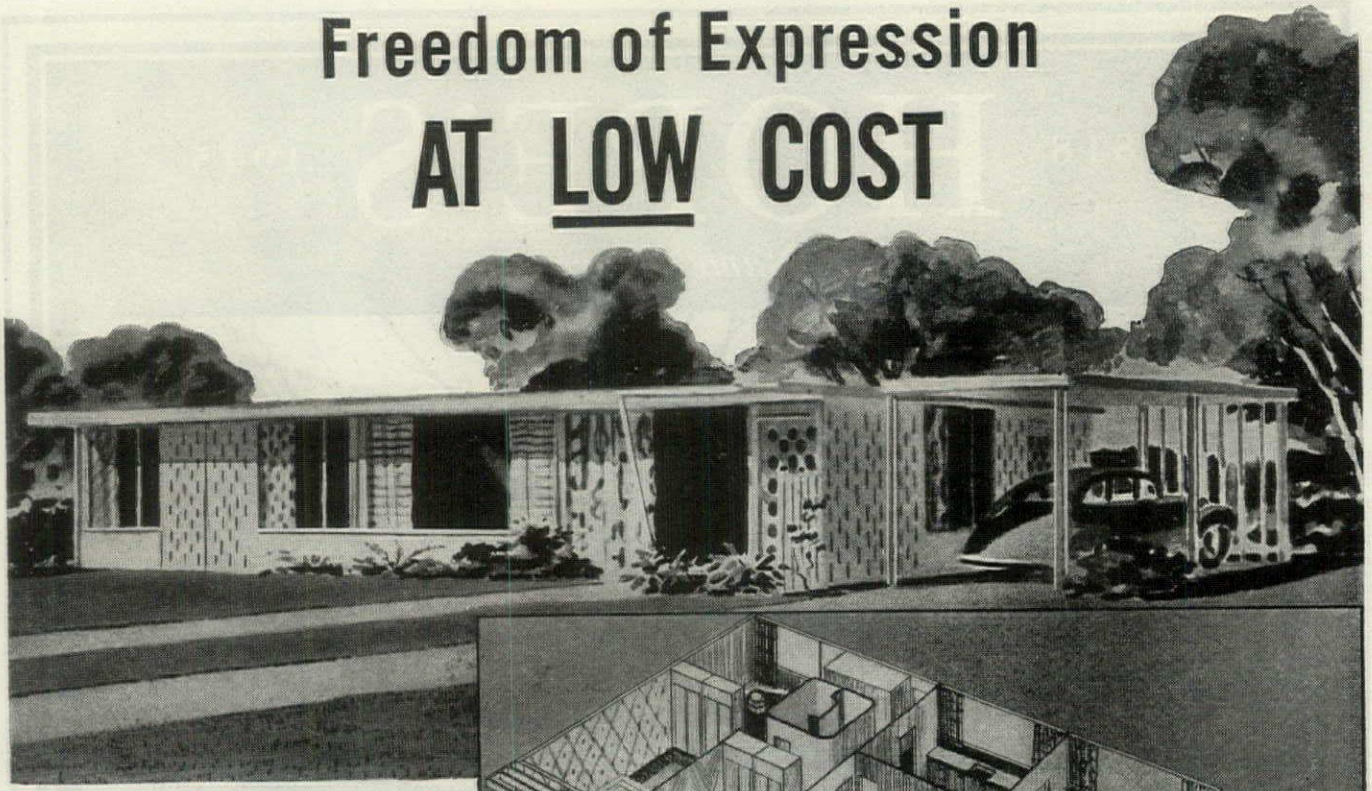

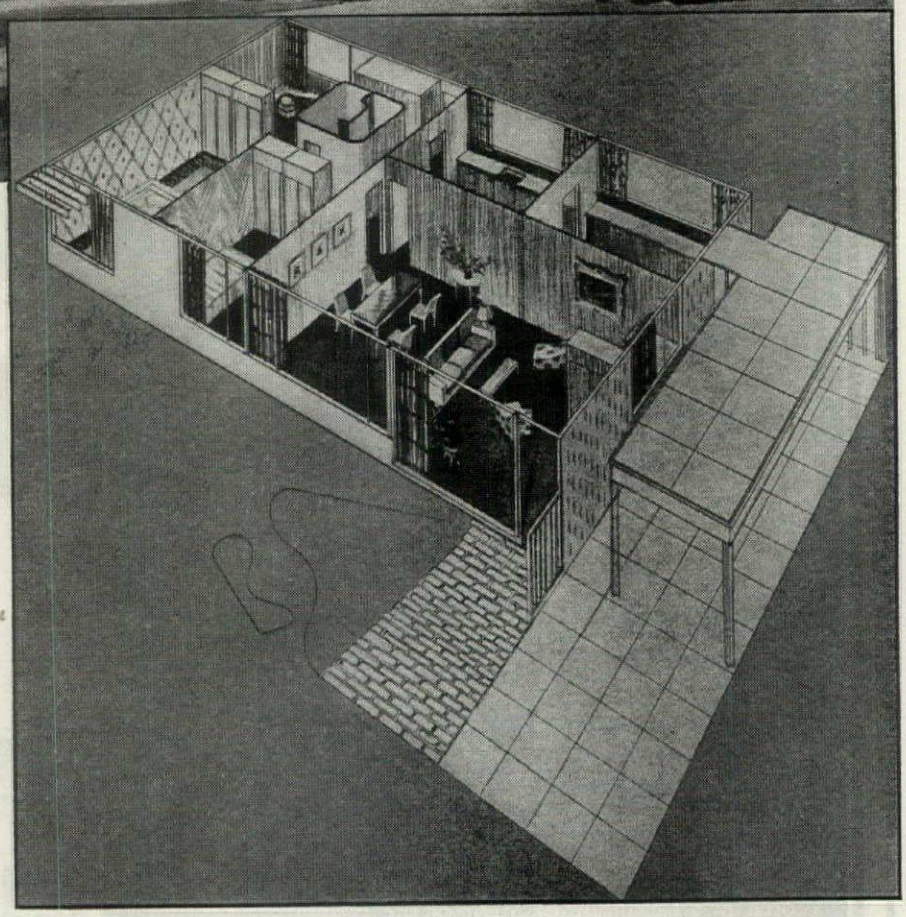

Third-Prize Winner

Mr. Eduardo Fernando Catalano, of Buenos Aires . . . now engaged in advanced architectural studies at Harvard University.

In his prize-winning plan, Mr. Catalano successfully avoids the monotony that so often characterizes small home design. And he accomplishes it by exploiting plywood's versatile functional aspects.

This third-prize winner, in the United States Plywood Corp.—"Arts and Architecture" Small Home Competition, uses many types of plywood, to create ample opportunity for the expression of individual taste . . . *without jeopardising economy or structural soundness.*

For instance, a self-supporting molded plywood roof is suggested. This is trussed in such a fashion that room partitioning is highly elective.

Mr. Catalano doubtless visualizes that some owners might like one wall of a room curved, for example . . . or even movable walls.

Plywood's endless structural possibilities help to make this unique design possible. It truly represents beauty combined with utility.

Details of this and other winning plans are available upon request.

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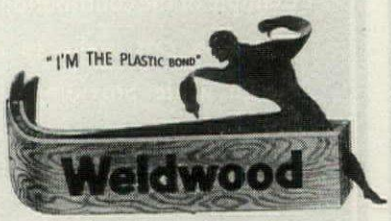

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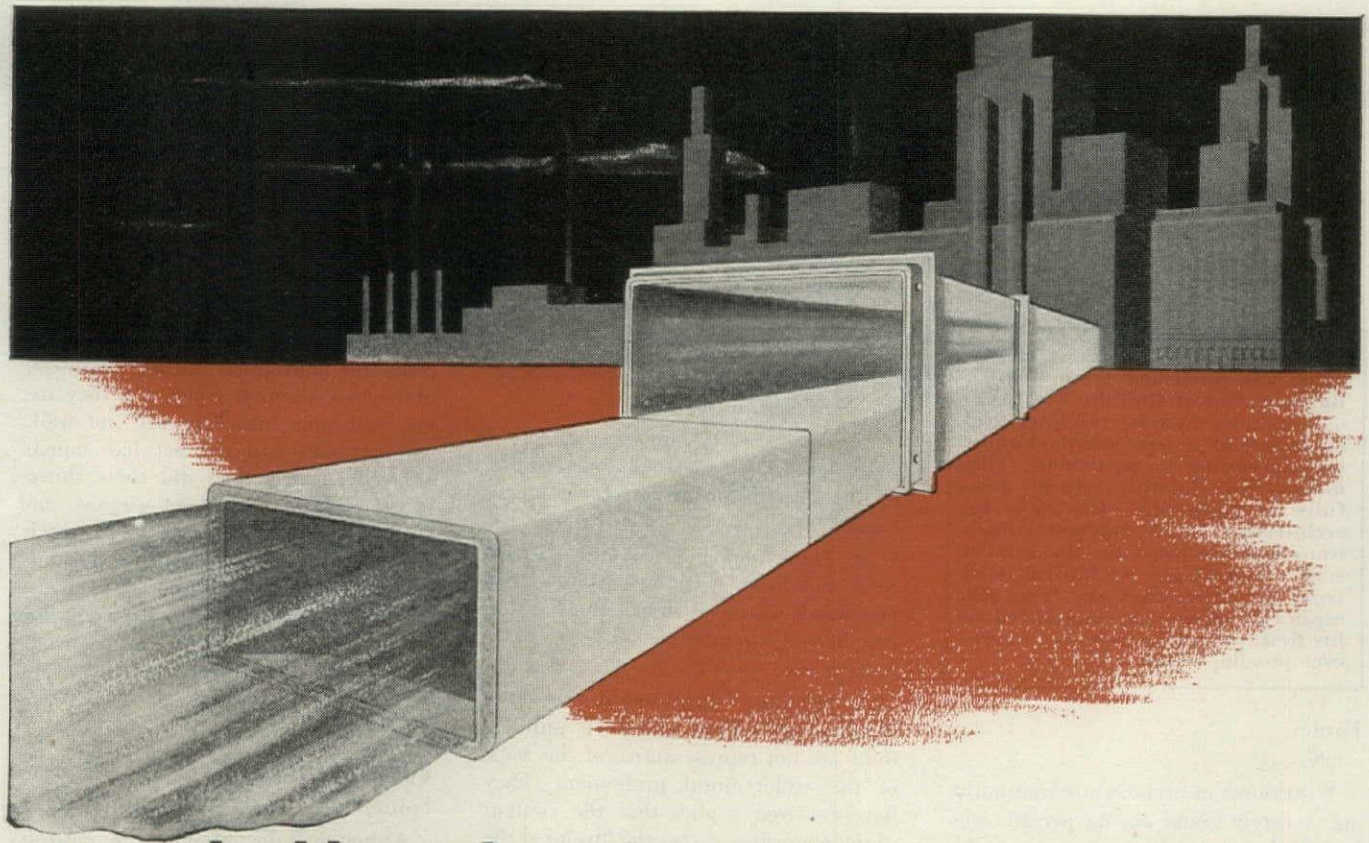

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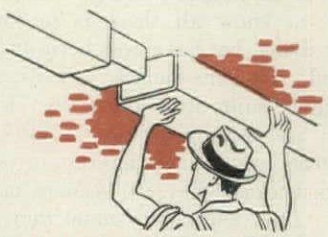

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LETTERS

New Sizzler from Guy H. Baldwin . . . Notes and comment on Guy H. Baldwin.

ATTACK

In the August issue of the FORUM a letter was published from Guy H. Baldwin, AIA of Buffalo, N. Y. criticising contemporary architectural magazines in general and the FORUM and its editors in particular. This month Mr. Baldwin returns zestfully to the attack. His views on architecture hold interest which transcend his views on the FORUM staff. Accordingly, we have deleted from his latest letter and from the replies of others who responded to his first, personal references wherever possible.—ED.

Forum:

"News!"

Worthiness in architecture and building is rarely found among persons who have little practical experience in building, but undoubtedly a great deal of news is. . . . Here is a magazine that for years was for architects, now produced 100 per cent by journalists. Your staff is in the position of a group that has spent years at the airports, holds degrees in aeronautics, competently professes to know all there is to know about flying, but has never been off the ground. The fine homes, schools and churches built throughout the U. S. which are of deep interest to working architects are of little interest to journalists because they are seen in many cities. To a journalist's mind they are not news. But when someone proposes to build a cathedral atop a flagpole, that in a journalist's training is news and into the FORUM it goes, and it is of little consequence to a working architect. He reads his State Association magazine because in it he sees his own buildings and those of the architects he knows, not some publisher's frenetic ideas on the Super Building of the fortieth century, whose viciousness of opinion, peculiarly enough, is matched by his lack of experience in actual building. The power of your publication declined when your publisher became a Man with a Message, when architecture was subverted to propaganda.

In this mood to destroy most architectural ideas that existed before 1930, the FORUM has been among all magazines the leader. Now let's look at a sample of the results of this leadership:

In our building there are at least seven registered architects. They are still practising architecture and have been engaged in war-related building during the war.

1) Twenty years ago most of these seven architects subscribed to at least two architectural magazines.

2) Today not a single architect of these seven has a personal subscription to any one of the architectural magazines.

3) These men declare they wish to read and to subscribe to architectural magazines whenever their editorial policies become compatible with an architect's work.

4) Several of these men have written architectural editors that their publications are not representative of the work of the architectural profession. They have received replies that the content of the magazines shows the "trend of the times," that little can be done about it, and to the effect that the day of a new architecture has dawned, that Henry Ford could build a better Conestoga wagon but wouldn't, and similar hackneyed fatuous nonsense.

5) How do you suppose one of these men feels when he receives an engaging letter from the circulation manager inviting his subscription? To him it appears that the circulation manager and the advertising manager play on one team, the publisher on the opposing team.

You tell your advertisers that the architects who actually produce building designs breathlessly await each issue. Some fine morning one of them is going to ask: "How many of these architects ever see it?" Especially so now that you intend raising your advertising rates by 50 per cent.

If some future architectural editor sets out assiduously to cultivate the ill will of the architectural profession, he will measure his success by comparing it with your publication's accomplished work. Even for one of a group of magazines that formerly took public pride in its curtness, the FORUM for an architect is provocative to the point of being emetic.

Your magazine has blamed architects, whose ill will you court, the bankers and the owners for the failure of new building construction to shed its raiment and join your nudist camp, when it might be apparent to anyone but two of the current architectural editors that few want the stuff that is published.

. . . In the Empire State Building, where the twentieth century runs amuck, FORUM establishes shining precepts for journalists turned architects of the New Vacuity. Sincere as they are, you and your followers will not walk, will not eat, will not act like human beings—because men did these things in the days of Conestoga wagons, and therefore to do these things properly one should wear a buckskin jacket and carry a powder horn. To do aught else would be a nostalgic travesty on what you like to call twentieth century architecture.

GUY H. BALDWIN, *AIA*
Buffalo, New York

COUNTER-ATTACK

Forum:

Although I do not subscribe entirely to the policies of the combined Luce enterprises, I was appalled to read in the August FORUM the attack unleashed upon architectural editors and contemporary architecture by my good friend and classmate Guy H. Baldwin. (*Syracuse University, class of '38.*—ED.)

First of all, many of the young architects now in uniform and engaged in the business of war find little time outside their own duties to do more than read an architectural magazine now and then in order to form some outlook on the postwar prospects for the profession in general and for themselves in particular. It would seem to us that, with the close of the present conflict, the architectural profession stands on the threshold of perhaps its greatest era.

. . . Can it be that we have been misled these last few years by "non-registered" editors and publishers into believing contemporary architecture is here to stay? Or is the thinking of architect Baldwin an indication of the type of back-pedaling that has been going on among the drafting tables and in the offices we vacated?

I hope not. I hope I never again have to sit down at a board and turn out traditional designs for a living. If the return to civilian life means that, then my first design will be an elaborate apple stand—for myself.

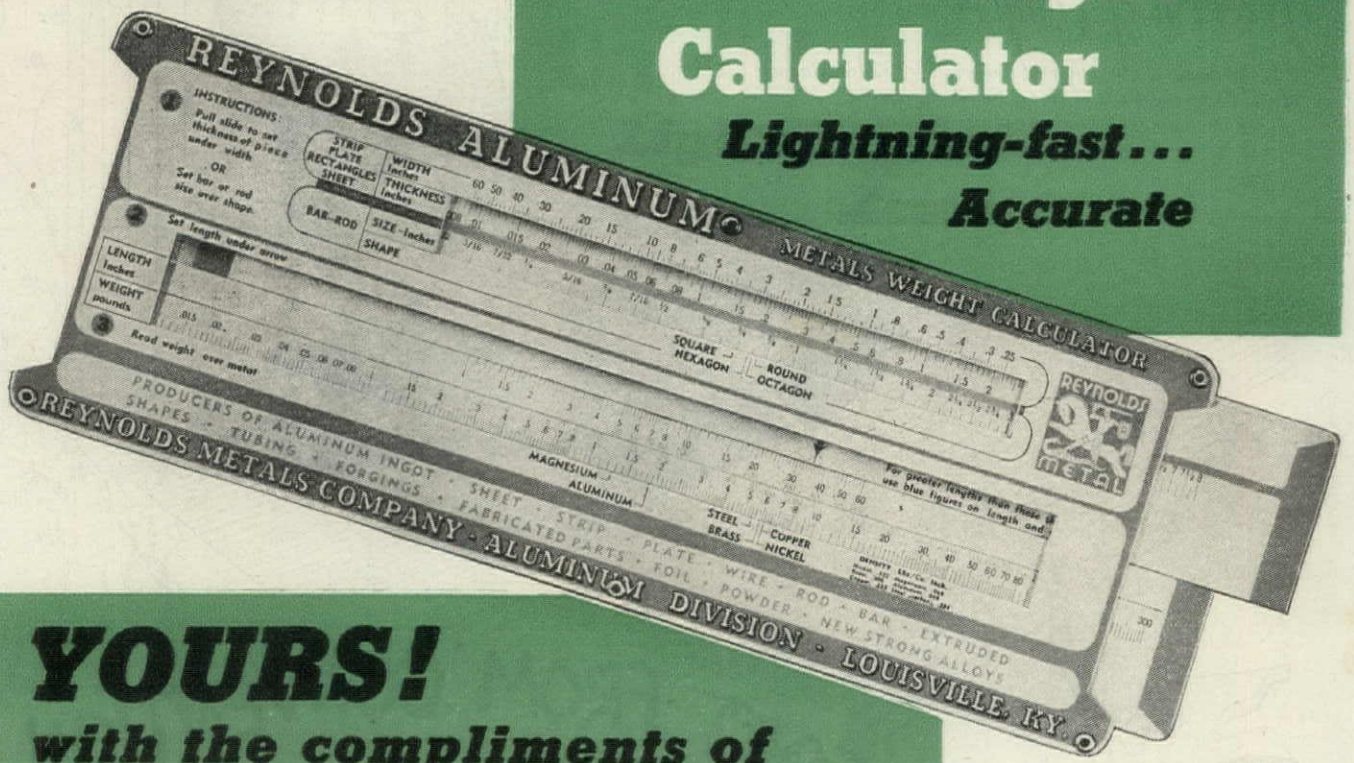
. . . The ranks of prospective clients who knock at Baldwin's door, and who shun the "bizarre architecture" which confronts him on every FORUM page, will dwindle. For they are gradually

(Continued on page 46)

NEW!

Metals Weight Calculator

Lightning-fast... Accurate



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All the answers INSTANTLY. Everyone who works with metals will find this instrument invaluable.

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The Reynolds *Metals Weight Calculator* is a convenient, durable, vestpocket-sized instrument, measuring only 3"x 8¾". With a flip of the finger, weights are calculated from cross-sectional dimensions and length as accurately as from published tables of theoretical weights. It can also be used to determine lengths from cross-sectional dimensions and weights.

Scales included are sheet, strip and plate; round wire and rod; square, hexagonal, octagonal and rectangular bar; tubing; and sheet circles. Range of instrument—from .0006 lbs. to 3000 lbs. —from an infinitesimal-sized piece of metal to a giant bar.

If you work with metals, you will find this Reynolds *Metals Weight Calculator* very helpful. Mailed post-free upon request, in a protective wrapping.

A REAL TIME-SAVER. Engineers report that, besides facilitating absolute accuracy, the Reynolds Metals Weight Calculator saves up to 90% of the time ordinarily required to consult tables and make calculations.

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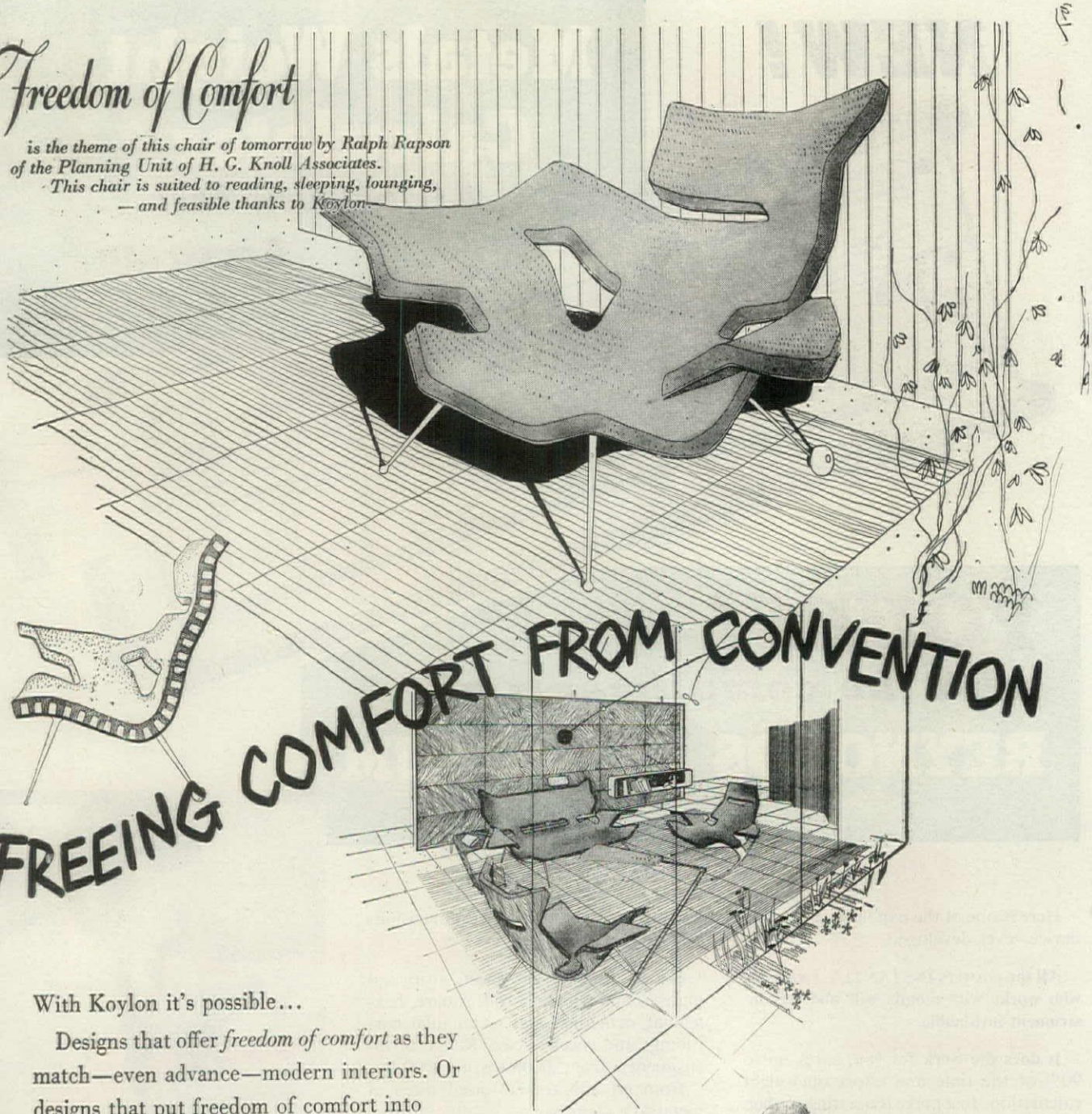
is the theme of this chair of tomorrow by Ralph Rapson of the Planning Unit of H. G. Knoll Associates. This chair is suited to reading, sleeping, lounging, — and feasible thanks to Koylon—



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Designs that offer *freedom of comfort* as they match—even advance—modern interiors. Or designs that put freedom of comfort into traditional settings. With Koylon it's possible.

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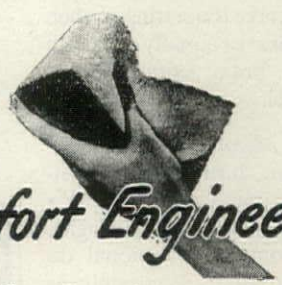
When available again, Koylon will be Comfort Engineered in any desired density, depth or degree of lightness. For your future schemes, plan with "U.S." Koylon Foam.



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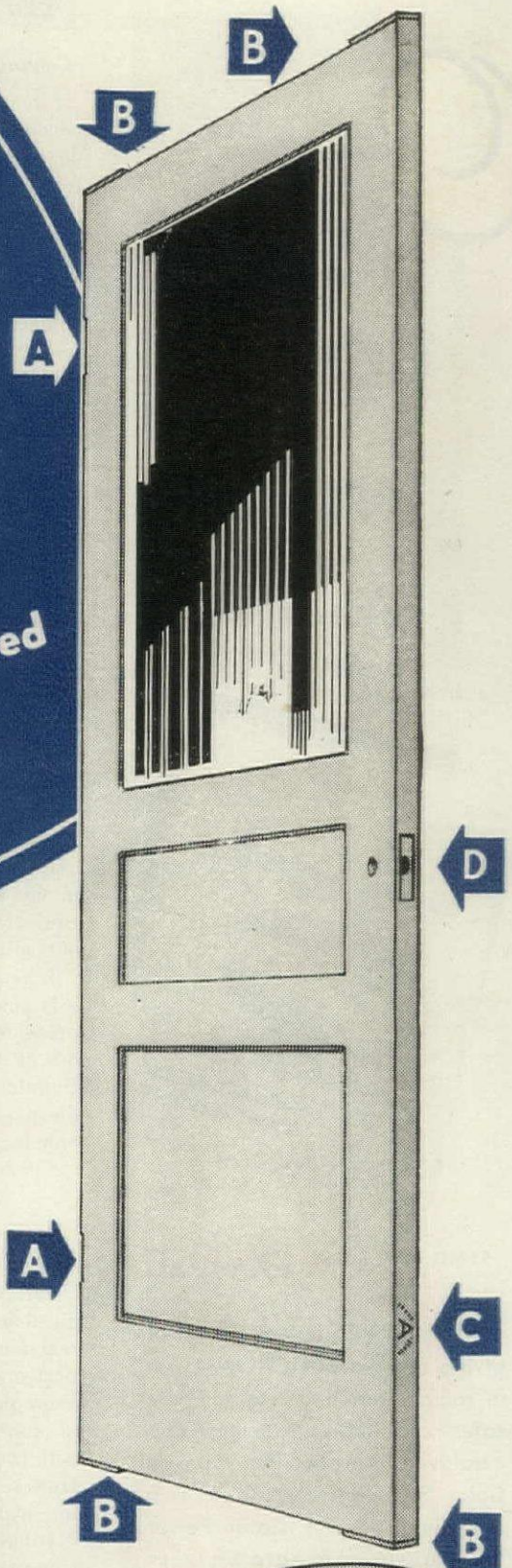
Of 3400 Lumber Dealers* — 66⅔% say "We will stock FACTRI-FIT Pre-fit and Pre-machined DOORS"



HERE'S added proof—if any were needed — that Douglas fir FACTRI-FIT doors are pacing the modern trend.

Specifiers are selecting FACTRI-FIT doors because they assure a better installation every time. Builders are using FACTRI-FIT doors because they save time and money on the job.

And more and more Dealers will stock FACTRI-FIT doors because they know these are the doors their customers will demand.

* All lumber dealers in 10 southern states were asked this question by Southern Sash and Door Jobbers Assn. Twenty-five per cent replied, giving this potential market estimate.

A FACTRI-FIT GAINING: 7" from top, 11" from bottom. Standard butt on 1 3/8" doors, 3 1/2" x 3 1/2"; on 1 3/4" doors, 4" x 4". Square corners. Center gaining for heavy construction is equi-distant between.

B FACTRI-FIT SIZES: Doors prefit to exact net book sizes listed in U. S. Commercial Standard 73-43. Doors scuff-stripped for protection.

C FACTRI-FIT GRADES: Doors are grade-marked for easy identification and specification.

D FACTRI-FIT LOCK BORE: All boring to center knob 36" from bottom of door. Diameter of bore-in, 15/16"; length of bore-in, 3 3/4" from edge; face plate, 1" x 2 1/4" x 1/16", square shape, cross-bore, 5/8" diameter on 2 3/8" center. These standard specifications fit virtually all nationally-distributed hardware. Other machining on special order.

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Durable Douglas Fir Doors are made from all-heart-wood, vertical-grain, soft, old-growth Douglas Fir.

THE NATIONAL ASSOCIATION OF FIR DOOR MANUFACTURERS

LETTERS

(Continued from page 42)

becoming aware of the stupid and decadent architecture which has been foisted upon unwitting clients ever since the Chicago Fair of 1893.

Guy knows as well as I, that the study of classic architecture in any reputable school was relegated to the history courses ten or more years ago. . . . Here is a young man who has apparently blindly chosen to cast his lot with the few remaining classicists and has ignored or been unconscious of the fine opportunity that was his. He would do well to emerge from the clouds long enough to observe the changes taking place not only in architecture but in the social and political structure of the world.

As for the editing of an achitectural publication, I would much prefer the "specious propaganda" of any intelligent layman unimbued with a love for columns and pediments, to that of some bigoted or nostalgic architect who among other things, visualizes the post-war period as another Renaissance. And I read to learn of the new ideas, trends and advancements which are occuring in my profession, not to look at beautiful pictures illustrating the absurdity of traditional designs in a modern world.

If reader Baldwin does not feel properly guided by the present architectural press, let him retire to the seclusion of one of the nearby antiquities with which Buffalo is filled and blissfully consult the pages of his Platt, Fletcher or Vignola for his inspiration.

Come on, "Baldy," get on the ball!!

LT. (JG.) F. E. HARES, *USNR*

Forum:

Mr. Guy Baldwin's letter could be dismissed as the usual outpouring of a reactionary were it not for his unsupported statements and his rather malicious point of view. As a reactionary, he may be safely left to float upstream with probably no more than local harm. However, his allegations are quite a different matter.

It has been our experience (quite contrary to what Mr. Baldwin says) that the FORUM and other architectural magazines, in publishing work of a nature which seems to alarm Mr. Baldwin, have led to a much greater general interest and understanding of architecture and its place in society. While we do not know what the nature of Mr. Baldwin's practice is, the undersigned architects, whose offices are fairly representative of the Middlewest, have found that their clients have invariably shown in recent years a much greater sympathy with the architect and his work. The layman's former desire for some stylistic manner seems to be a thing of the past, which certainly can be considered a step in the right direction. A great deal of credit for this major change is due to the FORUM . . .

Beyond the merely stupid into the malicious are the remarks in Mr. Baldwin's letter in regard to the FORUM staff. Mr. Baldwin who, according to the AIA Annuary was canonized by membership in this year of grace 1945, points out that Mr. Myers is not a member of the Institute. That an architect's license is necessary to a man in another profession is self-evident nonsense . . .

LOEBL & SCHLOSSMAN
PHILIP B. MAHER
SAMUEL A. MARX, NOEL L. FLINT & C. W. SCHONNE
SHAW, NAESS & MURPHY
SKIDMORE, OWINGS & MERRILL
Chicago, Ill.

Forum:

Tell Baldwin the battle of the styles is over and George the Sixth is King of England.

ERIC MENDELSOHN
Croton-on-Hudson, N. Y.

Forum:

. . . At least Mr. Baldwin should be awarded the FORUM "E" for his strength and determination to paddle so vigorously against the current.

Looking fondly into things that have passed, always reminds me of the man who was riding in the hack backwards. Mr. Baldwin must have been riding not only backwards but with the blinds pulled down as well.

GARDNER DAILEY, *AIA*
San Francisco, Calif.

Forum:

Reading Mr. Guy H. Baldwin's blast at the editorial management of the FORUM leaves me wondering what his real grievance amounts to.

Behind the rhetorical aspersions, is he really bewailing the fact that contemporary architectural design has progressed beyond its Cape Cod and Colonial diapers?

From a widespread acquaintance among fellow architects, I doubt if five per cent would agree with Mr. Baldwin's bias or conclusions.

The "great profession ready and willing" cannot serve the nation usefully or wisely if it shares Mr. Baldwin's esthetic constipation. Nor can the editorial agencies publicising contemporary expression well serve the public, or the architects, in the manner wished for by Mr. Baldwin and his fellow travellers.

I do not believe the FORUM has any-

(Continued on page 50)

HATS OFF DEPARTMENT

CECO RESIDENTIAL CASEMENTS

HATS OFF TO...

A. Thomas Bradburg, Architect
C. R. Justi, Contractor
for 4 family apartment Atlanta, Georgia

This unusual treatment of a four family apartment stresses the importance of the windows to the modern design. A fine example as applied to a multiple family unit. In this interesting Atlanta apartment Ceco residential steel casements are used throughout.

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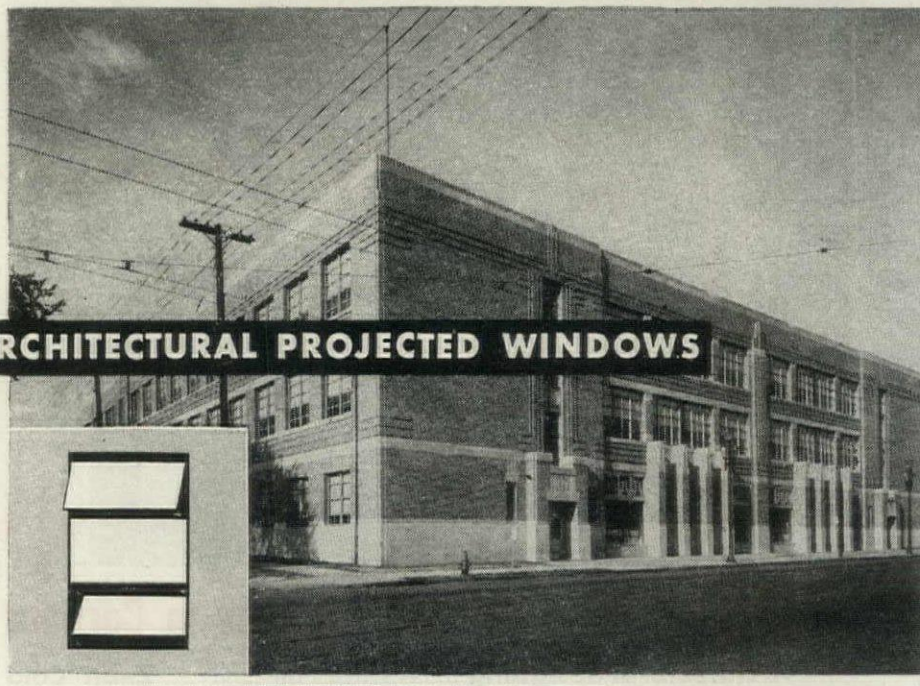

HATS OFF TO...

Edwin M. McGee
Department of Architecture
Toledo Board of Education
H. J. Spieker Co., Contractor
for McComber Vocational School
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A well designed school building using the maximum fenestration without sacrifice to the traditional school design. Here you find architectural projected windows used superbly in this design which calls for control of ventilation so essential to school construction. Ceco Architectural Windows are used throughout the McComber School.

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B. F. Olson, Architect
Campbell-Lourie-Lautermilk Corp.
Contractor for the Webster Co.
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Examine the effective combination of Commercial Projected Windows in the office portion and Horizontal Pivoted Windows in the manufacturing section of this modern Webster Company plant. To afford adequate and controlled ventilation for office workers Mr. Olson specified Commercial Projected Windows with two-light-high "project-out" vents and one-light-high "project-in" vents. Projected ventilators are easily screened from inside or outside with Ceco metal-frame screen.

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Modern Practice in Corridor Lighting

Architectural designing today carries the modern treatment into the corridors of a building as well as throughout the offices, stores, and various meeting rooms that may be involved. Indirect lighting, with fixtures to harmonize with the architectural design of the corridor itself, helps to create this modern effect. Because the space lighted is used only as a passageway, general practice is to hold light output to approximately 5 footcandles.

Zeon Cold Cathode Fluorescent Lighting is used for the corridor illustrated here. Three fixtures are installed in a single row. Lighting is completely indirect, providing the uniform level of light necessary for a passageway. Each fixture contains four Zeon Cold Cathode lamps, connected in series circuit. Fixtures are metal, specially designed to fit into the architectural design. Grade E illumination fully meets the lighting requirement for this corridor.

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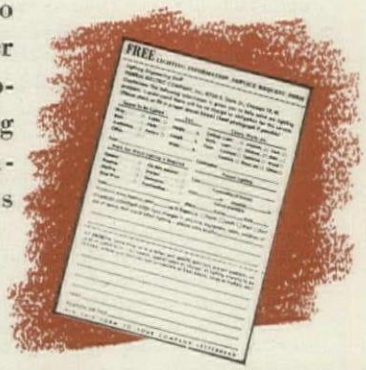
Popular demand for the many advantages of Zeon Cold Cathode Lighting has brought added responsibility to Federal Electric Company, Inc. With the rapid development of this modern illumination, it has become increasingly important, to the lighting industry as a whole, that fluorescent installations should provide the full benefits of glareless illumination, flexibility, and economy. To meet this responsibility, Federal Electric Company, Inc. is now offering Lighting Information Service.

Lighting Information Service

Lighting information service is designed to assist in planning installations so as to achieve the most effective results with fluorescent lighting. This Service offers the counsel of our lighting engineers. They will study your problem in detail. Based on 15 years' experience in the development of Cold Cathode Fluorescent Lighting, they will make recommendations that will assure your securing an installation properly designed to give you, to the fullest advantage, the flexibility, long life, and low maintenance cost possible with fluorescent lighting.

Make Use of Lighting Information Service

Submit your own problem in fullest detail, and let Federal Electric lighting engineers advise you. A photograph of space to be lighted will be helpful in clarifying your problem. Our engineers will recommend type, color, size, number of lamps; type, spacing, height of fixtures; loads, wiring, transformers required. Use their knowledge to perfect your layout. Lighting Information Service does not take the place of your architect, consulting engineer, or electrical contractor. It is designed to assist them—and you—to achieve the most effective results with fluorescent lighting. There is no obligation other than your cooperation in giving us full information to help us help you.



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LETTERS

(Continued from page 46)

thing to apologize for. Its editorial policy seems rational and responsive to the new cellular life emerging in the dead tissue of erstwhile moribund architectural concepts.

If Mr. Baldwin's addiction to period design is so incurable, he should open up editorial headquarters in Grant's Tomb and stop tampering with agencies that appear to be a compatible part of contemporary expression. . . .

HARRY SIMS BENT, *architect*
Los Angeles, Calif.

Forum:

My favorite contributor to your magazine, Roger Allen, could probably make something of the fact that although you saved 1,450 freight carloads of paper—the same page that notes this fact contains Mr. Baldwin's opinion on architectural thinking.

Opinions cannot be countered with opinions, but with facts. And the fact is that for over a decade at least no architectural school has been producing graduates who have not been influenced by the FORUM and look forward to its "brand of architectural propaganda." Right or wrong, in less than a generation it is doubtful if there will be draftsmen who could sympathetically detail a Georgian pediment. . . .

RICHARD BENNETT, *Professor of Design*
Yale University
New Haven, Conn.

Forum:

To my knowledge, this is the first time the publisher of an architectural magazine has achieved the distinction of being attacked. Now I feel in good company!

WILLIAM LESCAZE, *architect*
New York, N. Y.

Forum:

I have read Mr. Guy H. Baldwin's letter in your August issue with considerable interest and while I envy his silken prose, I find myself not in entire agreement with his views.

Architectural commentators and critics from Ruskin to Mumford have frequently not been practising architects. We don't know just how much this has hamstrung them, but it is conceivable that a greater breadth of vision and tolerance and, yes, even a keener perception of what is great architecture, has sometimes been shown by lay writers than by those who temporarily lay aside pencil for pen.

. . . As one who would be disappointed if your wide-awake magazine found newsworthy rehashed Renaissance, Romanesque, Gothic or even

(Continued on page 54)

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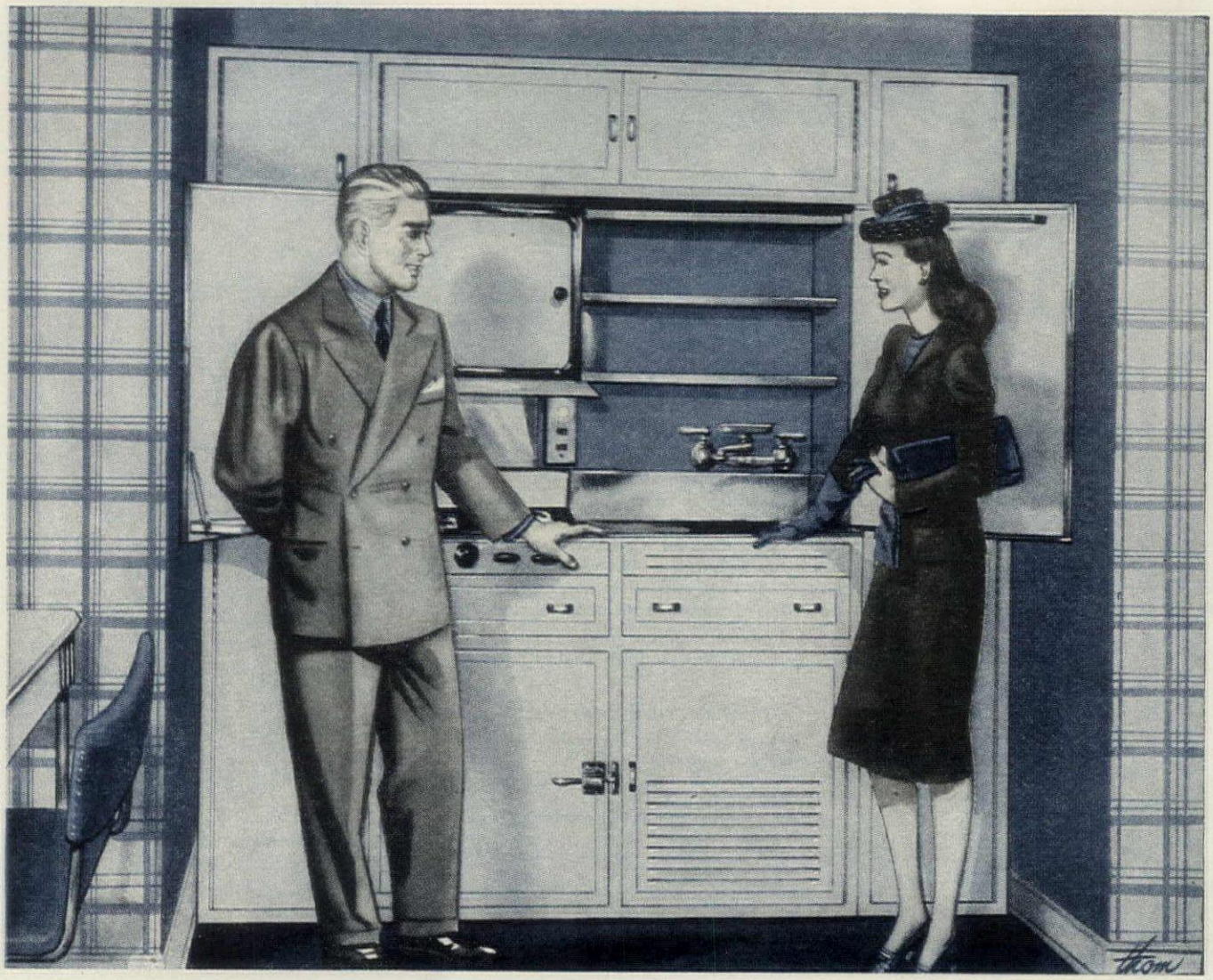

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PARSONS Pureaire KITCHEN

LETTERS

(Continued from page 50)

Colonial designs, may I timidly suggest that Mr. G. H. Baldwin does not necessarily reflect the views of all architects or members of the AIA.

ALEXANDER RICHTER, *AIA*
Washington, D. C.

MR. BALDWIN'S LETTER IS USEFUL IN GIVING US AN OCCASION TO EXPRESS OUR APPRECIATION OF THE FORUM AS A SOUND AND PROGRESSIVE MAGAZINE OF DEMONSTRATED USEFULNESS TO THE PROFESSION.

ELIZABETH B. MOCK
ELIOT F. NOYES
MUSEUM OF MODERN ART
NEW YORK, N. Y.

Forum:

. . . There are always people who do not understand the times, real values in life, nor that a magazine like the FORUM must continue its leadership.

PAUL LESTER WIENER
JOSE LUIS SERT
New York, N. Y.

Forum:

Thank you for your breadth and tolerance in publishing the hysterical letter from Guy H. Baldwin of Buffalo, N. Y.

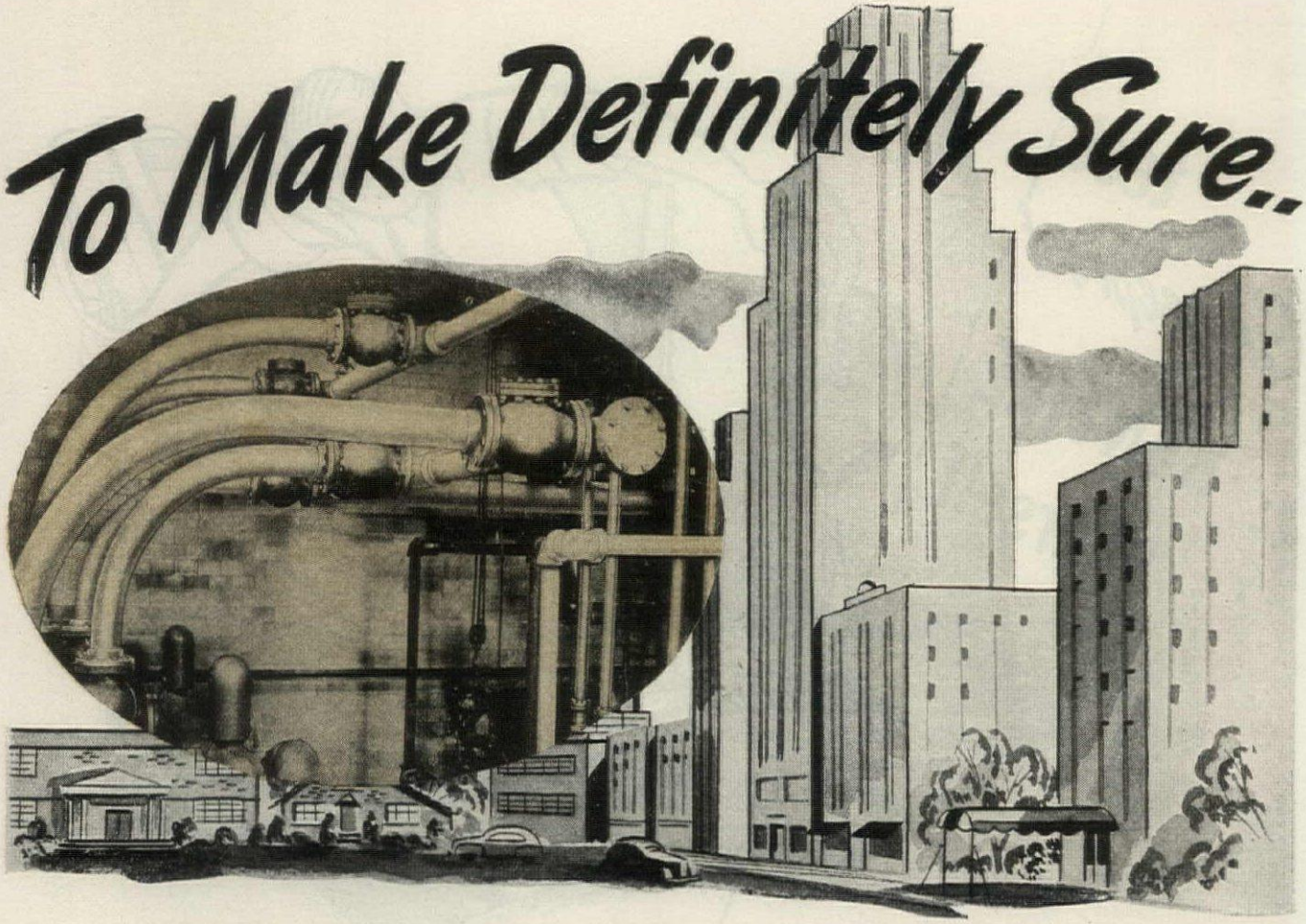
The broadening of the base of architecture in the years after it was jerked to its senses by the depression has been a great gain. This means that architecture is not regarded from the single facet of appearance, but includes the social and economic base, the relation of the building to its surroundings, its structural and building aspect, and lately even the question of time zoning for its purpose. The old world of laissez-faire and planlessness is necessarily giving way to these broader aspects. It is a reaffirmation that life itself — peoples' lives—is more important that the projects.

The cult of architecture formerly took pride in its remoteness. It was not accessible to the simple man — its joy seemed to be only in magnitude. Now that has all changed and no one has been more effective in bringing the change about than the FORUM. When I glance over the pages of these years, I see large and small; traditional and contemporary; exquisite and bold; lavish and minimum. Of one thing I am sure, and that is that you have covered the field. If Mr. Baldwin fails to find things to his admiration, it is possible that no longer are such things being built . . .

I want to express my appreciation for your leadership and to assure you I am one of a large group who do not agree in any way with Mr. Baldwin. Your

(Continued on page 58)

To Make Definitely Sure..



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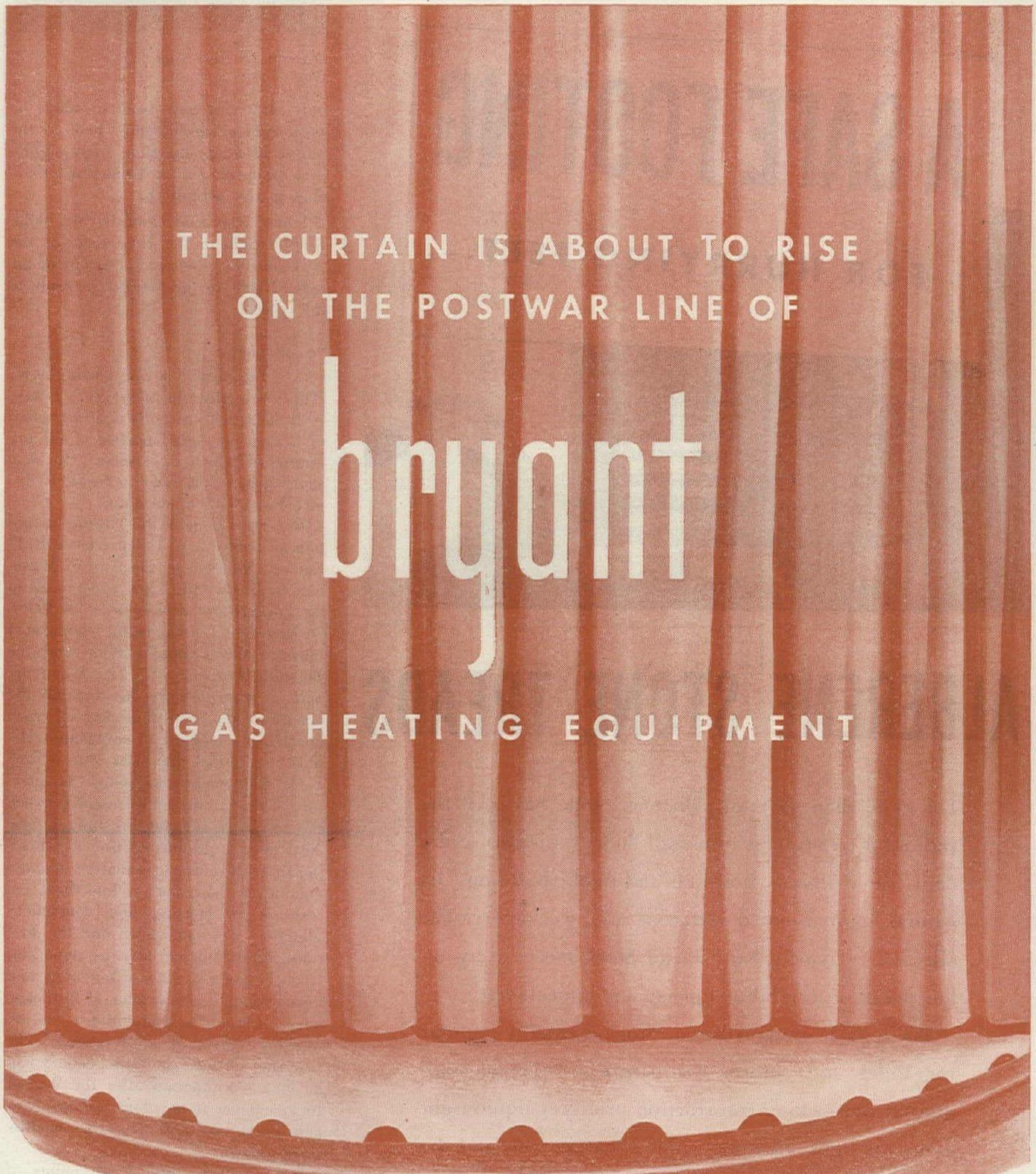

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LET THE PUP BE FURNACE MAN

LETTERS

(Continued from page 54)

only fault may have been to make the profession of architecture look to the public broader and more truly significant—more capable of leadership—than, alas, it may actually be.

I have also read carefully Mr. Baldwin's article in the June issue of the AIA *Journal*. Enclosed is a copy of the letter I sent to the *Journal* in reply to this article:

"Gentlemen:

. . . The author in one portion says: 'Mine is a plea for tolerance.' I have read the article carefully and fail to find in it even one small portion of the tolerance of which he speaks. His is a sharp, mean pen and the result is distorted and without substance.

He says: 'Imagine the "International School" concept of Independence Hall. Can we conceive of the City of Washington, D. C., torn down and rebuilt in the "progressive architecture" of 1926? Or President Truman being inaugurated between the Truman Trylon and the Pershing Perisphere?' *Yes*, I can imagine it with pleasure, for certainly the beautiful and real flowering of each epoch has something to contribute. His phrasing cannot depreciate the reality.

Mr. Baldwin speaks of the 'Architecture of Destitution' in Germany between the wars. It was in this liberal, pre-Nazi period, despite enormous difficulties, a truly modern, scientific and humanitarian base for architectural expression in housing and community planning was laid down for the first time. Might this not be more important from the point of view of humanity and history than the restoration of Williamsburg? I would call attention to the refreshing realism of our forebears. The Governor's Palace in Williamsburg had no longer a function after the War of Independence *so they took it down*. Now and again you find the same healthy spirit today.

It is right to publish all points of view in our *Journal*, but I sincerely hope a more liberal aspect will be forthcoming by some of the members who have literary ability and an open mind."

WILLIAM WILSON WURSTER, *Dean*
SCHOOL OF ARCH. AND PLANNING
MASS. INSTITUTE OF TECHNOLOGY
Cambridge, Mass.

Forum:

I have read with interest and some amusement a letter by Guy H. Baldwin, published in your August issue. I presume, from the general tone of this letter that the author is an architect, al-

(Continued on page 62)

Fire Can Start At A Pencil Point

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LETTERS

(Continued from page 58)

though there is little else in his communication which would tend to prove this. I do not know what narrow, little world Mr. Baldwin inhabits, nor why the environment of Buffalo should cause him to bury his head in the sands of the past. Most practicing architects know what goes on in the world around them and within their profession. Apparently, the writer of this letter does not—or else he is unwilling or unable to look around him.

Although the task may be a useless one, it is time that writers such as Mr. Baldwin were enlightened as to the architectural facts of life, both for their own sakes and that of the profession at large.

They should realize that there is a new, realistic and exciting architecture alive today! Today's architecture is based on common sense, hard-working research and a true sense of the beauty inherent in the use of good proportions, appropriate building materials, colors and equipment and a dash or two of that elusive ingredient called imagination. Above all, the new architecture is planned for contemporary life—not for an escapist historical pageant.

Today's architecture builds on the past, but does not copy its cast-off clothes. That is the resource of enfeebled talent, capable of little else but copy work; content to design out-of-date buildings because that happens to be the easiest way.

For the last 50 years, the progressive members of the architectural profession have fought to inform the public that theirs was an honest trade—that they were true builders—not eclectic exterior and interior decorators. Today, the fight is won! Only a few last-ditch practitioners such as Mr. Baldwin still continue to offer copyism as a substitute for architecture—with all the intellectual and moral dishonesty that this implies.

The fight has been won, but that the public is learning to know and judge true architecture, is not due to the sole efforts of the architectural profession. Were it not for the brilliant leadership of such magazines as the FORUM, the task would never have been accomplished. Its pioneering efforts, its constant search for the best in contemporary work and its capable, unbiased presentation of that work has been a source of inspiration to both the public at large and to the architectural profession. . . .

MORRIS KETCHUM, JR., *AIA*
New York, N. Y.

(Continued on page 66)

FOR A

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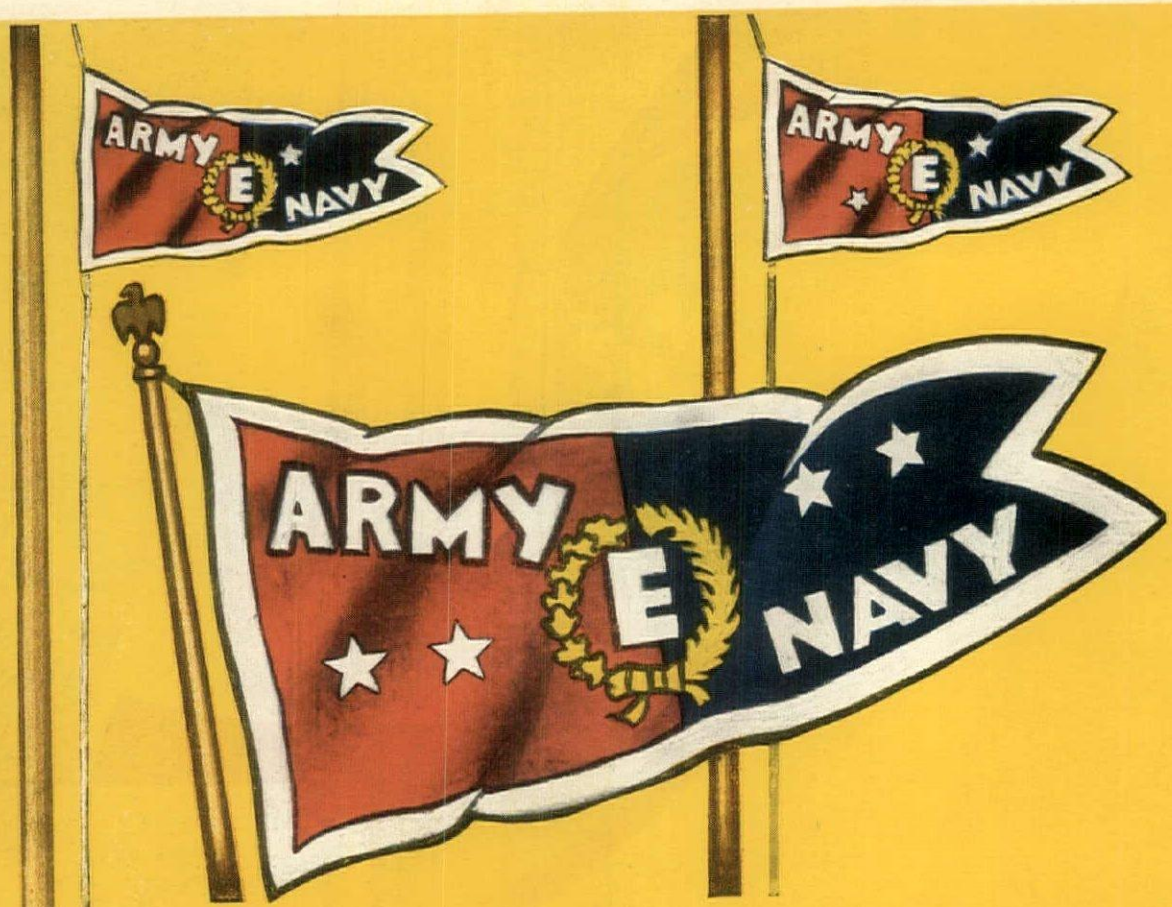

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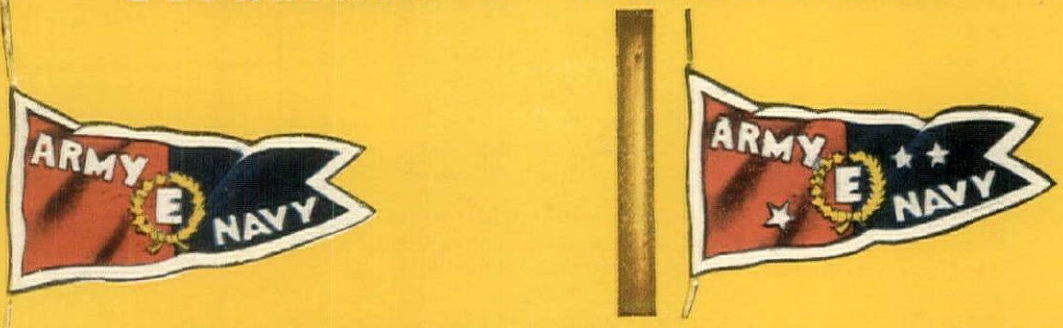

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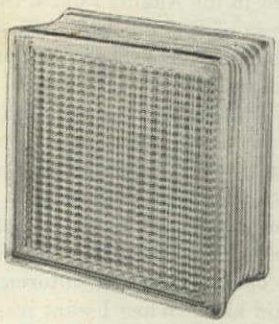

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LETTERS

(Continued from page 62)

HAS THE FORUM BEEN PUBLISHING MATERIAL FROM SOUTHERN CALIFORNIA? I HADN'T NOTICED. I WAS MERELY AWARE OF A VITAL, ALIVE, FRESH PRESENTATION OF HONEST THINKING IN ARCHITECTURE AND PLANNING RESULTING FROM A FEELING FOR THE MATERIALS USED AND THE PRESENT DAY PROBLEMS AT HAND. HOW FORTUNATE IF ONE COULD "CLOSE THE DOOR TO ALL" BUT ONE TYPE OF ARCHITECTURE"—GOOD ARCHITECTURE, WHICH WOULD SIMPLY BE THE RESULT OF SERIOUS EFFORTS TO FIND SOLUTIONS TO THE EVER-CHANGING PROBLEMS INVOLVED. AND WHEN IT COMES TO STYLING LET'S ATTACK THAT WITH ATOMIC FORCE INSTEAD OF GRAVESTONES. WITH THAT APPROACH THERE NEED BE NO FEAR OF SCARING CLIENTS AWAY. THE CLIENTS GENERALLY LEAD THE PROFESSION IN FORWARD THINKING ANYWAY—THEY ARE MERELY LACKING IN THE EXPERIENCE WHICH THE ARCHITECT MUST PROVIDE. KEEP UP THE GOOD "PROPAGANDA."

TIMOTHY L. PFLUEGER, *AIA*

San Francisco, Calif.

Forum:

Has Mr. Guy H. Baldwin read Ayn Rand's "*The Fountainhead?*" There is in it a character named Peter Keating who speaks Mr. Baldwin's language. I, for one, am grateful for the FORUM'S courageous leadership in showing us the way we should go rather than simply "giving the public what it wants."

I would suggest that Mr. Baldwin buy himself a copy of house plans at any magazine counter for 50 cents. Why bother to create anything newer and better if no one wants it anyway.

DOROTHY KUNI

Clayton, Mo.

Forum:

I have just read Guy H. Baldwin's letter . . . My opinion will be of no value to Mr. Baldwin for I did not go to school and am not a registered architect.

But I do practice architecture. I have been a Member of the American Society of Civil Engineers since 1909 and am now a life member. I have been a registered structural engineer in the State of Illinois since 1920. I have been continuously in various phases of the building business for 50 years.

And I think the FORUM is a fine publication and that its editors are to be congratulated on the quality of the magazine.

LOUIS J. HOTCHKISS, *Engineer*

Chicago, Ill.

Forum:

I have just read the letter [illegible] Baldwin, the working architect, in the August issue. In contrast I wish to congratulate you on your forward looking magazine . . .

Mr. Baldwin, his clients—and mine—would do well to realize that all that is Georgian does not glitter. Reactionary architects and reactionary clients would do well not only to read the FORUM, but to study it. Others do and enjoy it.

I would not be "curt, clear and complete" if I did not say that it would be a great loss to the architectural profession now at the beginning of a new era to lose the influence of the FORUM.

JOHN J. ROWLAND, *architect*

Kinston, N. C.

Forum:

I noticed in the August FORUM that a Mr. Baldwin of Buffalo, N. Y. had some uncomplimentary ideas about the FORUM and its editors.

He says: "The working architects of the U.S. need a commercial architectural magazine of the highest quality." From his subsequent enlargement [illegible] most I can gather is that he is looking for a glorified Sweet's Catalog, to which generous book I refer for information of a certain kind. When I want inspiration, glamour and latest "off-the-[illegible] information I want the FORUM.

Furthermore, as far as an editing an architect, I don't think it more important than for the architect be an editor. If I were to spend doing the FORUM'S job and it were to spend their time doing can well imagine what would (*Speak for yourself Jedd.*—E

In this period we are he there will undoubtedly be a architects who will try an world in forms and styles I don't see how any one ca the atomic bomb and co without realizing the gr bility thrown on the arch fession to bring its thin level that produced such scientific departure fro

I have been privilege hand just how the Fo say more power to you

JEDD STOW

New York, N. Y.

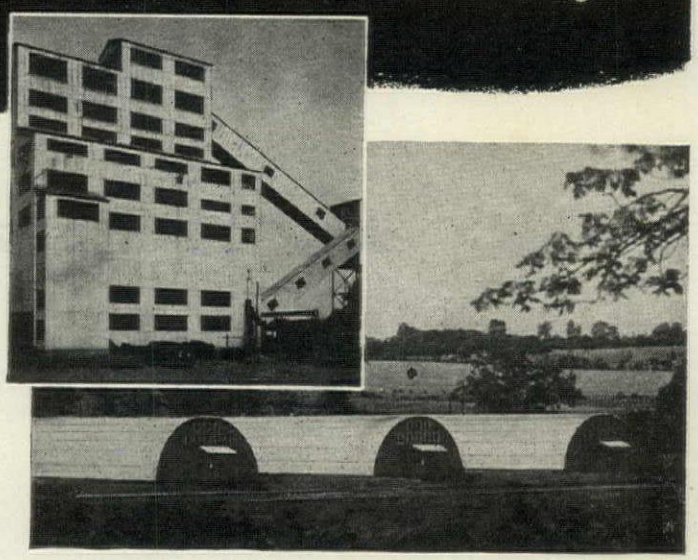
Forum:

Nothing really g opposition and cr I'm glad you pub letter. It reconfir FORUM is doing a tectural reportin

THOMAS D. CHU

San Francisco,

It's the ZINC *that Stops the Rust!*



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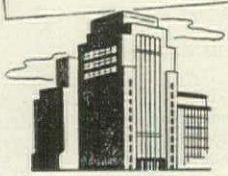

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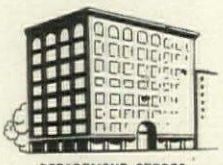

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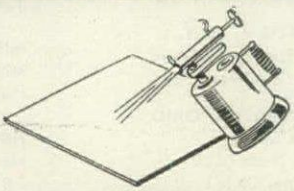

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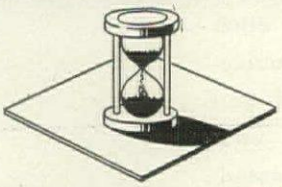

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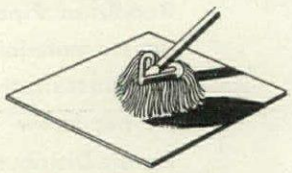

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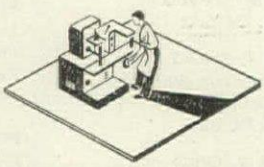
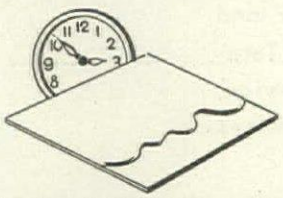


NON-SKID AROUND MACHINES



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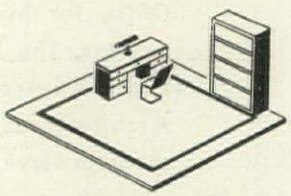

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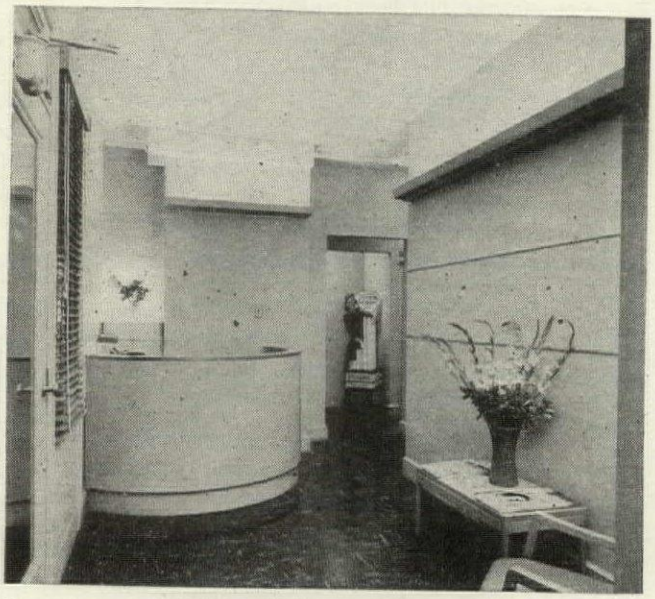
SYLVANIA NEWS
ARCHITECTURAL EDITION

OCTOBER *Published by* SYLVANIA ELECTRIC PRODUCTS INC., Salem, Mass. 1945



Reception room, Sylvania Lighting Center, 500 Fifth Avenue, New York City. Fluorescent lamps in cove along wall on the right give over-all illumination. Incandescent bulbs in shorter cove above desk brighten normally dark corner.

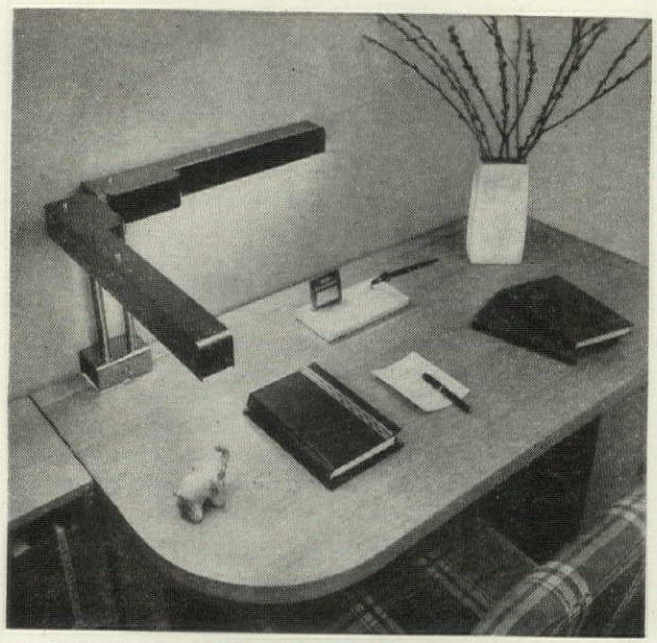
Looking for Lighting Ideas? See the New Sylvania Center

Sylvania Electric's display of model rooms at 500 Fifth Avenue (2nd Floor)—an exhibit of the newest in lighting ideas—may hold the answers to many of your fluorescent and incandescent illumination problems.

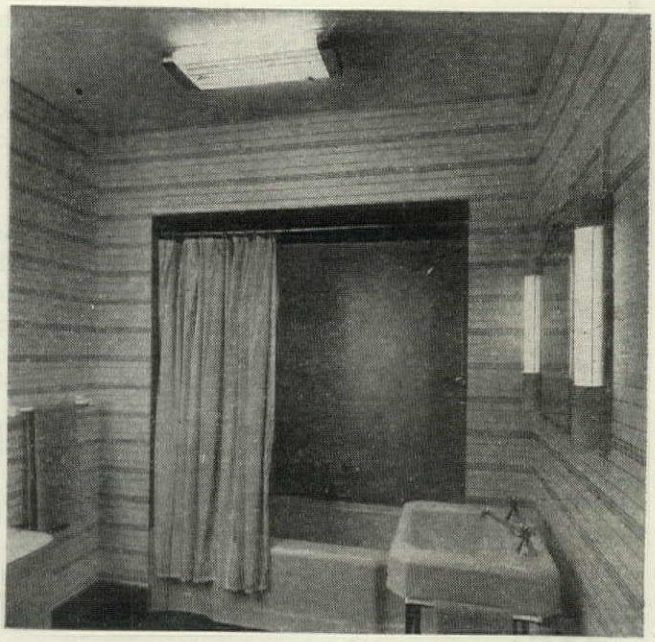
VARIOUS ROOMS DISPLAYED

The rooms pictured here are typical of the interesting lighting adaptations to be found in the various other sections of the display.

Accept Sylvania's cordial invitation to visit their Lighting Center—see the varied, new lighting installations of the home of the future.



Versatile Sylvania fluorescent desk lamp. Each arm swivels 90°, allowing light wherever needed. When not in use, they may be pushed flat against wall, conserving space and serving as wall decoration. Important trend.

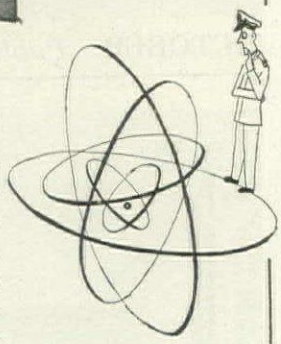


Note compact central fixture. Illustrates trend of designs in utility areas. Gives entire bathroom a soft, cool, shadowless light. Lamps on sides of mirror provide excellent illumination for shaving or applying makeup.

SYLVANIA ELECTRIC

MAKERS OF FLUORESCENT LAMPS, FIXTURES, WIRING DEVICES; ELECTRIC LIGHT BULBS; RADIO TUBES; CATHODE RAY TUBES; ELECTRONIC DEVICES

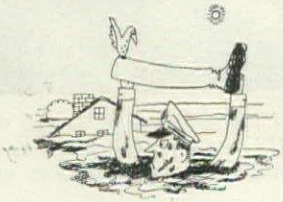
THE FORUM



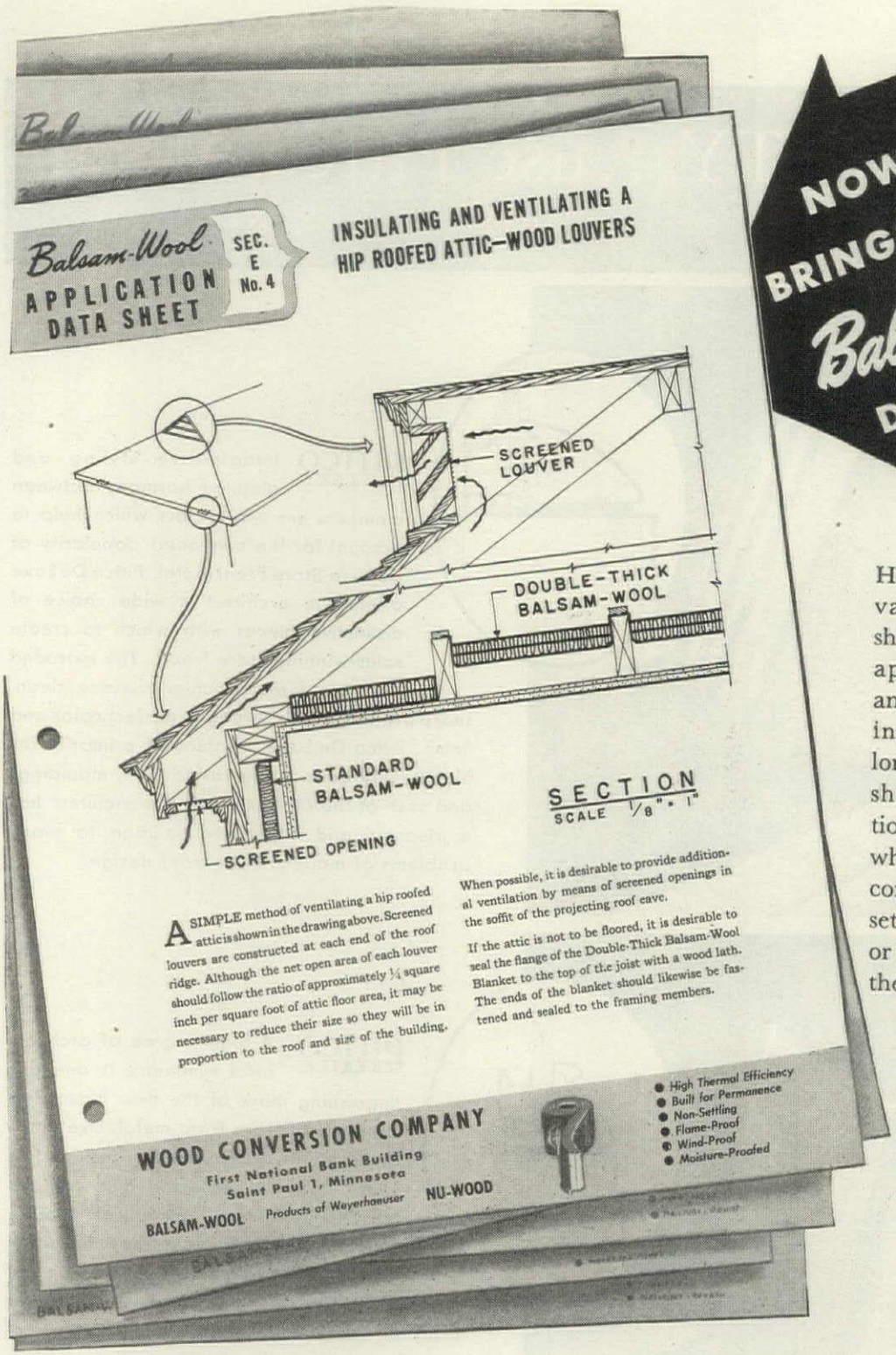
Teetering on the brink of the atomic age, we feel as though a cosmic rug had been pulled from under the familiar pattern of our small existence. Supermen are tramping the earth and Buck Rogers is astride the air-waves. To discover that one of the men connected with the release of this awful energy—Col. Kenneth D. Nichols, District Engineer of the Manhattan Engineer Works—is not a man from Mars or a mad scientist, shakes our new view of the universe. It is somehow incongruous that the atom's supervisor is a West Point graduate and a family man who enjoys a game of badminton in his uncosmic backyard.

John Merrill of Skidmore, Owings and Merrill is the man who invaded the Tennessee wilderness to design the secret city for 75,000 workers. When this dignified architect first arrived at Oak Ridge, he set up shop in the only shelter extant—a dilapidated farmhouse complete with outdoor plumbing. From this headquarters he, shirtless, tramped the knobby terrain, eating box lunches for lack of a restaurant. His dour report: "Nothing but scrub oak, ridges and chiggers!"

While the Oak Ridge men were undoubtedly the most close-mouthed bunch ever encountered by a building reporter, Maj. E. J. Bloch, construction boss, loomed above the rest, talkative as a man with lockjaw. But when the FORUM's researcher pursued her quest right into the Major's office, she glimpsed success for one breathless minute. Nervously glancing over his shoulder, Bloch left his desk, dialed a safe. Only the faintest murmer escaped our well-trained girl when the Major pulled out a package of Chesterfields, took one, quietly shut the safe.



The post of Executive Officer in charge of Central Facilities (design, construction, maintenance and management) has been occupied consecutively by Lt. Cols. T. T. Cranshaw and J. S. Hodgson. Although involved with the ultimate mastery of the universe, these men were unable to effect a victory over Oak Ridge's most primitive problem—mud. We like to think it was they who, in a fit of whimsey at nature's perversity, staged the enormous exhibit of mud-caked boots to be seen in the Town Center.



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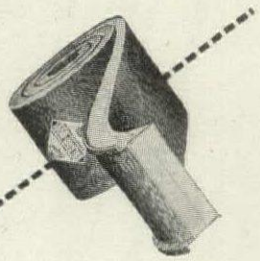

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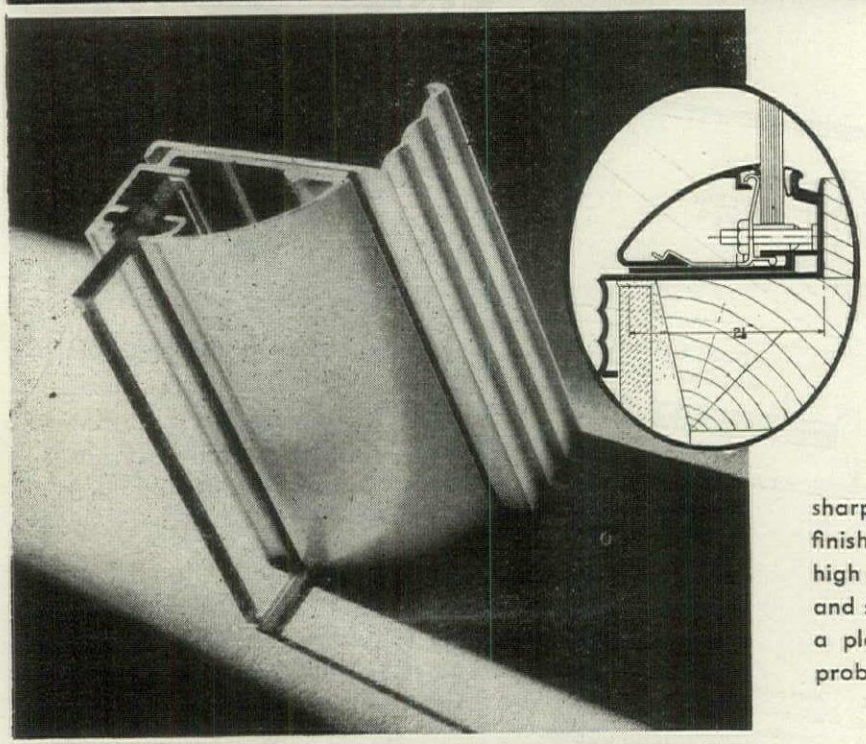
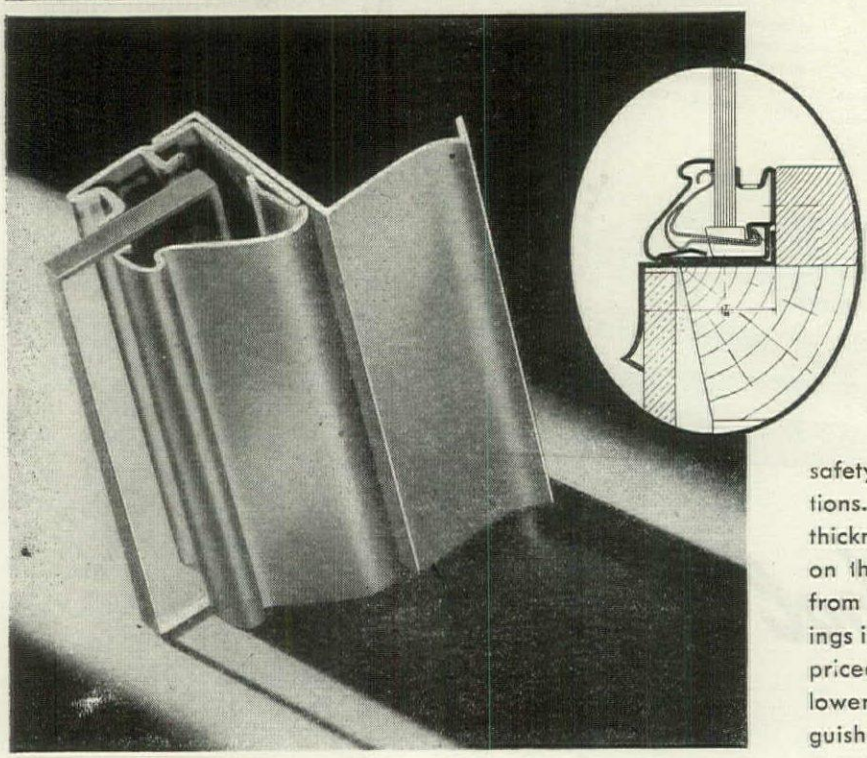


PITTCO DE LUXE Imaginative styling and planned harmony between members are two factors which help to account for the continued popularity of De Luxe Store Front Metal. Pittco De Luxe offers the architect a wide choice of distinctive pieces with which to create sales-winning store fronts. The extruded process of manufacture assures clean, sharp profiles, sturdy strength, perfect color and finish. Pittco De Luxe is intended primarily for high quality work. In the varied bars, mouldings and sash of the De Luxe line, the architect has a pleasing and impressive solution to many problems of modern store front design.



PITTCO PREMIER A high degree of architectural symmetry is one distinguishing mark of the new Pittco Premier line of store front metal. Like Pittco De Luxe, Pittco Premier was designed as a unit . . . each piece styled to complement and heighten the beauty of the other members with which it may be used. Pittco Premier construction can be set more quickly and easily, with greater safety to the glass than other metal constructions. The sash is self-adjusting to various glass thicknesses, yet always maintains a firm grip on the glass. All setting operations are done from the outside and effect a substantial savings in setting time. Pittco Premier is moderately priced, is light in weight, and provides a shallower reveal for show windows than its distinguished companion line.

PITTCO STORE FRONT METAL

PITTSBURGH PLATE GLASS COMPANY

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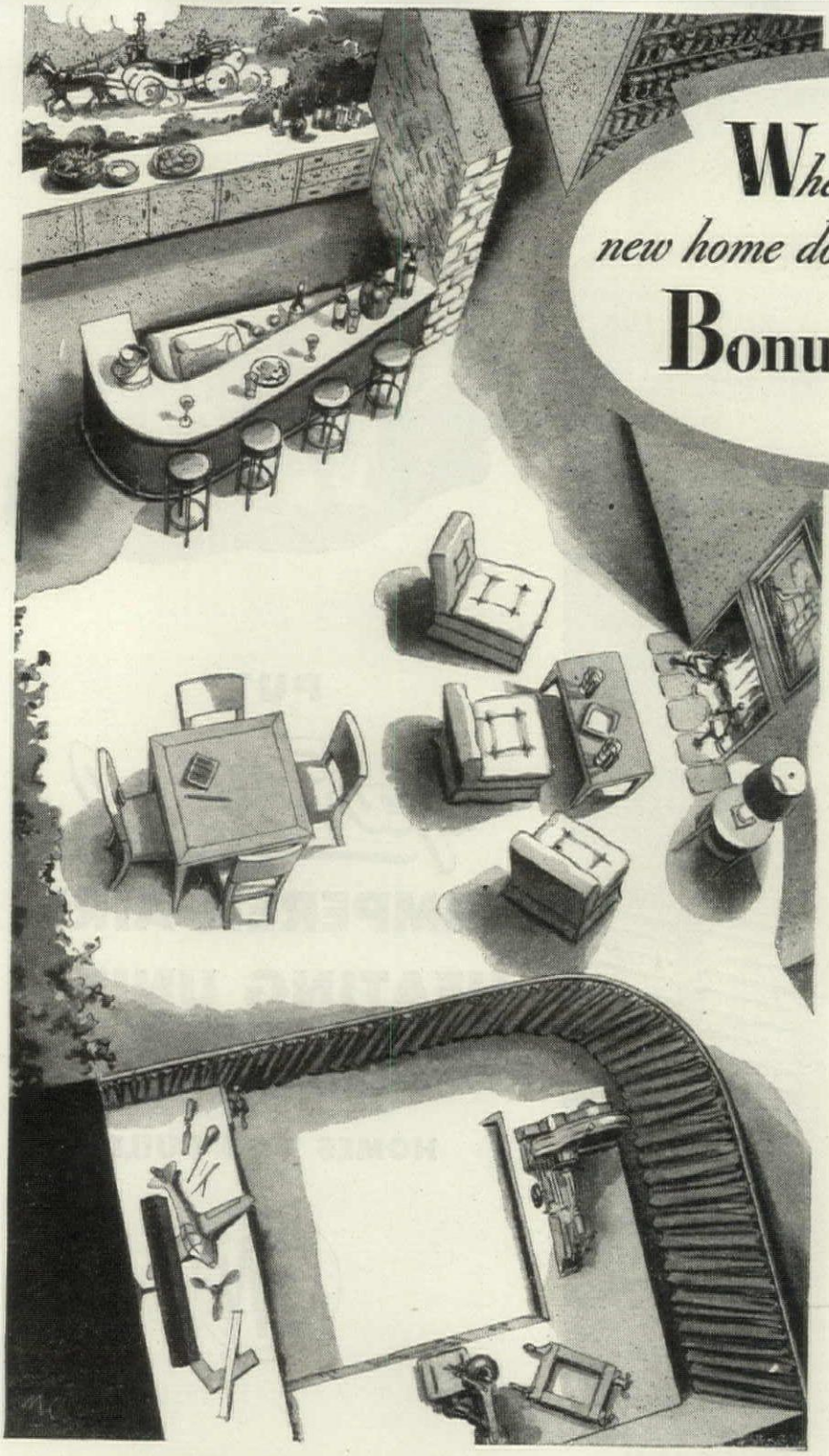

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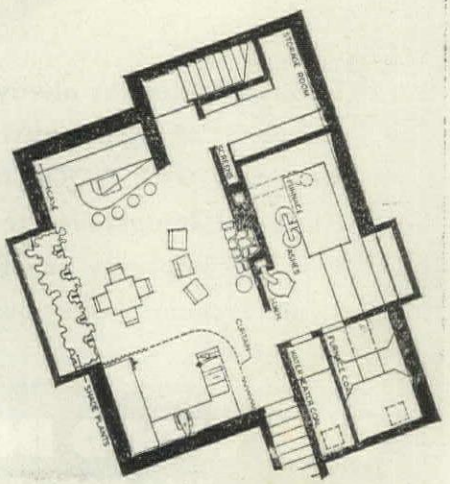
A WORD TO THE WISE! No matter what kind of fuel you now plan to use in your new home, *don't "build coal out."* For someday, when other fuels may become even more expensive, you may want to switch to the economy, comfort, and health advantages of heating with Bituminous Coal. So make sure your basement provides ample space for coal storage. And also be sure you get an adequate chimney—one with a flue big enough to handle Bituminous Coal as well as any other fuel. The extra cost of such a chimney flue is small—only about $16 for the average 7-room house.



