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MAY 1931

PENCIL POINTS

A JOURNAL FOR
THE DRAFTING ROOM

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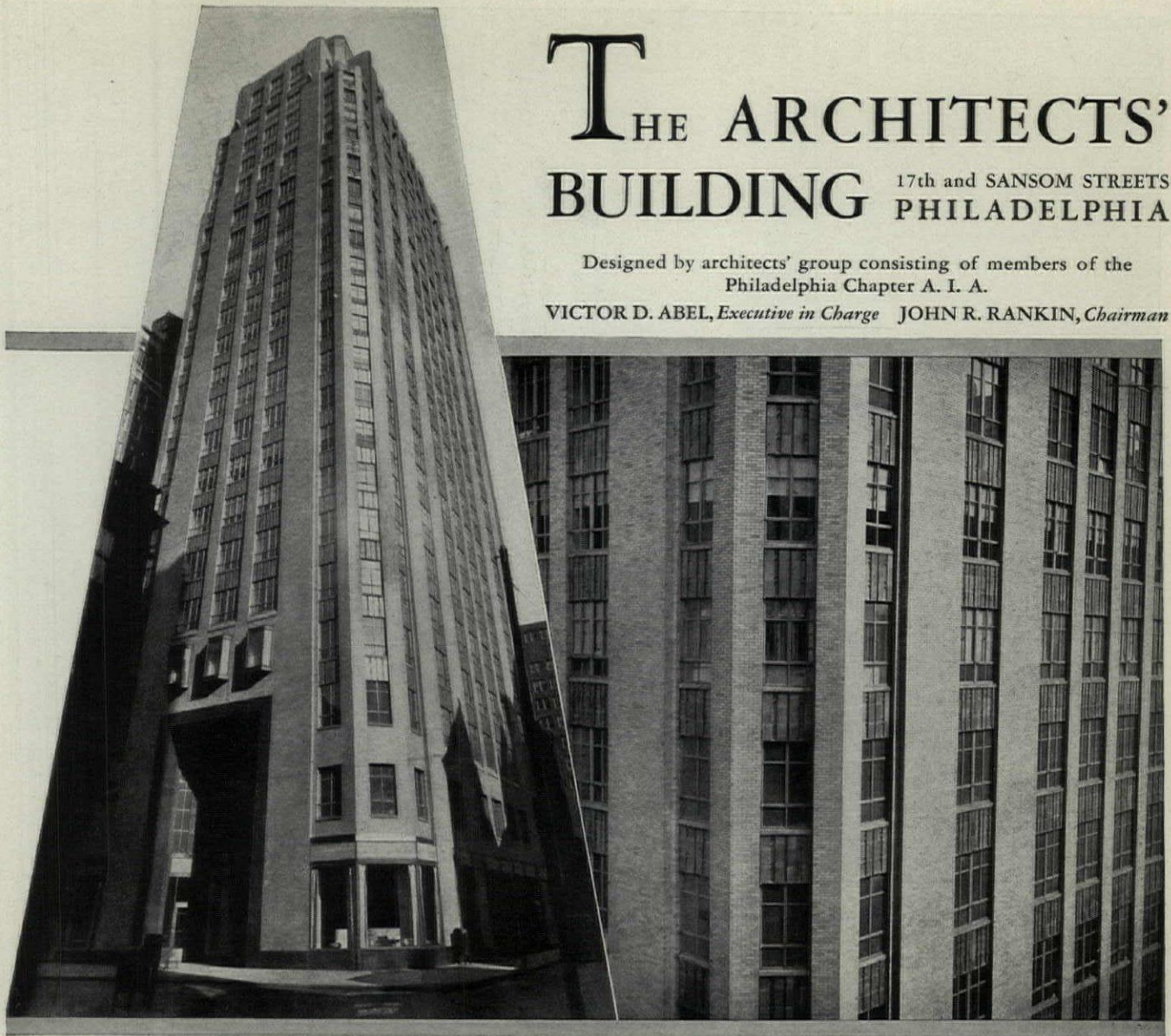
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For the full details we suggest that you send for a copy of "Acoustical Correction" which gives complete data on Armstrong's Corkoustic as well as many interesting facts about sound-correction. Or if you have a specific problem you will find Armstrong engineers always willing to consult with you, without obligation. Armstrong Cork & Insulation Company, 902 Concord St., Lancaster, Pennsylvania.



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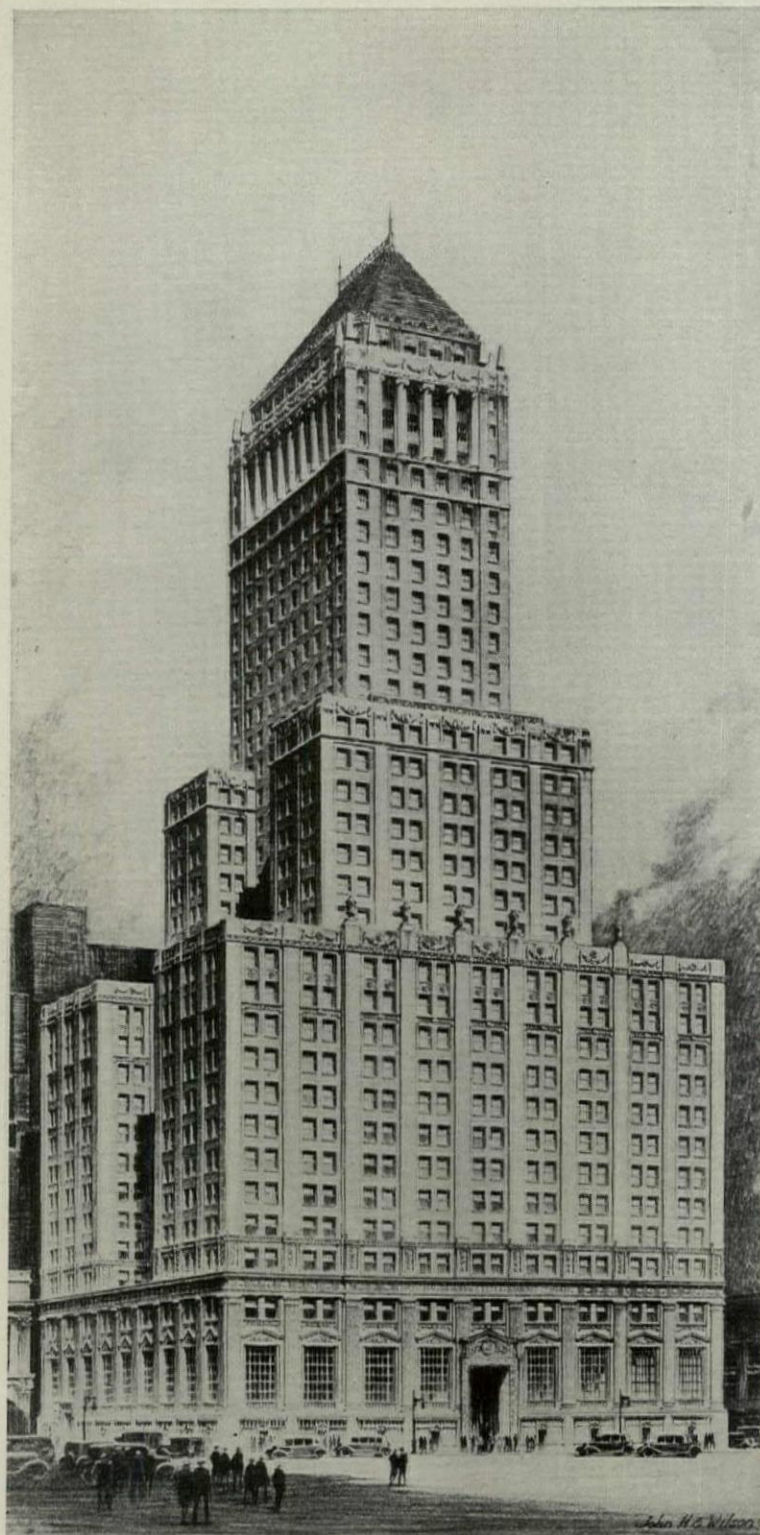


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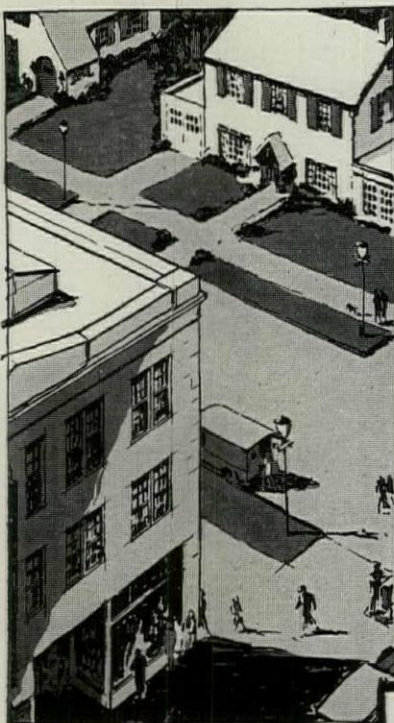
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Included in it are many exclusive features—both of design and construction—to make it the best possible boiler investment for the smaller buildings.

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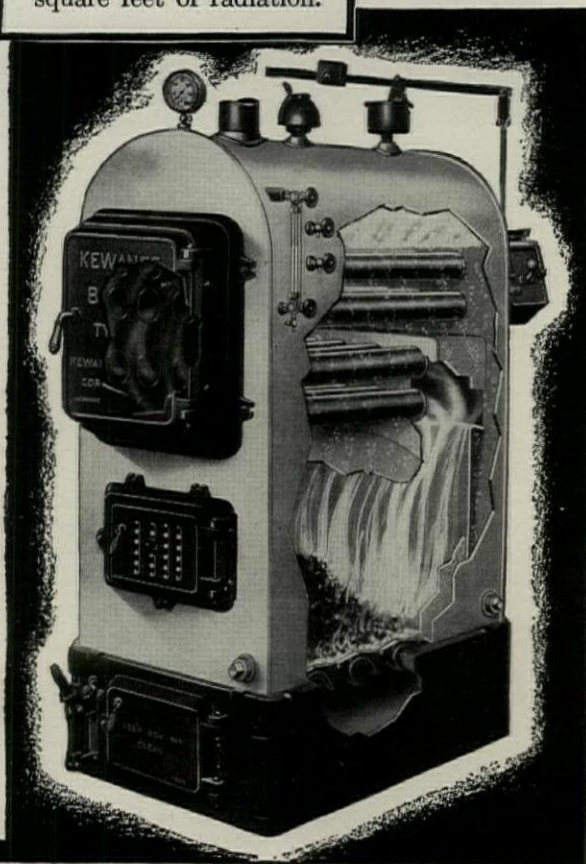
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He Fights Plumbing Failure and High Costs

Faulty design, inferior construction or improper layout of plumbing in schools, hospitals, industrial plants, public buildings and similar places, can develop into serious menaces to health and efficiency.

For failure in such installation creates unsanitary conditions, pollution and disease germs.

But in addition, such failures represent a very tangible waste in dollars for repair and replacements, which often amount to terrifying figures.

It is the job of the Clow Soldier of Sanitation to make sure that each installation, on which he is called in, pro-

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To back him in this important work, Clow goes to extreme lengths in the factory.

For example: every battery of urinals, closets, lavatories and similar fixtures is set up according to specifications before shipment—and tested under conditions bordering on actual service.

Such plumbing is not intended to fail, wear out rapidly or to be rejected after partial installation.

And builders, architects, owners and plumbers have the assurance of perfect sanitation, with the lowest possible cost, through the years.



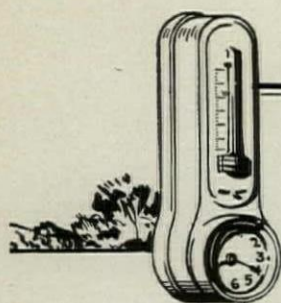
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Any type of control works better with the IMPROVED Type "R" System . . .



With oil and gas fuels gaining in popularity ordinary heating systems develop "complications". Instead of a steady flame varying slowly in intensity the newer fuels produce an intermittent burning—off a few minutes and then on full blast.

In *unbalanced* systems this means cold radiators, then hot radiators, particularly where the burner is controlled by a thermostat in a so-called "key" room. It means underheating in some rooms and overheating in others, depending on how well the thermostat has been located.

With the same situation and an IMPROVED Type "R" System, practically any room in the house is a "key" room because *all radiators in the house receive steam at the same time and in proportion to the need for steam*. Room temperatures are surprisingly even, regardless of their distance from the source of heat, and maintain that uniformity in spite of fluctuating pressures at the boiler.

This remarkable improvement in heating service is accomplished by incorporating in the well-known Webster Type "R" System a series of specially selected metering orifices at the entrance to every radiator

... restricting the flow of steam in varying degrees so that the "pressure drop" is *equalized* and *balanced* throughout the entire system. The results . . . Quick heating-up, more even room temperatures, better control with the newer fuels, the newer types of light weight radiation and the new regulating devices. Better performance too, with the older fuels and cast iron radiation.

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All that is necessary to assure your clients of the marked advances in heating comfort and economy afforded by Improved Webster Type "R" Systems is to incorporate three short paragraphs in your present standard Webster specifications. Bulletin containing these paragraphs will be sent upon request, together with complete information. The coupon below is for your convenience.

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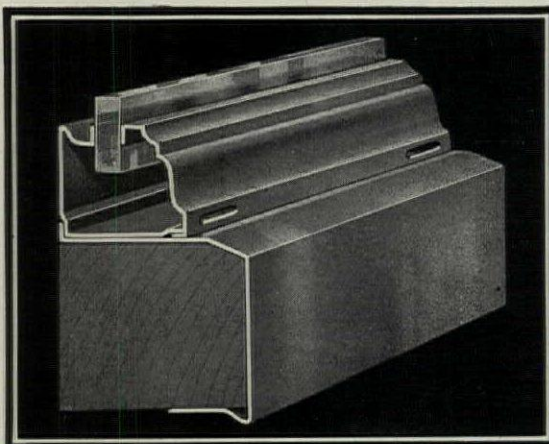
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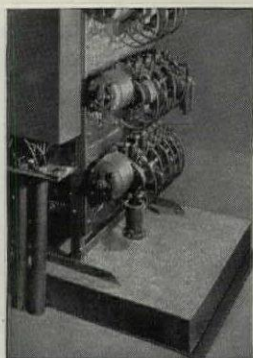


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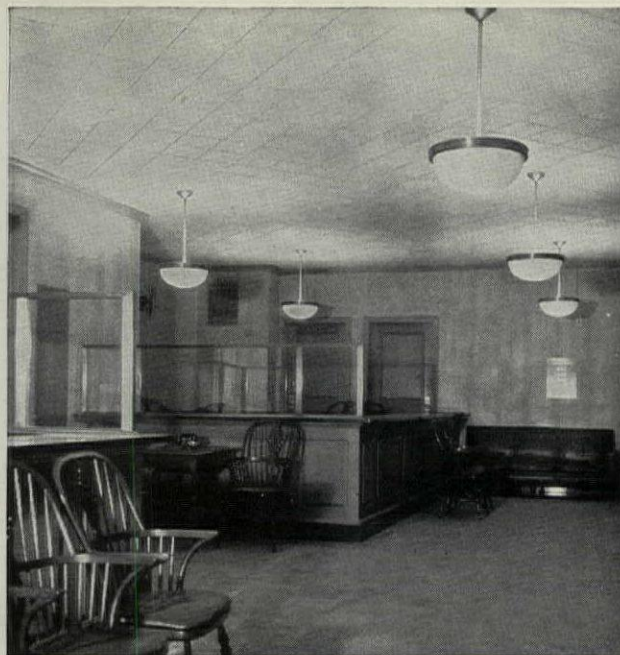


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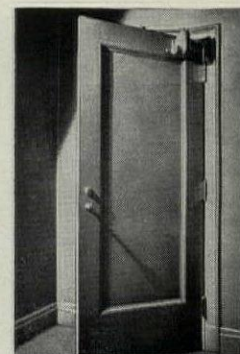




MACHINE BASES.
USG Sound Insulative Machine Bases are designed to prevent the transmission of noise and vibration caused by machinery. Their construction is essentially that of a rigid platform supported on sensitive resilient steel springs.



ACOUSTONE, the USG acoustical tile is used on wall and ceiling areas where noise absorption or auditorium correction is desirable. Creates a more comfortable noise level while providing choice of a great variety of beautiful patterns and decorative designs.



INSULATIVE DOORS.
USG Sound Insulative Doors are light weight wood doors which have a remarkably high sound insulative efficiency. Practical in any type of building to prevent the transmission of disturbing noises between rooms.

Specify these USG materials to insure definite results in sound control

A Message to Architects from the
United States Gypsum Company

WHEREVER sound control is essential, architects find that the three USG materials illustrated above—Acoustone, USG Sound Insulative Doors and USG Sound Insulative Machine Bases—are particularly helpful to them.

Acoustone, the USG acoustical tile, and *Sabinite* Acoustical Plaster, are successfully used to provide a satisfactory acoustical condition and to absorb noise in business offices, banks, restaurants, etc. *Acoustone* is a beautiful decorative tile that may be applied over present walls and ceilings quickly and without interruption to regular business routine.

USG Sound Insulative Doors are successfully used to prevent the transmission of noise from one room to another in hotels and apartments, or for executive offices, conference rooms, studies, etc. To prevent the transmission of noise through walls, floors and ceilings, the USG System of Sound Insulation is recommended.

USG Sound Insulative Machine Bases are specifically designed for use under fans, motors, elevator machinery, oil burners, pumps and the like. They prevent the transmission of noise and vibration from almost any kind of machinery in any type of building.

In addition to supplying materials and methods of construction for every phase of sound control, the United States Gypsum Company is in a position to relieve architects of all details on any sound control job, supervise the installation and

assume undivided responsibility for the predetermined results.

The services of a USG Sound Control Engineer are available to help you on any problem in architectural acoustics. Without obligation he will diagnose the need for controlling sound, predict definite attainable results and make impartial recommendations. Complete data on USG materials may be found in *Sweet's Catalogue*. For further information, or for an appointment with a USG Sound Control Engineer, please address the United States Gypsum Company, Dept. 285, 300 West Adams Street, Chicago, Illinois. In Canada, address The Dominion Gypsum Company, Ltd., Toronto, Ontario.

USG SOUND CONTROL SERVICE

Auditorium Correction—Noise Abatement—Sound Insulation

No more! radiators!

Trane Announces An Invention so Revolutionary
that Its Far Reaching Effects on Modern
Heating are Beyond Comprehension

INTRODUCTORY

What the Invention is

Stated simply and directly, the invention is a device that takes the place of radiators. In looks, weight, and principle, however, it is different from a radiator, and it is placed on the market as the successor to rather than the competitor of ordinary cast iron radiation. It is called the Trane Heat Cabinet, and heating plants using these cabinets are Cabinet Heating Systems.

(CONTINUED ON NEXT PAGE)

Revolutionary Features

Trane Heat Cabinets are such a basic invention that their features apply to all the accepted forms of direct radiator heating, such as hot water, steam, vapor and vacuum.

Among these features are—

ECONOMY OF FUEL. Heat Cabinets save 20-35% fuel. The reason for this saving is explained in the text that follows.

LIGHT WEIGHT. One radiator weighs as much as ten Heat Cabinets. In other words, enough Heat Cabinets to heat an ordinary house do not weigh any more than one radiator. Think what this means in freight saving.