ARCHITECT: STEPHEN J. ALLING, CINCINNATI, O.

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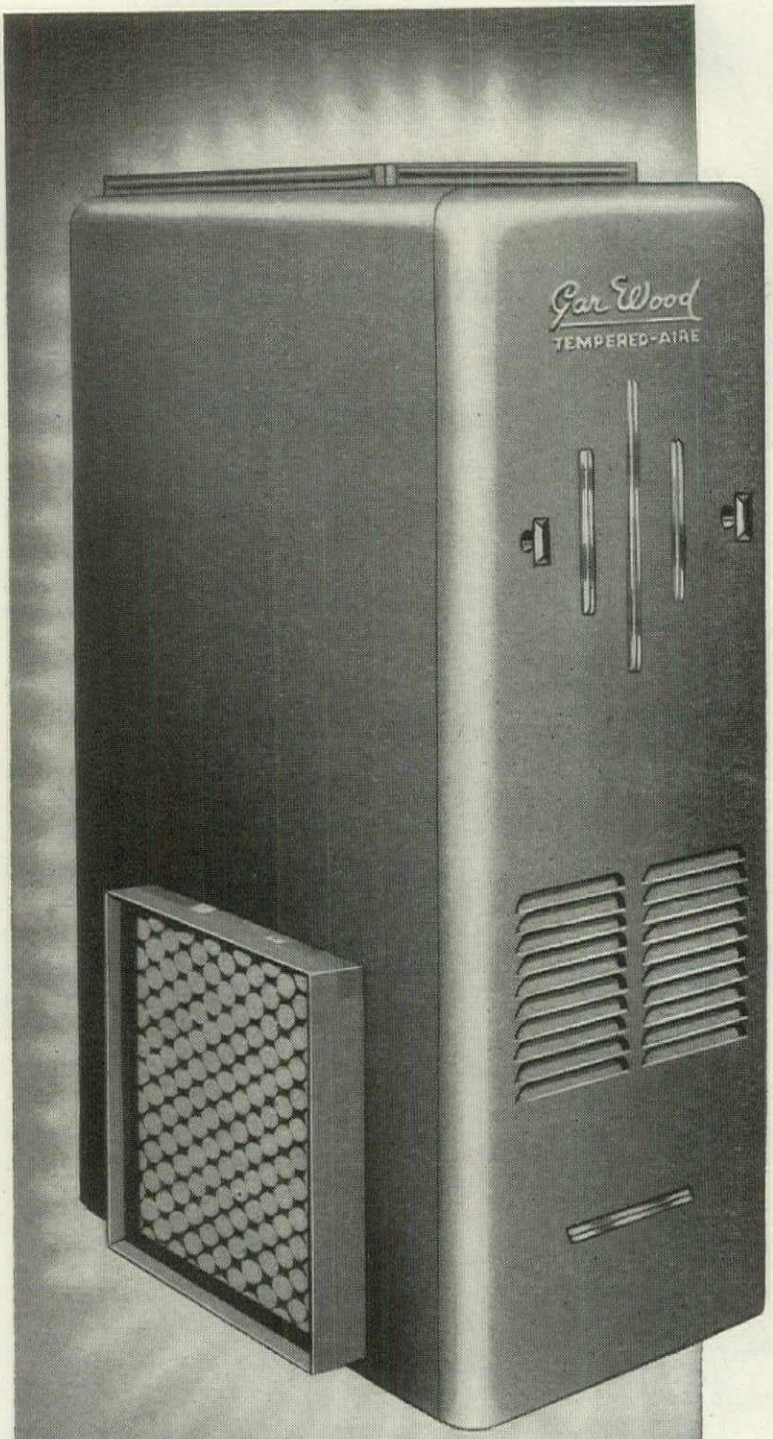
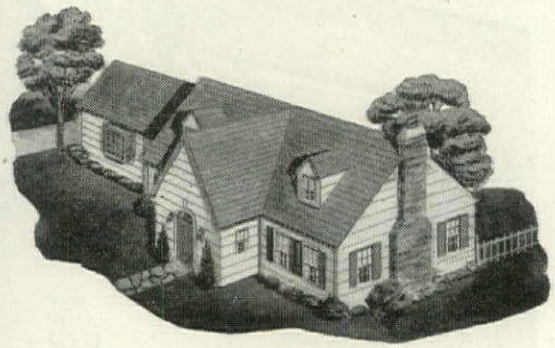
(This is one of a series of advertisements now appearing in home-makers' magazines)





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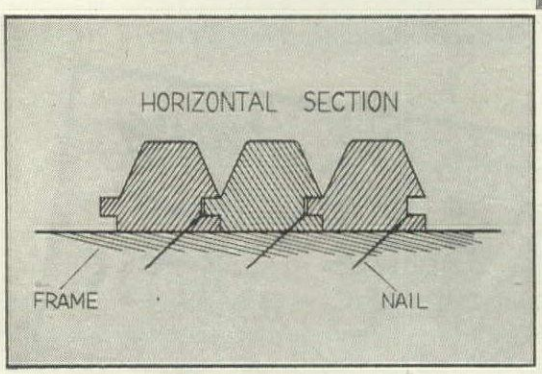

One of the new and interesting treatments to which Mahogany lends itself so readily is the Fluted effect exemplified in the doorway shown here. At the left, the working drawing shows the simple details of how this is obtained. Architect: Schmederer and Augenfeld.

Write for your copy of the informative Mahogany booklet.

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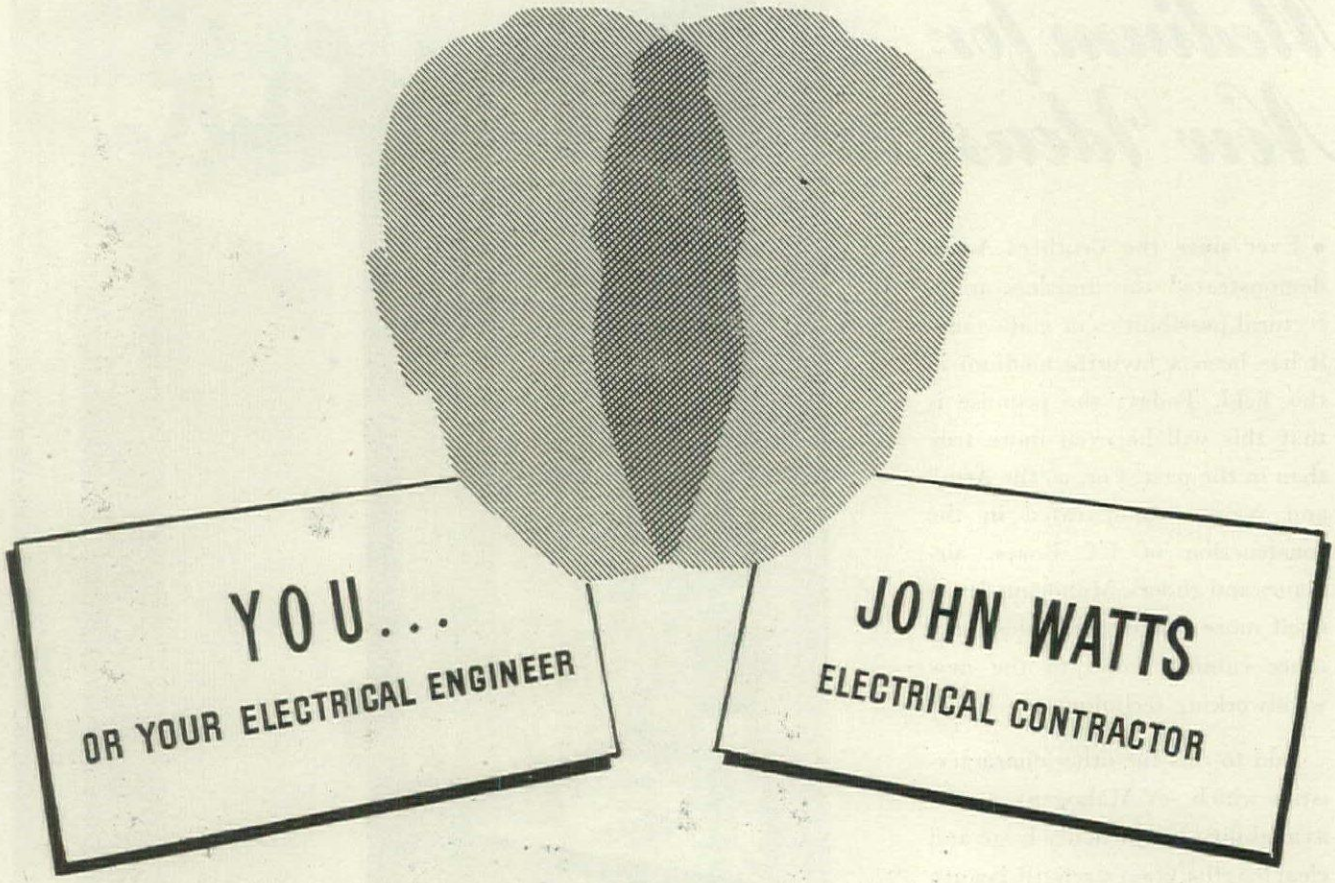

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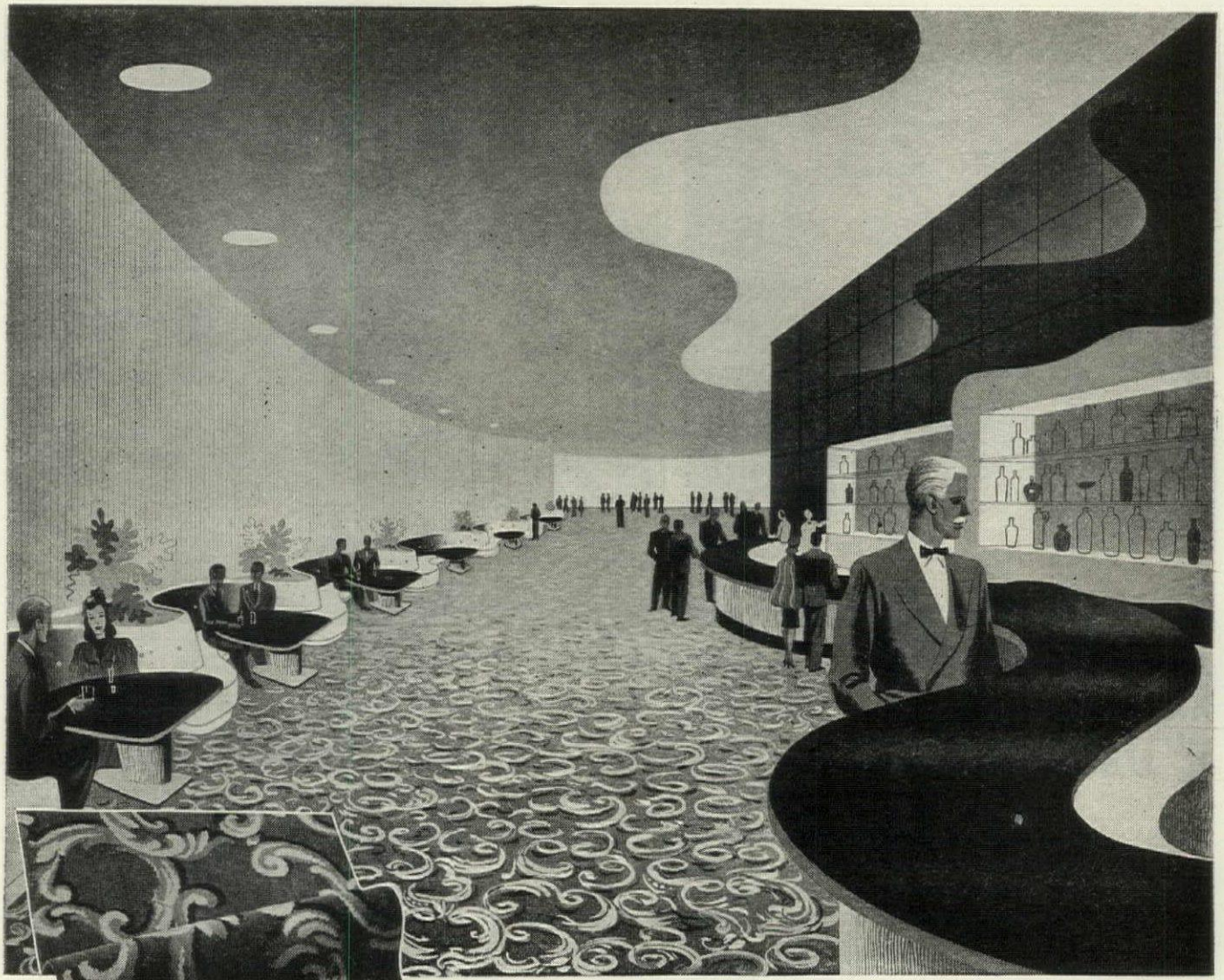
Yes, "John Watts" offers you valuable help on plans for wiring, lighting, signaling, and electrically driven apparatus — for industrial, commercial, or residential building.

You get the newest and best in everything electrical when you work with "John Watts", because well-informed contractors everywhere get their electric supplies and tools via Graybar. *Graybar Electric Company, Graybar Building, New York 17, N. Y.*

4581

IN OVER 80 PRINCIPAL CITIES

GOOD POSTWAR PLANNING DESERVES GOOD CARPET PLANNED BY BIGELOW



One of many smart Hartford Saxony designs Bigelow is developing for the forward-planning architect

During this period of significant plans for the future, Bigelow Carpet Counsel has been busy. Outstanding patterns in beautiful colors, rich new textures and weaves are being developed to play an important role in contributing to the beauty of postwar interiors.

When Bigelow contract carpet again is available, Carpet Counsel not only will have the right carpet for the right spaces, but will be ready to help you with expert advice that will save time and money on your carpet installation.

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OCTOBER 1945

HOUSES

HOUSE NEAR MEMPHIS, TENN. A luxurious modern home designed for year-r

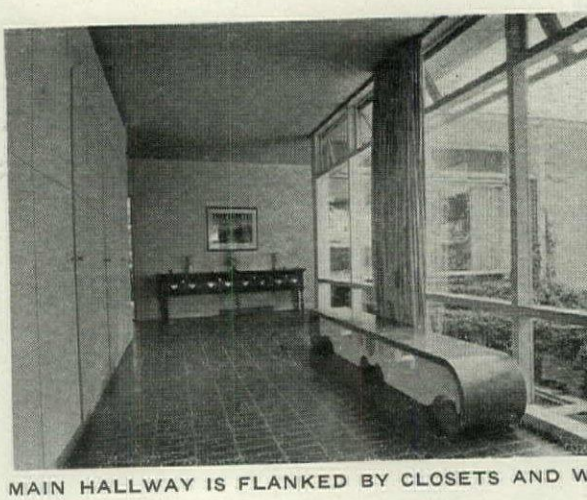
Photos: Tom L

SOUTH FACADE HAS WIDE OVERHANGS AT ROOF AND SECOND FLOOR TO PROTECT HOUSE FROM HEAT OF SUMME

Completed in 1942, this large house occupies a wooded farm land site near Raleigh, Tenn., 15 miles north of Memphis. Orientation of principal rooms is to the south, and care has been taken to provide shade and cross ventilation for the summer months. The owner had no predilection for a modern house at the start, but is now very glad the architects persuaded him to pursue such a course.

A rambling plan permits the house to express directly the various functions of its parts. Circulation is given an unusual amount of space, ornamented by wide windows opening toward the entrance court. Two living rooms—one facing south for winter use and informal activities, one with windows to north and east for more dignified entertaining—are an unusual feature in a modern plan. An entire wing has been devoted to the boys of the family and their nurse, with access directly to the grounds from each room—an arrangement affording more freedom for the youngsters and less noise for their elders. Ample storage closets along the halls are supplemented by cedar-lined spaces in the basement.

The traditional low-hipped roofs, red brick walls, and white wood trim of the region are used on the exterior, but in a manner consistent with the modern plan. Relief from too much brick is provided by shiplap siding of painted cypress, and roofs are of white asbestos shingles.

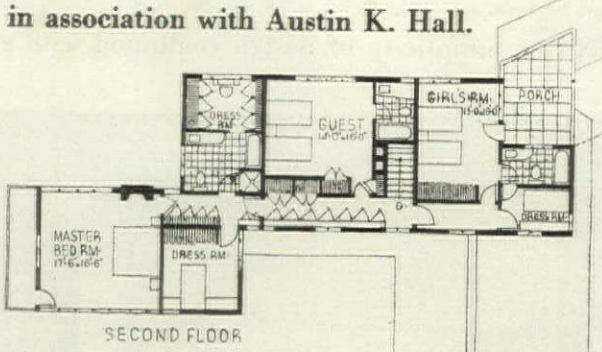


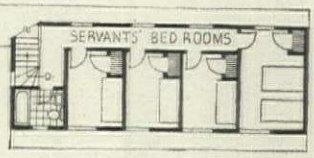
MAIN HALLWAY IS FLANKED BY CLOSETS AND W

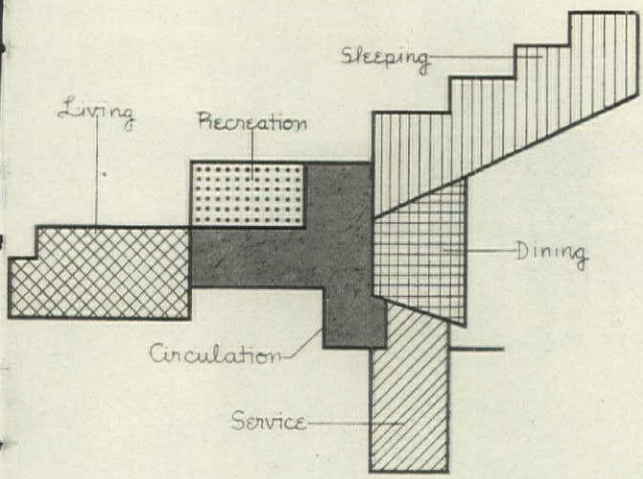
ENTRANCE IS BY COVERED WALKWAY FROM TURN

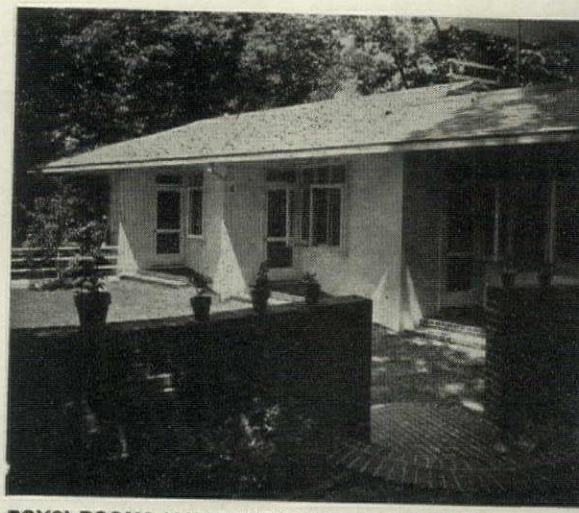
ving by Architects Bernard J. Harrison and Vincent Furno

in association with Austin K. Hall.

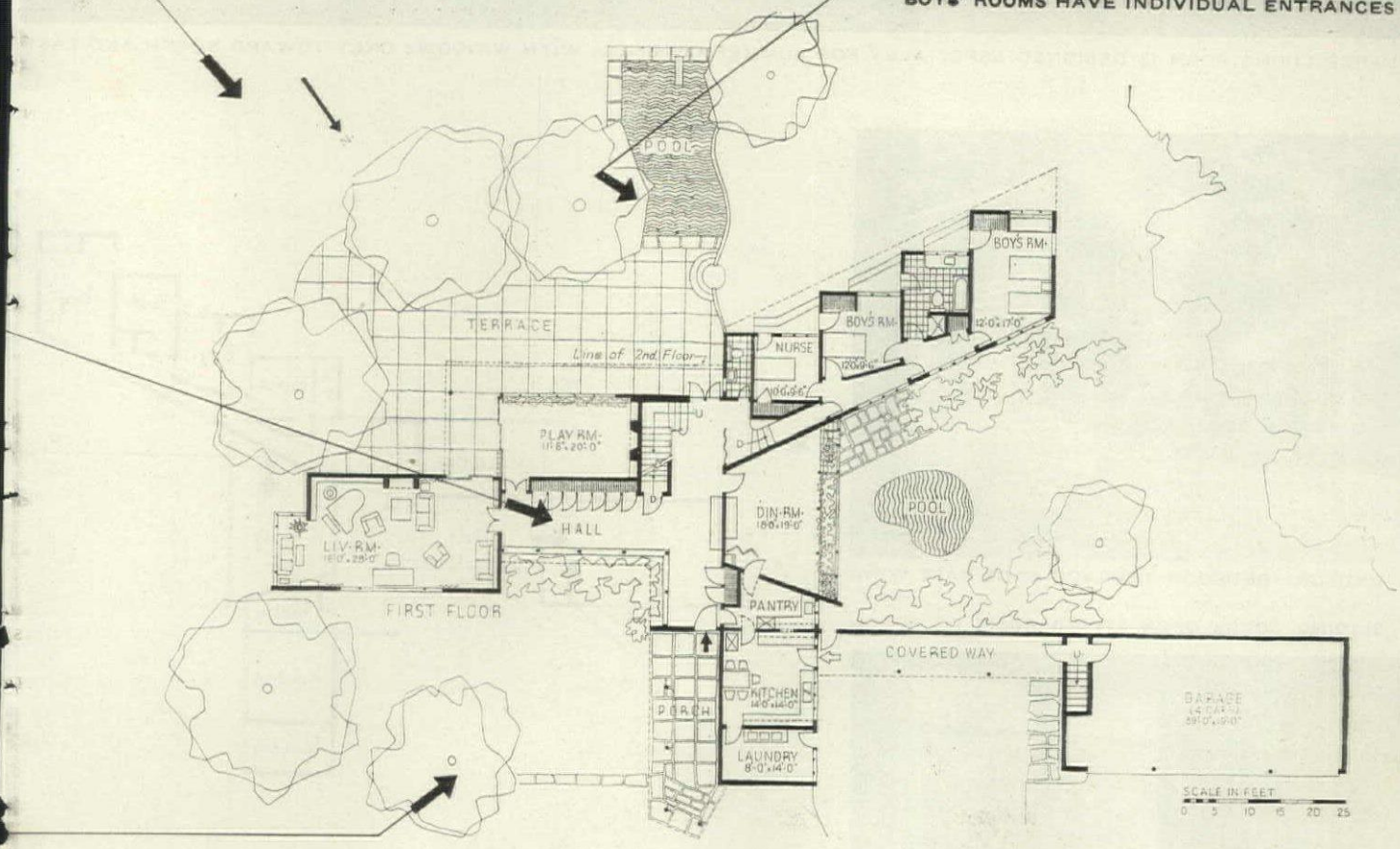








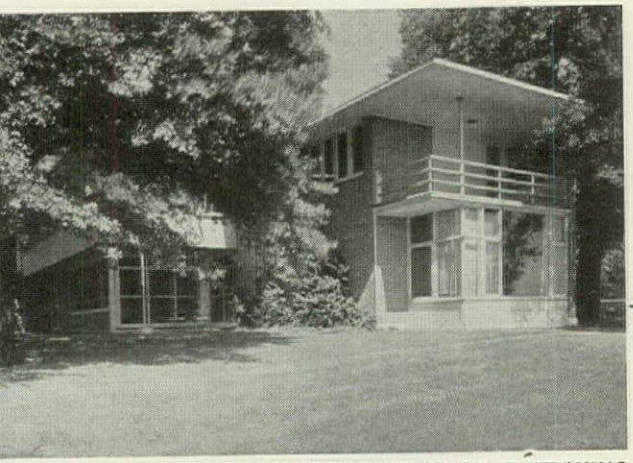
BOYS' ROOMS HAVE INDIVIDUAL ENTRANCES



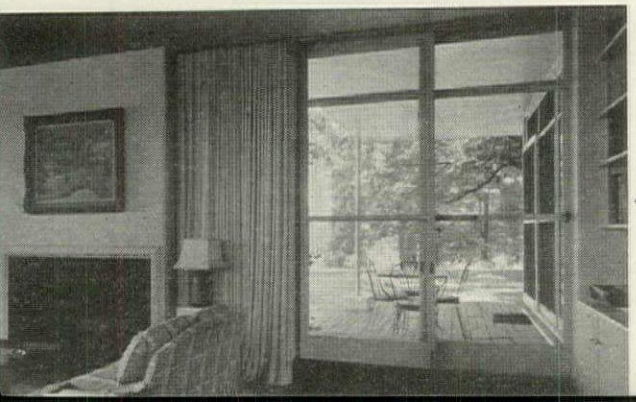
HOUSE NEAR MEMPHIS, TENN. Simplicity of design combined with generous size creates a

Photos: Tom Leonard

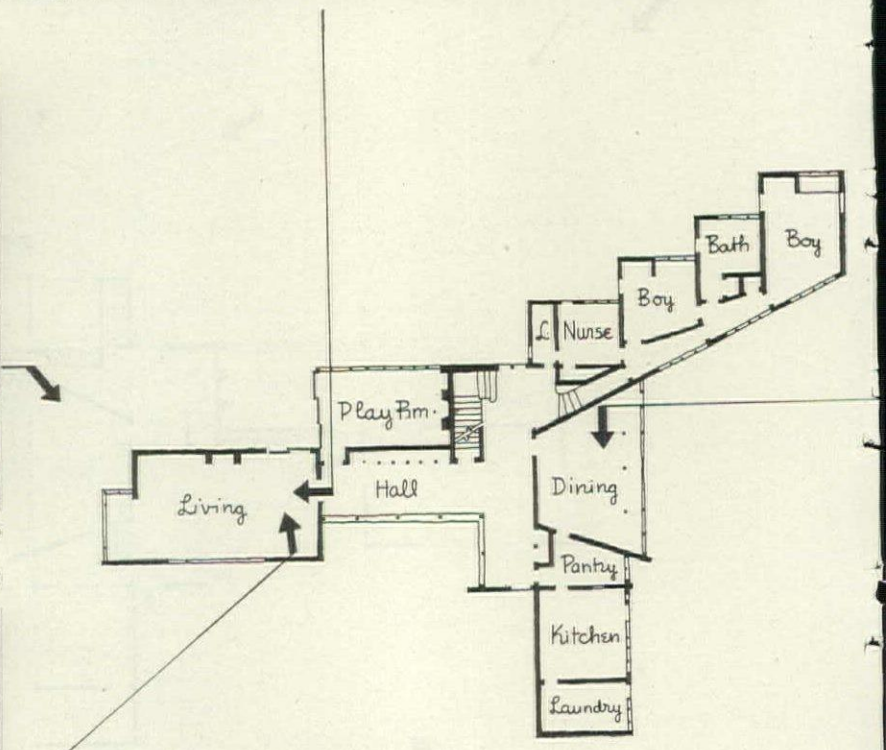
LARGE LIVING ROOM IS DESIGNED ESPECIALLY FOR SUMMER COOLNESS WITH WINDOWS ONLY TOWARD NORTH AND EAST



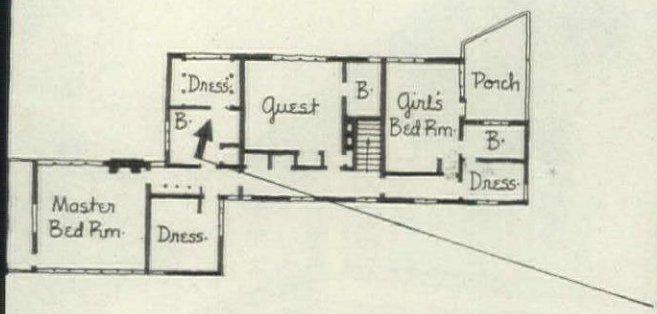
UNUSUAL BEDROOM TERRACE ENDS EAST WING

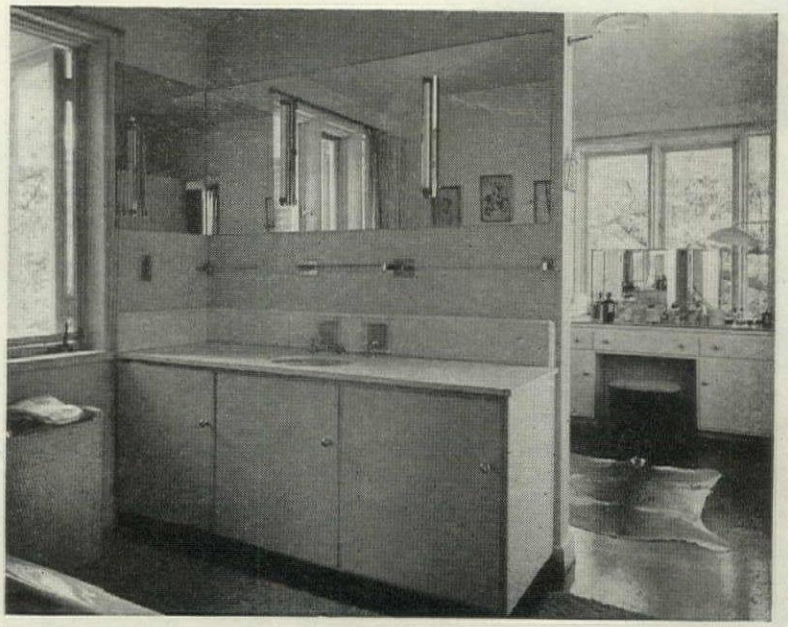


SLIDING DOORS OPEN LIVING ROOM TO PORCH



ppropriate background for the owner's collection of antique furniture.

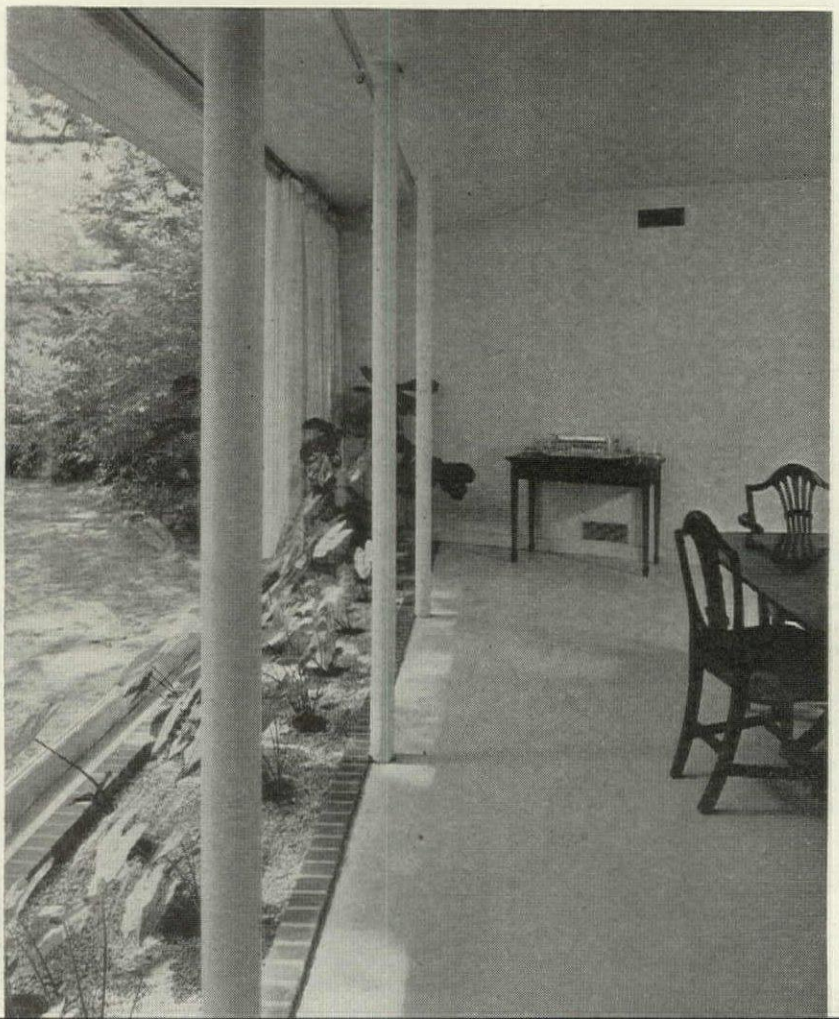




MASTER BATH ADJOINS DRESSING ROOM. CLOSETS ENCLOSE BASIN

The majority of interior wall surfaces are of unpainted plaster, enlivened by areas of light-colored plywood. A pleasing feature of the living room is the east alcove, walled on two sides by windows and especially inviting as a sunlit spot on winter mornings. White rubber tile flooring in the dining room repeats the color of its walls and ceiling. Waxed cork furnishes a warm and waterproof floor covering for the baths and their adjacent dressing rooms. Drapery and upholstery materials are by Dan Cooper.

DINING ROOM PLANT SPACE HAS COVE LIGHTING FROM COLUMN LINE

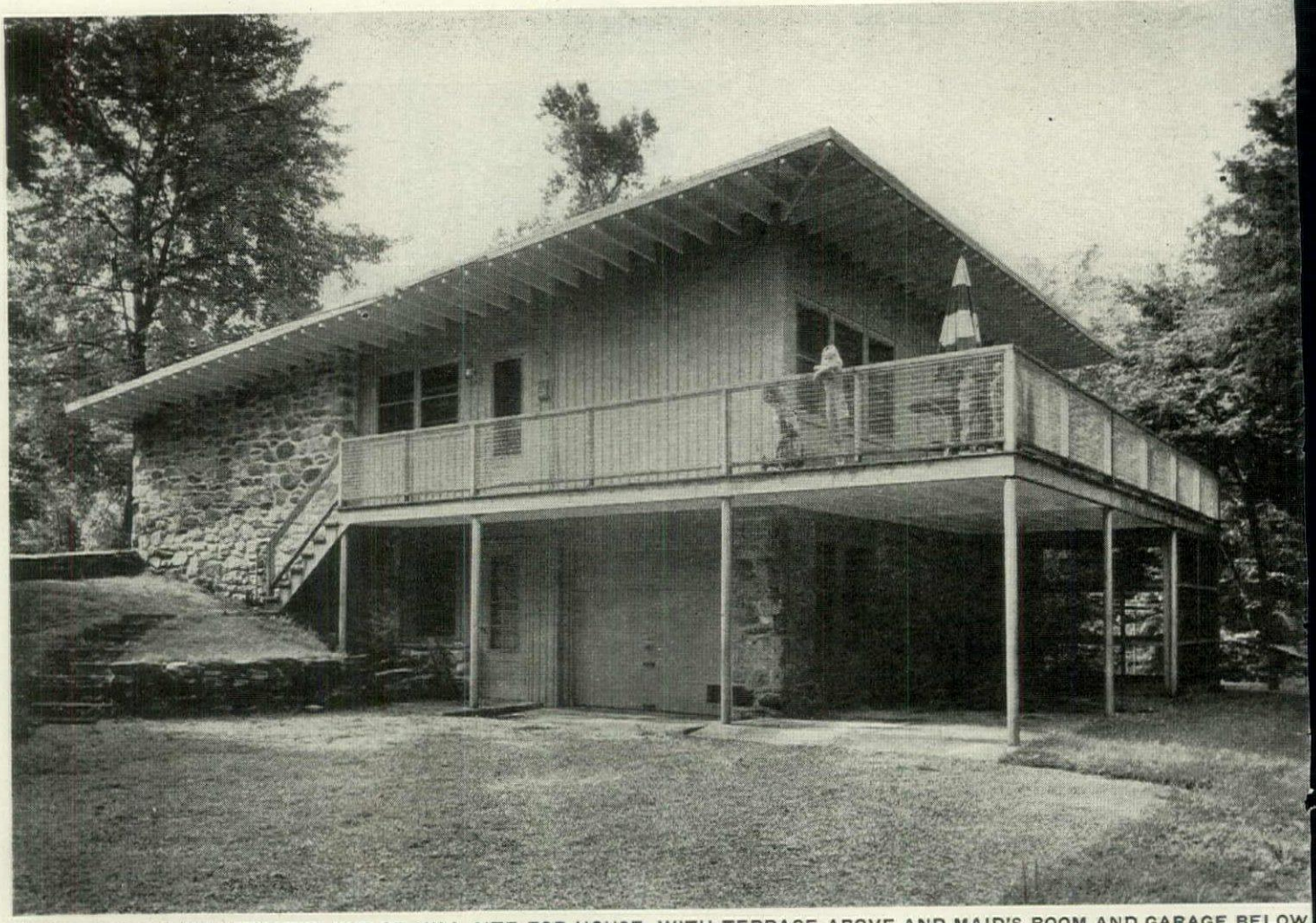


CONSTRUCTION OUTLINE

FOUNDATION—poured concrete, membrane waterproofing. STRUCTURE: Exterior walls — cypress clapboard siding, sheathing, studs, plaster or plywood. FLOORS—wood joist, subfloor, walnut veneer, oak, and brick finish. ROOF—white asbestos shingles; kitchen, garage, etc.—corrugated iron. Deck—tar and gravel on built-up. INSULATION: Outside walls and roof — aluminum foil. SHEET METAL WORK: Flashing and leaders—copper. Gutters—wood. Ducts—galvanized iron. WINDOWS: Sash—cypress. Glass—plate. STAIRS—oak. FLOOR COVERINGS: Dining room—rubber tile. Kitchen—linoleum. Bathrooms—cork. WALL COVERINGS: Living room—gum plywood. Bedrooms—plaster and plywood. GARAGE DOORS — Overhead Door Co. HARDWARE—Schlage Lock Co. ELECTRICAL INSTALLATION: Wiring—BX. Fixtures—Kurt Versen. BATHROOM EQUIPMENT—Crane Co. HEATING AND AIR CONDITIONING: Oil burner, filtering and humidity control with air conditioning. Regulator — Minneapolis-Honeywell Regulator Co.

HOUSE NEAR STAMFORD, CONN. A shed roof and a rocky slope are cleverly com

Photos: P. A. Dearbo



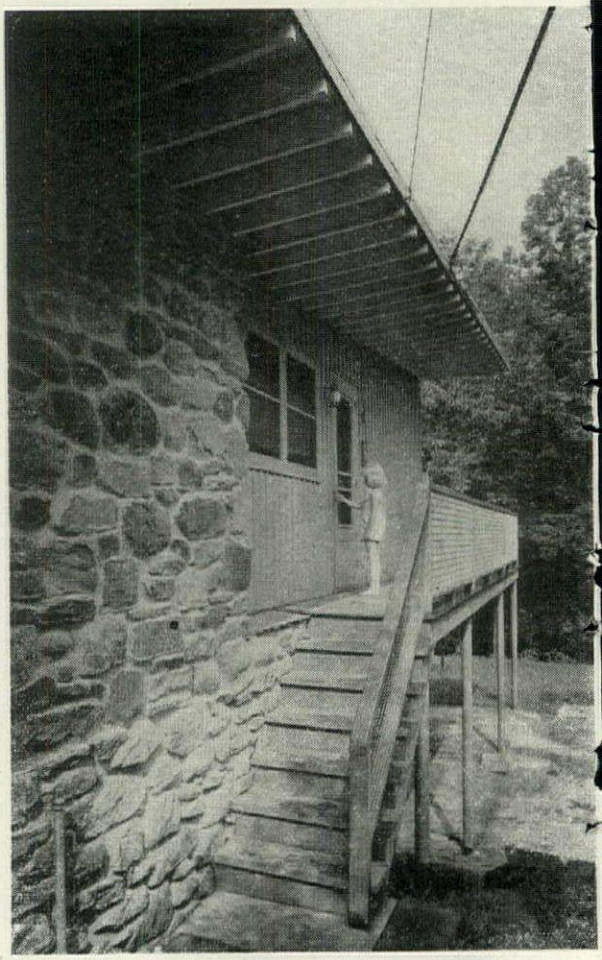
NORTH FACADE ILLUSTRATES USE OF HILL SITE FOR HOUSE WITH TERRACE ABOVE AND MAID'S ROOM AND GARAGE BELOW

It is unusual when man and wife are both sculptors, and real news when they collaborate on the design of their own home. The Bargers have taken a rough, two-acre, wooded lot, sloping to a small stream in the center, and created a modest house that serves their needs and uses the site to real advantage.

The broad shed roof extends from a low intimacy in the bedrooms to a more formal height in the living room. An open terrace overlooks a picturesque woodland stream to the west, while the house itself serves as a shield from the public highway to the east. The two upper bedrooms share a single bath, and the kitchen is well placed for serving food and supervising children. Heat is supplied by a distribution system from the central fireplace, abetted by a furnace. Sheltered space on the lower level is useful for rainy day playing by the children and adaptable to later expansion.

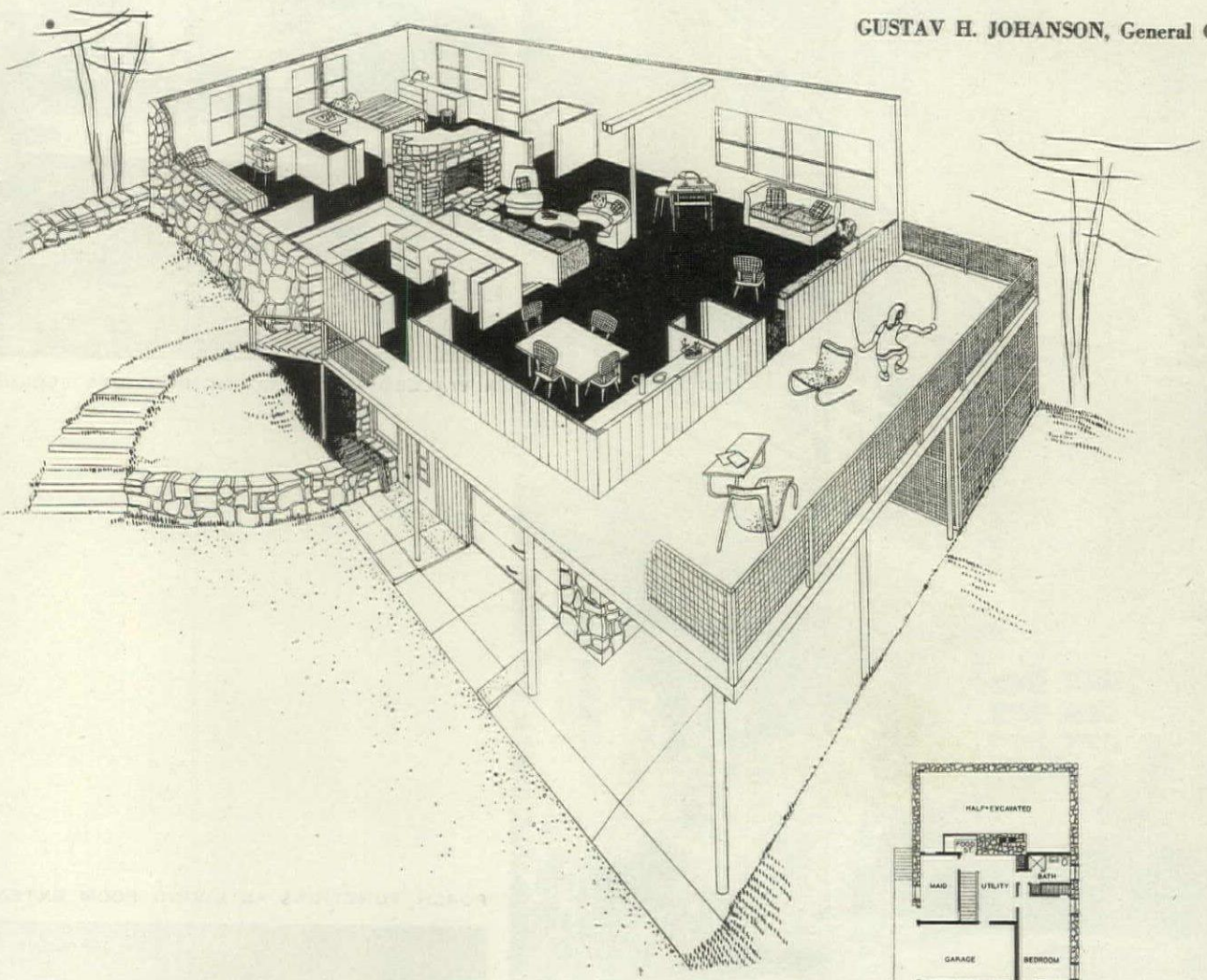
CONSTRUCTION OUTLINE: FOUNDATION—stone. STRUCTURE: Exterior walls—frame, stone veneer, vertical siding, half-round battens over joints. Interior—wood paneling and plaster. Floors—oak. ROOF—4-ply built-up asphalt. INSULATION: Outside walls and roof—mineral wool. FIREPLACE: Damper—Heatilator Co. SHEET METAL WORK: Flashing and leaders—copper. Gutters—fir. Ducts—galvanized iron. WINDOWS: Glass—double strength, Pittsburgh Plate Glass Co. FLOOR COVERINGS: Kitchen—linoleum, Armstrong Cork Co. Bathrooms—tile. PAINTS—Pittsburgh Plate Glass Co. GARAGE DOORS—Overhead Door Co. ELECTRICAL INSTALLATION: Wiring—BX. LAUNDRY EQUIPMENT: Washing machine—Bendix Home Appliances, Inc. BATHROOM EQUIPMENT: American Radiator-Standard Sanitary Corp. HEATING—winter conditioning system, York Corp. heaters. Regulator—Minneapolis-Honeywell Regulator Co.

STONE, BOARDS AND RAFTERS CREATE TEXTURES



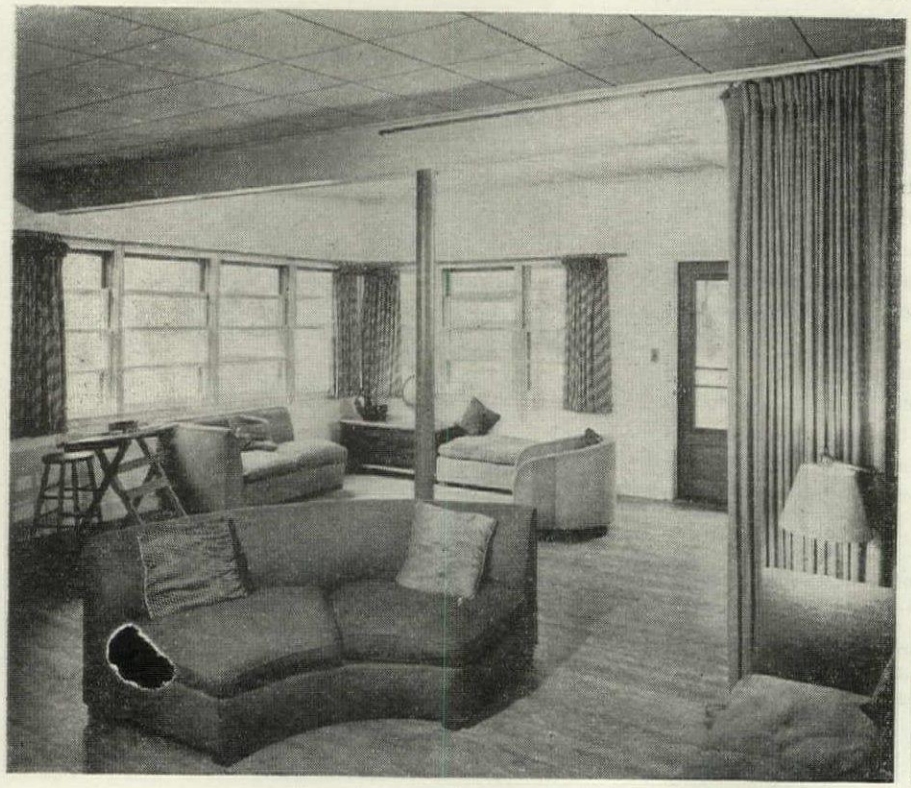
bined by Mr. and Mrs. Raymond Barger in a design for their own home.

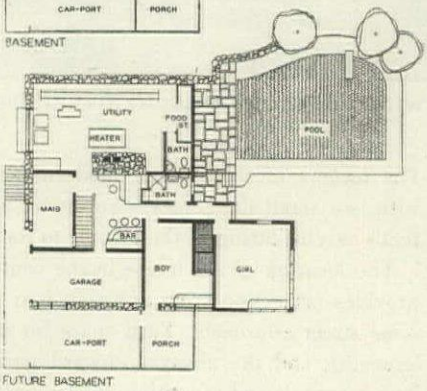
GUSTAV H. JOHANSON, General Contractor



BASEMENT

BIG LIVING ROOM SERVES FOR WORK AND PLAY OF ADULTS AND CHILDREN



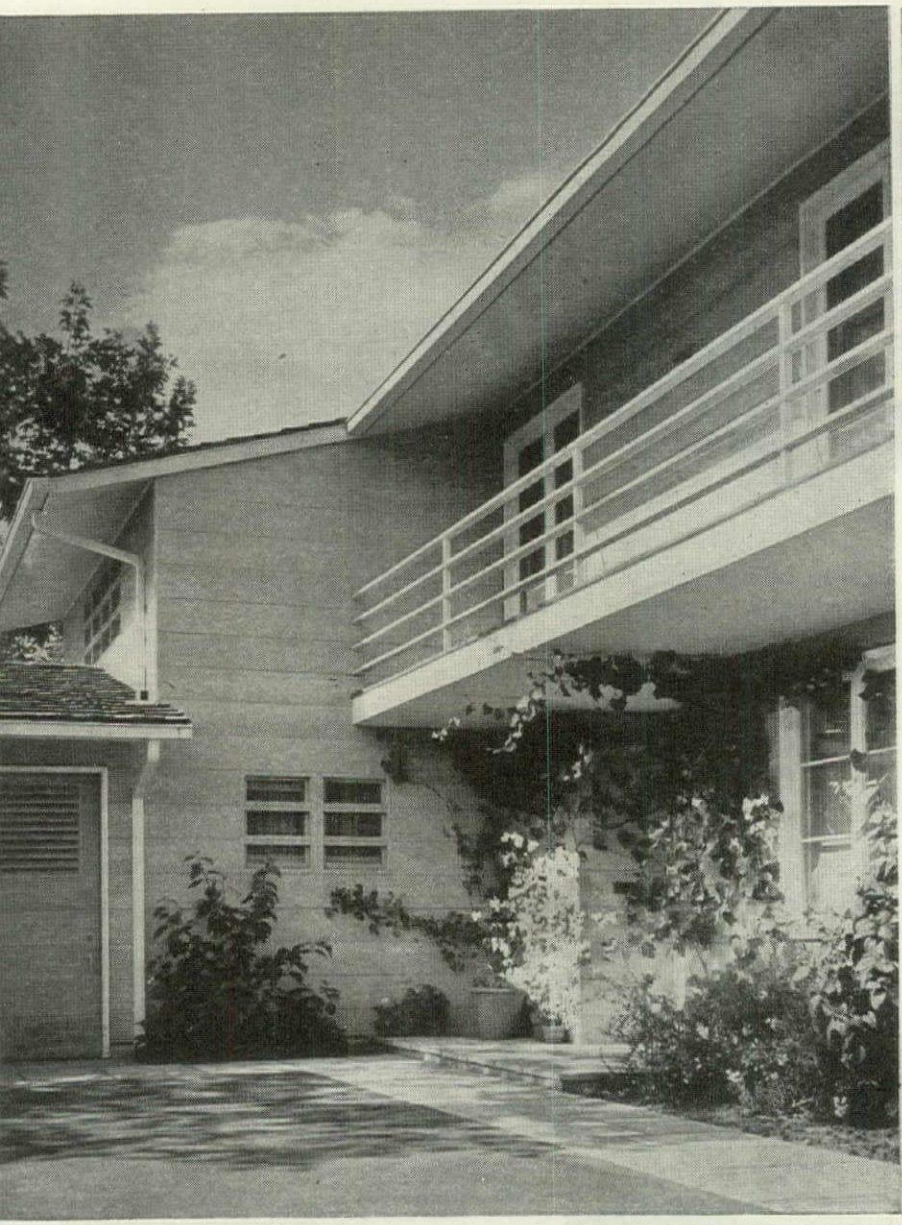


FUTURE BASEMENT

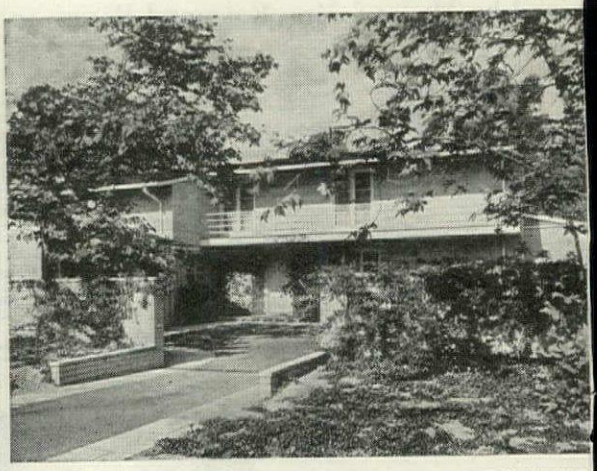
MASTER BEDROOM HAS SOUTH TERRACE

HOUSE IN LOS ANGELES, CALIF. Architect A. Roy Kelley achieves privacy, dignity

Photos: F. A. Dappricht

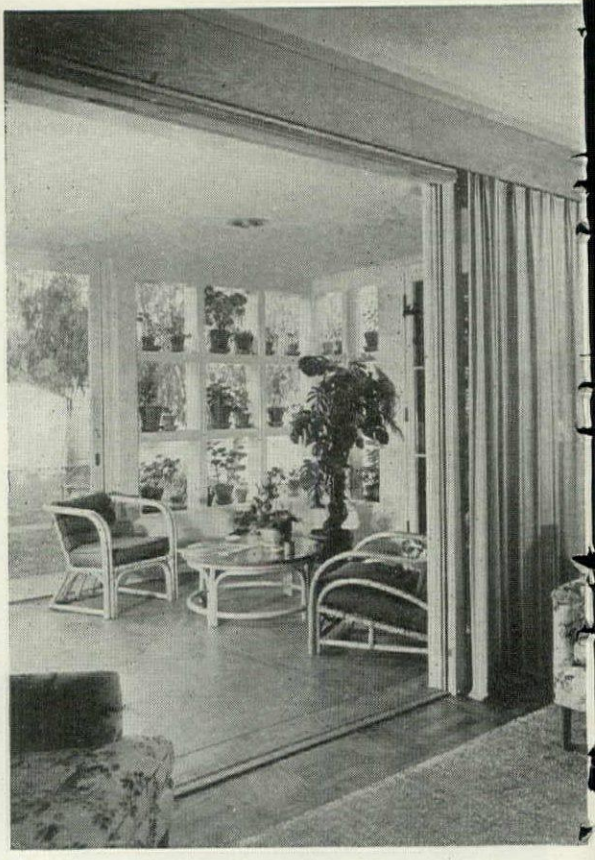


WIDE ROOF AND BALCONY OVERHANGS PROTECT HOUSE FROM NOON SUN



A WALLED MOTOR COURT PROVIDES SECLUSION

PORCH FUNCTIONS AS LIVING ROOM EXTENSION



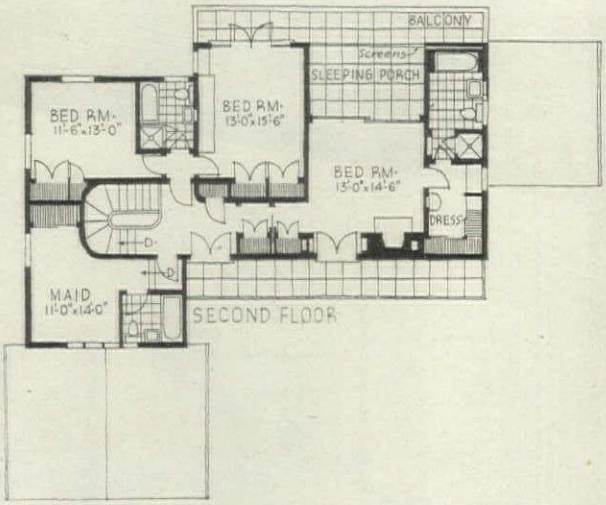
The owners of this quietly modern house—a young married couple with two small daughters—are increasingly appreciative of the architect's careful fitting of their home to their needs.

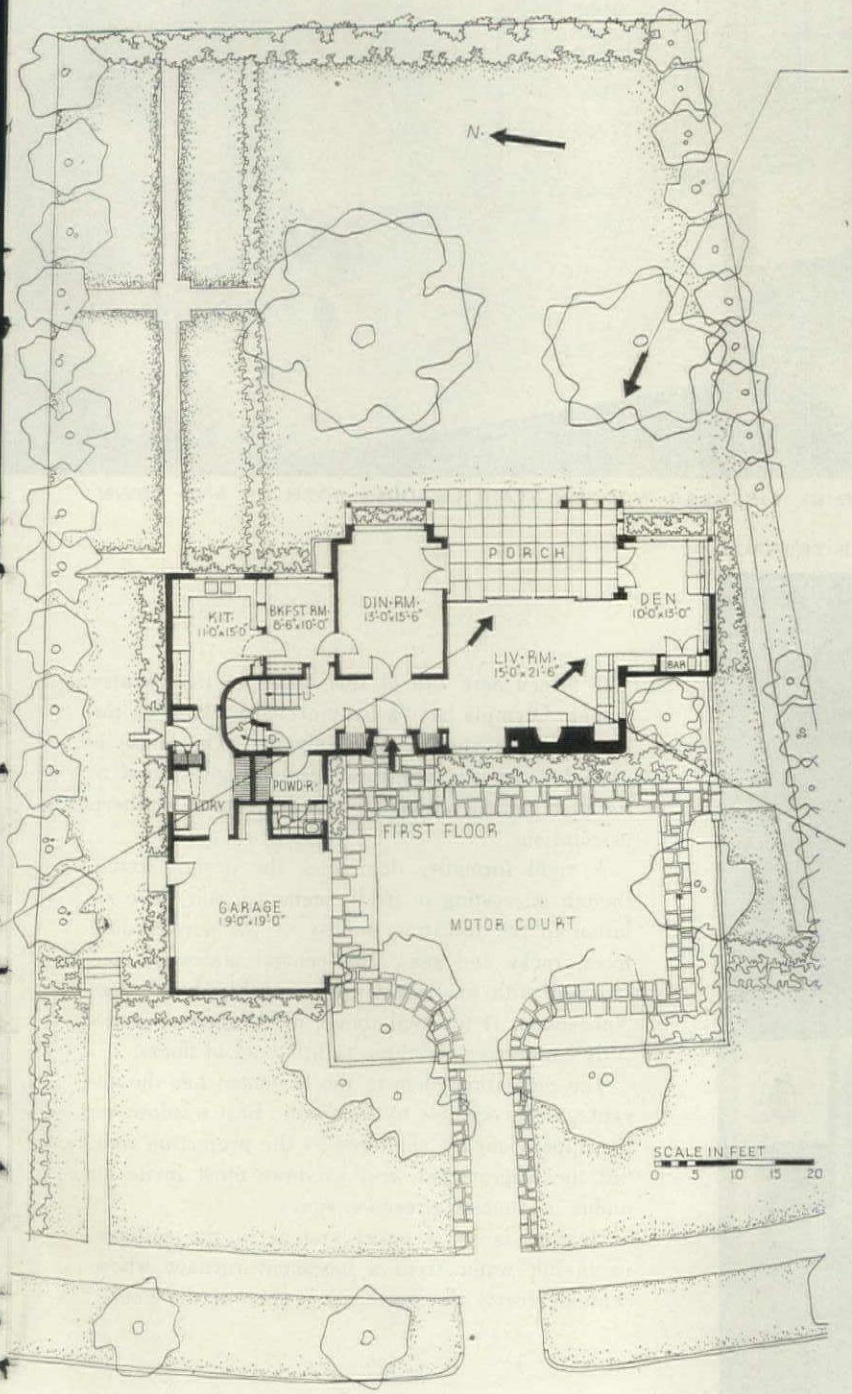
The location of the house in the center of the 120 ft. by 200 ft. lot provides protection from noise on four sides, and an unusually handsome street approach. Turn space for the garage becomes a dignified forecourt, and the always-awkward garage doors have been subdued by low reveals and repetition of house wall materials.

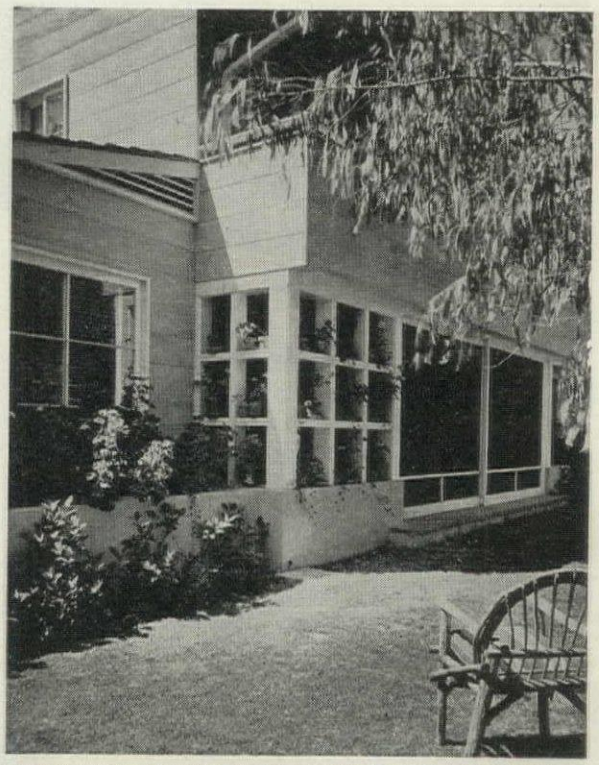
The L-shaped plan is arranged compactly about a circulation core at the inner corner, services grouped to the left, living spaces to the right. South windows introduce sunlight into the living room and its adjoining den, while the deep porch offers shade from the west. On the upper floor, two balconies open the master suite to cross ventilation and garden views.

CONSTRUCTION OUTLINE: STRUCTURE: Exterior walls—wood frame, fir siding; interior—oak plywood, U. S. Plywood Corp., plaster and grass cloth. Floors—reinforced concrete and oak block set in mastic, E. L. Bruce Co. LAUNDRY EQUIPMENT: Bendix Home Appliances, Inc. BATHROOM EQUIPMENT—American Radiator-Standard Sanitary Corp. HEATING—forced air units, Payne Furnace Co.

nd charm within the confines of a suburban lot.



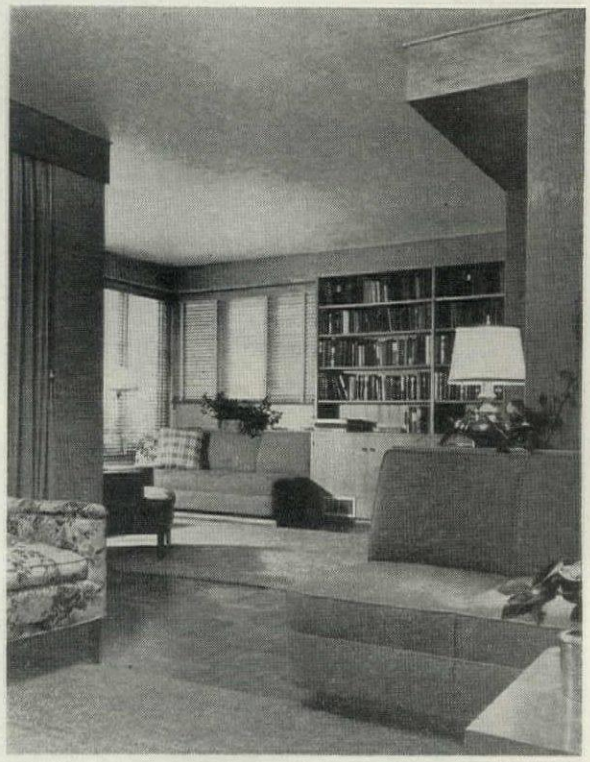




WEST LIVING PORCH HAS WIDE SLIDING SCREENS

K. BASHFORD, F. BARLOW, Landscape Architects
JOHN LUCCARENI, Interior Decorator
J. ERNEST RANDALL, Contractor

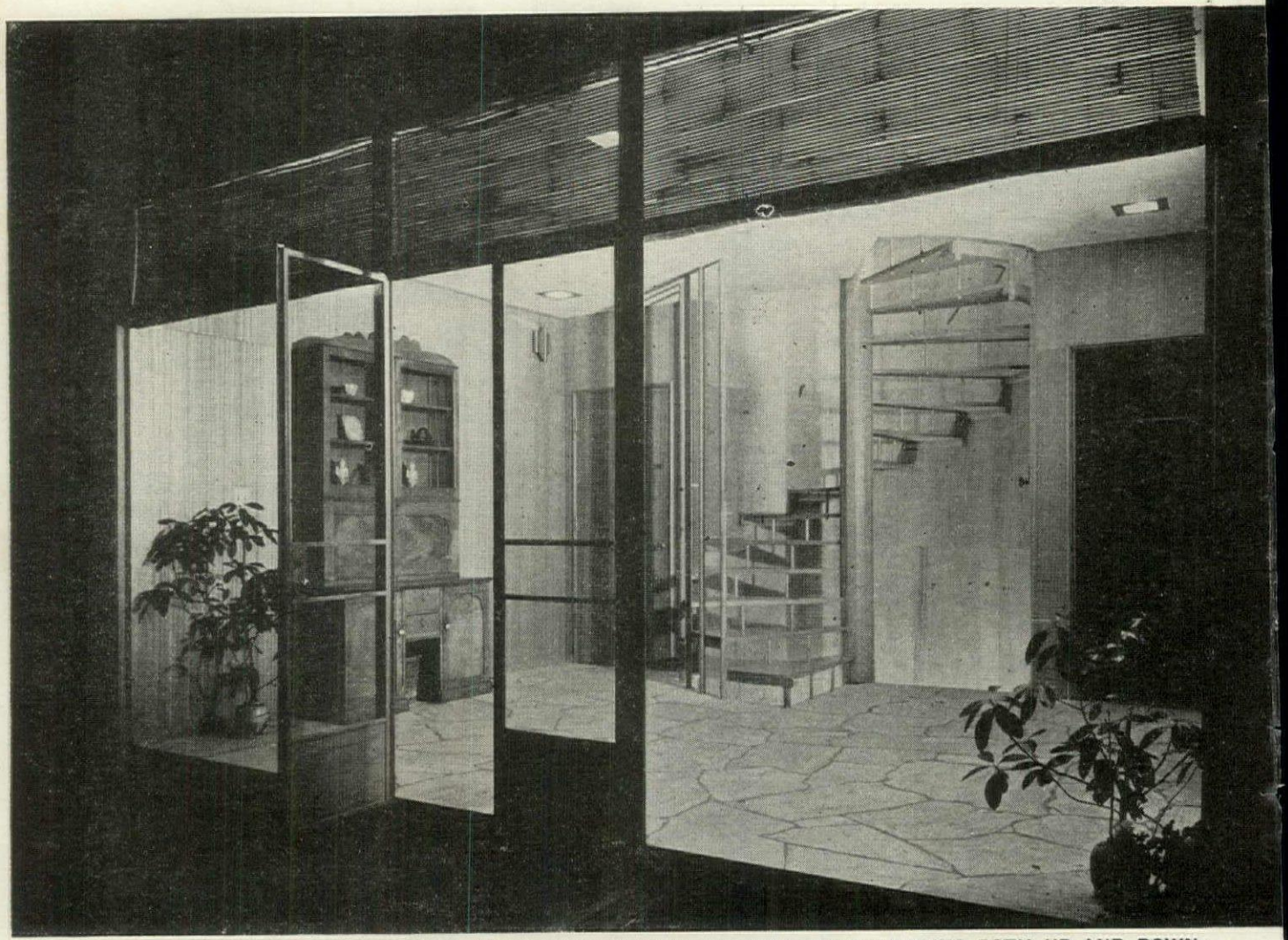
LIVING ROOM IS CONNECTED INFORMALLY TO DEN



HOUSE NEAR OLYMPIA, WASH.

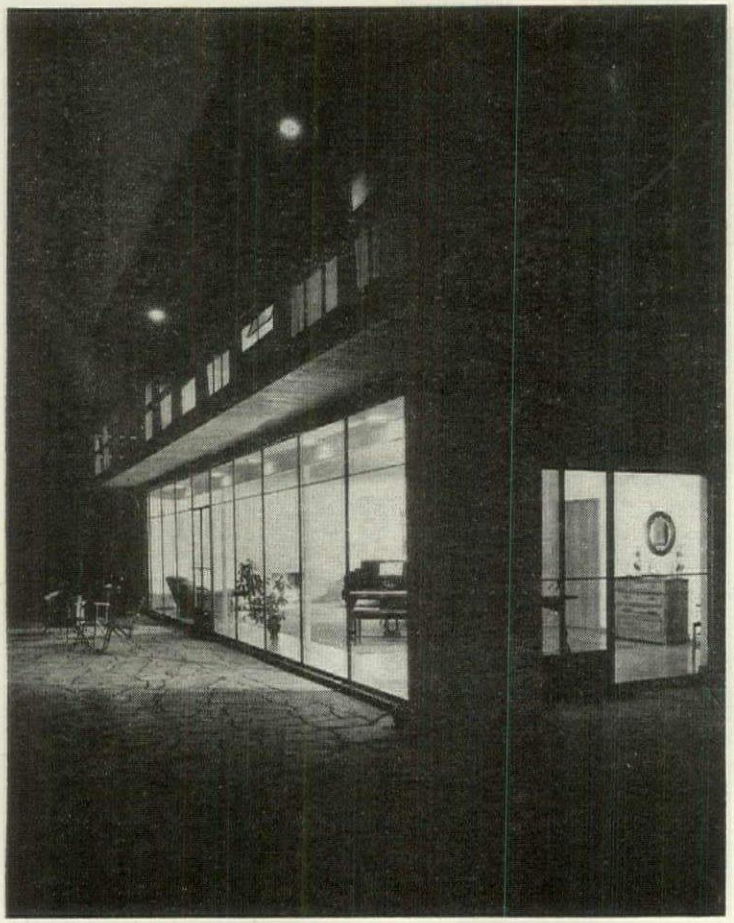
An interesting interpretation of the seaside vill

Photos: P. A. Dearbo



FORMAL ENTRANCE HALL TO WEST IS DOMINATED BY CIRCULAR WOODEN STAIR LEADING BOTH UP AND DOWN

EAST FACADE OPENS TO SEA VIEW ACROSS MARBLE TERRACE



The fifteen acre site of this house in the country outside Olympia has "a baby orchard, clams on the beach, and a view of Mt. Rainier." The house is placed to get the fine view across Puget Sound to the east, and thereby misses the benefits of southern orientation.

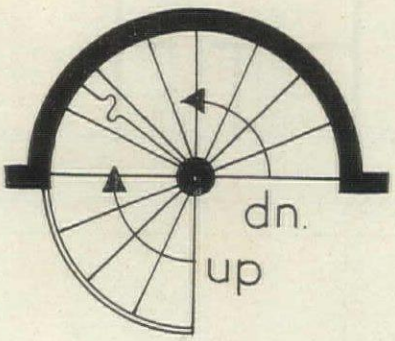
A rigid formality dominates the design which, though interesting in itself, seems to bear little relation to the romantic quality of the surrounding trees, rocks and sea. The central stairway, constructed with mediaeval craftsmanship by George Nakashima, is the real theme of the house, gracefully connecting the three tightly-packed floors.

The recreation room in the basement has the advantage of a window to the south. East windows on the upper floor are sheltered by the projecting roof, but the unprotected west windows must invite an undue amount of afternoon sun.

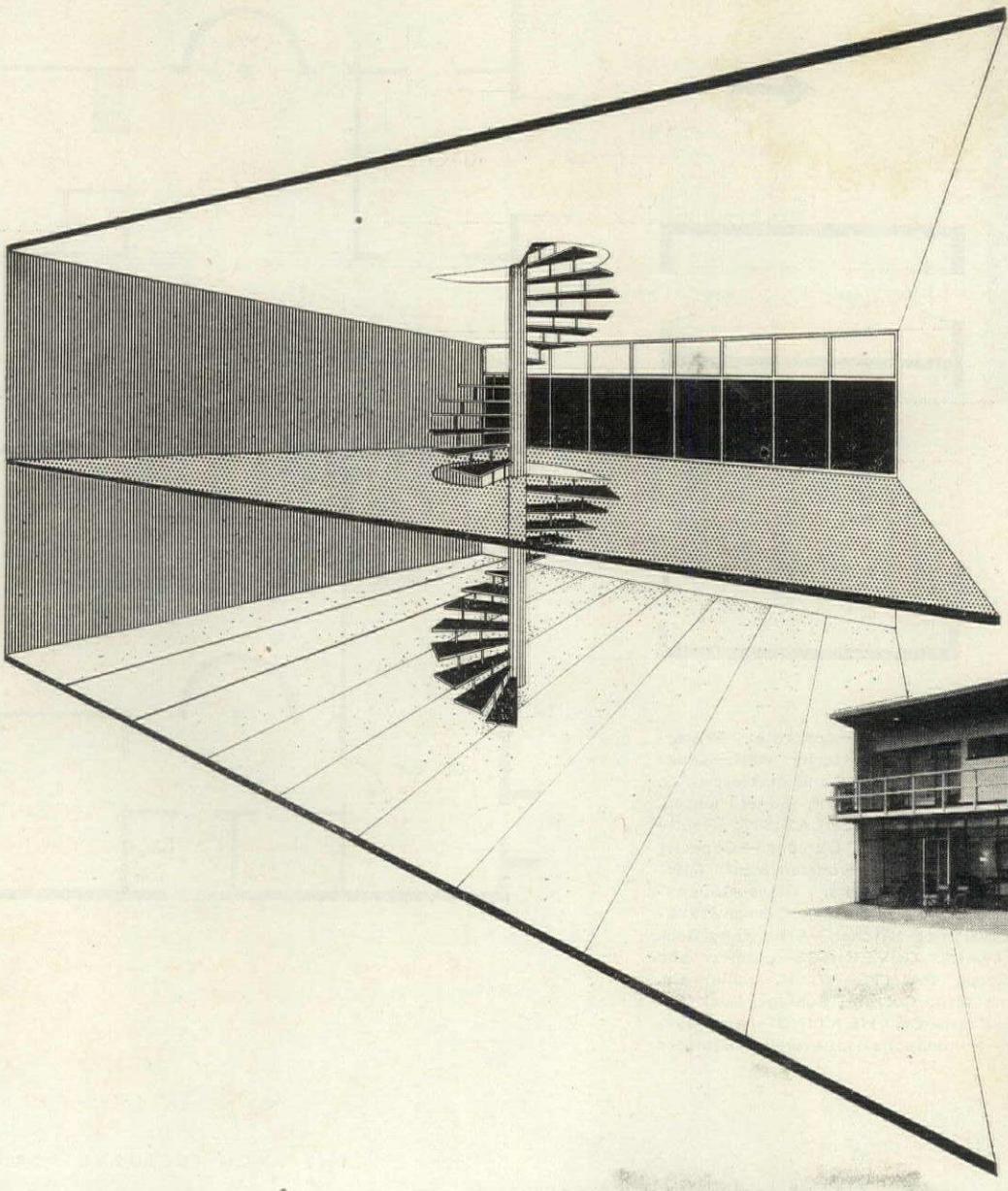
Heating is by a panel system in the ceilings, using hot water from a basement furnace whose chimney forms the northeast corner of the house.

n the strict manner of architect Paul Thiry.

ERWIN WEBER, Mechanical Engineer

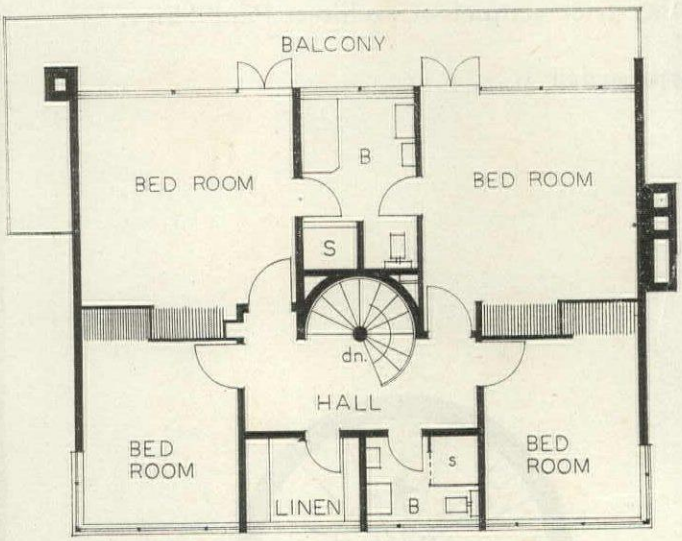


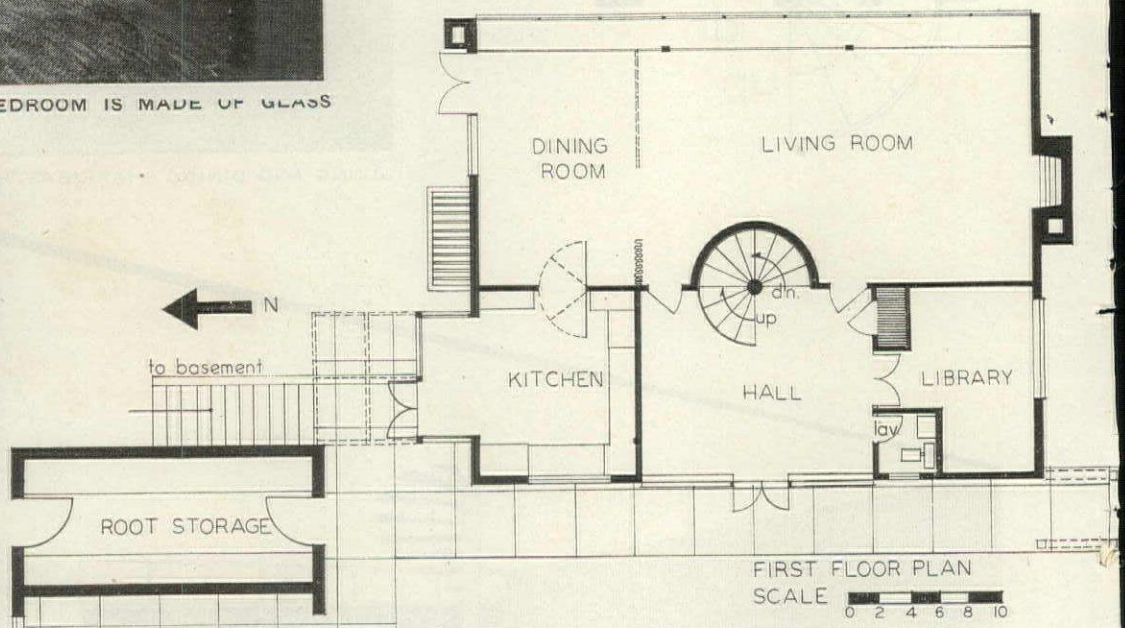
LIVING AND DINING SHARE EASTERN HALF OF GROUND FLOOR

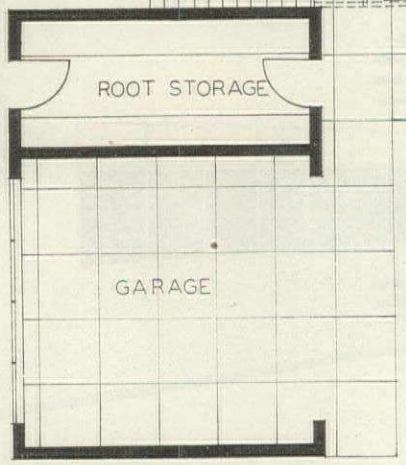


HOUSE NEAR OLYMPIA, WASH.

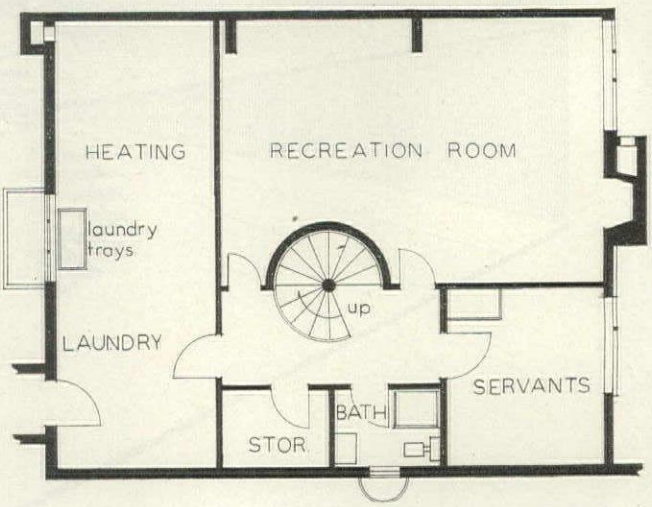
ENTIRE EAST WALL OF BEDROOM IS MADE OF GLASS



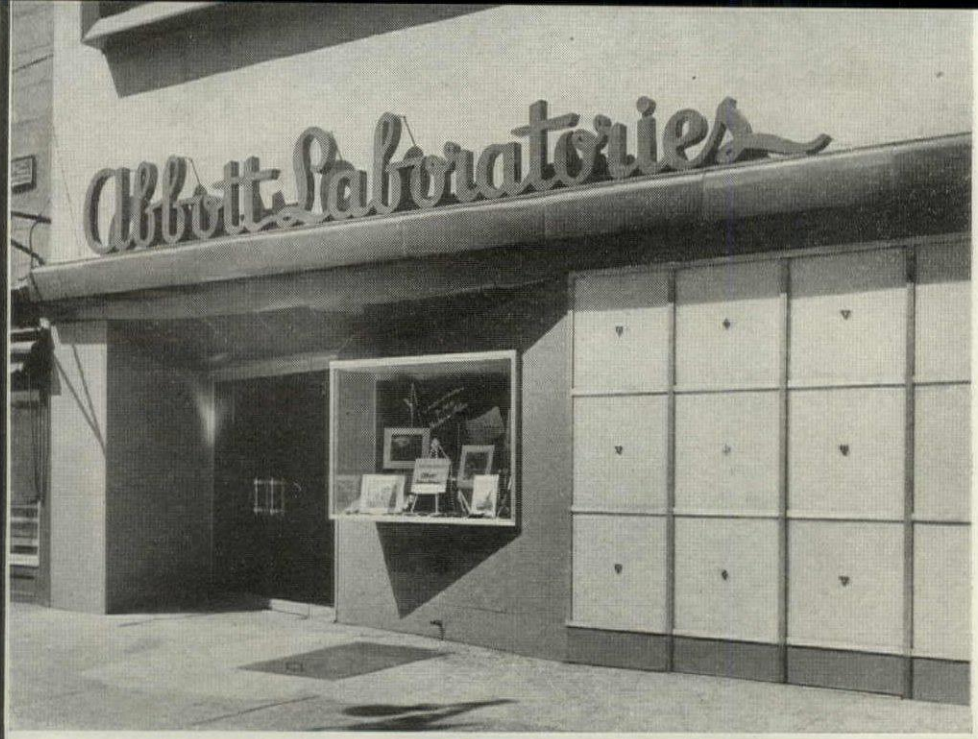




FIRST FLOOR PLAN
SCALE 0 2 4 6 8 10

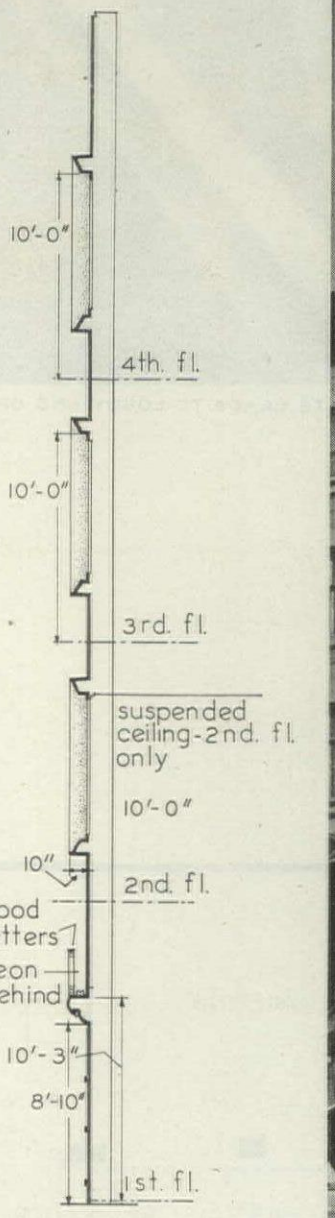


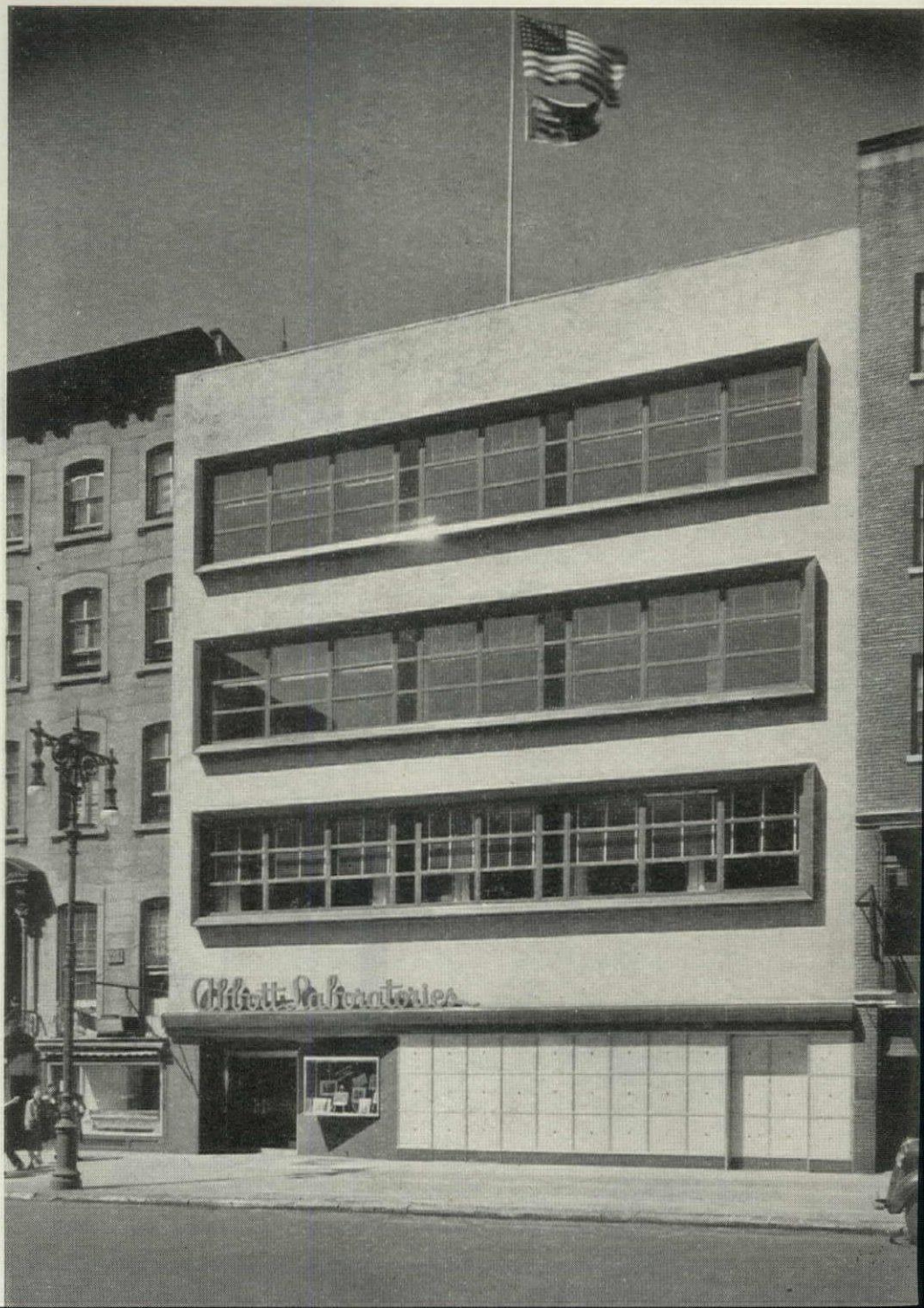
CONSTRUCTION OUTLINE: FOUNDATION—concrete. Waterproofing—Flintkote Co. STRUCTURE: Exterior walls—cedar siding, building paper, shiplap, plaster board and plaster, U. S. Gypsum Co. Ceilings—plaster on metal lath, panel heated. ROOF—4-ply built-up. Decks—canvas. INSULATION: Roof—rockwool, Johns-Manville. FIREPLACE: Damper — Superior Fireplace Co. SHEET METAL WORK—galvanized iron. WINDOWS: Sash—steel, Fentron Steel Works. Glass—Libbey-Owens-Ford Glass Co. STAIRS—oak, designed by George Nakashima. FLOORS: Halls—Travertine. Kitchen—Armstrong Cork Co. Bathrooms—marble. WALL COVERINGS—plaster and plywood, U. S. Plywood Corp. PAINTS—W. P. Fuller Co. HARDWARE—Yale & Towne Mfg. Co. and Schlage Lock Co. BATHROOM EQUIPMENT—Crane Co. HEATING—panel system in ceilings. Regulator—Minneapolis-Honeywell Regulator Co.



turn a warehouse into a merchandising asset.
Harper Richard, Designer;
Lockwood-Greene, Engineers.

Photos: Gottscho-Schleisner



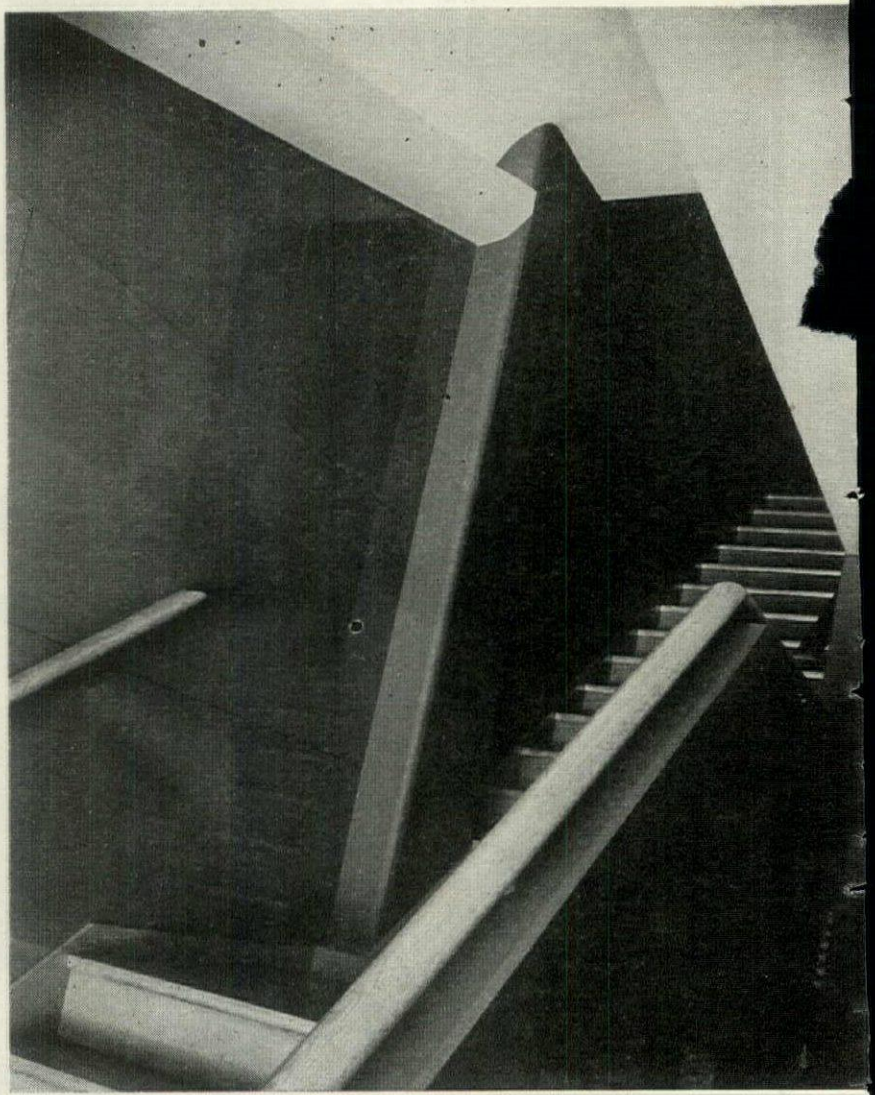


ABBOTT LABORATORIES

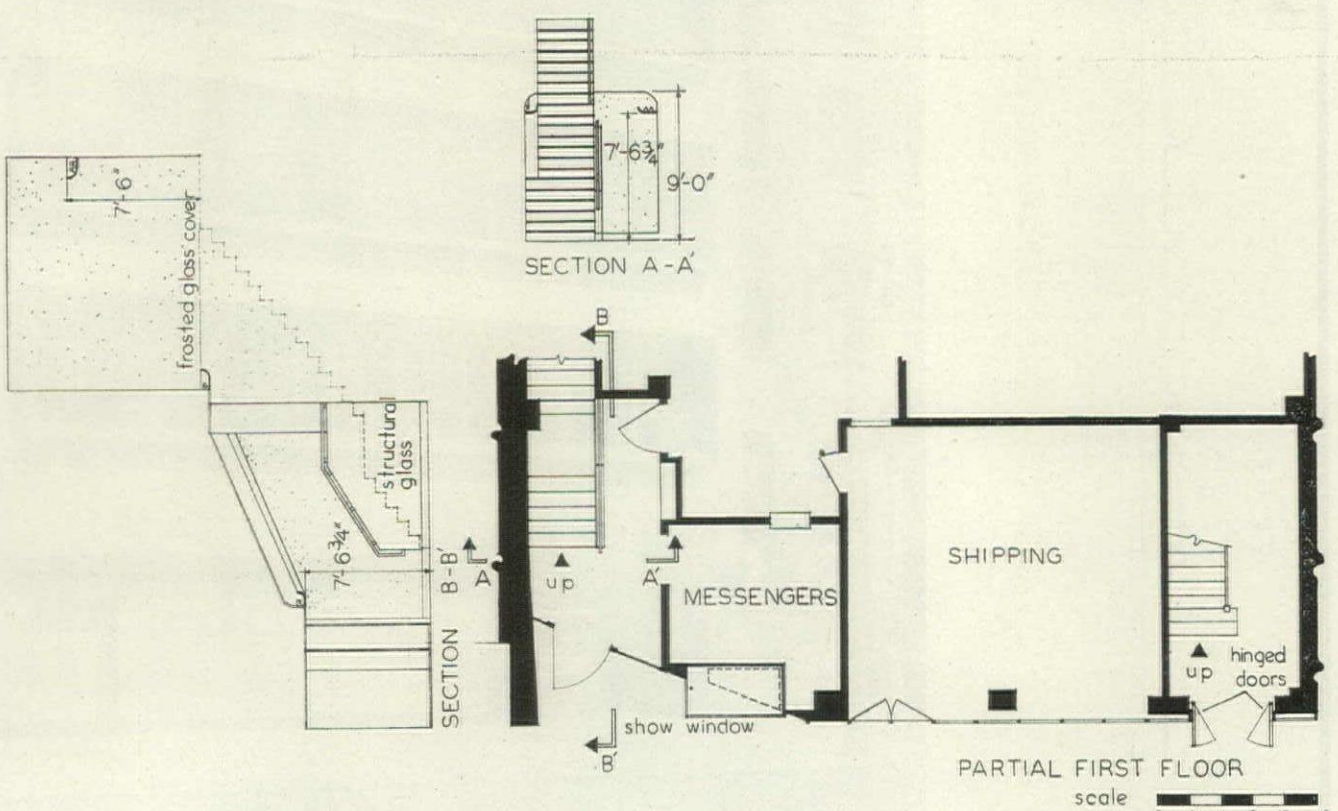
HARPER RICHARDS, Designer

LOCKWOOD-GREENE, INC., Engineers

THOMPSON-STARRETT CO.,
General Contractors



A NEW STAIR IN BLUE AND WHITE LEADS TO LOBBY AND OFFICES



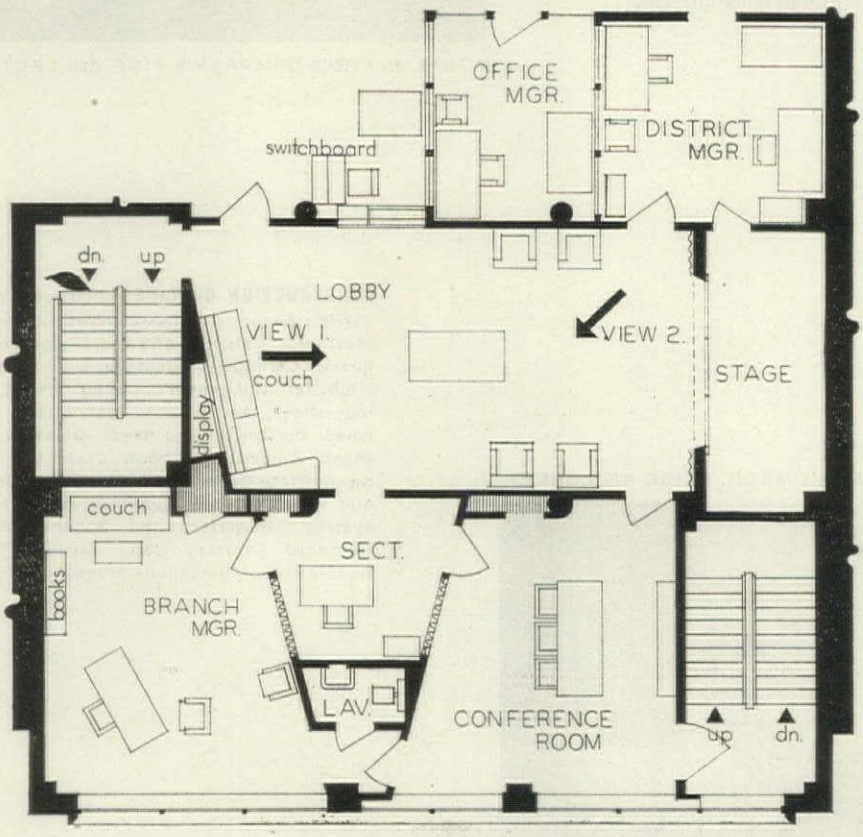
A regional distribution center for the New York-New Jersey area, this newly-remodeled building for the Abbott Laboratories marks the first application of a new policy on the part of that nationwide pharmaceutical house. Hitherto considered as warehousing and shipping centers, with space for the regional sales and office force incidentally provided, the Abbott branches gave little attention to appearance. Here the process has been reversed. Not only has the street facade been converted into a large and effective advertisement, but all office and reception areas have been organized for maximum comfort and attractiveness with access directly from the street.

The building itself is not new. Although its 45-year old concrete frame was found to be structurally sound, the entire building was renovated. In addition to a new front and public entrance. the entire second floor was converted into office space. The basement and first floor contain shipping and receiving departments, while warehousing has been moved to the two top floors. All merchandise enters through a chute from sidewalk to basement: equipped with rollers, this chute is sized to take the largest Abbott carton. From here, incoming freight moves by elevator to warehouse floors. Outgoing orders clear through the first floor shipping room, whose street doors are part of the translucent glass screen across the front.

The facade is frankly handled as such. The horizontally pivoted wood sash are unified by an enamelled metal frame in dark blue. This color is repeated in the structural glass of the entrance lobby and the continuous enamelled light cove above. The stuccoed walls are grey. All trim at street level is of stainless steel.

VIEW 1 PLEASANT LOBBY CAN BE EASILY CONVERTED INTO . . .

VIEW 2 MEETING ROOM FOR LECTURES OR MOVIES SEATING 50



PARTIAL SECOND FLOOR PLAN

ABBOTT LABORATORIES

HARPER RICHARDS, Designer

LOCKWOOD-GREENE, INC., Engineers

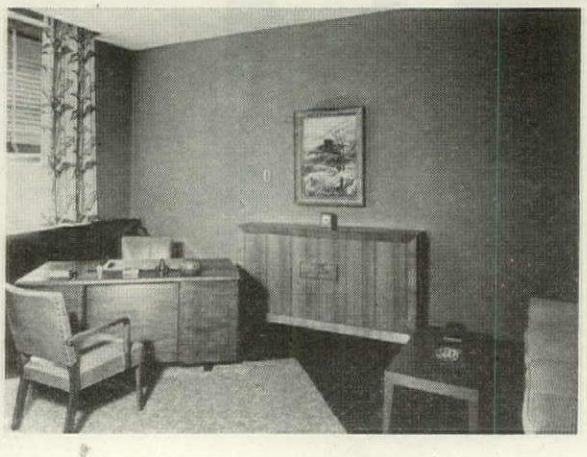
THOMPSON-STARRETT CO., General Contractors

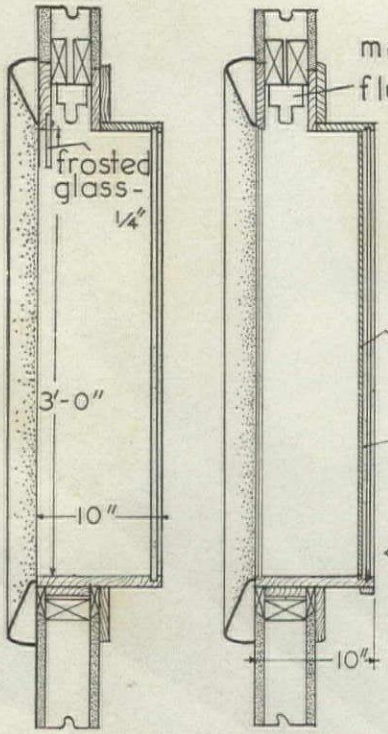
Pleasant office space which could be temporarily occupied by visiting company executives as well as by regional salesmen was one of the client's requirements. The offices shown on these pages serve this dual function. While desiring interiors which would be a credit to the organization, the company wished to avoid any appearance of ostentation. To this end, the designer has used simple materials and subdued color; woodwork and furniture is in natural oak; the beige upholstery fabric will be replaced by natural leather as soon as it is available. In both private and general office space, floors are in asphalt tile and ceilings in acoustical tile. The entire area will ultimately be air conditioned.

MURAL IS FROM COMPANY'S FINE COLLECTION OF MEDICAL ART

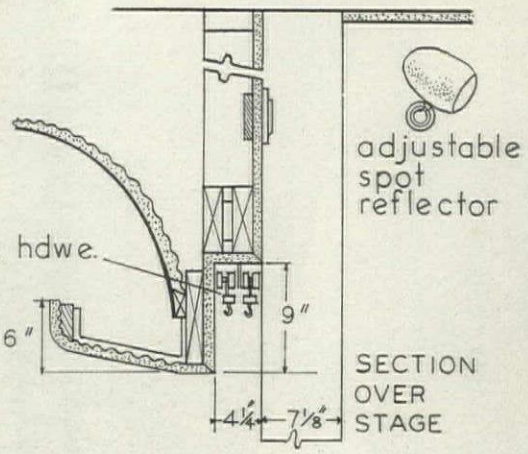
CONSTRUCTION OUTLINE: FOUNDATIONS—concrete. STRUCTURE: Exterior walls—concrete; inside—4 in. terra cotta blocks, plastered. Columns and floors—concrete, asphalt tile covering on floors. Ceilings—Acoustone, U. S. Gypsum Co. ROOF—built-up pitch, felt and gravel covering. SHEET METAL WORK: Flashing—sheet lead. Ducts—galvanized iron. WINDOWS: Sash—wood, horizontal and fixed. Glass—Lustraglass, 3/16 in. crystal sheet, American Window Glass Co. DOORS—Herculite, Pittsburgh Plate Glass Co. PLUMBING: Soil pipes—cast iron. Branch and water pipes—galvanized steel. HEATING—one pipe steam system. Radiators and Boiler—American Radiator Co. and Standard Sanitary Corp. Grilles—Tuttle & Bailey Mfg. Co. Regulators—Minneapolis-Honeywell Regulator Co.

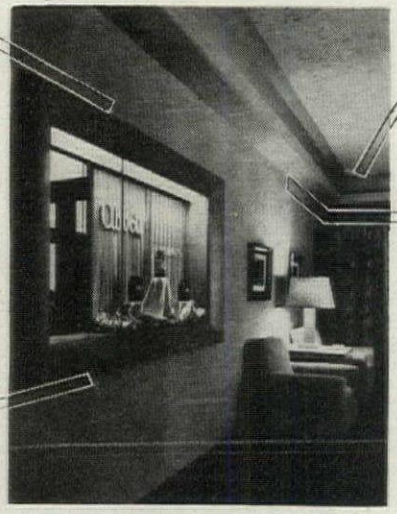
MANAGER'S OFFICE IN UMBER, BEIGE AND GREEN



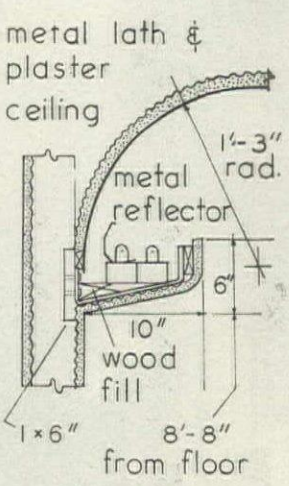


END SECTIONS OF DISPLAY BOX

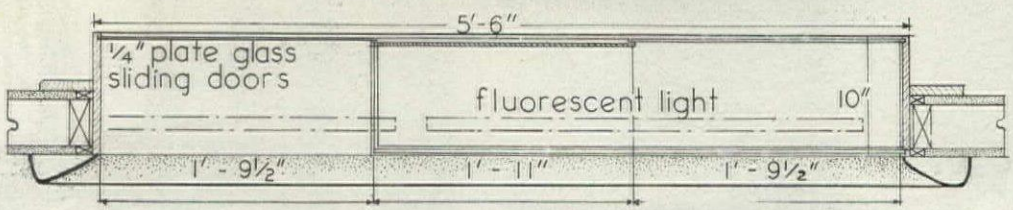


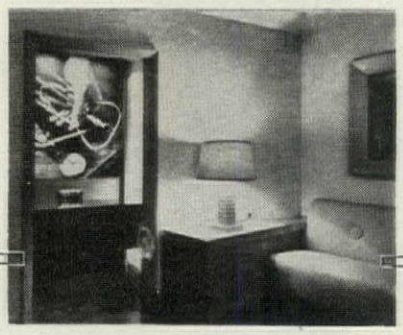


PLAN OF DISPLAY BOX

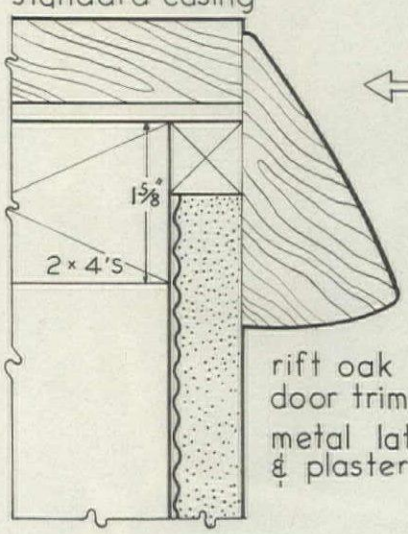


SECTION OVER SIDE WALL

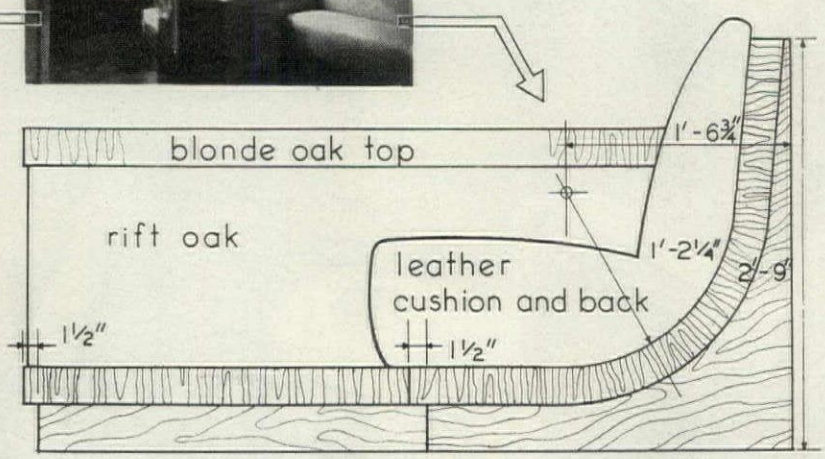




DOOR DETAIL



LOUNGE SEAT

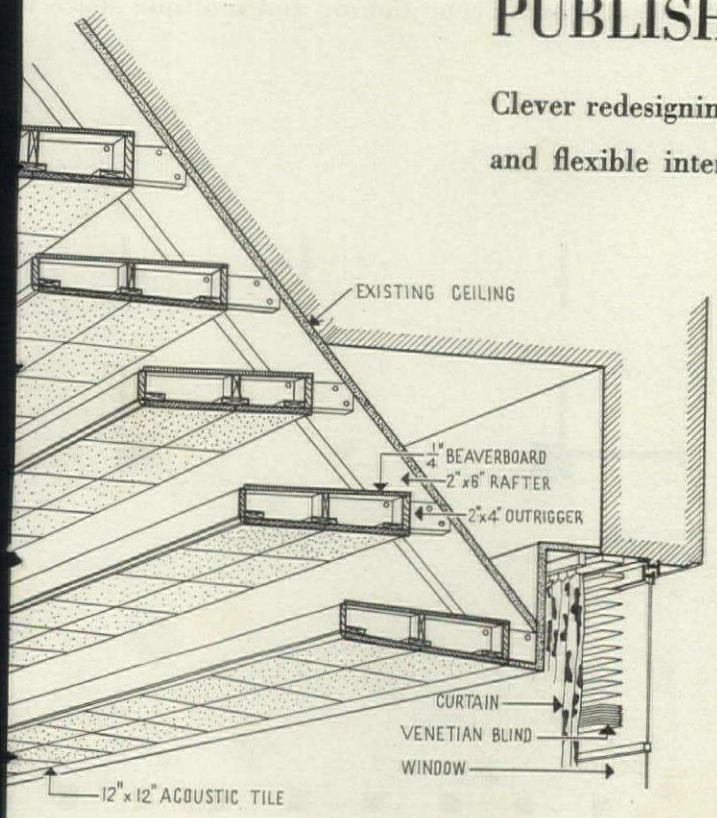


Photos: P. A. Dea

INTERIOR IS SHIELDED FROM GLARE AND HEAT OF SKYLIGHTS IN SLANTING ROOF BY SERIES OF HORIZONTAL LOUVE

PUBLISHER'S RECEPTION ROOM

Clever redesigning by architect Jedd Stowe Reisner makes an inviting and flexible interior of former architect's office.

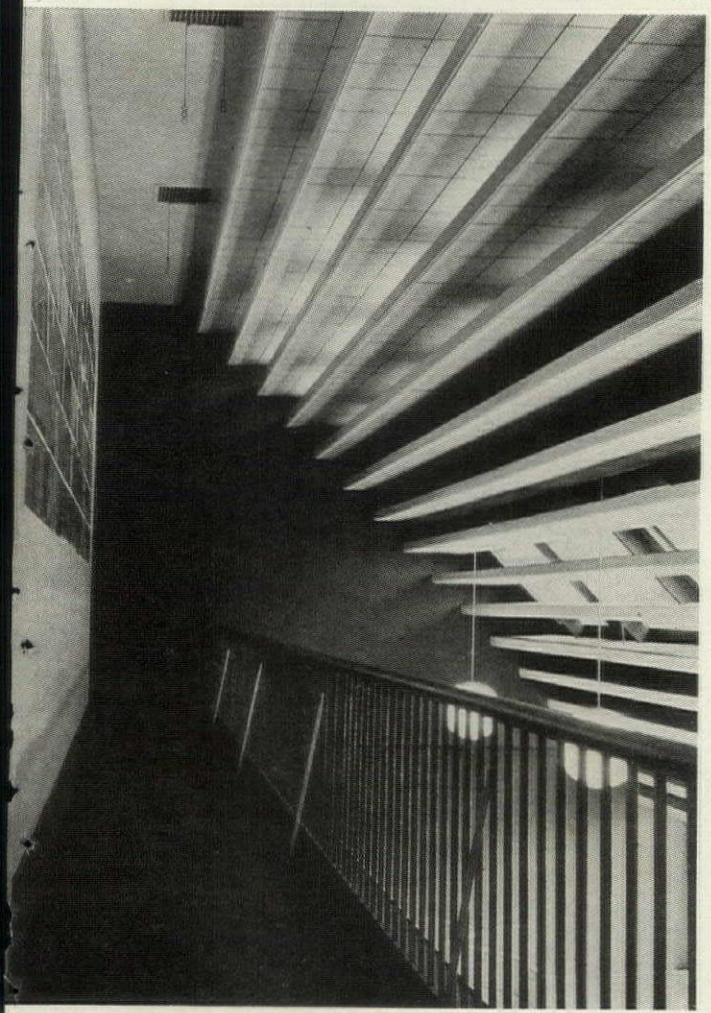


When the firm of Reynal and Hitchcock recently acquired the 21st floor and mezzanine of a building in New York for their new home, the only large area available for a reception room was a high space with an awkward slanting ceiling and overhanging balcony—the former drafting room of an architect's office. The slanting ceiling contained eight skylights which let in glare and heat, and caused voices to reverberate. In this space the publishers wanted an impressive but efficient room to receive visitors, hold private interviews, and, occasionally, serve as a background for large-scale entertaining. To solve this problem the firm of Artek-Pascoe was engaged, who in turn called in architect Reisner.

A series of large fixed louvers with acoustic tile on the bottom faces was attached to the slanting ceiling—a scheme which admits indirect light from the skylights, protects the interior from direct rays of the sun, and reduces sound reflection, while giving the entire ceiling a striking and unified effect.

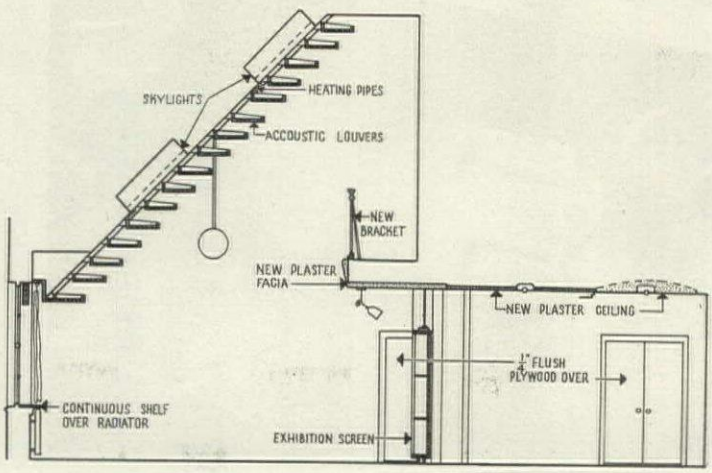
The original wall surrounding the elevator lobby was removed. A new wall made of glass and of a book display case was inserted farther back, to make arrival on the publisher's floor more inviting (see next page).

ALCONY CONNECTS OFFICES ON TWO SIDES OF MEZZANINE



Kosti Ruohomaa, Black Star

OLD SPACE WAS DRAFTING ROOM

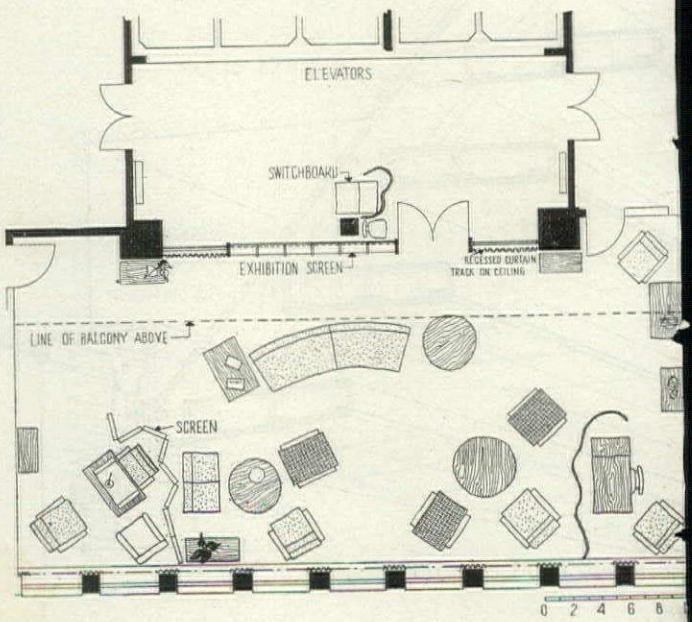


PUBLISHER'S RECEPTION ROOM stresses sound-conditioning and multiple space u

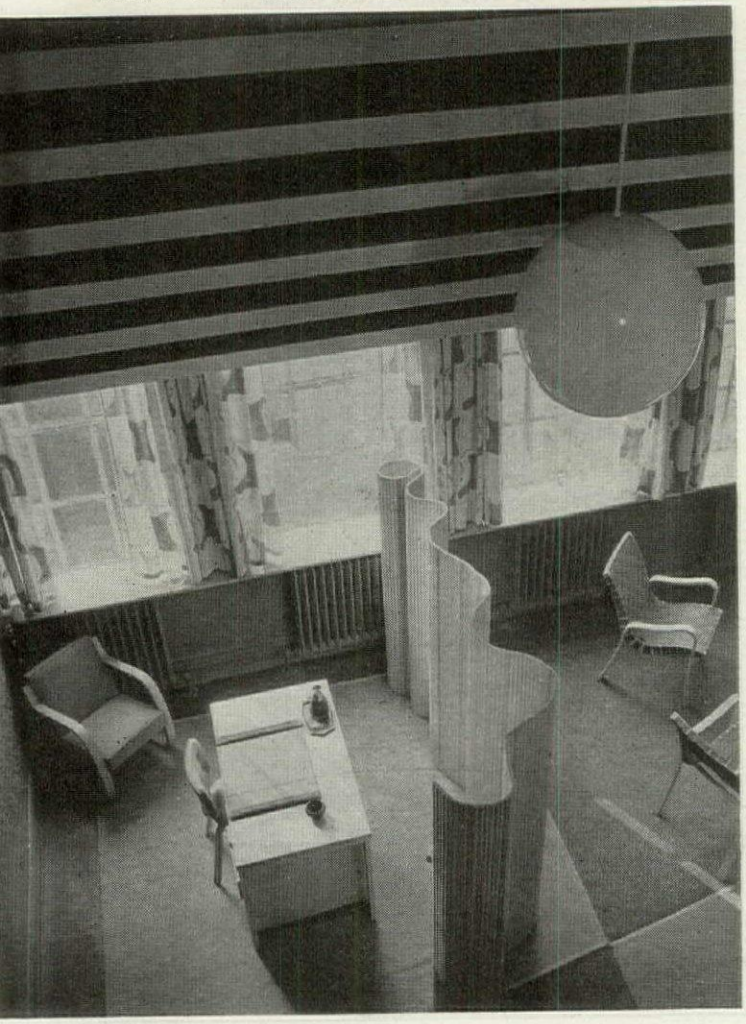
In addition to the central furniture arrangement for the reception of visitors, two alcoves for conferences between readers, authors, and book salesmen are created by the use of folding screens. Privacy is secured by the sound deadening effect of the ceiling louvers over the whole reception room, and augmented by the alcove folding screens, faced on the inner side with acoustic tiles. In this unusual manner the same room can serve the purposes of general reception and personal interview, yet be opened completely for the large parties periodically necessary in the publishing world.

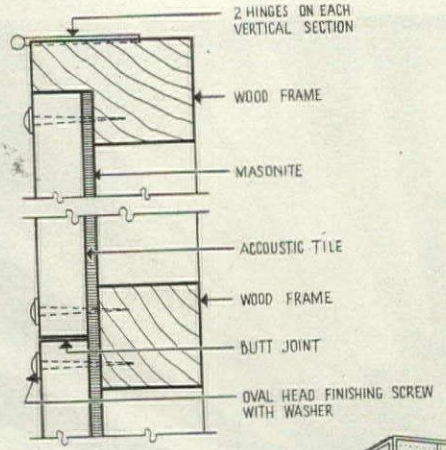
Walls of the reception room and elevator lobby are painted a quiet green, and this color is repeated in portions of the carpet. Ceiling and other carpet sections are beige, while drapery and upholstery fabrics repeat the green and beige theme with accents of terra cotta red. The display case for changing exhibitions of the firm's latest publications gives a colorful focal point to the whole interior. Drapery materials were designed by Donelda Fazakof, and all furniture was manufactured by Artek-Pascoe.

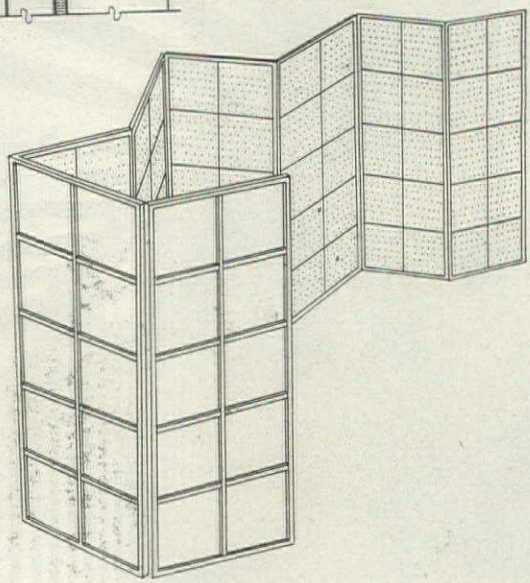
The publisher's say: "We find our new offices, as we had hoped, both attractive and efficient—the adjectives which should properly characterize the home of a business which has as much concern with all the arts as with publishing."

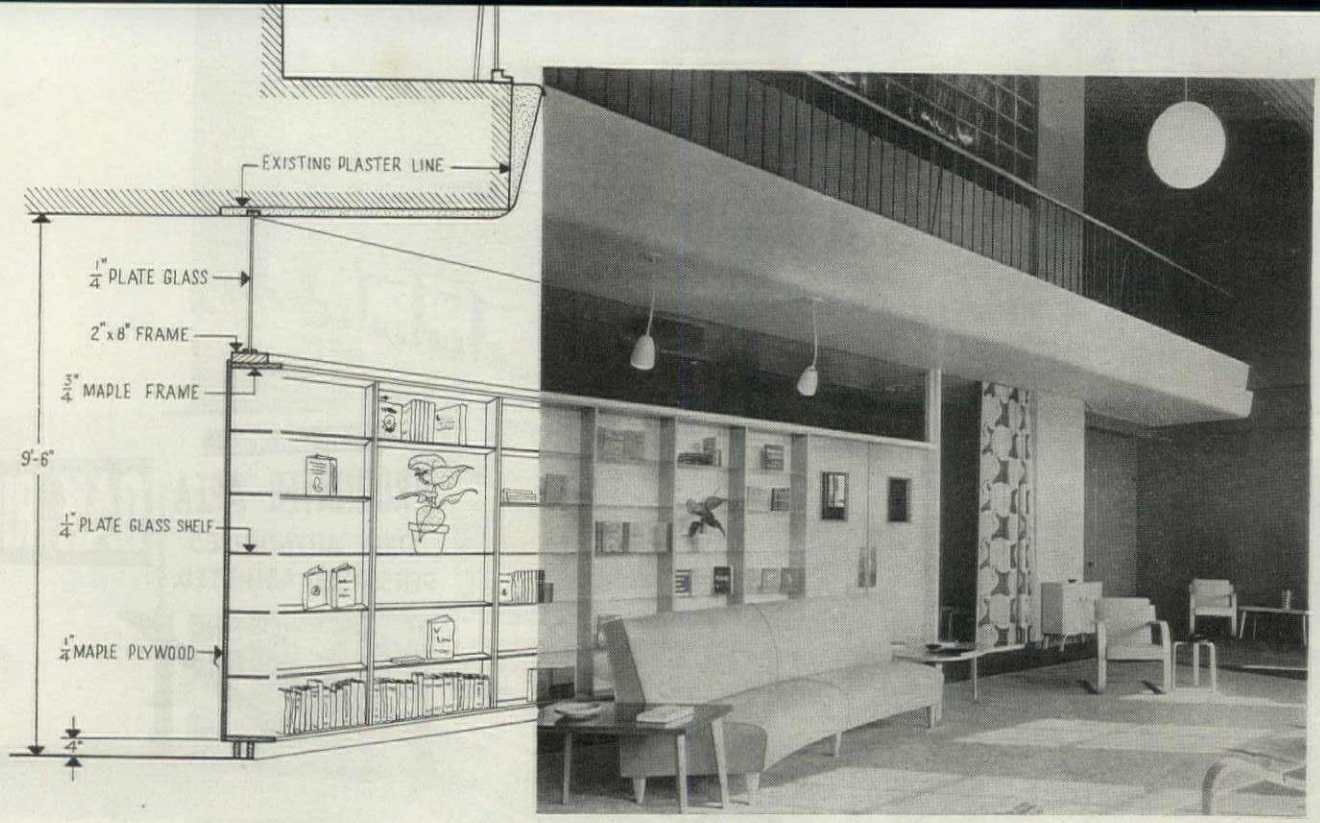


FLOOR CARPETING REFLECTS ALCOVE ORGANIZATION



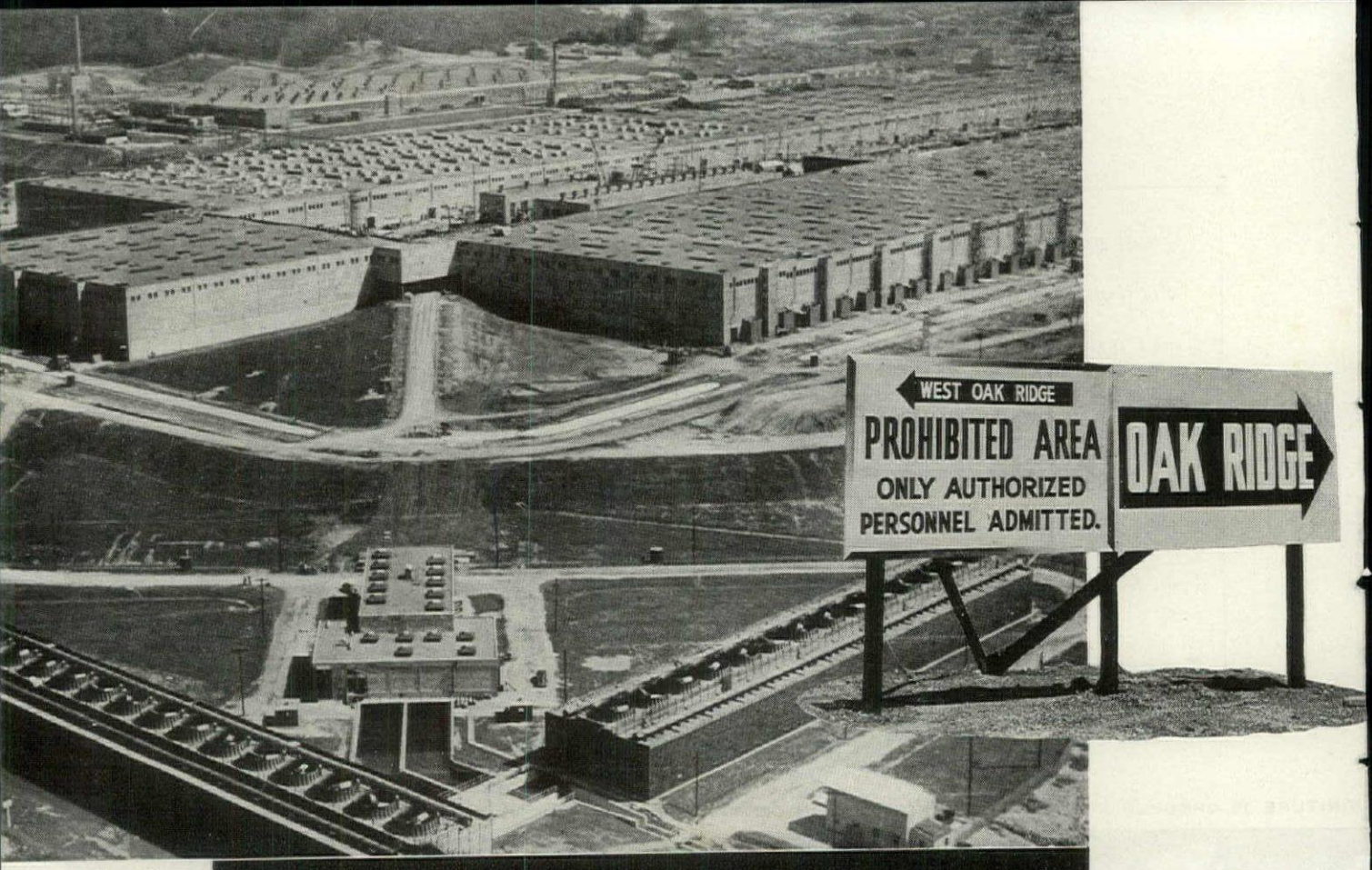






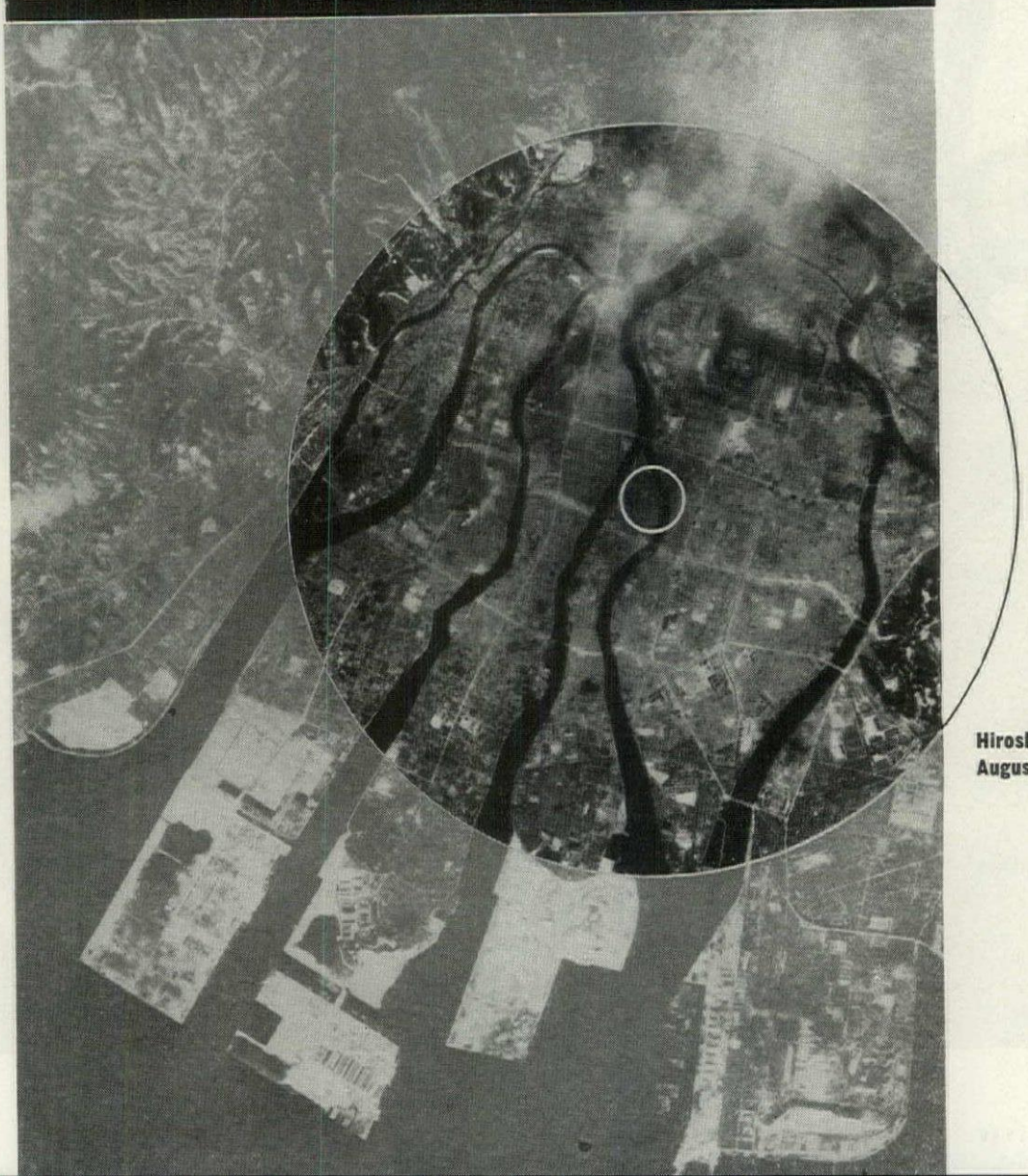
FIRM'S LATEST BOOKS FORM SCREEN FOR ELEVATOR LOBBY

URNITURE IS GROUPED FOR GENERAL RECEPTION IN CENTRAL AREA AND PRIVATE INTERVIEWS IN SCREENED ALCOVES

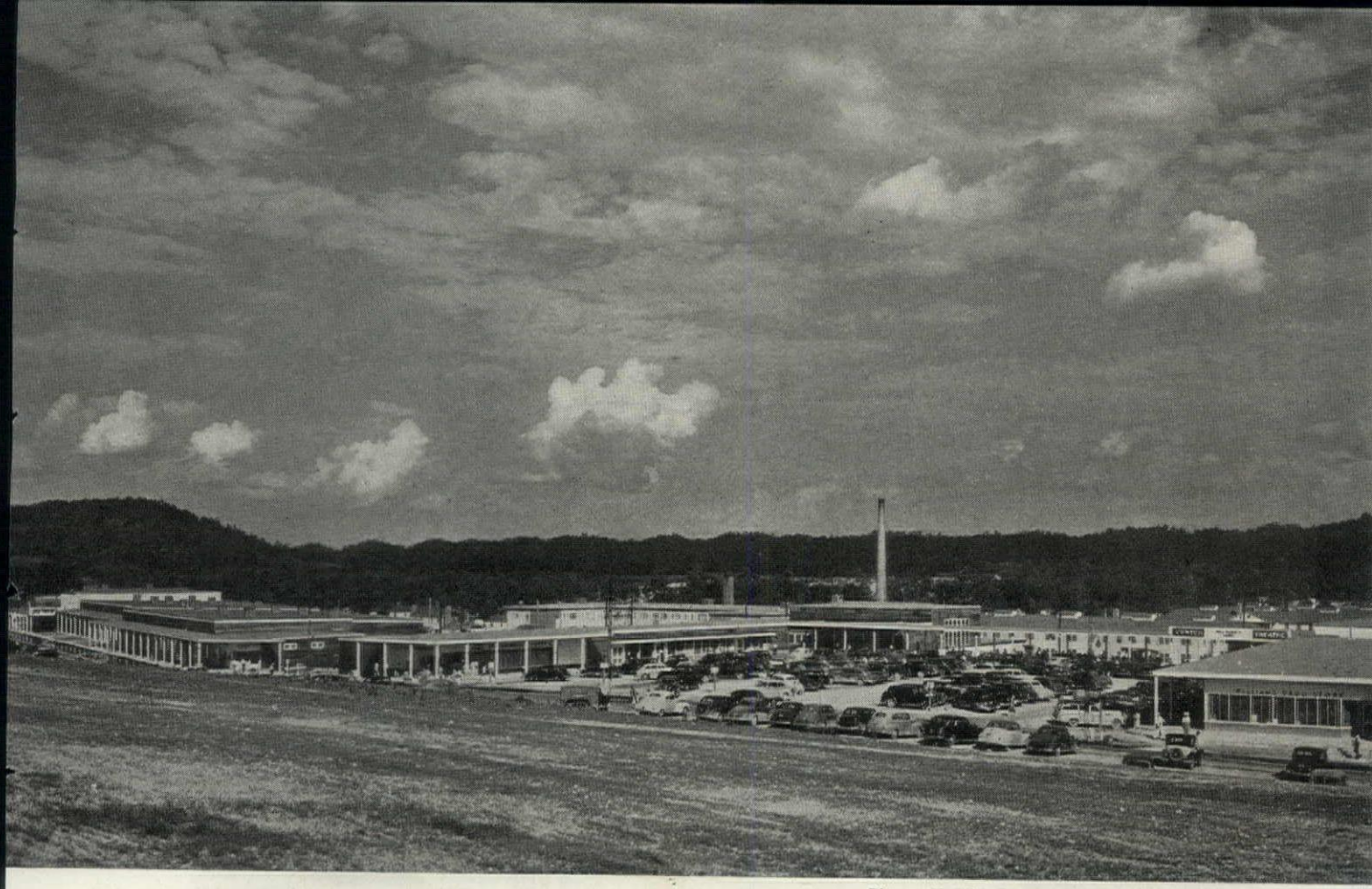


Signal Corps

U. S. Army Air Forces



Hiroshima, Japan, August 6, 1945



Photos: Hedrich-Blessing for Manhattan Engineer District

ATOM CITY

To make possible the total destruction of Hiroshima and Nagasaki, another complete city was conjured up from nothing on the opposite side of the globe.

Not many months ago a well-known orchestra leader, requested to stay on at Loew's State Theater in New York, cancelled an Oak Ridge engagement because "nobody's ever heard of that little Tennessee town." At that stage of history he was right. The most famous city in the entire world today was born and grew up in almost complete secrecy.

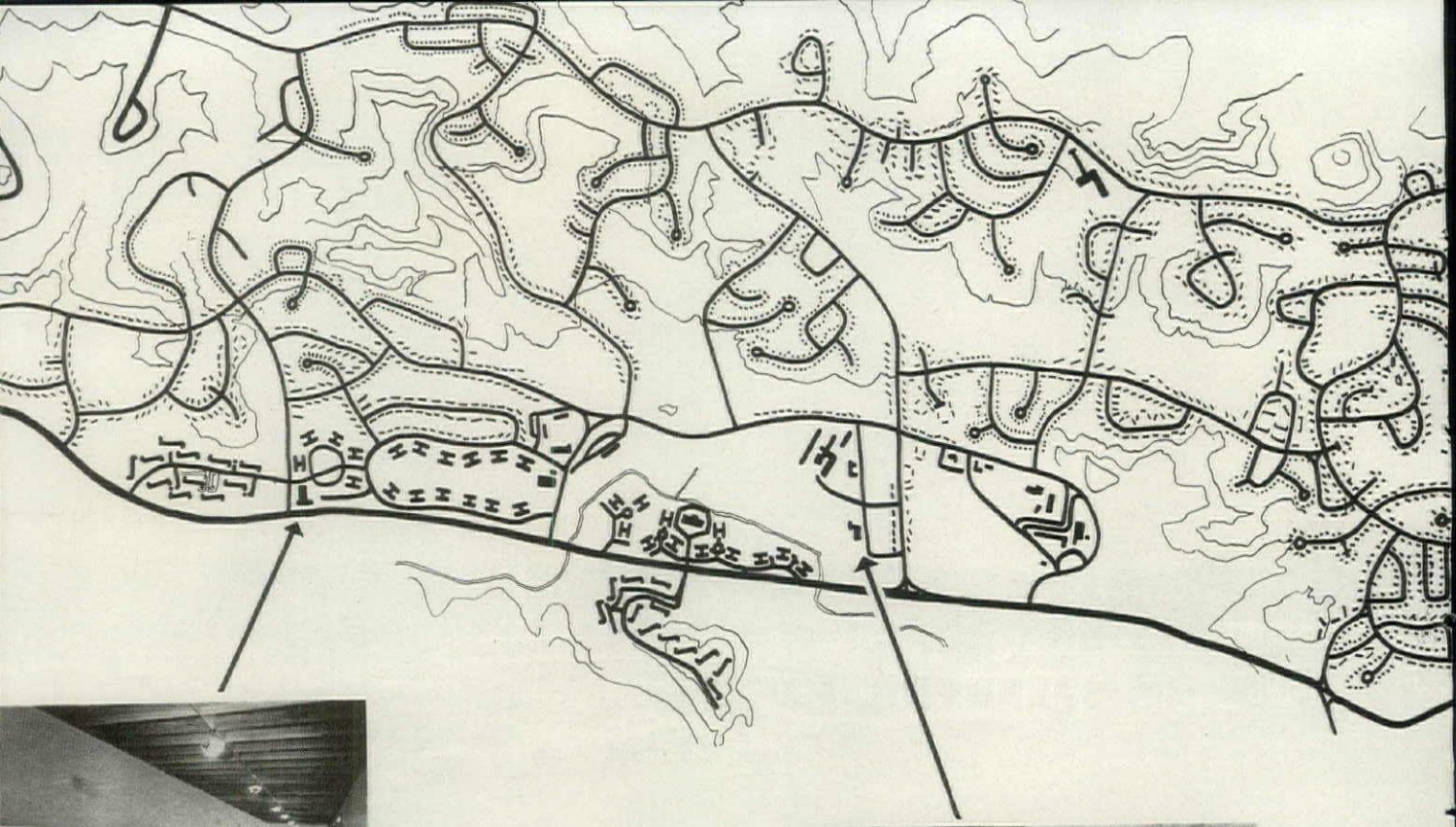
On November 2, 1942 Oak Ridge did not exist even as a name. A chance visitor, traveling the dirt roads from nearby Knoxville to this backwoods section of Tennessee, would have seen only rolling country—yellow clay earth erupting into sharp ridges dotted with scrub oak and patches of coarse grass. Smoke curling from an occasional farmhouse chimney would have been the only testimony to human habitation.

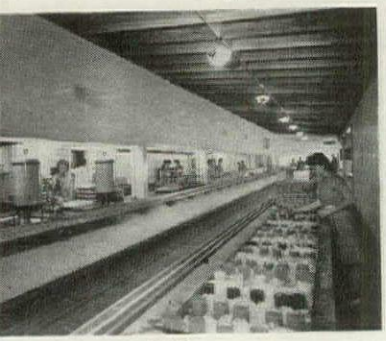
But today this part of the giant Manhattan Project is the fifth largest city in Tennessee, a bustling community of 75,000 people. On the rough hillocks where once stood only trees, thousands of houses have sprung up, almost overnight. Here are restaurants, drugstores, supermarkets, fire stations, motion picture theaters, schools and even a well-stocked public library. Here is unquestionably the biggest job of quick town building ever attempted in the U.S.A.

Only ingenious planning and vast improvisation with materials and methods made possible its completion in the allotted time. During this period of frantic building architects, army engineers, contractors and construction gangs worked at top speed, constantly handicapped by labor and material shortages, the necessity for secrecy and the difficult terrain. Choice of site was dictated, of course, by the need for isolation and for vast amounts of cheap electrical power best supplied by TVA. But it necessitated some of the trickiest planning on record. Because of the myriad small ridges, survey parties had to check and restake original paper plans on the site in every instance. Road construction, a troublesome problem to begin with, was intensified by the desire to keep all roads at a 10 per cent grade and to build none unless faced by houses on both sides. Considering these tremendous difficulties involved, Oak Ridge is probably the best job of emergency housing to come out of the war.

The first impression one gets of the whole area at Clinton Engineer Works, however, is far from prepossessing. It seems to be nothing but a hodge-podge of construction camp, army base and war housing jammed indiscriminately together. In the distance, away from the residential area, barricaded and closely guarded, are the three enormous manufacturing plants which give this boom town its reason for being. The main building, a labyrinthine concrete fortress housing the gas diffusion plant, compares in size with the mightiest factories the construction industry has ever produced.

Before reaching the town proper one drives past a congestion of stark gray hutments whose circus-tent peaks are





CAFETERIA

LAUNDRY

THE TOWN **Site plan shows scattered housing grouped informally to fit the hilly terrain. Roads follow**

topped with tin smokestacks; crowded trailer camps; barracks; dormitories; administration buildings. These are the overflow from a city which has expanded far beyond the first expectations of its planners. The town itself is a narrow strip approximately one mile wide and over six miles in length, stretching along a major ridge and criss-crossed by minor ones. Penetrating into the heart of the town and discounting the clutter of emergency and secondary housing at the outskirts, the basic organization becomes apparent. It is one of the most skillful jobs of town site planning to be seen anywhere.

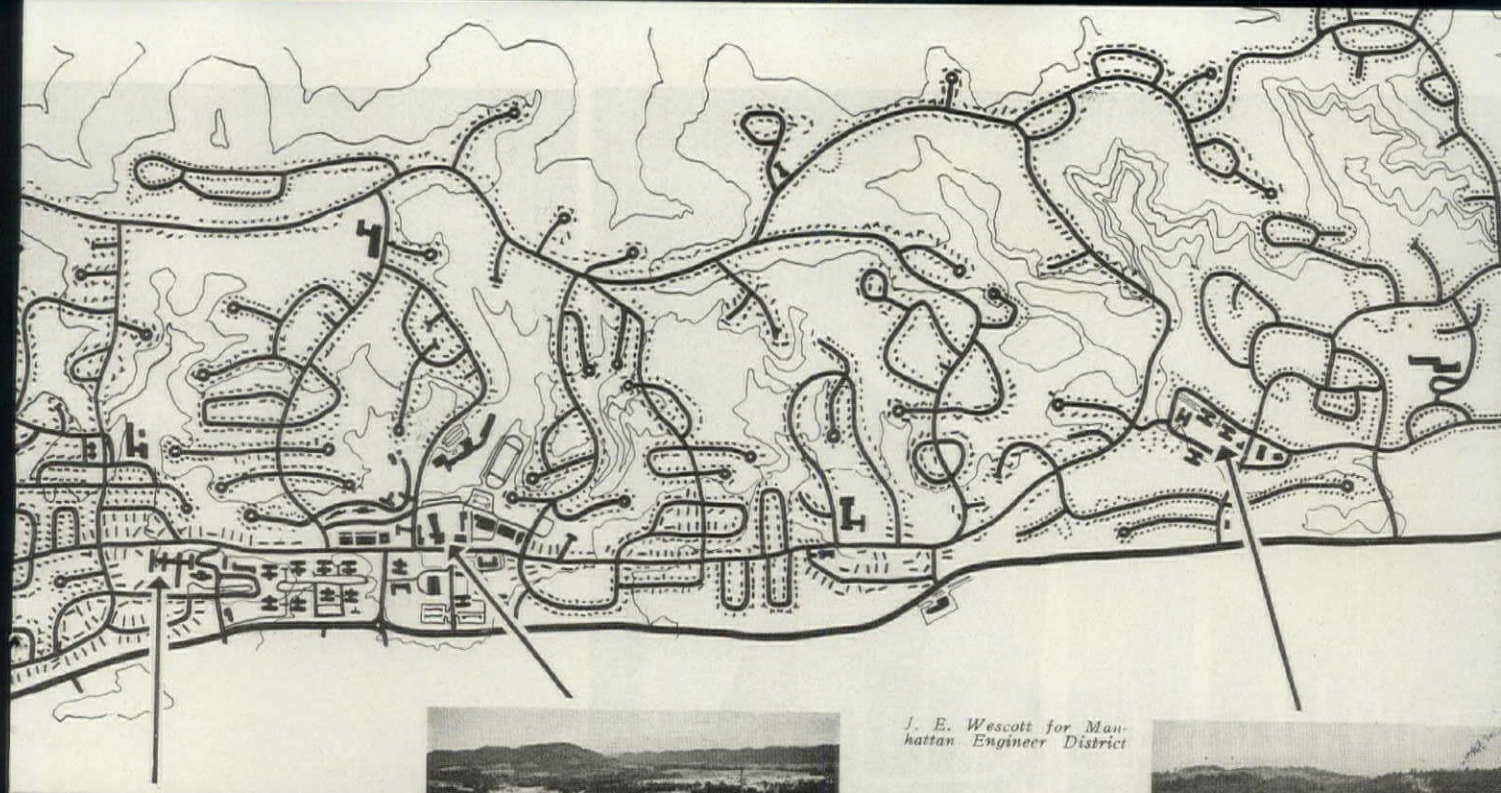
At present Oak Ridge is made up of four areas: East Town (Jackson Square) which extends east of the site's center; East Village, further out; West Town (Jefferson Center) on the opposite side of town; and West Village at the western outskirts where the newest, marginal-type housing is still going up. East Town was the original development started in February, 1943 and laid out for only 3,000 houses. It was a cohesive plan with a central shopping district and three well-located neighborhoods. At that time no one had any idea of the expansion which would later cram temporary housing into every available chink of the town site.

Skidmore, Owings and Merrill were largely responsible for the excellent layout of the project, although its vast scope made necessary a tremendous division of labor. The architectural firm worked with army engineers on housing, site planning, community buildings, roads, sewers and city services. It is difficult to get an over-all picture of construction methods for there was much improvising and adapting according to the available pool of materials and labor.* The army bought up stockpiles of lumber, refrigerators, stoves, sinks, water-closets, hardware and fixtures wherever they could—in lots of 25 and 50. For the entire project over 200 million board ft. of lumber were used and a constant reserve of 5 to 10 million maintained.

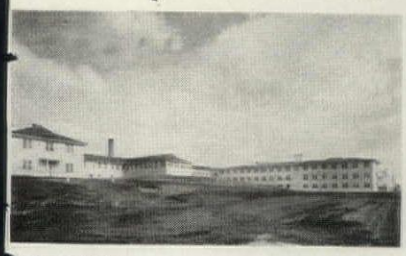
The first 3,000 houses were based on designs developed by Skidmore, Owings and Merrill in conjunction with the John B. Pierce Foundation. In October, 1943 a new program was undertaken expanding the original number of units to 8,000 plus an increase in dormitories, pushing the town out to the west. In this second phase, TVA-type housing was used almost exclusively. When completed in August, 1944, the entire program was considered closed. But by June, 1945 a third expansion of 1,500 dwelling units was started, employing modifications of the TVA house called "V and S. chicken coops," the cheapest type of construction to date.

Another house—the TDU—was obtained from ordnance

* The complexity of the Oak Ridge construction program defies any attempt to identify suppliers, even major ones. It is known that something over 3,000 of the housing units were built of Cemesto and a like number made in Dallas by Texas Prefabricated House Company and trucked to Tennessee.



J. E. Wescott for Manhattan Engineer District



HOSPITAL

JACKSON SQUARE

EAST VILLAGE

contour lines, connect housing with main town center in flat central section.

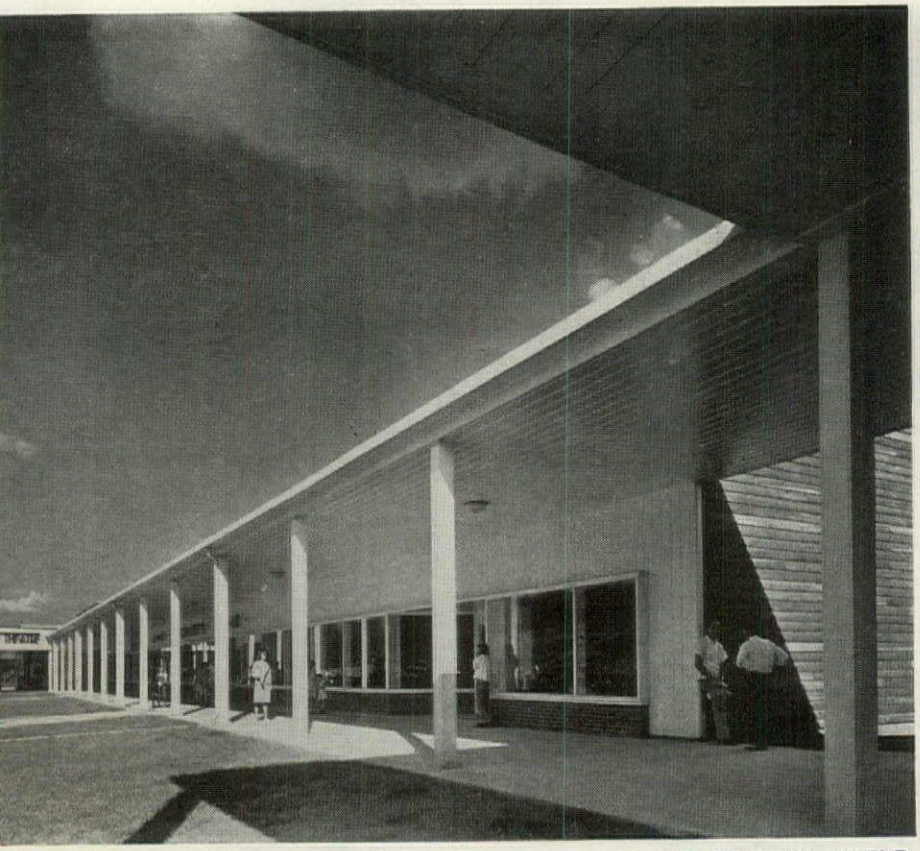
plant housing in La Porte, Ind. and Jefferson City, W. Va., hauled in panels by truck and train and reassembled at Oak Ridge. The total housing has now reached nearly 10,000 family units, 13,000 dormitory units, more than 5,000 trailers, 16,000 hutments and barracks.

To construct such a huge number of houses in such a comparatively short space of time and with such a limited labor supply, highly efficient work methods had to be devised. Oak Ridge specialists solved this problem in much the same way that the automobile industry speeded its production. A clean-cut division of work was used similar to the beltline technique of car assembly. House construction was divided into a series of specialized operations each manned by a separate crew of workmen. One job was done on a number of houses at a time and when the first crew was ready to move on, another crew took over. On a staggered schedule with short gaps between operations to permit flexibility, this technique proved highly efficient. At one time they were completing houses every two hours and turning them over for occupancy at the rate of 30 to 40 a day. Since prefabricated houses were used throughout, this site organization represents a wedding of two construction methods heretofore considered alternates.

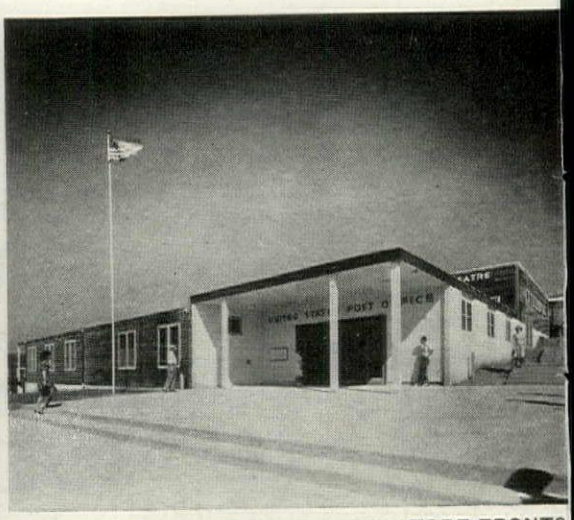
Skidmore, Owings and Merrill's job of site planning—well thought out for the original town — proved adaptable to rapid expansion on the difficult, hilly site. Houses were placed to take advantage of the lovely view and existing trees, but to necessitate a minimum of roadway construction. No professional landscaping was attempted, since the major goal was speed and economy, but the tenants themselves did a remarkable job. As one town-dweller said:

"You can't imagine the desolateness of this place at first. The yellow clay was dotted with stumps of trees and heavily rutted where construction trucks had driven through. On this unresponsive soil, people planted grass and flowers and somehow made them grow."

If beautification was left for the people of Oak Ridge, other features were incorporated into the site planning which made life there far from primitive "camping out." Simultaneously with roads and streets, sewers and waterworks, elementary schools were constructed, planned to serve the different neighborhoods. Shopping centers were scattered at convenient intervals throughout the residential areas, each carefully designed to provide easy access to the stores and equipped with ample parking facilities. A library, churches, hospital, dental clinic and recreation centers were provided, each an important part of the town design and placed to provide the most convenient service for all sections. Thus, although Oak Ridge comes under the category of emergency housing, its expert integration of community facilities is an example of town planning at its best.

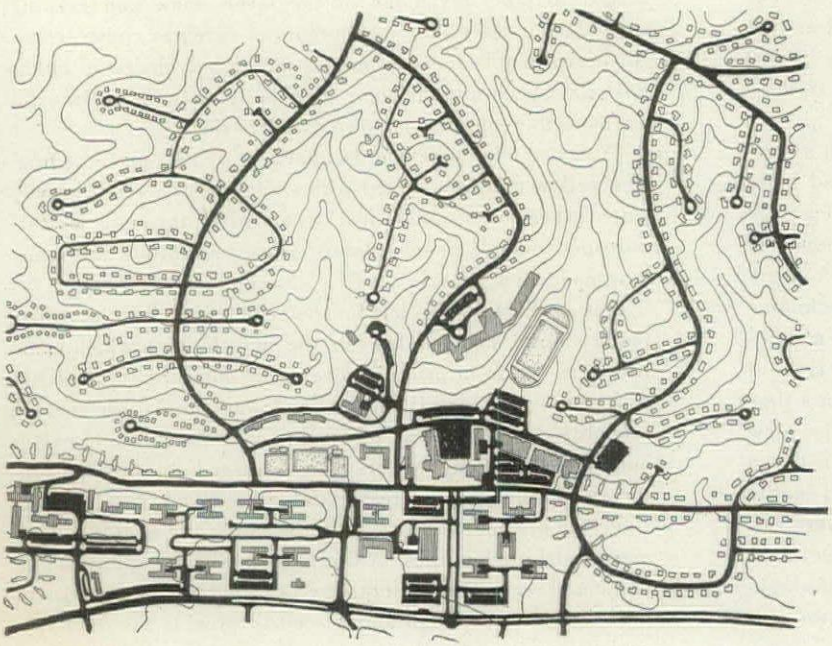


CONTINUOUS ARCADE CONNECTS SHOPS, ACTS AS SUN OR RAIN SHIELD



POST-OFFICE DESIGN ECHOES STORE FRONTS

TOWN CENTER Grouped community facilities add convenience to shopping and recreation.



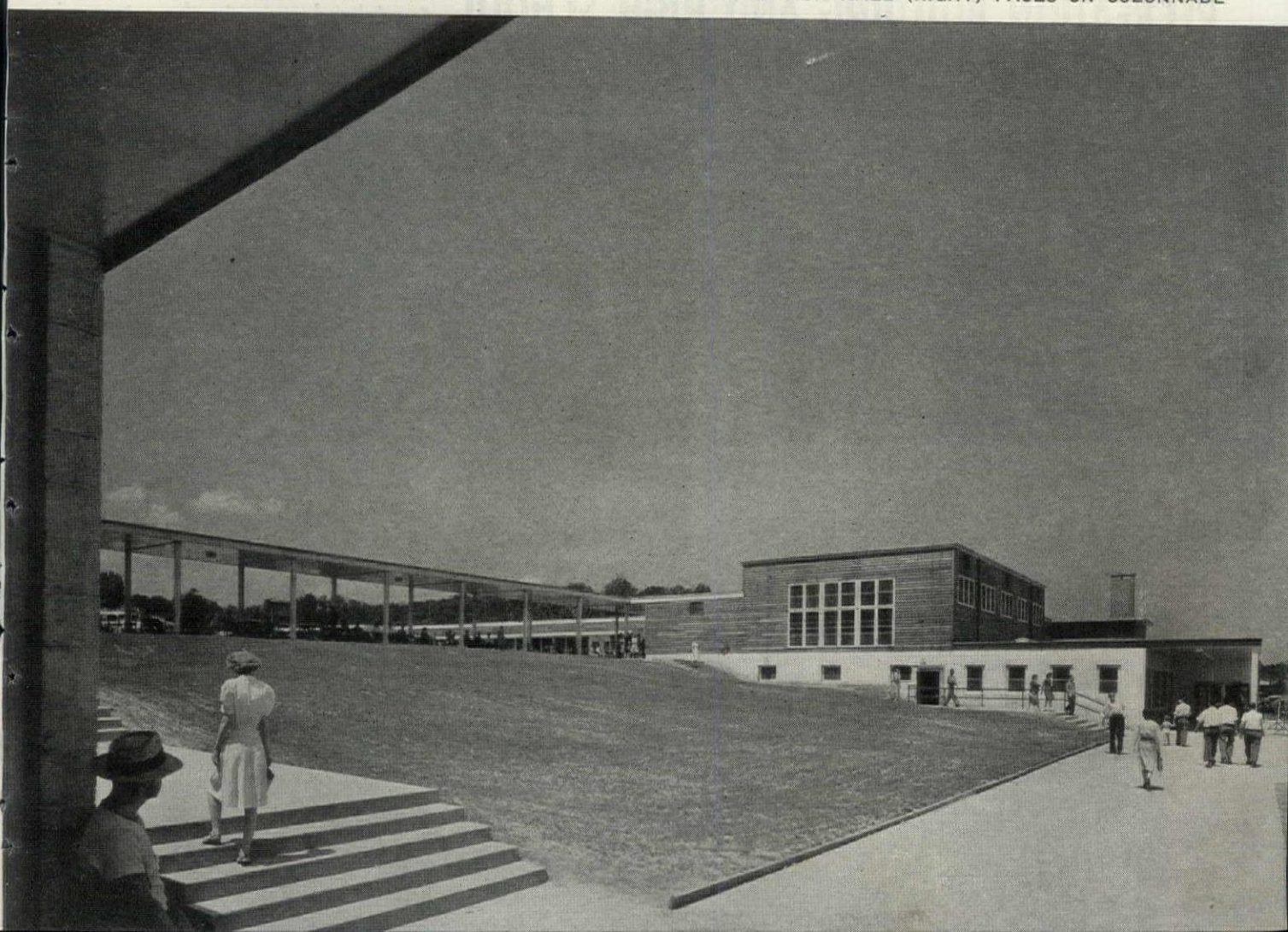
The grouping together of community service buildings in one central area is no new idea in town planning. The interesting point of the Oak Ridge centers is their planned relation to housing. Shops, theaters, schools, hospitals, restaurants and similar facilities were coordinated with government requests for dwelling units to be finished simultaneously. Detailed records of the number of persons conveniently served by existing buildings determined the number and size of new ones. For instance, the number of customers easily handled by a barber or shoe repair shop was used as a basis for providing proportionate facilities when new housing went up.

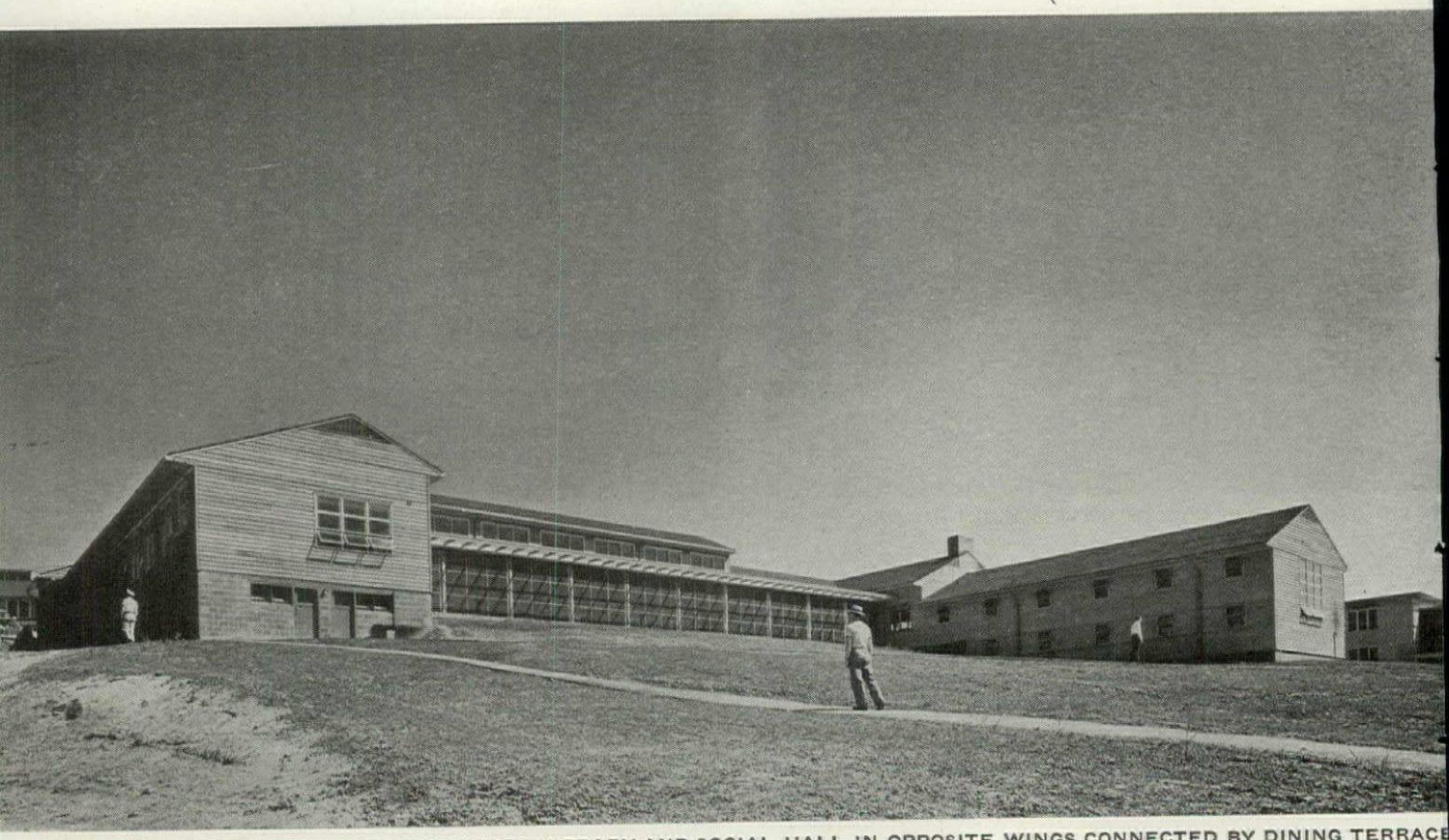
The main center at Jackson Square shown here contains around its periphery a hospital, dental clinic, library and high school — one-of-a-kind facilities which proved adequate to serve the entire town. The central area itself is devoted to shopping and recreation, a two-section plan designed to flank a parking space. The two rows of buildings are connected at their base by a covered walk. Similar shopping centers are located throughout the town at appropriate intervals to provide quick and easy service for the scattered population.

MOVIE THEATER IS ONE OF SEVEN BUILT IN OAK RIDGE

UNFINISHED WALLS LOOK BETTER THAN GINGERBREAD

MAIN ENTRANCE TO TOWN CENTER FROM TENNESSEE AVENUE. RECREATION HALL (RIGHT) FACES ON COLONNADE





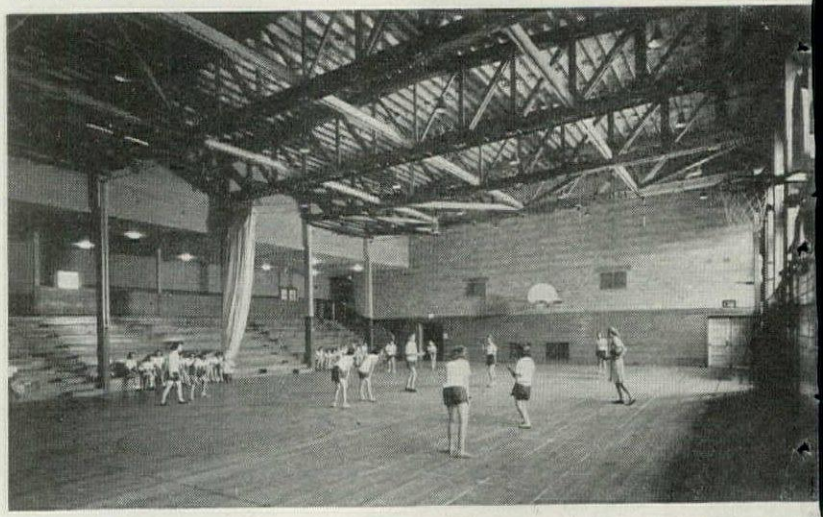
U-SHAPED RECREATION BUILDING PLACES LIBRARY AND SOCIAL HALL IN OPPOSITE WINGS CONNECTED BY DINING TERRACE

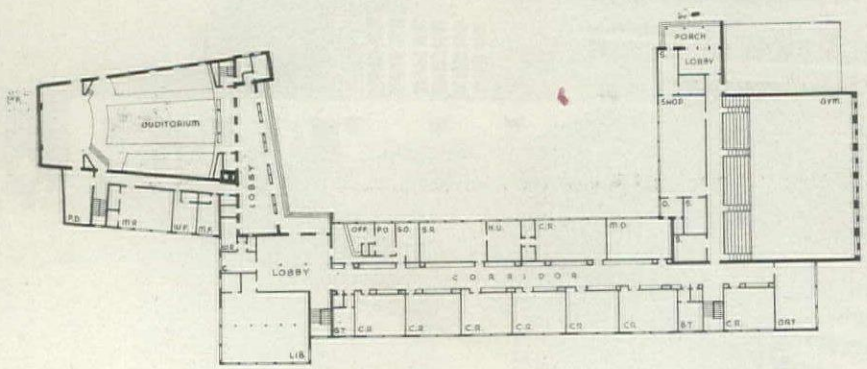
RECREATION BUILDING AND HIGH SCHOOL

Specialized areas in these two-winged

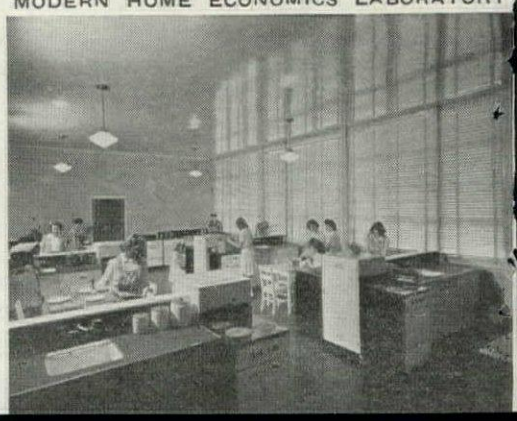
Group study and recreation facilities are an important part of the Oak Ridge plan. The community hall above includes a public library, social rooms and a terrace for outdoor dining. The high school below is equipped with a gymnasium, auditorium, library and cafeteria plus classrooms. In each case the U-shaped floor plan precludes a conflict between noisy and quiet activities, by placing them in separate wings. The excellently equipped high school building doubles as an extra recreation space for adults. Intra-city athletic contests are held here and the auditorium is used for concerts, church services and for little theater group activities.

LARGE GYMNASIUM WING CAN BE SHUT OFF FOR ADULT ATHLETICS

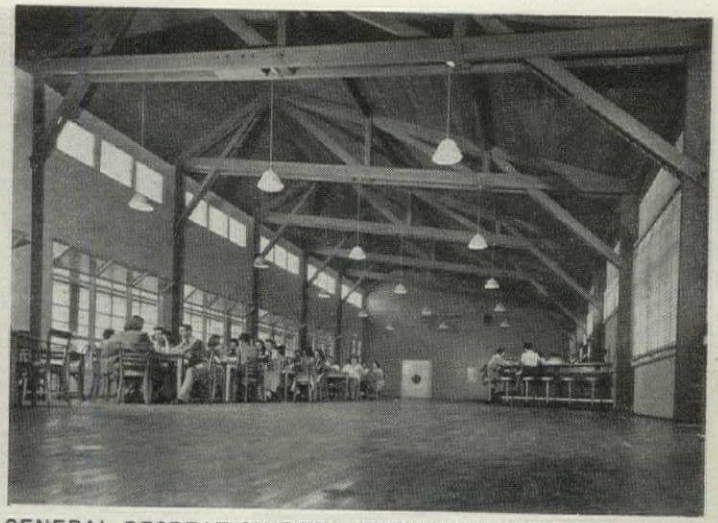




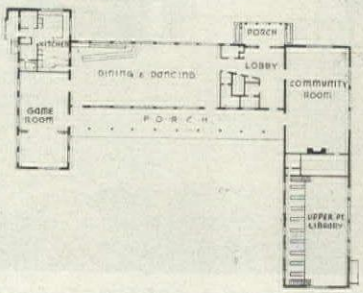
MODERN HOME ECONOMICS LABORATORY



BRARY DESIGN STRESSES CONVENIENT ACCESS TO BOOKS

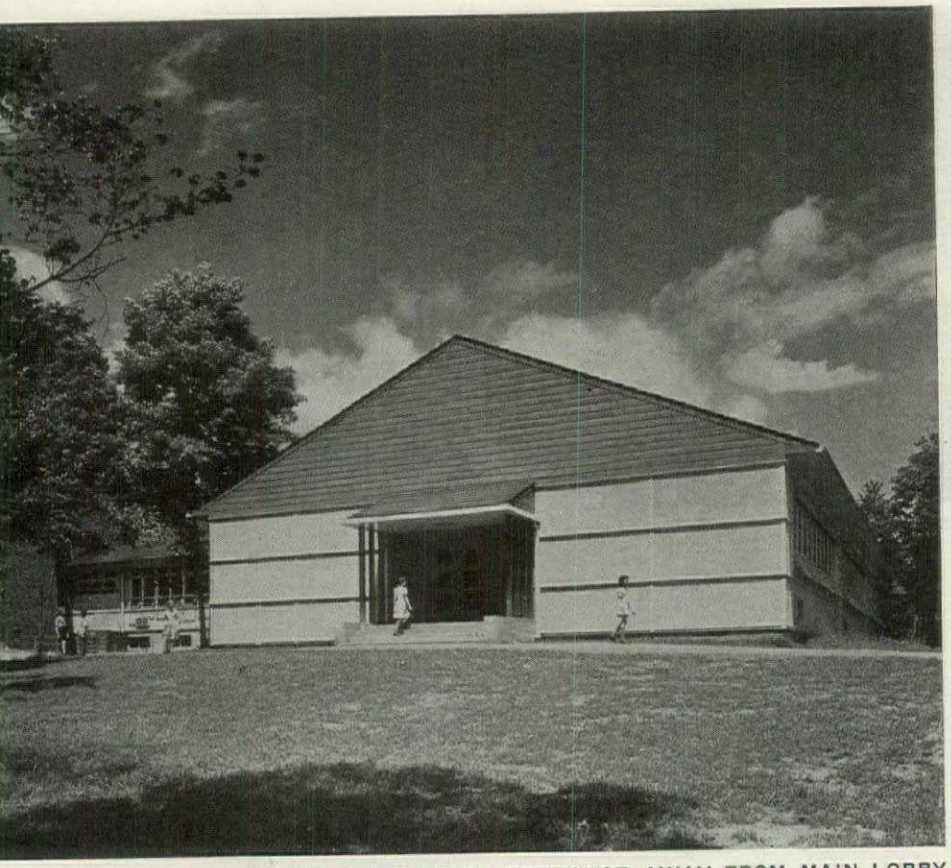


GENERAL RECREATION ROOM OPENS ON OUTDOOR TERRACE

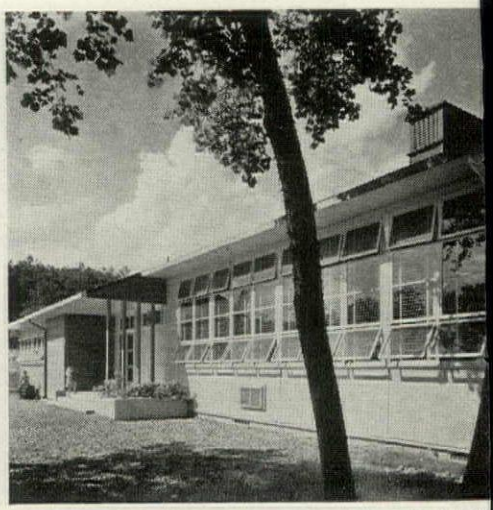


uildings provide flexible study and recreation space for both students and adults.