LOW COST. Heat Cabinets, although their heat unit is constructed of brass and copper, do not cost any more than equivalent cast-iron radiation.

SMALL SPACE. Heat Cabinets use less space than equivalent cast-iron radiation, and much less space than radiators enclosed in shields.

BEAUTY. Heat Cabinets are furniture, and can be finished to match any surroundings. As far as appearance goes, they are somewhat comparable to radiator shields, but their cost is far below the shield-and-radiator combination.

INVISIBLE WHEN DESIRED. Heat Cabinets can be built into the walls, so that nothing is visible except the heat outlet.

TEMPERATURE CONTROL. Heat Cabinets give to all present types of radiator heating, INCLUDING hot water systems, the feature of temperature control at each heat outlet—exact, and instantaneous.

QUICK HEAT. The heating of all present types of radiator systems is much faster, especially hot-water systems, where heating is accelerated 300% to 400% by the use of Heat Cabinets.

PERMANENCE. Heat Cabinets are solid and rigid, with no joints or seams—as permanent as the piping.

Cabinet Heating—The Heat of the Future

In the home or other buildings where Cabinet Heating is used, you see no unsightly radiators. Heat Cabinets inconspicuously distributed, finished to match the furniture, are the only evidence that a heating system is installed.

(CONTINUED ON NEXT PAGE)

Looking at the Cabinets it is difficult or impossible to tell whether the building uses steam, hot water, vapor or vacuum. The function of any of these methods is but to supply heat to the unit in the Cabinet. From this point the great Cabinet Heating advantage of exact, instantaneous regulation starts—operating entirely independently of the basic system.

What the Heat Cabinet is and How it Works

The Trane Heat Cabinet, as the name implies, is a cabinet containing a heating element. This heating element is constructed in such a way that it gives heat readily by convection, but does not radiate heat.

In other words, the amount of heat given off by this heating element depends almost entirely upon the amount of air that is permitted to pass through it.

If the element is permitted to stand in still air, without circulation, it is practically at steam temperature (on a steam system) but it does not give up its heat.

As soon as the air around this heating element is allowed to circulate, heat is given up by the element very rapidly.

The result is similar to the case of stirring up a fire that has been banked.

Saves 20% of Fuel

Air passing through the Heater attains a velocity of about 200 feet per minute. This high velocity causes fast circulation of air in the room, and in less than ten minutes the Cabinet will completely change all the air in the room and heat it up to a comfortable temperature.

The important point to be remembered in connection with this rapid changing of air is that floor and ceiling temperatures are kept more nearly the same.

Exhaustive experiments have shown that 20-35% is saved in fuel where the floor and ceiling temperatures are nearly the same, instead of having a difference of 10 to 15 degrees between them, as is usually the case with a 10" cast-iron radiator.

Absolutely Perfect Heat Control

Since the heat given up by the Cabinet depends almost entirely upon the amount of air that passes through it, it naturally follows that by regulating the amount of air going through the Cabinet, YOU REGULATE THE AMOUNT OF HEAT GIVEN UP BY THE CABINET.

(CONTINUED ON NEXT PAGE)

REPRODUCTION OF 6 PAGE ANNOUNCEMENT

Trane's Prophecy of Less Than



FIVE years ago this month — through the six-page introduction reproduced above — Mr. Reuben N. Trane startled the heating industry by announcing that his invention — now known as Trane Convection Heaters were — “placed on the market as the successor to rather than the competitor of ordinary cast iron radiation.”

At this time it was prophesied that the (1) Fuel Economy, (2) Light Weight, (3) Low Cost, (4) Space Saving, (5) Concealment, (6) Instantaneous Control, (7) Quick Heating, and (8) Permanence offered by Trane Convection Heaters, would prove revolutionary to the then commonly accepted methods of distributing heat from a central heating plant.

Trane Convection Heaters were referred to as “the heat of the future.” There is now — after an elapse of five years — ample evidence to show, beyond a doubt, that this was a true prediction.

Convection heat is no longer a theory or an ex-

The practical application of this wonderful feature means merely the use of a hand damper that extends the full length of the Heat Cabinet. By adjusting this damper the heat is regulated with a surety that in the past has often been dreamed of but never successfully accomplished.

A Marvelous Thing

This exact, minute, instantaneous control is really a marvelous thing. Heating engineers have been attempting to secure such a result for the past forty years by making special supply valves which admit different amounts of heat into a radiator. This has never been very successful, and seems impossible at all. It has given only a slow change in the amount of heat.

Hot Water Cabinet Heating

In a hot water radiator, if you shut off the valve partially you simply change the circulation a small amount. It is an hour or so before any appreciable change in room temperature is secured. With the Heat Cabinet, however, you get the change in heat instantly, either increase or decrease, as desired.

This change in heating effect is exactly the same whether you are considering hot water, straight steam, vapor, or vacuum.

On a hot water Cabinet Heating System it is not necessary to keep the Cabinet on at night to prevent freezing. You simply shut off the air circulation damper and you thereby shut off the heat. The heating element itself, however, remains as hot as it ever gets, but since it is completely enclosed by the walls of the Cabinet and the damper, it is not giving off heat and is not causing the consumption of fuel.

The Heat Cabinet throws all the air out toward the Clean Heat front. The walls never become blank due to air circulation, which is common with radiator heating systems.

Tops to Taste—The top of the Heat Cabinet is flat, and can be either decorated, or left as is, or made of marble to suit any given interior decoration. No matter how many books or papers are put on top of the Heat Cabinet, there is no decrease in the amount of heat given off.

Quick Heat with Hot Water—Hot water plants using Trane Heat Cabinets have entirely different characteristics than before. The fact that they have exact, instantaneous, individual Cabinet control has just been pointed out. In addition there are other outstanding features.

COPYRIGHTED BY TRANE CO.

The radiators of an ordinary hot water system contain nearly 60% of all the water in the entire plant. A 100-foot Trane Heat Cabinet, however, contains less than one percent of water. As a consequence, we have nearly 60% less water on a Cabinet type hot water system, and the heating-up of the plant is thereby accelerated nearly two and one-half times. In other words, if it takes a radiator type hot water plant one hour to heat up, a Cabinet type hot water plant of the same size and under absolutely the same conditions requires less than twenty minutes to accomplish the same result.

Steam Cabinet Heating

All straight steam installations are greatly improved in operation and their initial cost is reduced. By using the damper in the Cabinet, perfect heat control is given to the steam plant, and the most troublesome part of straight steam heating is overcome.

No Air Binding—The heating element of a Trane Heat Cabinet contains but a single "U" shaped copper pipe, with copper fins, extending all the way across the Cabinet and back again. This construction positively eliminates air binding because there are no places for air pockets to form.

The single "U" shaped pipe in the Cabinet heats up so rapidly as the pipe which is part of the supply or return system of the plant. One of the greatest difficulties which has been constantly encountered in heating plants during the past fifty years, i. e., dead air spaces, is thus removed.

Easy to Move—It is never a serious problem to remove a Heat Cabinet during the summer or during repair work in a building. The cabinet itself can be lifted from its place without disturbing piping connections, and if it is desired to move the heating element also, there are but two pipes to disconnect, and the element is easily handled by one person.

Vapor Cabinet Heating

On vapor heating installations there is a complete removal of air binding trouble. The steam supply coming in from the upper connection of the Trane "U" tube actually has to force all air out of the tube before it can be filled with steam vapor.

The "U" tube, therefore, gives a much more perfect relief of air on all vapor heating systems, and the ideal heat control that has been sought for years is supplied by the damper in the Cabinet.

COPYRIGHTED BY TRANE CO.

A Joy to Architects

Architects are given a long sought freedom in interior room decorations. Trane Heat Cabinets can be installed in the walls and overhead to meet any artistic requirements. They can be installed under windows so that the top of the Cabinet is part of the window sill, and can be finished with the same material as the other sills.

Where it is desired for any reason to keep the heating equipment entirely invisible, Trane Heat Cabinets can be built into the walls with nothing but the outlet visible. It is important to note that Trane Heat Cabinets have the same high efficiency whether visible or invisible.

There is no serious disadvantage in installing Heat Cabinets on the inside walls. The rapid circulation of the air from the Cabinet overcomes the poor circulation and poor distribution of heat which is always present with ordinary cast iron radiators when used on interior walls.

Heat Cabinets can also be installed between joists in the basement, with proper provision for cold air and hot air to be delivered to the room above.

Details, Literature and Data

Complete details on Trane Heat Cabinets will be supplied on request, including test data where desired, and information regarding roughing in dimensions, etc.

No Secret

There is no secret about the internal construction of Trane Heat Cabinets, and all questions from interested persons will gladly be answered.

Name Not Registered

Trane is not making any claim on the names "Heat Cabinets" or "Cabinet Heating". These descriptive terms apply to this fundamental change in modern heating art, and, like the Cabinets themselves, are for all to use and enjoy.

Address all communications to

REUBEN N. TRANE

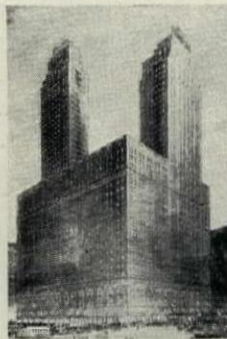
The Trane Company
La Crosse, Wisconsin, U. S. A.