EAR VIEW OF HIGH SCHOOL REVEALS ADJOINING ATHLETIC FIELD. NOTE PROJECTING CLASSROOM WINDOWS (CENTER)



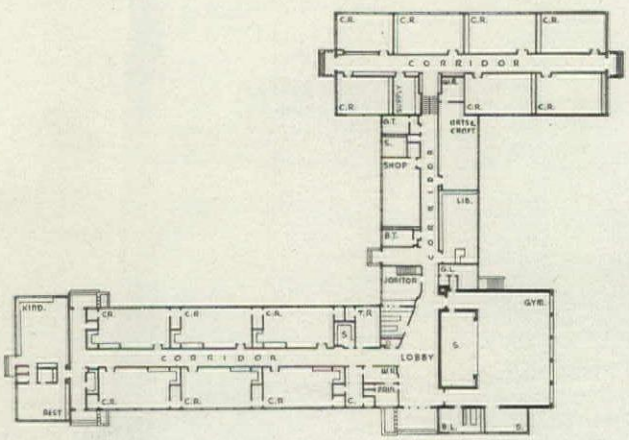
KINDERGARTEN HAS A SEPARATE ENTRANCE AWAY FROM MAIN LOBBY



AWNING SASH AND FIXED CENTER LIGH

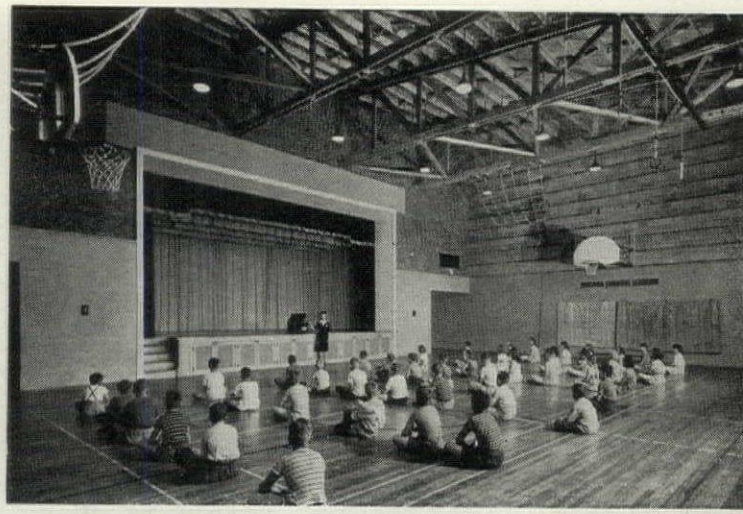
ELEMENTARY SCHOOLS

Spreading floor plan used in the first three grade schools erected at Oak Ridge provides efficient separation of noisy and quiet school activities.



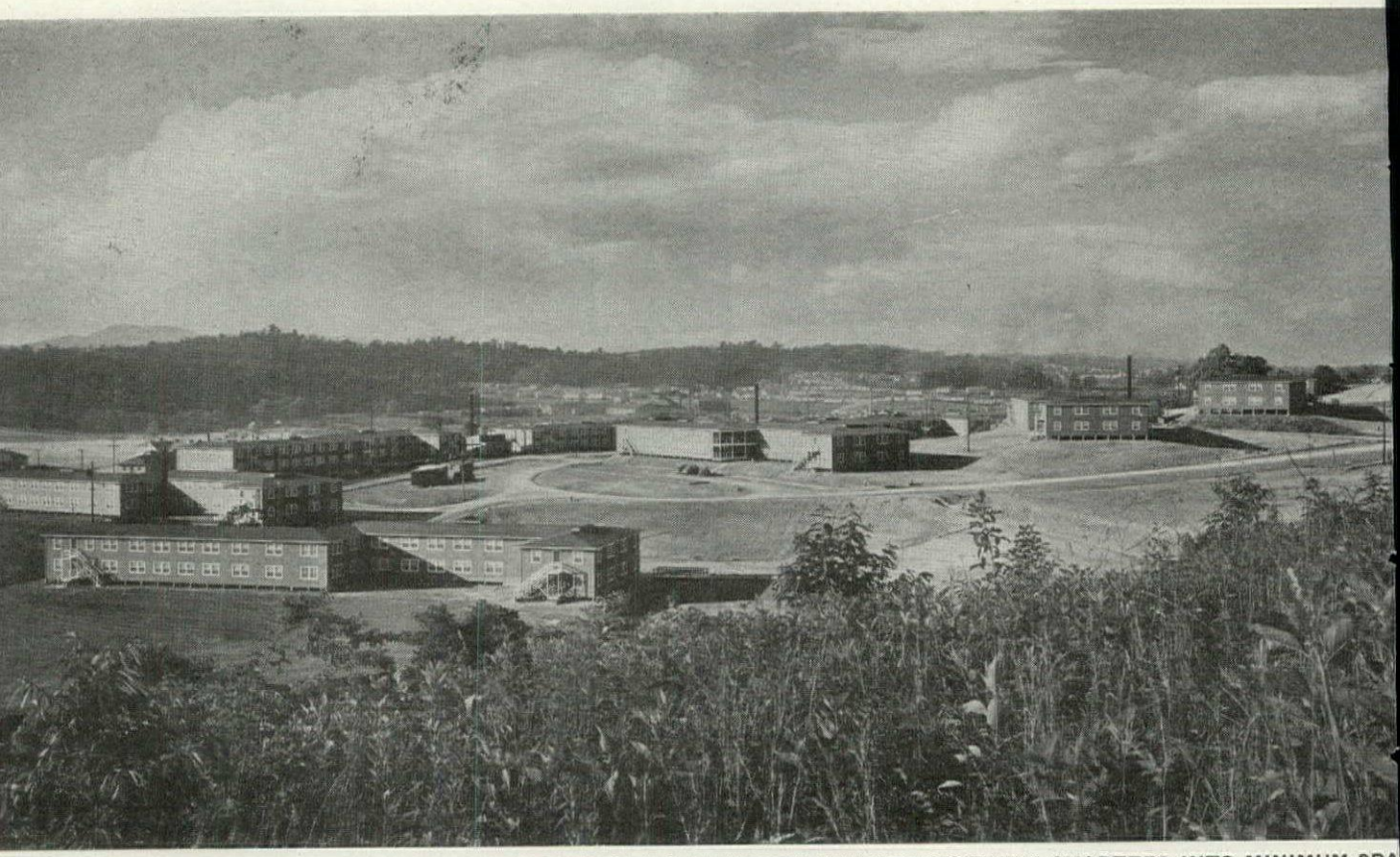
Because the great number of professional and scientific men who came to Oak Ridge demanded high scholastic standards for their children, the educational system there ranks as one of the best in the country. The buildings themselves, although of inexpensive construction, conform to the most advanced principles of lighting, ventilation and space use. Shown here is an elementary school typical of the first ones erected, a plan which has since been changed to speed the program and cut costs. This type of building uses the Pierce Foundation post and lintel construction also employed in the initial housing units. Asbestos board and wood siding are the major materials with brick used only at the gymnasium section. The crux of the plan is a lobby entrance which separates gymnasium and classrooms and gives direct access to the shop wing at rear. The kindergarten at the extreme end of the classroom wing was added as a separate unit and is equipped with a rest section for the children.

ASSROOMS EMPLOY INFORMAL SEATING ARRANGEMENT



GYMNASIUM EQUIPPED WITH STAGE DOUBLES AS AUDITORIU

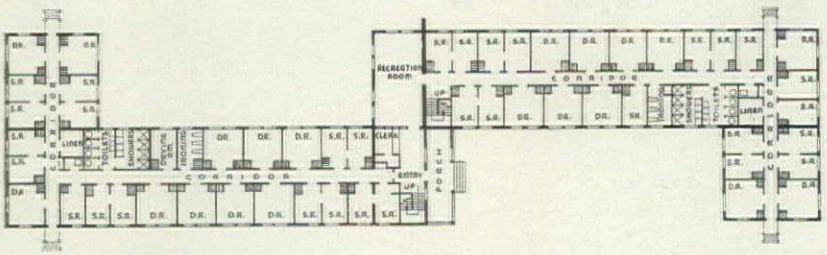
PICAL SCHOOL HAS CENTER ENTRANCE FLANKED BY CLASSROOM WING AND GYMNASIUM WITH SHOP EXTENSION AT REAR

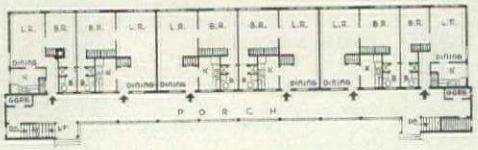


BARRACKS-TYPE DORMITORIES ARE AN EMERGENCY MEASURE WHICH SQUEEZE MAXIMUM QUARTERS INTO MINIMUM SPA

MULTIPLE HOUSING

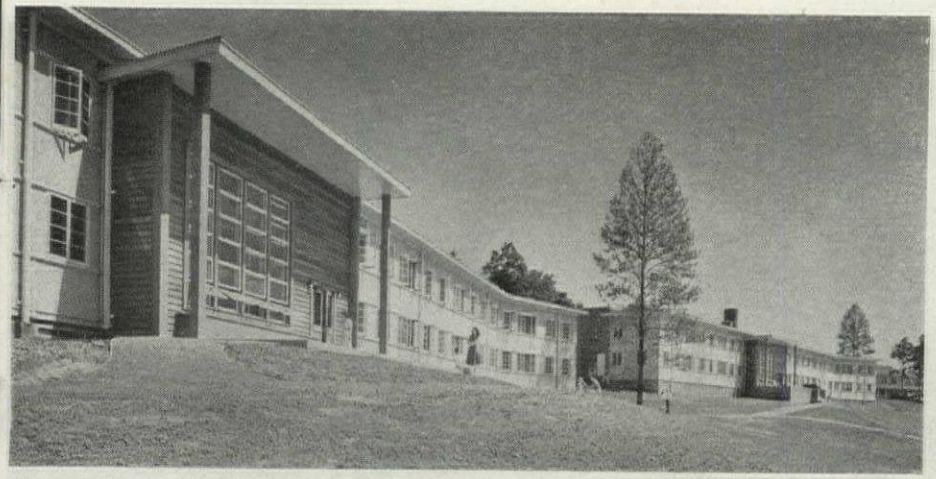
Sturdy apartment buildings and flimsy non-housekeeping dormitories represent opposite ends of the wide range in housing quality and comfort at Oak Ridge.

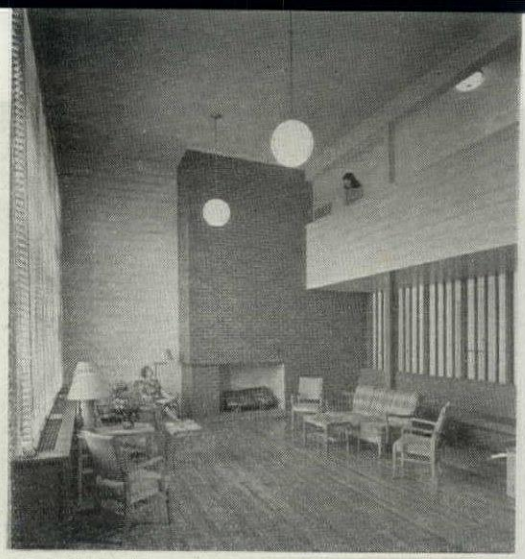




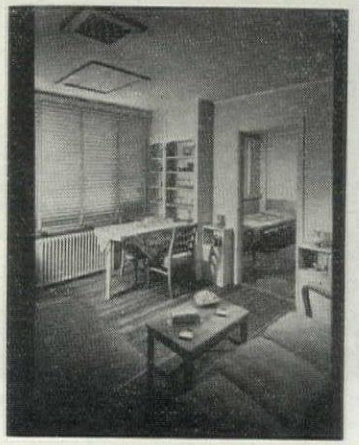
As a necessary alternate to single family dwellings and a quick-housing measure to handle the periodic influx of new workers, various types of multiple dwelling units have become an important part of Oak Ridge building. Since a large part of the population consists of single men and women, minimum dormitories proved a practical solution to the gigantic need. Here, room space was pared down to provide barracks-like sleeping quarters with a combination bath-shower-laundry room servicing each wing of a dormitory. Tenants' major gripe was lack of closet space which necessitated storing clothes in one chest of drawers.

The efficiency apartments, consisting of two rooms and a Pullman-type kitchenette in the living room, are at the opposite extreme of comfort and are considered the choicest apartments at Oak Ridge. Built-in furniture, a well-appointed recreation lounge, maid and janitor service contribute to their appeal. Other apartment houses range in size from four to twelve families (plan, right), the smaller ones being a variation on the standard row house theme.



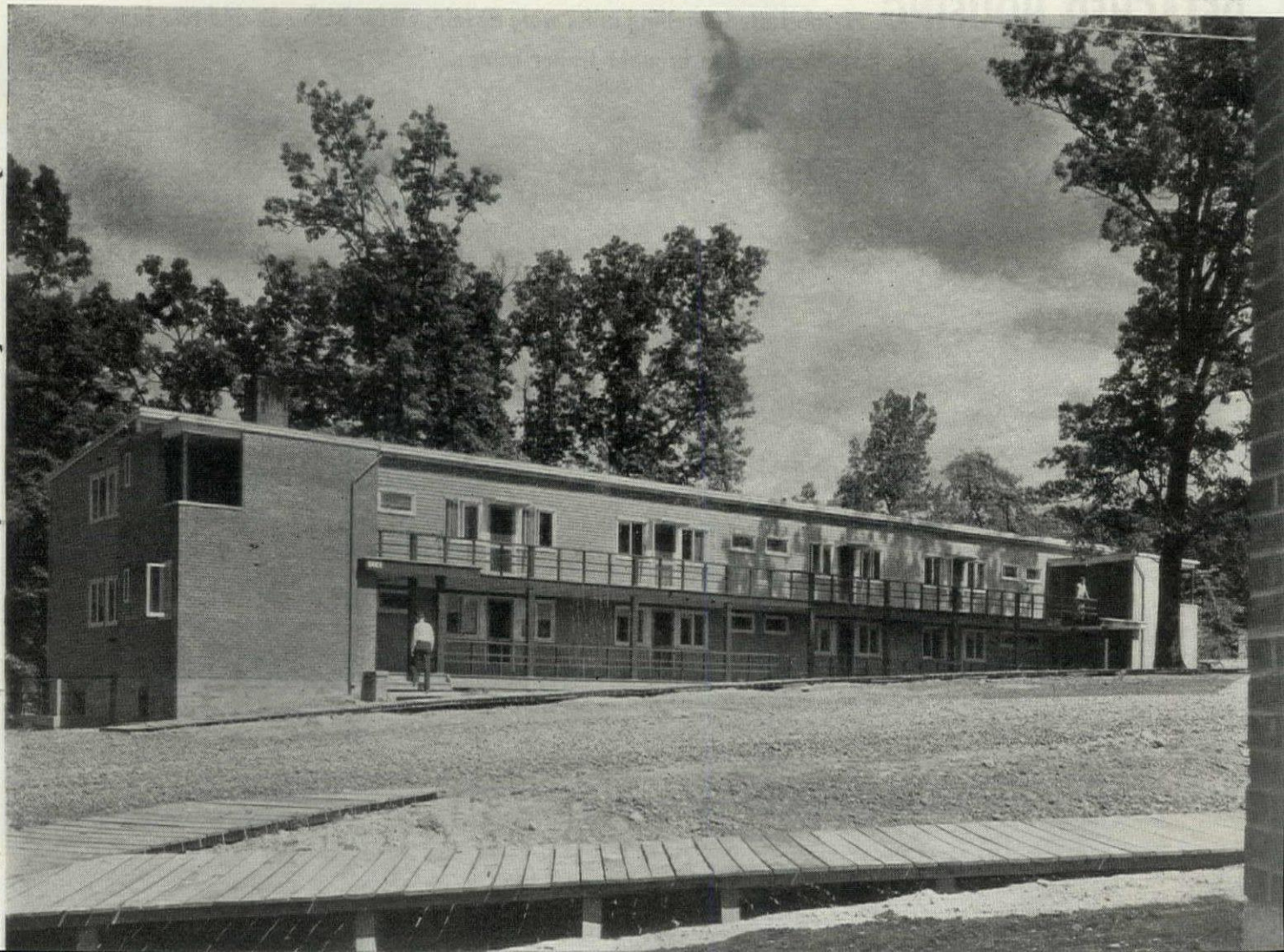


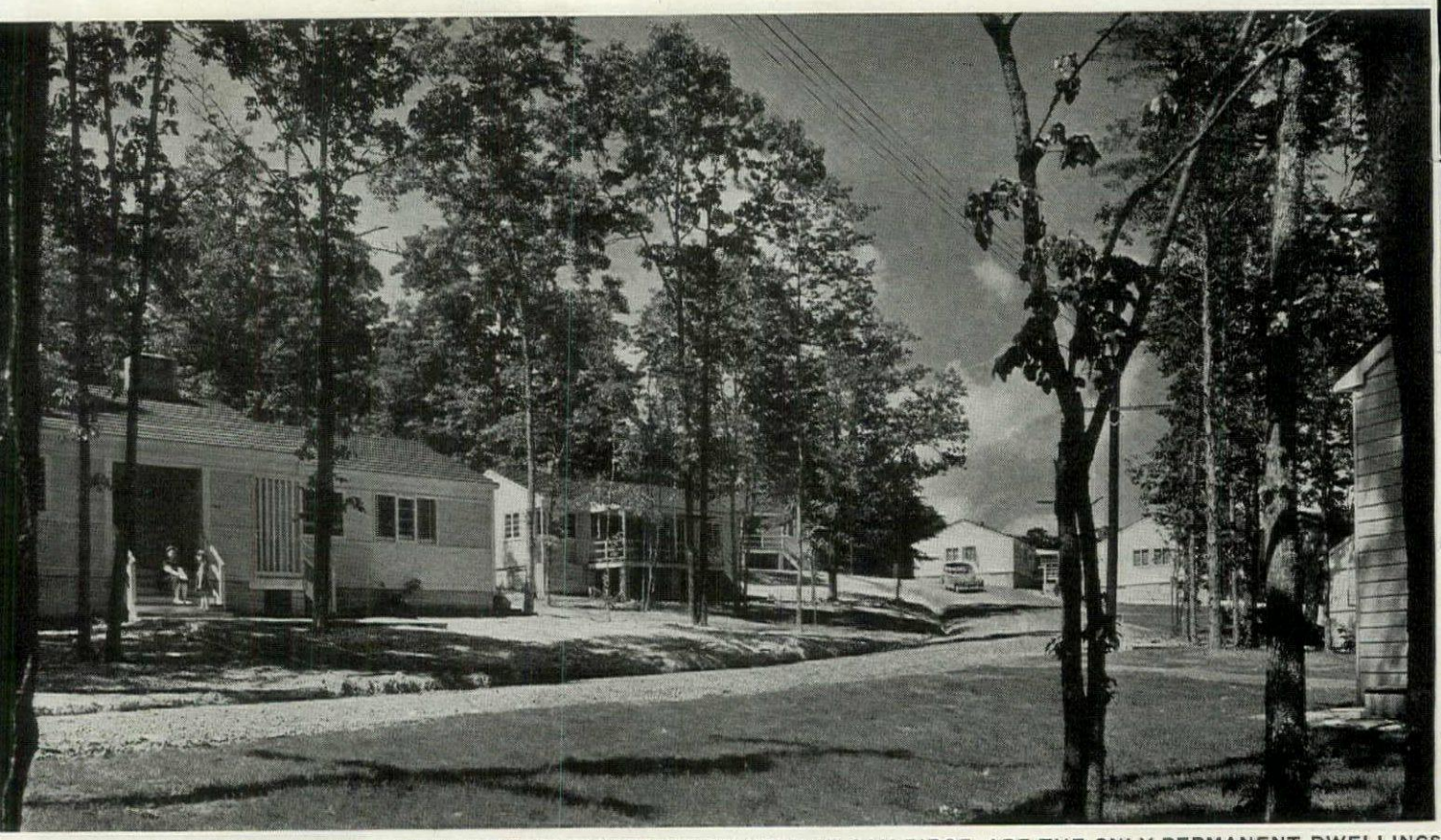
EFFICIENCY APARTMENTS HAVE PUBLIC LOUNGE, ARE MOST POPULAR MULTIPLE HOUSING



INTERIOR OF TWO-ROOM UNIT

COMPACT 12-FAMILY BUILDING TAKES ADVANTAGE OF VIEW WITH CONTINUOUS BALCONY AND A GROUND FLOOR PORCH



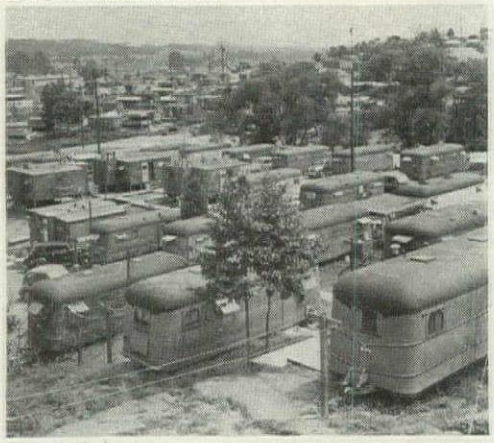


PIERCE FOUNDATION HOUSES, FIRST TYPE OF CONSTRUCTION USED AT OAK RIDGE, ARE THE ONLY PERMANENT DWELLINGS

DETACHED HOUSING

Prefabricated dwelling units were developed for both one and two families, for flat terrain and hillside sites. Rapid expansion brought trailer camps.

Life photo: Edward Clark

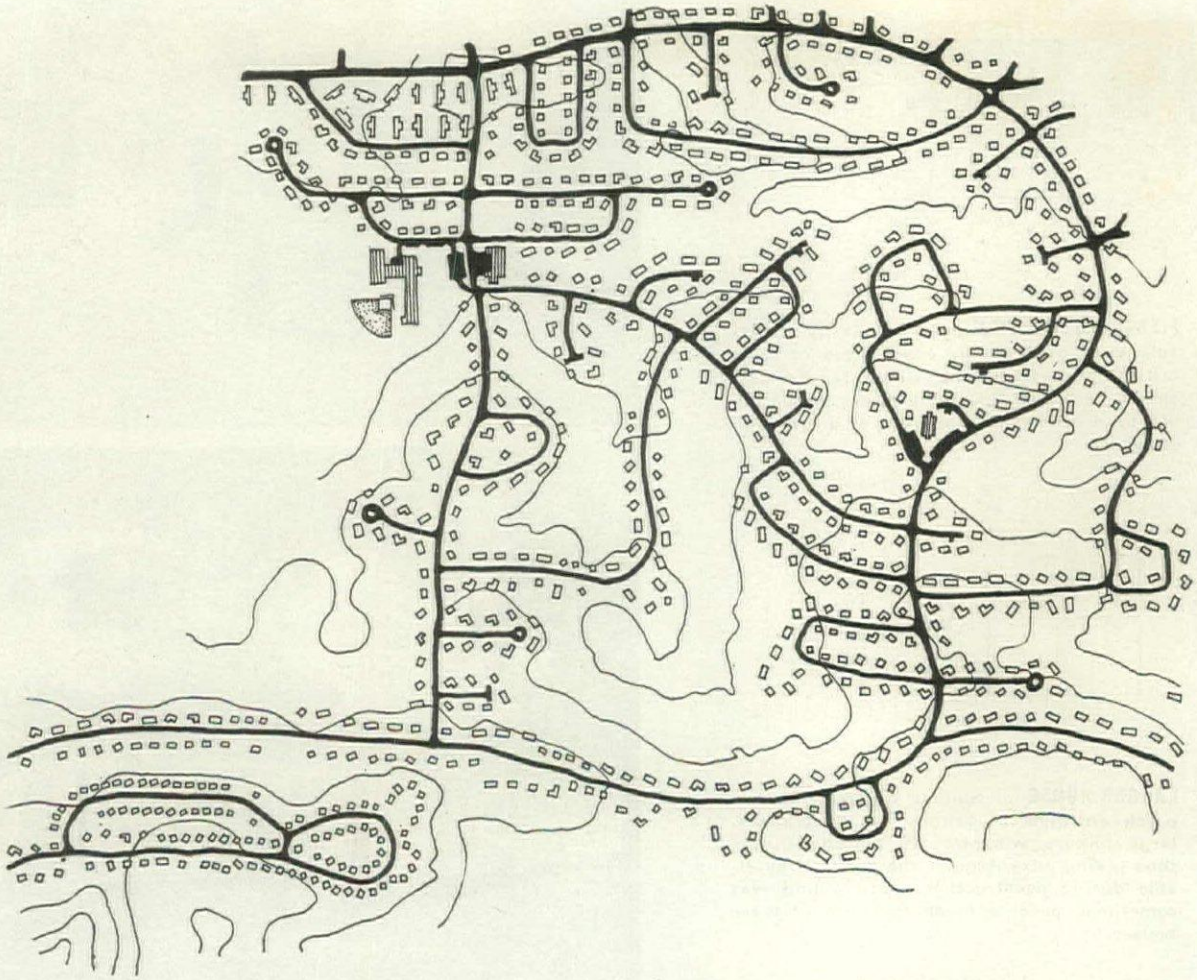


TRAILER CAMPS sprang up to accommodate the vastly expanding population. Oak Ridge quickly absorbed 5,000 such homes, needed more, couldn't get them. To make up the necessary number of units, prefab houses from other projects were demounted, hauled, reassembled; finished designs pared to the minimum.

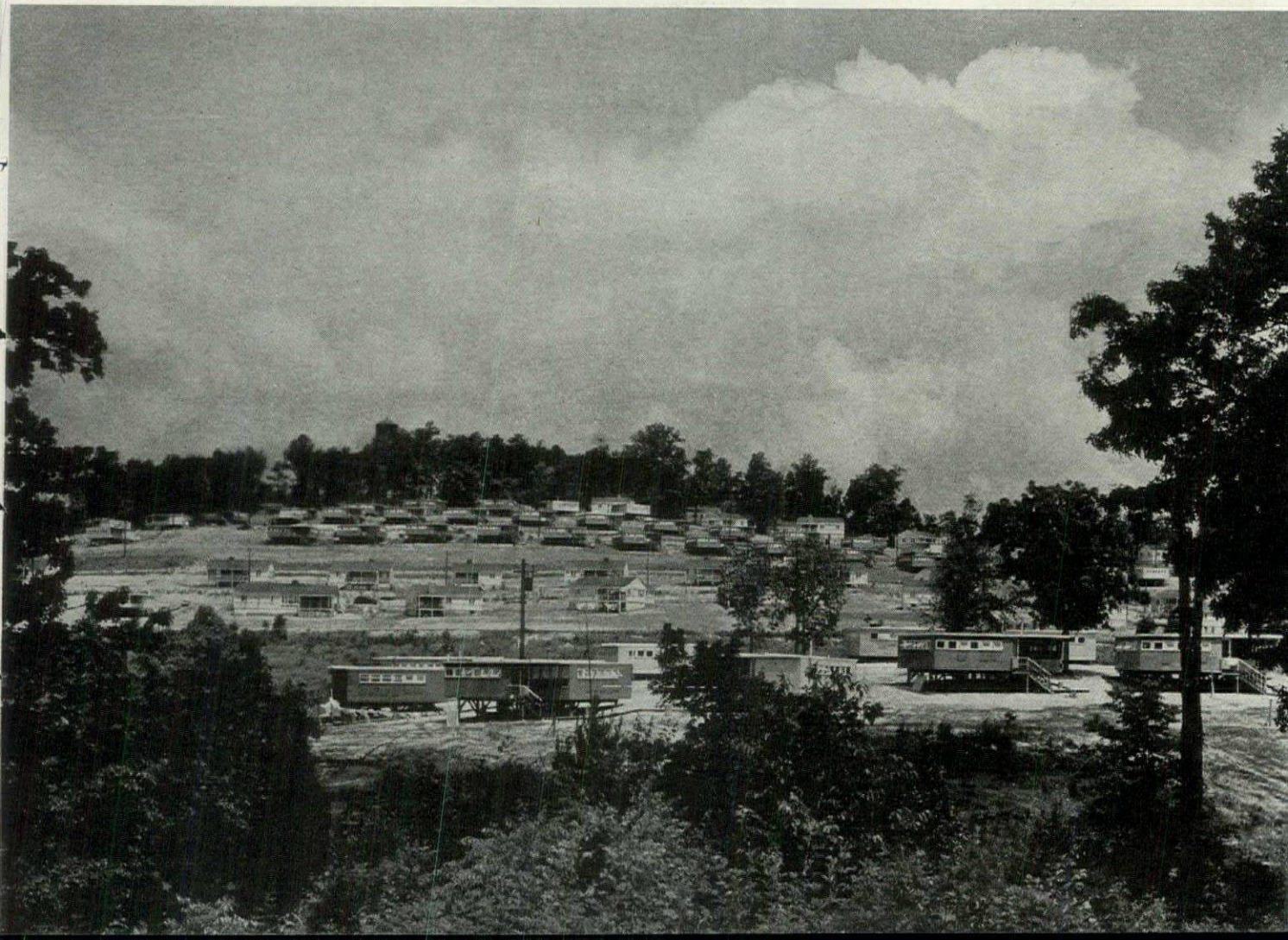
As Oak Ridge expanded far beyond its original limits, housing followed a trend toward cheaper and more temporary construction. The first 3,000 homes were permanent units; a Pierce Foundation design using prefabricated panel construction of cement asbestos board. These compact, one-story houses have an open, efficient plan which appeals to housewives in servantless Oak Ridge. Fireplaces, picture windows, built-in cupboards and a blower system of air circulation for summer as well as winter are interesting features not usually found in emergency housing.

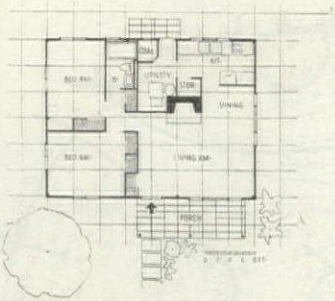
When 5,000 more dwelling units were suddenly requested, the TVA-type, shipped in room sections, was adopted to cut labor time at the erection site. Although temporary housing, these units provide adequate, well-planned living space varying in size from one to three bedrooms in combination with living room, kitchen and bath. They are finished in stained plywood siding.

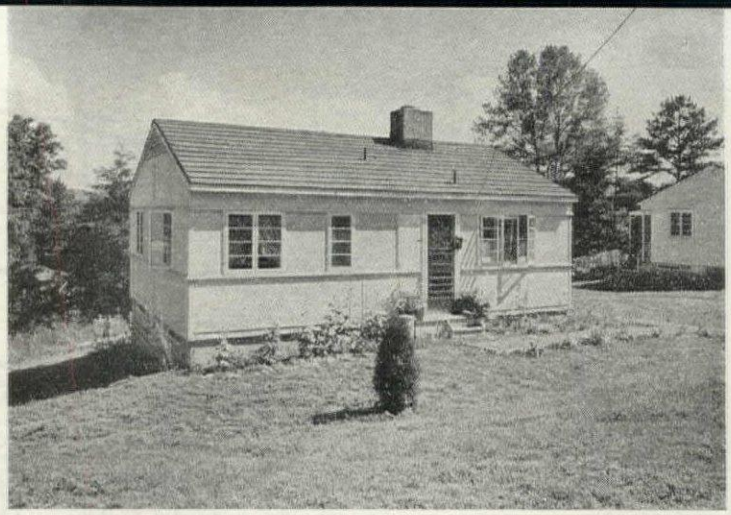
The third phase of building, started in June, 1945, calls for an additional 1,500 homes of extremely inexpensive construction. To meet this demand, original TVA designs have been simplified even more, cutting costs to the minimum.



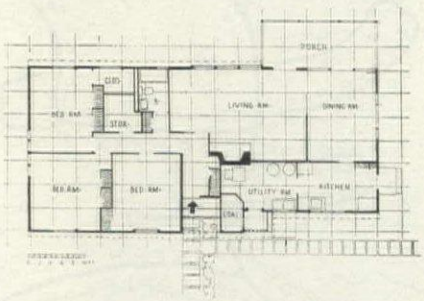
TVA SECTIONAL PREFABS; EMPLOYED IN SECOND PHASE, WERE SCATTERED THROUGHOUT REMAINING USEFUL SITE SPACE

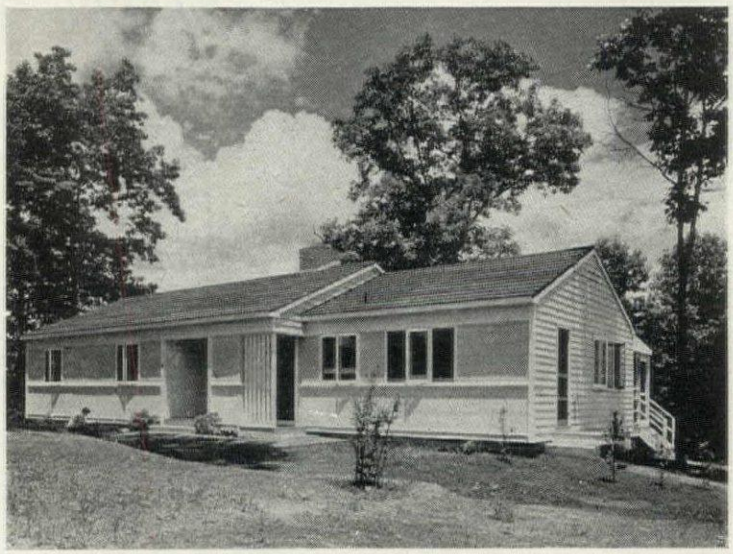




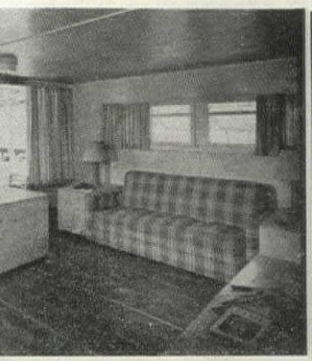


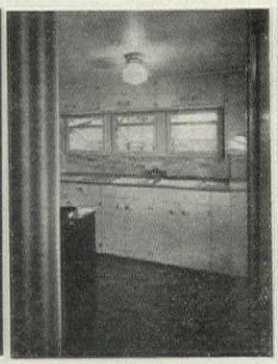
PIERCE FOUNDATION design is easily adaptable to change and is constructed of non-critical materials. The single family unit shown here has a concrete block foundation not used consistently because of a shortage of supply.

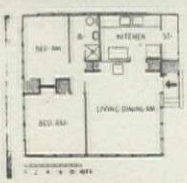




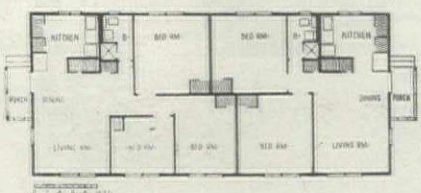
LARGER HOUSE of similar construction has porch entrance at center. In most cases, large picture windows are placed at rear thus taking advantage of the view. If available during construction, wood siding was sometimes used to finish the ends of these houses.

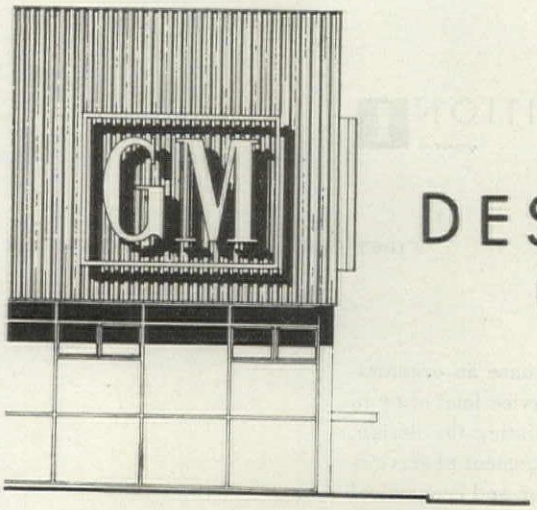






TVA HOUSE (above) fits easily onto a sloping site. In spite of size and material limitations, this is a handsome unit, handsomely furnished, proving again that beauty is not dependent on price. A larger house, but one less skilfully designed is the recently built two-family temporary dwelling unit shown below.





DESIGN COMPETITION

FOR DEALER ESTABLISHMENTS

If any further proof were needed of the importance of well designed building to industry and commerce, the recent General Motors Design Competition would clinch the argument. For in awarding prizes totaling some $55,000, the company gave the most tangible evidence possible of its conviction that good buildings pay good dividends. Moreover, in holding this competition when it did, GM intervened with uncanny timeliness in behalf of sound modern solutions to the postwar dealer building.

Despite the ubiquity of automobile dealer establishments, the chances are that few architects, realtors or lending institutions have anything but the haziest notion of what goes on in them. Yet the retail automotive business is large and complex, and one which, in a sense, has never been properly housed. In 1915 any livery stable was adequate, for in those days demand far outran supply and the dealer had little to worry about in the storage or display of new cars. After World War I, in an effort to eliminate seasonal fluctuations in motor car sales, the manufacturers sought dealers who could finance and store large numbers of new vehicles. This led to large showrooms and big storage areas. By the late thirties, things had changed again. Better cars and better roads had largely eliminated seasonal sales fluctuations; while the sale of used cars, parts and accessories and services had steadily grown in importance. Smaller, better designed and more flexible buildings were indicated—and a few were built before the war intervened.

Now, retail automotive dealers, according to GM's estimates, are prepared to spend up to $450,000,000 on new plants. It was thus with the two-fold purpose of getting "the dealer to analyze his functional requirements" and to prepare the building field "to express these requirements in a functionally designed establishment" that GM staged this competition.

The designs submitted—all 217 of them—showed with impressive unanimity how complete has been the conquest of modern architecture in commercial buildings. The shoddy allusiveness of the twenties and thirties has disappeared from the facades. Gothic arch and Classic frieze are no longer achingly stretched to span the horizontal voids of 20 ft. plate glass windows. Tapestry brick and marble facings no longer stop in transparent falsehood 6 in. off the street front. Instead, there is every evidence that both modern structure and modern display techniques have been studied and largely mastered by the contestants. As the jury, chaired by Timothy Pflueger, AIA, declared: "the competition as a whole was highly successful. The design of automobile dealer buildings has been neither inspired nor inspiring and the many excellent solutions submitted should prove a very potent force in stepping up standards in this field."

In two respects, however, the jury felt the contestants not quite ready to assume their postwar responsibilities. One lay in their tendency toward lavish use of expensive street frontage instead of more intensive use of the cheaper land at the rear; the other in their "lack of imagination in solving such important problems as car reception and handling of customers."

Whatever else the Competition established, it is clear that no dealer buildings in the future can be designed without reference to it. The Program itself was a worthwhile contribution to a scanty literature on the subject. The premiated and purchased drawings, which will shortly be available in book form, are rich in creative solutions. Together they will constitute an indispensable base for any dealer who builds, or any architect who designs, a dealer establishment.

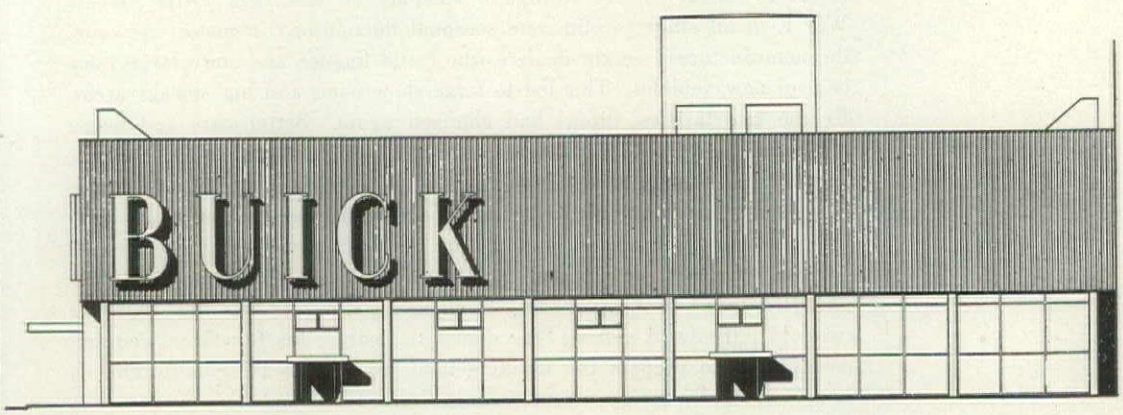
GENERAL MOTORS DESIGN COMPETITION

PROGRAM NO. 1

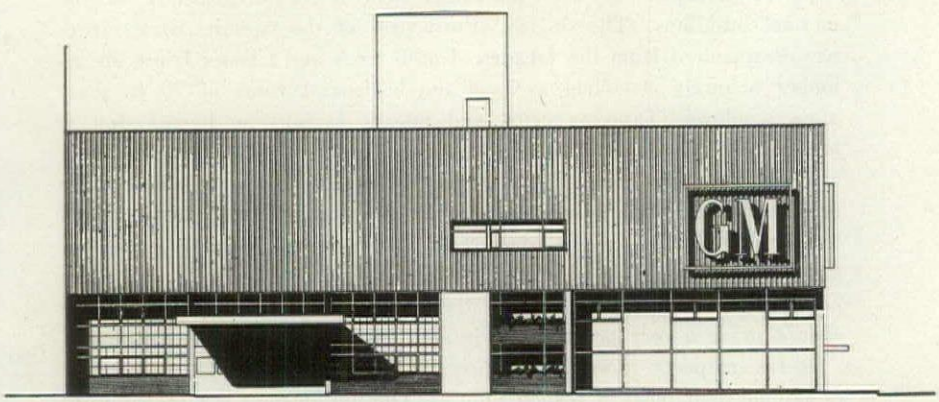
FOR DEALER ESTABLISHMENTS

FIRST PRIZE: ROBERT T. COOLIDGE
D. C. BYRD

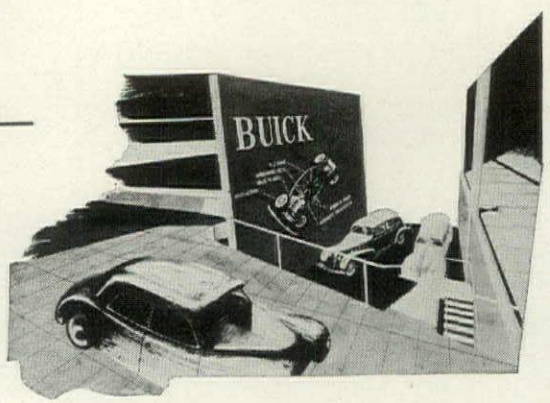
For a dealership in passenger cars exclusively, this project is designed to house an organization with an annual sale of 750 new and 1,200 to 1,500 used cars, a daily service load of 60 to 75 cars and a wholesale and retail parts and accessories business. In premiating the design, the jury called especial attention to its "relatively compact plan, good arrangement of services and very effective display." The latter involves not only an extremely effective and economical facade but also the adept handling of the showrooms proper. Here the designers have perforated the two outer corners of the main floor, thus opening the basement showroom (for used cars) to the street; they have also introduced a mezzanine for the display of parts and accessories. All three levels are connected by free standing stairs.



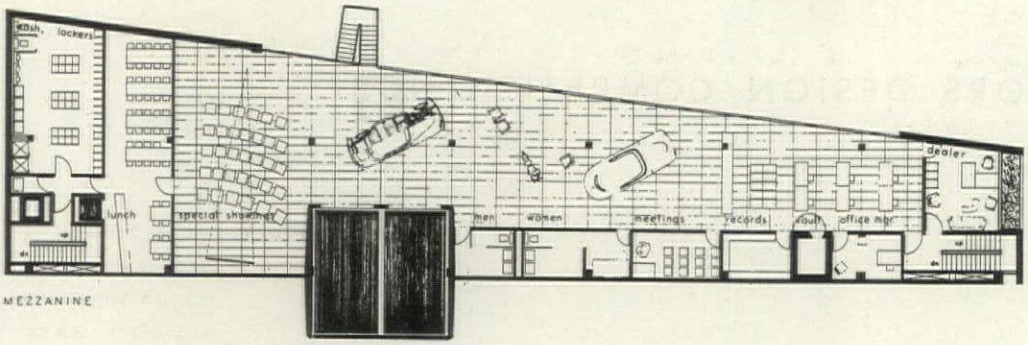
FRONT ELEVATION



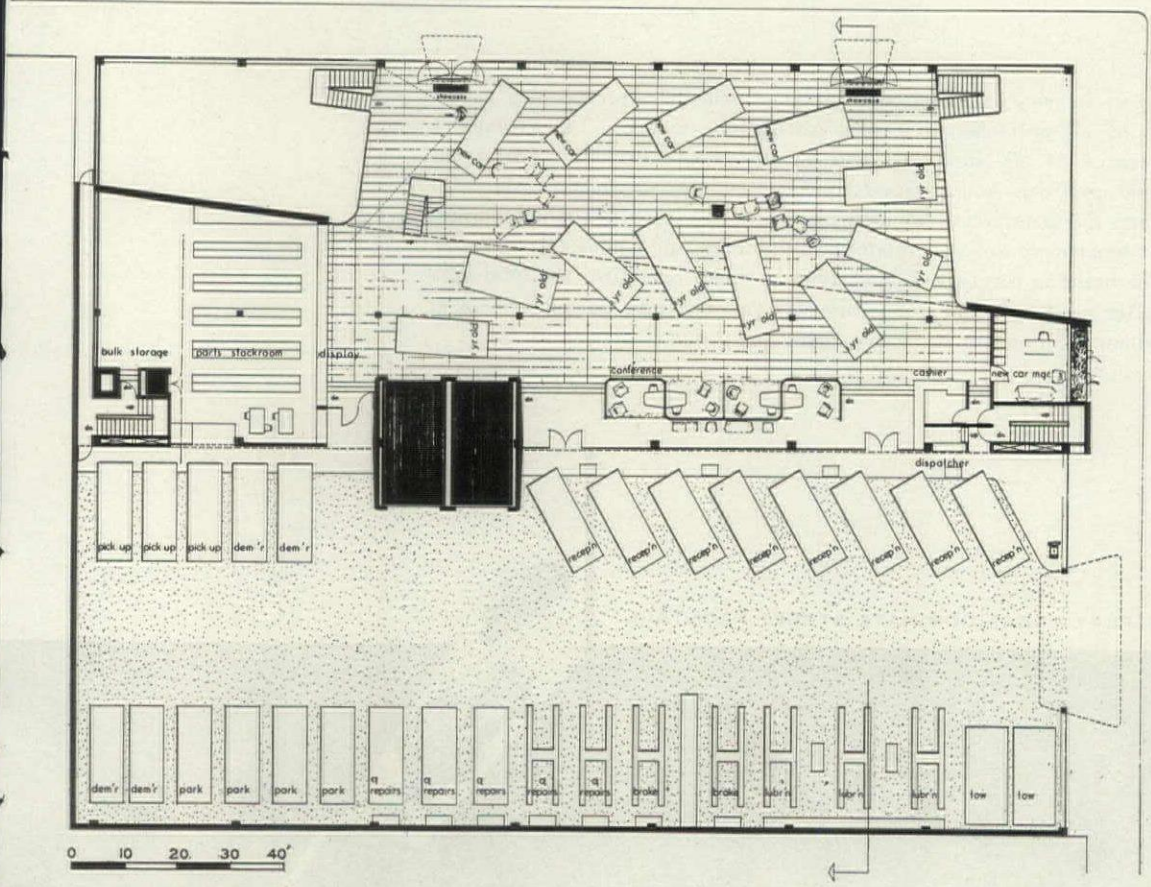
SIDE ELEVATION



BASEMENT SHOWROOM IS VISIBLE FROM STREET

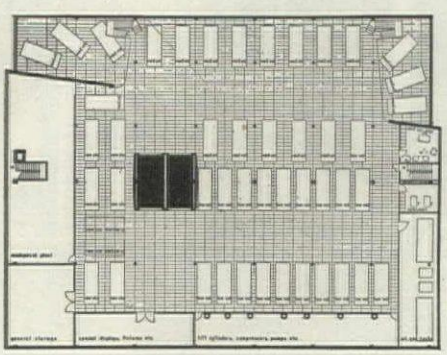


MEZZANINE

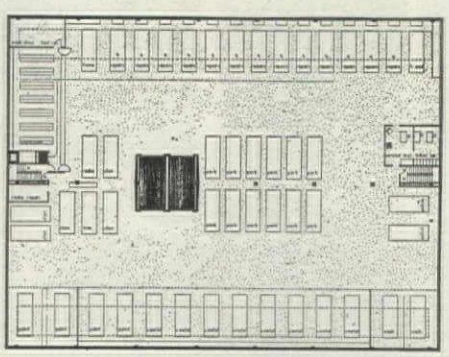


STREET FLOOR

VEHICULAR CIRCULATION is organized around a bank of two elevators with doors at either end of both cars. Facilities for office staff are concentrated at one end of sales area on first and mezzanine floors, mechanics' washrooms and lunchroom at the other.



BASEMENT PLAN



SECOND FLOOR

GENERAL MOTORS DESIGN COMPETITION 2

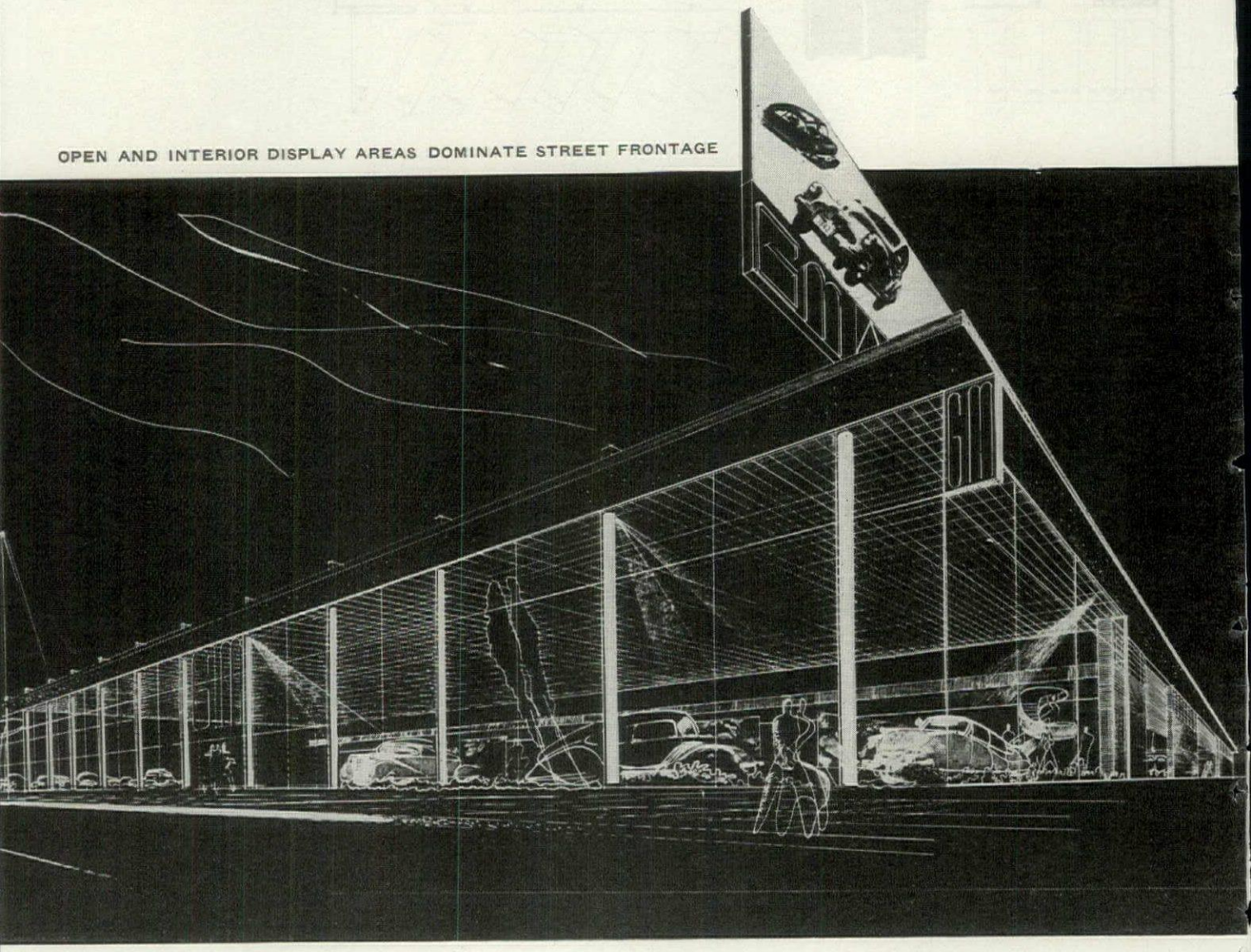
FOR DEALER ESTABLISHMENTS

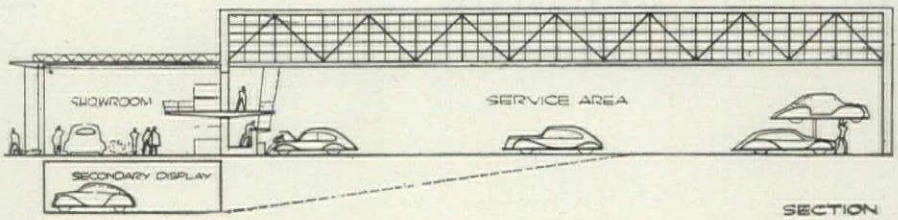
PROGRAM NO.

FIRST PRIZE: READ WEBER
JAY S. UNGER
TANIA WAISMAN
SIDNEY L. KATZ
VICTOR ELMALEH

For a medium-sized dealership in passenger and commercial vehicles, this project was premiated by the jury as "meeting all problems in a very satisfactory manner." It assumes a business with a sales potential of 300 new cars and 50 new trucks annually; an annual turnover of from 450 to 600 used cars and 50 used trucks; a service capacity of about 25 cars and 5 trucks daily; and the usual wholesale and retail business in parts and accessories. The showroom and service department are well related, while service and demonstration traffic are handily segregated. The building coverage is held down to about two-thirds the total area by using outdoor parking for used cars and temporary storage. The jury particularly liked the exterior and the excellent relationship between outside and inside display areas.

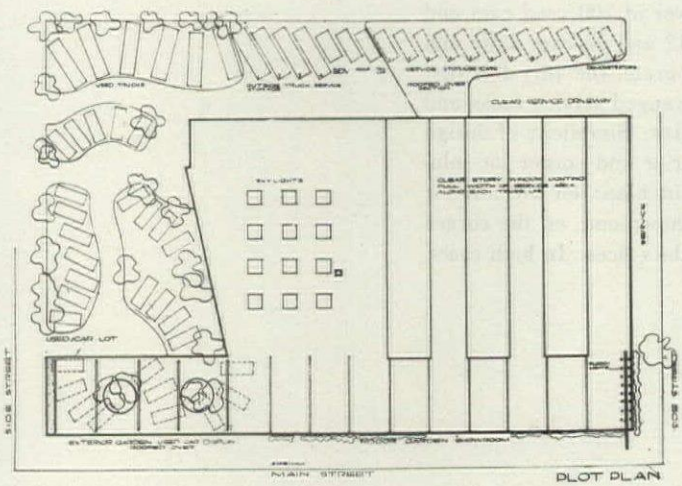
OPEN AND INTERIOR DISPLAY AREAS DOMINATE STREET FRONTAGE



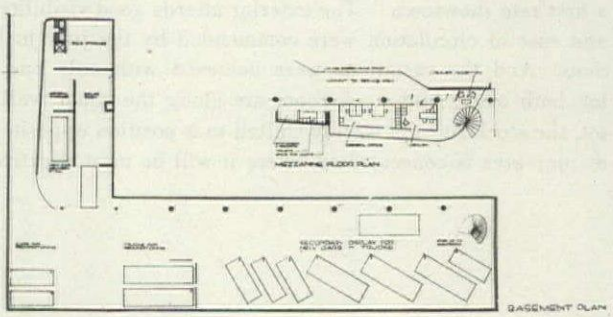


SECTION

CONTINUOUS MONITORS light the entire closed portion of the service area. Both open and roofed-over areas are provided for outdoor parking, while easy internal circulation is achieved by quarter turn parking for all cars being serviced. Note narrow mezzanine, which provides space for customers to watch repairs to their cars without getting in way of the process itself.

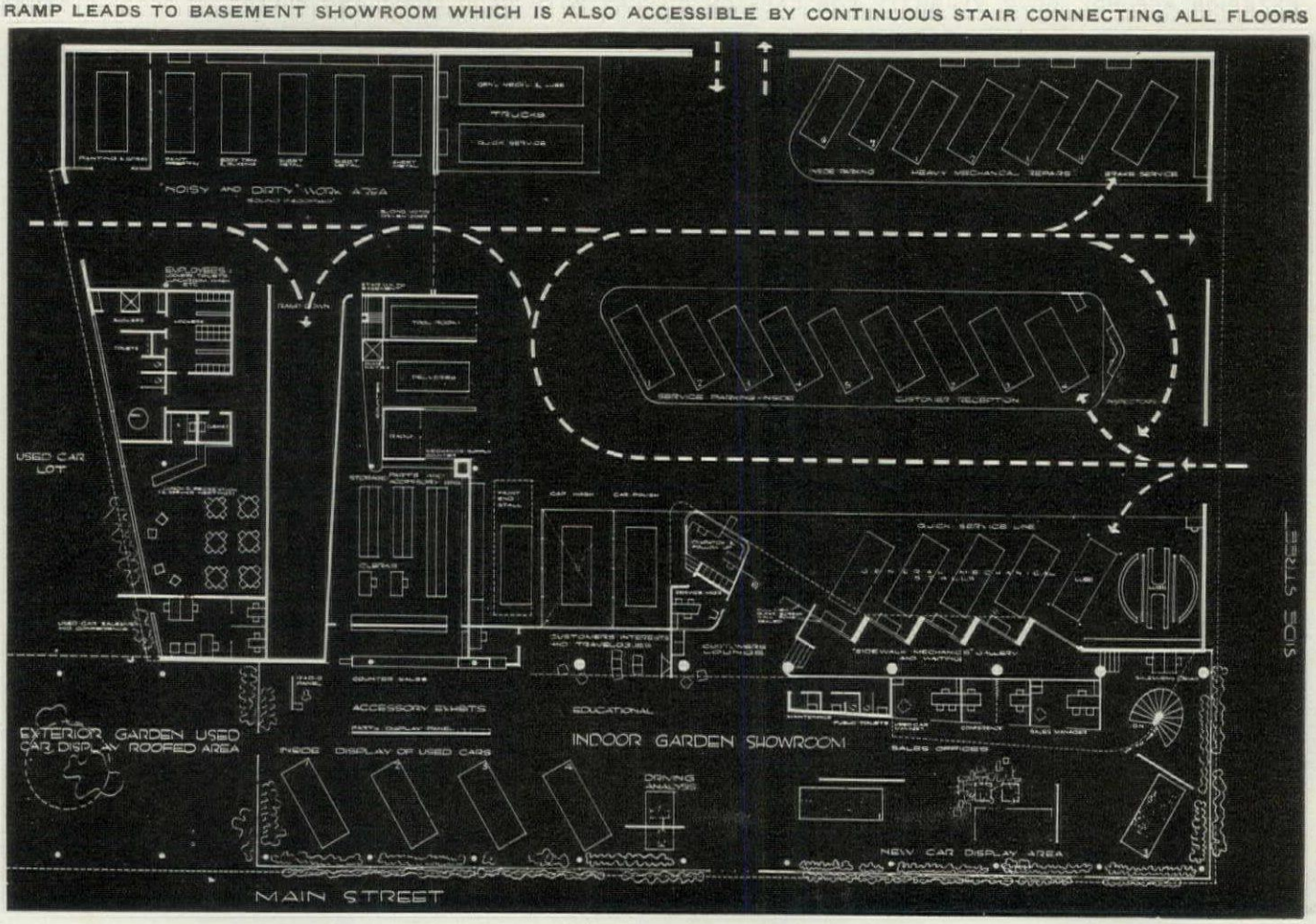


PLOT PLAN



BASEMENT PLAN

RAMP LEADS TO BASEMENT SHOWROOM WHICH IS ALSO ACCESSIBLE BY CONTINUOUS STAIR CONNECTING ALL FLOORS



GENERAL MOTORS DESIGN COMPETITION 3

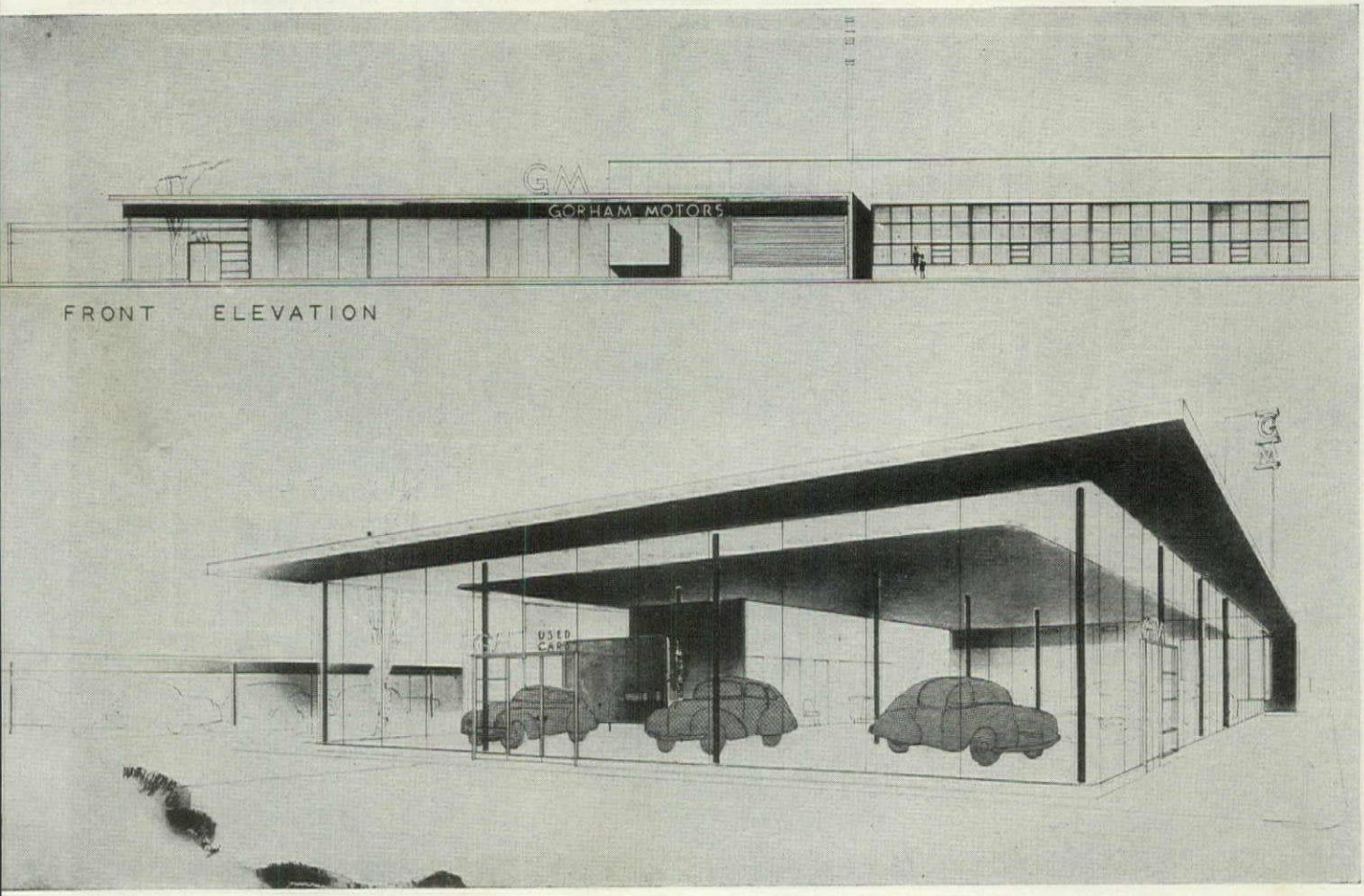
FOR DEALER ESTABLISHMENTS

PROGRAM NO.

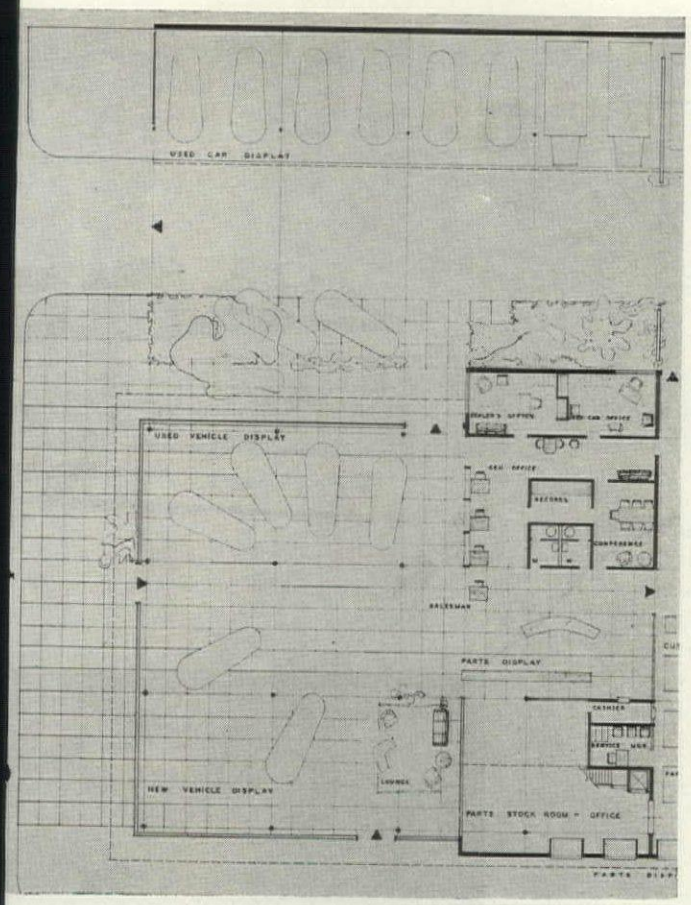
FIRST PRIZE: L. B. HOCKADAY
T. J. PRICHARD

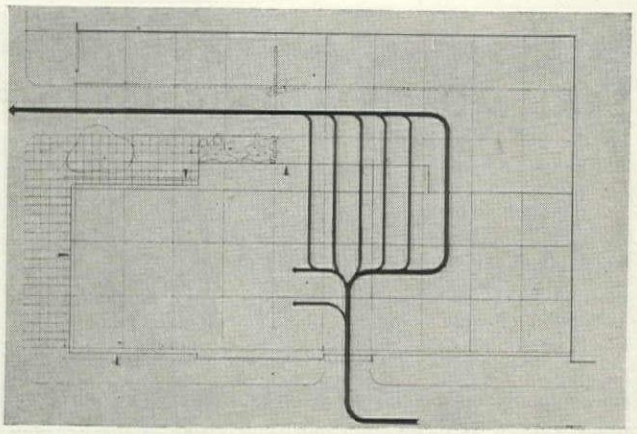
An average dealership in passenger and commercial vehicles involves an annual sales potential of about 125 new cars and 20 new trucks, an annual turnover of 200 used cars and 20 used trucks. In addition there is a service volume of between 12 and 15 cars daily and a comparable trade in parts and accessories. In meeting this program, the jury felt that the winners achieved "an excellent and compact plan with well arranged service areas and a first rate showroom." The exterior affords good visibility for display. Simplicity of design and ease of circulation were commended by the jury in both interior and corner lot solutions. And the variations were achieved with only one change in plan: on the interior lot, both offices and stock room are along the inner wall of the showroom; on the corner lot, the stock room is merely shifted to a position opposite that of the offices. In both cases, display area is concentrated where it will be most effective.

EXTERIOR AFFORDS GOOD VISIBILITY FOR CARS ON DISPLAY WITH GOOD LIGHT AND ACCESS TO SERVICE AREAS

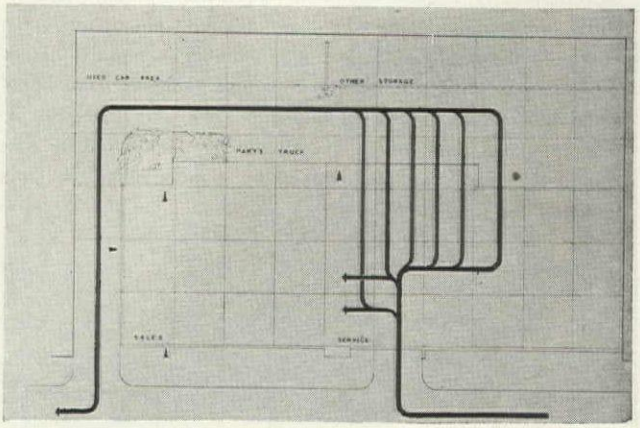


FRONT ELEVATION

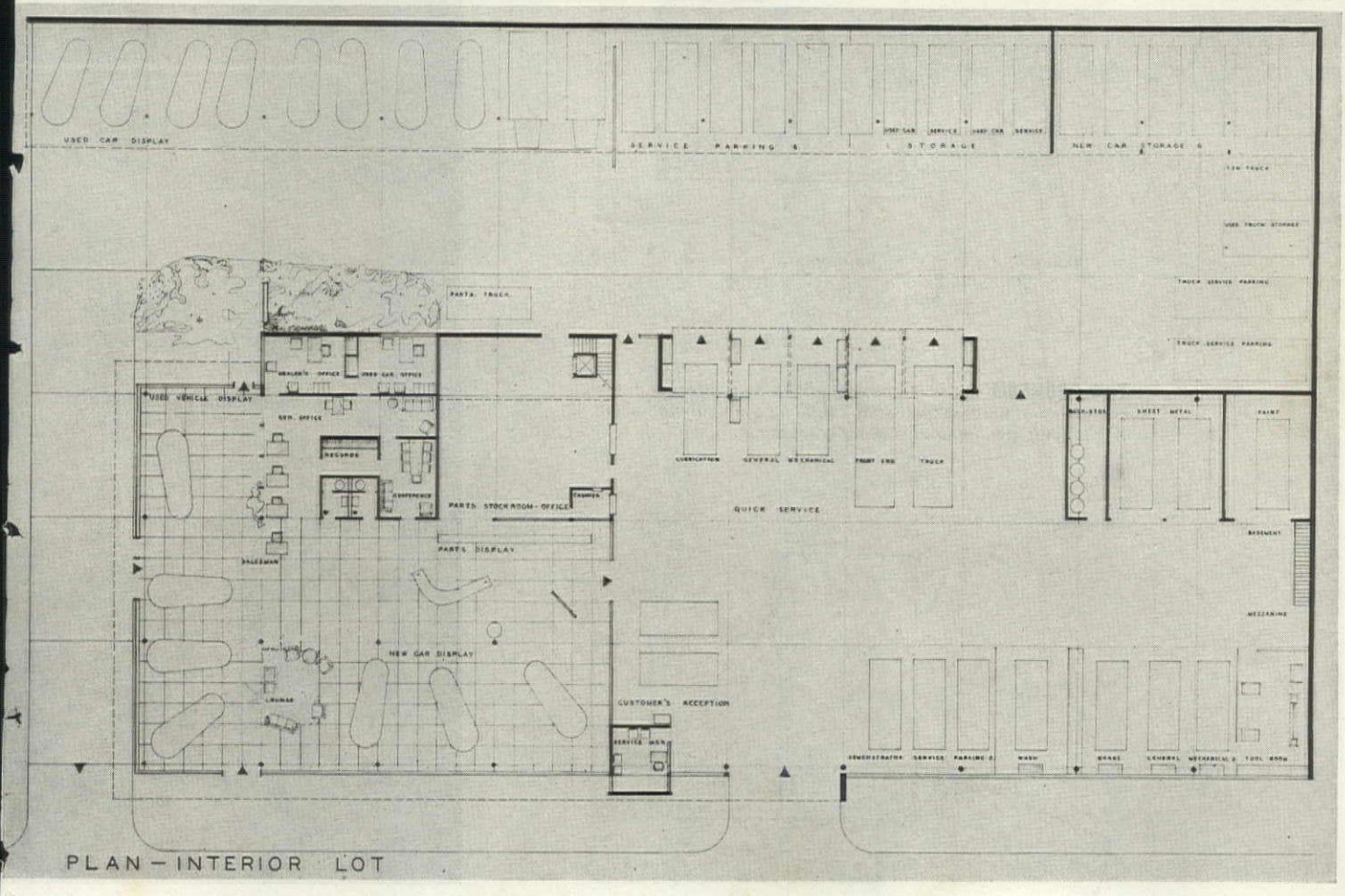




ONE WAY MOVEMENT on all traffic, in both corner and interior plot solutions, permits comparatively small floor area. In either variation, the stock room is adjacent to both service and sales areas.



EASY CIRCULATION AND COMPACT ORGANIZATION ARE OBTAINED IN BOTH CORNER AND INTERIOR PLOT SOLUTIONS

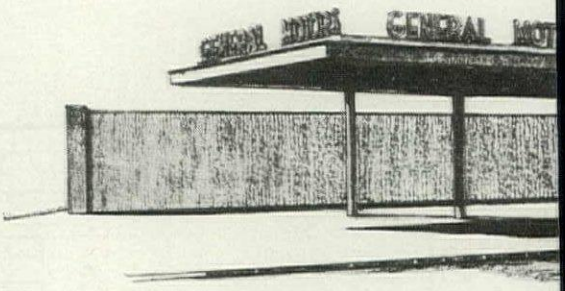


PLAN — INTERIOR LOT

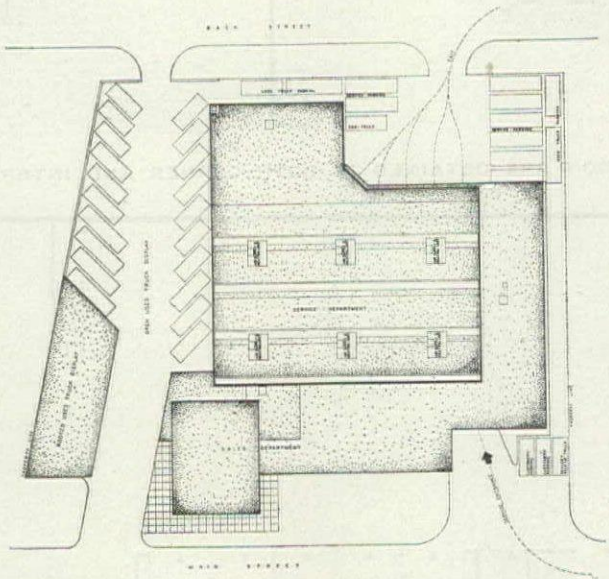
GENERAL MOTORS DESIGN COMPETITION 4
FOR DEALER ESTABLISHMENTS

PROGRAM NO.

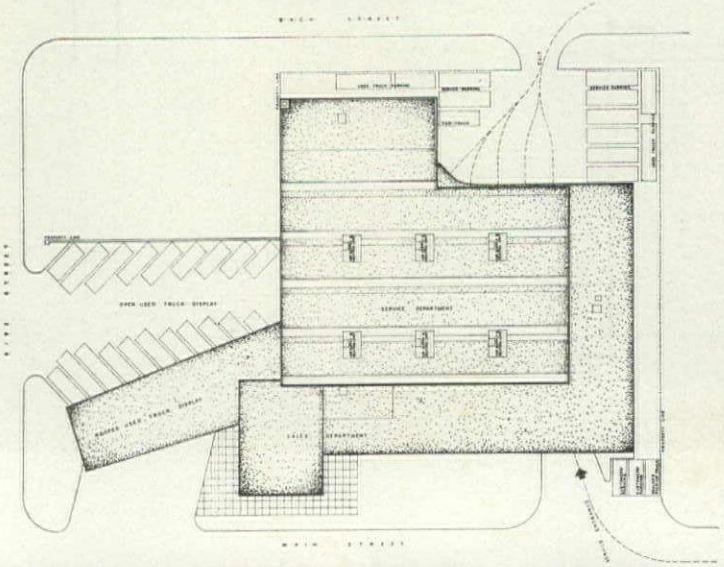
FIRST PRIZE: J. B. LANGLEY

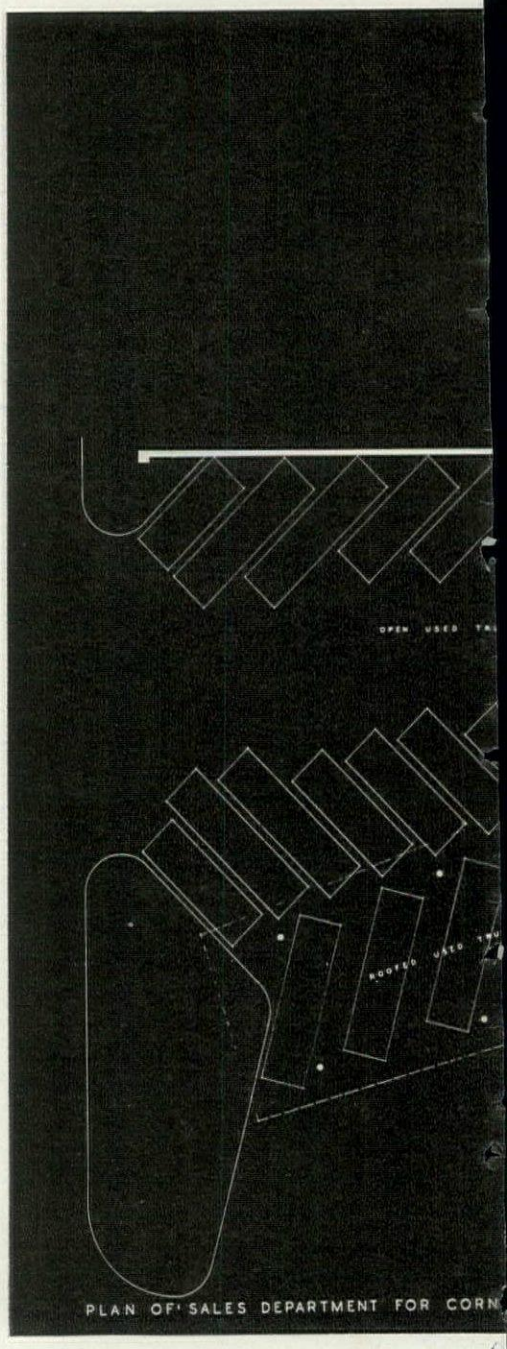


For a dealership in commercial vehicles exclusively, this project provides for an annual sale of 125 new and 150 used trucks, a service load of from 18 to 25 units per 16 hour day and wholesale and retail parts sales. The jury found it one of the best submitted in any of the programs. "The exterior has excellent character: it looks thoroughly businesslike and handles merchandising requirements successfully. Quarter-turn access to parking stalls is easy. Circulation for big trucks is beautifully handled with direct access to the stalls from the entrance and an equally direct means of egress. The plan is good all the way through. Details have been worked out with great thoroughness and all required areas are related in a convincing way." The jury was particularly impressed by the secondary display area, "where the installation of a wall sloped in plan permits the showing of trucks of unequal length."

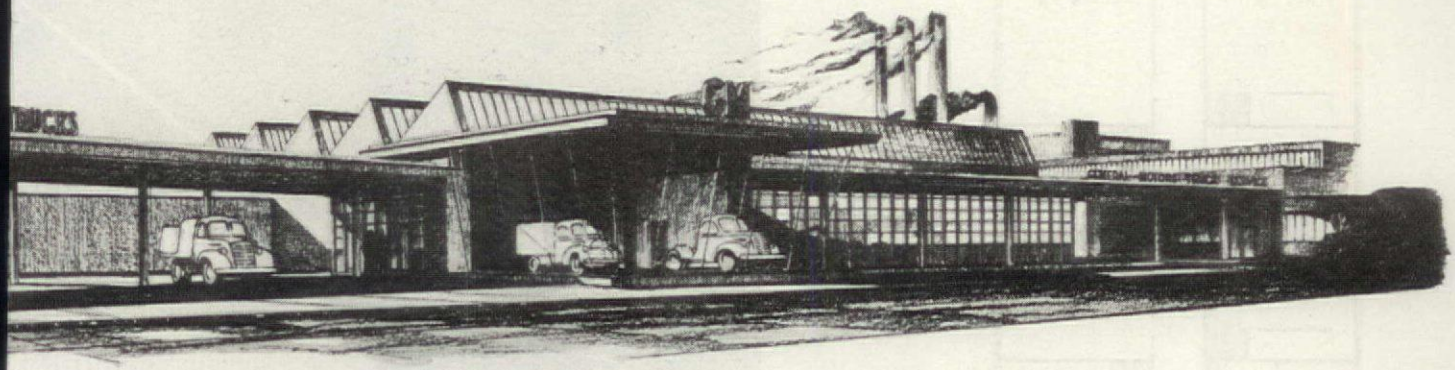


THE PROGRAM called for solutions to two sites and the prizewinner here shows both confidence and imagination in his solutions. Basic building is identical.

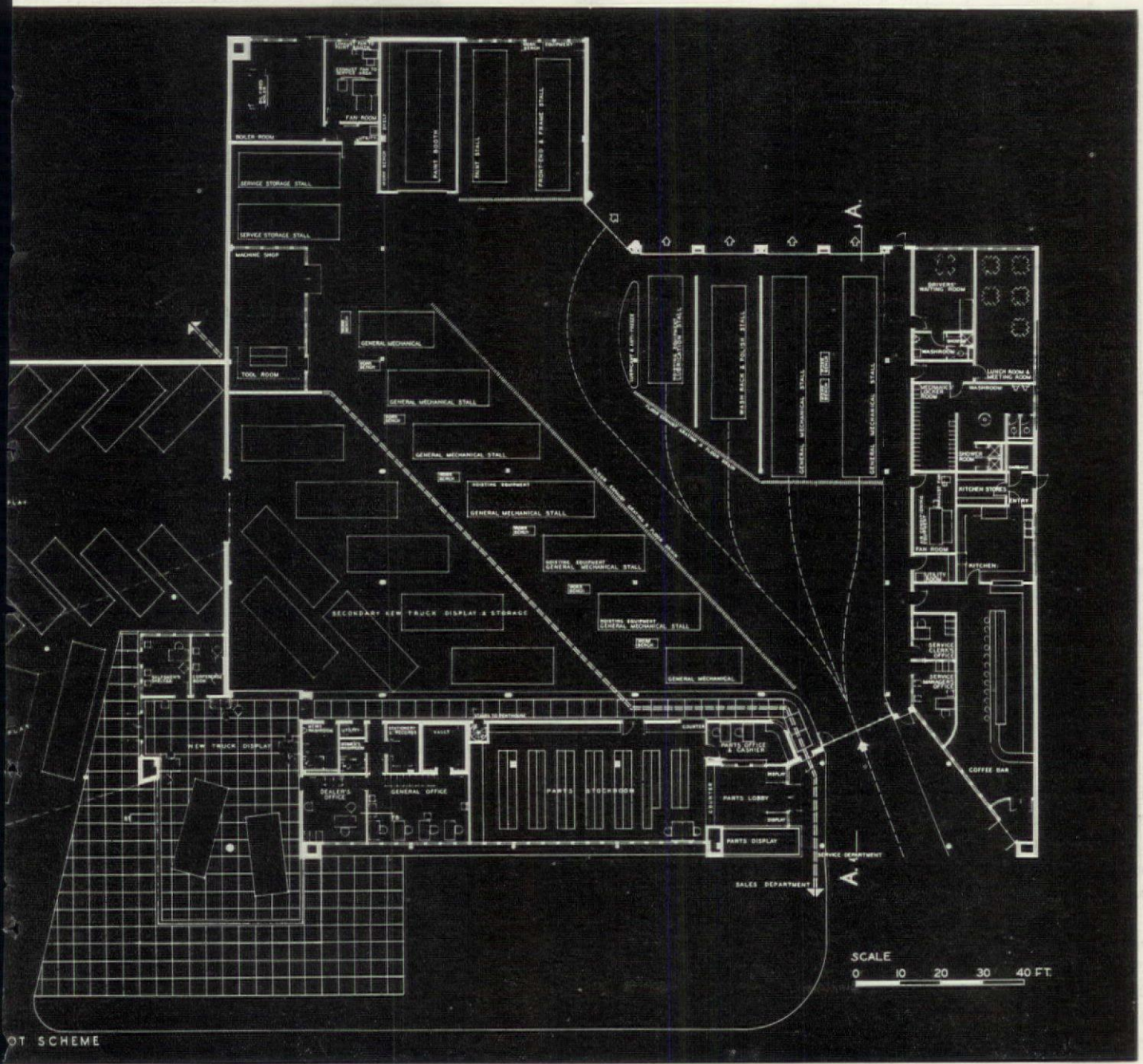




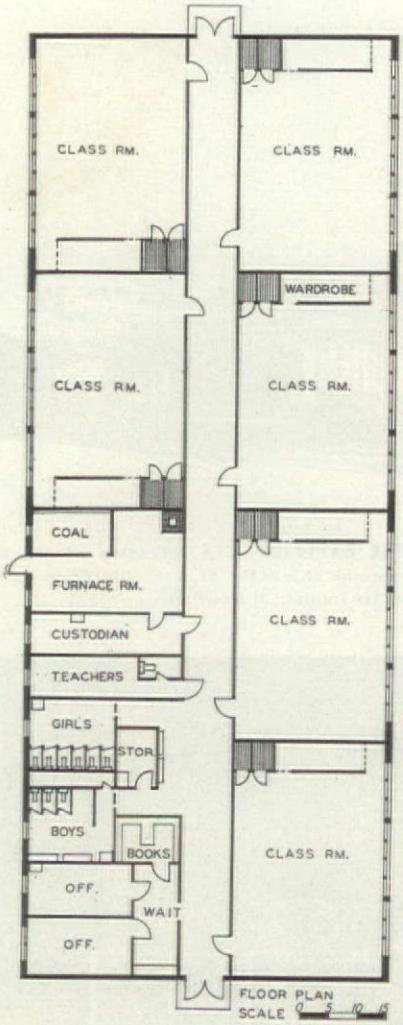
PLAN OF SALES DEPARTMENT FOR CORN

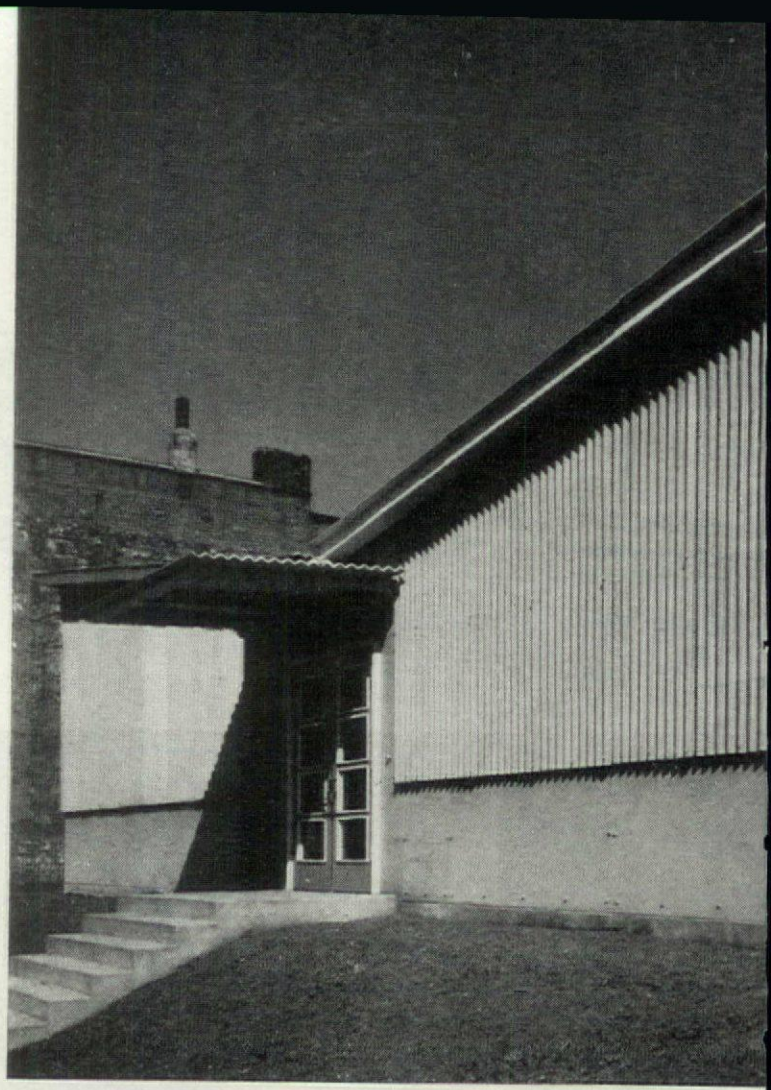


THE EXTERIOR is a reflection of the commercial character of the enterprise as well as its industrial location.



OT SCHEME





EXPERIMENTAL FENESTRATION EMPLOYS FIXED AND PIVOTED

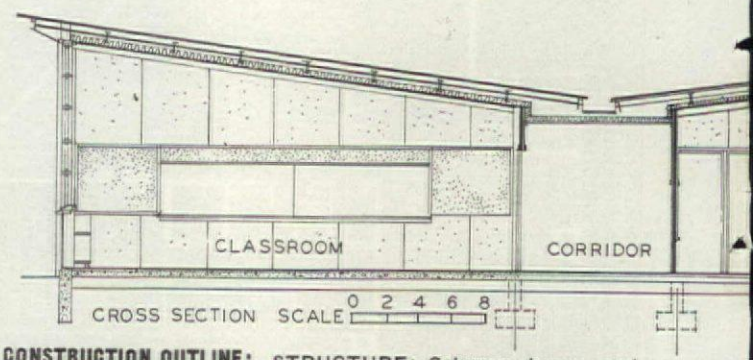
L'OUVERTURE SCHOOL

An experimental solution to problems of demountability

Before the war, the St. Louis Board of Education was employing temporary buildings both to relieve overcrowding and to serve communities which were still building up. These buildings were demountable, portable and of wood. With the acute wartime shortage of this material, however, the Board decided to experiment with other structural systems, as well as with certain innovations in daylighting, acoustics and color. The L'Ouverture Branch School is the first result of this intelligent policy.

Most notable feature of the building is its structural system. Consisting of a lightweight steel frame (an assembly of standard elements) completely sheathed in a variety of asbestos cement boards, the entire building is bolted together. It is thus—except for footings, floor and chimney—completely demountable and salvageable. The simplicity of the finished building belies the care and intricacy of its detailing.