MADE TO THE HEATING TRADE IN APRIL 1926

1926 is Fulfilled in Five Years

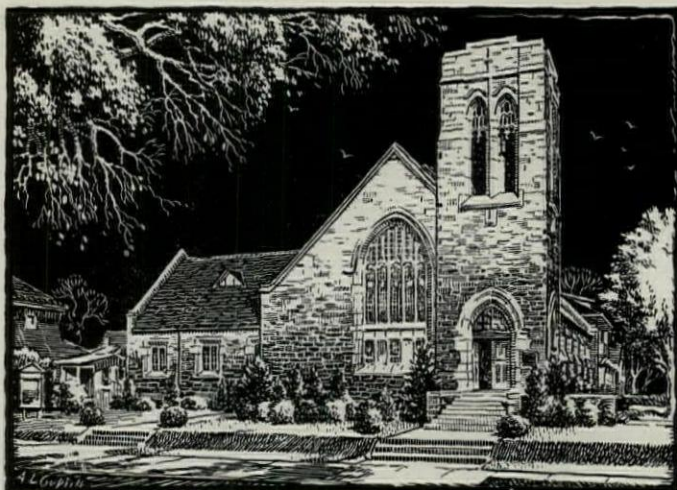
periment. Skepticism concerning it has given way to complete recognition and acceptance of the principle by all the scientific agencies of the heating industry. Architects and engineers, without number, not only accept the principle as sound (both scientifically and economically) but they actually specify, recommend and use Trane Convection Heaters. A surprising percentage of the *total* radiation installed in 1930 was Trane Convection Heaters. A few of the many buildings which were Trane equipped last year are shown below.

There is not a point of advantage for Trane Convection Heaters listed in Trane's prophecy of 1926 that has not since been established—time after time—scientifically and in actual use. If anyone still doubts the practicability of Trane Convection Heaters, he is invited to write to us for *all the facts*. The Trane Company, Dept. 5, 302 Cameron Ave., La Crosse, Wisconsin, U. S. A.

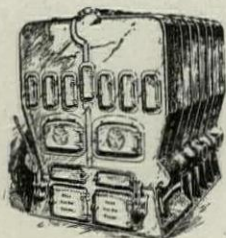


Burnham Boilers

Francis Childs Memorial
M. E. Church, West Collings-
wood, N. J. Lackey & Hettel,
Architects. Harry W.
Knecht Co., Inc., Heating
Contractors.



Their Big Twin Boiler Doubly Contributes to an Active Church Life



We will be glad to take counsel with you or your church building committee, to the end of giving you full benefit of our long experience in solving church heating requirements.

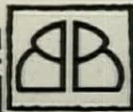
A Big Twin Burnham Boiler in this West Collingswood, New Jersey church, not only heats the auditorium adequately on Sundays. It also keeps the Sunday School building warm continuously, for social and religious uses.

Both buildings are comfortably available at any time, for regular or special services.

The Burnham long fire travel gets so much more heat from the fire, even when a part of the grate area is banked down, that there can always be slumbering fire that will quickly respond when needed.

Not every church requires the Big Twin heat volume. But every Burnham Boiler gives the same kind of flexible, economical heat.

It's a Burnham's long fire travel that makes its fuel bills short. Which is equally true regardless of whether the fuel is coal or oil.



Burnham Boiler Corporation

IRVINGTON NEW YORK

Representatives in all principal cities of the United States and Canada

Beauty, Permanence and Sanitation Are Inherent in Walls of AR-KE-TEX Tile



THE AR-KE-TEX CORPORATION • BRAZIL, INDIANA

National Distributors for Clay Products Co., Inc., of Indiana

Lower panel laid with Mottled Cream Brown AR-KE-TEX Tile, in Random Ashlar Bond VI.

Upper panel of Cream Buff Stippled AR-KE-TEX Tile in standard coursing.



Cove base and band course at wainscot height are Black AR-KE-TEX Tile. Band course at top is inset design No. 13.

Insets used in lower panel are designs Nos. 1 and 2.

THE STANDARD OF TEXTURED TILE

Now you can specify

FINISH GRADE

TIDEWATER RED CYPRESS

at the lowest cost in years

BECAUSE the building trade has been anything but booming in the past few years, here is a fact that should surprise almost every architect.

The demand for *Heart* grade Tidewater Red Cypress has been increasingly so great for exterior use that it is now possible for us to produce and sell the *Finish* grade for interior use at the lowest cost in years.

For as you know, every cypress log yields two types of lumber—the *Heart* grade, which is famed for its resistance to rot—and the *Sap* or *Finish* grade, whose exquisite grain creates a pattern of rare beauty wherever or however it is used in the interior of a home.

It is only natural, then, that architects and interior decorators should welcome this wide-spread public acceptance of a wood whose adaptability for interior use stands unique among building materials.

It enables them to recommend Tidewater Red Cypress to the man of moderate means as well as the

wealthy client; for aside from the fact the *Finish* grade is now priced within the reach of all, it is so easy to work that it cuts labor costs to the bone, so resistant to warp and replacement that its all-around economy defies comparison.

For interior use—for paneling, doors, windows, beams, baseboards, cupboards—for any kind of woodwork—Tidewater Red Cypress creates richly warm effects, regardless of what finish you wish to give it.

Such is the versatility of this Wood Eternal. You can wax it, stain it, char, varnish, sand-etch or leave it just as it comes from the yards—always with glowing beauty that age can only mellow.

Further details and information will be sent to you gladly upon request. Address the Southern Cypress Manufacturers' Association, Jacksonville, Fla., or New Orleans, La. If your dealer is not stocked with Tidewater Red Cypress, he can get it quickly or you can write direct to any of the Association Mills listed below.

TIDEWATER RED CYPRESS

[COAST TYPE]

THE WOOD ETERNAL

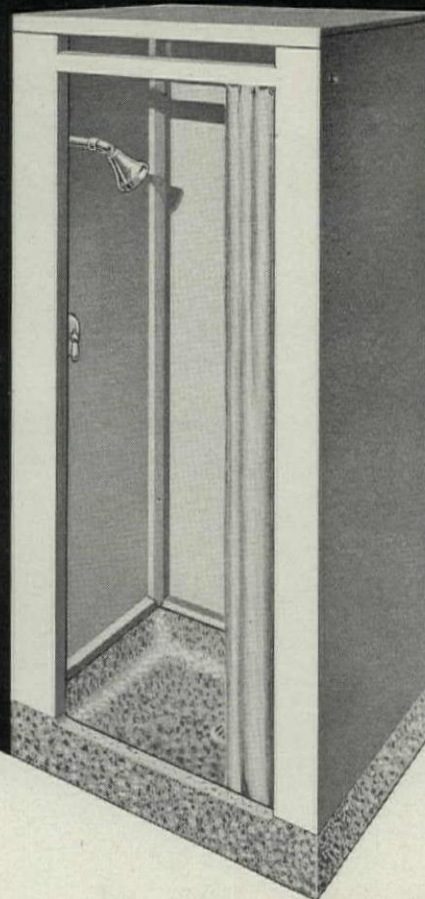
This advertisement is published by the following members of the Southern Cypress Manufacturers' Association, Jacksonville, Florida, and New Orleans, Louisiana

J. Ray Arnold Cypress Co., Groveland, Fla.
Big Salkehatchie Cypress Co., Varnville, S. C.
Burton-Swartz Cypress Co., Perry, Fla.
Cummer Cypress Co., Jacksonville, Fla.
Dibert, Stark & Brown Cypress Co.,
Donner, La.

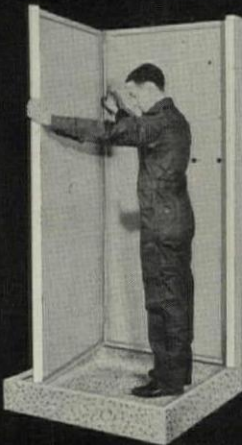
Everglade Cypress Co., Loughman, Fla.
Putnam Lumber Co., Glenwood, Fla.
Putnam Lumber Co., Shamrock, Fla.
Reynolds Bros. Lumber Co., Albany, Ga.
Reynolds & Manley Lumber Co.,
Savannah, Ga.

Weaver-Loughridge Lumber Co., Boyd, Fla.
Weis-Patterson Lumber Co., Pensacola, Fla.
A. Wilbert's Sons Lbr. & Shgl. Co.,
Plaquemine, La.
F. B. Williams Cypress Co., Ltd., Patterson, La.
Wilson Cypress Co., Palatka, Fla.

NOW... a leakproof assembled shower cabinet by WEIS



Weisway Shower Cabinets, consisting of art marble receptor and steel or aluminum alloy side walls, to be assembled at the job, are now available. Architects who are familiar with other Weis products need not be told that this is strictly a quality product. Weisway Cabinets are sold only through the plumbing trade and should be included in the plumbing specifications. All of the features afforded by the Weisteel Integral Shower Cabinet are available in this better looking type of cabinet which also has the added advantage, because of knockdown construction, of being available for installation beyond existing openings through which integral cabinets could not pass. Partial advance information will be found in *Sweet's Architectural Catalog* for 1931. Since *Sweet's* was printed, however, additional important facts have become ready for publication and we therefore suggest that you write for a copy of the new Weisway folder which is just off the press.



The Weisway Shower Cabinet can be assembled from inside the receptor. No screws or bolts are used in making this a rigid, leakproof unit.