Although the plan is of necessity conventional, the building contains many experimental features whose value will be studied under actual use—larger classrooms, various combinations of artificial and day lighting, acoustical performance of various finishes, etc. Such features as prove successful will be incorporated in future School Board designs.

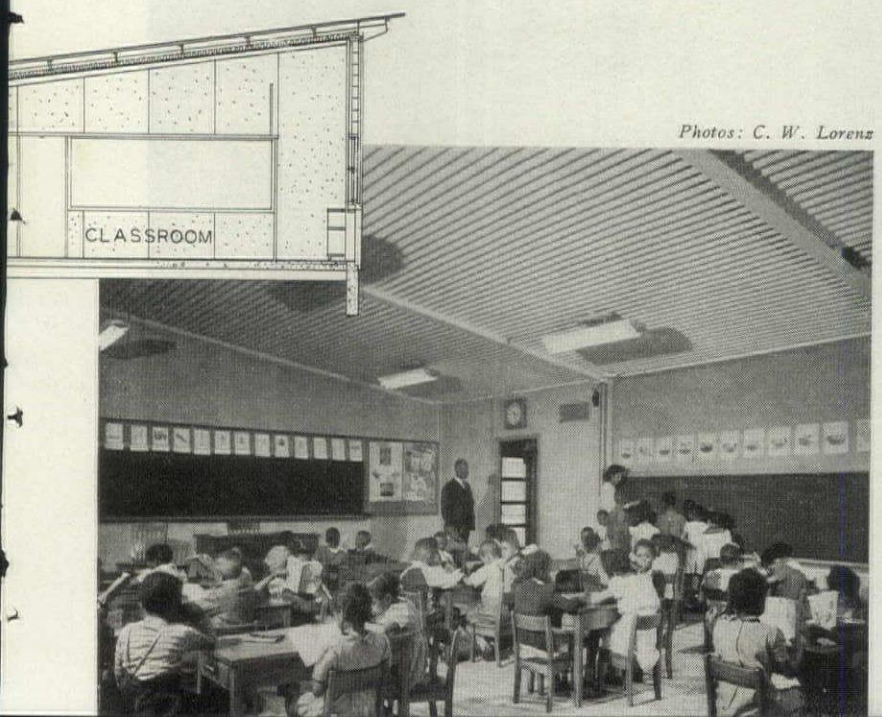


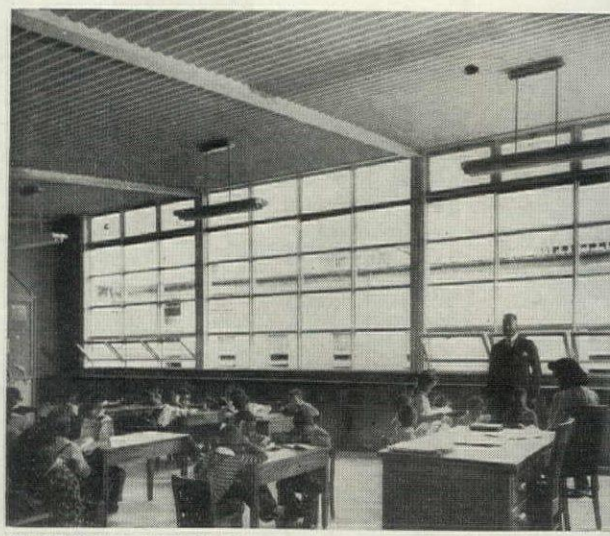
CONSTRUCTION OUTLINE: STRUCTURE: Columns, beams and joists—Laclede Steel Co. FLOORS: Cement finish over Zonolite floor slab—Universal Zonolite Insulation Co. EXTERIOR WALLS AND ROOF: Flat and corrugated asbestos sheets—Keasbey and Mattison Co. INTERIOR WALLS AND PARTITIONS: Cemesto board—Celotex Co. CEILINGS: Asbestos sheets—Ruberoid Co. INSULATION: 4 in. mineral wool batts—Celotex Co. GLASS: Plain—Libbey-Owens-Ford Co.; special—Mississippi Glass Co.; glass blocks—Owens-Illinois Co. HEATING: Forced warm air furnace—American Foundry and Furnace Co.; Stoker—Kol-Master Corp.

SASH, CLEAR AND TINTED GLASS, GLASS BLOCK IN VARIOUS COMBINATIONS TO DETERMINE BEST CLASSROOM DAYLIGHTING

and salvageability in school building design. Charles W. Lorenz, Designing Architect.

Photos: C. W. Lorenz





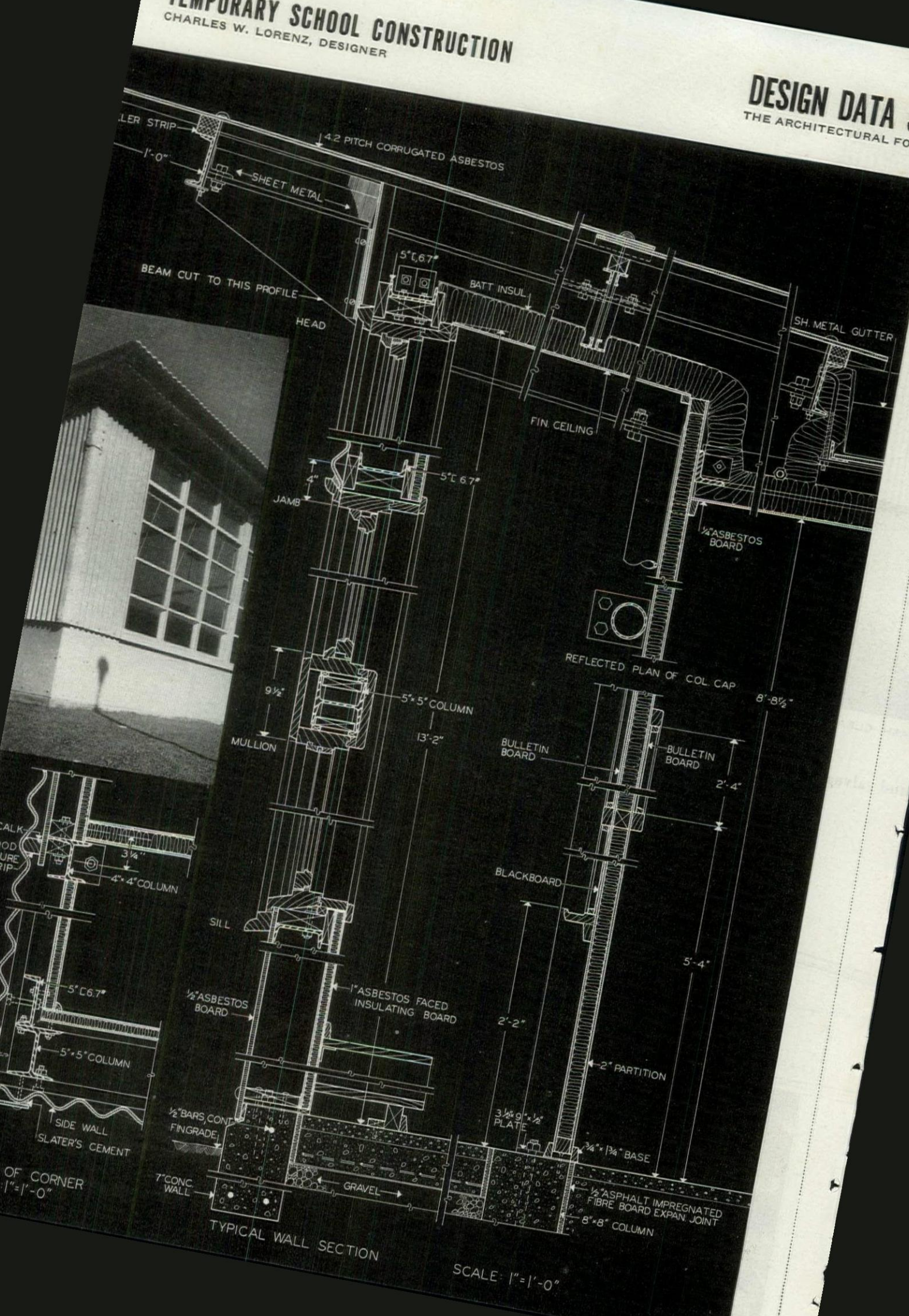
CLASSROOM INTERIORS contain many experimental features: ceilings sloped toward a central gutter; rooms alternately lighted with incandescent and fluorescent fixtures; and a bold use of rich colors.

TEMPORARY SCHOOL CONSTRUCTION

CHARLES W. LORENZ, DESIGNER

DESIGN DATA

THE ARCHITECTURAL FO

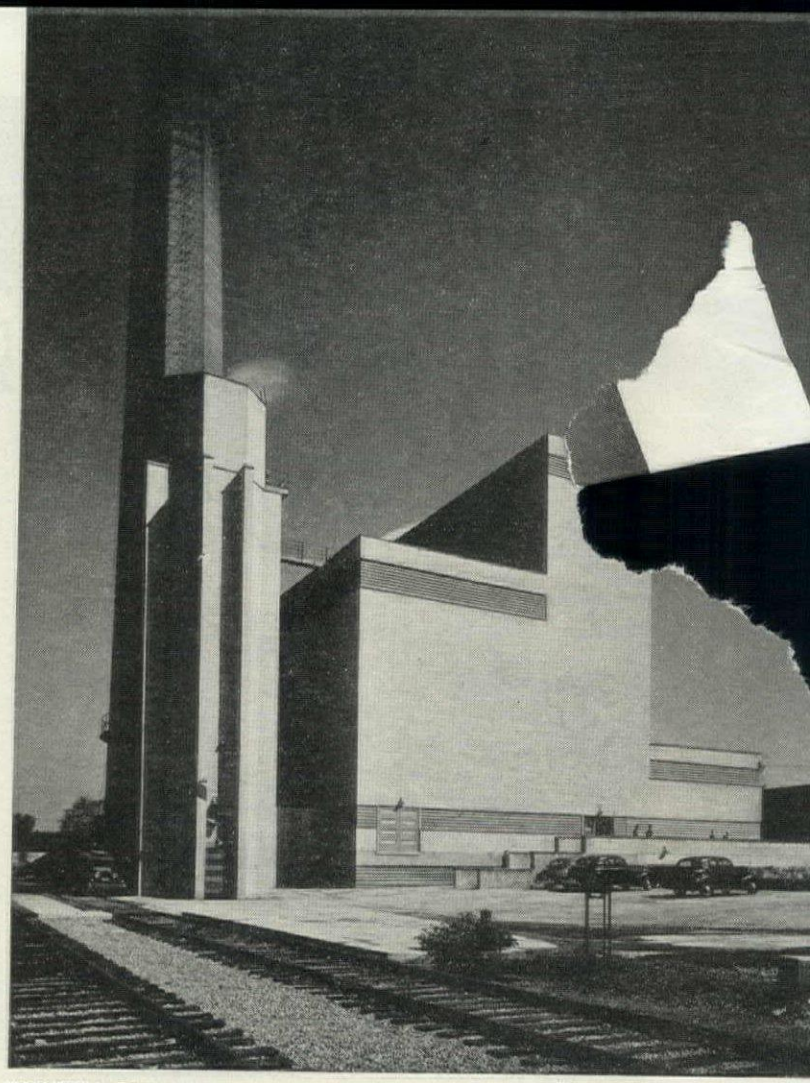


INDUSTRIAL BUILDINGS

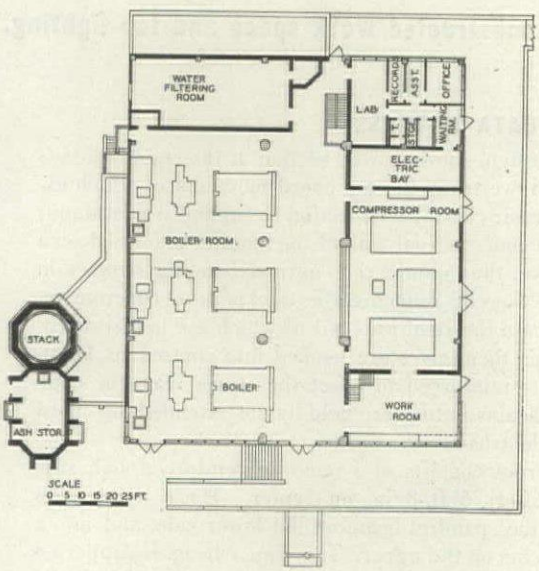
for the Wyman-Gordon Co., Harvey, Ill. by Schmidt, Garden and Erikson, Architects.

Wartime haste and restrictions did not prevent designer R. Vale Faro from giving architectural distinction to the expansion of a twenty-five-year-old factory into a large modern plant for the manufacture of precision aircraft forgings. Since 1942 eleven new buildings have been added about the original group on a 16 acre plot. Unity has been achieved by repetition throughout of a simple, honest style and the same materials: brick, concrete, glass and wood.

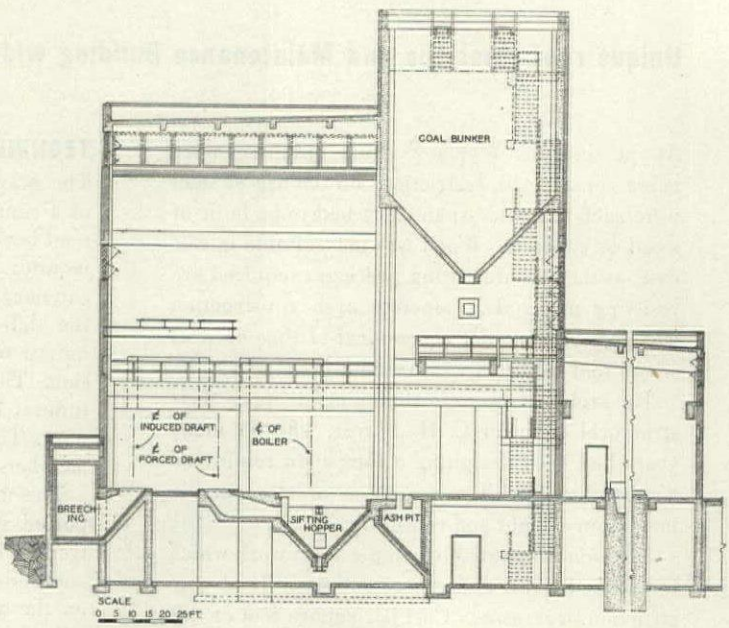
The power house, the highest structure in the group and the source of strength for the forges, logically has been made the focus of the plant, instead of being placed apologetically at one corner of the layout. A handsome combination of masses has been achieved with the tall chimney and adjacent ash tower, the boiler house topped by the coal bunker, and the lower surrounding levels of shops, lockers, and distribution passages. As the boilers were to continue operation during the then anticipated blackouts, no windows were allowed in the power house walls, ventilation being secured by bands of light louvers and adjustable interior panels. Clever design has made a feature of this unusual requirement.



POWER HOUSE IS VIRILE COMBINATION OF FUNCTIONAL PARTS

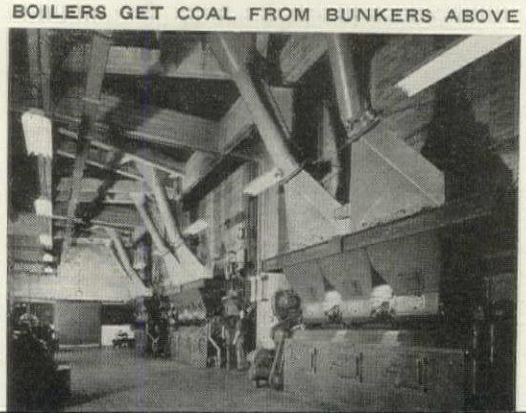


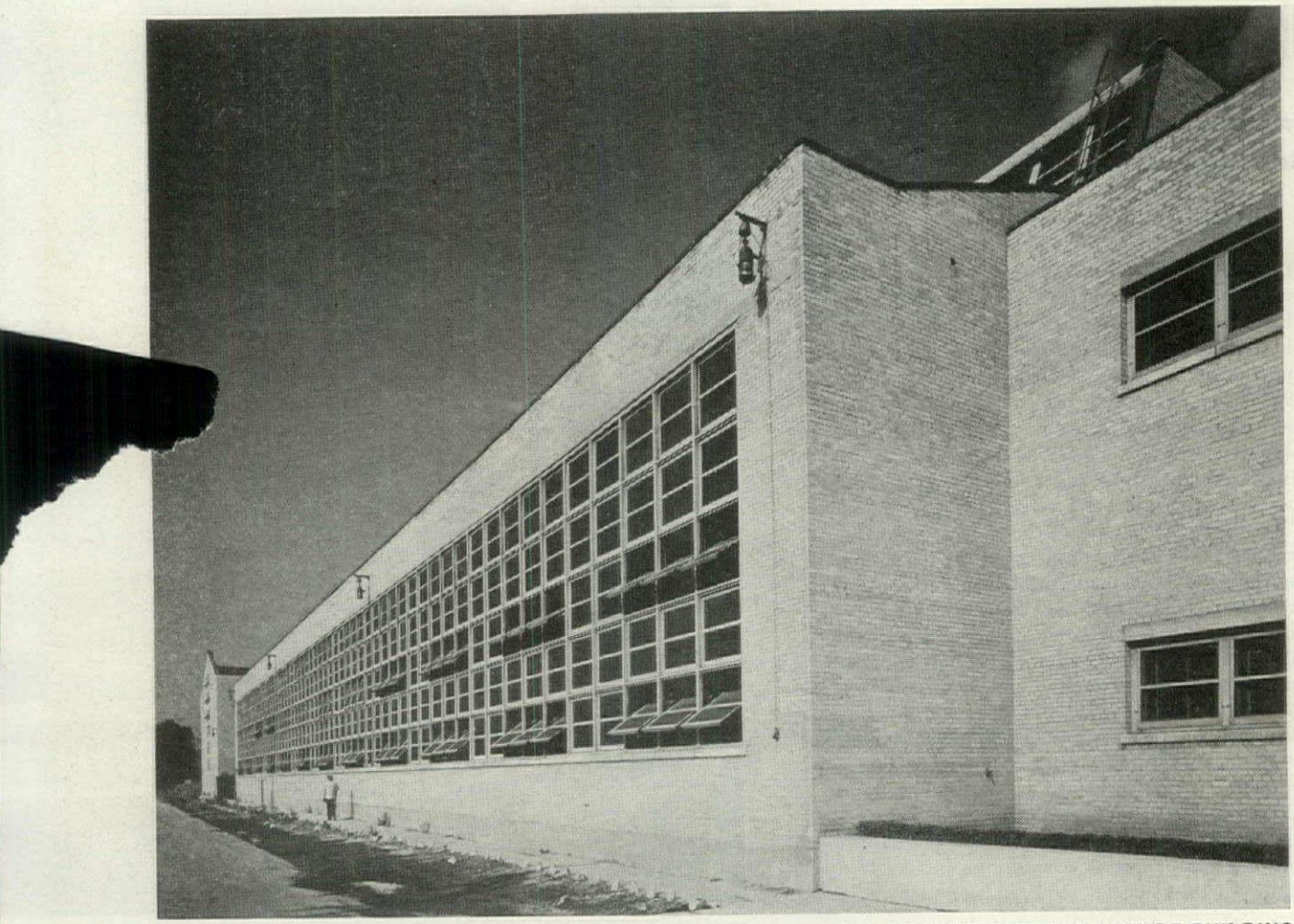
Photos: Hedrich-Blessing



TRANSVERSE SECTION

BOILERS GET COAL FROM BUNKERS ABOVE





EXTERIOR PRESENTS SIMPLE, SMOOTH FACADE SINCE SUPPORTING COLUMNS ARE KEPT INSIDE BUILDING

Unique roof gives Die and Maintenance Building wide, unobstructed work space and top lighting.

At the time the Wyman-Gordon buildings were being constructed, restrictions on the use of steel were such that wide-span roofs had to be built of wood or concrete. Wood was not suitable in this case, as the manufacturing processes required fire resisting materials. Concrete arch construction was possible, but not economical of time or steel where roof monitors were essential.

The architects were fortunate in having as their structural engineer C. H. Mayer, who for many years had been designing a long-span reinforced concrete roof with a minimum of steel and a maximum of light and ventilation.

Erection is speeded by simple form work which is knocked down and reused successively as construction progresses. Cost per square foot of this reinforced concrete building was 53 cents less than a similar one of structural steel at the same plant, and maintenance savings have been considerable.

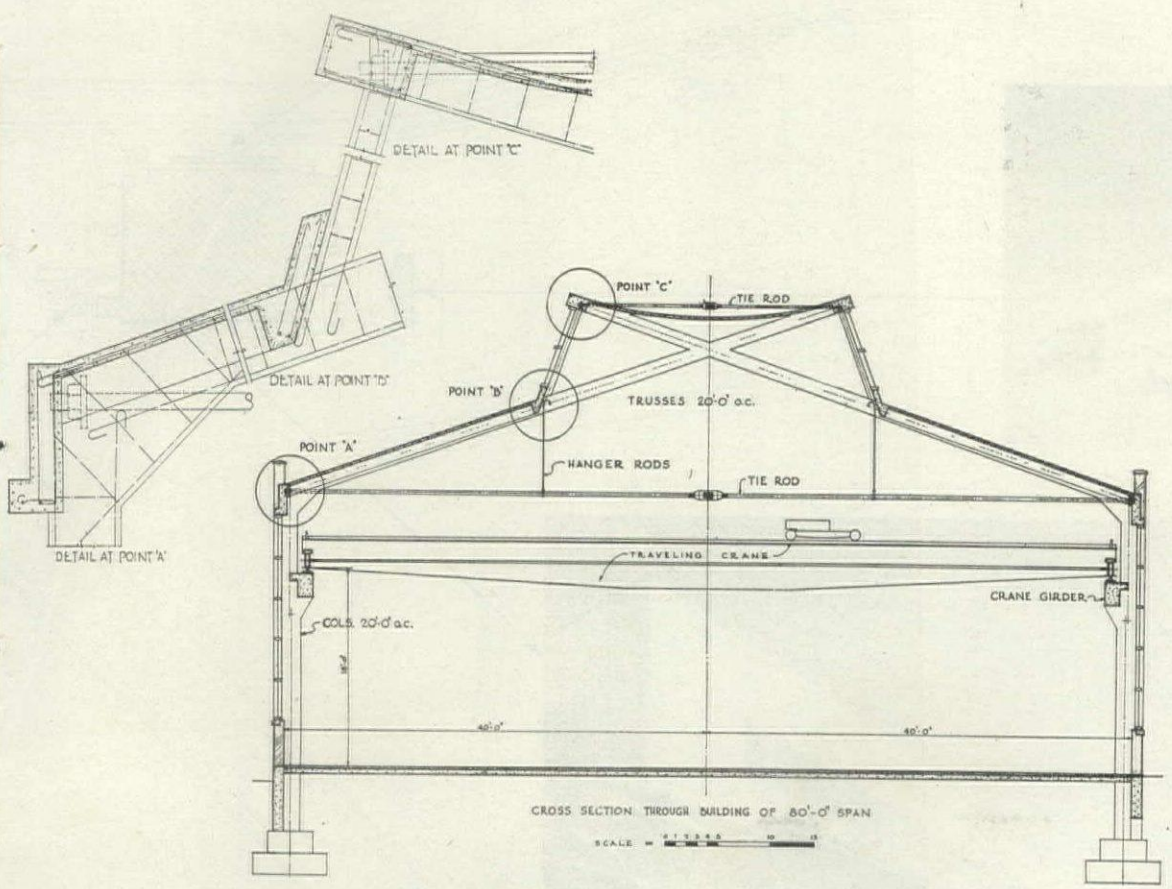
TECHNICAL DATA ON TRUSS

The Mayer design, shown in the section at the right, consists of a simple Howe truss, the top chord members of which extend beyond their central intersection to support a continuous monitor. The concrete roof slab of the monitor is formed on a catenary curve, thus eliminating normal bending stresses in the slab and thereby reducing the thickness of concrete required to encase the steel rods, all of which are in direct tension. The rods themselves are hooked into continuous longitudinal beams reinforced to offset the strain from the catenary. These beams in turn are held by the extended top chord members of the truss.

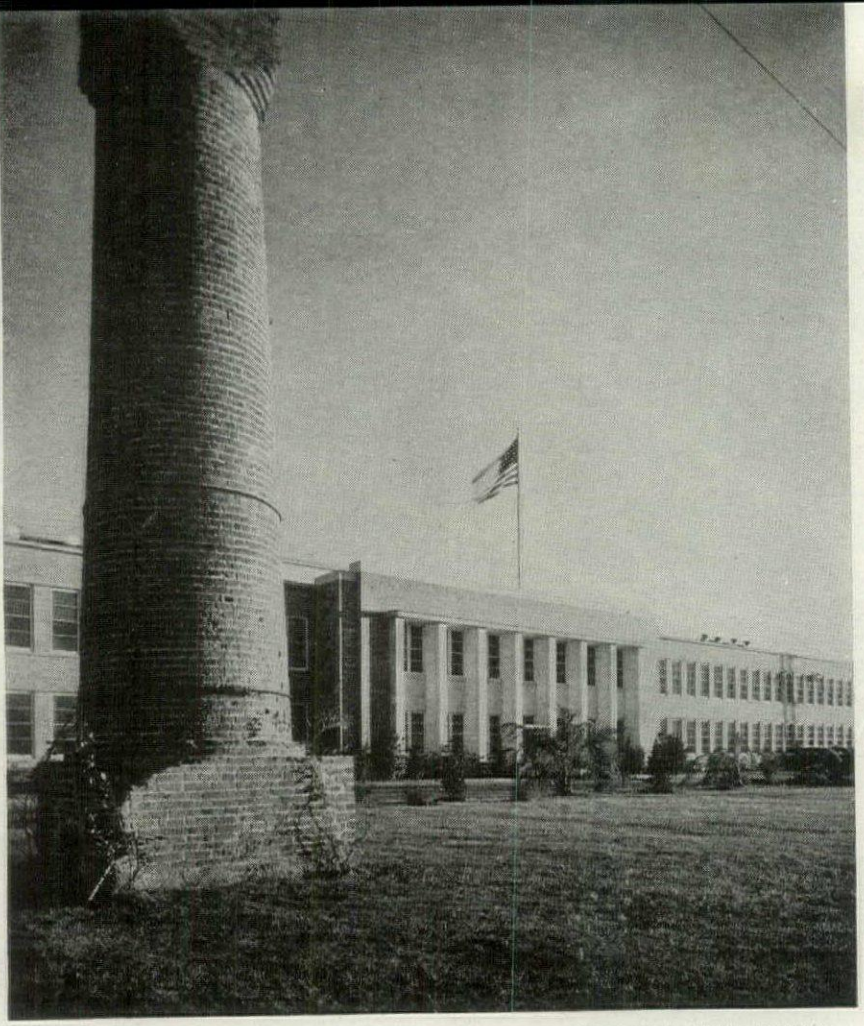
The main roof consists of a one-way reinforced slab supported on rafters 6 ft.-8 in. on center. These rafters are framed into the spandrel beam on the lower side, and into a continuous beam on the upper. This upper beam is supported on the top chord of the trusses, and is formed to include the sill of the monitor sash. The reaction from this beam is carried through an inclined tie to the end of the cantilever above, there combined with the reaction from the monitor roof, and the resultant carried through a horizontal tension rod above the monitor to the center of the building where it is counter-balanced by equal loads acting in the opposite direction.

The bottom chord of the truss consists of two channels embedded in the building columns with proper plates to transfer the roof loads into the channels. A turnbuckle is provided at the center, and sag rods at quarter points.

NTERIOR VIEW SHOWS LIGHTNESS OF CONCRETE ROOF TRUSSES AND AMPLE ILLUMINATION FROM MONITOR WINDOWS



HIGGINS AIRCRAFT, INC



OFFICE BUILDING

FLIGHT HANGAR

MANUFACTURING PLANT

A complete plant designed by Albert Kahn Associates for the manufacture of plywood cargo planes.

In the spring of 1942, aggressive Andrew Jackson Higgins was awarded a contract for the construction of 200 Liberty ships. He chose as the shipyard site an historic sugar plantation 13 miles east of New Orleans, because of its nearness to a new intercoastal waterway to the Gulf. Connecting canals were built to the site, land was leveled and filled, and piles were driven for building foundations. Then suddenly the contract was cancelled. Mr. Higgins went to Washington to see the "pinheads in the government", and came back with a contract for 1,200 Curtis C-76 plywood cargo planes. He immediately ordered construction of the aircraft plant on the former shipyard site.

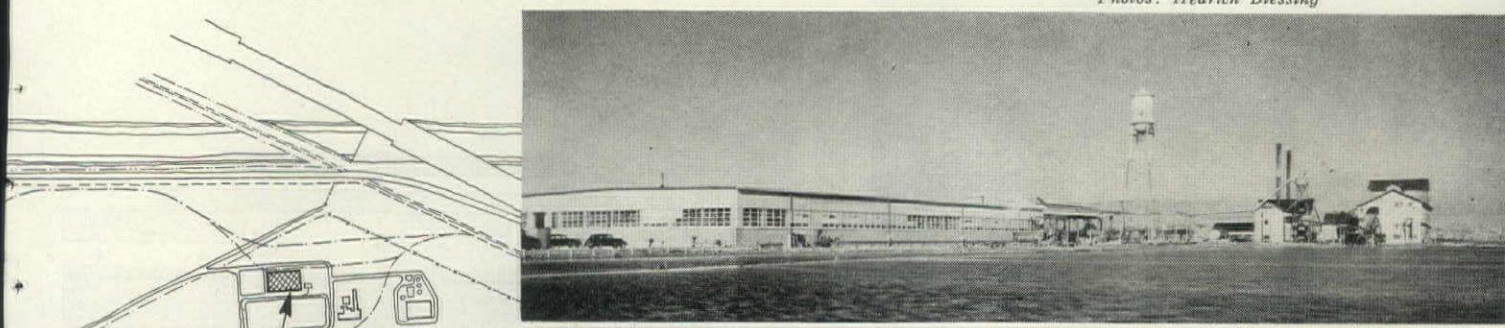
The Albert Kahn Associates had the difficult problem of designing a complete aircraft construction unit for wooden planes—from the log, through the sawmill, veneer mill and kiln to submanufacturing and assembly, to final assembly, flight testing and delivery. Practically everything for the plane was to be made on the site except the engines, which were built elsewhere by a Higgins-owned plant. Even a water supply and sewage disposal system were required for this new manufacturing center to rise about the crumbling chimneys of the old sugar refinery.

To the planning difficulties of new manufacturing techniques and shifting priority regulations on materials were added those of the site itself. The pile foundations already created for the shipyard were to be used wherever possible, and additional foundations for the 500,000 sq. ft. of floor area of the main building required extensive ditching of the soggy soil and intermixing of oyster shells to provide a suitable supporting grade. Two 5,500 ft. runways for the airfield also had subsoil problems, and clearance regulations influenced location and height of plant structures.

Major buildings of the plant are of steel-frame construction with concrete floors. Exterior walls are of brick and cinder block up to ten feet, where alternating bands of continuous wood framed windows and asbestos shingles backed with wood planking begin. The office and engineering buildings are of wall-bearing brick masonry with wooden interior columns.

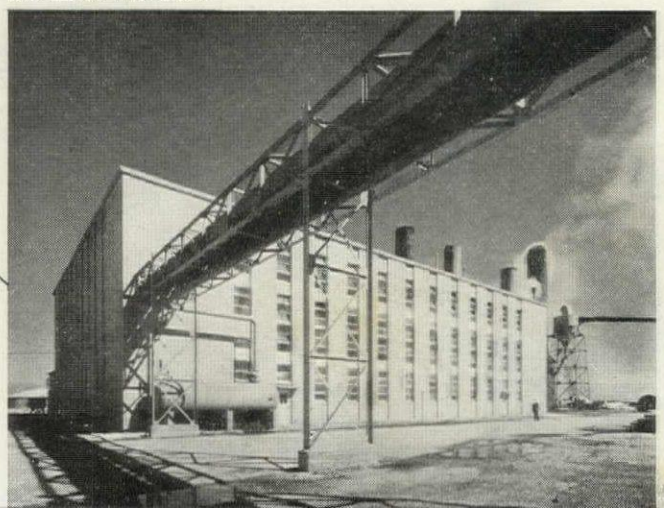
Higgins' future plans include planes, houses, transportation systems and packaged power. As Higgins puts it, "It is my obligation and my particular pleasure to see that these vast plants do not become barracks for bats."

Photos: Hedrich Blessing



VENEER AND SAW MILLS

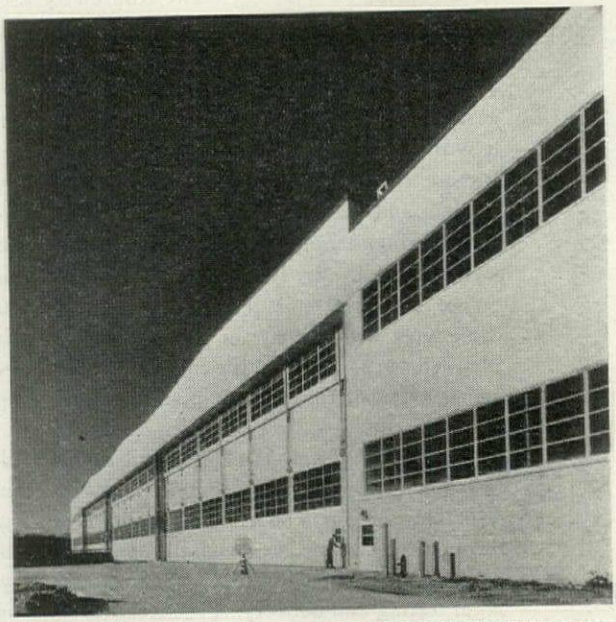
BOILER HOUSE



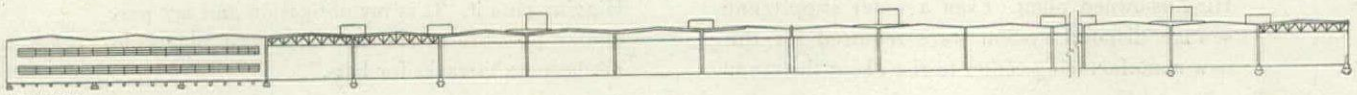
HIGGINS AIRCRAFT, INC. Spacious working areas are flexible, well-lighted and air-conditioned.

The layout of the main plant building is an orderly reflection of the manufacturing process. Workers and power enter from the east, raw materials and parts enter from the south, control and plans enter from the north, and completed planes depart from the west. Inside the building, materials and parts are combined into progressively larger units as they move from south to north, until the final assembly line is reached. Here the movement is from east to west, the embryonic planes being added to successively until they emerge from the plant ready to fly.

Rest room and canteen units are distributed throughout this building. Rest rooms are designed with moveable central partitions, so that the ratio of toilet facilities for men and women can be adjusted to actual employment figures. Though a large cafeteria is located at the northeast corner of the building, a system of related self-service canteens providing hot meals has proven popular with workers and efficient for management. Temperature and humidity control is furnished throughout.

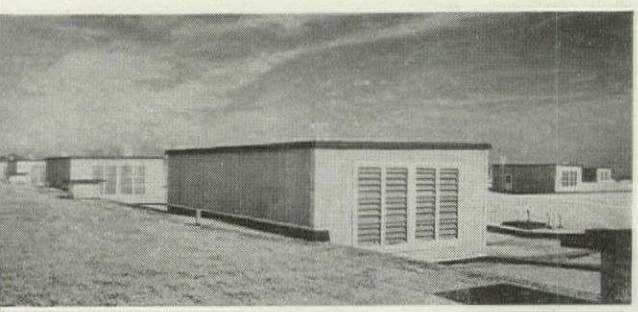


CANOPY DOORS OPEN WEST END OF MAIN BUILDING

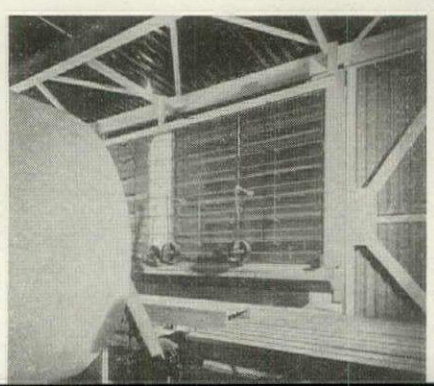


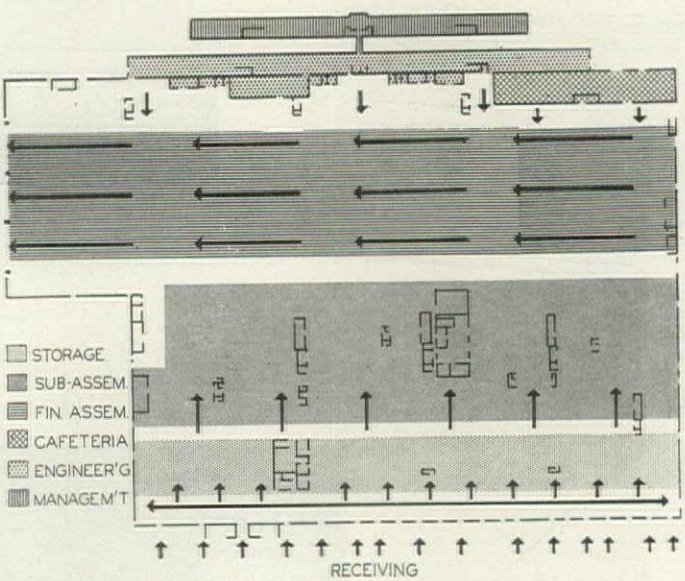
SECTION

COOLING TOWER IS NEAR WATER AND OIL TANKS



DEHUMIDIFYING PENTHOUSES DOT PLANT ROOFS

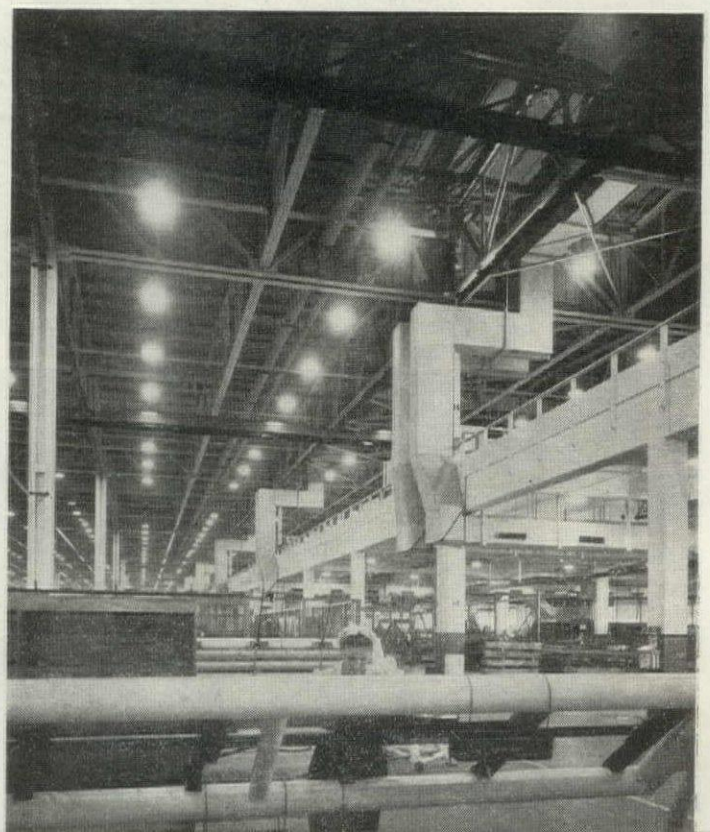




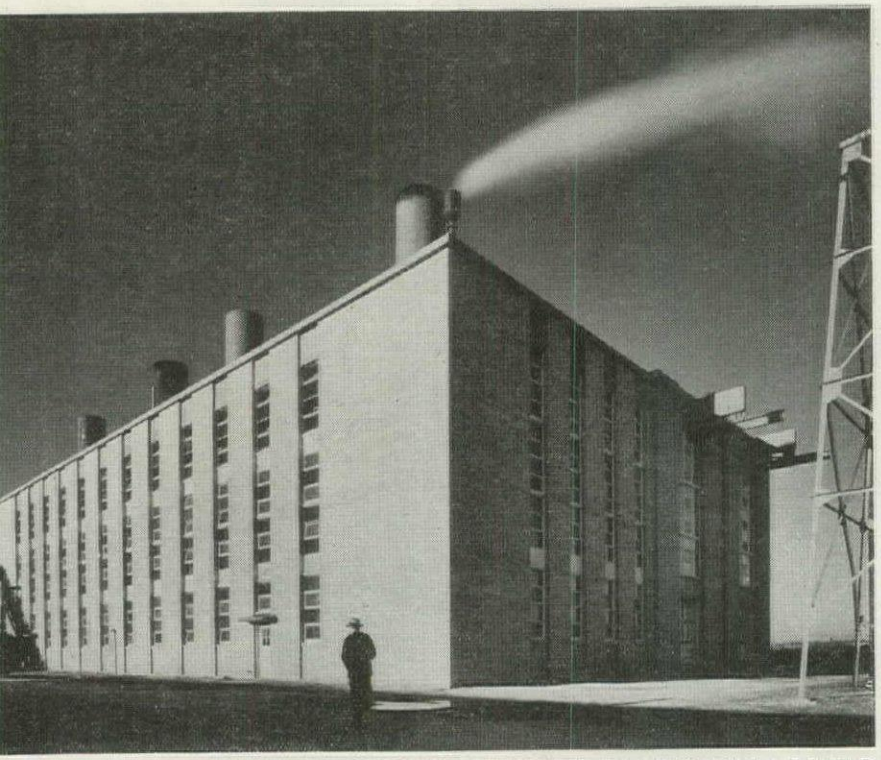
MANUFACTURING AND SUBASSEMBLY AREA OF MAIN PLANT. NOTE ONE OF TOILET AND CANTEEN ISLANDS, CENTER LEFT

RECEIVING OFFICES ADJOIN SOUTH ENTRANCES

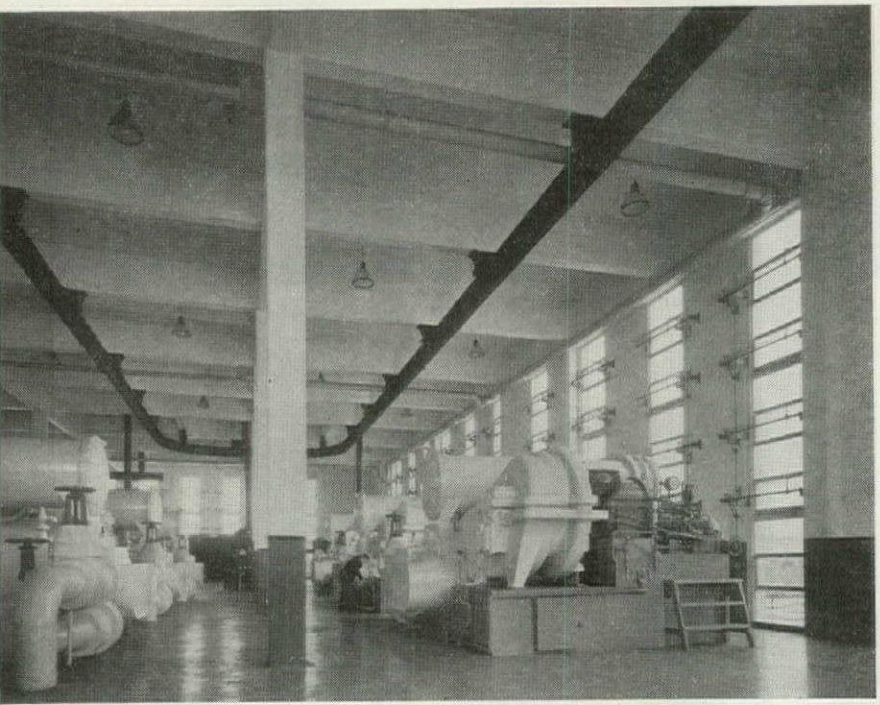
MEZZANINE IS USED WHERE LOW HEADROOM IS PERMISSIBLE



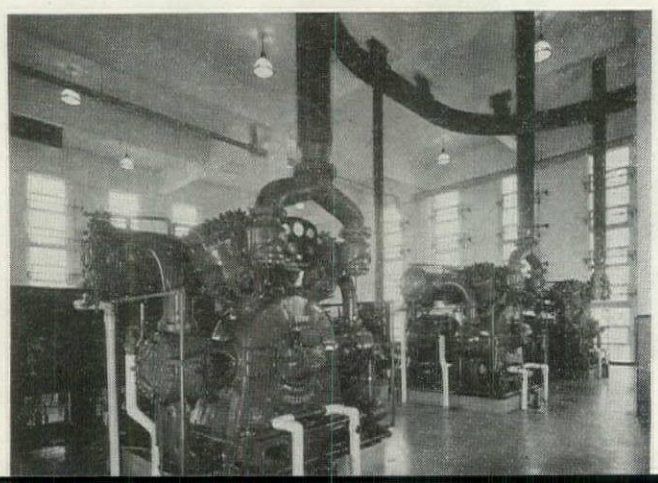
HIGGINS AIRCRAFT, INC.



BOILER HOUSE HAS LOW CHIMNEYS REQUIRED BY ADJACENT AIRFIELD



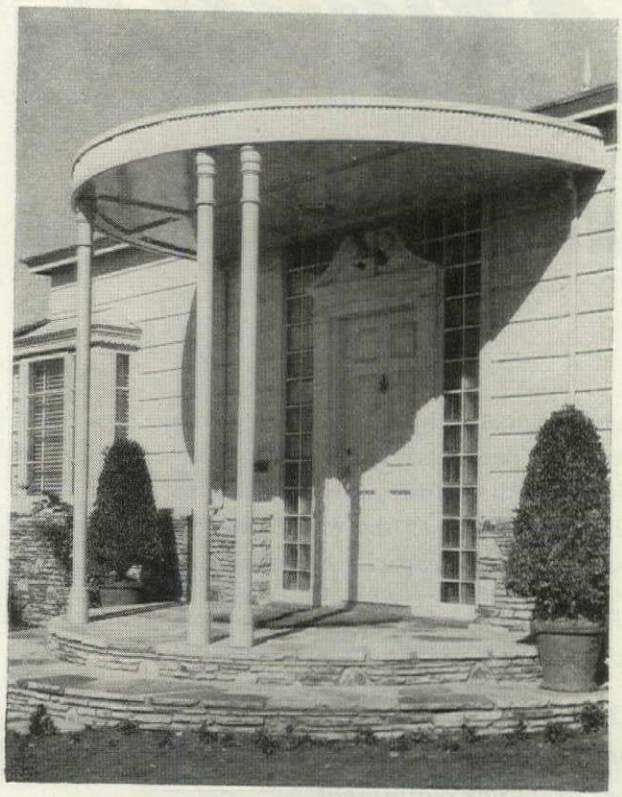
REFRIGERATING UNITS FOR AIR CONDITIONING ARE IN BOILER HOUSE



CONSTRUCTION OUTLINE

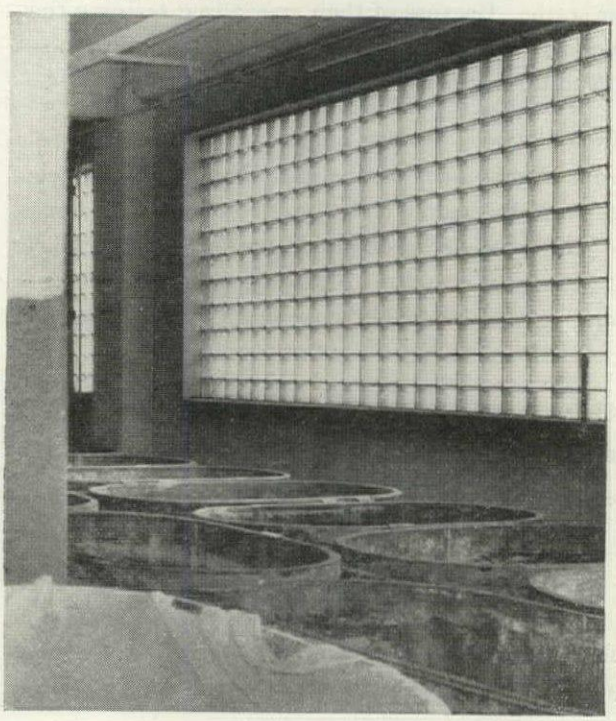
FOUNDATIONS — wood piles, mass and reinforced concrete caps. Waterproofing — Western Waterproofing Co. STRUCTURE: Factory walls—masonry, exterior brick facing with cinder block. Two bands of wood "Victory" sash, Andersen Corp., alternating with bands of asbestos board shingles backed with 2 in. wood plank above. Interior partitions — tile, cinder block and some plaster board on wood studs. Columns and structural steel — Bethlehem Steel Co. Floor — concrete. ROOF — cement tile, Vermiculite insulation, Munn & Steele, Inc., and composition roofing. Materials by Truscon Steel Co., Federal Cement Tile Co., Baird Cement Tile Co.; The Barrett Co. specification roofing throughout. Metal decks — H. H. Robertson Co. SHEET METAL WORK: Flashing—composition and fiber. Gutters —wood. Ducts, etc.—asbestos board construction, Carrier Corp. SOUND INSULATION—Acousti-Celotex, The Celotex Corp. WINDOWS: Glass — Aklo heat resisting, Libbey-Owens-Ford Glass Co. ELEVATORS—Rotary Lift Co. FLOOR COVERINGS — asphalt tile — Thomas Moulding Co. WALL COVERINGS — Flintkote Co. R. J. Dorn Co. Arkeley Ceramic Co., Sanymetal Products Co., Ruberoid Co. FURNISHINGS—Westbrook Mfg. Co., Cafolite Co., The E. F. Hauserman Co., Central Scientific Co. and E. H. Sheldon Co. DOORS—National Sash & Door Co., Madison Lumber Co. and Singer Lumber Co. Garage and special doors—Overhead Door Corp., Richards, Wilcox Mfg. Co. Richmond Fireproof Door Co., Inc. Canopy—Truscon Steel Co. Kalomein — American Sheet Metal Works, Pelle Co. and R. V. Harty Co. HARDWARE—Sargent & Co. ELECTRICAL INSTALLATION—Orangeburg Fibre Co., Triangle Conduit Co., General Cable Corp., Anaconda Wire & Cable Co., National Electric Products Co., Simplet Mfg. Co., Russell & Stoll Co., Harvey Hubbell, Inc., Bryant Electric Co., Westinghouse Electric & Mfg. Co., Philco Corp., Bull Dog Electric Products Corp., General Electric Co., Allen Bradley Co., Cutler-Hammer, Inc., I. T. E. Circuit Breaker Co., Benjamin Electric Mfg. Co., Graybar Electric Co., Inc., A. L. Smith Co., Crouse Hinds Co., Holophane Co., Autocall Co. and International Time Recorder Co. PLUMBING MATERIALS AND EQUIPMENT — National Tube Co., Youngstown Sheet & Tube Co., Alabama Pipe & Foundry Co., U. S. Pipe & Foundry Co., J. J. Clarke Co., Eagle Asbestos Co., New Orleans Pipe Co. and Transite Concrete Co., American Radiator-Standard Sanitary Corp., Fulton Sylphon Co., E. W. Van Dusen, Chicago Pump Co., Trane Co., Crane Co., W. Halsey Taylor Co., Wallace & Tiernan, Inc., Allen Billmyne, Fairbanks Morse & Co., American Air Filter Co., Eddy Valve Co., Eastern Foundry Co., Kehm Corp., American Meter Co., Powers Regulator Co., Republic Steel Corp., Allen Bradley, Kewanee Boiler Corp. HEATING AND AIR CONDITIONING: Heating —steam system. Radiators—Shaw-Perkins Mfg. Co. Air conditioning—Carrier Corp. System. Materials by—Buffalo Forge Co., Aerofin Corp., Allis-Chalmers Mfg. Co., Philip Carey Co.

MEETING MODERN STANDARDS WITH *PC Glass Blocks*



In this attractive dwelling, PC Glass Blocks around the entrance are extremely decorative, especially at night when interior lights shine through them. Further, they help to bring cheerful daylight into the entrance hall.

In damp, humid workrooms panels of PC Glass Blocks have proved superior to ordinary sash, which frequently rots, rusts, warps and needs repainting. They also help to maintain desired temperature and humidity levels, to lessen condensation.



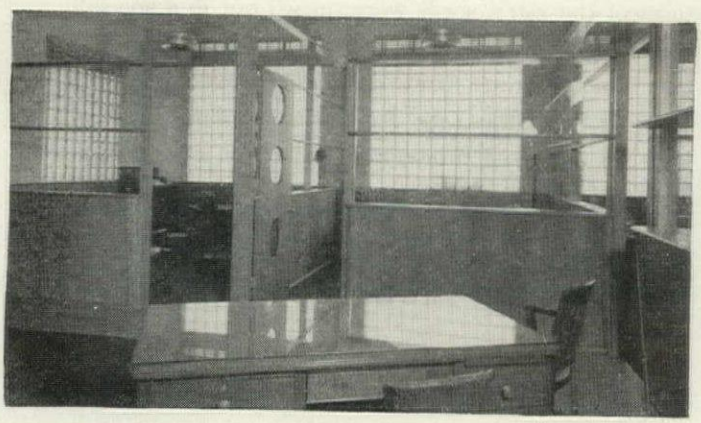
MOST of your clients who are planning new construction and modernization already know that PC Glass Blocks are attractive and practical. Now is the time to remind them of *all* the ways PC Glass Block construction serves and saves in new and modernized homes, plants and offices.

PC Glass Blocks distribute generous floods of daylight over wide areas. Insulating properties lessen heat losses through lighting areas, help maintain temperature and humidity levels, ease the load on air-conditioning and heating equipment. Infiltration of chilling drafts, gritty dust, is prevented because PC Glass Blocks are an integral part of the wall. They exclude unpleasant sights, dampen disturbing sounds.

Smooth, flat surfaces are quickly and easily kept clean. PC Glass Blocks do not break readily, rarely if ever need repair or maintenance.

In designing new construction and in modernization projects in homes, offices, and factories, you can insure added style, comfort and economy by specifying PC Glass Blocks. Pittsburgh Corning Corporation, Room 774, 632 Duquesne Way, Pittsburgh 22, Pennsylvania.

· *Also makers of PC Foamglas* ·



Large offices present an excellent opportunity for PC Glass Blocks to prove their practical advantages. An ample supply of daylight is needed here—and PC Glass Block panels supply it, even to desks remote from lighting areas.

PITTSBURGH PC CORNING

GLASS BLOCKS

Distributed by

PITTSBURGH PLATE GLASS COMPANY

and by W. P. Fuller & Co. on the Pacific Coast

PITTSBURGH CORNING CORPORATION
632 DUQUESNE WAY, PITTSBURGH 22, PA.

TRANE *Speeds*

TO MEET YOUR HEATING AND AIR CONDITIONING

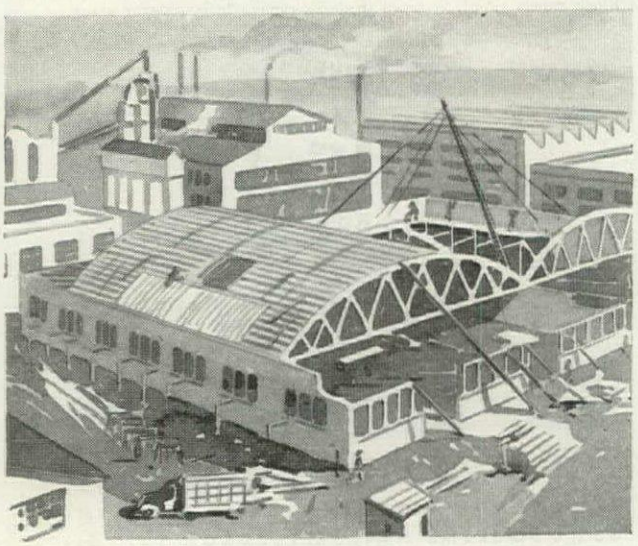
Yes—Trane is speeding up.

Trane had ready for release on V. J. Day a complete plan for ***doubling*** its manufacturing capacity.

Less than one week after the announcement of war's end, the plan had been released, contracts let, and work started. And, because the special products developed to meet the war's needs were turned out in a specially leased factory—there will be no slow-down in rolling out famous Trane Unit Heaters, Convectors, Coils, Heating Specialties, etc. And because plans were well laid this increased production will be in effect as soon as January 1, 1946.

Improved Products

The war stepped up improvements and refinements in the Trane line. New techniques were developed . . . brazing thin aluminum . . . atomic welding. As a result your new peacetime models will represent the best thinking of the industry's outstanding engineers. These refinements range all the way from improved appearance to improved capacity and durability.



But the lines manufactured, the sizes and styles of products, are substantially unchanged.

Trane remains the producer of the world's most complete line of heating, air conditioning, and heat exchange equipment.

Field Engineers on the Job

When war came, most Trane field engineers changed their status. Because of their specialized training they stayed in their area, functioning as heating and process air conditioning consultants for the war effort.

Today, a well-seasoned nucleus of the extensive field force is already back on the job. Their forces are being augmented by fieldmen returning from the armed forces. The "reconversion" problem of the Trane field engineer will be largely a matter of passing along to peacetime producers the invaluable experience gained in supplying equipment to speed wartime production.

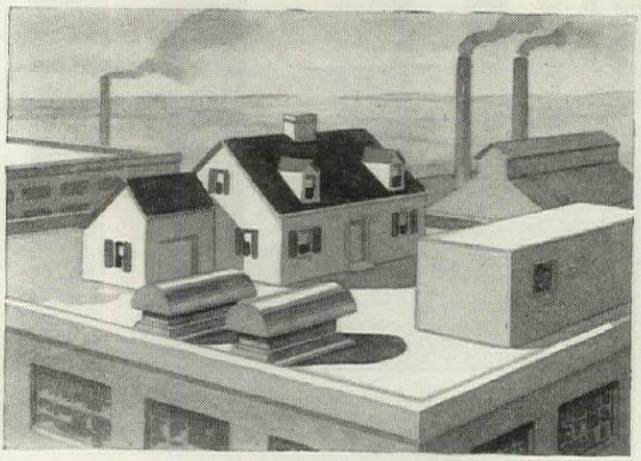
There is a competent Trane field engineer within 24 hours of any spot in the nation. He is ready and able to serve you.

A House on a Factory Roof

Veiled in secrecy as deep as that of the atomic bomb is the "*mystery penthouse*", atop the roof of the Trane

Up REQUIREMENTS

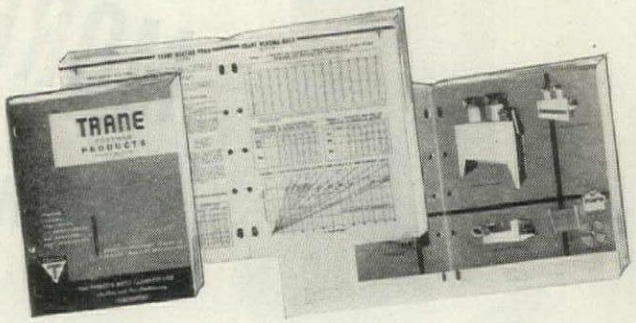
technical laboratories. Behind its doors Trane technicians are studying the crystal ball that determines the heating and air conditioning product of tomorrow.



Twice enlarged to aid the war effort, the main laboratory is now undergoing further expansion to keep abreast of the latest heating and air conditioning developments.

From this laboratory have come such products as the first convector-radiators, the first projection unit heaters, the first all-aluminum aircraft radiator, and other revolutionary heat exchangers.

And from these enlarged laboratories will come developments that will keep Trane firmly entrenched as the leader in its field.



Send for Catalog

A condensed catalog of products in the broad Trane line is available now. *Ask for Bulletin PB-290.* In it you will find a full and completely illustrated description of the Trane line.

Special new literature, in process, will be available on each of the major lines by the time Trane's doubled manufacturing facilities place us in position to give your requirements the prompt attention and quality products which is ever our goal.

Trane Offices located  **in these 85 cities**

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Allentown, Pa.
Amarillo, Texas
Appleton, Wisconsin
Atlanta, Georgia
Baltimore, Maryland
Birmingham, Alabama
Boston, Mass.
Buffalo, New York
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Chattanooga, Tenn.
Chicago, Illinois
Cincinnati, Ohio
Clarksburg, W. Va.
Cleveland, Ohio
Dallas, Texas
Davenport, Iowa
Dayton, Ohio
Denver, Colorado
Des Moines, Iowa
Detroit, Michigan
Dodge City, Kansas
Flint, Michigan
Fort Wayne, Indiana
Gainesville, Florida
Grand Rapids, Mich.
Greenville, S. C.
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Mexico, D. F.
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Missoula, Montana
Newark, New Jersey
New Orleans, La.
New York, New York
Oklahoma City, Okla.
Omaha, Nebraska
Philadelphia, Pa.
Phoenix, Arizona
Pittsburgh, Pa.
Portland, Oregon
Richmond, Virginia
Rochester, New York
Salt Lake City, Utah
San Francisco, California
Seattle, Washington
Sioux City, Iowa
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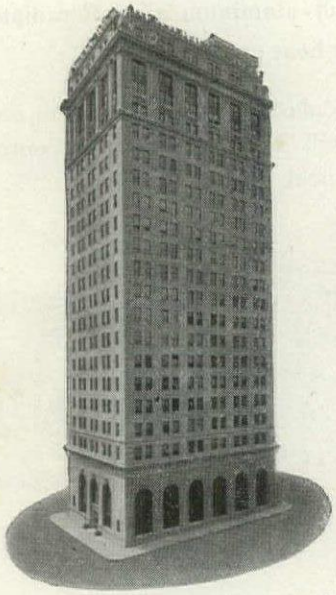
Trane Company of Canada, Ltd., Mowat & King Streets, W., Toronto, Ont. (15 branches)

THE TRANE COMPANY

FIRST IN ENGINEERED CLIMATE

MANUFACTURING ENGINEERS OF HEATING, COOLING, AIR CONDITIONING AND AIR HANDLING EQUIPMENT

LA CROSSE, WISCONSIN



First National Bank, Baltimore, Maryland.

MORE SERVICE... with FEWER elevators

THE First National Bank Building of Baltimore, Maryland is another of the many buildings in which elevator modernization by Otis resulted in better service at less operating cost.

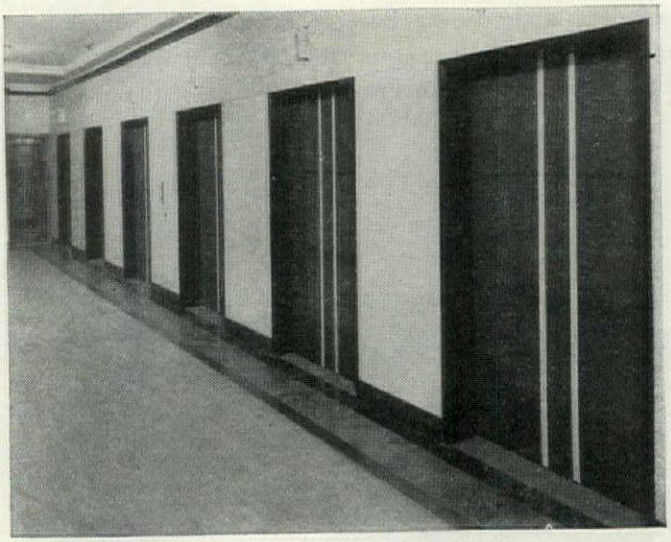
Originally, this building was equipped with six Car Switch Controlled Gearless Elevators. All six elevators had to be operated to handle the building traffic.

These elevators were changed over to Otis Peak Period Control and now only five elevators are required to handle the traffic during the morning, noon, and evening peaks. For the normal traffic requirements only four elevators are required.

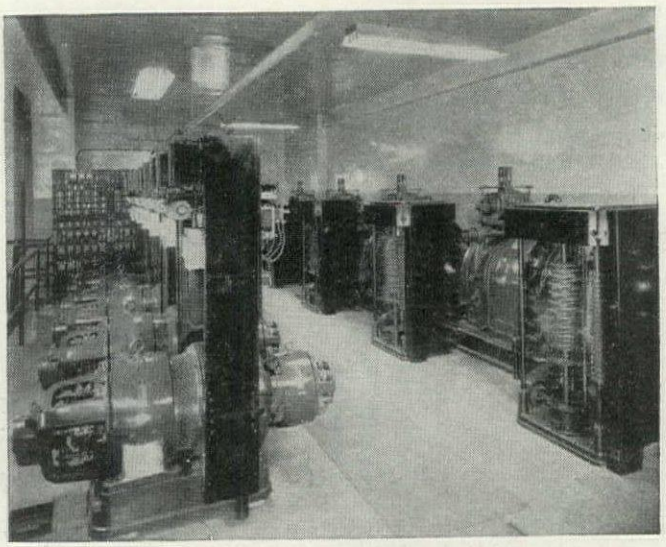
Whatever your transportation problems . . . regardless of the height or type of your building . . . your Otis representative is ready to consult with you or your Architect.

For the finest in vertical transportation tomorrow, call your Otis representative TODAY.

Otis ELEVATOR COMPANY
OFFICES IN ALL PRINCIPAL CITIES



Partial view of 1st Floor lobby showing elevator entrances.



Partial view of the Penthouse Machine Room after Otis Modernization.

"Every architect has a NEW problem to face,"

says... MR. CLARENCE R. KNUTH, *Milwaukee Architect*

"and INSULITE has the answer!"

A home designed by Clarence R. Knuth, Milwaukee

DOUBLE INSULATION plus VAPOR CONTROL

That's What the Approved Insulite Wall of Protection Gives You

- *On outer-walls, Insulite Bildrite Sheathing builds a wind-proofed, weather-tight wall of high insulation efficiency, superior bracing strength, a wall free from open cracks and knotholes.*

- *On inner-walls, Insulite Sealed Lok-Joint Lath builds a second wall of insulation, a rigid plastering surface. Lath marks are eliminated, plaster cracks reduced to a minimum.*

- *Lok-Joint Lath, with asphalt barrier against the studs, retards vapor travel. Bildrite Sheathing, being permeable to vapor, permits what vapor escapes the barrier to pass towards outside.*

"POSTWAR building will present many new problems to the architect," writes Mr. C. R. Knuth, prominent architect of Milwaukee.

"Moisture within walls will be one of the most serious. Air conditioning and new methods of heat control will increase tremendously the vapor within a home.

"Unless this is anticipated, and forestalled in construction, moisture problems within walls will result.

"The Insulite Wall of Protection meets this problem squarely, scientifically, in my opinion. It's difficult to imagine moisture problems in a home built with this wall. That's why I'm going to specify the Insulite Wall of Protection in my postwar homes."

The problem discussed by Mr. C. R. Knuth is an important one for every architect. Let us give you the whole story. The coupon below will bring you complete technical data on the Insulite Wall of Protection, free, and without obligation.

MANDO

Made Exclusively From Wood

INSULITE
Structural Insulation

INSULITE,
Dept. AF105, Minneapolis 2, Minn.

Please send me your free booklet, "Scientific Facts."

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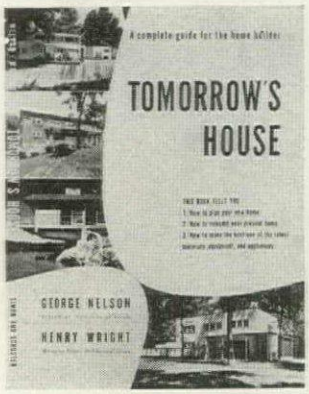
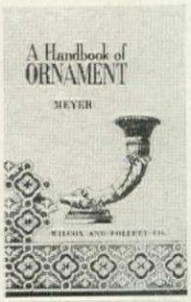
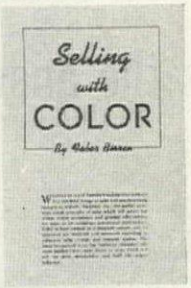
BOOKS



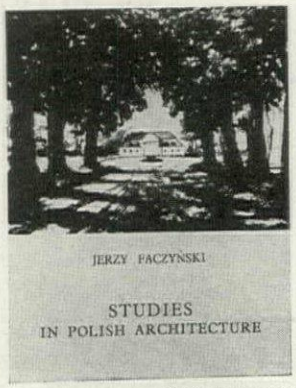
Review this page



Review page 150



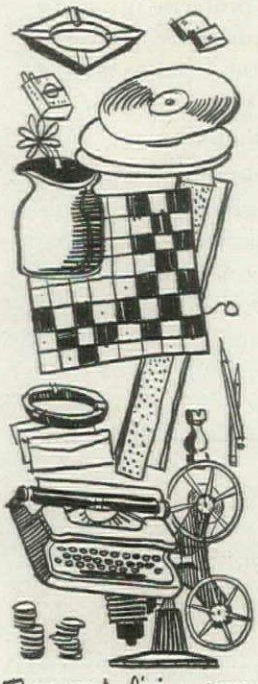
Review page 150



Review page 154

TOMORROW'S HOUSE, by George Nelson and Henry Wright. Simon and Schuster, New York. 224 pp. Illustrated. 9 in. by 11½ in. $3.00.

Most books on modern architecture trace in elaborate detail the development and philosophy of functional design. These treatises are read avidly by experts and serious thinkers while building's largest market—the average American home owner—is out fishing. Despite the worth of such writing, therefore, it is time the architectural facts of life were presented in an understandable fashion to the future home owner himself. *Tomorrow's House* does exactly that. Without recourse to historical data or heavy theory, this new book pulls the last prop from under America's white clapboard dream house. To the practicing architect who needs no convincing, such an explanation has an entirely different value. Since any prospective home builder who has read this book will see more clearly what his architect is up to, the area of client-designer understanding is inevitably enlarged. This is due in large part to the unpatronizing attitude of the authors.

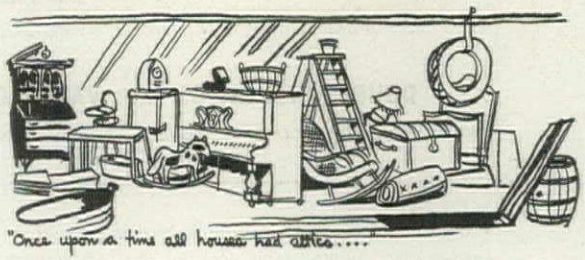


Rather than making of house design a mysterious mumbo-jumbo understandable only to its high priest, the architect, Messrs. Nelson and Wright have let the layman in on the creative thinking which produces good design.

Although the book is essentially a guide to home building, it has a basically different approach from the usual publication of this sort. Unlike the current crop of such books, it is not concerned with mortgages, site choice, sewage connections and other necessary, but routine considerations. Instead it tackles the much more difficult, but infinitely more rewarding problem of actual space planning and use.

Another unusual angle is the approach to problems of lighting, heating, air conditioning and a new technique for home planners, sound conditioning. The usual preoccupation with types of home equipment is notable for its absence. But the physical principles which must be understood to plan a well-lighted, properly ventilated, quiet home are discussed in detail. Thus, it is found of more value to study the "air-conditioned Arab" who maintains comfort in a hot climate by wearing layer after layer of thin woolen garments, than to recommend a certain type of cooling unit.

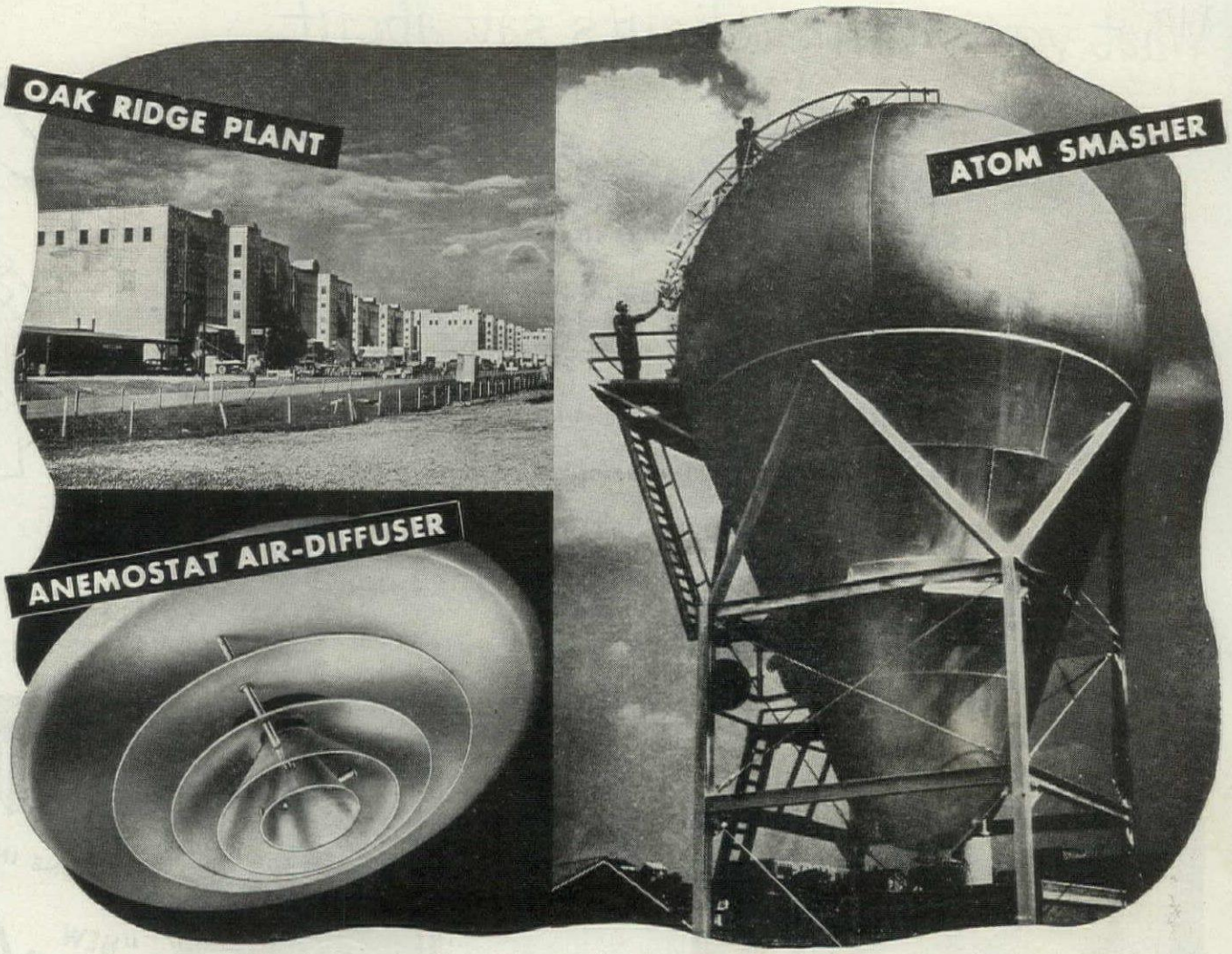
The basic philosophy of the book—that houses should be made to serve people—comes through as a guiding attitude in every discussion of specific design problems. Styles of architecture borrowed from the past are dismissed as inade-



quate solutions to the new patterns of living which have grown up in the twentieth century. The house is analyzed from the inside out, not by conventional room division, but according to the varying activities which go on in its different parts. Thus, rather than being an argument for modern architecture, the book shows step by step what inevitably happens to exterior design when interiors are planned for the most efficient and comfortable living.

The authors, whose editorial and architectural judgment has influenced the FORUM for almost a decade, are well-equipped to handle this discussion. As co-managing editors, they have analyzed more house plans than many architects see in a lifetime, talked shop with the foremost modern architects in this country and Europe. However, they do not fall into the category of armchair technicians. Both Nelson and Wright have maintained contact with the practical aspects of building by a continued practice of designing.

In addition to the authors' FORUM experience, the book also benefits from access to FORUM's huge stockpile of published work. The photographs, which are used liberally as illustrations, represent the best *(Continued on page 146)*



SPLITTING THE ATOM

The recent application of the splitting of the atom has shaken the earth to its foundation. The implications are magnificent —yet terrifying. However, we, together with all men of good will, are confident that this new-born knowledge will ultimately be controlled and used for the *benefit* of mankind.

It is no longer a secret that the experimentation and development work took place in Government-owned plants in the states of Washington, New Mexico and Tennessee, as well as in the province of Ontario, Canada.

Equipment used in these plants had to be the most effective available for the respective purposes. *We are gratified that ANEMOSTAT air-diffusers were utilized in these projects.*

There is no substitute for ANEMOSTAT

The use of Anemostat air-diffusers in these projects, as in the foremost industrial plants throughout the world, proves that Anemostats are vital to air-conditioning. The list of Anemostat installations reads like a blue-book of world industry. Consult our engineers for draftless air-diffusion.

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"NO AIR-CONDITIONING SYSTEM IS BETTER THAN ITS AIR-DISTRIBUTION"

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DRAFTLESS AIR-DIFFUSERS

AC-1025

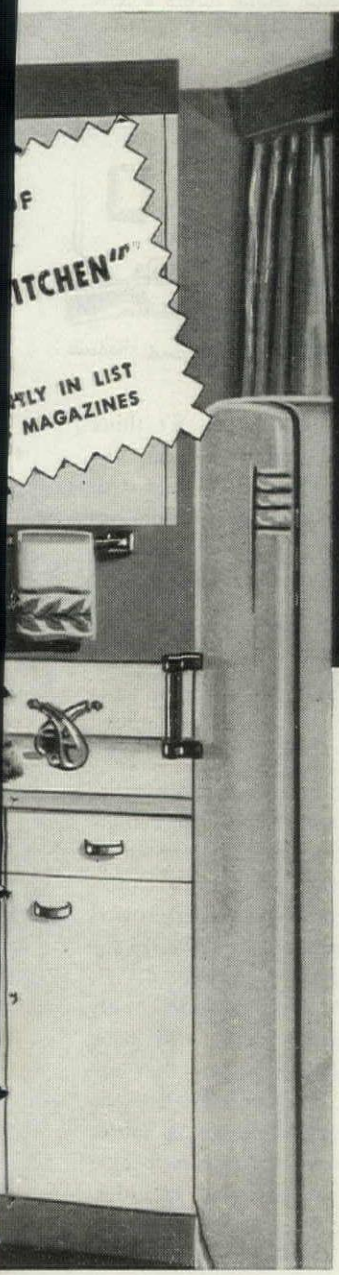
What your future clients say about Kitchen

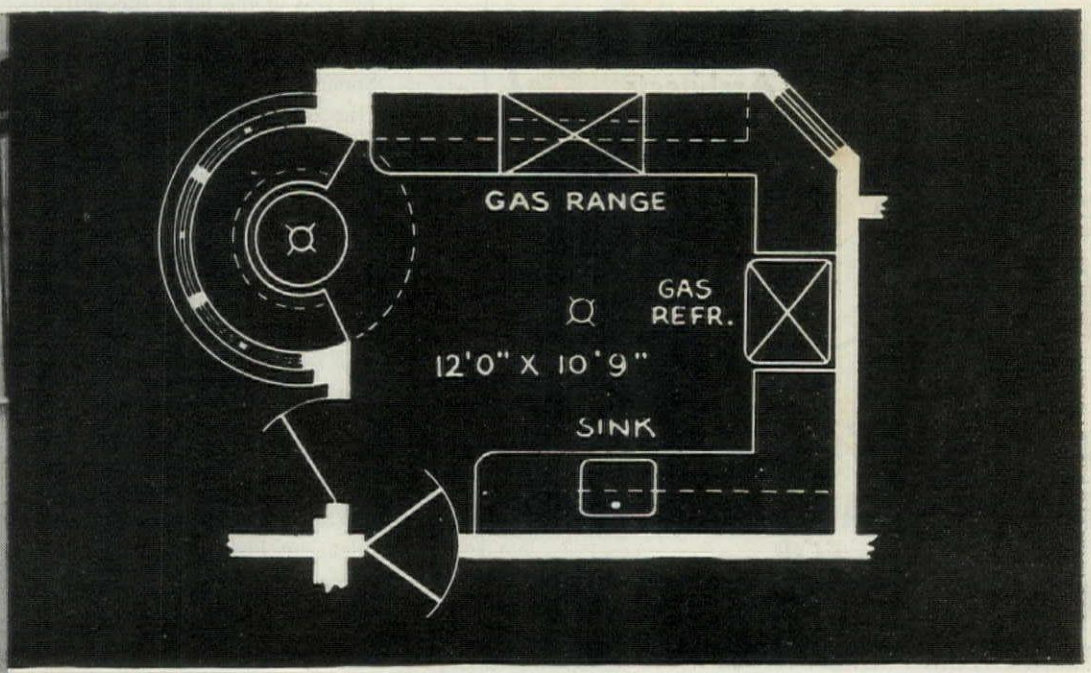
"The kitchen" is a subject dear to the heart of every woman. She knows exactly what she wants . . . and she doesn't mind saying so! We found this out when we conducted a recent survey on the kitchen shown below. Just read some of their actual statements on the opposite page . . .

Planning.....!

ABOUT THE U-SHAPED DESIGN. "It's compact but gives a feeling of spaciousness." "It's like two rooms in one." "The breakfast nook seems separate but it's only a few steps from the range." "Whoever planned it knew about *step saving!*" "The way built-in cabinets are arranged makes it easy to clean."

ABOUT DECORATIVE DETAILS. "It's modern without being 'cold'." "The bay window is so cheery." "Nice dish shelf." "I could *entertain* in a kitchen like that." "I liked it so well I cut the picture out and sent it to my husband overseas so he could see the kind of kitchen I want in our new home."





ABOUT THE EQUIPMENT. "Shows how up to date Gas equipment is. I prefer Gas because it's quicker and much cheaper." "I like Gas for a range because it's cleaner. And my next refrigerator will be Gas, too. It runs easier with less noise and less servicing." "I'm pleased to see how nice the new Gas ranges look. I always did like Gas best." "Makes me want a new Gas range, refrigerator and water heater. I have used Gas for years and wouldn't change!"

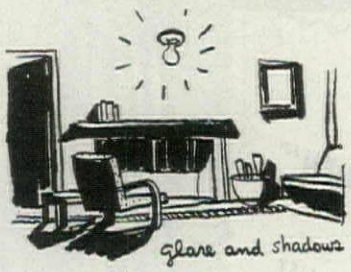
IT'S THE SAME STORY OVER AND OVER. The women who now enjoy the speed, flexibility and economy of Gas . . . and there are 20 millions of them in the cities and suburban communities of America . . . choose Gas overwhelmingly as the most efficient fuel for cooking, refrigeration and water heating. What's more . . . had they been given the chance to say so . . . most of them would insist on Gas for modern house heating and air conditioning. Take advantage of this "inside dope" on what your future customers *really want* . . . and specify Gas for these 5 big jobs in all homes you plan and build. For complete technical details on modern Gas practice, appliances and systems—see your local Gas Company.

AMERICAN GAS ASSOCIATION

(Continued from page 142)

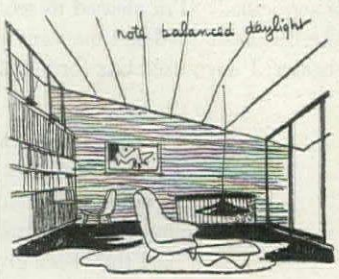
designs done in America during the past ten years and, as the authors point out in their acknowledgments: "To the rapidly expanding group of modern U. S. architects should go the bulk of the credit, since without their work there might have been theories to expound but no houses to demonstrate their validity." Grouping of this photographic material in sandwich fashion with two or three text chapters followed by a corresponding picture section, solves the troublesome problem of integrating story and illustration. The text pages themselves are enlivened with spot sketches by Mr. Nelson.

One of the most important aspects of *Tomorrow's House* is its lucid introductory statement which defines and explains the home as a technical, a social and a psychological fact. Here, from a fresh viewpoint, is an analysis of why people cling to traditional design (a question architects seldom bother to explore) and a challenge to the American family to be itself in a modern world. Discounting the value of the rest of the book, this introduction alone offers a new approach to architects, real estate men, bankers and builders.



Some sections of the book, on the other hand, have become involved in the acrobatics of fence sitting, and the reader is often left to his own choice without an expert opinion to guide him. In the chapter entitled "Where Shall We Eat?" this mugwump tendency reaches its height. Say Messrs. Nelson and Wright cagily: "We like the living kitchen. We think it solves many problems which would otherwise stump the family of moderate means. But maybe you don't like it at all. What then? Who is right? . . ." To the person who has no clear-cut ideas on the subject, the problem of where to eat becomes an elusive mystery which is never satisfactorily solved.

Taking the curse off this minor fault, however, is the forthright philosophy which runs through the book as a whole. This thesis is perhaps best illustrated by the authors' own conclusion:

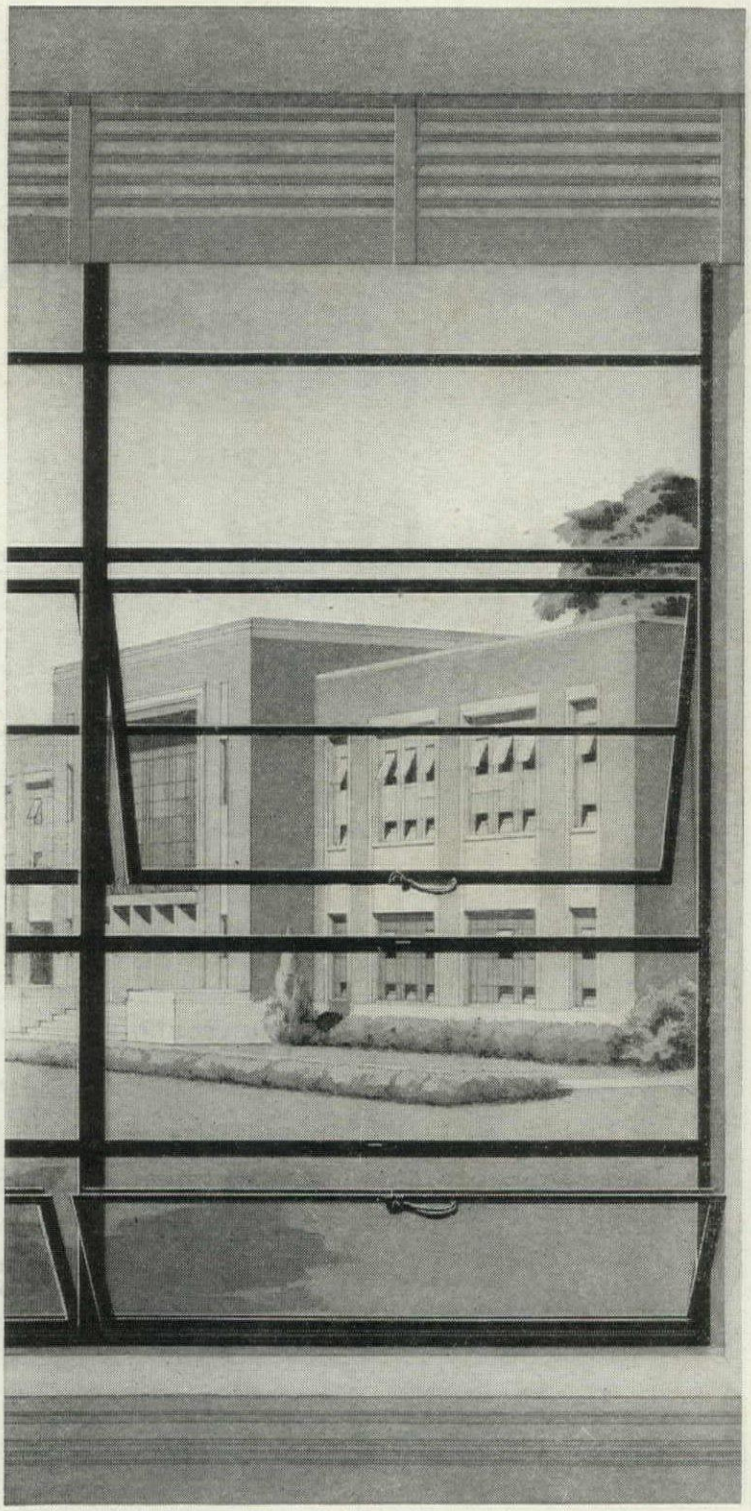


"Wherever we look—whether at the present or the remote past—the answer is the same. The great tradition in architecture is honest building. It is as true right now as it was in the days of the Pyramids.

"We have included only modern houses in this book because in our time they are the only way to carry on the great tradition. There is no possible chance to turn the clock back. In designing houses today we have to be ourselves — twentieth century people with our own problems and our own technical facilities. *There is no other way to get a good house.* No other way at all."

(Continued on page 150)

Oakton Elementary School, Fairfax County, Virginia. Division of School Buildings, State Dept. of Education, Architect. E. E. Lyons, General Contractor, Vienna, Va.



Schools . . . For cheerful, pleasant classrooms, with abundant day-lighting and easily controlled, natural draft-free ventilation, specify Lupton Metal Windows. Simple in design; rugged in construction; weathertight. The result of more than forty years experience.

See our Catalog of Post War Types and Sizes in Sweet's for 1945, or write today for reprint.

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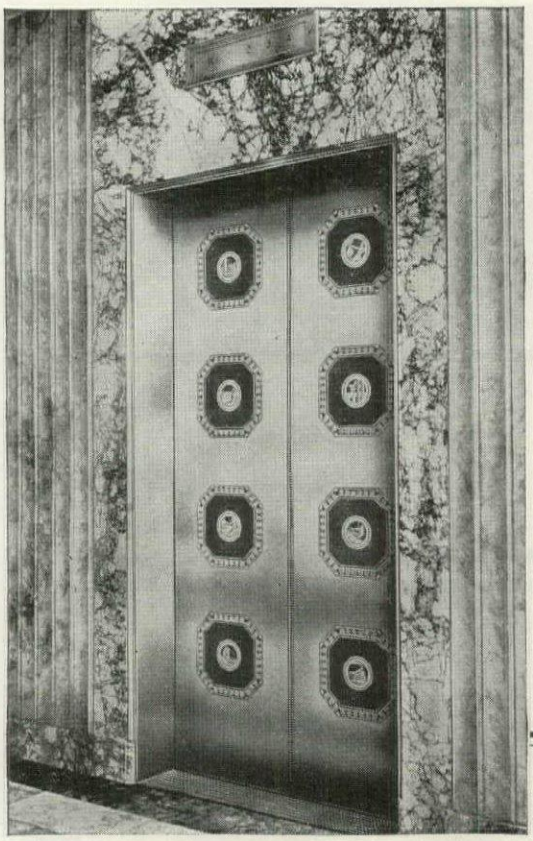
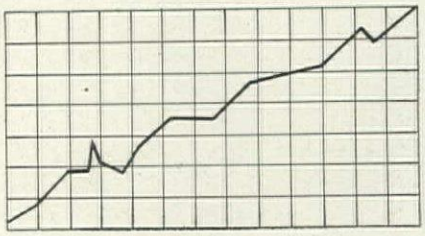


"GOING UP, PLEASE"



There's no doubt about it, from now on both Business and Building are going up in this America of ours. The void left in our economy by years of depression and war must be filled with all manner of goods and services. All authorities agree on one thing . . . Building must and will lead the way back.

Our business . . . both literally and figuratively . . . is going up too. In any multiple-story building, vertical transportation is an important part of planning. In this category comes . . . "Elevator Entrances by Dahlstrom." To assist Architects and others in the building profession, Dahlstrom has long maintained a Design and Engineering Staff to aid in their planning. You are urged to make use of this service now.

Illustrated above. Dahlstrom first floor elevator entrance in the State Office Building, Olympia, Wash.
Joseph H. Wohleb, Architect.
Doors are etched bronze.

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METALLIC DOOR COMPANY, JAMESTOWN, N. Y.

Branch Offices: NEW YORK, CHICAGO, PHILADELPHIA, BOSTON, CLEVELAND, ATLANTA, SAN FRANCISCO

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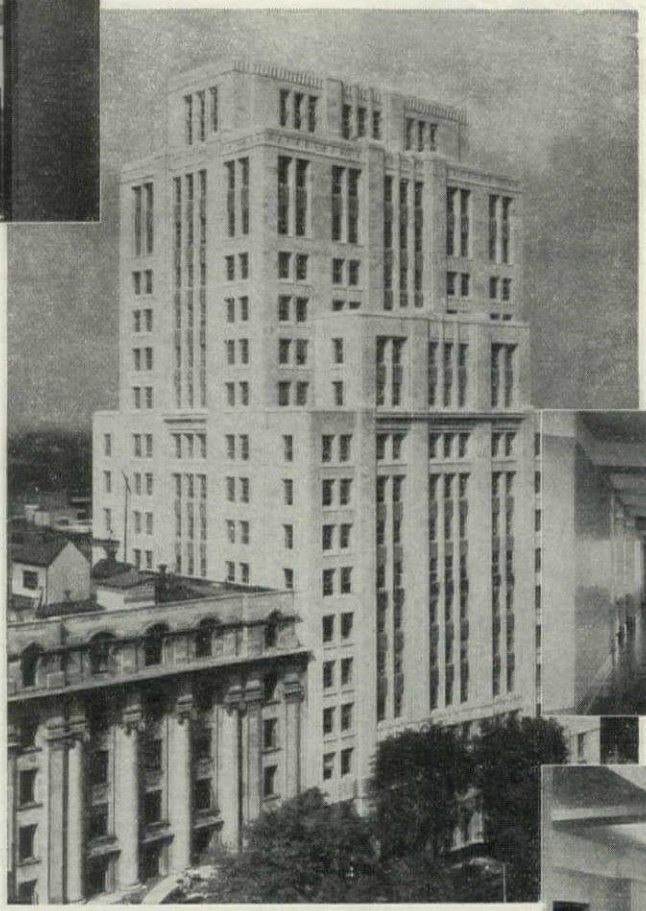
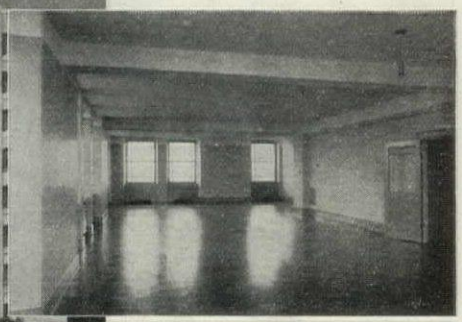
A 24-PAGE CATALOG on elevator entrances, featuring construction details of the various opening types, specifications and design treatments. Write for your copy.





TEN-STORY ADDITION TO THE ADMINISTRATION BUILDING OF THE HYDRO-ELECTRIC POWER COMMISSION OF ONTARIO, UNIVERSITY AVE., TORONTO
Sproatt & Rolph, Architects, Toronto; Bavington Brothers, Painting Contractors, Toronto; Harkness & Hertzberg, Consulting Structural Engineers, Toronto; Harry H. Angus, Consulting Mechanical Engineer, Toronto; Anglin-Norcross Ontario, Ltd., General Contractors, Toronto; Harry Brandon, Head of the Bldg. Section, Hydro Engr. Dept., supervision; H. W. Wagner, Hydro Resident Engr.

TWENTY-ONE HUNDRED GALLONS OF PAINT were used on the new ten-story addition to the Administration Building of the Hydro-Electric Power Commission of Ontario, University Avenue, Toronto, Canada.

This project is an illustration of efficiency and co-operation on the part of architects, contractors, sub-contractors and Hydro engineers. Building materials, including paints and varnishes, were first rigidly checked and approved by the Hydro Testing Laboratory.

It is both gratifying and significant that Pratt & Lambert Paint and Varnish were used on this large-scale project. The P&L Architectural Service Department welcomes the opportunity to co-operate with architects and engineers in securing maximum decorative results on any project — large or small. Contact the nearest office.

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Pratt & Lambert Paint and Varnish

BOOKS

(Continued from page 146)

A HANDBOOK OF ORNAMENT. By Franz Sales Meyer. Wilcox & Follett Co., Chicago. 548 pp. Illustrated. 5¾ in. by 8½ in. $2.50

In this year of the atomic bomb, it is difficult to understand why a publishing house should choose to re-issue such a work as this 60 year old book by Prof. Meyer. That they may have sensed its inappropriateness is apparent in the defensive foreword written for this edition by Meyric R. Rogers, Curator of Decorative Arts at Chicago's Art Institute. By its very name and structure the book reveals the mortal error of post-Victorian Classicism: called a *Handbook*, it is actually nothing but a catalog for cribbers in an age that raised the art of cribbing to the level of a profession. The author's monumental perserverence in collecting, redrawing and cataloging some 3,000 antique fragments is reduced to a travesty of scholarship. For, pulled from their artistic and cultural context, these objects become unintelligible, useless to anyone but a copyist. By his method, Meyer destroyed the historical process which gives richness and meaning to the past. If his factual knowledge and archaeological precision was greater than such earlier Classicists as Winckelman and Jacques Carrey, he applied it to a far more trivial use. They at least were fired by the desire to emulate all of Classic culture and not content merely to copy its pots and pans.

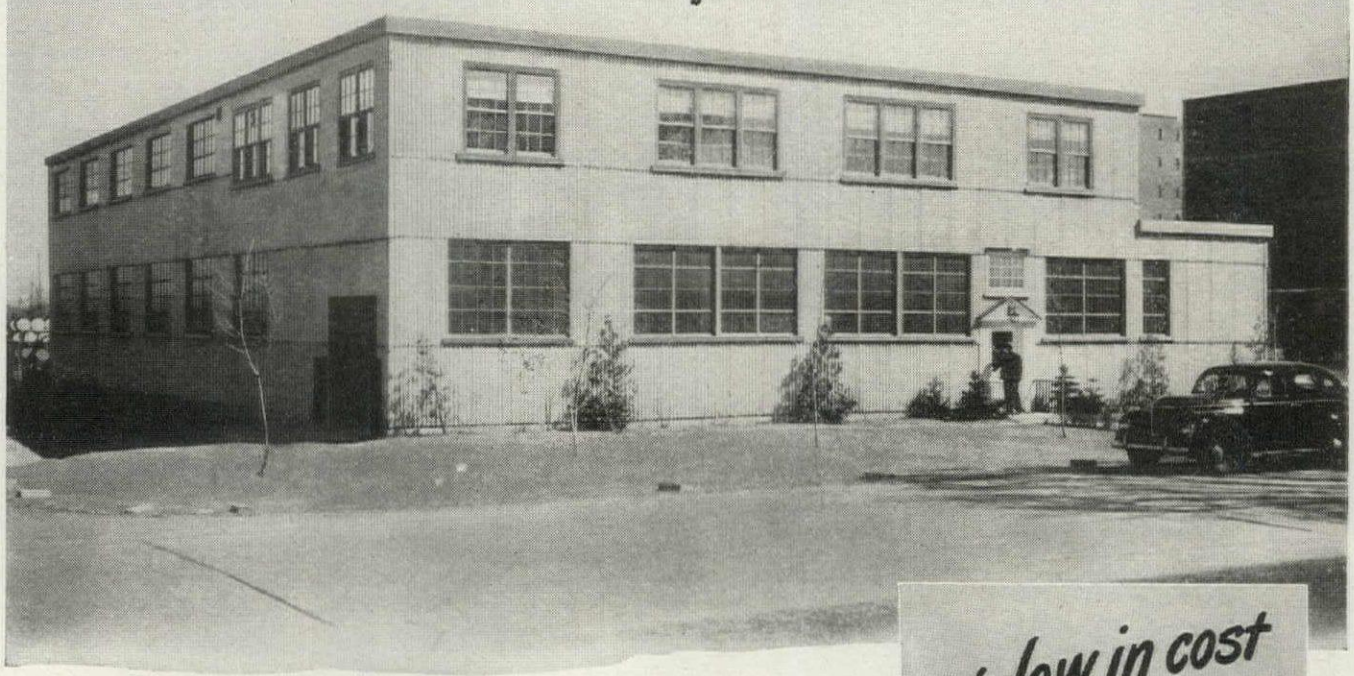
In his foreword, Dr. Rogers points to the steady qualitative decline of ornament throughout the past century. Quite correctly, he regards this as a lamentable trend and one which ought to be reversed. In analyzing this tendency he concludes that "both designer and client were so dazzled by the richness of their ornamental heritage and the ease with which mechanical devices could approximate any part of it that the designer became in large measure an extremely adept confectioner, who overlaid and disguised with a variety of traditional icings something with which these overlays had little if anything in common." But what Dr. Rogers blandly ignores is the fact that it was precisely such works as this *Handbook* which made possible such a corruption of ornament. By implication he admits this when he says that "a generation ago no designer or student, no office or drafting room concerned with the arts or with industrial design could afford to be without a copy." In other words, the *Handbook* was the indispensable base for that sterile and thoughtless mass-production of meaningless ornament which added nothing but confusion to the buildings of 50 years ago.

The postwar student of design should indeed be able to approach the problem of ornament with more confidence than hitherto. Among other things, this will necessarily involve a genuine understanding of the ornament of past cultures, including that of the Classic and the Renaissance. But the student will get nothing of this perspective from the *Meyer Handbook:* it would have been far better not to have disinterred.

SELLING WITH COLOR. By Faber Birren. McGraw-Hill Book Co., New York. 244 pp. 5½ in. by 8½ in. $2.50

The importance of color to every aspect of merchandising is so generally recognized today as to require scant comment. It is thus no longer necessary for colorists to plead its importance to styling and product design. On the contrary, the problem is now one of intelligent control. There is, according to Mr. Birren, a woeful *(Continued on page 154)*

Office buildings, too are being built with *Corrugated Transite*



LONG RECOGNIZED as one of the most *lasting* and *economical* materials for the exterior walls of industrial buildings, Johns-Manville Corrugated Transite is now also being used for office buildings and even on Main Street stores.

For architects have discovered that these amazingly durable panels can provide *attractive appearance* as well as remarkable utility.

Notice the clean-cut, streamlined exterior of the building above—an office annex of a chemical plant. The stone-grey color and symmetrical lines of Corrugated Transite well express the new design trends toward simplified construction.

Most important to many owners is the proved durability of this asbestos material. It lasts indefinitely . . . requires no painting . . . no preservative treatment. It is unaffected by the weather. It is fireproof, rotproof, highly resistant to acids, fumes, and severe temperatures.

Corrugated Transite can be used alone or in combination with other building materials. And when a building must be altered to meet changing business requirements, the sheets are 100% salvageable.

For more facts showing how *J-M Corrugated Transite* will solve your construction problems, send for our illustrated brochure. Call or write Johns-Manville, Dept. F-10, 22 E. 40th St., New York 16, N. Y.

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AND
IT CAN'T ROT
CAN'T RUST
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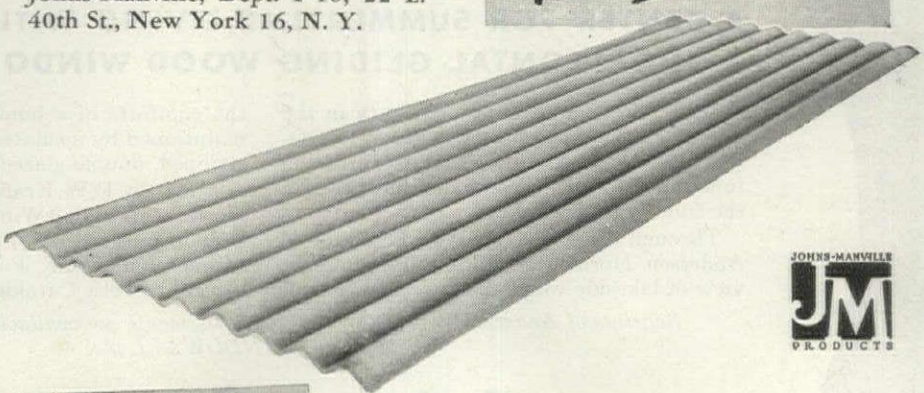

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Johns-Manville *Asbestos* CORRUGATED TRANSITE

A CENTER FOR SUMMERTIME LIVING WITH ANDERSEN HORIZONTAL GLIDING WOOD WINDOW UNITS

Open the door to outdoor beauty in the homes of the future with wide WINDOWALLS, those windows that perform the functions of walls, those walls that perform the functions of windows.

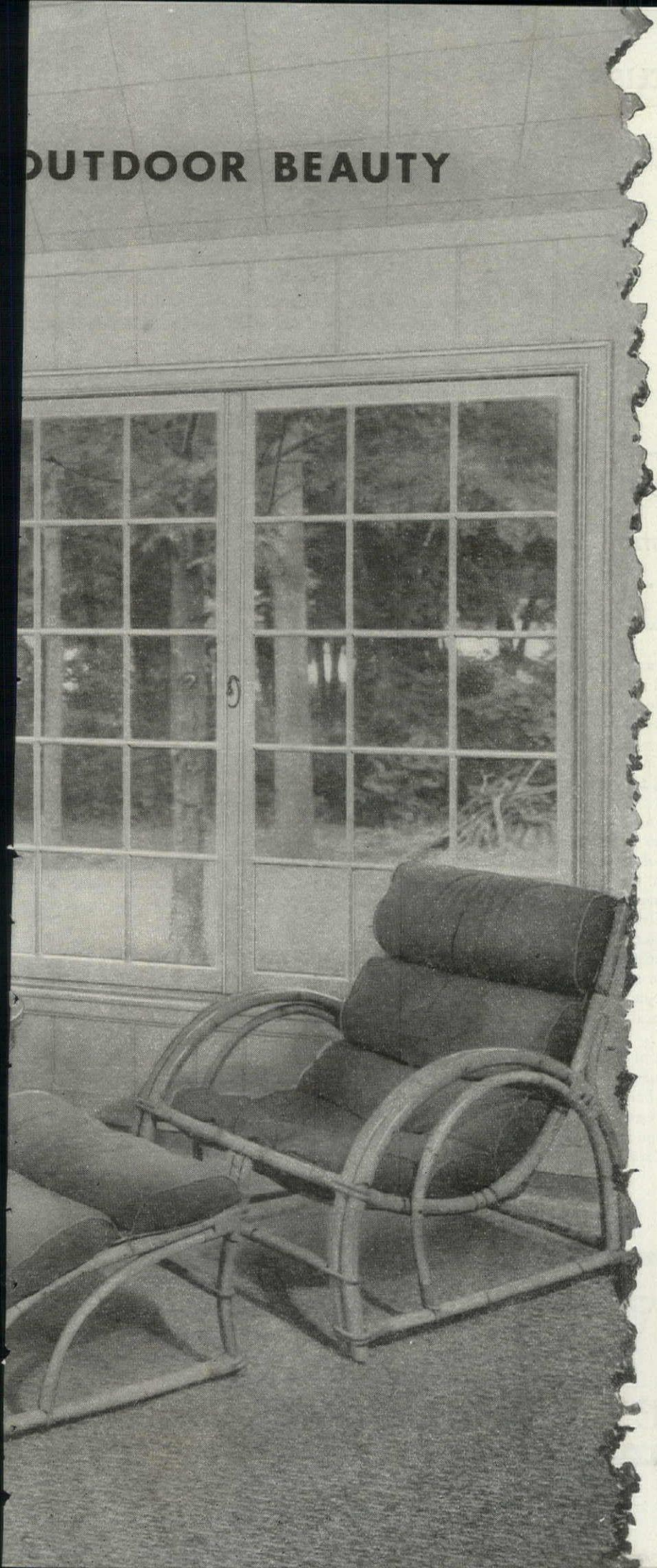
Through these WINDOWALLS, made of Andersen Horizontal Gliding Windows, a view of lakeside woodland is seen, while all the comforts of a home are protected and maintained by insulated windows (weather-stripped, double-glazed).

Architect E.W. Krafft specified Andersen Horizontal Gliding Window Units, No. 5856, sash opening size 5′ 8 13/16″ x 5′ 6¾″, in this Lake Minnetonka home. For additional details, consult Sweet's Catalog, or write Andersen.

Reprints of Andersen WINDOWALL advertisements are available upon request. Write for the WINDOWALL file.

Andersen Corporation

BAYPORT, MINNESOTA



AUGUST, 1945 WAR PLANT

From 1942 up to the very moment the wild whistles blew on August 14, 1945, the Andersen Corporation's great factory at Bayport, Minnesota, was a war plant. Our role in the war was to manufacture boxes for ammunition and shells. The Andersen Corporation was awarded the Army-Navy "E" in June, 1944, and won a star for subsequent production efficiency. To a much smaller extent, we also produced windows for war housing needs.

THEN CAME THE END OF THE JAP WAR

By the end of the war, our distributors, who serve all 41 states east of the Rocky Mountains, had almost completely exhausted their stocks. And we had not been able to handle much more than the high priority orders for windows that they forwarded to us. Our first job will be to rebuild our distributors' stocks to normal levels.

SEPTEMBER, 1945 WINDOW FACTORY

As this is written, in the early days of September, the Andersen Corporation plant is already producing Andersen Complete Wood Window Units and Andersen Master Frames. Reconversion for us was no problem.

As we go into the postwar period, we have a force of skilled labor large enough to produce all that we can in the face of a shortage of raw materials. So we have machines and we have men.

Lumber, hardware and screen cloth are still scarce. Of some of these needed materials we are getting today only about enough to produce at one-third our capacity. Our labor supply will probably improve as rapidly as the raw material situation.

We confidently expect that Andersen Window Units and Frames will be available generally about as soon as other building products.

We are delivering what we now produce as fairly and equitably as we can, to those with whom we have done business before and during the war.

Andersen Corporation

BAYPORT, MINNESOTA

BOOKS

(Continued from page 150)

need to systematize and standardize the application of color to merchandising problems. Manufacturers are nowadays apt to use too many colors, or the wrong colors, or even the right colors on the wrong products. Based on the frankly pragmatic assumption that the color which pays for itself is the one to use, Mr. Birren has compiled a mass of data for the guidance of the merchandiser. Most of it is interesting, much of it will be useful but nearly all of it is disparate. This is not so much Mr. Birren's fault as that of the field itself: it is large and complex, and the literature on the subject is constantly growing. As an instance of this confusion, Mr. Birren quotes three authorities (of presumably equal stature) on the number of colors visible to the human eye: the first says 32,820, the second 7,500,000 and the third a round 10 million. With such disparities in the field itself, a really sequential survey can scarcely be expected at this time.

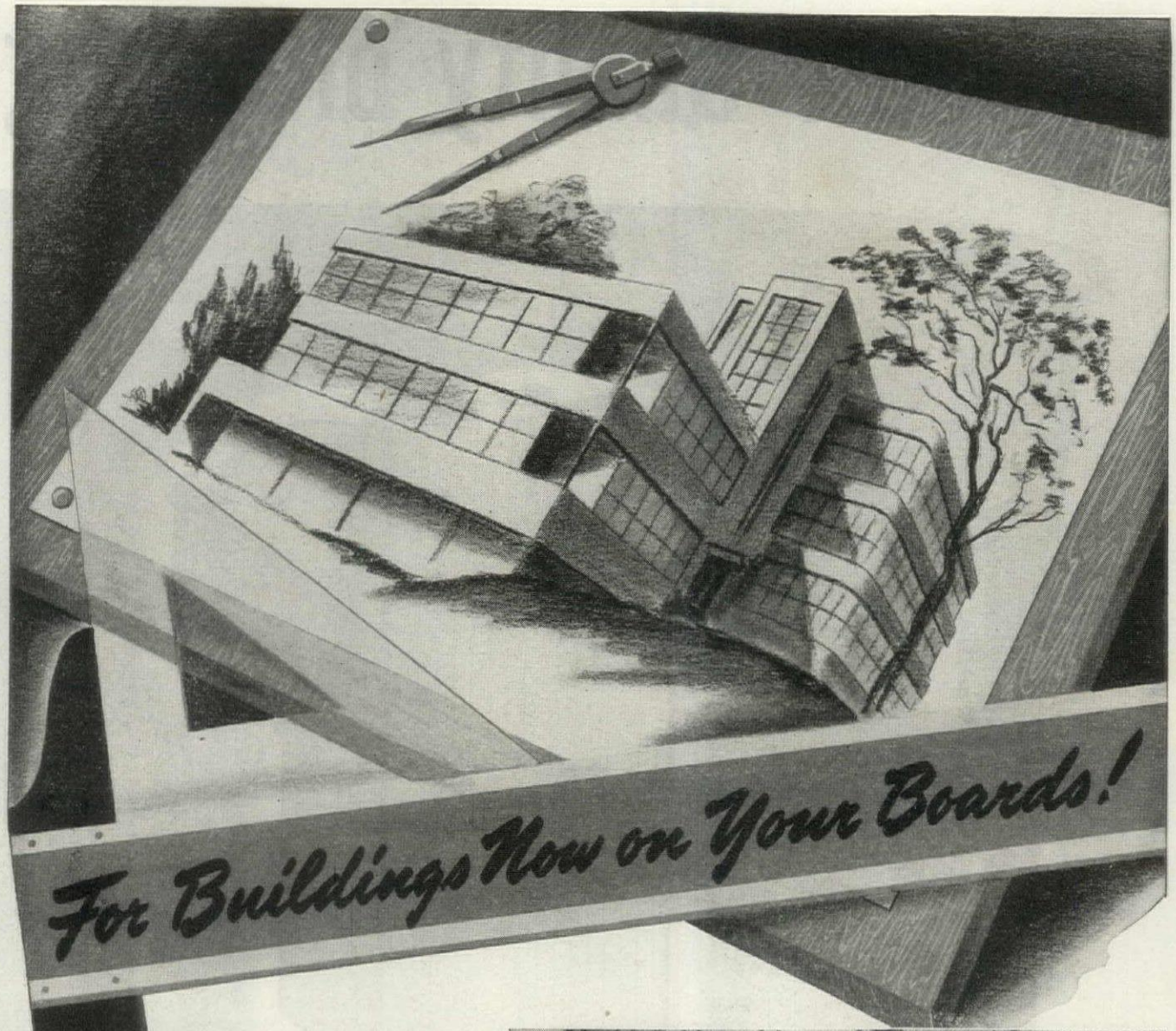
STUDIES IN POLISH ARCHITECTURE. By Jerzy Faczynski. University Press of Liverpool. Hodder & Stoughton, Ltd., London. 110 pp. Illustrated. 21/.

Here is as nostalgic and fanciful an epitaph for the vanished charm of the Polish countryside as can be found. Judged on an international basis, Poland was, architecturally speaking, unimportant and little known. Her tumultuous history resulted in a conglomeration of styles ranging from pure Gothic to a strong Russo-Byzantine influence.

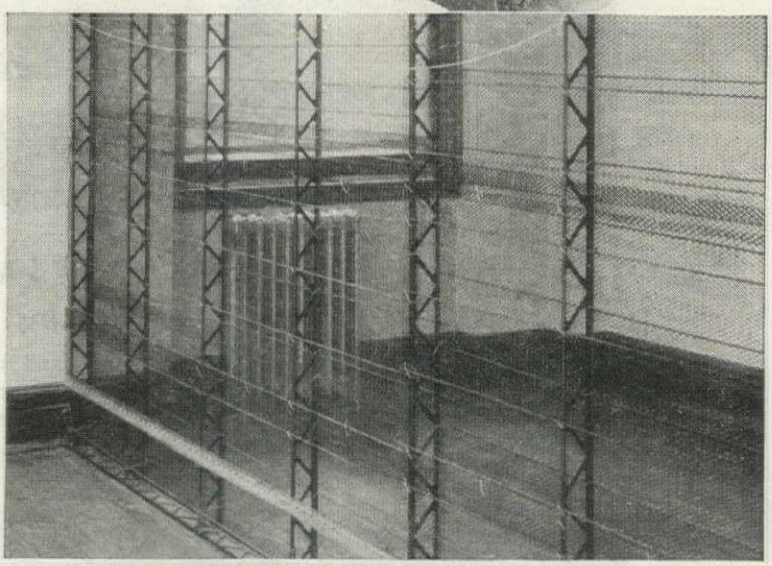
For those young architects who are today responsible for the reconstruction of Europe's most pitifully devastated nation, the lyric charm of Faczynski's little sketches will do more than many words to recreate the essence of Poland's architecture and tradition. While the drawings themselves are not worthy of serious artistic criticism, many have a romantic lilt reminiscent of John Reynold's Palladian watercolors. The collection of drawings is preceded by an interesting introduction to Polish architecture by Zbigniew Dmochowski which covers the historical side concisely and also gives an idea of life in the average Polish community. One characteristic brought out in the introduction is the fact that among the Carpathian Highlanders the old master builders belonged to the aristocracy of the village, and as one of them said, 'We used to take a whole summer to build a house and there was plenty of time to think about it . . . We did not ask the owner what to do, but built according to our own judgment.' As a regional custom, this is to say the least, quaint.

Speaking of the artist's drawings, Mr. Dmochowski stresses their combined rich and vaporous quality set off by the brittle hardness of charcoal line. This, he says, is the final stage of the creative process but its origin lies far deeper—in the ancient tradition of Polish art and in the atmosphere of an independent Poland.

Lest political conviction raise its controversial head, let it be said that this book and the new Polish School of Architecture which has existed since 1942 in association with the Liverpool School of Architecture can be assumed offsprings of the Polish Government in Exile that held sway in England. But regardless of prejudice and conviction, *Studies in Polish Architecture* is an interesting work on an art that had to be totally obliterated before it was either noticed or appreciated.



Protection of the beauty of interiors is assured by the use of the Bar-Z-System of hollow plaster partitions. It provides a perfect keying base for plaster and offers long lasting protection against cracks. For quality, lightweight strength and the economy of lasting rigidity—specify Wheeling Bar-X-Lath for floors, walls and ceilings.



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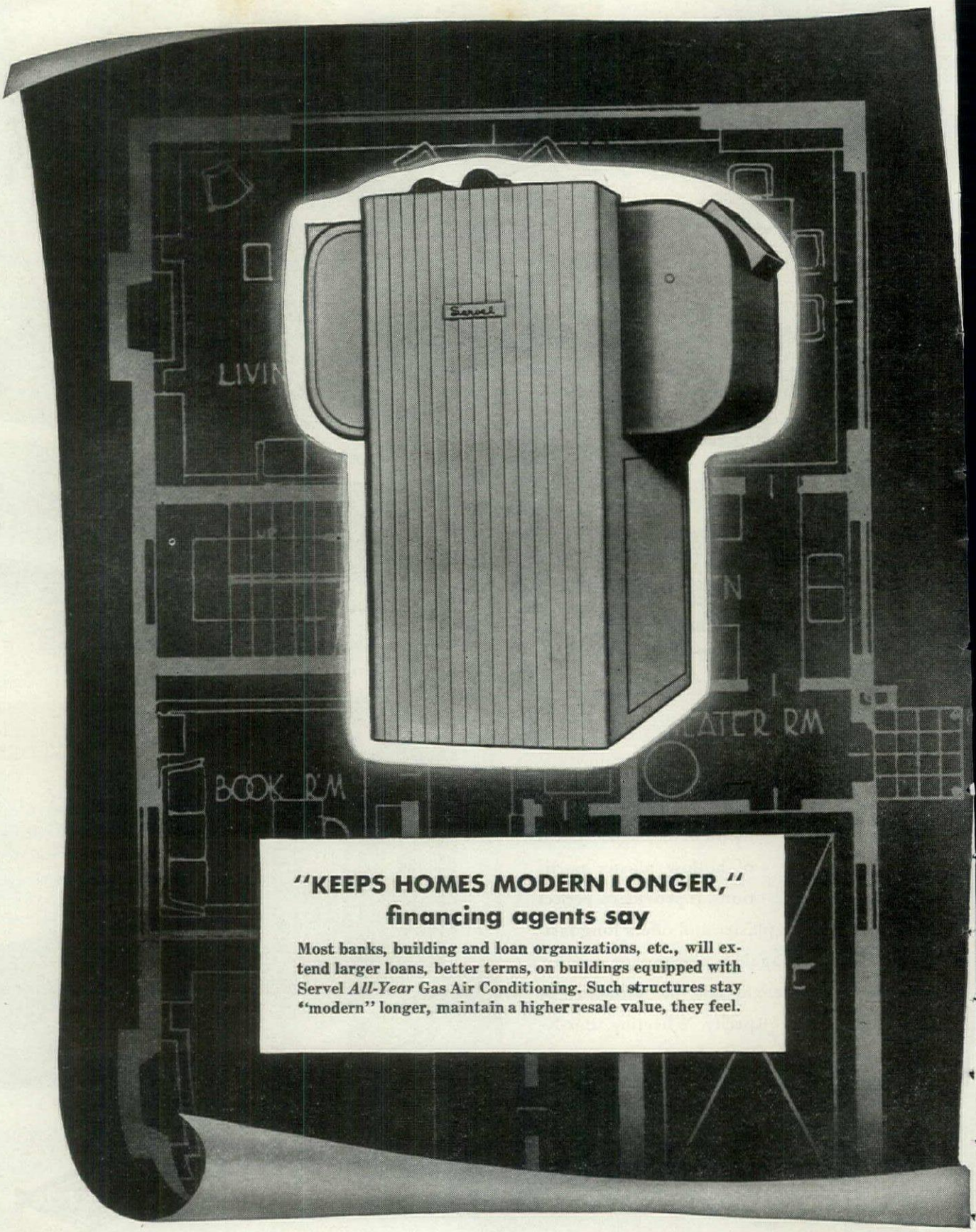

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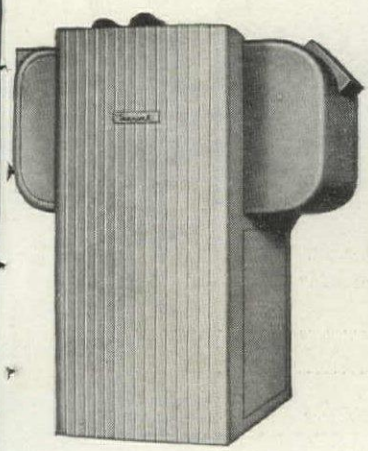

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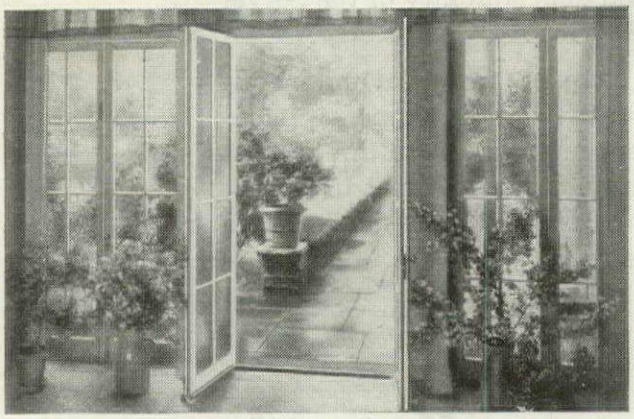
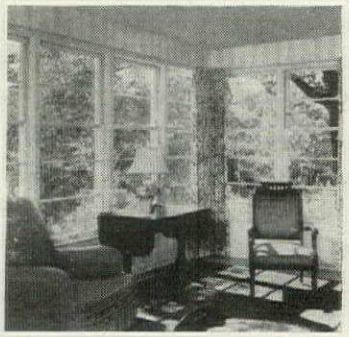
"Tea for two" means opportunity... for YOU!

• Tea served in a dining room bay . . . trees looking in through living room windows . . . bedrooms opening to a starry sky! Features like these are easy to plan—with economy—when you specify woodwork of stock design.

For windows, doors and frames of Ponderosa Pine—which will be readily available as postwar building moves forward—provide the economical way to add charm to a dwelling—and to increase utility, too. "Today's Idea House," new Ponderosa Pine 32-page book, contains dozens of ideas helpful in contributing fresh interest to the homes you plan. Mail the coupon today for your free copy!



Here the Ponderosa Pine French doors and windows provide an intimate connection with the outdoors—yet the over-all price is moderate—thanks to the economy of stock design.



Windows in groups, as shown above, can be arranged in a variety of ways to create interesting individuality. Precision-manufactured, pre-fit wood windows are truly weathertight.

"Walls of windows," as shown above, need not be a burden on the building budget — if you choose Ponderosa Pine stock window designs. Such windows, too, add appealing charm.

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Easy to install, instant and smooth in operation, "electric-eye" actuated Stanley Magic Doors do their duty day and night. Untouched by human hands, they do not spread contamination. Traffic is everywhere eased for staff, patients, visitors. Efficiency is assured.

Give Stanley Magic Doors an important place in your earliest plans – not only for the hospital, but also for the office building, store, hotel, restaurant, theater, and industrial building. Stanley will cooperate in preparing plans and specifications. Fill out and mail the coupon now.

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DISCH. ARMY ENGINEER OFFICER —15 yrs. arch. exp. and 6 yrs. gen. constr. desires to estab. mfgr's agency or direct distributership for Ga. and/or Fla. Box E-126.

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CONSTR. SUPERINTENDENT OR ASSISTANT—Disch. vet, college grad. in mech. eng. Qualified estimator, surveyor, builder, structural design and drafting. Free to travel. Would like to be located in Florida. Box E-133.

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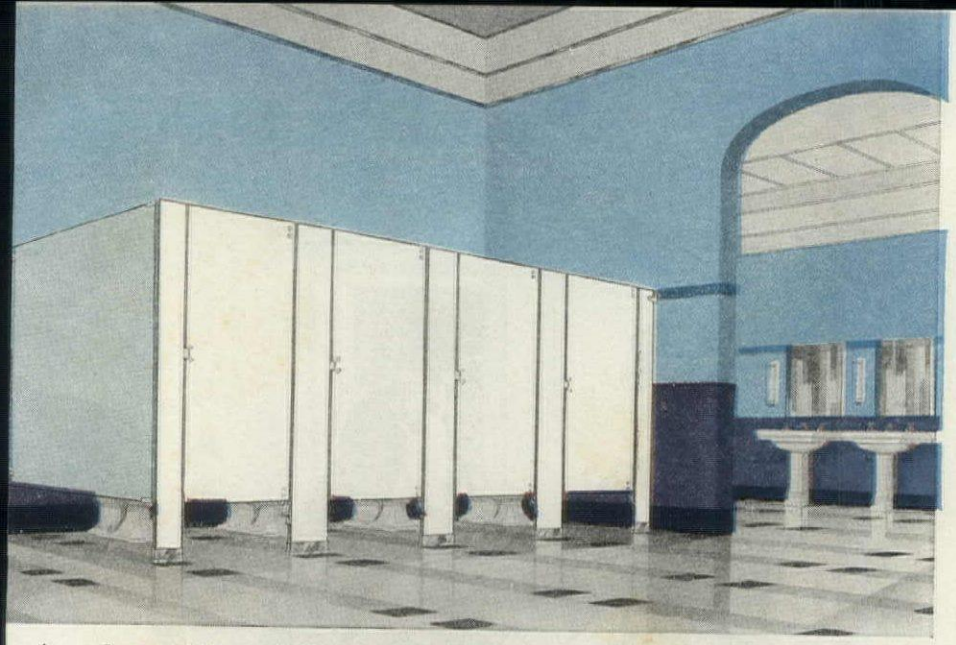
ARCH. DRAFTSMAN—Designing; rendering; or working drawings. Small but growing office. Large prospects ahead in wide variety of bldg. types. Excel. opportunity on Puget Sound, Wash. Box R-160.

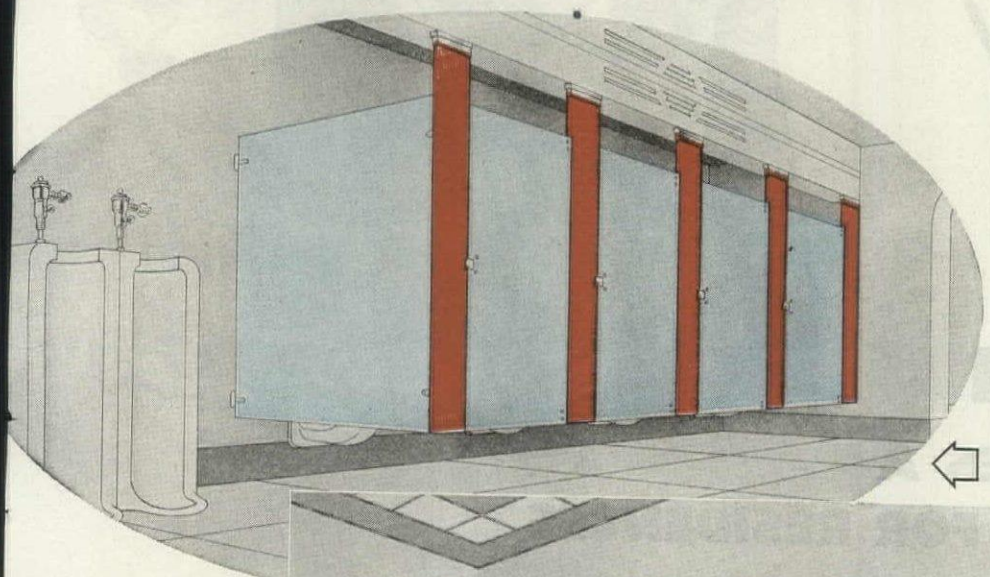


Sanymetal Normandie Type Toilet Compartments impart a moderately streamlined effect to a toilet room environment. Streamlined design wedded to utility fulfills all requirements. Unadorned utility no longer satisfies a public accustomed to bathrooms embodying varying degrees of modernity and elegance. Available in three finishes: (1) "Porcena" (porcelain on steel); (2) "Tenac" (baked-on paint enamel finish over galvanized, bonderized steel); (3) baked-on paint enamel finish over regular furniture finish, cold rolled steel. "Porcena" (porcelain on steel) is available in a variety of standard colors.

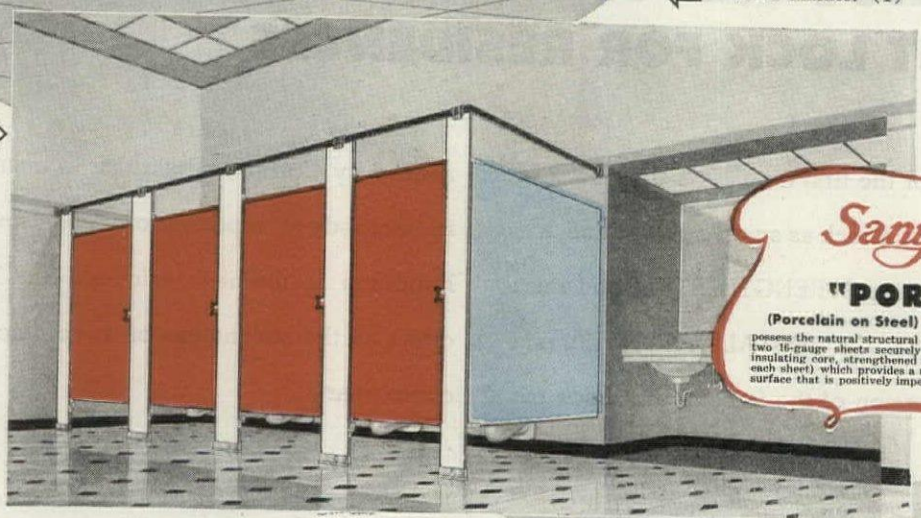
A TOILET ROOM ENVIRONMENT IS AS *important* AS OTHER ENVIRONMENTS

THE TREATMENT of a toilet room environment is no longer secondary to its utility. Blending the utility of toilet facilities with appropriate toilet room environments results in environments that are in keeping with modern interior environmental treatments. Toilet compartments usually dominate a toilet room and influence the toilet room environment. Resuming a pre-war practice, Sanymetal again offers several different types of toilet compartments for creating the most suitable toilet room environment for every type of building. Sanymetal "Porcena" Toilet Compartments will be utilized in buildings of the future because they are fabricated of the ageless and fadeless material, porcelain on steel. Sanymetal "Porcena" Toilet Compartments embody the results of over 30 years of specialized skill and experience in making over 68,000 toilet compartment installations. Ask the Sanymetal Representative in your vicinity for information about planning suitable toilet room environments. Refer to Sanymetal Catalog 19B-5 in Sweet's Architectural File for 1945, or write for file copy of Catalog 83.

THE SANYMETAL PRODUCTS COMPANY, INC.
1687 Urbana Road • Cleveland 12, Ohio



Sanymetal Century Type Ceiling Hung Toilet Compartments are particularly appropriate for schools, institutions, public buildings, office buildings, hotels, clubs, industrial plants, and theaters. They impart dignity, refinement, and cheerfulness to the toilet room environment. They make up into a rigidly fixed installation. Available in three finishes: (1) "Porcena" (porcelain on steel); (2) "Tenac" (baked-on paint enamel finish over galvanized, bonderized steel); (3) baked-on paint enamel finish over regular furniture finish, cold rolled steel.



Sanymetal Academy Type Toilet Compartments provide a certain distinctiveness. This type of partition is the only one in which all the dignity and distinctiveness of standard flush type construction, unmarred by posts, is appropriately combined with headrail. These toilet compartments are available in three finishes: (1) "Porcena" (porcelain on steel); (2) "Tenac" (baked-on paint enamel finish over galvanized, bonderized steel); (3) baked-on paint enamel finish over regular furniture finish, cold rolled steel.

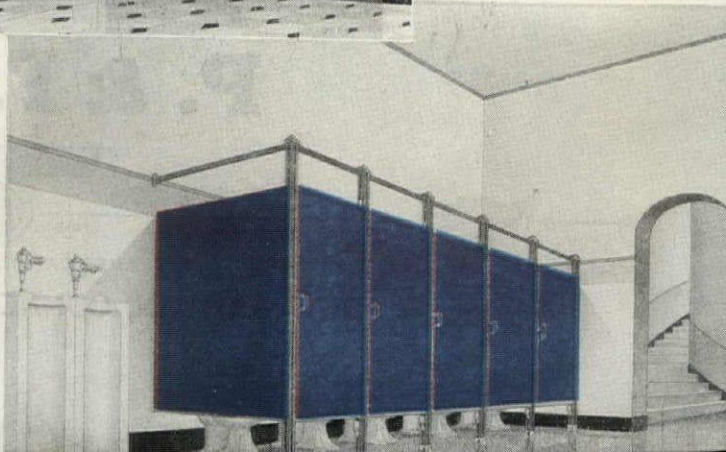
Sanymetal* **"PORCENA"**
(Porcelain on Steel) TOILET COMPARTMENTS
possess the natural structural strength of steel, not one sheet, but two 16-gauge sheets securely bonded on opposite sides of dense insulating core, strengthened by porcelain enamel (four layers on each sheet) which provides a non-porous, flint-hard, glass-smooth surface that is positively impervious to odors, acids and moisture.

Sanymetal*

**Trade Mark Reg. U. S. Pat. Off.*

TOILET COMPARTMENTS
and Office Partitions

Sanymetal Standard Flush Type Toilet Compartments: This type of toilet compartment is regarded as a standard. Sanymetal Standard Flush Type Compartments are suitable for toilets, lavatories, dressing rooms, and ward screens in all types of buildings. Sanymetal Standard Flush Type Compartments harmonize and blend well with the effects produced by materials commonly used for walls, ceilings, and floors. They are available in steel or aluminum with baked-on paint enamel finish. Also available with partition panels only in "Porcena" (porcelain on steel).



It's Practical...

It's Stylish...

It's Wanted...

it's Here!

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ANNOUNCES A UNIT LOCK FOR RESIDENCES

NOW for the first time . . . a UNIT lock for homes . . . a lock as smart as it's sound . . . a lock offering STRENGTH, STYLE and amazing EASE OF INSTALLATION! Streamlined version of the famous Unit Lock pioneered by Corbin in 1899 that is installed in hundreds of important office and public buildings . . . the new *residence* Unit Lock offers all the advantages of its commercial counterpart.

P. & F. Corbin

Good Buildings Deserve Good Hardware

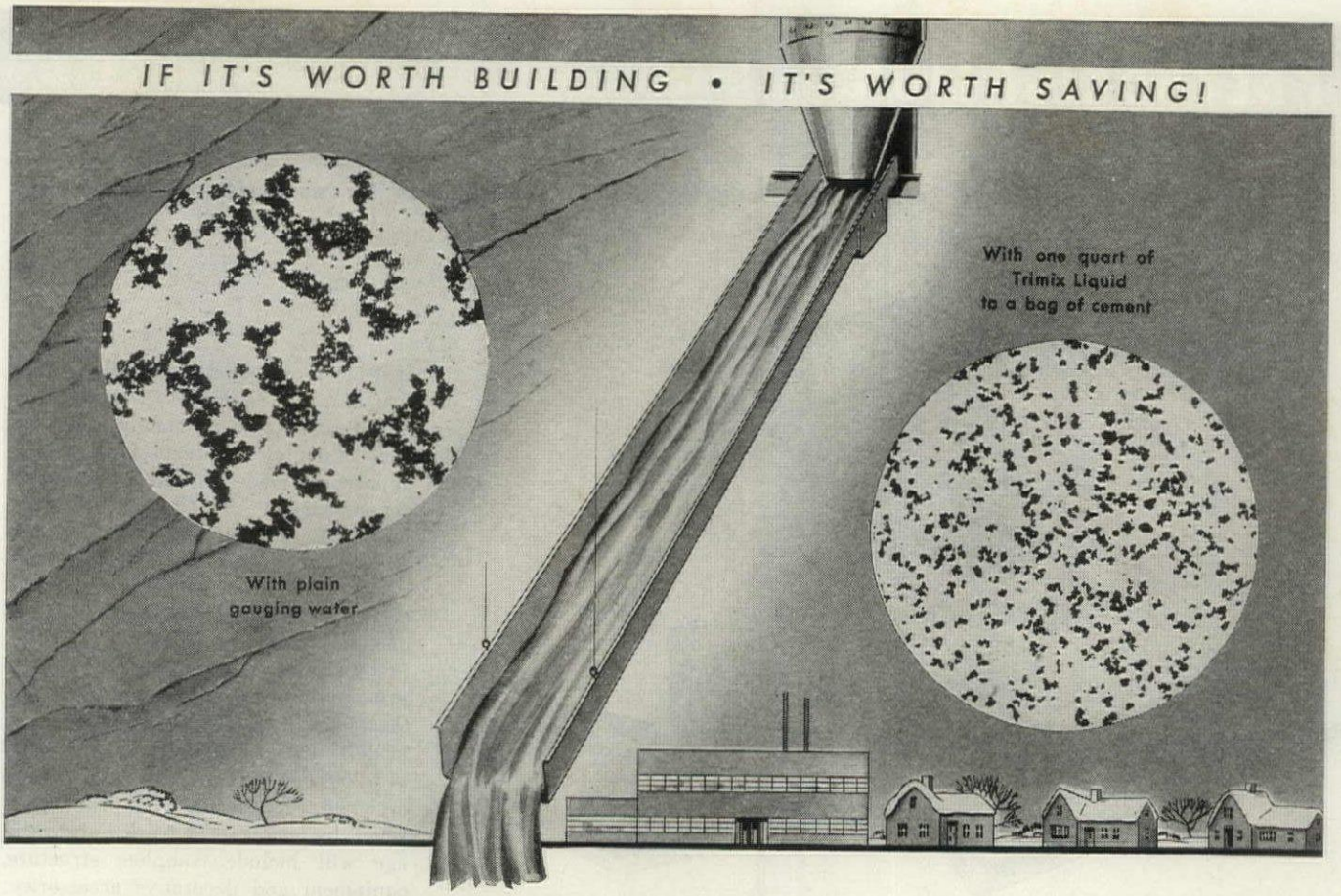
CORBIN

ARMY E NAVY

DIVISION OF THE AMERICAN HARDWARE CORPORATION, SUCCESSOR

NEW BRITAIN, CONNECTICUT • SINCE 1849

IF IT'S WORTH BUILDING • IT'S WORTH SAVING!



IT'S BETTER DISPERSION THAT MAKES BETTER CONCRETE

Better dispersion of cement particles . . . to improve workability with the lowest possible water-cement ratio . . . is obtained with TRIMIX Liquid. Thanks to a patented surface-active agent, TRIMIX effectively wets and scatters the particles without interfering with the hydration reaction of the cement.

The photomicrographs reproduced above illustrate the degree of dispersion secured when Portland cement is gauged with plain water as compared with the dispersion obtained when Portland cement is gauged with water to which has been added one quart of TRIMIX Liquid per bag of cement . . . resulting in the use of 20% less than the normal volume of gauging water.

TRIMIX Liquid also has air-entraining properties which impart to concrete greater resistance to the damaging effects of freezing and thawing.

For further information, write Dept. A-10.

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FLOOR TREATMENTS • PROTECTIVE COATINGS • CONCRETE AND MORTAR ADMIXTURES • ROOF COATINGS • WAXES • CAULKING COMPOUNDS •

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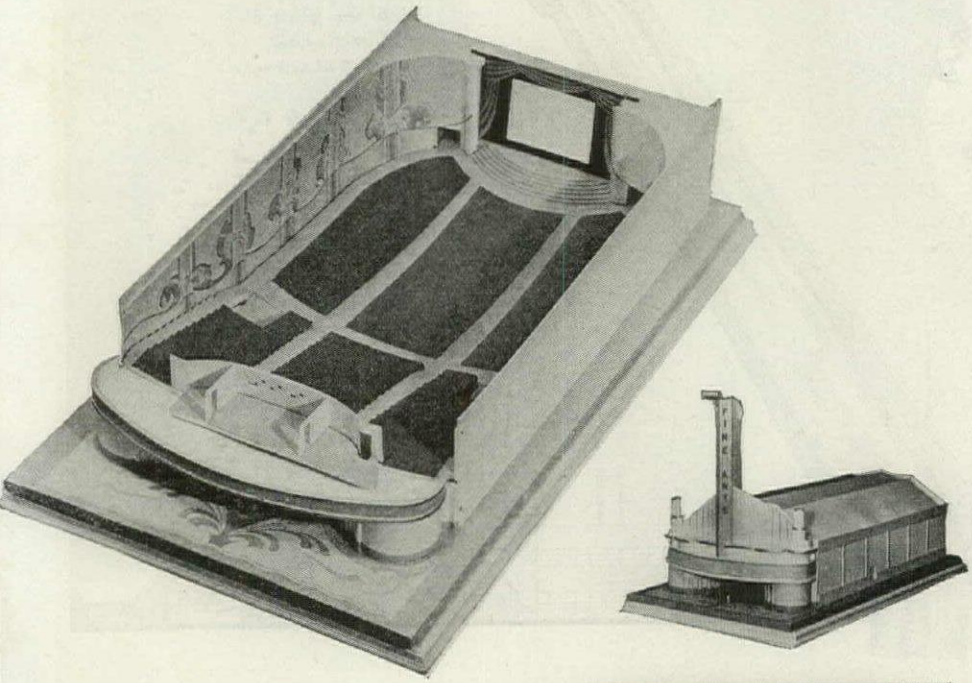
No matter what the problem . . . if it has to do with protecting concrete . . . there is a Sonneborn product for the job. For example:

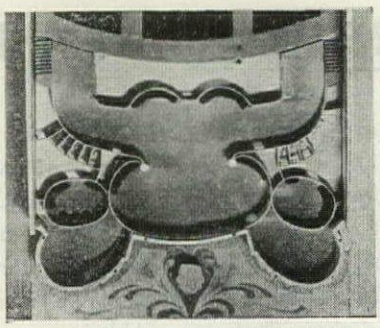
LAPIDOLITH LIQUID — The patented chemical hardener for wearproofing and dustproofing concrete and terrazzo floors and other concrete surfaces. Its low surface tension permits deeper penetration, more thorough hardening.

FERROLITH "G" — A metallic grouting compound used in setting up machinery, anchoring bolts, and securing structural and other supporting columns in connection with concrete floors.

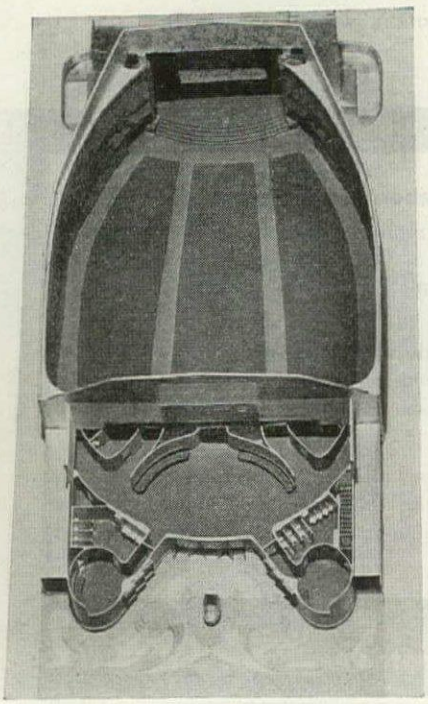
Building Products Division · L. SONNEBORN SONS, INC. · 88 Lexington Ave., New York 16, N.Y.

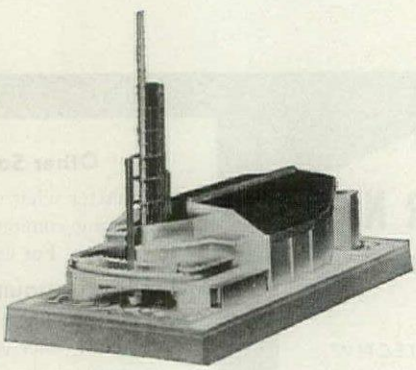
PACKAGED THEATERS, despite badly-designed "fronts", promise much for world-wide movie audiences.





1,200-SEAT stadium type. Note that curves of interior partitions not only follow traffic flow but also increase stability of the thin prefabricated panels of enamelled sheet metal. Entire assembly literally snaps and buttons together.





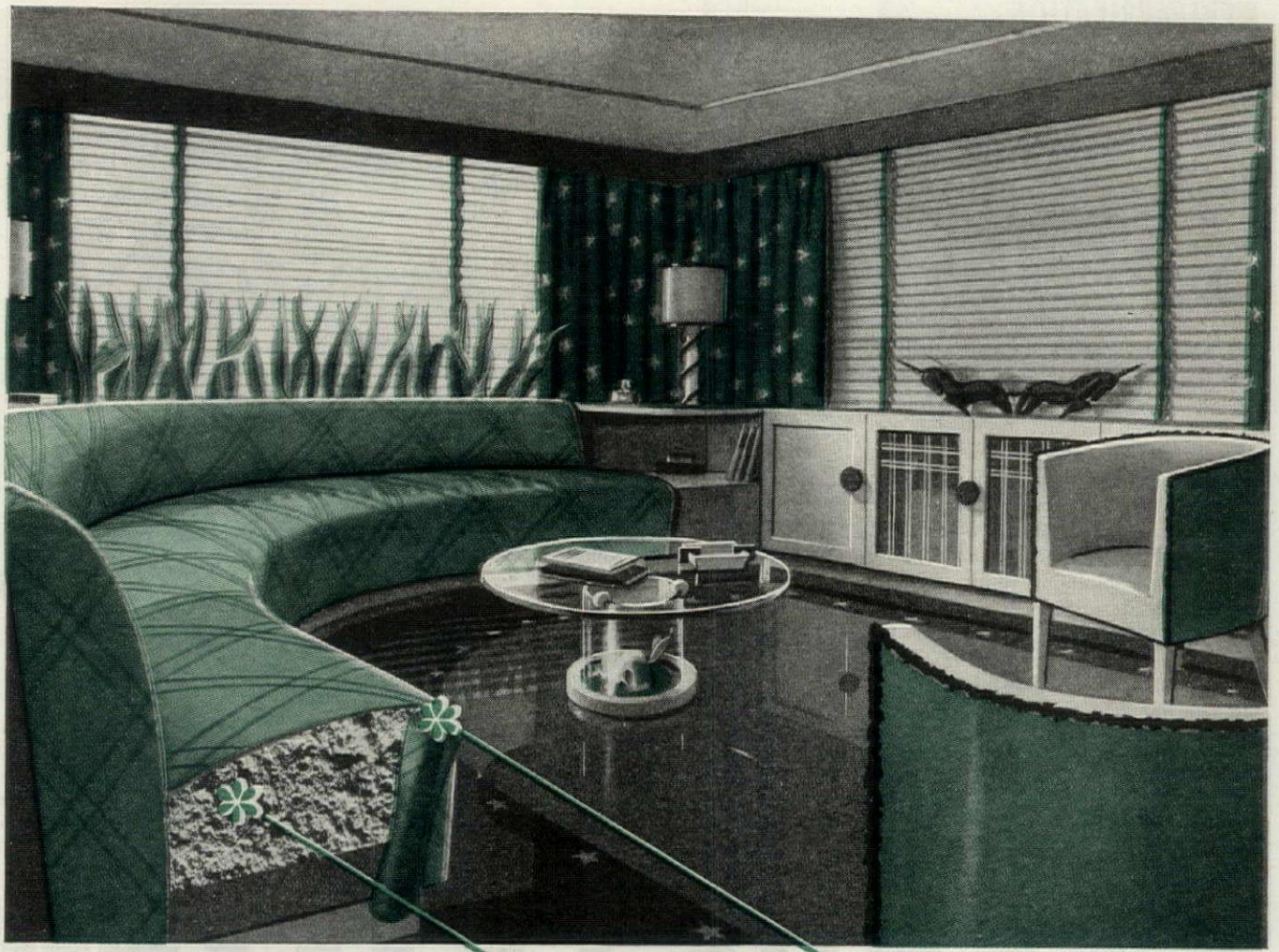
1,000-SEAT single level type. The trivial detailing merely confuses what is otherwise a straight-forward and effective plan. Internal flexibility is achieved by making a clear distinction between exterior walls and interior partitions.

If it has long been a reasonable assumption that the export of American theater design would ultimately follow the penetration of American films, it was apparently made certain by a recent announcement of Charles Skouras, president of the National Theatres Amusement Co. A new and as yet unnamed corporation has been organized, according to Mr. Skouras, for the production and merchandising of complete, prefabricated movie theaters. Aimed principally at the export market, these theaters will be available in four basic models—800, 1,000 and 1,200 seats and a 1,200-seat stadium type. They are designed for packaged shipment anywhere by boat, rail or truck. The package will include complete structure, equipment and decorative accessories: total weight for a 1,200 seat model was estimated at 350 tons.

The vulgar exteriors and trivial ornament of the models displayed at a special Hollywood "prevue" did not blind either building or theatrical interests to the essential significance of the project. The demand is potentially huge, both in this country and abroad. The company's main interest is in the rapidly expanding South American market, as well as in China and the Soviet Union where the market was estimated by Mr. Skouras as between 15,000 to 20,000 theaters each. But he pointed to an accumulated need for new theaters and replacements in the smaller communities in the U. S. as another market for his products.

The designs themselves indicated much that was progressive. The central problem of a two-year research program was the evolution of a structure equally adapted to Siberian cold or Panamanian heat. And the result is a structural system which, while meeting these requirements, literally snaps and buttons together. A complete skeleton of steel columns and trusses carries an inner and outer surface of fireproof panels. The exterior panels will be fabricated of two sheets of enamelled corrugated metal, containing three inner layers of 1½ in. asbestos or gypsum sheets. They will come in various lengths with interlocking joints for field assembly. Lobby and entrance

(Continued on page 166)



TEAM UP COMFORT AND BEAUTY THAT LAST

Cushion with FOAMEX* —Upholster in *Velon*

These amazingly practical materials by Firestone make all kinds of seating a cinch to construct, a joy to sit on, a pleasure to look at—*and virtually indestructible besides.*

Foamex floats folks to relaxation on millions of tiny air-and-latex bubbles. Each of those friendly *Foamex* air cushions is perfectly *soft,* permanently *resilient.* Each one breathes to keep the seating constantly air-cooled, air-cleaned. All are welded together into a single unit, as easy to cut to size or shape as it is easy to sit on. (And also available in many standard furniture cushion shapes, ready for covering.)

Foamex is an economical luxury because it always billows back to perfect shape. One sag-proof, lump-proof material replaces oldstyle upholstery bulk.

Velon brings more beauty into people's homes because it makes more beautiful fabrics practical. From delicate pastels to deep, glowing jewel tones—in an almost unlimited variety of new textures, weaves, patterns and styles—*Velon* resists wear.

Velon stays fresh. Its homogeneous threads can't snag or scuff, fade or become overheated. Dirt and grease can't stick to non-porous *Velon,* acids and alkalis can't stain it. One quick wipe of a cloth dampened with water or cleaning fluid instantly renews *Velon's* refreshing beauty. And *Velon* has just the right "give" for *Foamex* cushioning—yet it will never buckle, bag or grow out of shape.

Both Foamex and Velon are proved in use. Neither has yet to show a sign of wear through years of wartime abuse on railroads, bus and air lines. Now electronic processing makes *Foamex* still more durable.

Specify Foamex and Velon. This luxury seating team will be back to work for you soon—resting people in deep-cradled ease, surrounding them with ever-fresh beauty. Write Firestone, Akron, for information.

BEST TODAY—STILL BETTER TOMORROW

*TRADE MARK

LISTEN TO THE VOICE OF FIRESTONE MONDAY EVENINGS OVER NBC

Firestone

(Continued from page 164)

wall and ceiling panels will be of baked enamel iron sheets. The roof is of corrugated metal panels, insulated and covered with composition roofing. Interior auditorium walls and ceiling will consist of packaged, studio-painted canvas with an acoustical backing which will snap on over wall and roof panels. All wall and partition panels will be bolted to structural members and foundation.

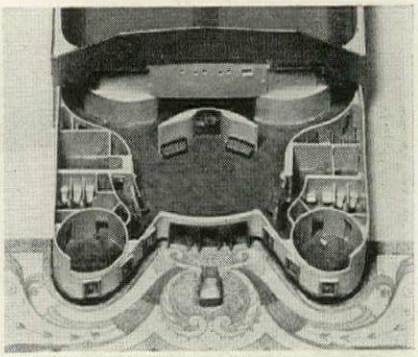
Only major item not included in the Skouras package will be the concrete floor slab and column footings: these will be poured in place. Pre-cut aisle carpets will button down on this floor. Seats will be spaced 36 in. back to back, with a minimum width of 20 in. per chair. Slots in concrete floor slab will fix the rear seat standard, while the front will be secured by a clamp. Foam rubber will replace all springs and padding in upholstery.

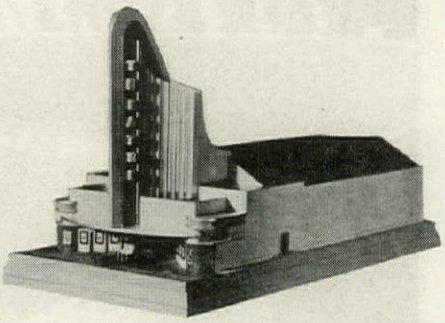
All projection and sound equipment —much of it specially designed for lightness and compactness—will be prefabricated in pre-wired units, allowing for plug-in connection immediately on delivery. Projection rooms are designed for standard projectors, sound equipment, spotlights and sound effect machine.

Heating and air-conditioning equipment will be packaged ready for installation. In the auditorium a system of air return ducts is incorporated in the metal side walls. Lighting will be recessed in plastic fixtures.

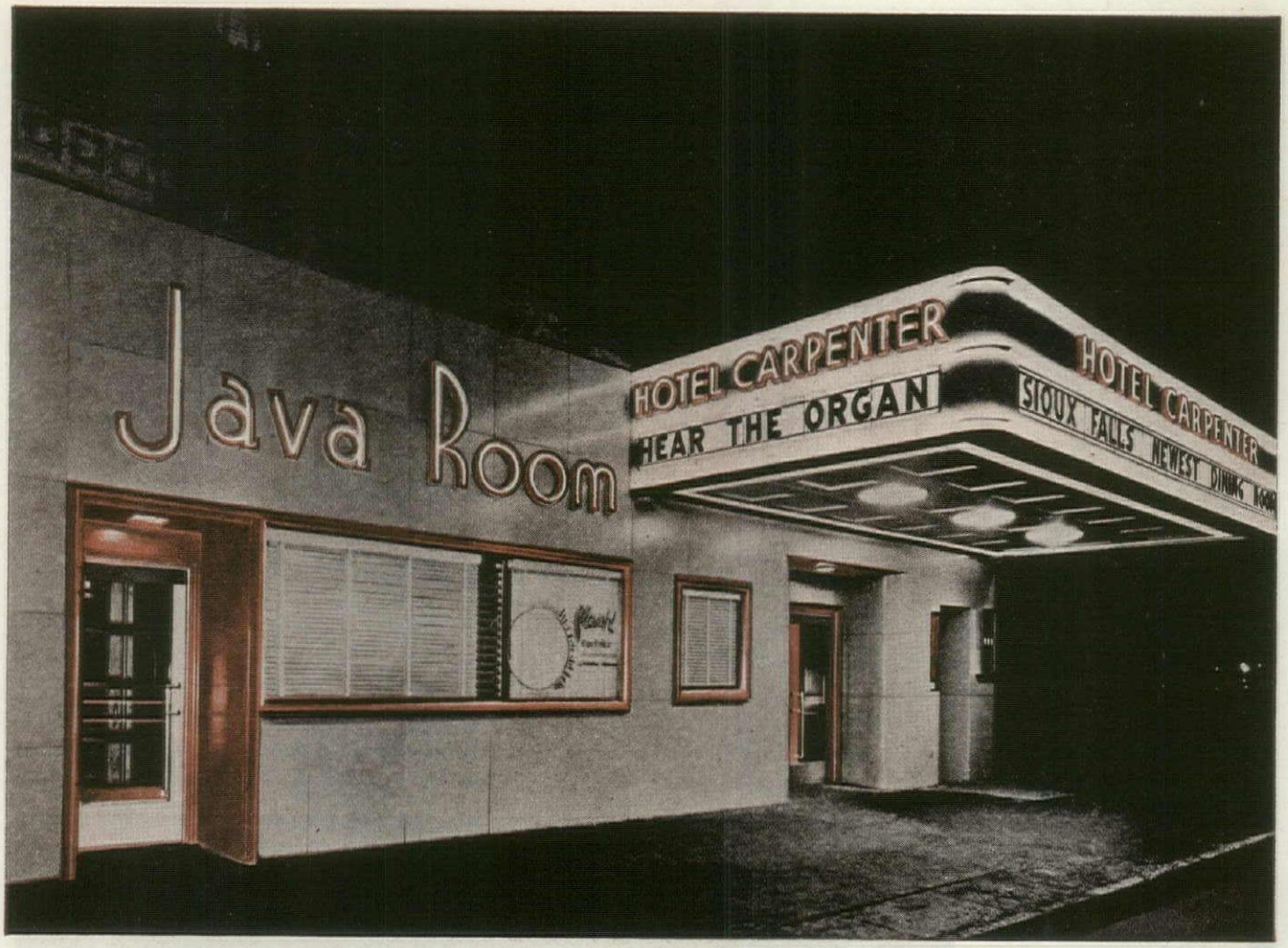
A characteristically exhuberant Hollywood touch is the sign tower on each model, complete with electric letters in any language or alphabet. It can also be used as a television receiving antennae.

Actual production of the prefab movie palace will begin when the first and experimental model moves off the belt line next month. It will be erected at North Long Beach, Calif., and is scheduled to open Thanksgiving Day. It is estimated that from 500 to 1,000 such units could be produced during the first year: "after that, manufacture can be stepped up to rival the magnitude of wartime plane production," according to Mr. Skouras. The theaters can be purchased complete with a down payment of 50 per cent. It is estimated that the cost, especially for overseas installations, would ultimately be from 40 to 60 per cent less than for equivalent units built individually.





800-SEAT type, despite its ornate sign tower and decorated pavement, is a canny, compact design. Toilets, offices and projection booth are all prefabricated, packaged units which are free of structure proper.



Redecorated entrance of restaurant front of the Hotel Carpenter, Sioux Falls, S. D. Gray and terra-cotta porcelain on ARMCO Enameling Iron provides rich, enduring beauty. The architect is Harold Spitznagel.

Color • brightness • contrast=SALES

Today's trend is toward bright, inviting storefronts that stimulate business by attracting new customers. The rich distinctive beauty of porcelain enamel on ARMCO Enameling Iron provides this powerful appeal.

The marquee and restaurant front of this hotel indicate the variety of color treatment you can specify. Porcelain enamel's complete range of colors offers you a wide choice of color schemes. And porcelain enamel *stays* attractive. Its high-glaze acid-resisting finish is easy to clean and keep clean. Even the most severe atmospheric conditions will not blemish or corrode this material, or cause it to fade. It withstands the sharpest winter cold or the most searing summer heat. The beauty of such a storefront, marquee or sign is often enhanced by architectural trim or contrasting surfaces of ARMCO Stainless Steel. Stainless and porcelain enamel are natural complements.

ARMCO Enameling Iron is the *original* base metal for porcelain enamel and today it is the most widely used. So, to make sure that your clients get lasting, satisfactory service, specify porcelain enamel fused on ARMCO Enameling Iron. See the Armco Catalog in Sweet's File. The American Rolling Mill Company, 2171 Curtis St., Middletown, Ohio. Export: The Armco International Corporation.

THE AMERICAN ROLLING MILL COMPANY

SPECIAL-PURPOSE SHEET STEELS

PORCELAIN ENAMEL ON ARMCO INGOT IRON

Prospective home owners will see the hidden value of Kimsul Insulation*

YOU render an extra professional service, reap the benefit of client recognition of quality materials, when you specify KIMSUL

The Navy's famed Quonset Huts are insulated with KIMSUL—to seal out arctic cold and tropic heat. And when you specify KIMSUL, you secure immediate recognition of a name that stands for approved quality and functional worth.

Yes, KIMSUL Insulation has "value-appeal." It pays dividends to home owners over the years and it merits your most serious consideration for many reasons:

1. KIMSUL has a "k" Factor of 0.27. It is superior in principle—the *only* many-layer insulation.
2. KIMSUL is resistant to fire, moisture, fungus and vermin. It is termite proof.
3. KIMSUL provides permanent, uniform insulation. It won't sag, shift, or settle.
4. KIMSUL will last the life of the structure in which it's installed.
5. KIMSUL is quickly and simply installed.
6. KIMSUL is low in cost—quality and performance considered.

KIMSUL is a name that's known widely and favorably to prospective home builders through extensive national advertising.

For complete technical data on KIMSUL Insulation, refer to Sweet's 1945 Catalog, or write to Kimberly-Clark Corporation, Neenah, Wisconsin.

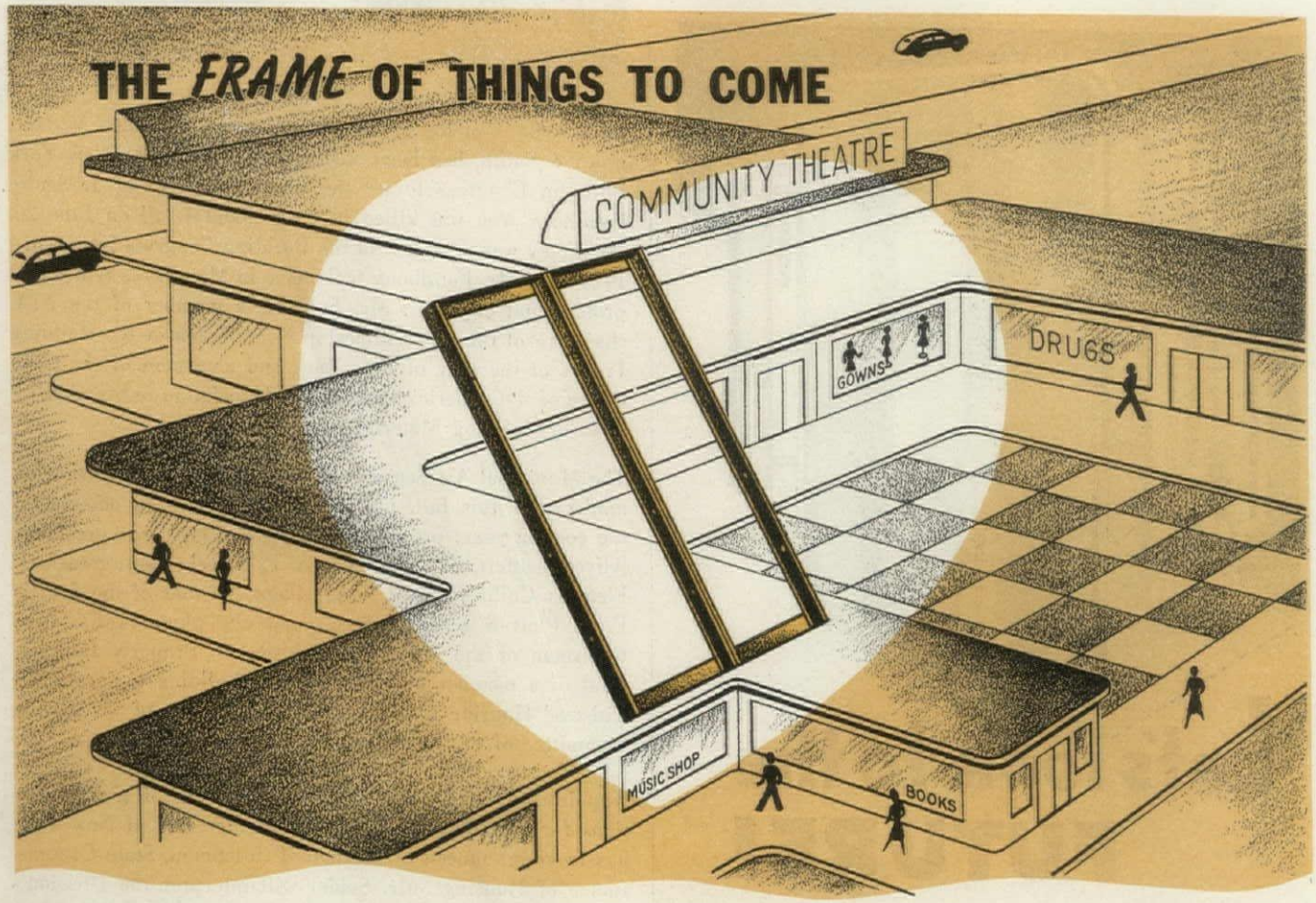
KIMSUL has proved its effectiveness through use on thousands of metal and wood buildings—serving our armed forces in arctic cold and tropic heat. Quonset huts, KIMSUL-Insulated for snugness and warmth are here illuminated by the milky-green Northern Lights.

Acme Photo

*KIMSUL (trade-mark) means Kimberly-Clark Insulation

KIMSUL
REG. U.S. & CAN. PAT. OFF.
INSULATION

A PRODUCT OF
Kimberly Clark
RESEARCH



PUT A HEART OF STEEL IN YOUR POST-WAR PLANNING

Tried and proved by the forces of war . . . in the heat and muck of the tropics . . . in the cold, frozen northlands . . . EVERWEAR Steel-Frame Construction offers to architects, builders, contractors, and building-supply dealers, the modern way to better-built buildings . . . at a substantial slashing of construction-time.

For thirty years, Southern States Iron Roofing Company—famous for its EVERWEAR "Lock-Tight" interlocking galvanized Steel Roofing, Steel Shingles, Asphalt Roofing, and Paints—has been one of the largest in the building-materials industry. Now that post-war construction has the green light, EVERWEAR Steel-Frame Construction will be made available as soon as possible by this pioneer company for inclusion in your plans . . . for longer-lasting, more economically constructed buildings.

EVERWEAR Steel-Frame Construction permits the speedy erection of homes, barns, industrial plants, or additions thereto as needed, even though Steel Frames were not originally used. It supplies termite-proof foundations and framing, an important consideration in Southern home- and industrial-construction. Steel Frames permit better insulation of your building . . . and any conventional building-material can be used over the frames.

The secret of this simplified method of building-construction lies in the patented, welded-steel channels in the form of quickly erected panel-frames in standard arrangements. Flexibility of design is obtained because Steel Frames are not limited to standard lumber-lengths. Anyone handy with hammer, wrench, and screwdriver can assemble them quickly, easily.

EVERWEAR Steel-Frame Construction will give your buildings a heart of steel . . . made to last throughout the years. Although we will not be able to deliver EVERWEAR Steel-Frame Construction for at least 6 months, we invite your inquiries *NOW*. Write today for our new booklet:

"PREFABRICATED STEEL BUILDINGS"

General Offices: Savannah, Ga.
Factory-Warehouses in Principal Southern Cities

Southern States
IRON ROOFING COMPANY

ANNOUNCEMENTS

M. H. FOLEY of the architectural firm of Voorhees, Walker, Foley & Smith, has been elected President of the New York Building Congress to fill the unexpired term of J. Andre Fouilhoux who was killed in an accidental fall on June 20. Mr. Foley was president of the Building Congress from April 1940 until Mr. Fouilhoux took office in May 1942. A licensed professional engineer, Mr. Foley is a member of the AIA, chairman of the Apprenticeship Commission of the Building Trades of the City of New York and chairman of the Committee of the American Standards Association to Standardize Sizes of Building Material.

The Municipal Art Society, which is celebrating its fifty-third anniversary this fall, has elected the following officers for the coming year: president, Charles C. Platt; vice-president, Alfred Geiffert, Jr.; secretary, A. F. Brinckerhoff; treasurer, Fletcher Collins. The new president, partner of the firm of F. P. Platt & Bro., architects and city planners, has been Chairman of the Mayor's Committee on Property Improvement, is a member of the New York Building Congress, the Citizens' Housing Council, and Co-Chairman of the Zoning Committee of the New York Real Estate Board.

Appointment of Jacob C. Seidel as director of public relations for the Division of Housing of the State of New York has been announced by Herman T. Stichman, State Commissioner of Housing. Mr. Seidel will interpret the Division's policies to the public and help publicize its activities. One of the Division's responsibilities is the operation of Governor Thomas E. Dewey's program of State-aided housing for low income families. Seventeen such projects are under contract for postwar construction and others are pending. The Division has recently inaugurated a community development program by which municipalities may avail themselves of the Division's facilities, its experts and its panel of community consultants for planned urban area rehabilitation. Commissioner Stichman has emphasized that private initiative must be relied upon to supply the greatest part of the housing needs of the people of the State.

MAXON ASSOCIATES, architects and industrial designers, announce that Maurice D. Sornik, expert in theater construction, has been retained as chief consultant and designer for the company's projects in the amusement field. He will operate from the offices of the Maxon Associates in the Empire State Building. Mr. Sornik cooperated in designing such buildings as Madison Square Garden and the Ziegfeld Theater. Until recently he was in partnership with Ben Schlanger.

A course in Real Estate Management offered by the New York Business Institute, a division of the New York YMCA Schools, 7 W. 63rd Street, began Monday, September 24th. The course, of sixteen weeks duration, includes in its scope the most efficient use of building sites, analysis of neighborhoods and real property, general maintenance and repair of property, property insurance, real estate finance, budgets and other managerial responsibilities. This course is available to those veterans who qualify under the G.I. Bill of Rights.

An expansion move in the educational training program of the Army Service Forces Convalescent Hospital of the Second Service Command at Camp Upton, *(Continued on page 176)*

How to measure the heating values you specify...

...it's not size that counts!

YOU can't measure a winter air conditioner's performance by the number of cubic feet it occupies. Research and engineering here at Surface Combustion have shown that the elimination of bulky combustion chambers and oversized burners results in quicker, more plentiful heat from *smaller* units than is possible with many *conventionally designed larger models.*

No, it isn't *size* that matters in measuring the values of a piece of heating equipment. It's the *inside* of a furnace—the design and construction that really count. Compact Janitrol Winter Air Conditioners enable the builder to place units in utility rooms . . . in the corner of a basement . . . even in a wall section of a living room . . . to make more space for living or other household services.

That's why, to make the best use of clean, comfortable gas heat, so many home builders and designers have specified Janitrol.

For no other gas-fired heating equipment provides the *combination* of advantages that Surface Combustion has engineered.

Check the Janitrol features listed at the left. They are the values that measure the warm comfort and long-time high performance you'll want to specify. Surface Combustion Corporation, Toledo 1, Ohio.

COMPLETE FACTORY ASSEMBLED. Uncrate it, set it up, and it's ready for connecting.

AMPLIFIRE BURNER. Concentrates flame into smaller, hotter space. Quiet in operation.

MULTI-THERMEX TUBES. Transfer heat quicker. Never become overheated. Assure long life.

DEPENDABLE AUTOMATIC CONTROLS. Positive, easily adjusted. Constant temperature is assured.

LARGE CAPACITY BLOWER and FILTER. Large volumes of clean filtered air are moved quietly and effortlessly.

LONG-LIFE CONSTRUCTION. Provided by rugged welding throughout . . . careful factory assembly.

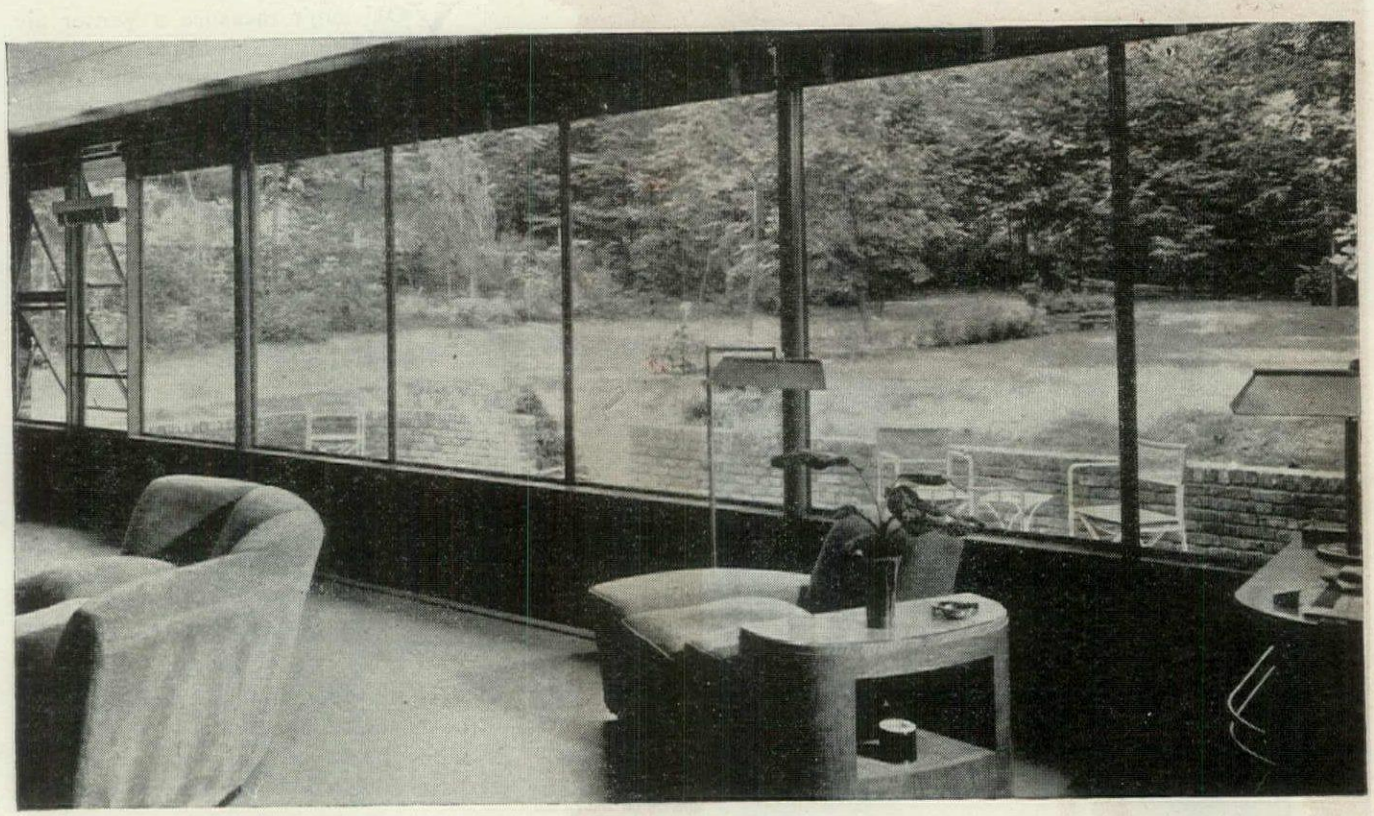
THERMO-DRIP HUMIDIFIER. Provides moisture in just the right amount for comfort and health.

Janitrol

GAS-FIRED HEATING EQUIPMENT

Winter Air Conditioner | Gravity Furnace | Conversion Burner | Unit Heater | Boiler | Floor Type Blower Unit

Distinctive Beauty TRANSPARENT WALLS insulated with *Thermopane*



Architect: H. W. Johanson, Roslyn, Long Island, N. Y.

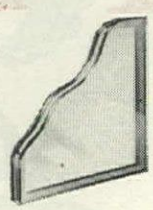
Walls of glass can bring into your houses the glamor of outdoor beauty, plus distinctively modern appeal—a feature that will be appreciated by your clients. When glazed with Thermopane, window walls have transparent insulation—permitting practical application of Daylight Engineering in any climate.

In Thermopane, a layer of dehydrated air is hermetically sealed between two panes of glass. This insulating layer of air acts to keep *in* heat in winter... to keep *out* heat in summer. Thus, you include year-'round comfort and marked winter heat savings in your houses when you specify Thermopane.

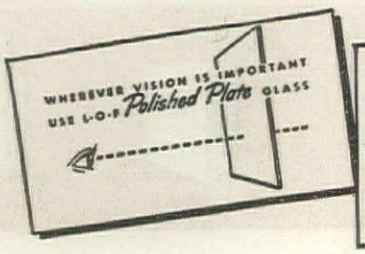
For full information, consult your nearest L·O·F distributor, or write for a free copy of our Thermopane booklet and data sheets by Don Graf. Libbey·Owens·Ford Glass Company, 16105 Nicholas Building, Toledo 3, Ohio.

The *Thermopane* Unit...

two or more panes of glass with dehydrated air hermetically sealed between them. Only two surfaces need to be cleaned. Thermopane stays in all year.