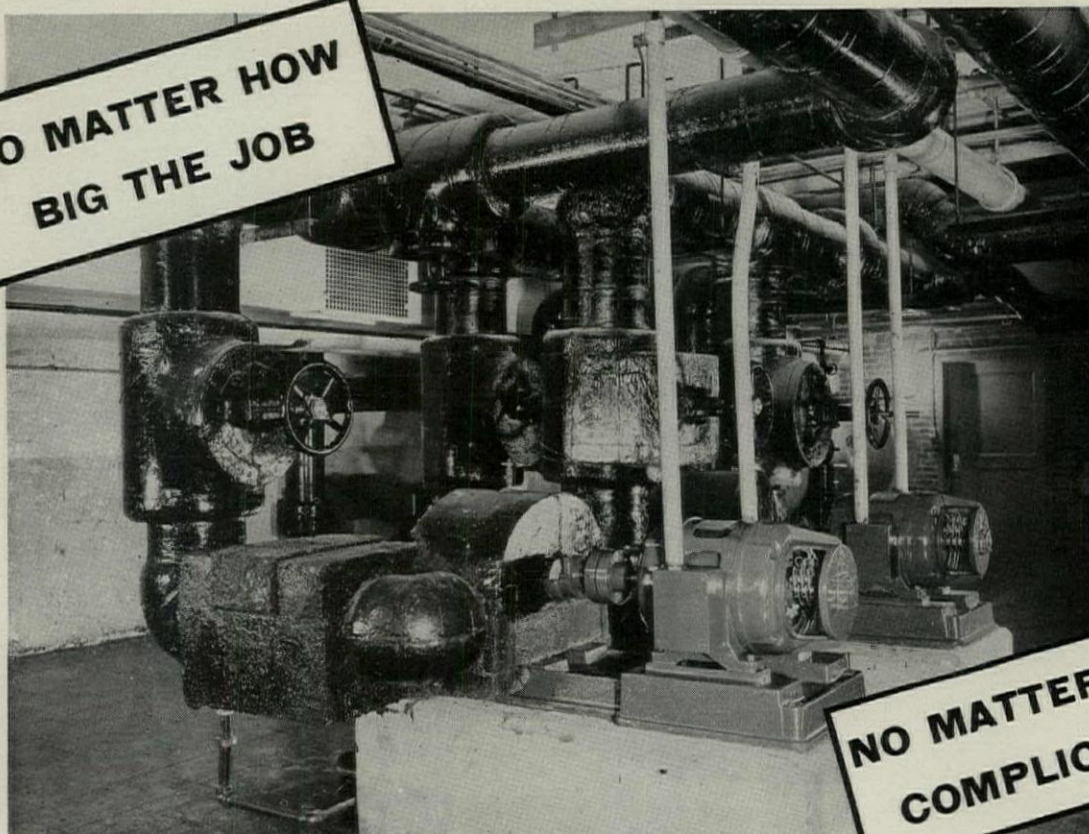
HENRY WEIS MFG. CO., Inc.

ESTABLISHED 1876

Elkhart, Indiana

WEISWAY

**NO MATTER HOW
BIG THE JOB**



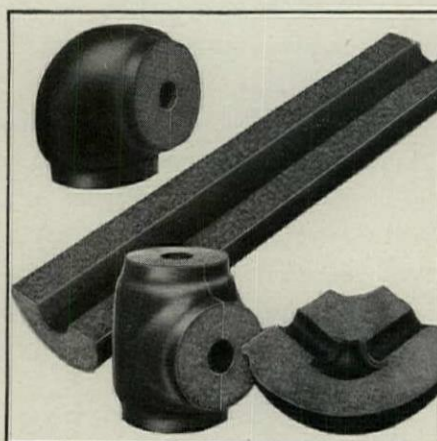
R. H. Macy & Company's New Long Island Warehouse has completely insulated its refrigerating equipment with Novoid Cork Coverings and Novoid Cork Fitting Jackets. Asbestos Construction Co., Inc., of Long Island City, installed this insulation.

**NO MATTER HOW
COMPLICATED**

You can have the advantages of this **TIGHT-FITTING CORK INSULATION**

NO makeshift, mitered "stove-pipe" covers here. No fussing with plastic or fibrous materials is necessary with Novoid. Accurately moulded or assembled to fit, the jackets and coverings you see above hug straight runs and fittings so tightly that no air space is left where moisture can accumulate.

Brine and ammonia lines, coolers, and tanks, can be protected permanently with Novoid Cork Covering. Eliminate expensive replacement costs by using this close-structured insulation which has no absorbent "blotting action" and cannot become water-soaked.



Large and small granules of cork are tightly moulded to shape and then coated inside and out with mineral rubber. Novoid Cork Coverings fit tees, ells, valves and pipes of all sizes so accurately, leaving no space between pipe and covering where moisture can collect.

Made to fit all sizes of pipes and fittings, from $\frac{1}{4}$ " up, Novoid Cork Covering can be had in three different thicknesses to meet every type of cold line, from below zero brine to drinking water.

Write for samples, prices, and complete data on Novoid Cork Covering. Address Cork Import Corporation, 345 West 40th St., New York City.

For roofs, for walls, for all building insulation and refrigeration uses, *Novoid Corkboard* offers moisture-proof protection against heat losses. Samples and detailed information on request.

Novoid Cork Covering

For Cold Lines, Coolers and Tanks



ANOTHER **TIGER** JOB!

An American architectural masterpiece, the Aetna Life Insurance Building, Hartford, Conn. Where the interior walls and ceilings radiate unquestioned individuality and distinction. Marks of added value, these artistic finishes were readily obtained with TIGER, the lime that

"Spreads like warm butter"

Credit for this majestic structure is due, primarily, to the creator, constructor and craftsmen responsible for its being. James Gamble Rogers, New York City, was the Architect; Geo. A. Fuller Company, New York City, the General Contractors; and Marshall F. Davenson, Hartford, the Plastering Contractor, who Tiger-finished its charming interior.

From the viewpoint of quality construction, good judgment dictates better lime . . . the FAMOUS Tiger White Rock Finish.

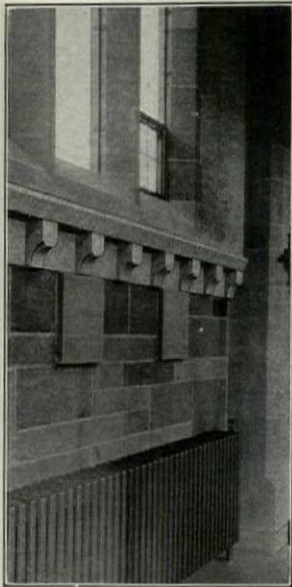
THE KELLEY ISLAND LIME & TRANSPORT COMPANY
World's Largest Producer of Lime
LEADER BUILDING CLEVELAND, OHIO

The Famous

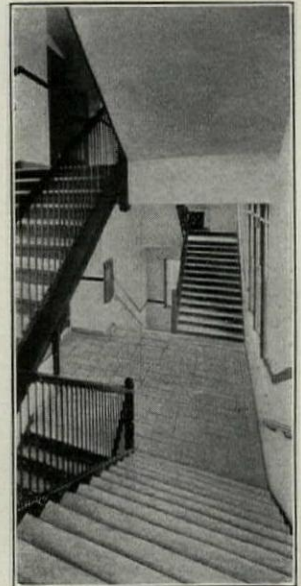
TIGER

⌈ *And* — Tiger Mason's, Tiger Agricultural, Tiger Chemical, Tiger All-Purpose Hydrate, in 10-lb. packages, and High Calcium and Magnesium Lump Limes. Also Quicksake (ground quicklime) in paper-lined jute sacks. ⌋

FINISH

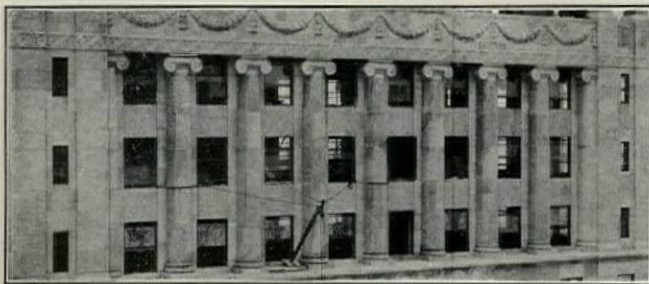


TRIM

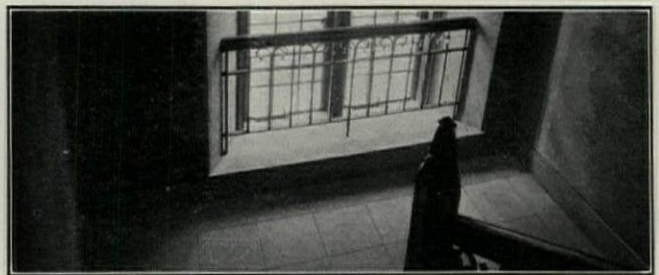


TREADS

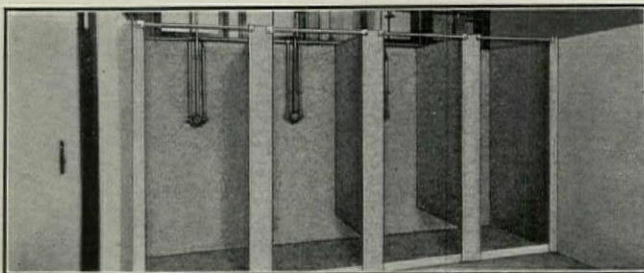
The unique qualities
of **SOAPSTONE**
make it an interesting
material with which
to work



SPANDRELS



SILLS and STOOLS



SHOWER STALLS



FLOORING

The Tennessee marble quarries and mills of the Ross and Republic Marble Company have been acquired by the Virginia Alberene Corporation, and the business will be continued as the Ross-Republic Marble Corporation. Alberene Stone Company continues to act as Sole Selling Agent.

WE solicit inquiries for samples from architects who are not familiar with the various textures and finishes of soapstone, because we believe that this natural non-stratified material has possibilities as an architectural medium that will not be known until its qualities are familiar to all architects.

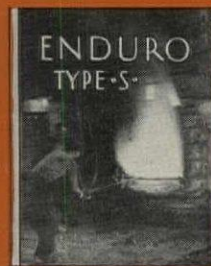
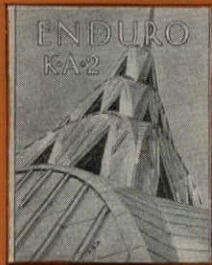
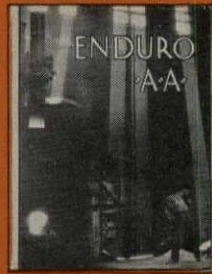
With knowledge of properties, colors and textures, we are confident that creative minds will see artistic and economic uses as yet unknown.

ALBERENE STONE COMPANY, 153 W. 23rd Street, New York.
Branches in Principal Cities. Quarries and Mills at Schuyler, Virginia.

ALBERENE STONE
THE VIRGINIA SOAPSTONE OF DIVERSIFIED UTILITY



Complete data and plates in full color showing Alberene Stone in conjunction with marbles and other building stones make the brochure "Architectural Alberene" of interest.



KEEPING A STEP AHEAD WITH ENDURO



BRING YOUR FILE ON "STAINLESS" UP TO DATE

Because no single type of Enduro, Republic's Perfected Stainless Steel, can meet all the conditions of the building trades and industry, a series of booklets has been prepared for your information, containing basic facts concerning the various types now available.

Your records will be more complete with this data in your file. Ask for any or all of the following:

Booklet 85—General Information on Enduro, its properties and uses.

Booklet 86—Enduro KA2, for corrosion resistance to atmosphere, salt air, food and dairy products, nitric acid, etc. For application requiring ductility and good working qualities generally.

Booklet 87—Enduro AA, for application where corrosion resistance takes precedence over high strength or toughness.

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Upon request your name will be placed on a list to receive similar bulletins issued from time to time as information on other types of Enduro-Nirosta, is made available.

ENDURO
REPUBLIC'S PERFECTED
STAINLESS STEEL

*Enduro is sold only through
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Authorized Distributors.*

CENTRAL ALLOY DIVISION
REPUBLIC STEEL
CORPORATION

MASSILLON, OHIO



False Economy in Pipe

INVITES PROPERTY LOSSES

A residence designed and built by Edward Crump, Jr., Pittsburgh, Pa., in which Byers Genuine Wrought-Iron Pipe is installed.

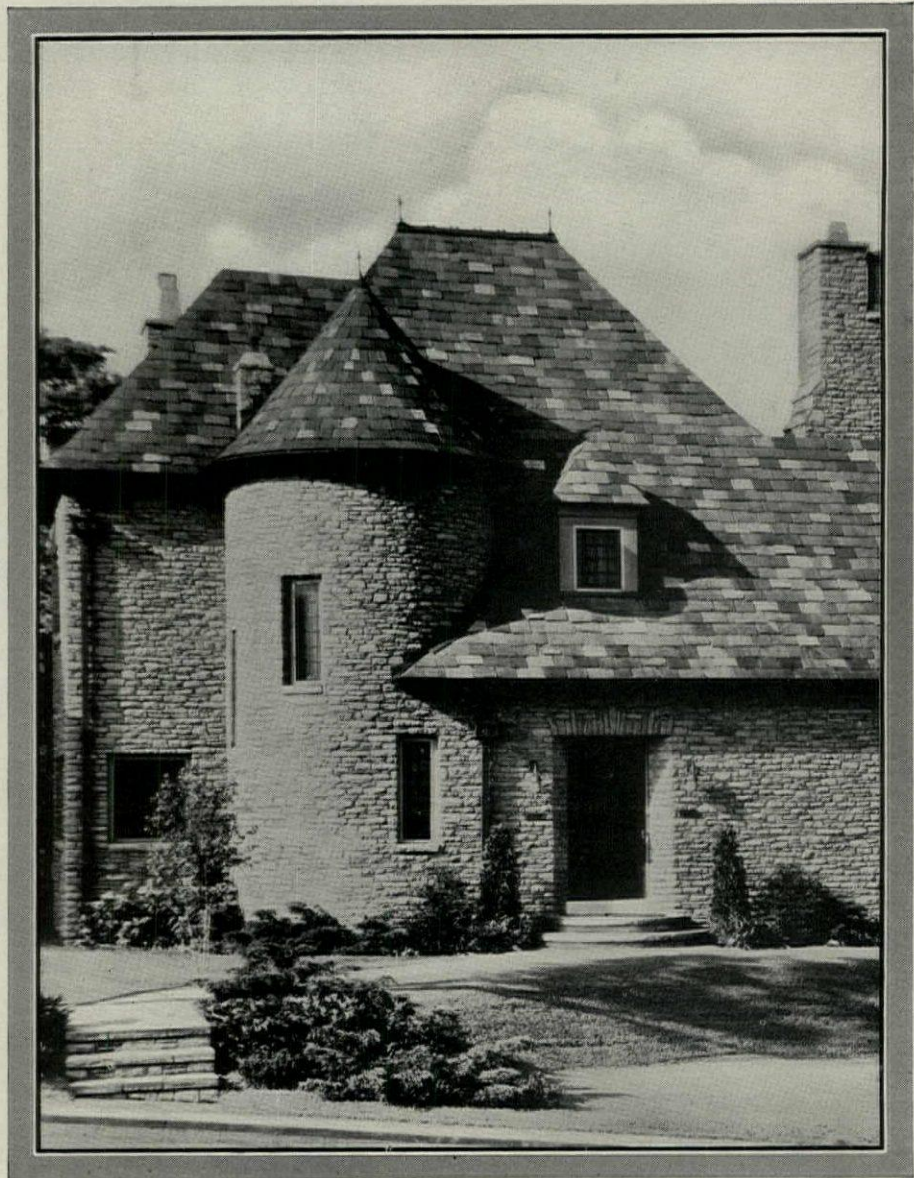
"PIPE PRESCRIPTION" was developed by leading architects. Experience and research impressed them with the fact that the true measure of pipe economy is cost per year of service. A desire to render the utmost service to their clients inspired its adoption and is the reason for continued adherence to it.

Emphasizing this policy to the buying and building public, we state: "Your architect knows the places where wrought iron has demonstrated its superiority. He also knows that Byers Genuine Wrought-Iron Pipe is a standard of wrought-iron quality. For these reasons it is to your advantage to approve the 'pipe prescription' he submits to you."

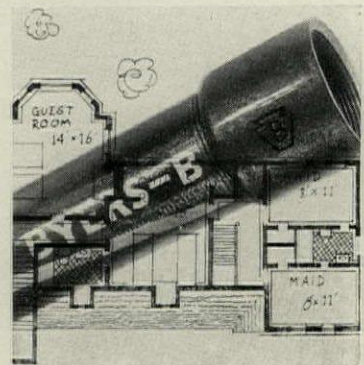
Original cost is a single factor of consideration in the creation of a building and in the installation of pipe. The true measure of pipe economy is cost per year of service. Comfort is assured and property is protected by specification and installation of the right pipe in the right places. In those places where its superiority is established by actual service, there is no economical substitute for wrought-iron pipe.

The public has confidence in wrought iron. However, we accept as a business responsibility preservation of the traditional superiority of Byers Genuine Wrought-Iron Pipe in its proved fields of service and urge it only for its places in a "pipe prescription" that provide the most durable service for original minimum cost.

As an expert you know of many places in which Byers Genuine Wrought-Iron Pipe has proved its adaptability and service. There are still greater numbers developed within the past few years. Are



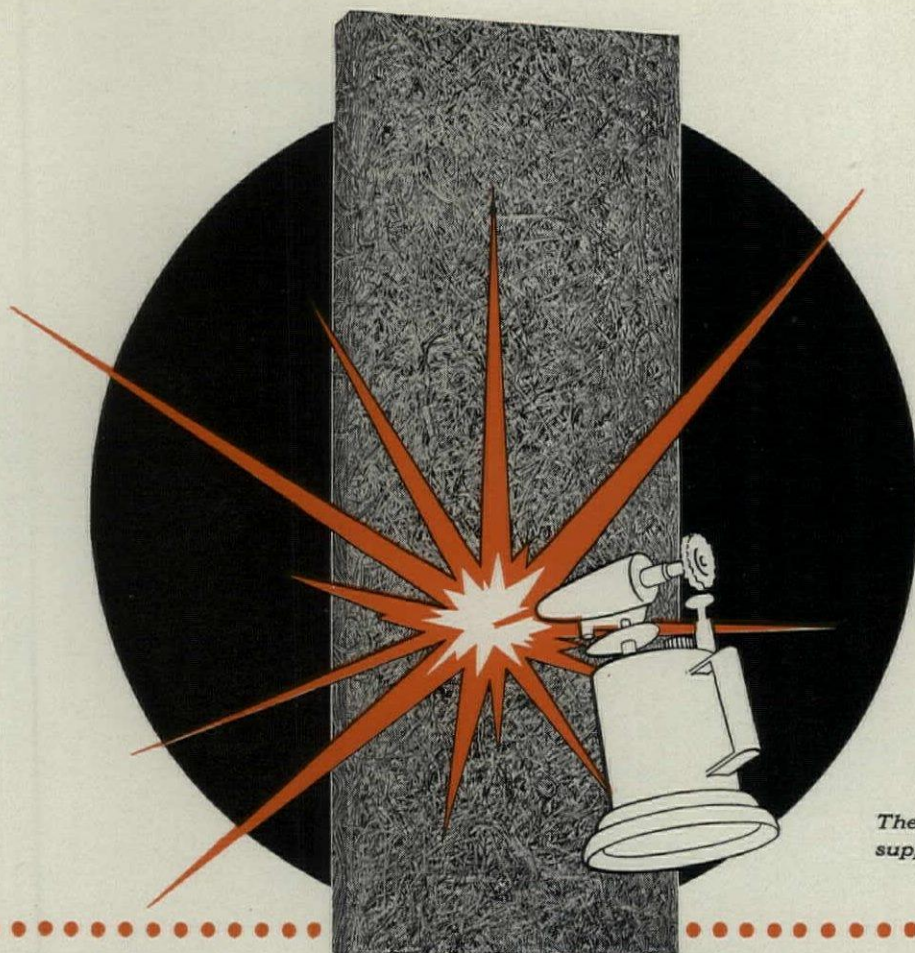
you familiar with them? The facilities of our organization are at the disposal of any architect in helping solve pipe problems. Write us today! And remember, the spiral stripe identifies Byers Genuine Wrought-Iron Pipe. A. M. Byers Company, Pittsburgh, Pa. Established 1864.



BYERS GENUINE PIPE

WROUGHT-IRON

AN INVESTMENT • NOT AN OUTLAY



Thermax positively will not support combustion.