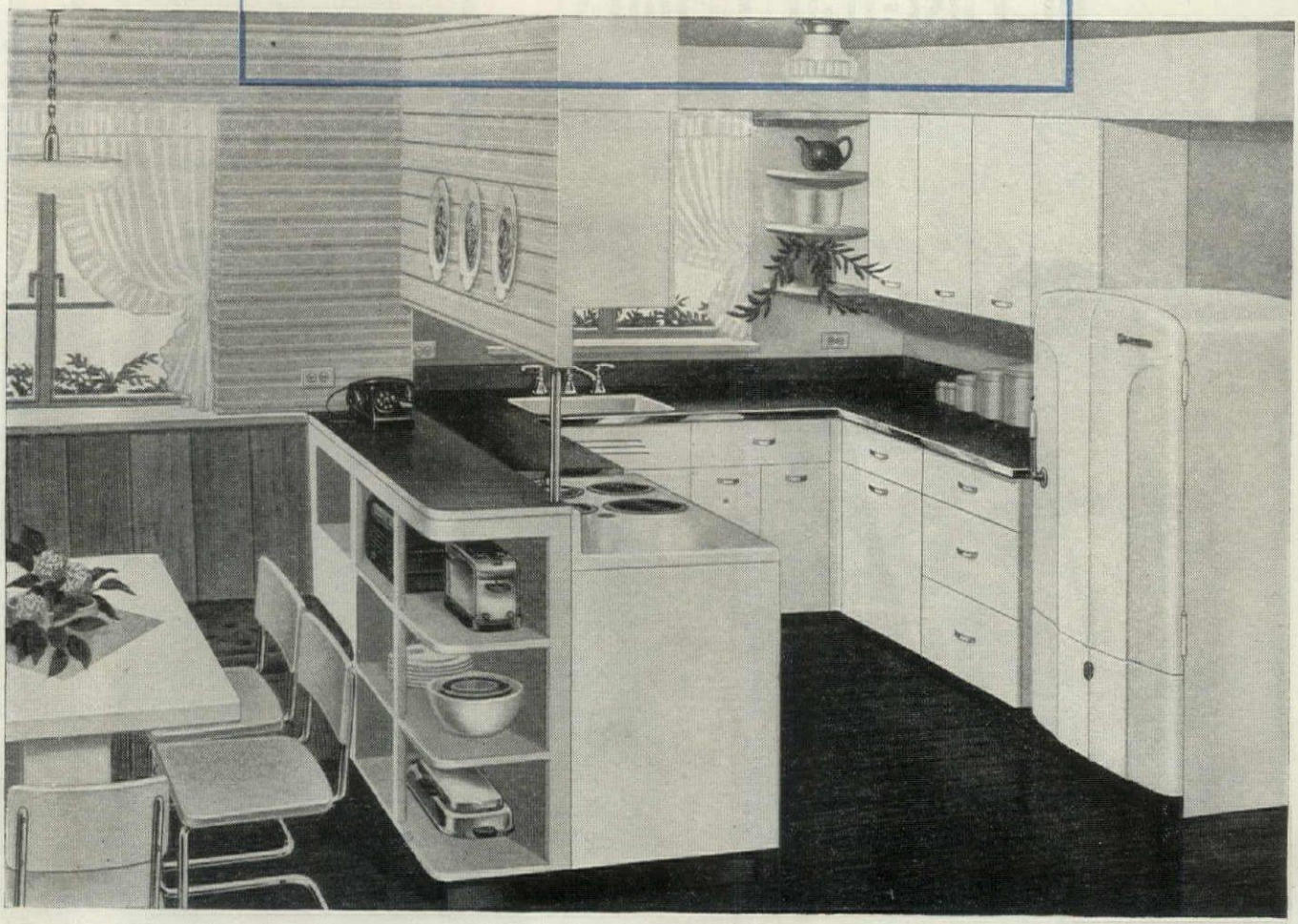


Thermopane is also available in Canada.



L O F **LIBBEY·OWENS·FORD**
a Great Name in **GLASS**

WHAT PEOPLE REALLY WANT IS *Electrical Living*



THIS KITCHEN FOR THRIFTY FAMILIES WILL WIN NEW BUSINESS

You can include the appeal of all-electric kitchens in low-cost homes, too. Not as much electrical equipment, of course, as in higher priced homes. But enough meet the minimum requirements for standards of Electrical Wiring. The kitchen shown has been carefully planned to include the correct equipment for thrifty families. All houses you design and build can be planned to capitalize on the strong appeal of Electrical Living.

USE THIS BOOK TO HELP WIN APPROVAL OF EVERY ROOM

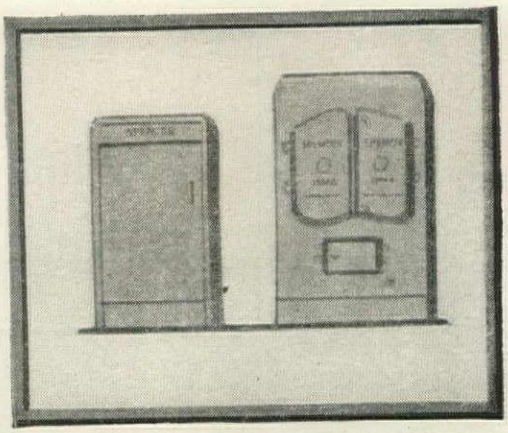
This handbook clearly presents wiring information required to analyze electrical needs, and to design and specify for them correctly. It contains everything you need to know about electric wiring for modern Electrical Living. Prepared to help architects, builders, contractors, designers and prefabricators. Costs one dollar. Send your dollar to Westinghouse Electric Corp., Industrial Relations Department, 306 Fourth Ave., Pittsburgh 30, Pa. J-91533

Westinghouse

Better Homes Department

as a part of its consulting service, offers you the following FREE books: Electrical Living in 194X—Professional Edition; Manual of Better Home Wiring; and Better Living Means Electrical Living.

"They'll be best sellers in Post-war Cellars!"



"It's just sound professional practice to get acquainted with Spencer Heaters—*now*.

"Because Spencer Heaters will make a hit with your post-war clients. Efficient, economical, advanced in design, they've got everything it takes to make a heater a hot number.

"Post-war Spencer Heaters will be products of the combined engineering skill of The Aviation Corporation, with its vast wartime research facilities, and Spencer, with its half a century of heating experience and leadership.

"You're bound to get a great product from an all-star team like that.

"Want proof? Drop us a line. We've got a mighty exciting story to tell you."

SPENCER HEATER

Division—The Aviation Corporation
Williamsport, Pa.

A few Spencer Heaters are now available on priorities. Ask us about them.

REPUBLIC-the Preferred Pipe for

The superior bending qualities of Republic Pipe make a big difference in jobs like this where 207 bends are required in installing 2500 feet of ¾" pipe for radiant heating.

Here's just the pipe for radiant heating jobs—and there are several good reasons why:

1. **MEETS EVERY REQUIREMENT**—for many years, steel pipe has been the standard pipe used in closed system heating lines. Thus, Republic Steel Pipe meets all requirements for radiant heating, which is a closed system, too.
2. **SUPERIOR BENDING QUALITIES**—high in ductility and free from hard spots in the metal.
3. **SOUNDLY WELDED**—made by Republic's *improved* continuous weld process, this pipe is so tightly welded that it will not open even under severe bending strain.
4. **WELDS READILY**—makes sound joints by all modern methods.
5. **LONG LENGTHS**—reduce number of joints.
6. **NO SCALE**—inside or outside.

For further information on sizes available and present delivery schedules, see your Republic Pipe Jobber.

REPUBLIC STEEL CORPORATION
GENERAL OFFICES • CLEVELAND 1, OHIO
Export Department: Chrysler Building, New York 17, New York

SEE SWEET'S FILE
or write us for detailed information on these Republic Building Products
Pipe—Sheets—Roofing
Enduro Stainless Steel
Toncan Enameling Iron
Electrunite E.M.T.
Fretz-Moon Rigid Steel Conduit
Taylor Roofing Ternes
Berger Lockers, Bins, Shelving, Kitchen Cabinets
Truscon Steel Windows, Doors, Joists
and other building products

Republic STEEL PIPE

ANNOUNCEMENTS

(Continued from page 170)

Long Island, has been announced by Ralph Walker, Walter H. Kilham, Jr. and Cameron Clark, chairman and co-chairman of the Committee on Education of the New York Chapter, AIA. In cooperation with the Educational Division of the camp, the New York Chapter inaugurated on September 5 a series of classes designed to interest returning soldiers in the possibilities of the building industry as a field of postwar employment, to assist them in the planning of their own homes and to encourage their intelligent participation in the postwar public works development of their local community. The courses offer practical instruction in drawing, planning, model making and decorating.

LORIMER RICH, architect, announces that Lt. Col. Robbins L. Conn, late of the Army of the United States, is now associated with his office.

WELLS BOSWORTH, architect, has recently been elected Associate Member of the Institut de France of which he has been corresponding member for many years. Arthur Brown, Jr., architect of San Francisco, is the other full associate member.

PAUL W. JONES, AIA, formerly a practising architect in Minnesota and North Dakota, has formed a partnership with Arquitecto Ramon Corona, with offices at Monte Libano #670, Lomas de Chapultepec, Mexico City.

ROBERT HELLER, President of Robert Heller Associates, Inc., industrial designers, located at 2 W. 46th Street, New York, N. Y., announces that Dorothy Baynard Davis has been named executive vice-president of the organization, and will be in charge of management and business administration.

GANNETT FLEMING CORDDRY AND CARPENTER, INC., engineers of Harrisburg, Pa. and New York, N. Y. announce that Mr. George F. Axt has become associated with their company and is in charge of their New York office at 50 Broad Street.

CHANGE OF ADDRESS

HENRY F. LUDORF, AIA, architect, to 100 Pearl St., Hartford 3, Conn.

FRANCIS JOSEPH MCCARTHY, AIA, architect, to 693 Mission St., San Francisco 5, Calif.

AARON COLISH, architect, to 1717 Sansom St., Philadelphia 3, Penn.

WEILER AND STRANG (successors to Beatty and Strang), architects, to 114 North Carroll St., Madison 3, Wis.

TINSLEY, HIGGINS AND LIGHTER, architects (formerly Tinsley, McBroom and Higgins, architects), to the Liberty Building, Des Moines, Iowa.

JAMES F. EPPENSTEIN, on November 1, to 646 North Michigan Ave., Chicago 11, Ill.

MASSENA & DUPONT, architects, to 704 Delaware Ave., Wilmington, Del.

(Continued on page 182)

Prepare TODAY to keep tenants TOMORROW

Few office or loft buildings have vacancy problems today. But farsighted owners, especially of older buildings, are now preparing for tomorrow's competition by modernizing interiors with Snead Mobilwalls.

Snead Mobilwalls combine the privacy, permanent appearance, and soundproofness of masonry walls, with instant mobility, flexibility, low upkeep, and complete reusability of parts. Modernization with Snead Mobilwalls may be accomplished gradually, one or more floors at a time, and future additions made as conditions warrant or the budget permits. Installation or rearrangement involves minimum interruption, dirt or muss. Your present tenants will appreciate a progressive management's voluntary effort to provide better, more modern surroundings, and their continued tenancy will be more strongly assured.

Snead engineers will be glad to prepare now a program of modernization to assure continued profits for you tomorrow. Write or phone for catalog and photographs.

Since 1849, the Snead symbol of lasting beauty, quality and progress in metal construction

PORT OF NEW YORK AUTHORITY BUILDING
AYMAR EMBURY, 2nd, *Architect*

Equipped throughout with thousands of feet of Type M Snead Mobilwalls. This modern office and loft building is occupied by small and large manufacturing and merchandising concerns and the Port of New York Authority.

Snead MOBILWALLS

SNEAD & Company . . . . . FOUNDED 1849

Designers, manufacturers and erectors of library bookstacks and steel partitions

Sales Office: 94 Pine Street, JERSEY CITY 4, N. J.

Main Office and Plant: ORANGE, VA.

...Skylights

OF ALCOA ALUMINUM ARE GOOD

He says, "From 1926 to 1941, we used approximately ¾-million pounds of aluminum in connection with our skylights . . . In every case where we recommended the use of aluminum, our customers have been highly pleased".

Here's real evidence of durability. Their aluminum skylights have been subjected to every type of exposure—extremes of weather outdoors, dampness and, often, fumes indoors. Yet not a single case of failure has ever been reported to them.

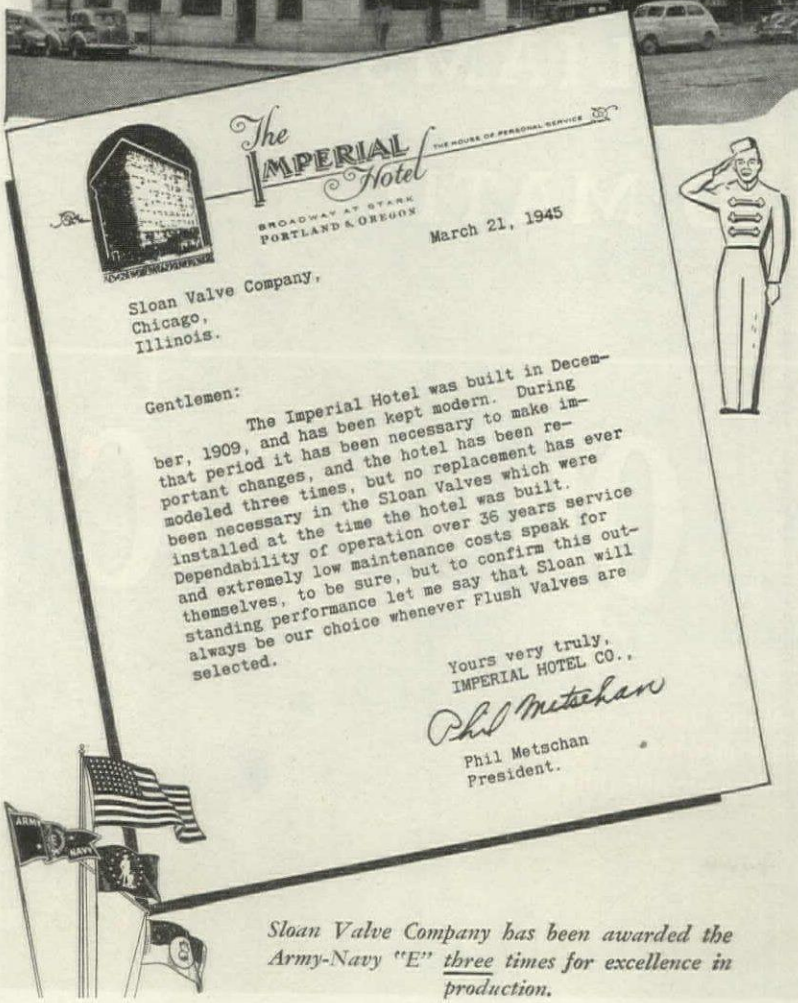
With such long life, you are spared much of the inconvenience and high cost of maintenance. Ask your supplier about skylights of Alcoa Aluminum. ALUMINUM COMPANY OF AMERICA, 2166 Gulf Bldg., Pittsburgh 19, Pa.

ALCOA FIRST IN ALUMINUM

ALCOA ALUMINUM

A PERFECT 36 YEAR RECORD

FOR SLOAN FLUSH VALVE



The IMPERIAL Hotel
THE HOUSE OF PERSONAL SERVICE
BROADWAY AT STARK
PORTLAND 5, OREGON

March 21, 1945

Sloan Valve Company,
Chicago,
Illinois.

Gentlemen:

The Imperial Hotel was built in December, 1909, and has been kept modern. During that period it has been necessary to make important changes, and the hotel has been remodeled three times, but no replacement has ever been necessary in the Sloan Valves which were installed at the time the hotel was built. Dependability of operation over 36 years service and extremely low maintenance costs speak for themselves, to be sure, but to confirm this outstanding performance let me say that Sloan will always be our choice whenever Flush Valves are selected.

Yours very truly,
IMPERIAL HOTEL CO.,
Phil Metschan
Phil Metschan
President.

Sloan Valve Company has been awarded the Army-Navy "E" three times for excellence in production.

"The house of personal service"

The Imperial Hotel, Portland, Oregon, has been remodeled three times since its construction in 1909. This was done in the interest of maintaining the high standards set by its slogan: "The House of Personal Service." Yet—the Sloan Flush Valves which were a part of the original equipment have never been replaced. They are still in perfect operating condition after 36 years of continuous service.

Added to this splendid record of performance is Mr. Metschan's testimony of complete satisfaction. He adds that "Sloan will always be his choice in Flush Valves."

We urge *you* to make inquiry of performance records—water saving records—and maintenance cost records. You will find Sloan Flush Valves *unequalled* on all counts—three of the many reasons why Sloan is the world's most popular Flush Valve.

Yes—there are millions more Sloan Flush Valves in service than all other makes combined.

SLOAN VALVE COMPANY
4300 WEST LAKE STREET, CHICAGO 24, ILLINOIS

makes tough piping jobs easy!

Architects . . . designers . . . contractors . . . builders, searching for a corrosion-resistant, vibration-proof method of joining copper or brass pipe in cramped quarters or where space-saving is important, will find the answer in Silbraz* joints – made with Flaggseal Fittings.

Flaggseal Fittings are not connected by threading. They can be installed exactly where needed. No space is required for wrench tightening, or for lining up pipe and fitting. No crossed threading is possible . . . and the pipe surface remains unmarred by the use of the pipe wrench.

What's the secret? The answer is simple! A silver alloy is incorporated in each bore of the fitting. This alloy, when heated with the oxyacetylene torch becomes free flowing at 1300°F. and penetrates the lap area between the pipe and fitting, making a joint that is leakproof and permanent – a joint that will withstand severest vibration and have bursting pressures greater than those of standard weight copper or brass pipe.

Flaggseal Fittings are particularly suited to hot and cold water circulating systems, boiler feed lines, steam return lines, condensate lines, low and high pressure air piping systems, and many other applications in hospitals, schools, apartments, commercial, public and industrial buildings, as well as numerous marine installations. For full details, write: Stanley G. Flagg & Company, Inc., 1421 Chestnut St., Philadelphia 2, Pa.

*Patented—Reg. U. S. Pat. Off.

FF

FLAGG FITTINGS

SINCE 1854

MALLEABLE IRON FITTINGS • CAST IRON SCREWED FITTINGS • DRAINAGE FITTINGS
FLANGE UNIONS • FLANGES • GROUND JOINT UNIONS • RED BRONZE FITTINGS
FLAGGSEAL BRONZE FITTINGS • SPECIALTIES AND CASTINGS

ANNOUNCEMENTS

(Continued from page 176)

CLARK R. ACKLEY, architect, to 1811 East Michigan Ave., Lansing 12, Mich.

HARRY E. GRAHAM, consulting structural and civil engineer, to 822 Medical Professional Building, Corpus Christi, Tex.

PRITCHARD, WOOD & PARTNERS, LTD., to 3-7 Southampton St., Strand, London, W.C.2.

RETAIL PROPERTIES, INC., to 1613 Williamson Building, Cleveland 14, Ohio.

NEW OFFICES

LOUIS LIEBERMAN, architect, has reopened his office at 44 Court Street, Brooklyn 2, N. Y.

HERBERT R. SIMONDS and COLONEL GEORGE S. BRADY have formed SIMONDS AND BRADY, consulting engineers, with offices at 551 5th Ave., New York, N. Y.

MORGAN STEDMAN, architect, announces the opening of an office at 180 University Ave., Palo Alto, Calif.

NORMAN B. KUHN and C. EDGAR NEWCOMER, architects, have opened an office at 508 3rd Ave., Pittsburgh, Penn.

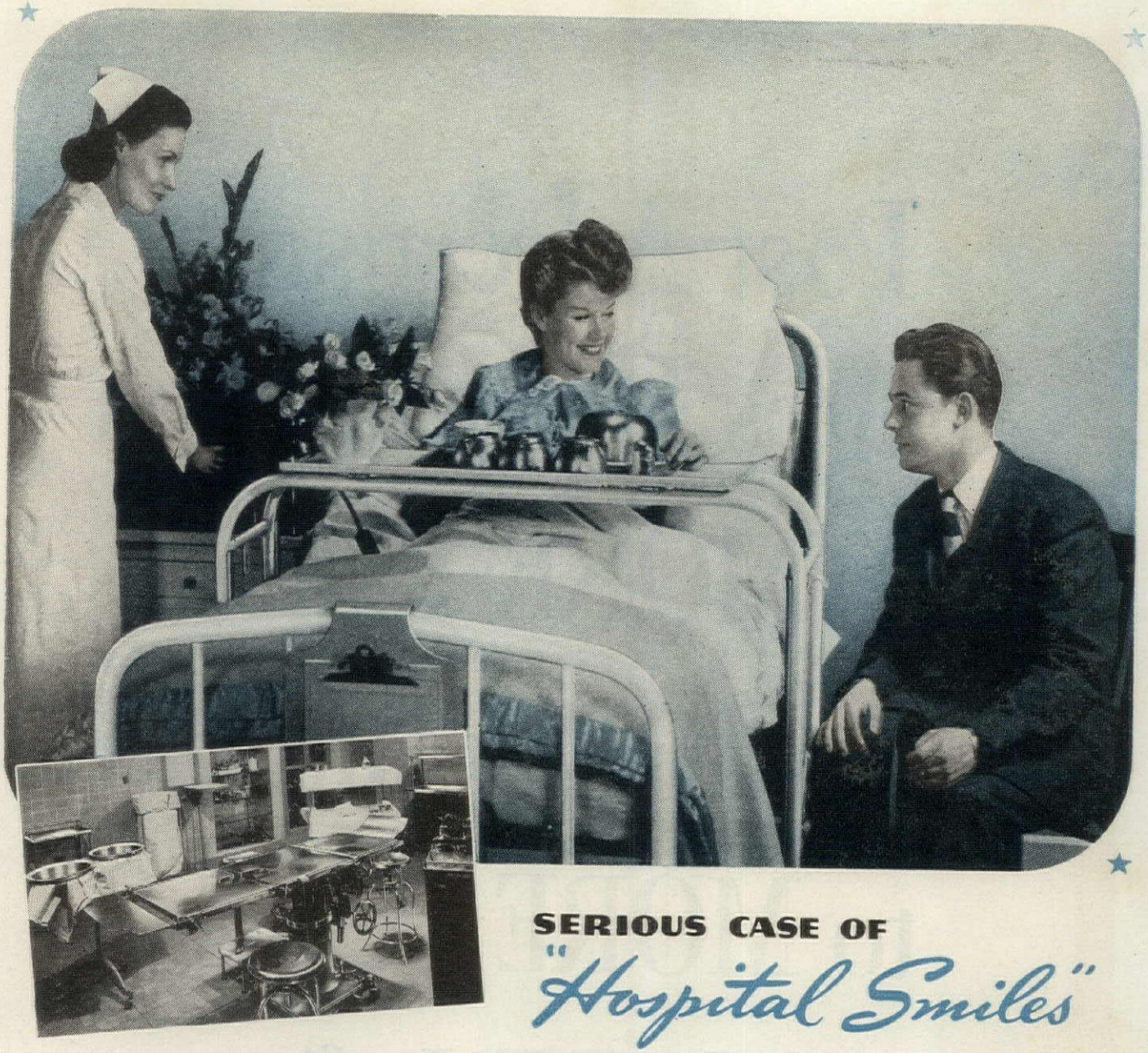
COMPETITION

Sylvania Electric Products, Inc. has announced the second of its annual fixture design contests for anyone connected with the lighting division of a public utility. Twenty-two cash awards, totalling $2,000 and ranging from $500 to $50, will be made. Designs should be suitable for general lighting in ceiling-mounted position in department store main floors. Details and rules can be obtained from Sylvania at Salem, Mass. Entry blanks postmarked not later than midnight, September 30, will make qualified contestants eligible for awards for designs submitted on or before December 31, 1945. Judges will be Eugene Burke, industrial designer, of Burke and Kober, Los Angeles; R. J. Chapin, superintendent of construction and maintenance, Marshall Field and Co., Chicago; Lurelle Guild, industrial designer, New York City, and E. M. Strong, professor of Electrical Engineering, Cornell University.

DIED

LOUIS KAHN, president of the Albert Kahn Associated Architects and Engineers, Inc., on September 1, in Franklin Village, Mich., at the age of 60. He had been with the Kahn firm since 1909 and before being elected president after his brother Albert's death in January 1943, he was secretary-treasurer and executive head of the Kahn corporation. The Wright Aeronautical plants, Ford Bomber plant, Glenn L. Martin plants are but a few of the great war plants which this organization has built during the war period. Mr. Kahn was a registered architect, a member of the AIA and the Detroit Engineering Society.

J. P. MCINERNEY, construction engineer who supervised the construction of the Empire State Building and all the buildings at the New York World's *(Continued on page 188)*



SERIOUS CASE OF "Hospital Smiles"

THEY "took her to the hospital" —folks used to say it with dread and foreboding. Not any more. The modern hospital, shining with stainless steel literally everywhere you look, is a friendly place where genuine miracles of surgery and healing are worked—a place no longer to be feared.

Allegheny Metal has contributed much to the great progress of medical science in the past generation. Stainless steel is the ideal hospital metal—bright, strong, easy to form and weld, easy to clean—providing the peak of longevity, asepsis and corrosion resistance, and the least maintenance and depreciation.

Allegheny Metal brings you these qualities with the highly dependable uniformity that is the mark of the pioneer. Where can we help you to use this time-tested stainless steel in improving your future products or services?

Allegheny Ludlum Steel Corporation
Brackenridge, Pa.

MERITS OF ALLEGHENY METAL

- ★Lustrous, handsome, sanitary, strong.
- ★Easy to form, weld, machine.
- ★Unaffected by any food or fruit acids, and most chemicals.
- ★No staining, no tarnishing, no off-tastes.
- ★Easy to clean, lowest maintenance and depreciation costs.

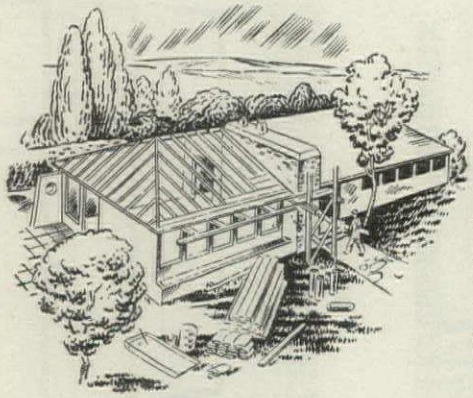
W&D...9965

ALLEGHENY METAL

The Time-Tested Stainless Steel

ALSO HANDLED AND STOCKED BY ALL JOSEPH T. RYERSON & SON, INC. WAREHOUSES

Post Advertising Pages Have Spoken for MORE Years, with MORE Authority, to MORE People with MORE Influence, than those of Any Other Magazine



AS they have for so many years, millions will now look first on the advertising pages of The Saturday Evening Post for the new advancements in home building and remodeling.

Post readers are your best customers, with living standards and incomes high above the national average. They have the money to buy the things they want. Year after year, in every community, in every neighborhood, in every income group—Post readers are the first to buy the new and better things. They set the pace in their communities, creating and influencing the demand that establishes brand preference.

That is why successful builders and building supply retailers from coast to coast find that it pays to recommend products that are featured in the Post.

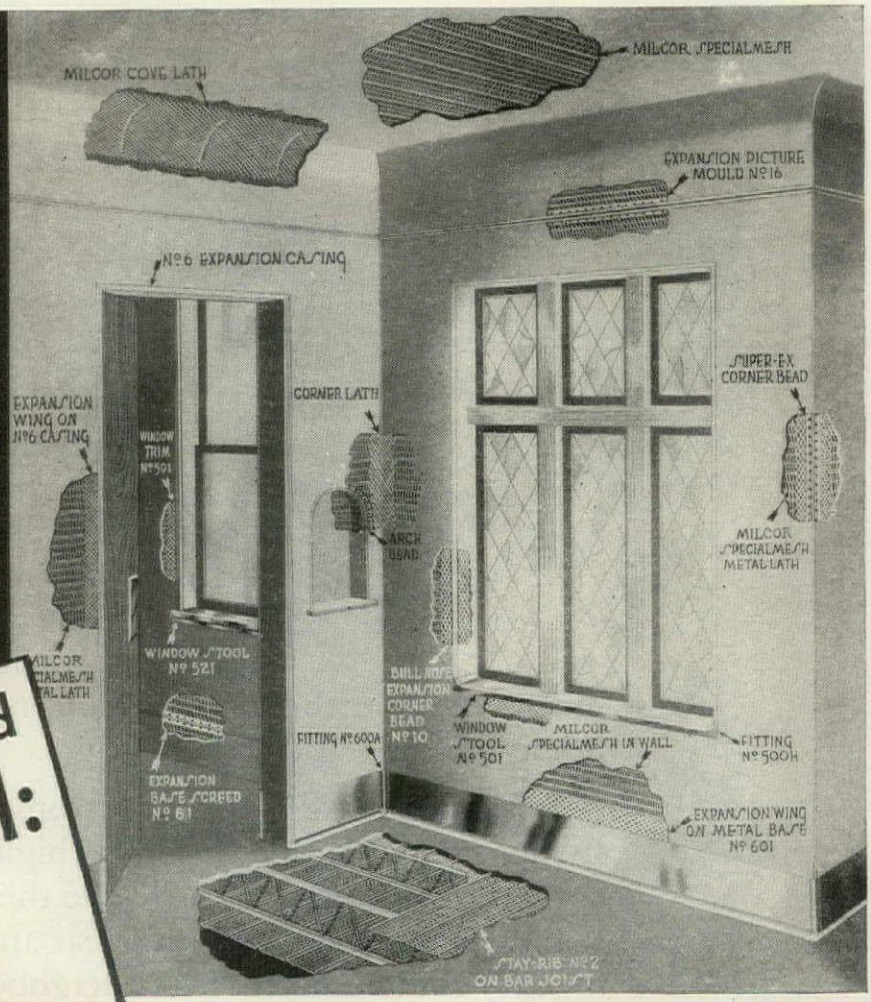
THE SATURDAY EVENING
POST

Survey after survey proves that people pay more attention to advertising in The Saturday Evening Post than in any other magazine.

Some units of the **MILCOR** System of Fireproof Construction:

Milcor Specialmesh Metal Lath

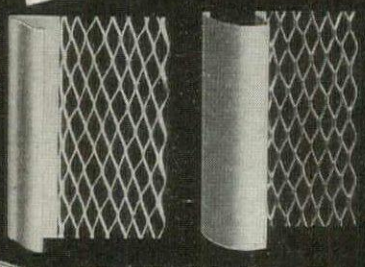
Milcor Stay-Rib Metal Lath



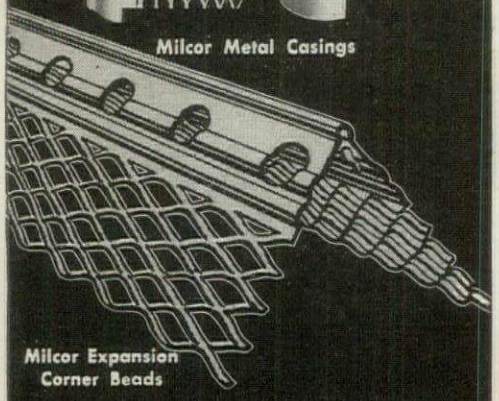
The demonstrated merits of steel:

- strength
- permanence
- fire resistance

assure creditable results



Milcor Metal Casings



Milcor Expansion Corner Beads

Refer to the Milcor Manual in Sweet's for detailed description of the Milcor line.

. . . where your postwar plans utilize the MILCOR System* of Fireproof Construction

*Milcor here uses the word "system" in its true sense — not to signify a limited, inflexible set-up applicable only under certain conditions, but to represent so wide a range of metal lath, corner beads, metal trim, casings, window stools, steel studs, etc., that a co-ordinated metal backbone can be designed to suit many conditions of fireproof construction — all with Milcor products engineered to work together.

• • •

WITH the war dramatically demonstarting the stamina of steel, your clients appreciate more than ever before these advantages of steel-reinforced plaster construction, using Milcor Steel Building Products:

Fire-safety — guarding both lives and property. Space economy. Sound retarding properties. Sanitation for health. Crack and impact resistance — assuring permanent beauty of plaster walls and ceilings.

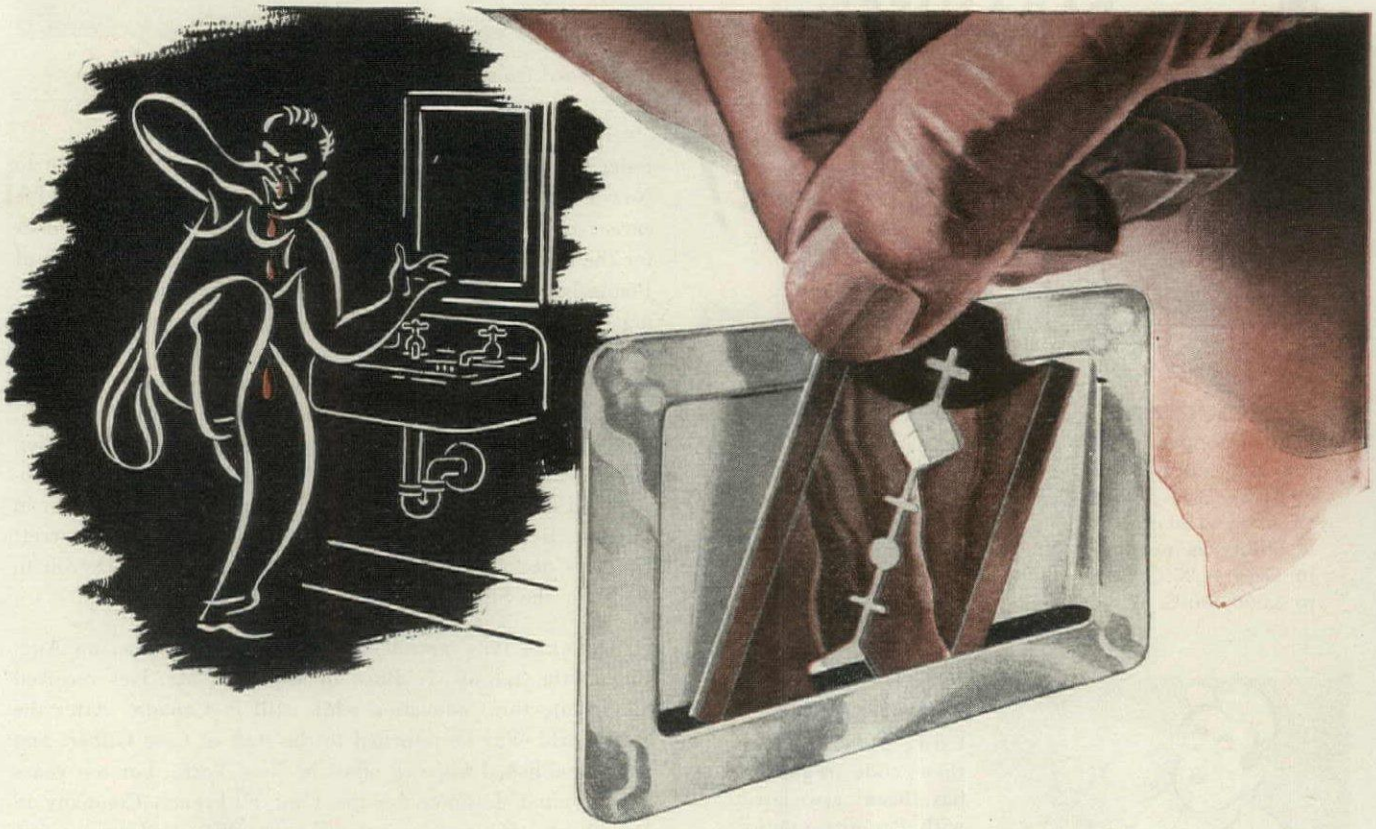
Milcor will have available again, soon, a complete line of uniform, related products that permit you freedom in expressing your conceptions, and, at the same time, result in the finest fireproof construction.

On all postwar remodeling and new erection, specify units of the Milcor *System* of Fireproof Construction. Consult the Milcor Manual in Sweet's, for planning help.

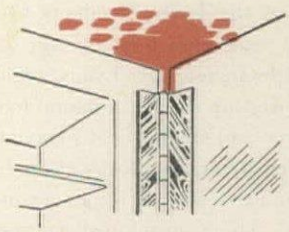
MILCOR STEEL COMPANY
MILWAUKEE 4, WISCONSIN
Baltimore 24, Maryland • Chicago 9, Illinois • Kansas City 8, Missouri • Los Angeles 44, California • Rochester 9, New York

. . . equipped to provide additional service through THE J.M.&L.A. OSBORN CO. CLEVELAND 14, OHIO
DETROIT 2 • BUFFALO 11 • CINCINNATI 25
. . . a Division of Milcor Steel Company.

F-261A



What bathroom cabinet was first with this *safety "first"?*



NO SAG—NO WARP—NO STICK. Miami-Carey was *first* with piano-type hinges. and one piece mirror frames.

ROSETTES "WENT OUT" when Miami-Carey introduced the mirror-clip—now standard in the industry.

MIAMI-CAREY was *first* . . . with a razor blade drop tucked safely inside the *bathroom cabinet*. Carelessly discarded blades no longer lay around to slice unwary fingers . . . get into the laundry chute or plumbing. A major bathroom hazard was ended.

Such common-sense "firsts" in design plus outstanding quality-features have made Miami-Carey Bathroom Cabinets the best buy for over two decades. For example: non-rusting steel construction . . . 5-year guaranteed copper-backed mirrors... high quality finishes . . . solid brass hinges and mirror frames.

Watch for news soon on postwar Miami-Carey Bathroom Cabinets and accessories. For information on current models, write—

CONCEALED LIGHTING—another Miami-Carey *first* in beauty and convenience.

THE ROUND MIRROR CABINET—another Miami-Carey *first*.

MIAMI Carey

MIAMI CABINET DIVISION
MIDDLETOWN, OHIO

THE PHILIP CAREY MANUFACTURING CO.
LOCKLAND, CINCINNATI 15, OHIO

Careyduct • Industrial Insulations • Rock Wool Insulation • Asbestos Shingles and Siding • Asphalt Shingles and Roofings
Built-up Roofing • Roof Coatings and Cements • Waterproofing Materials • Asphalt Tile Flooring • Pipeline Felt
Expansion Joint • Asbestos Wallboard and Sheathing • Corrugated Asbestos Roofing and Siding • Miami-Carey Bathroom Cabinets and Accessories

ANNOUNCEMENTS

(Continued from page 182)

Fair, on August 26, while aboard the Detroiter en route to New York, at the age of 57. In 1906 Mr. McInerney began his career in the building industry as time-keeper and checker for the George A. Fuller Co., working on the construction of Pennsylvania Station. During this period he studied engineering at night at Columbia University. During the first World War he was a captain in the construction branch of the Signal Corps and superintended additions to Kelly Field, Tex. He also aided in the building of other airfields in Americus, Ga., and West Point, Miss. After the war he directed construction of the United Fruit Building in New Orleans and the Penobscot and Detroit Free Press Buildings and the Cass theater in Detroit. He became construction superintendent for Starrett Brothers and Ekin and several years ago went to Detroit to work for the Simon J. Murphy Construction Company.

H. Douglas Ives, architect, at Edgartown, Mass., on Aug. 15th at the age of 57. Born in Montreal, Mr. Ives received his architectural education while still in Canada. After the first World War he returned to the staff of Cass Gilbert and later established his own office in New York. For ten years he was chief designer for the Fred F. French Company in New York. He designed the French office building at 551 5th Ave., most of Tudor City and many other apartment houses and groups, including one at 114 E. 40th St., as well as a hotel in Miami. He also worked for the French concern in London. For the last two years, Mr. Ives was designer for T. E. Rhoades, building contractor and engineer, at 363 Lexington Ave., New York.

Edward S. Evans, president of the Evans Products Co., at Grosse Pointe Park, Mich., on September 6, at the age of 66. An industrialist, inventor and financier, Mr. Evans achieved a leading position as a transportation expert, a manufacturer of a variety of special products and in the field of aviation. He founded the National Glider Association, was at one time president of the Lockheed Company and an organizer of the Stinson Aircraft Corporation, which developed successful brakes for airplanes. His company, the Evans Products Co., estimated that $45,000,000 of their total sales were of articles based on Mr. Evans' inventions. In connection with his company's expansion in the Pacific Northwest, Mr. Evans undertook a nationwide crusade for the utilization of woodwaste to conserve the nation's lumber resources and thus aided in the development of a number of new industries. He is credited with saving the Army $5,000,000 with one crating design.

William B. duPont, manager of the Industrial Division of the National Radiator Co., Johnstown, Pa., on August 9, at Johnstown, Pa., at the age of 31. Mr. duPont graduated from the Massachsuetts Institute of Technology in 1936 and became associated with E. I. duPont de Nemours & Company at Richmond, Va. In 1939 he returned to M.I.T. and obtained his master's degree in chemical engineering. Since then he has been with the National Radiator Co. He was a member of the American Society of Mechanical Engineers, the American Institute of Chemical Engineers, the Eastern States Blast Furnace and Coke Oven Association, and had been a member of the board of directors of the Johnstown Junior Chamber of Commerce.

The Series 1380 Truscon Double-Hung Steel Window has

12 SPECIAL FEATURES

for Better Hospital Lighting and Ventilation

1. Provides economical and trouble-free installation.
2. Sill ventilators permit ventilation that is conveniently controlled and draft free.
3. Assures maximum daylight.
4. Fire resistant.
5. Weathertight—saves fuel.
6. Will not rattle, warp, swell or rot.
7. Low maintenance.
8. Muntin designs to conform to any architectural treatment.
9. Conventional shades and draperies are applicable.
10. Snug-fitting screens can be installed easily from the inside.
11. Standard, weather-tight storm sash are available.
12. Single units with sill ventilators appropriate for private rooms, twin and triple units for wards and sun rooms.

● This Truscon Double-Hung Window, Series 1380, although essentially custom-built to fit masonry opening sizes within limits shown in the table, is attractively low in cost. It offers great flexibility in choice of sizes, muntin arrangements and window grouping. Series 1380 is designed to conveniently receive Truscon Screens and Storm Sash, which are available at low cost.

Write for your copy of catalog No. A-613, which will contain complete details and specifications. This catalog is now in preparation and will be available in the near future.

Ask for Truscon engineering service to help you adapt this efficient, attractively designed window to your hospital, school and institutional jobs.

TRUSCON STEEL COMPANY • Youngstown 1, Ohio
Subsidiary of Republic Steel Corporation

MAXIMUM SIZES OF WINDOWS BUILT INTEGRALLY
Based on 1/8" Glass

	With Sill Vent	No Sill Vent
Single Window	4' 0" x 8' 2"	4' 0" x 6' 6"
*Twin Window	8' 0" x 7' 0" or 7' 0" x 8' 2"	8' 0" x 6' 6"
*Triple Window	9' 0" x 7' 0" or 7' 0" x 8' 2"	9' 0" 6' x 6"

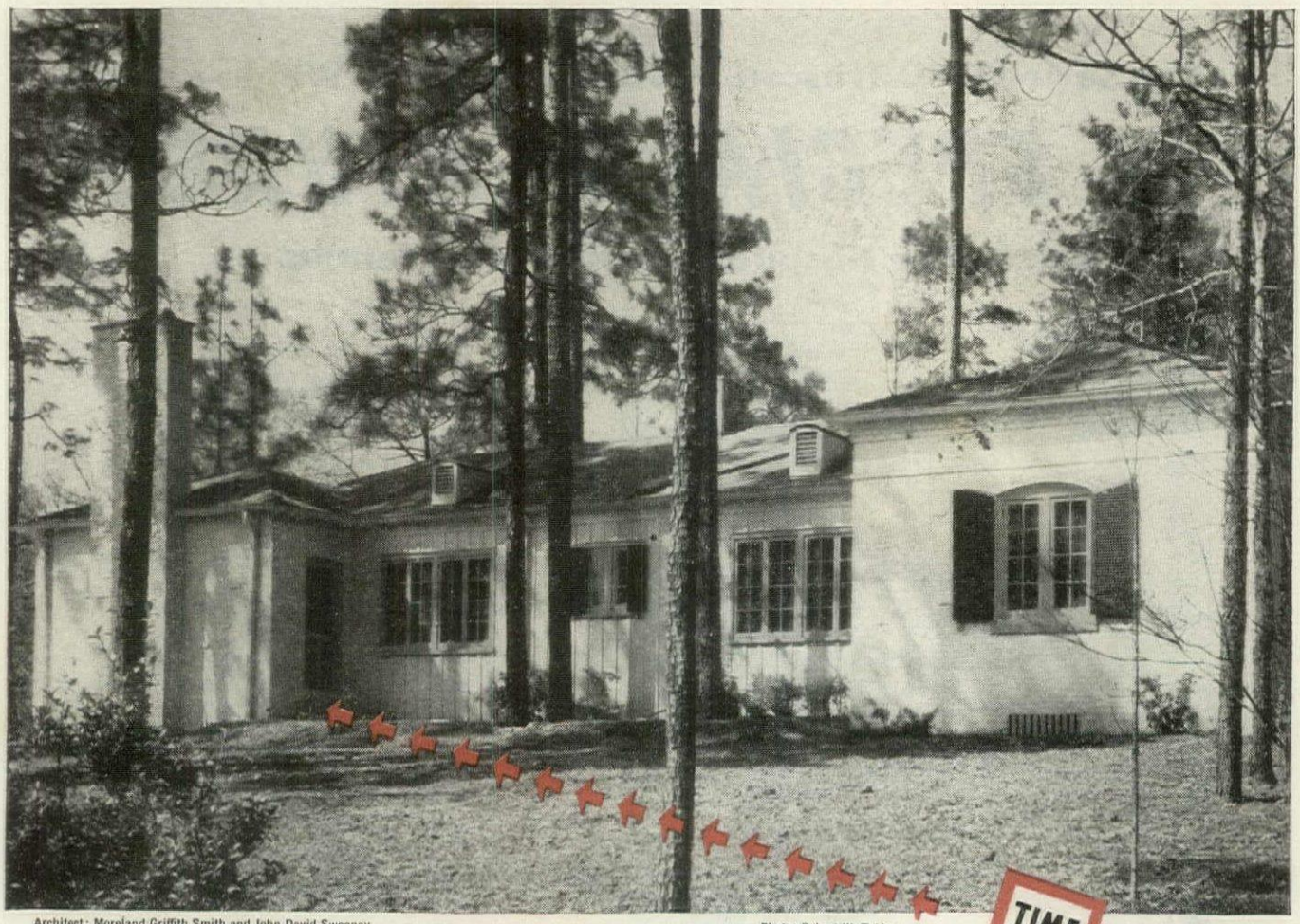
*Only one dimension may exceed 7' 0"

The series 1380 Double-Hung Steel Window will be available by the latter part of this year.

THE PRODUCERS' COUNCIL

TRUSCON DOUBLE-HUNG STEEL WINDOWS

ARMY-NAVY "E"



Architect: Moreland Griffith Smith and John David Sweeney

Photo: Robert W. Tebbs

Presenting THE SHOW-ROOM HOMES *of the Nation*

TIME Subscriber 6-50-ZDDH268-181, W. F. Newton, owns this white brick house-in-the-pines at Dothan, Alabama, which has been selected by the editors of Architectural Forum as one of the recently constructed U. S. homes most likely to influence new trends.

YOUR PROSPECTS will *first* see your building products being used and enjoyed in the kind of homes they wish they could own themselves—the homes of families they admire and try to copy.

Not all these admired-and-copied homes, of course, are the homes of TIME-readers—and not all TIME readers' homes are like Mr. Newton's. But by and large, the one million two hundred thousand families who read TIME are top income-and-influence people, well able to afford looked-up-to and looked-into homes in almost every American community—homes in which they report that they entertain more than three million guests *every week*.

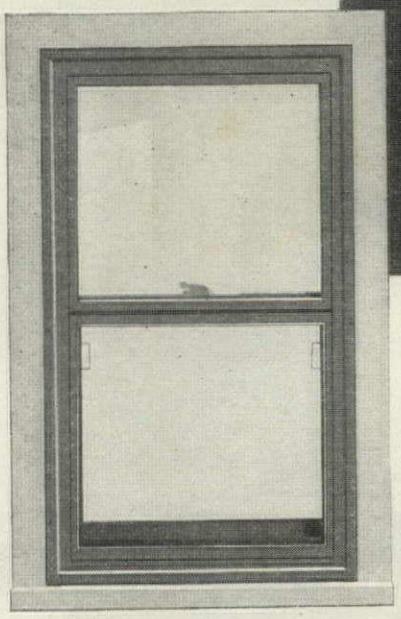
TIME families have approximately $3000 a year *more* than the average U. S. family. They have positions of prestige in business and social life: More than 450,000 TIME men and women are executives or department heads; more than 760,000 are active in one or more civic organizations. You would *expect* families like these to set the pace for modern American living—in the kind of homes, modern or traditional, sumptuous or simple, that are the showroom homes of the nation.

P. S. According to surveys made among test-groups of TIME families in seven large cities, 180,000 TIME families are *already* planning to build; 109,000, to remodel.

THE GATEWAY TO THE BUILDING MARKET

ADVERTISING OFFICES: New York Boston Chicago Philadelphia Cleveland Detroit San Francisco

For the *Ultimate* in Modern Window Insulation



Specify

RUSCO Patented All-Metal SELF STORING COMBINATION WINDOW

HERE'S what you provide *permanently* every time you write the word "RUSCO" into your plans for new construction and remodeling:

- screens, storm sash, and weatherstripping in one permanent unit
- year-round rainproof, draft-free ventilation
- self-storage that eliminates all changing and storing of insulating sash and screens
- increased year-round comfort, cleanliness
- increased efficiency of air-conditioning systems
- lower maintenance cost
- permanent fuel savings up to 30%
- patented sill drainage that protects against water damage

Think of the world of new comfort and convenience your clients will enjoy when "RUSCO" is part of your plans! It's the *first* practical Insulating Sash for large buildings —"tailor made" for every type home and commercial construction.

Investigate RUSCO now. It has provided outstanding service to the building industry since 1937. For engineering specifications see Sweets' 18a-7 or write direct for free booklet and name of nearest distributor.

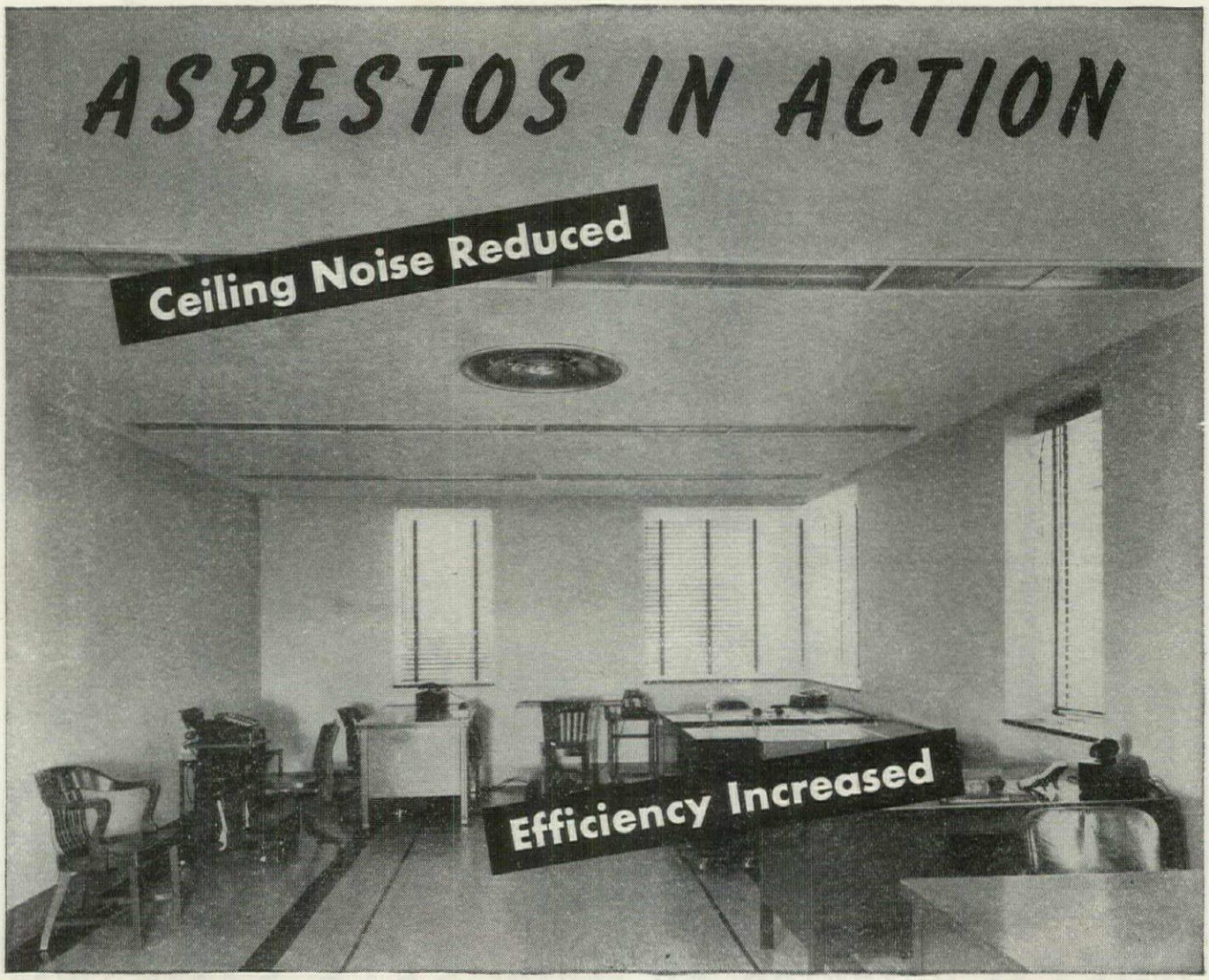
THE F. C. RUSSELL CO. • 1836-AF Euclid Ave., Cleveland 15, Ohio

RUSCO patented adjustable closure or subframe weatherstrips entire outside opening and permits installation on old or new buildings without altering existing window construction. Fits flush with outside of building. Harmonizes with all types of architecture.

RUSCO

PATENTED ALL-METAL

Self Storing Combination Windows



Your acoustical problems solved by K&M Sprayed "Limpet" Asbestos

Three and a half years ago a "gun" sprayed a sound absorbing material on the ceiling of this office. Nerve-jangling noises were reduced by 70%. The efficiency of the entire office immediately increased.

This material was K&M Sprayed "Limpet" Asbestos, which, by its porosity, absorbs sound . . . by its diaphragmatic action, reduces it still further. This adaptable acoustical material goes on the most intricate architectural design as easily as plaster. It is ideal for use in offices, restaurants, theatres, lounges—in fact any place where a quiet atmosphere is desirable.

Here are some of the advantages of K&M Sprayed "Limpet" Asbestos:

No cutting or fitting—completely covers, completely insulates—no seams, no joints, no holes.

Easily applied—sticks tight to any clean surface regardless of shape or composition.

High noise reduction coefficient of .70 for a ¾" thickness.

Fire-resistant and heat-insulating—thermal conductivity .31 at 75° F.

Surface may be covered with as many as 10 coats of oil emulsion paint without seriously impairing efficiency.

ARMY E NAVY

K&M best in asbestos

KEASBEY & MATTISON
COMPANY • AMBLER • PENNSYLVANIA

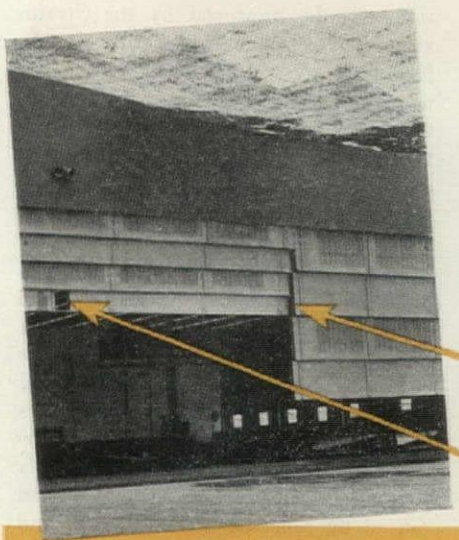
Robertson Vertical Lift Door

Any door is a wall that opens.

The main difference is how much space the door wastes while open.

The Robertson Vertical Lift Door nests in a pocket directly above the threshold. No floor or ceiling space is wasted when the door is open. The Robertson is unlimited, to all practical purposes, in height, width and skin material. And, if desired, even the largest door can be made to store itself away in 60 seconds.

This door achieved its original nationwide success under the name Firguson. The Firguson engineering skill is now a part of Robertson Co., and will be glad to work with you on any movable wall opening you desire, which will leave overhead trusses and building approaches unobstructed. A Robertson representative can furnish all data, or you may write for Robertson Door literature.



Quick Facts

- Any height. Any width. Can be opened in seconds.
- Maximum floor and ceiling area of building retained: overhead equipment—lights, monorail, cranes, etc.—can come up to door.
- Not obstructed by sand or snowdrifts.
- Fully counterbalanced: electrically or manually operated. All leaves reach peak at same time. May be stopped at any point, saving heat. Safety device available to halt descent if door touches an object.
- Door may be divided into independent sections, still leaving an unobstructed opening.
- Lowest leaf can conform to ground slope.
- Skin may be of various materials to suit architectural design: fenestration, sliding pilot doors, heat and sound insulation available.

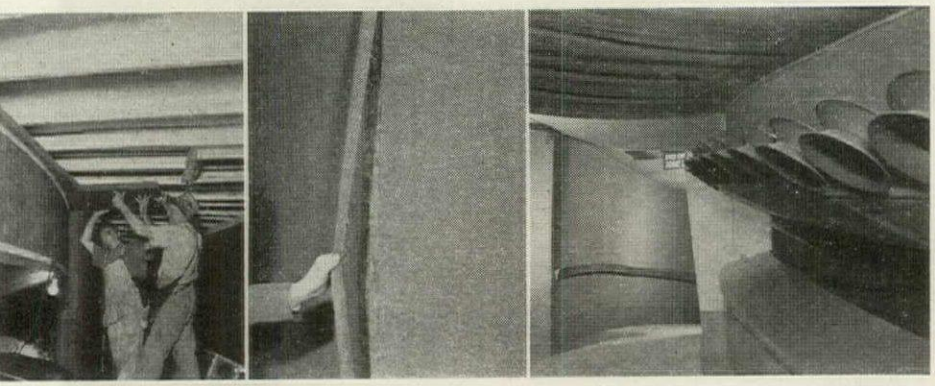
H. H. ROBERTSON CO.

2403 Farmers Bank Building, Pittsburgh, Penna.

Offices in 50 Principal Cities

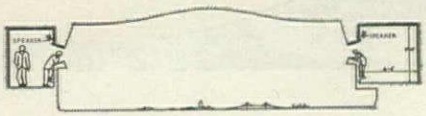
World-Wide Building Service

BUILDING REPORTER

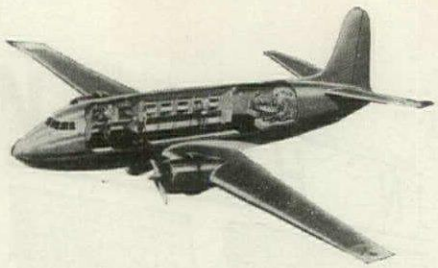


SIMULTANEOUS sound projection from five sets of speakers in a circular exhibition space was made possible by sound insulation covered with flameproof fabric. Photos show installation and finished job, drawing below shows section through exhibit and spectators' corridor.

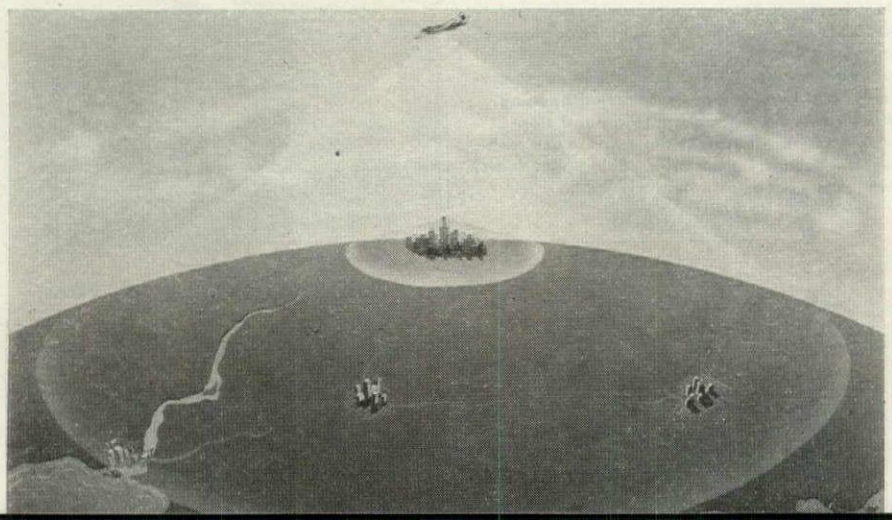
SOUNDPROOFING was an important technical design problem in the Norman Bel Geddes model display "Toledo Tomorrow" (FORUM, Sept., '45). The large model of the city of Toledo, visualized as it might appear in a score of years, occupies the center of a building 189 ft. in circumference and 61 ft. at its widest point. The model is viewed by spectators as they pass along a ramp which circles the model. The ramp leads to five zones or viewing station windows. In each of these areas a description of that portion of the model under view is heard from specially designed loud speakers. The problem of presenting five simultaneous narrations describing the exhibit without interference from one another was overcome by the installation of sound absorbing insulation.



Without acoustical treatment sound would be reflected from the walls and ceiling making the present plan impractical. The insulation installed was 2 in. thick Fiberglas on the walls and ceiling. Approximately 6,000 sq. ft. of insulation board was supplied by Owens-Corning Fiberglas. The rigid boards were cut and shaped to fit irregular spaces and then covered with a flameproof fabric. The successful sound control of the "Toledo Tomorrow" exhibit suggests other adaptations such as sound booths in music stores.



STRATOPLANES (left) may act as relay points for future television broadcasts, extending the distance reached by a single station more than four times.



SCIENTIFIC RESEARCH recently completed by chemists at Ohio State University proves that concrete can be improved if a by-product of the paper industry — calcium lignosulphate — is added to the cement used. Tests have shown that the best results are obtained from cement only when each of the countless particles is wet all over. When cement and water are mixed many of the particles clump or flock together. This tendency of the particles to bunch greatly reduces their combined effectiveness. The investigation showed that clumps are broken up when a small amount of a lignin product, made from paper mill waste, is added. This product, calcium lignosultphate, disperses the cement particles by electrostatic action. It is claimed that in tests made for federal departments, concrete produced with dispersed cement is stronger, less porous and lasts four to five times longer than when made with plain cement.

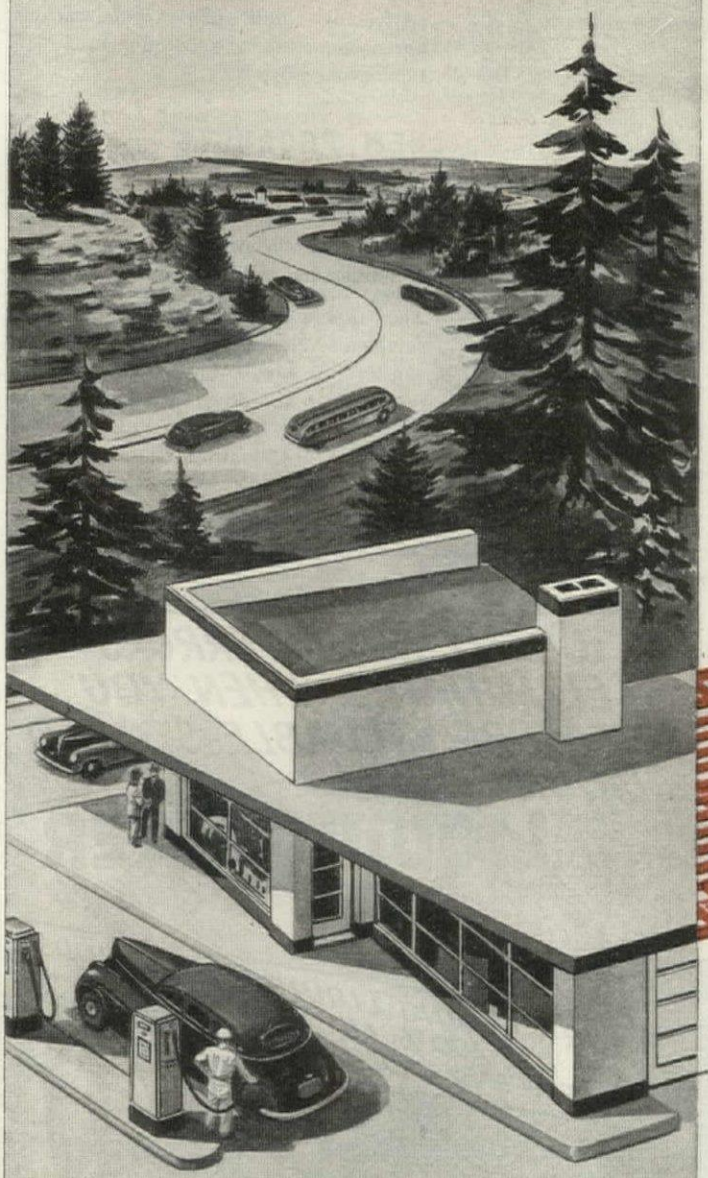
INCORPORATION OF DDT with several types of interior finishes for the control of most insect pests has been announced by the Fabrics and Finishes Department of the DuPont Co. Insects crawling on a DDT painted surface pick up the microscopic amounts of the chemical necessary to kill them. The surfaces retain their effectiveness for about one year. The DuPont Co. will not release its DDT finishes to consumers until field and laboratory tests show that they are non-toxic to human beings.

TELEVISION AND FM broadcast distribution may be improved by the Stratovision System conceived by C. E. Nobles, 27-year-old Westinghouse engineer. The television transmitter and antenna would be placed in an airplane flying in circles 30,000 ft. above the earth. The proposed signal distribution would thus increase television coverage from an area 100 miles in diameter (FORUM, April, '45) to one 442 miles in diameter. Economically it would mean eliminating a costly system of relay towers and coaxial cable across the country estimated to cost at least $1 hundred million. Other advantages claimed by Stratovision are that airborne broadcasts would be practically free from interference and distortion caused by reflected ground waves and would require less power to broadcast. It is calculated that a plane-borne transmitter 30,000 ft. in the sky would require only one-fifteenth as much

(Continued on page 196)

Think in terms of

STRAN STEEL

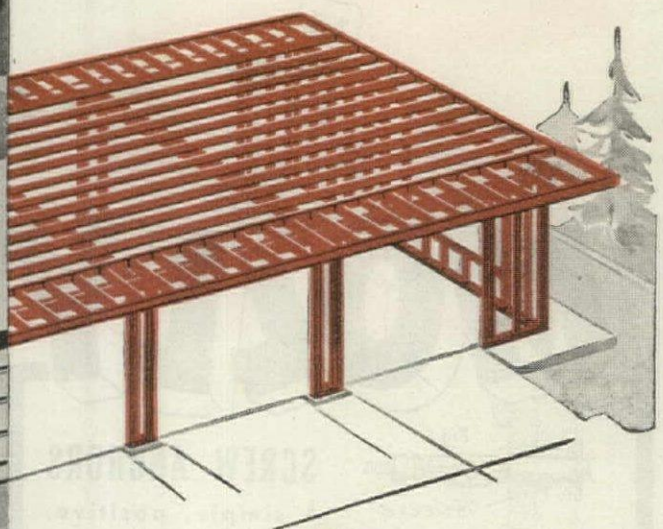


Design in steel for beauty · economy permanence

There need be no sacrifice in beauty when you design with Stran-Steel. For Stran-Steel is a material of unlimited adaptability — easy to work with, both on the drawing board and on the site.

Featuring nailable studs and joists, which permit the use of ordinary hammer-and-nail methods for attaching collateral materials, Stran-Steel framing provides outstanding economy through reduced maintenance—freedom from plaster cracks and sagging floors; adds permanence, strength and fire-safety to *your* beauty of design.

Shape your building plans for homes, multiple housing projects, commercial and industrial structures around this uniform precision material. Investigate its lasting advantages, proved in over a hundred thousand wartime "Quonset" buildings.



YOU NAIL TO STRAN STEEL

GREAT LAKES STEEL CORPORATION

Manufacturer of the Famous Quonset Hut for the U. S. Navy

STRAN-STEEL DIVISION • 37th FLOOR PENOBSCOT BUILDING • DETROIT 26, MICHIGAN

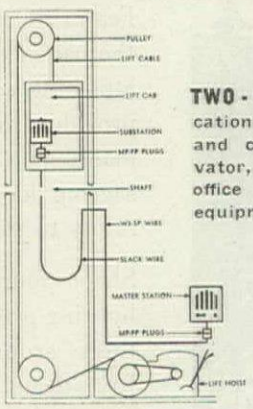
UNIT OF NATIONAL STEEL CORPORATION

BUILDING REPORTER

(Continued from page 194)

power as is needed by a 50 kw. transmitter on the ground covering an area 100 miles in diameter. As now planned four television and five FM transmitters would be installed in each plane. A coast to coast network for relaying programs from plane to plane between New York and Hollywood would require stationing eight such stratosphere planes above strategic areas spanning the continent. The plane, as designed by The Glenn Martin Co., will be a conventional all metal, low wing monoplane equipped with automatic pilots, turbo-superchargers and supercharged cabins. Planes will be designed to operate at the 30,000 ft. level for about eleven hours on one fueling. Initial tests of Westinghouse Stratovision will be conducted this fall.

ELECTRONIC INTERCOM was used to speed rebuilding of the dome of the capitol of the Commonwealth of Pennsylvania as a new method of controlling hoist operations. The hoist or lift for conveying men and materials to the various work levels was 287 ft. high and was operated by a hoist engineer on the ground. Control was maintained by a rope 290 ft. long which operated a bell with a prearranged system of signals. The hoist engineer was constantly being signalled to raise or lower the lift for a suitable levelling at each floor. This antiquated system was replaced by an Executone Master Station for the hoist engineer and a substation was installed on the lift. The substation was engineered for remote operation, which means that, with the substation at any particular point on the shaft two-way communication was possible over a span of several floors. Other labor and time saving applications are suggested through the use of inter-com systems connecting the contractor's field office with various parts of a job. Executone, Inc., 415 Lexington Ave., N. Y. C.



TWO-WAY communication between ground and construction elevator, using standard office communicating equipment.

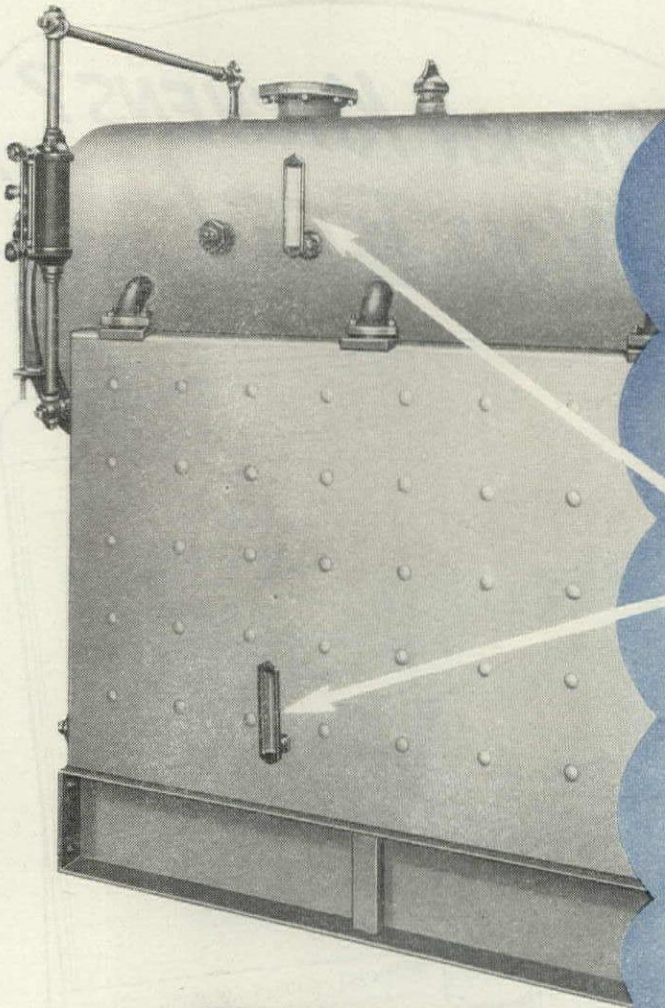
NEW PRODUCTS

WINDOWS

Louvered windows offer controlled ventilation and maximum light.

The Bishop Venta-Glass window resembles a venetian blind except that the shutters are made of plate glass and do not raise up and down. They are opened by raising the handle on either side of the front or "floating frame" upward and inward. The louvers when open

(Continued on page 202)

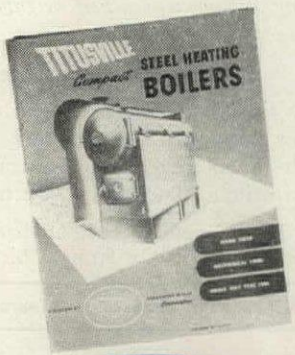


Faster
WATER CIRCULATION

TEMPERATURE VARIATION LESS THAN 5° F. BETWEEN TOP AND BOTTOM OF BOILER WHEN STEAMING

TITUSVILLE Compact
STEEL HEATING BOILERS

Bulletin on Request



"Increasing the rate of flow of water over a heated surface increases the water's heat absorption . . ."

Taking advantage of an age-old engineering principle Titusville Compact Boilers are designed to give *positive circulation.* The restricted water ways that connect the firebox unit to the shell unit—speed up the water circulation—and continually wash the heating surfaces in the boiler keeping the boiler up to a high state of heating efficiency at all times.

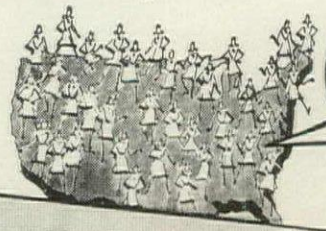
TITUSVILLE
IRON WORKS CO
TITUSVILLE, PA.

THE TITUSVILLE IRON WORKS COMPANY

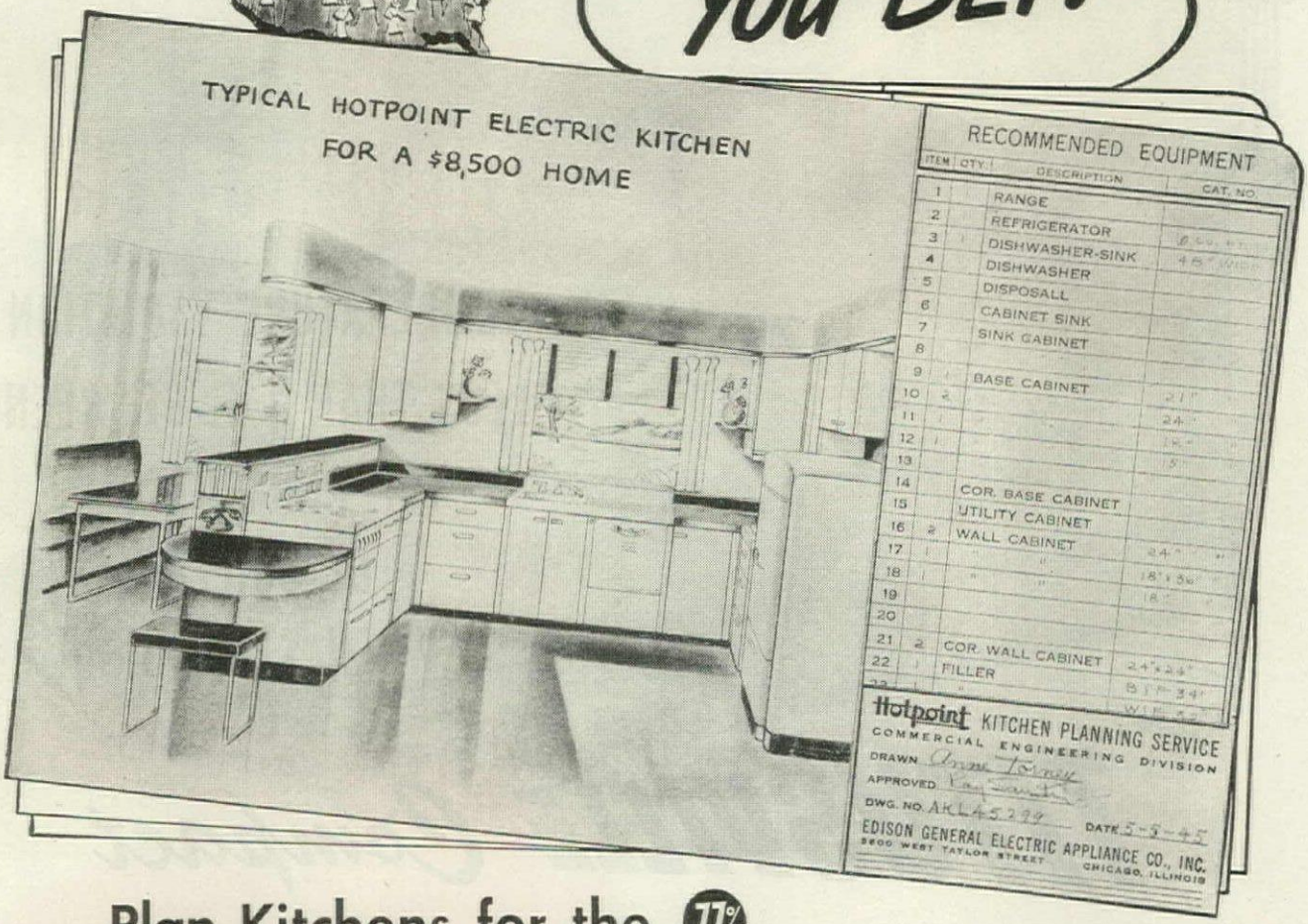
Division of Struthers Wells Corporation
TITUSVILLE, PENNSYLVANIA
Offices in Principal Cities

Housewives Answer National Survey . . .

*



MODERN KITCHENS? YOU BET!



Plan Kitchens for the 77%

"More than seven out of ten postwar homes will cost $3,000 or over" predicts the United States Chamber of Commerce. With that price range, builders and architects will find a profitable field in the planned, all-electric kitchen.

*

NATIONAL surveys indicate that the modern kitchen will enjoy postwar prominence comparable to the building boom of ultra modern bathrooms after the last war. America's housewife today gauges the modernity of her home by its kitchen. Influenced by Hotpoint's smashing advertising campaign, many are purchasing war bonds now for postwar building.

Powerful Advertising Prepares a Profitable Field!

Skillfully planned advertising is increasing the desire for modern, all-electric kitchens. Take advantage of groundwork laid by:

1. **Over a million and a half dollars spent by Hotpoint in national advertising, since Pearl Harbor, intensifying the trend to electric kitchens.**
2. **Leading magazines and newspapers that feature scores of articles focussed on the modern kitchen as the heart of the postwar home.**
3. **Requests for two million booklets "Your Next kitchen by Hotpoint."**
4. **Promotion of electric kitchens by leading utility companies and dealers in their communities.**

All these have been vigorously pushed to create a vast potential-customer field. *Plan now to take your share of home building and modernization by capitalizing on the spotlighted modern kitchen.*

Kitchen Planning Service

Write for details of this valuable service. Hotpoint's expert staff of kitchen designers are ready to cooperate with you in planning functional all-electric kitchens.

Edison General Electric Appliance Co., Inc.
5651 West Taylor Street, Chicago 44, Ill.

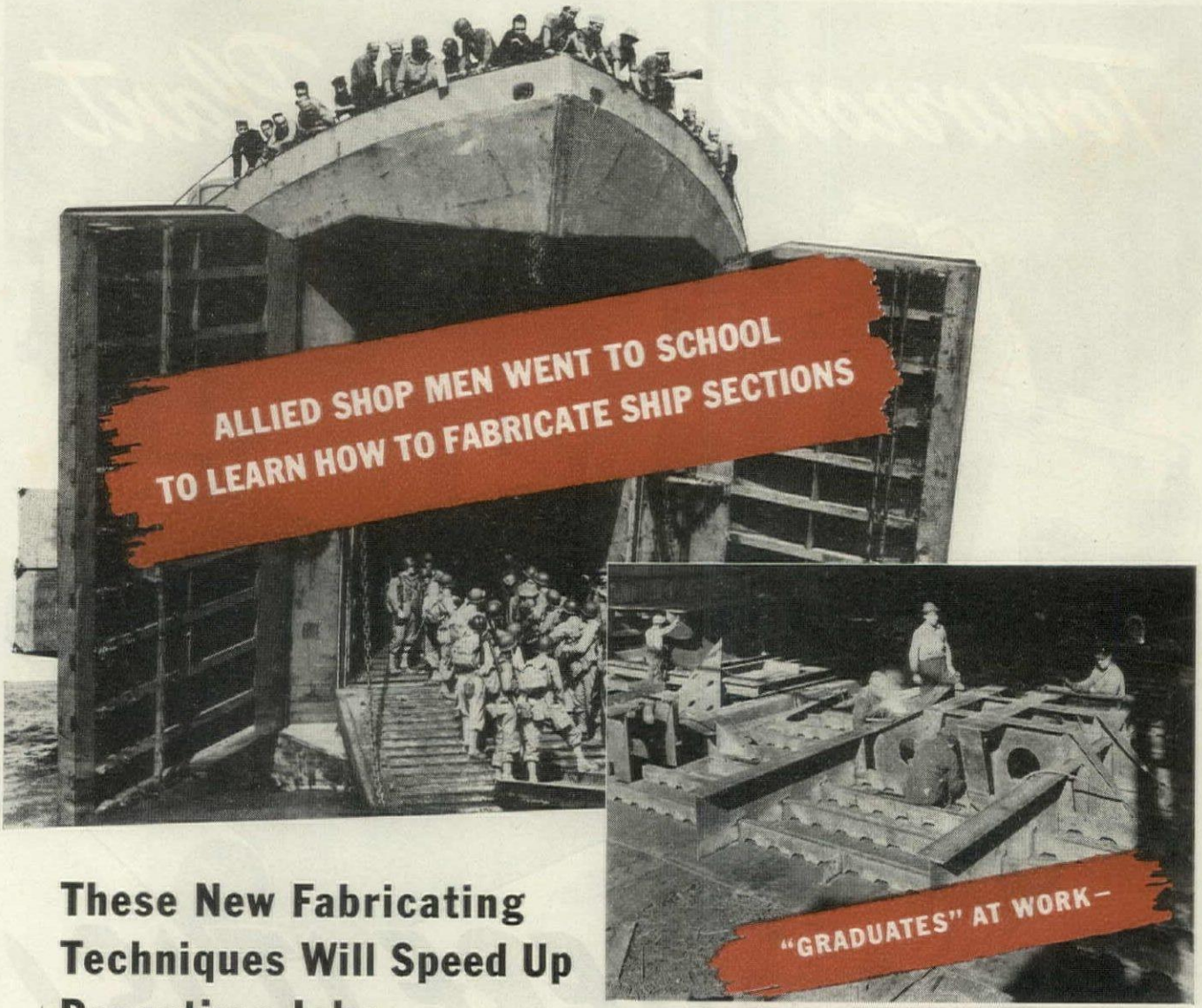
Dependability Assured by 40 Years Experience!

HOTPOINT REGIONAL SALES OFFICES
EASTERN: 570 Lexington Ave., New York City 22, Plaza 3-9333. **SOUTHERN:** 304 Red Rock Bldg., Atlanta 3, Walnut 2959. **CENTRAL:** 1456 Merchandise Mart, Chicago 54, Superior 1174. **WESTERN:** Western Merchandise Mart, 1355 Market St., San Francisco 3, Underhill 2727.

Hotpoint ELECTRIC KITCHENS

REFRIGERATORS • RANGES • WATER HEATERS • HOME FREEZERS • WASHERS AND IRONERS
CLOTHES DRYERS • DISHWASHERS • GARBAGE DISPOSALLS • CABINET-SINK • STEEL CABINETS

IN MOST STATES, ALL HOTPOINT KITCHEN EQUIPMENT CAN BE INCLUDED IN F. H. A. INSURED MORTGAGES



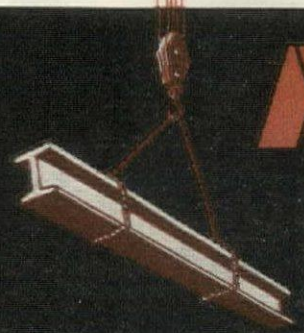
These New Fabricating Techniques Will Speed Up Peacetime Jobs

Before Allied shop men began to fabricate sections of the ships that went to war, they added to their knowledge of welding by intensive study in Allied's own welding school.

Here, they were instructed in the latest welding techniques; learned to correctly interpret ships' drawings; became familiar with architectural terms and templets as applied to shipbuilding.

Allied shop men now bring this war-gained knowledge of new fabricating techniques to peacetime building . . . not alone for ships, but for the structures of industry.

If your job calls for the fabrication and welding of aluminum or steel, Allied has the skill, the facilities, and the manpower to do it. *Send your plans and specs to Allied for quotation.*

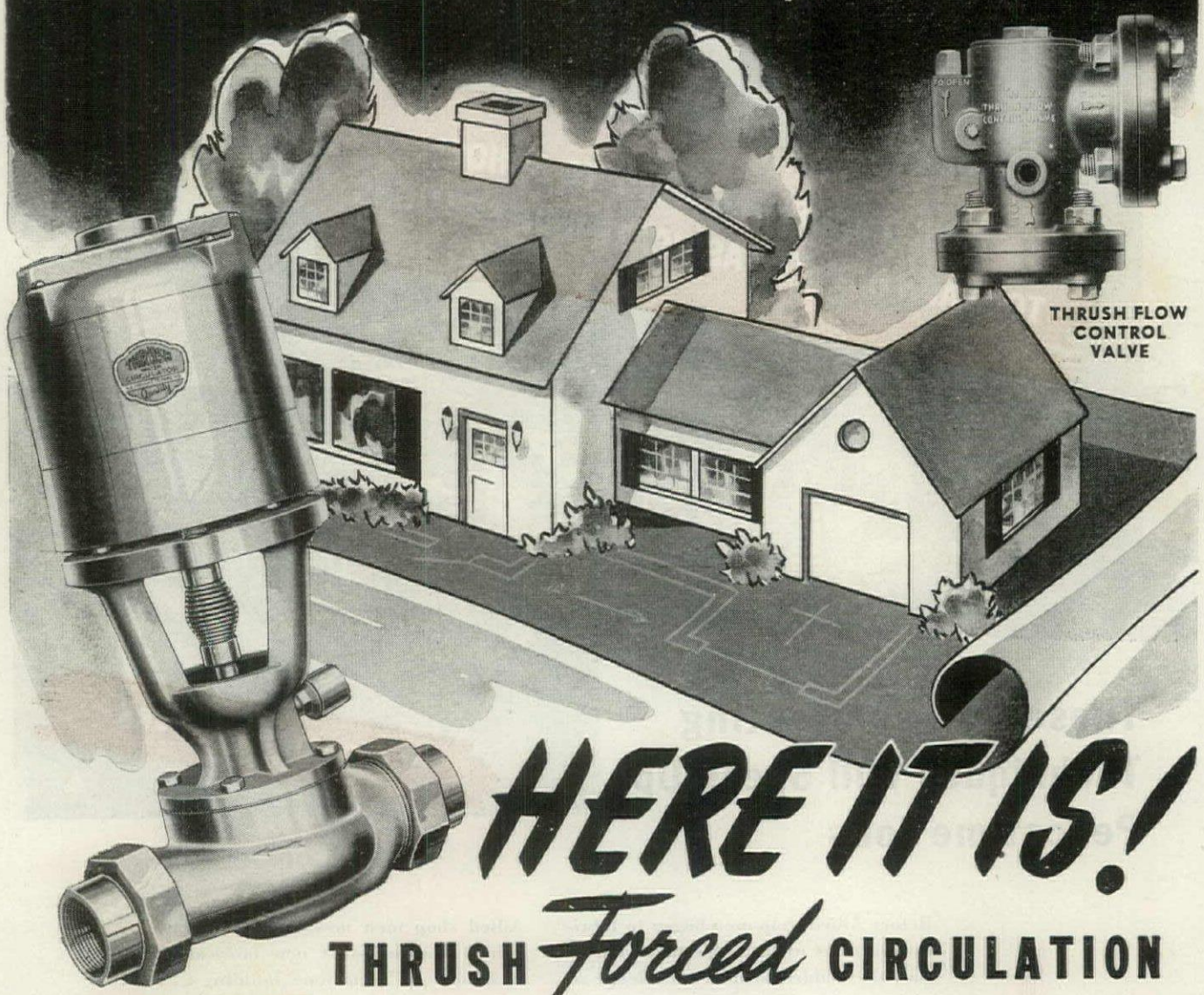


ALLIED STRUCTURAL STEEL COMPANIES

- CLINTON BRIDGE WORKS, 101 S. Second St., Clinton, Iowa
- GAGE STRUCTURAL STEEL CO., 3123-41 S. Hoyne Ave., Chicago 8, Ill.
- MIDLAND STRUCTURAL STEEL CO., 1300-20 S. 54th Ave., Cicero 50, Ill.

ENGINEERS
FABRICATORS (75,000 TONS CAPACITY)
ERECTORS

Tomorrow's Heating Plant



THRUSH FLOW CONTROL VALVE

THRUSH WATER CIRCULATOR

HERE IT IS!

THRUSH *Forced* CIRCULATION

AUTOMATIC heating is a "must" in the homes of tomorrow . . . and the finest home heating is not merely a blueprint for postwar development . . . it's an actuality that is here right now! Thrush Forced Circulating Hot Water Heat assures that uniform, effortless heating and real home comfort which every one is seeking, with true fuel economy. Best of all it provides year around domestic hot water supply from the same heating installation very inexpensively. Are you keeping in touch with the plans of home builders and home seekers in your community? Tell them about Thrush Flow Control System and help write this better home heating into the specifications. You should also recommend Thrush equipment for modernization work now. If not familiar with Thrush products, see your wholesaler today or write Dept. H-10.