NOW...for the first time in America a Really Fireproofing Insulation Board

4

PROVABLE FACTS ABOUT THERMAX

- 1 Insulation:** Thermax combines insulation with fireproofing qualities not provided by any other insulation board.
- 2 Fireproofing:** Thermax, tested in accordance with the standard fire test specifications of the American Society for Testing Materials, meets the requirements for Class A fire-proof construction.
- 3 Structurally Strong:** Thermax satisfies code requirements for self-supporting insulated roof-decks.
- 4 Sound-Deadening:** Thermax 2" partitions transmit less than one-fifth of one per cent of sound.

Thermax standard boards are 1", 2" and 3" thick, 20" wide and 64" long. Other lengths if specified in reasonable quantities.

Thermax—the fireproofing insulation—is a remarkably efficient and economical insulating board. It is not new. Originated in Europe, Thermax already has had twelve years of practical use in nearly every European country. Now it is being made in the United States in accordance with American building standards and specifications.

Here at last is insulation *plus* fireproofing. Thermax is a truly fireproofing insulation board. Made of treated wood and minerals it has lightness and structural strength. It is vermin proof, odorless, permanent and it gives adequate insulation in single thickness. Thermax has the thickness necessary to give real thermal insulation and provides fireproofing qualities not found in any other insulation board—yet the cost is moderate!

Thermax is ideal for walls, partitions, ceilings and roof decks. It offers, *in one product*, insulation, fireproofing, sound-deadening and a perfect base for plaster. Thermax can be sawed and nailed like wood.

Write for specification data and sample of material. Address Thermax Corporation, Dept. "K," 228 N. La Salle St., Chicago, Ill.

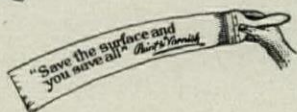
THERMAX

The Fireproofing Insulation



NO CAUSE For Worry—

Ink marks, pencil scratches, dirt—stains of all kinds—can be quickly and easily removed from walls finished with Berry Brothers' Delitone. This remarkable material is many times more washable than ordinary finishes. We believe it the most economical and serviceable wall finish on the market. Two coats are sufficient for a perfect job on old or new work. It will positively stop lime burns or hot spots on plaster that is in proper condition for the application of a wall coating. As a prime coat Delitone covers upwards of 750 square feet per gallon. Learn more about this finish. Write for complete information.



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department will
furnish complete
details

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Varnishes Enamels Lacquers
Detroit, Michigan Walkerville, Ont.

Manufacturer of
wear-resisting
architectural
finishes

Announcing..

FLORIDA-LOUISIANA RED CYPRESS Co.

BUYERS and users of cypress throughout the country will be interested in the formation of the Florida-Louisiana Red Cypress Company. This company, which is to serve as a marketing organization, is a progressive and forward action which gives distributors of Tidewater Red Cypress a service upon which they can always depend.

The Florida-Louisiana Red Cypress Company will market the entire cypress output of the following mills:

Wilson Cypress Company,
Palatka, Fla.

Putnam Lumber Company,
Glenwood & Shamrock, Fla.

Cummer Cypress Company,
Lacoochee, Fla.

A. Wilbert's Sons,
Plaquemine, La.

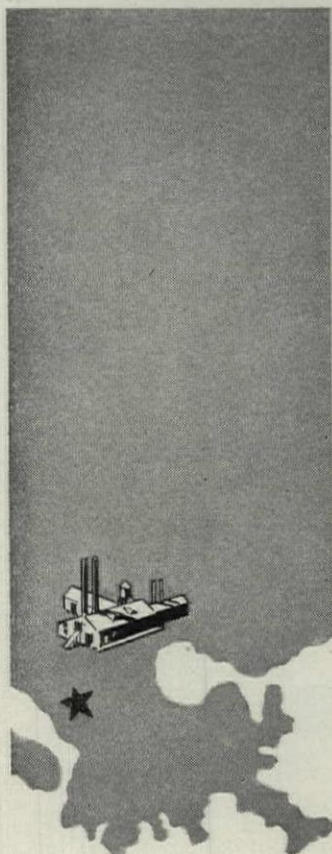
Brooks-Scanlon Corporation,
Foley, Fla.

All cypress cut by these mills comes from the deep swamps of the Suwanee, the St. Johns and the Withlacoochee Rivers in Florida and the Atchafalaya in Louisiana . . . the world's most noted cypress growing regions.

Whether you live in Maine or California, New York or Ohio, you may look to the Florida-Louisiana Red Cypress Company for everything you need in cypress. The vast resources and exceptional facilities of this organization assures you of a steady supply of the finest Tidewater Red Cypress you can buy . . . now and for many years to come.



Symbolic of the strength of Tidewater Red Cypress, this woodman now speaks the pledge of the Florida-Louisiana Red Cypress Company. Now, and years to come, you can get all the cypress you need.



FLORIDA-LOUISIANA RED CYPRESS COMPANY
JACKSONVILLE, FLA.

What Josam Makes

DRAINS

FOR

Floors . Urinals . Showers
Garages . Hospitals . Roofs
Gutters . Decks . Etc.

INTERCEPTORS

FOR

Grease . Oil . Plaster
Hair . Surgical and
Dental Sediments

POOL EQUIPMENT

FOR

Inlets . Outlets . Vacuum
Connections . Scum Gutters
and Skimmer Sprays

SHOCK ABSORBERS

FOR

Quieting Water Hammer and
Preventing Damage to Pipe
Lines

CLOSET CONNECTIONS

WHICH ARE

Gas and Water Tight and
Eliminate Putty Joints



Josam Roof Drain with Removable Combined Dome Strainer and Sediment Cup



Josam Open Seat Back Water Sewer Valve



Josam Double Drainage Floor or Shower Combined Drain and Trap with Flashing Clamping Device



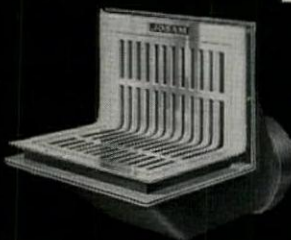
Josam Non-Clog Drain and Trap with Flushing Rim



New Josam Adjustable Closet Outlet Connection



Josam-Marsh Shock Absorber—TO QUIET WATER HAMMER



Josam Main Outlet Swimming Pool Drain



Josam-Marsh Grease Interceptor

Representative Josam Specialties

VALVES

Back Water Sewer and Check
Valves, Always Open Except
When Closed by Back Flow



Josam Double Drainage Floor Drain with Clamping Device and Adjustable Strainer



Josam Saw Tooth Roof Drain



THERE ARE NO SUBSTITUTES

Other Than Drains

THERE would be nothing of prime interest to you in the news that Josam now manufactures an ever-growing list of sanitary specialties—twenty-four in all, were it not for the fact that the name Josam already identifies drains which are accepted as standard by the construction industry.

Interceptors, which prevent clogged waste lines, shock absorbers, which eliminate water hammer and a number of newer Josam specialties inherit something of this bounteous recognition accorded Josam drains—inheriting a liberal share of this recognition of value in greater quantity and truer quality.

No great effort is required for building a new product when the motive or interest does not extend beyond its immediate sale. As in the beginning, that sense of responsibility for the performance of the first Josam drain has guided the development of newer products. Not a single product in the whole Josam line but that must continually measure up to the watch word—"accept no improvement as final."

From the inception of its business, Josam pledged itself to the policy of competing against past efforts to produce better products in the future—dedicated its abilities

and resources to the task of seeking to deserve increased recognition by rendering increasingly greater service.

Josam not only enthusiastically welcomes new ideas, but constantly engages in research—continuously labors in producing new designs—testing and experimenting with new processes, new methods and new materials to the end of increasing usefulness of Josam products and extending their number if a need be found.

How swiftly Josam products have been accorded an eager welcome is evidenced by the increasing importance these products occupy in all kinds of structures. This is indicative of a scope of engineering service that comprehends the problems of the construction industry—it is a tribute to Josam engineers, who understand the difficulties confronting the architect and engineer.

By calling on the Josam representative, this accumulated experience of a nation-wide organization that has pioneered with new and better

ideas is available to you. Catalog G gives detailed information regarding this complete line of specialties. Sweet's Catalog gives essential specification data.



JOSAM MANUFACTURING CO. . . 4908 Euclid Building, Cleveland, Ohio

Factory: Michigan City, Indiana

Branches in all Principal Cities

JOSAM PRODUCTS ARE SOLD
BY ALL PLUMBING AND HEAT-
ING SUPPLY WHOLESALERS



DESCRIPTIVE LITERATURE ON
ANY JOSAM PRODUCT SENT
UPON REQUEST

FOR JOSAM PRODUCTS

MILWAUKEE GAS & ELECTRIC BLDG.