THRUSH WATER HEATER

H. A. THRUSH & COMPANY • PERU, INDIANA

Summer - Winter Hot Water Heat!

Marlite . . .

SILENT PARTNER IN AN "EMPIRE SHAKING" ENTERPRISE

Here's Oak Ridge, Tenn., where the most devastating war weapon of all time is produced. Hospital, with nurses home and out-patients

PHOTO PRESS ASSOCIATION, INC.

building, required 110,100 square feet of Marlite paneling. Homes, such as those shown in left drawing called for 607,652 square feet of Marlite.

876,326 Square Feet of Plastic-Finished Marlite Installed at Tennessee Site of ATOMIC BOMB Development

Perfection of the Victory-clinching Atomic Bomb required speed . . . *all along the line!* Vitally important was the rapidity with which the Oak Ridge site of the Clinton Engineer Works became a completed city of 75,000 population in little over a year. Homes, hospitals, dormitories, factories, service stations, schools, food stores, laboratories and a recreation hall sprang up. In *every one* Marlite—pre-engineered for fast, easy installations everywhere—plays a dominant part as the surfacing material for interior walls and ceilings . . . proves again how versatile Marlite paneling can be adapted to *all types of rooms in all types of buildings.*

INSTALLATION SPEED, YES, AND ALL THESE QUALITIES, TOO! Long-wearing beauty (there's an unusually wide variety of colors and patterns from which to choose) and ease of cleaning are assured by the pioneer high-heat-bake finish. This exclusive formula assures a surface impervious to attack by dirt, grease, grime, moisture, alkalies and most acid fumes . . . means savings in maintenance time and costs . . . eliminates costly bothersome redecorating.

So, make plastic-finished Marlite your silent but profitwise partner in all your building plans . . . either new construction or remodeling! Marsh Engineers are always ready to help with plans and specifications. And just as rapidly as war-born conditions permit, you'll see a return to Marsh's regular prompt delivery from 27 strategically-located warehousing points.

Marlite

REG. U. S. PAT. OFF.

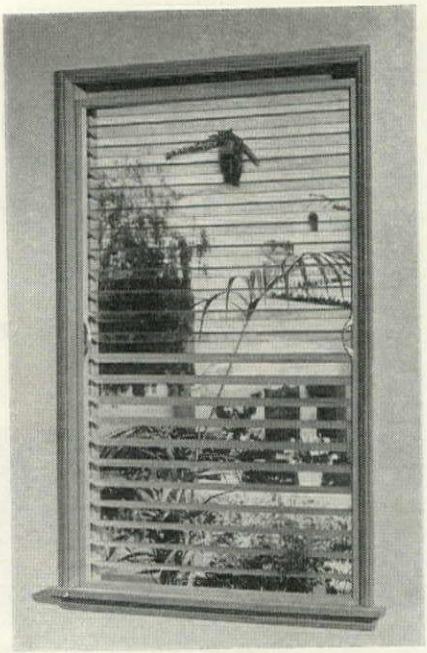
MARSH WALL PRODUCTS, Inc.

101 MAIN STREET • DOVER, OHIO

PLASTIC-FINISHED WALL PANELS • FOR CREATING ~~BEAUTIFUL~~ duty-ful INTERIORS

(Continued from page 196)

are horizontal permitting a 90 per cent opening of the window area for maximum ventilation. When closed, the louvers overlap creating a watertight seal. The louvers can be tilted to any position to provide ventilation while eliminating draft. The window will not break if forcefully shut, for a natural cushion of air is formed between each overlapping louver. It is manufactured complete, is easy to install in place of the usual window sash, and comes in a wide variety of standard window sizes which fit into any regular window frame, thus it can be used in remodeling work as well as new homes. Venta-Glass is also available to fit doors allowing maximum light and ventilation when the door is closed. Regular window screens can be mounted on the outside of the Venta-Glass window without interfering with its operation, and they need not be removed for cleaning the window. Washing is simple as both inside and outside of the louvers can be cleaned simultaneously when they are in a horizontal position. Frosted glass louvers in bathrooms eliminate the need



for shades and give privacy plus ventilation and light. Combinations of half-clear, half frosted glass doors and windows, tinted units, and for certain uses wood louvers substituted or combined with glass, offer many imaginative new ideas. Venta-Glass used in ceilings and interior walls, and for floor to ceiling exterior walls are other possibilities for achieving maximum ventilation and light.

Manufacturer: Nu-Air-Wa Co., 601 S. Vermont Ave., Los Angeles 5, Calif.

COAL CHUTE

Newly designed coal chute for residences is indestructable.

This new unit is offered in the popular size of 23 in. by 17 in. by 8 in. Known as the No. 550 chute the frame is of pressed steel .095 thick and arc welded at the corners. The door is of 13 gauge pressed steel, ribbed for added strength and appearance. A gravity lock, with cast semi-steel pin and stamped lock housing is positive and secure. To insure maximum life the unit is given a coat of asphaltum, rust-resisting paint.

Manufacturer: The Majestic Company, Huntington, Ind.

(Continued on page 208)

ERRATUM

Architect J. B. Benedict, referred to as "the late" Mr. Benedict in the Johnson Service Company advertisement (page 33) in this issue, happily is alive and well. Correction of this error reached the FORUM after the page had been printed. All concerned extend to Mr. Benedict apologies and felicitations.—ED.

Certified Ballasts and Starters are an important part of Fleur-O-Lier Certification.

For you can be sure that fixtures labelled Fleur-O-Lier are RIGHT! Right . . . for top performance. And right for trouble-free operation.

Here's why:

1. This label on a fixture means that it is built to definite *authoritative specifications* . . . to provide the best in lighting and lamp performance, together with dependable service.
2. It signifies that fixtures are subject to rigid test by Electrical Testing Laboratories, Inc., and are certified by them as meeting Fleur-O-Lier specifications.
3. It brings you the knowledge and research of many of the finest technicians in fluorescent lighting.

And in addition—this label lets you choose from a wide variety of fluorescent fixtures designed to appeal to the taste and style needs of your customers—and be sure about quality!

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Remember over 30 leading fixture makers build Fleur-O-Liers; so when you're planning for tomorrow's fluorescent lighting, be sure fixtures marked Certified Fleur-O-Lier are part of your plans.

FLEUR·O·LIER *Manufacturers*

CERTIFIED FIXTURES FOR FLUORESCENT LIGHTING

Participation in the FLEUR-O-LIER MANUFACTURERS' program is open to any manufacturer who complies with FLEUR-O-LIER requirements

RICH'S-ATLANTA *PRESENTS*

"Georgia Builds" ARCHITECTURAL COMPETITION

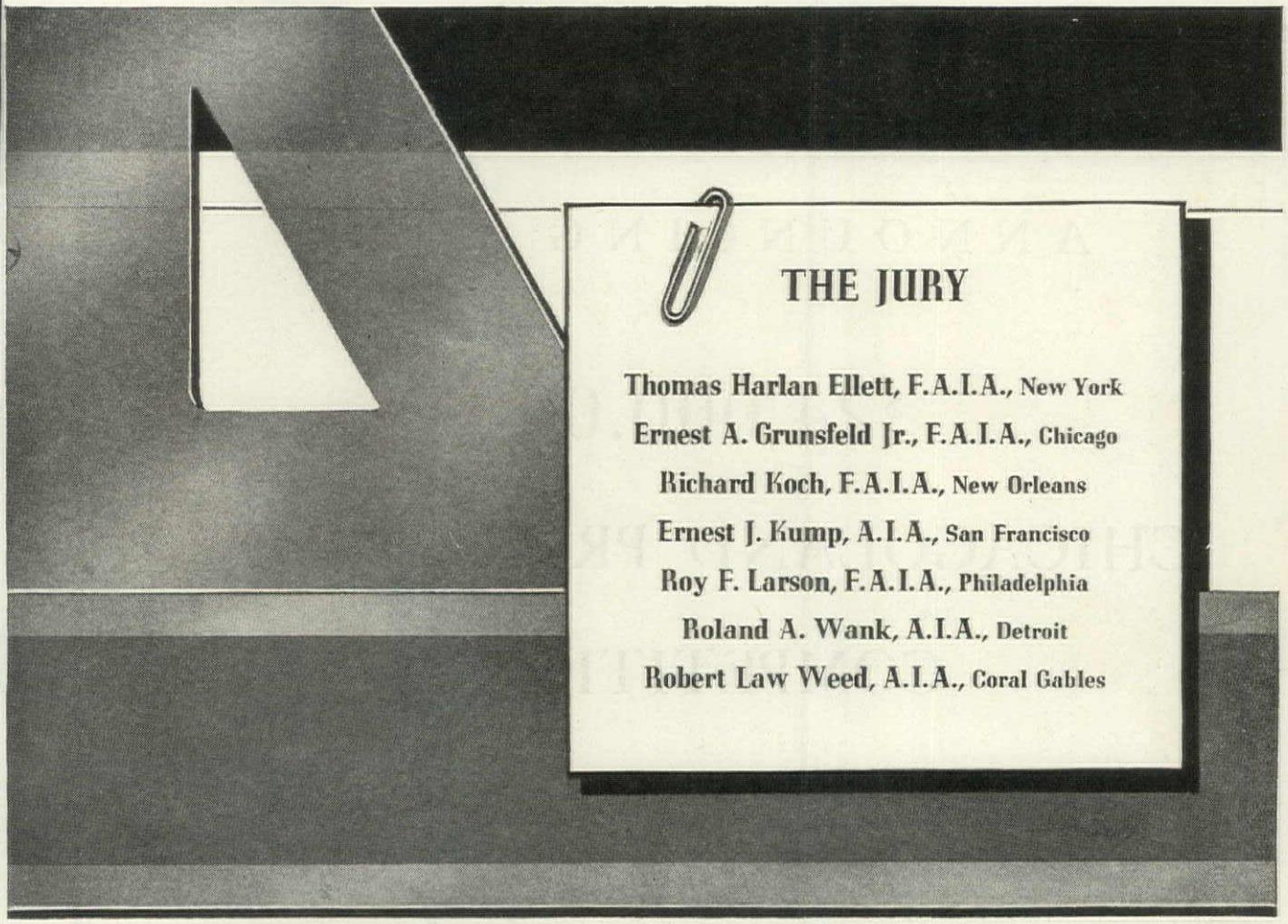
conducted by Progressive Architecture

PROBLEM: A realistic house for a family in Georgia

PRIZES: Totaling $10,000

FIRST PRIZE	$3,000
SECOND PRIZE	1,500
THIRD PRIZE	1,000
FOURTH PRIZE	500
25 MENTIONS $100 EACH	2,500
SPECIAL GEORGIA PRIZE	1,500
	$10,000

The Official Program of the Progressive Architecture—Rich's, Inc., Architectural Competition is published in the October issue of Progressive Architecture, Pencil Points.



THE JURY

Thomas Harlan Ellett, F.A.I.A., New York
Ernest A. Grunsfeld Jr., F.A.I.A., Chicago
Richard Koch, F.A.I.A., New Orleans
Ernest J. Kump, A.I.A., San Francisco
Roy F. Larson, F.A.I.A., Philadelphia
Roland A. Wank, A.I.A., Detroit
Robert Law Weed, A.I.A., Coral Gables

RICH'S, Inc. of Atlanta, largest department store in the South, takes pride in sponsoring this nation-wide Architectural Competition in collaboration with Progressive Architecture — Pencil Points with prizes totaling $10,000.

The problem calls for a small house for a family living in Georgia. Consideration must be given to the climate, the topography and the mode of living in the South. The materials may be anything that will benefit your design.

Henry J. Toombs, A.I.A. of Atlanta and Kenneth Reid, A.I.A., Editor of Progressive Architecture are the professional advisers. The competition meets the code set by the American Institute of Architects. The competition starts with the publication of the Official Program in the October issue of Progressive Architecture and closes January 21, 1946. No entry blanks, no fees, no material limitations.

Mail the coupon at once and get your copy of the Official Program reprint.

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ATLANTA

KENNETH REID, A.I.A.
Progressive Architecture, 330 W. 42nd Street, New York 18, N.Y.

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CITY AND ZONE_____ STATE_____

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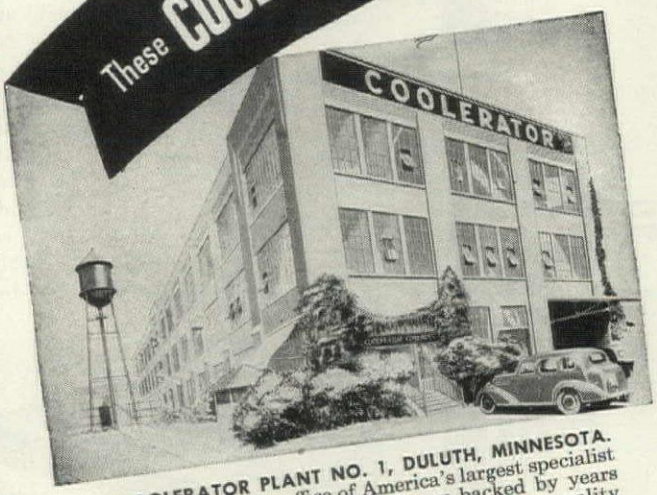
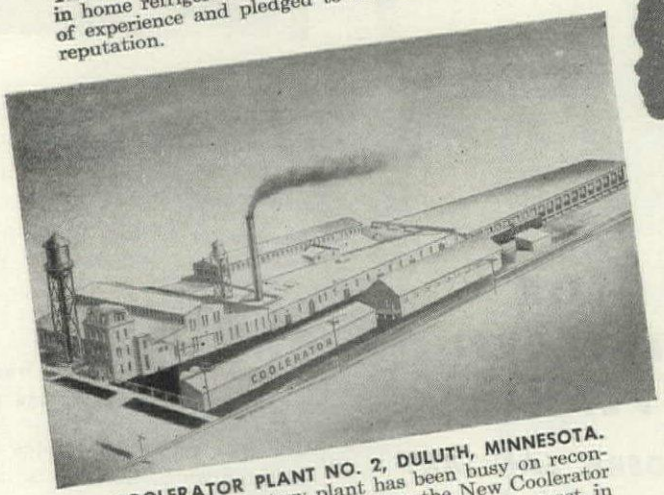
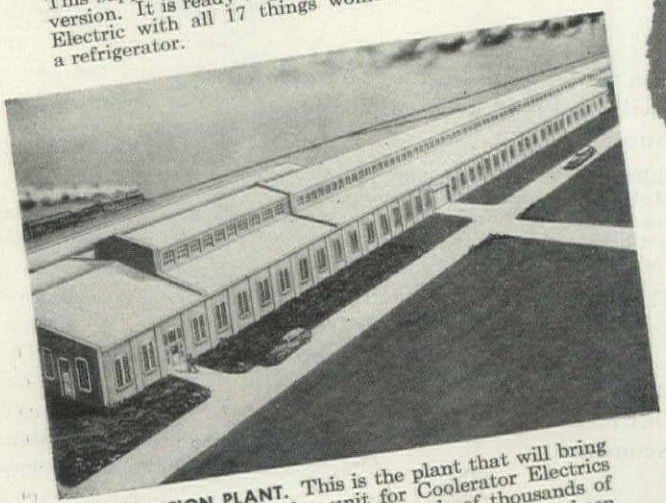
ARE THE HOME OF AMERICA'S LARGEST SOLE SPECIALISTS IN HOME REFRIGERATION!



COOLERATOR PLANT NO. 1, DULUTH, MINNESOTA. This is the home office of America's largest specialist in home refrigeration, a company backed by years of experience and pledged to maintain its quality reputation.

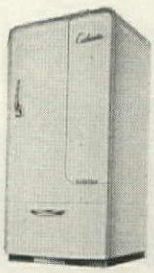


COOLERATOR PLANT NO. 2, DULUTH, MINNESOTA. This supplementary plant has been busy on reconversion. It is ready to produce the New Coolerator Electric with all 17 things women want most in a refrigerator.



PRECISION PLANT. This is the plant that will bring you the refrigerating unit for Coolerator Electrics and Home Freezers . . . hundreds of thousands of hermetically sealed refrigerating units have been produced in this one plant!

Here they are—three modern Coolerator plants tooled and ready to start production at a moment's notice! From these plants will come the New Coolerator Electric . . . New Home and Farm Freezers . . . and the All Ice-Conditioned Coolerator. Coolerator products are designed to add beauty and serviceability to streamlined kitchens. You'll find the Coolerator line-up offers refrigeration for every income—for any size kitchen! For additional information, write The Coolerator Company, Duluth 1, Minnesota.



NEW COOLERATOR ELECTRIC really looks proud in any kitchen. Refrigerated by an exclusive principle of refrigeration called the Magic Flavor-Saver, and available in 7½-cu. ft. and 9½-cu. ft. models.

HOME AND FARM FREEZERS the dream of many an American housewife. Graceful Dura-Sheen finish and compartments for freezing foods as well as storing foods. Home Freezer—6½-cu. ft. . . . Farm Freezer—15-cu. ft.

NEW ICE-CONDITIONED COOLERATOR for those who prefer ice. All steel cabinet, cold-storage type insulation, and 4-way circulation. 5-cu. ft.—75-lb. ice-capacity . . . 6½-cu. ft. —100-lb. ice-capacity.

THE COOLERATOR COMPANY
Duluth 1, Minnesota

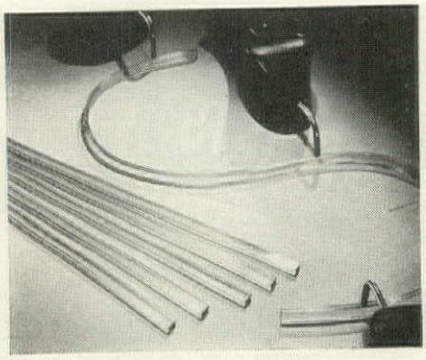
Coolerator

(Continued from page 202)

DRAWING INSTRUMENTS

Plastic splines produce accurate curves.

Draftsman's splines extruded of Tenite plastic are uniformly flexible and resilient, and may be made to take any desired curve. Because of the plastic's high degree of dimensional stability it is extruded to very close tolerances, and an even edge is maintained. H-shaped in profile, the splines are held in place by means of metal "dogs," which are

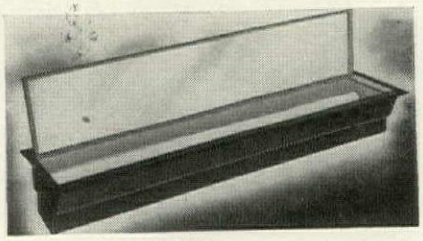


hooked into the channels thus formed. *Extruded:* Yardley Plastics Co., Columbus, Ohio.

FLUORESCENT FIXTURE

Recessed ceiling fixture hinged for easy servicing.

The new Wiley Recessed Troffer is designed to fit in as little as 7 in. space between the true ceiling and the false ceiling into which fixtures are recessed. It is equipped with the Wiley E-Z Servicer which allows the glass shield or louver to be opend or removed by simply raising one side, sliding the shield over and dropping the low side. One man can clean or change tubes without use of tools. The top of the reflector is also easily removable so that wiring and ballasts may be reached without taking down the fixture. The unit fits into a ceiling opening 12 in. by 48 in., and is made for individual installation or continuous runs in open, louvered or ribbed glass models, for two, three or four,



40 w. lamps with instant start or starter ballasts. It is of welded steel construction with inside reflector and louvers finished in 85 per cent reflection polymerized white.

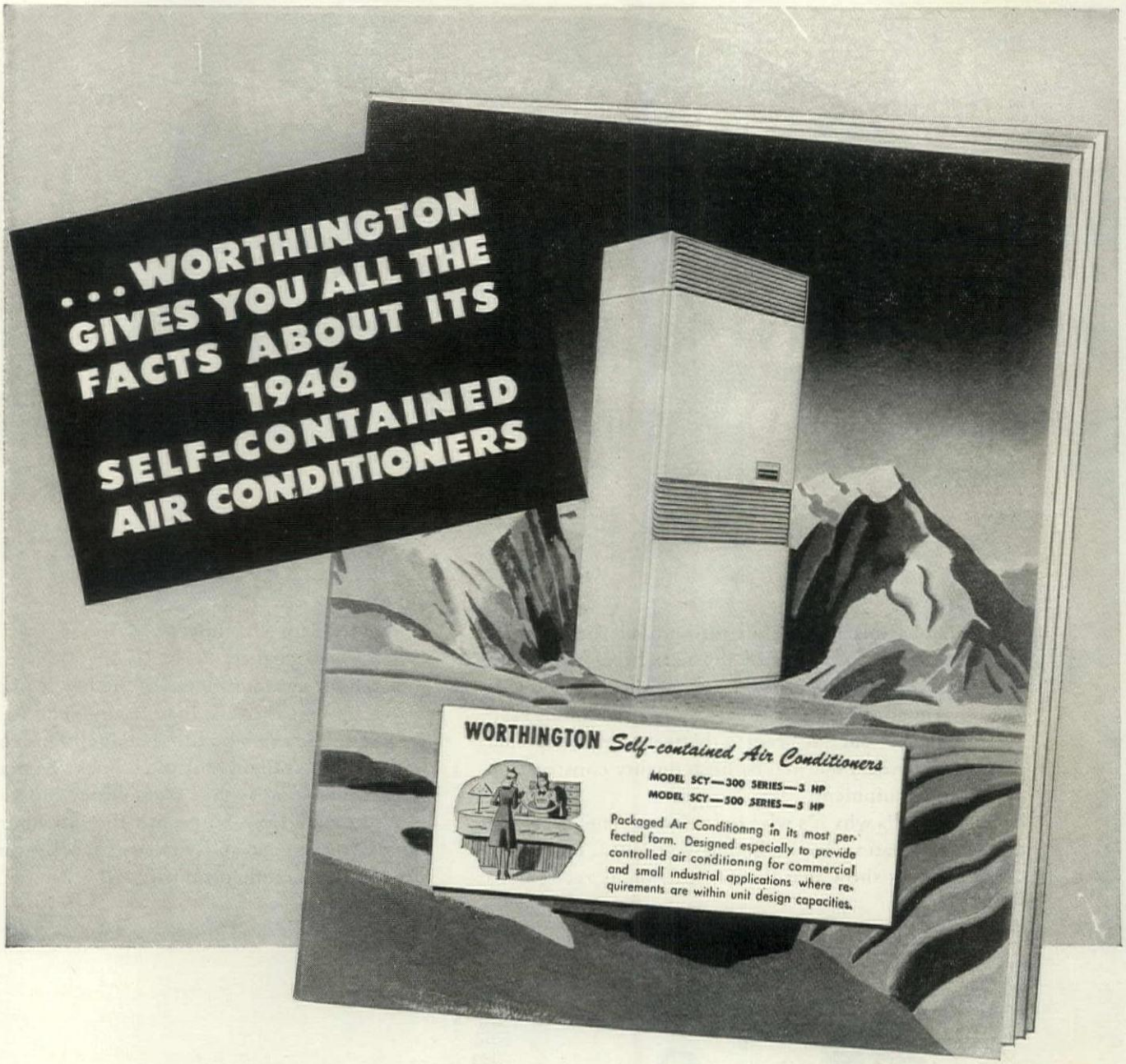
Manufacturer: R & W Wiley, Inc., 129 Dearborn St., Buffalo 7, N. Y.

POSTWAR JEEP

Combines functions of tractor, truck, passenger conveyance and power unit.

The new jeep incorporates many new features which makes it a most useful vehicle for the farm, factory or industrial plant. It can do various farming jobs where low speed, tremendous power and the capacity for sustained service are important, as well as jobs of stationary power take off. Then it can take to the road as a light delivery truck or passenger vehicle running as fast as 60 m.p.h. This is made possible by the change of gear ratios in the axle, an important factor in road speed; and in the transfer case, which is used to transmit power to agricultural or industrial machinery from the 63 h.p. jeep engine. By effecting these changes, greater engine speed is produced, thus the postwar jeep exercises maximum efficiency while operating at a necessary farm pace of 3 to 7.5 m.p.h. A special power take-off, which, when employed through either the spline shaft for direct power or a pulley belt, can transmit up to 30 h.p.

(Continued on page 214)



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You'll want to learn all the facts about this latest development in air conditioning, attractive self-contained units that give you real air conditioning in the most economical and perfected form. You'll want to see how such compact cabinet units provide year-round air conditioned comfort . . . cool, invigorating air in summer . . . warm, filtered air in winter. You'll want to learn why these units for commercial and small industrial applications where space is limited, make possible an economical first cost and low operating cost.

Write for your copy of this 8 page booklet on Worthington Self-Contained Air Conditioners today . . . and learn why *there's more worth in Worthington. Worthington Pump and Machinery Corporation, Air Conditioning and Refrigeration Division, Harrison, N. J.* Specialists in air conditioning and refrigeration machinery for over 50 years.

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AIR CONDITIONING

BETTER *Plumbing and Heating* FOR THE HOUSES YOU ARE PLANNING

Thousands of families throughout America are ready to buy or build the new home they have dreamed about for the last five years. Some will want cozy cottages, others more pretentious residences—but all want a better home, one that is definitely marked by high quality construction and equipment.

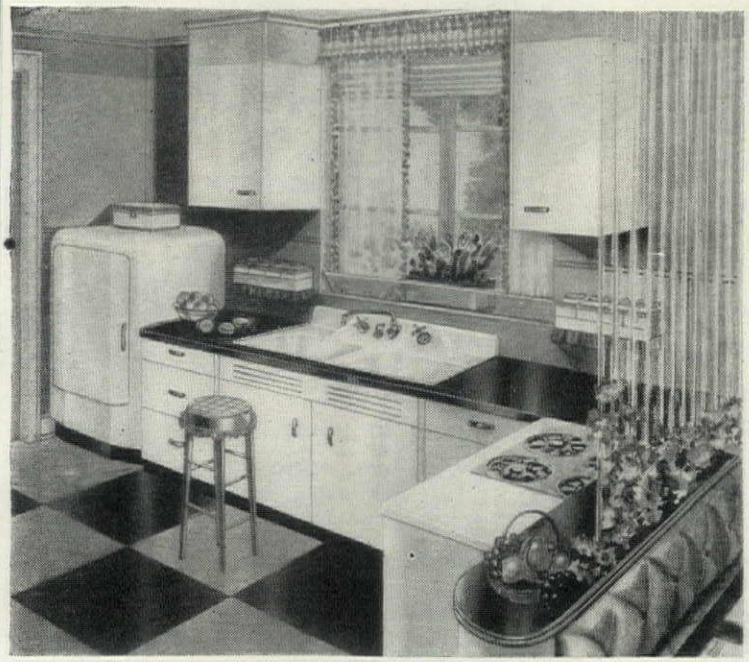
That's why it's wise to include Crane plumbing and heating in the homes you build. For actual surveys show that the name Crane is recognized as standing for the last word in design, convenience and quality.

Watch for announcement of the new complete Crane line—it will include equipment to suit every taste and every building budget. This equipment will be available for the homes you plan to build just as soon as the vast facilities and know-how of Crane Co.—busy until the last hours of the war on urgent and vital war work—can be turned to peacetime production.

Bright, cheerful Crane bathrooms will be selling factors in the homes you build. And the new Crane line will contain everything you need—all new in styling and with added convenience features that will please any home buyer.

90 YEARS OF PROGRESS 1855 1945

Sparkling, efficient kitchens that mean less work and fewer steps will help you sell more homes. And Crane kitchen equipment will help you do just that. In the new Crane line you'll find a complete range of sinks for every requirement, plus attractive and commodious kitchen cabinets that mean so much to the modern housewife.

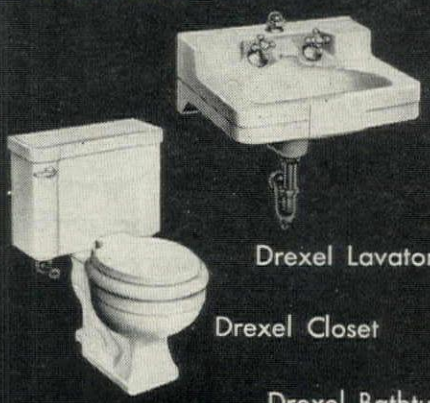


The Crane heating line includes everything for every heating system. Much of this equipment is already in production and more will be released as rapidly as it can be produced.

AVAILABLE FOR IMMEDIATE NEEDS:

Crane plumbing and heating equipment is already in production. Check your Crane Dealer or Crane Branch for equipment you need.

PLUMBING..



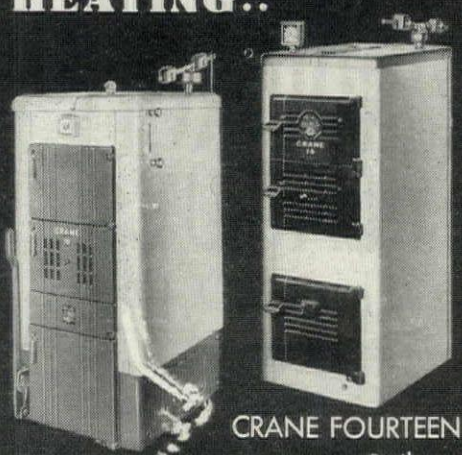
Drexel Lavatory

Drexel Closet

Drexel Bathtub

Cottage Sink

HEATING..



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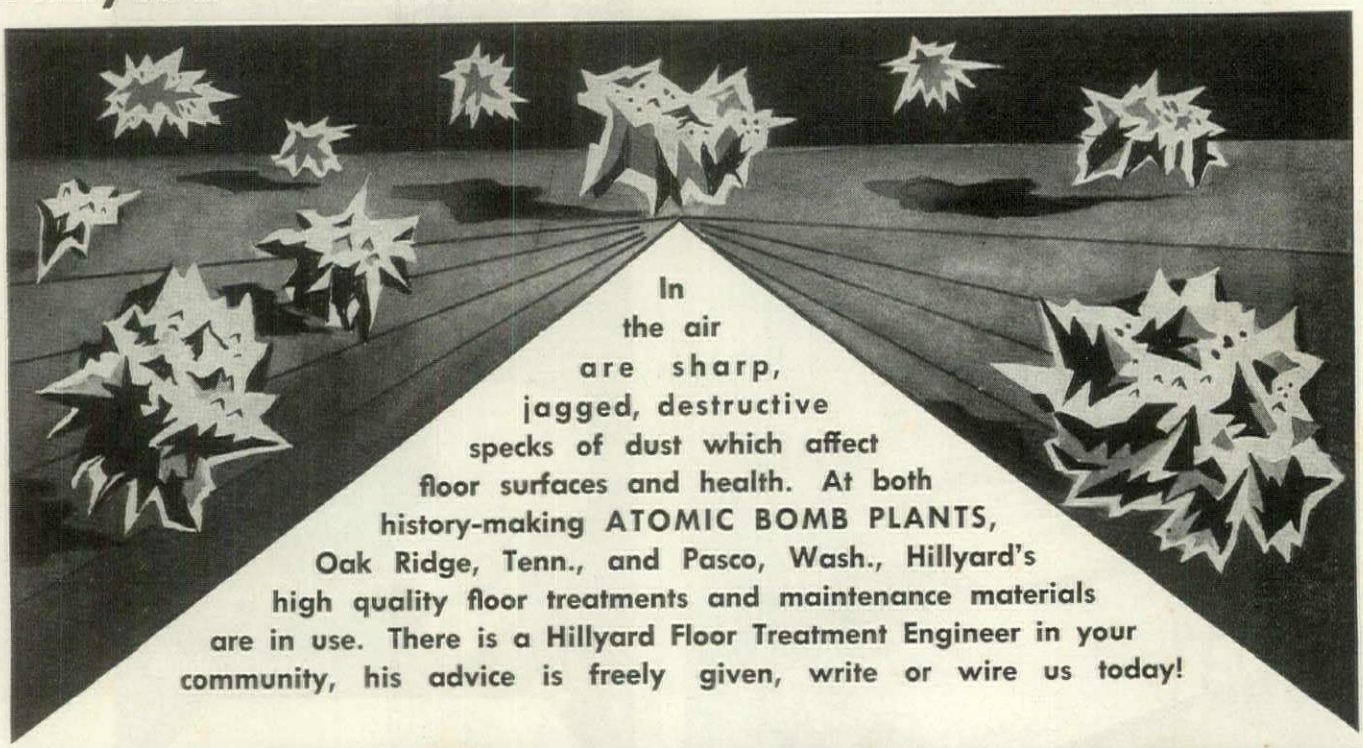

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GEO. D. ROPER CORPORATION, Rockford, Illinois, manufacturer of ROPER, *"America's Finest Gas Range"* for use with all gases, including L.P. (Liquefied Petroleum) gas.

The RODDISCRAFT Door Unit — a completely assembled and finished opening, is precision-manufactured throughout to architects' specifications. Furnished all fitted and finished with hardware attached — it is installed in one simple operation.

At least twenty costly and time-consuming operations at the building site are eliminated by the RODDISCRAFT Door Unit. Tests indicate that at least 12 RODDISCRAFT Door Units can be installed in the time taken to complete one opening by old-fashioned methods.

Manufacture and finish is exactly to architect's specifications by skilled craftsmen working with modern equipment. Uniformity of fit and finish is absolutely assured.

The completely finished opening is guaranteed by the RODDISCRAFT Bond, and identified by the permanent, built-in, red-white-and-blue dowel. There can be no question of responsibility for materials, workmanship, fit, and finish when you specify RODDISCRAFT.

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KANSAS CITY 8, MISSOURI, 2729 Southwest Blvd.
LOUISVILLE 10, KENTUCKY, 1201-5 S. 15th St.
LONG ISLAND CITY, N. Y., Review and Greenpoint Ave.
MARSHFIELD, WISCONSIN
MILWAUKEE 8, WIS., 4601 W. State St.
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DEALERS IN ALL PRINCIPAL CITIES

See Sweet's Architectural File for complete door line and specifications

Roddiscraft

RODDIS LUMBER & VENEER CO.

MARSHFIELD, WISCONSIN

(Continued from page 208)

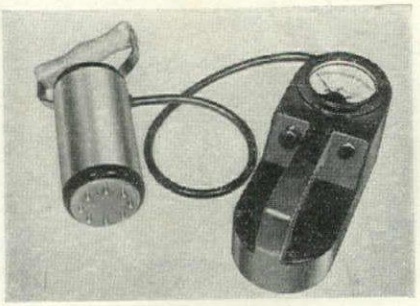
to anything from a buzz saw to a thresher. The new model, finished in bright colors, embodies the same engineering principles—balance of power, weight, size, four wheel drive, dependability and ruggedness—that were found in the useful scout car. Improvements in the transmission include wider gears, better lubrication and larger bearings. Comfort features of the military jeep have been improved and new equipment and accessories have been developed. Adequate shock absorbers and springs, cushioned seats, heater, front and rear tops, roominess and ease of riding are a few of the improvements. Other important changes include a new combustion chamber to increase power; a radiator shroud to provide more effective cooling for continued low-gear driving; a larger clutch to step up power in starting; steering linkage redesigned to provide ease of handling; greater rigidity of the chassis frame to absorb load of heavy draw-bar work, and gear shift lever placed on the steering column. Many special accessories are available to widen the range of the new jeep's usefulness.

Manufacturer: Willys-Overland Motors, Inc., Toledo, Ohio.

CHECK VALVE

Innovation in check valves eliminates poppets or other metal working parts.

Designed along new principles, backflow is checked by a Neoprene synthetic rubber tubing which offers positive control. The tubing easily opens with either vacuum or pressure, permitting direct flow and closes when the flow is stopped. It is claimed that the valve can be used with air, natural gas, commercial liquids including petroleum products or any chemical that will not attack synthetic rubber. The Permatite Valve is now available for working pressures up to 125 p.s.i. in ½, ¾ and 1-in. sizes and other standard sizes will be manufactured. Harman Equipment Co., 937 Sante Fe Ave., Los Angeles, Calif.



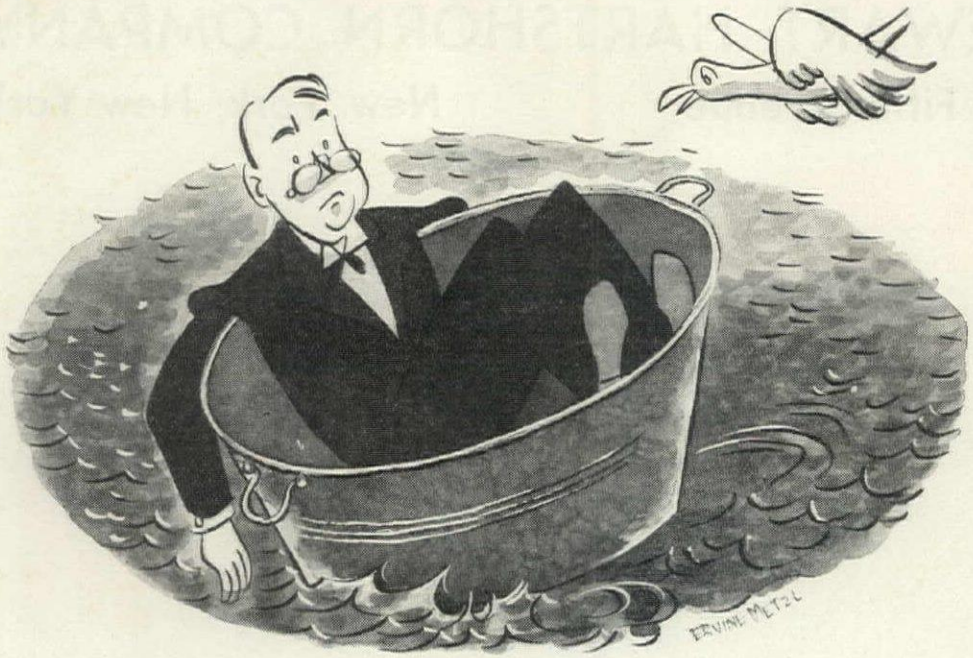
SILICONE RUBBER

New material combines heat resistance with compressibility or elasticity.

Silastic, the Dow Corning Silicone rubber, is now available and produced in various stocks for molding, extruding, coating and laminating. These rubbery organo-silicon oxide polymers remain elastic after heating at temperatures up to 500°F and retain flexibility at temperatures as low as -70°F. Also available are Silastic stocks compounded for coating glass or asbestos cloth to produce flexible, waterproof, heat stable, oil resistant gaskets, diaphragms, tape and electrical insulation which is non-tracking, arc and oxidation resistant. Silastic coatings adhere to glass, vitreous enamel, iron, steel and aluminum and are resistant to oil and salt brines at elevated temperatures. Dow Corning Corp., Midland, Mich.

(Continued on page 220)

QUICK QUIZ:



Are you all at sea about these problems?

Selecting air conditioning equipment that uses minimum areas for air distributing systems?

Obtaining air conditioning or refrigeration equipment that fits the exact requirements of the job?

Selecting a system for individual room control?

Being sure the system selected will keep operating and maintenance expenses at a minimum?

Being certain that air conditions can be controlled with dependability?

Obtaining uniform distribution of conditioned air to all areas?

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Carrier Corporation, Syracuse, N.Y.

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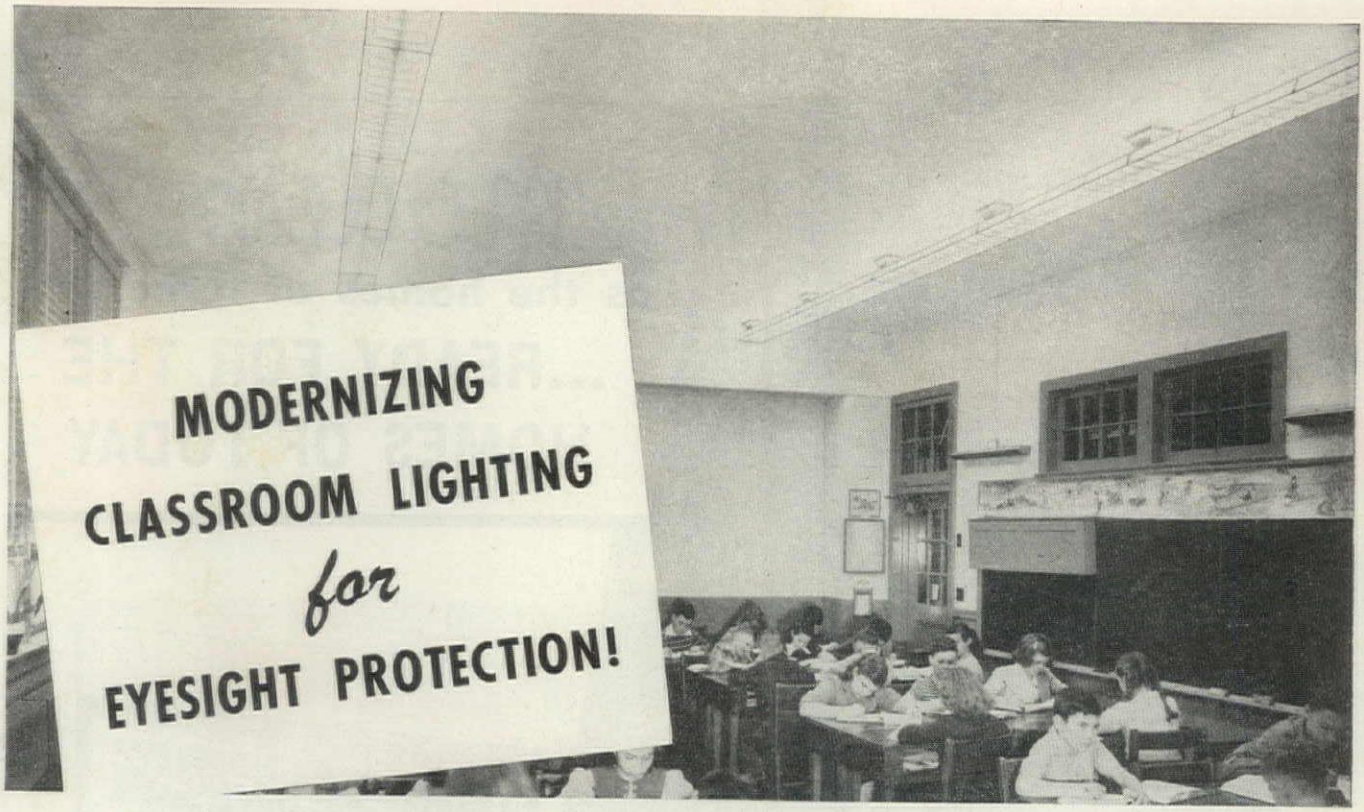


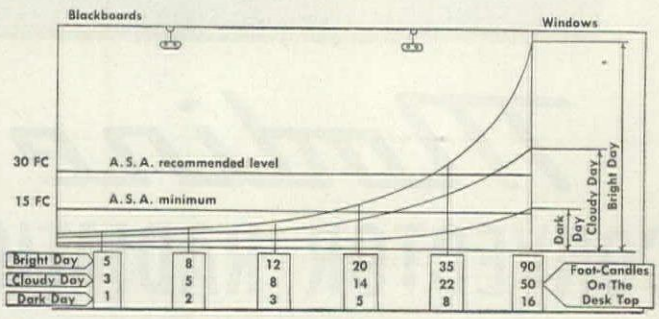
MODERNIZING CLASSROOM LIGHTING *for* EYESIGHT PROTECTION!

Here's the story in three pictures. The diagram chart at the right shows why lighting modernization is important . . . shows how unfair natural lighting is to the eyes of students in the inner rows.

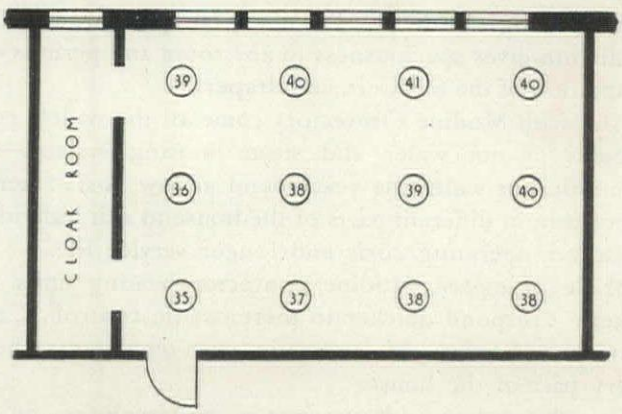
The photo above shows what one school did about it. This is a typical 20′ x 30′ standard classroom, relighted with two continuous rows of Wakefield GRENADIERS (PG-2483). Through the choice of these units, considerable saving in wiring time was made since wire could be run along as an integral part of the fixture. Incidentally, GRENADIERS required only about one-third the number of outlets needed for previous types of lighting. Separate switch controls were provided for each row of units.

The floor plan, lower right, shows the result: generous, well-distributed, eye-aiding light as indicated in this record of desktop lighting levels (after 100 hours' service).

This lighting treatment may not be the answer for class rooms you're planning. But you can be sure of this: Wakefield can help you find the answer. Write The F. W. Wakefield Brass Co., Vermilion, Ohio.



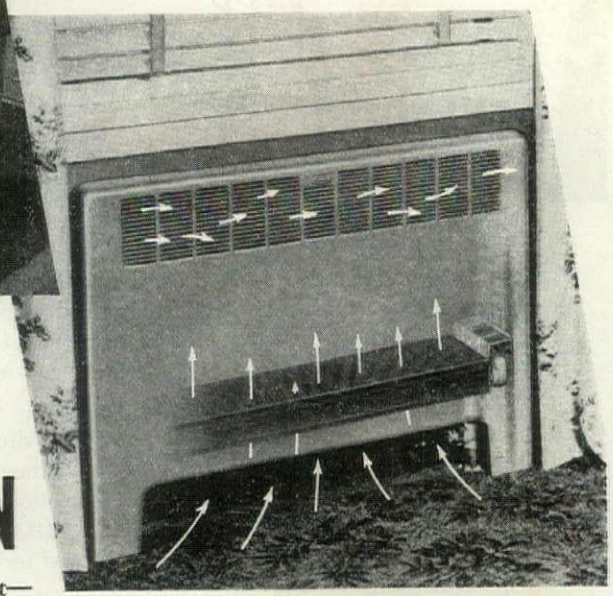
How natural light falls off away from windows



Footcandles on desk tops with GRENADIERS

modern

as the homes of tomorrow ...READY FOR THE HOMES OF TODAY



Modine CONVECTOR RADIATION

All homes being built today—the modest as well as the finest—can have the full freedom of truly modern living. Every room can be a delight to the eye. Extremely compact, Modine Convector Radiation gives spaciousness to any room and permits more deft adaptation of the furniture and drapery.

And with Modine Convectors come all the widely recognized benefits of hot water and steam heating systems—abundant domestic hot water the year round at low cost . . . temperature regulation in different parts of the house to suit individual needs . . . lower operating costs and longer service life.

Made of *copper*, Modine convector heating units warm up faster . . . respond quicker to thermostatic control . . . assure the luxurious comfort of automatic even-temperature heating for every part of the house.

Smartly modern and attractive in the simplicity and symmetry of their lines . . . Modine Convectors are always the reflection of good taste. Finished inconspicuously to match the walls, they blend harmoniously with room furnishings.

Prospective home owners appreciate the luxury heating of Modine Convector Radiation and the lasting satisfaction which results from the selection of a good heating system.

MODINE MANUFACTURING COMPANY, 1736 RACINE STREET, RACINE, WISCONSIN

HOW A CONVECTOR OPERATES

A Modine Convector has two basic parts . . . the attractive steel *enclosure* . . . and installed in it the *copper heating unit* through which steam or hot water circulates. Cooler, heavier floor-line air is drawn in through lower opening of the enclosure, is heated, rises and is circulated into the room through the grille. There's a gentle, constant, healthful circulation of warmed air by natural convection. No gusty blowers, no motors or other moving parts. The warm enclosure front provides added panel or radiant heating directly beneath windows, where convectors are usually installed, and where radiant heat loss is greatest.

SEND TODAY

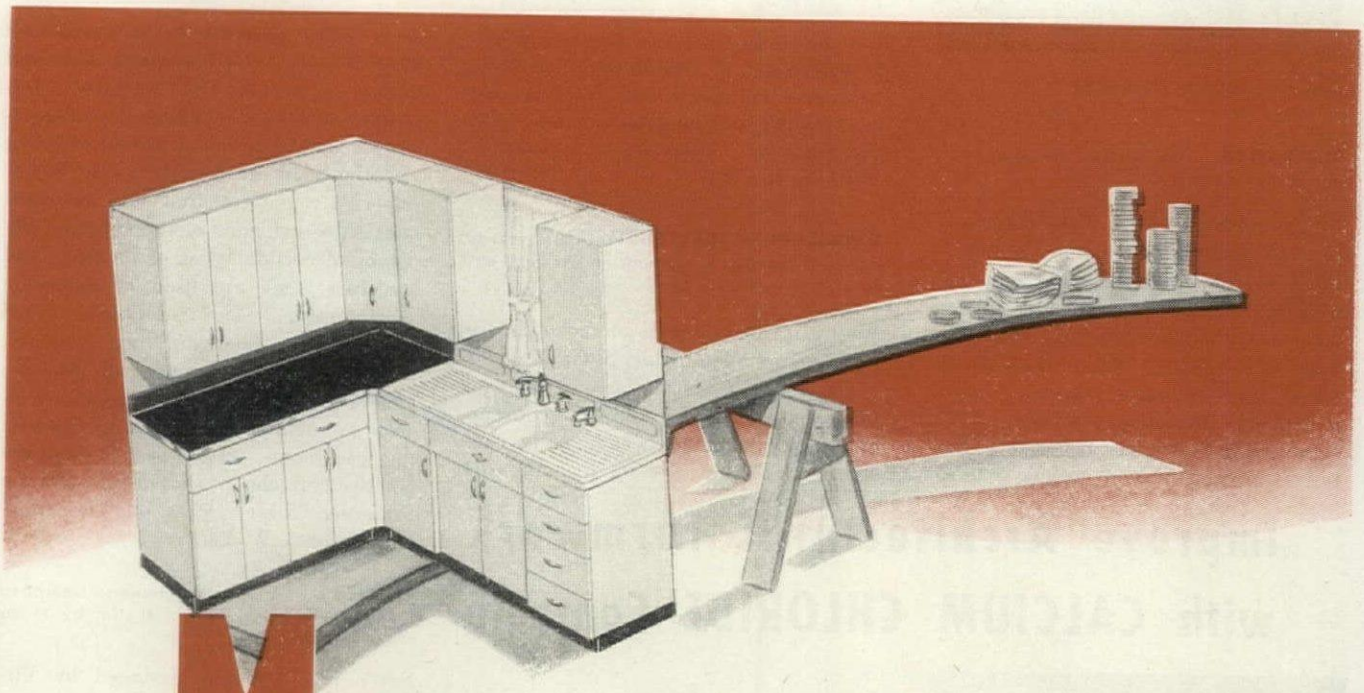
for Bulletins 245 and SA-44

•

Filed in Sweets

Look in your phone book for Modine representative's name —"Where to Buy It" section.

Modine Convectors



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AMERICA'S home builders can be proud of the progress they have made, year after year, in designing and building finer homes for less money.

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After the war, Youngstown again will join forces with America's builders, producing more kitchens for the money than ever before—helping keep the tide of better home values rising.

Send for the new catalog describing the Youngstown "Builder's Kitchen."

Until the last shot is fired — buy bonds — give blood — salvage fats and paper — work for Victory. Then do your part to . . .

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City & Zone ..... County ..... State .....

TECHNICAL LITERATURE

(Continued from page 214)

DEAERATION. Cold Water Deaeration, 4 pp., 8½ in. by 11 in.

Reprinted from *Power Plant Engineering* this pamphlet explains the use of the Cochrane Deaerator. By removing oxygen and carbon dioxide from process water, corrosion to piping and equipment is eliminated. While the common use of the cold water deaerator is new, it embodies the same principles of design used in boiler feed deaerators. This type equipment presents a new application for industrial and municipal use. It will result in considerable economy by saving chemicals and by protecting steel piping and equipment from rapid deterioration. Cochrane Corporation, Philadelphia, Pa.

SCHOOLHOUSE CONSTRUCTION. Standards for Schoolhouse Construction, 84 pp., 6¼ in. by 9 in. Price $1.00.

West Virginia Council on Schoolhouse Construction offers in *Standards for Schoolhouse Construction* a program for safe, healthful buildings, conveniently arranged and economically constructed. The purpose of the standards is to make available to inexperienced schoolboards, school administrators and architects, accumulated screened information on school buildings based on recorded and scrutinized school building experience in the last 50 years. Where experience and research have disclosed conclusive evidence of the superior efficiency of certain types of facilities and structure, they are used as minimum requirements. The standards cover planning a school building program, selection and development of the site, general building characteristics, construction details, instruction and special purpose rooms, service systems and the one teacher school. Div. of Schoolhouse Planning, State Dept. of Education, Charleston 5, W. Va.

KITCHENS. Today's Kitchens — Designed for Better Living, 18 pp., 8½ in. by 11 in. Price 9 cents.

Seven new kitchens designed by Virginia Hart, kitchen consultant, are presented complete with sketches, layouts, color combination suggestions and a list of the Kitchen Maid units used in the plans. New ideas in kitchen planning such as the combination kitchen-laundry, the serve-through shelf to the dining area, and nursery nook for baby are featured. A Pennsylvania Dutch kitchen, the small compact work center for the veteran's home and designs for kitchens in colonial and solar homes are included. The Kitchen Maid Corp., Andrews, Ind.

FIRE PROTECTION through Modern Building Codes. By B. L. Wood, American Iron and Steel Institute, 350 5th Ave., N. Y. C.

Developments in the building construction industry in recent years have caused building code regulations to become antiquated and obsolete. Of special importance and urgency is the need to amend immediately those building codes which do not now permit the use of proven and tested technological developments. This book is a study of various research investigations, fire tests, structural tests, and surveys correlated to stimulate clearer thinking in the preparation of fire protection regulations for building codes. A limited number of copies are available to those interested.

WELDING. The Saxe Welded Erection System, 4 pp., 8½ in. by 11.

Bulletin 4 is a short explanation on the advantages of the Saxe welding system for steel construction. Photographs and details show the "hook and eye" principle for setting up and aligning steel members before welding. Available also on request is the complete *Manual*. J. H. Williams & Co., 400 Vulcan St., Buffalo, N. Y.

(Continued on page 226)

Higgins

—pioneer in many fields, has far-reaching plans now nearing completion, that will be important to all types of construction. In the near future we will announce the first* of a series of radically new materials and construction methods which will be dedicated to making America a still better place in which to live and work.

Higgins

PLASTICS CORPORATION, NEW ORLEANS

*First to be announced will be Cement-O-Cell, an entirely new, light-weight building material of extremely high insulating and sound-absorbent value.

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BY THE SIZE OF YOUR FLOOR PLAN!

No matter how large the size of the rug you want, RUGCROFTERS, Inc. is geared to fashion it in any shape, any dimension, in any variety of colors or monotones.

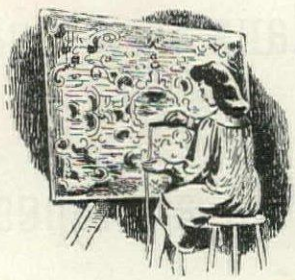
We can hand-hook, carve or shear rugs to suit any type of interior, be it a home, office, hotel lobby, institution, ultra-modern apartment, or movie-palace.

We encourage industrial designers and decorators to submit sketches to us, from which we can custom-fashion rugs. Rugs of beauty that have the ability to withstand constant wear.

Custom Art

We also "custom-create" broadloom "wall to wall" carpeting, according to your exact specifications.

100% pure Wool yarns used in these seamless rugs. Inquires are invited.



RUGCROFTERS, Inc.

Makers of "Rugs with a Century Ahead of them".

Carnegie Hall Art Gallery, Carnegie Hall, New York

IT'S A CELLAR FIRE ESCAPE *TOO!*

BILCO *Copper Steel*

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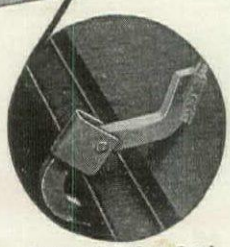
CELLAR BULKHEAD

FOR ACCESSIBILITY PERMANENCE SECURITY

You give the home cellar real utility when you provide a direct-to-the-yard cellarway. And in modern cellars with game rooms and workshops, *safety* demands a second exit. BILCO Hatchway Doors provide a modern, trouble-free and attractive outside entrance. Copper steel lasts a lifetime. Leak-proof, warp-proof, fire-proof, termite-proof and burglar-proof. Can't be blown or knocked shut.



Automatic Safety Catch

BILCO also specializes in
BULKHEAD DOORS • STEEL ROOF SCUTTLES • SIDEWALK DOORS

FILL OUT AND MAIL THIS COUPON TODAY!

The BILCO Manufacturing Company
162 Hallock Avenue, New Haven 6, Conn.

Please send me specifications and prices of Bilco copper steel cellar bulkheads for homes and other structures.

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Address.....

City..... State.....

Your Dealer's Name.....

Though the back-fill settles LUX-RIGHT AREAWALLS hold *fast* to foundation

Because MASONRY NAILS KEEP THEM ALWAYS IN PLACE

THE PERFECT RETAINING WALL

Lux-Right Areawalls

If a retaining wall "pulls away", it's bound to cause dissatisfaction. *LUX-RIGHT AREAWALLS STAY PUT. They never sag. This means a neat, trim foundation line on every job. No complaints. No back-calls.

LUX-RIGHT AREAWALLS are made of heavy gauge, special corrugated steel, completely HOT-DIPPED GALVANIZED *AFTER* fabrication. Maximum rust resistance. Two types: Straight and Round. All standard sizes. See your distributor-dealer, or let us send you free folder.

*TM Reg. U.S. Pat. Off.

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ORDER NOW

Our plant, once devoted to war work, already is turning out the Products of Peace. Send us your Areawall orders at once.

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1885—Sheet Steel Fabricators—1945

So. End Wabasha Br., Dept. AF4 Saint Paul 1, Minn.

a *BIG* question?

HOW TO HEAT YOUR BUILDINGS ON A LIMITED BUDGET

...and—

THE THRIFTY ANSWER:

Yes, the Answer is: Reading "Barley Size" Anthracite.

12% to 15% SAVING—In New England, the Middle Atlantic States and Canada—the lower price of this small-size hard coal, as compared with larger sizes, reduces heating costs 12% to 15%.

ALL YOU WANT—There is no shortage of Reading Barley Anthracite. It is now available in any amount, and may be stored without fear of deterioration or spontaneous combustion. It is *not* a "substitute" fuel, but is simply a small size of Famous Reading Anthracite.

AS TO QUALITY—Famous Reading Anthracite holds the Certificate of Merit awarded by the Pennsylvania Department of Commerce.

Reading Barley Anthracite is genuine *laundered* coal... scrubbed with water and sand at the mines until it is as nearly 100% pure as coal can be. It is a *preferred* fuel among large industrial users, due to its economy and efficiency. It performs equally well with hand-fired equipment (either forced or induced draft) or on traveling or chain grate stokers. The coupon below will bring full information.

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READING ANTHRACITE CANADIAN COMPANY, Limited, Toronto, Ontario; Montreal, Quebec

Philadelphia and Reading Coal and Iron Company,
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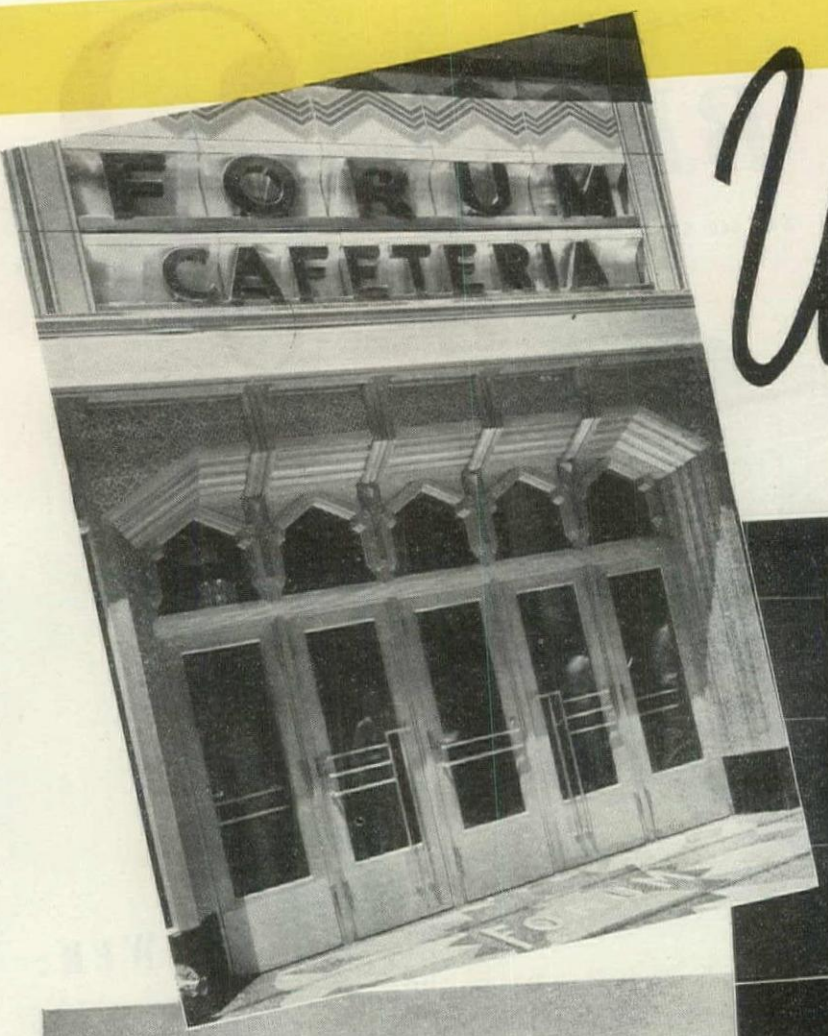
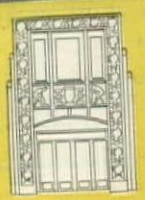
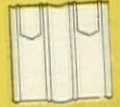
Unlimited . . .




STAIRS


DECORATIVE GRILLES


ENTRANCE DOORWAY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. . the ways you can use ARCHITECTURAL METALS!

For decorative beauty or practical utility architectural metals can help you solve many problems.

Their extreme versatility—both in the ferrous and non-ferrous metals—is one of the main reasons you should specify them. They can be shaped and fabricated to your own desires. You can use them in the way you want, for what you want.

Whether the new structures you are now designing be towering skyscrapers or modest residences; whether they be ornate monumental buildings or modern streamlined factories, architectural metals can help you achieve the effects you want. You'll find, too, that they add "the mark of distinction" to any building.

Use architectural metals for both beauty and utility, when you design the entrance, the stairways, balustrades, windows, grilles, etc. Use them, too, for strength and protection in fire escapes, safety ladders and other service equipment.

Architectural metals are now available for immediate use. Include them in your plans. For a free Directory of Leading Architectural Metal Fabricators who are anxious to serve you, write to Dept. F-10.

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ORNAMENTAL METAL MANUFACTURERS

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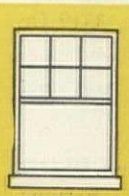
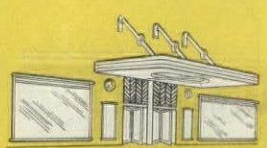


NON-FERROUS WINDOWS

FLAGPOLE BASE



STORE FRONTS AND MARQUEES

FIXTURES

HAND RAILINGS

TECHNICAL LITERATURE

(Continued from page 220)

CONVEYOR. Faster Handling With Lamson Lightweight® Portable Gravity Conveyor, Costs Less, Does More, 4 pp., 8½ in. by 11 in.

The ease of setting up and using a Lamson Lightweight Portable Conveyor and the various handling jobs it does economically, are featured in this folder. Specifications for various parts of the conveyor are also included. Lamson Corp., Syracuse 1, N. Y.

PLASTICS. By J. H. DuBois, American Technical Society, Publishers, Chicago, Ill. Price $3.75.

This book, now in a third edition, is designed to give a thorough knowledge of the production of plastics. The formal chemistry of plastics is omitted but tables of characteristics and properties cover the subject for engineers and designers. This is not a chemist's book on plastics but one written for the manufacturer, designer and consumer of plastic products. The various processes of molding and techniques of finishing are described in detail. The book is well illustrated by photographs and line drawings.

CAREERS FOR CELLULOSE is the name of an all color, all sound film produced by the Hercules Powder Co., which traces the manufacture of cellulose plastics from the cotton field to the finished plastic article. A behind-the-scene story, the film shows cotton being transformed into cellulose and other bases for plastics, lacquers, film, rayon and other articles, at company plants in Parlin, N. J. and Hopewell, Va. It follows the cellulose materials from the plant to the testing laboratory and finally to the actual manufacture of a variety of plastics. The sound-track is being translated into Spanish and Portugese for Latin American showings. Prints are available at no cost for showing in this country. Hercules Cellulose Products Dept., Wilmington, Del.

REQUESTS FOR INFORMATION

ALLIED MARKETS INC., 13 Astor Pl., New York, N. Y. are interested in receiving information from building material and equipment manufacturers who desire to export their product outside of the U.S.

JOE G. NAMAN, 12 Rue Graham, Beyrouth, Liban, is interested in receiving information on agencies for building machinery and products.

WALTER G. NICHOLSON, 134 London St., Duendin C2, New Zealand, would like to receive literature from manufacturers of kitchen and bathroom equipment.

LUCIEN BOURCIER, consulting engineer and architect, 131 Rue Legendre, Paris, France, would like to receive information and literature on: air-conditioning, heating, indirect lighting fixtures and electrical equipment for homes with the possibility of having agencies in France and other European countries.

ROBERT M. BERNADEAU, mechanical engineer, 1241 Huntley Dr., Los Angeles 26, Calif., would like to receive information on agencies for prefabricated houses and home units, heating and air-conditioning equipment, small tools and woodworking machinery for France and European countries.

REQUESTS FOR LITERATURE

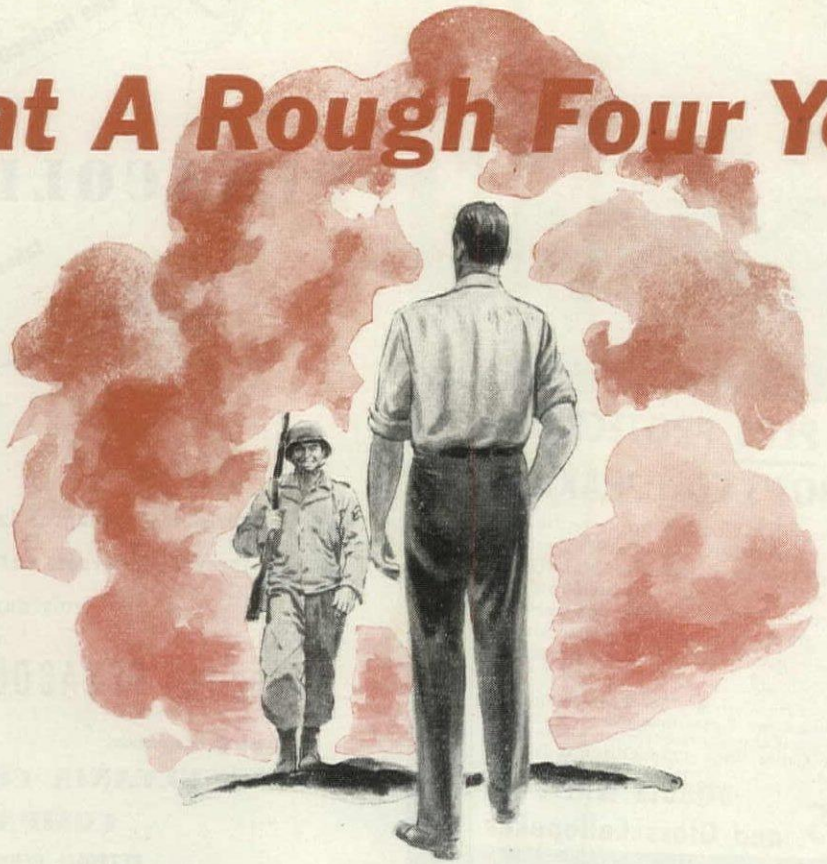
HARVEY ROBERTSON, architect, 16A Irving Pl., Summit, N. J.

J. V. LEBLANC SR., construction engineer, Apex Construction Co., 3319 Orleans Ave., New Orleans 19, La.

FRED H. HALSEY, architect, P.O. Box 148, Texarkana, Ark.

T. H. PICKSTONE, Formby and District Estate Co., 15 Church Rd., Formby, Liverpool, England.

What A Rough Four Years



...And before we could take a deep breath, we were given another challenge—adapting *without delay* new developments, new techniques to civilian uses.

We like to think of our wires and cables as we think of the veterans now returning to civilian life. These veterans will not be the same people we sent off to war. They are battle-tested—they have grown up—they are ready to take on greater responsibilities than before.

Our wires and cables, too, are ready to take on new responsibilities. They have had to do jobs tougher than any wire ever faced . . . wherever the war took them—and it took them everywhere . . . moist, steaming jungle to bleak, frozen wastes. Whatever the conditions and demands—they came through the better for them.

What does this mean to the Architectural Engineer? Just this—a new and complete line of merchandise made up of such products as Building Wire with rubber, synthetic, and plastic insulations (including Laytex*—smaller in diameter and lighter in weight), Lead Cables, Royal Line of Rubber Jacketed Portable Cords and Cables, Non-Metallic Cables, Flexible Cords, and many others . . . all more highly developed, more efficient than ever before.

Yes, it was a tough four years . . . we learned a lot . . . and now our new knowledge belongs to you.

*Reg. U. S. Pat. Off.

U. S. ELECTRICAL WIRES AND CABLES

Serving Through Science

UNITED STATES RUBBER COMPANY

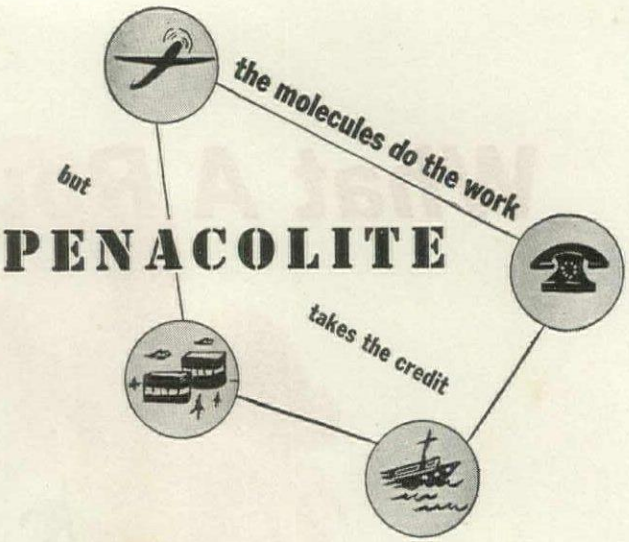
1230 SIXTH AVENUE • ROCKEFELLER CENTER • NEW YORK 20, N. Y.

Beauty PLUS PROTECTION FROM CABOT'S COLLOPAKES!

To accent the beauty of any home or building use Cabot's Collopakes! They are superior because their pure pigments have been reduced to submicroscopic fineness, then united inseparably with wear-resistant oils! This means Cabot's Collopakes have greater covering power—show no brush marks—give extra beauty—protect longer!

WRITE TODAY for your free copy of "The Little White Book," containing many illustrations and complete information about Cabot's prize-winning Collopakes! Samuel Cabot, Inc., 1274 Oliver Bldg., Boston 9, Mass.

CABOT'S DOUBLE WHITE *and* Gloss Collopakes



. . . for permanent gluing of laminiated construction
forever heatproof, waterproof, weatherproof
truly durable in every climate

Specify: PENACOLITE G - 1131

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PENNSYLVANIA COAL PRODUCTS COMPANY
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THE POST-WAR

PRECISION-BUILT HOMES PROGRAM

is now ready

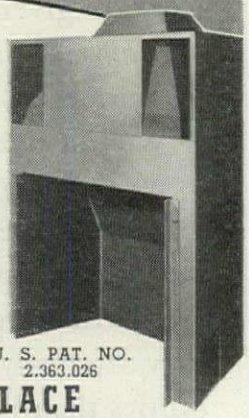
There is a place in this plan for

- the architect
- the contractor
- the operative builder
- the lumber dealer
- the realtor
- the lending institution
- the insurance company
- local labor

Kindly write on your letterhead for the details—specifying your interest. Find out what has been accomplished through ten years of intensive research—originated by The Housing Division of Homasote Company and now continued by this corporation.

PRECISION-BUILT HOMES CORPORATION
TRENTON 3, NEW JERSEY

For OUTSTANDING PERFORMANCE— For LOWER CONSTRUCTION COSTS . . .



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CIRCULATOR FIREPLACE

If you want a fireplace to be functional as well as good looking—if you want to save on construction costs—select the MAJESTIC Circular Fireplace. MAJESTIC's engineered design assures smoke-free performance and ease in laying masonry. "Radiant Blades," over which cool air from floor level is circulated, heated, and expelled into the room from grilles at mantle level, multiplies heating capacity . . . Adjustable frame adapts to any mantle design. The MAJESTIC Circulator Fireplace is truly the answer to the architect's and builder's fireplace problems. Write for complete information!

Also Outdoor Fireplaces
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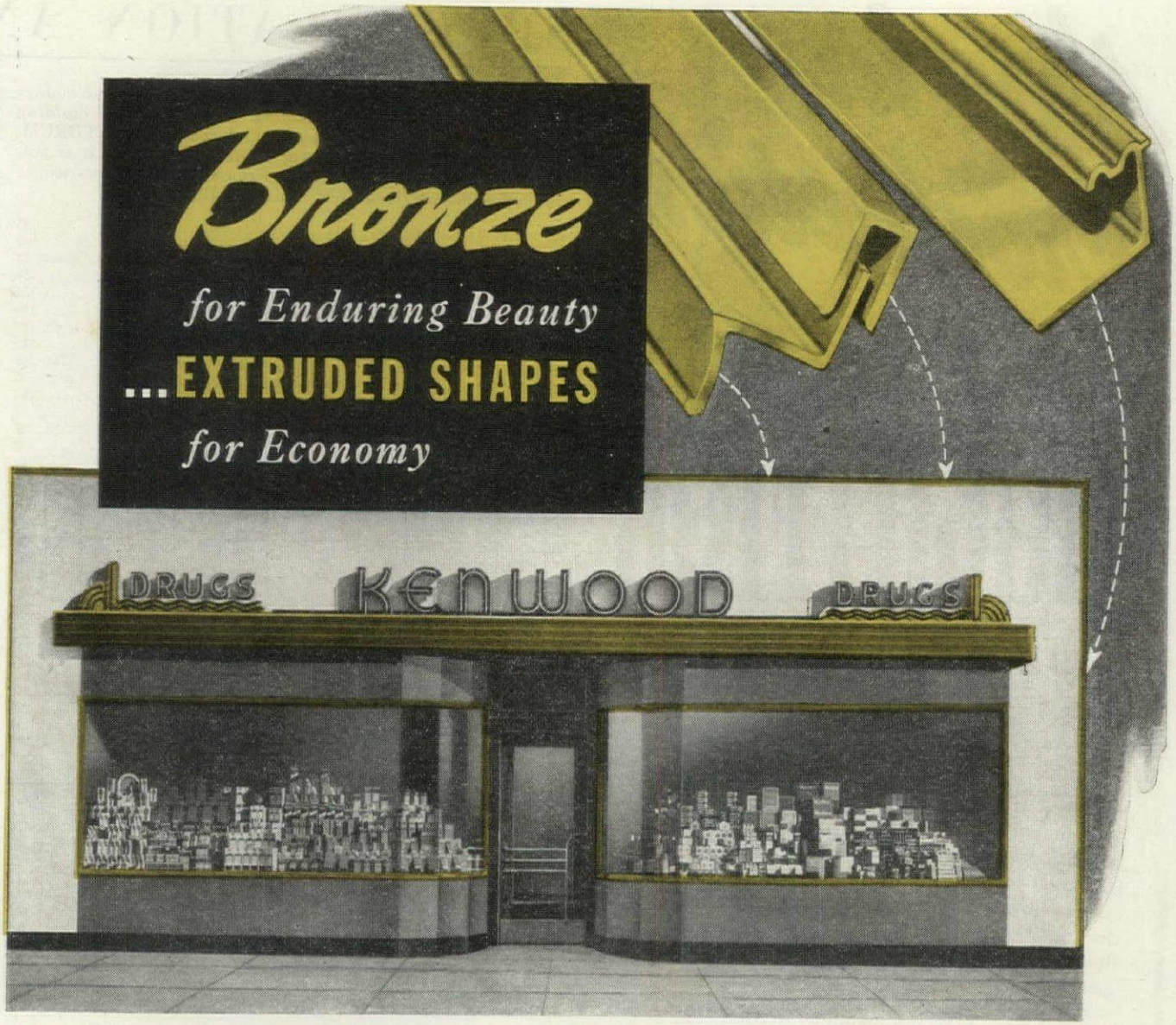


Kenwood Drug Company, Omaha, Nebraska. Store Front by Pittsburgh Plate Glass Company, Pittsburgh, Pa. Architects: John and Allen McDonald

AN AIR of friendly welcome and the distinction of modern design are effectively blended in this new store front, through the warmth and color of bronze.

Anaconda Architectural Bronze was used by the Pittsburgh Plate Glass Company for window trim and awning box. The same lustrous metal was also employed to frame the Carrara structural glass squares. The three extruded shapes employed for the latter are illustrated above in two-thirds actual size.

A metal of matchless color and beauty, Architectural Bronze is durable, rustproof, and resistant to atmospheric corrosion. It is readily adaptable to design, easy to clean, and its natural luster is preserved with only occasional attention.

The American Brass Company has for years been the leading supplier of Architectural Bronze, Copper and Nickel Silver in all wrought forms for ornamental work of every description.

4538

Buy Victory Bonds . . . Help assure World Peace

ANACONDA
from mine to consumer

Anaconda Architectural Bronze

THE AMERICAN BRASS COMPANY—General Offices: Waterbury 88, Connecticut

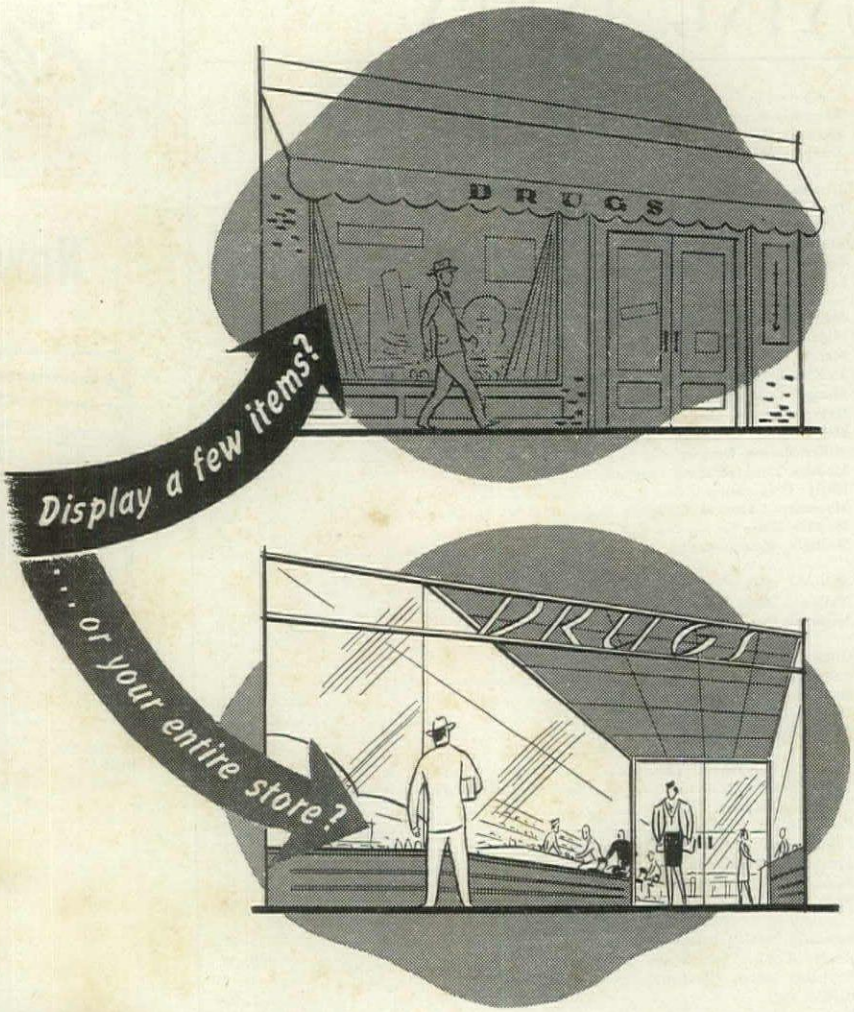
Subsidiary of Anaconda Copper Mining Company • In Canada: ANACONDA AMERICAN BRASS LTD., *New Toronto, Ont.*

SPECIFICATION AN

The advertising pages of FORUM *are the recognized market place for those engaged in building. A house or any building could be built completely of products advertised in* THE FORUM. *While it is not possible to certify building products, it is possible to open these pages only to those manufacturers whose reputation merits confidence. This* FORUM *does.*

BUYING INDEX

WILL YOUR STOREFRONT



THE VISUAL FRONT . . . makes all the difference!

The Visual Front merchandises the entire store to thousands of people who pass it daily. It gives passers-by a full view of the store interior . . . the soda fountain, merchandise display tables, luncheon booths, the prescription department and other sections to help increase store traffic.

With a Visual Front, the store looks pleasant, bright, easy to enter. The clear glass front, with the doors of L·O·F Tuf-flex tempered glass, floods the interior with natural light by day, creates a brilliant display at night.

There's *lasting* beauty in a Visual Front. Weather won't reduce its luster and appeal. The smooth, hard glass surfaces clean quickly, thoroughly. And glass doesn't require refinishing. It *always* looks good . . . and stays that way!

There are many forms of glass that you can use to make your next storefront a more powerful merchandising unit. Clear glass, translucent glass or opaque glass . . . structural glass, in a variety of colors . . . Thermopane, the hermetically-sealed, glass insulating unit . . . heat absorbing glass . . . glare-reducing glass . . . patterned glass. For full information, write for our Visual Front brochure. Libbey·Owens·Ford Glass Company, 71105 Nicholas Bldg., Toledo 3, Ohio.

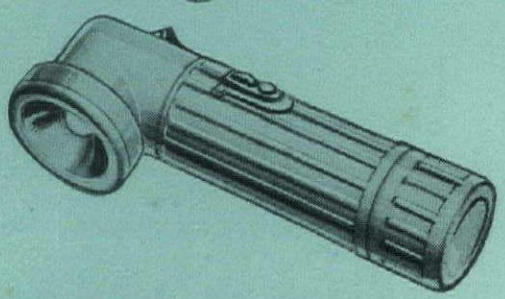
VISUAL O FRONT

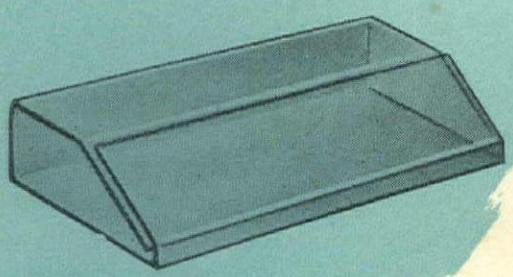
LIBBEY·OWENS·FORD
a Great Name in **GLASS**

Planning an improved product?

Take advantage of Celanese* custom-built Plastics

Do you know . . . that Celanese produces a flame-resistant thermoplastic (LUMARITH XF) with the high speed molding qualities of standard cellulose acetate? . . . that dial faces, covers, transparent shields and bezels can be molded to optical clarity from LUMARITH XZ? . . . that LUMARITH EC offers sub-zero toughness, warpage resistance, lightness and excellent moldability, all in one composition?





THESE are but a few of the new developments in Celanese cellulosic thermoplastics that soon will be available for civilian use. The war service of Celanese plastics include some of the toughest jobs thermoplastics have ever tackled: *aircraft control wheels molded over metal, corrosion resistant film insulation, interchangeable flashlight parts for arctic use, waterproof packaging of precision electrical parts, flameproof cable grommets for naval use, close-tolerance gas mask parts, instrument housings* . . .

These wartime applications tell a story of thermoplastic versatility that has important implications for the designer and manufacturer. Certainly, your plans for an improved postwar product will call for the best plastic available. We suggest that you take advantage of the war experience data collected by our technical staff. It will show you what you can expect plastics to do for you, and most likely indicate how production costs can be lowered. Celanese Plastics Corporation, a *division of Celanese Corporation of America*, 180 Madison Avenue, New York 16, N. Y.

LUMARITH* PLASTICS

MOLDING MATERIALS . . . FILMS
FOILS . . . SHEETS . . . RODS . . . TUBES

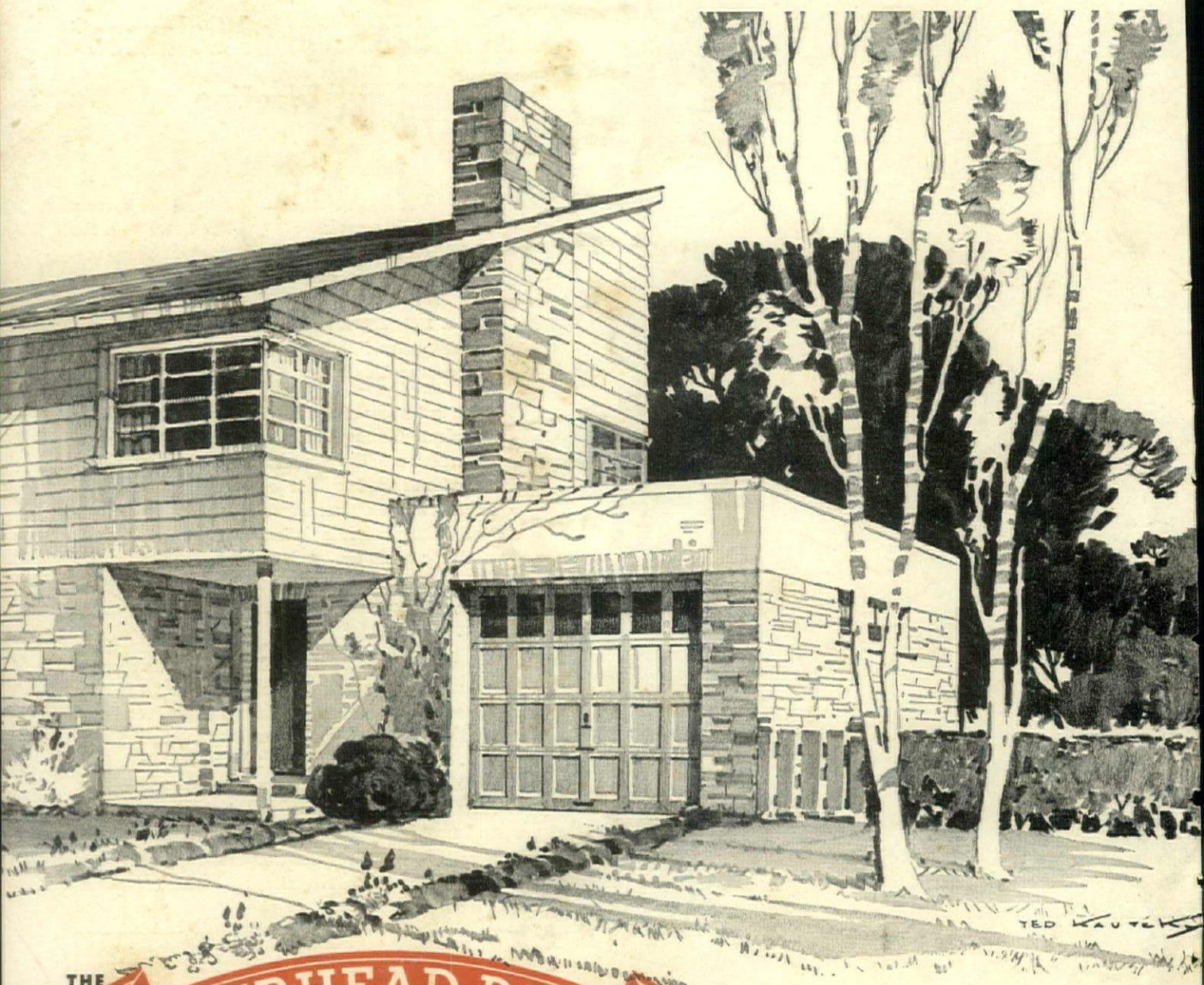
*Reg. U. S. Pat. Off.

A DOOR OF QUALITY for ANY Building

In the huge post-war building program now beginning, structures of all types and in every cost range will be built. Regardless of style of architecture or cost, installation of The "OVERHEAD DOOR" is an economy, for uninterrupted service is assured year in and year out.

The "OVERHEAD DOOR" with the Miracle Wedge is a door of quality. It is built as a complete unit to fit any size opening in all residential, commercial, and industrial buildings.

TRACKS AND HARDWARE OF SALT SPRAY STEEL



THE "OVERHEAD DOOR"
TRADE MARK
WITH THE
MIRACLE WEDGE

Any "OVERHEAD DOOR" may be manually or electrically operated. Sold and installed by Nation-Wide Sales—Installation—Service.

OVERHEAD DOOR CORPORATION • Hartford City, Indiana, U. S. A.