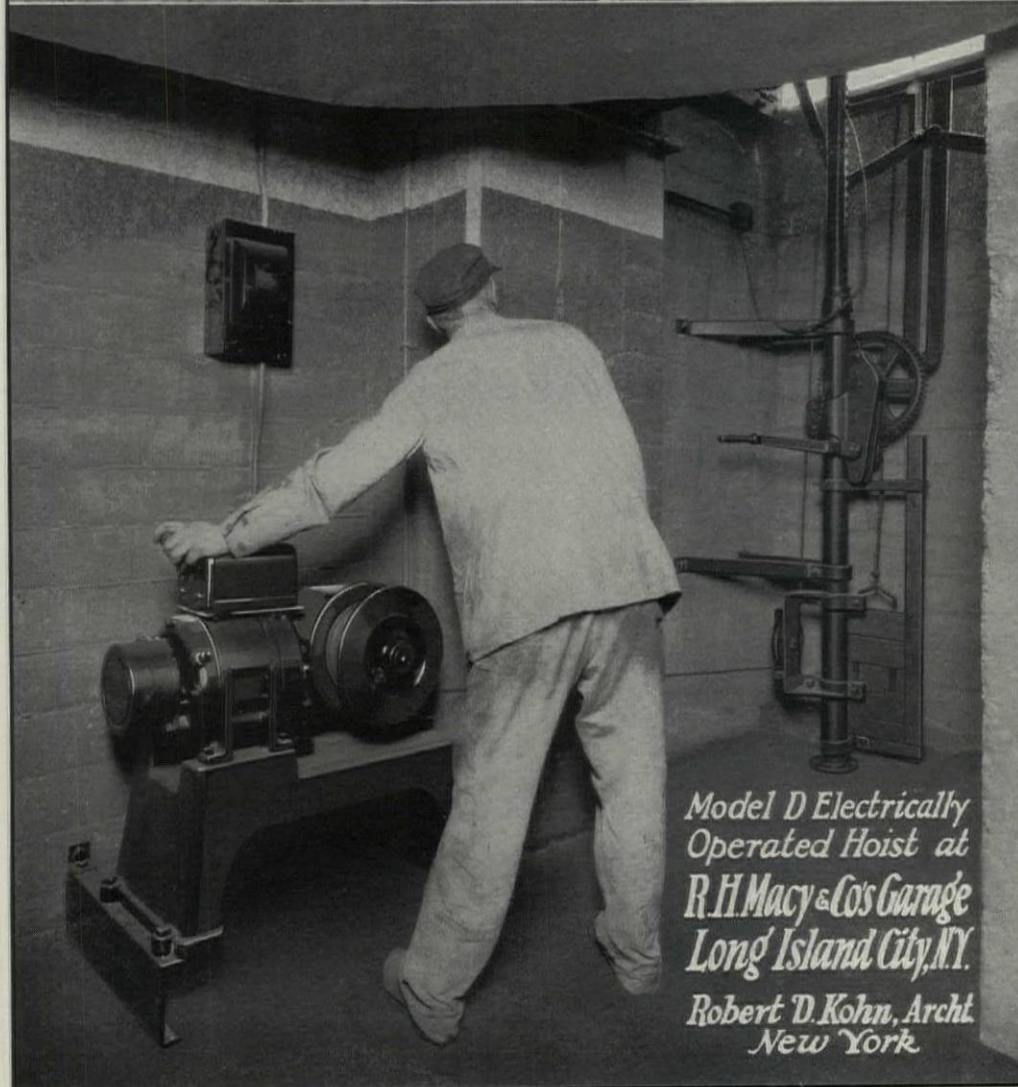


ARCHITECTS: ESCHWEILER & ESCHWEILER, MILWAUKEE, WIS.
CONTRACTORS: H. SCHMITT & SON, MILWAUKEE, WIS.

COMplete hollow metal installation by Dahlstrom . . . elevator entrances, office and corridor doors and metal trim . . . assists this fine building to the efficiency, serviceability and interior beauty that the modern metropolitan structure must have.

Complete Metal Door & Trim installation by
DAHLSTROM

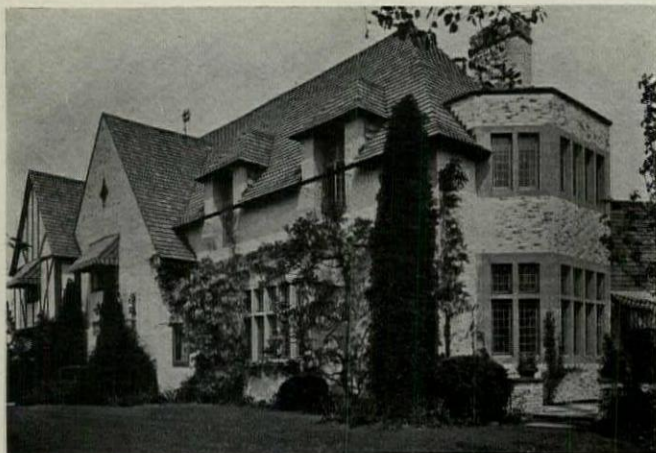
THE DAHLSTROM METALLIC DOOR COMPANY {Established 1904}, JAMESTOWN, NEW YORK
WITH OFFICES AND REPRESENTATIVES IN ALL PRINCIPAL CITIES



This is one of five G&G Telescopic Hoists specified by Robert D. Kohn, Architect for R. H. Macy & Co.—More than 2,100 schools use G&G Ash Removal Equipment because it is so safe in operation—And many prominent buildings, including the U. S. Capitol

Catalog in Sweet's Arch. Catalog 1931 Ed. pp. D 6342-49. And in Specification Data 1931 Edition

**GILLIS &
GEOGHEGAN**
548 W. Broadway
NEW YORK, N. Y.



This beautiful Portland, Oregon, house is covered with Cabot's Hand Split Shakes stained with Cabot's Creosote Shingle and Wood Stains. The blended colors in grays and gray-greens harmonize perfectly with the brickwork which has been finished with Cabot's Old Virginia White.

A New Beauty Treatment For Homes and Apartments

Cabot's Creosote Shingle and Wood Stains and Cabot's Collopakes make possible a whole new range of color effects for modern buildings.

Cabot's Stains have been standard since 1882, but recently they, like Cabot's Collopakes, have been made by the Patented Collopping Process, which reduces the colors to such fineness that they act like dyes, becoming a part of the wood itself. Use them on all exterior wood surfaces—roof, clapboards, siding, rough or smooth boarding. There is a range of twenty-three beautiful shades.

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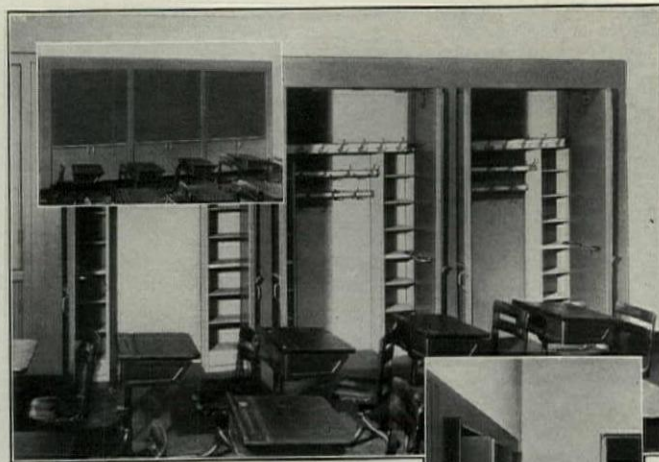
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Features of Wilson School Wardrobes That Save Space and Money

Pictures show installation of Wilson Hygienic School Wardrobes (disappearing door type) in South Norfolk High School, South Norfolk, Va., W. O. Sherman, Architect, J. W. Hudson, Jr., Contractor.

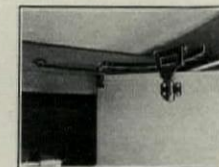
These wardrobes eliminate space and cost of cloak rooms. May be installed in corridors or rooms. Fronts operate easily and out of the way, whether open or closed, in both the disappearing door type and the rolling front type. Provided with blackboard surface if desired. Wilson Hygienic School Wardrobes permit smaller school buildings without loss of seating capacity, thereby lowering construction costs.

Write for Catalog No. 4

Large photo shows disappearing door type Wilson Wardrobes open. Top inset shows doors closed, fitted with blackboards. Lower inset shows doors open, projecting only 2½" into aisle.



Umbrella racks with drip pan may be attached to disappearing door type wardrobes.



Detail of top track showing ease and sturdiness of door operation. All hardware made in our plant.

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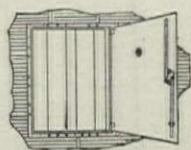
ORIGINATING from the push button on any executive's desk, an order flashes instantly on the superintendent's 99-lamp, bull's-eye type annunciator. Superintendent flashes a single-lamp annunciator on some stenographer's desk by throwing a toggle switch. Thus conveying the order with the speed of light. Push buttons, toggle switches and annunciators are all Edwards. Edwards signaling apparatus can be properly engineered to solve your signaling problems equally as well.



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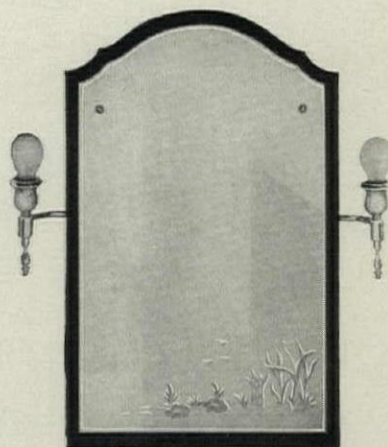
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for easy, instant entrance to behind-the-wall pipes, wiring, etc. Preserve wall surfaces; simplify trouble-finding. Hinged or separate panel types. Several sizes.

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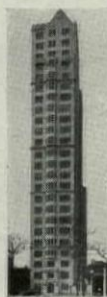
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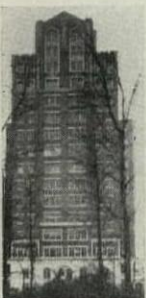
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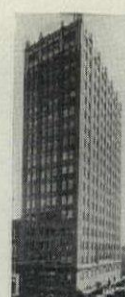
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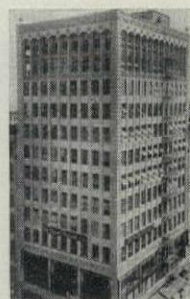
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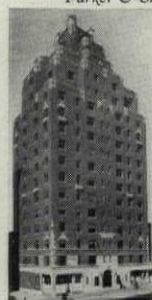
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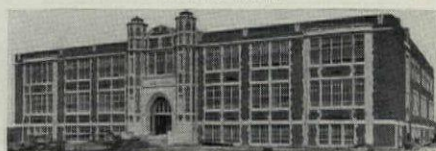
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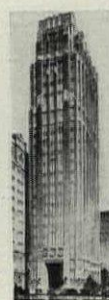
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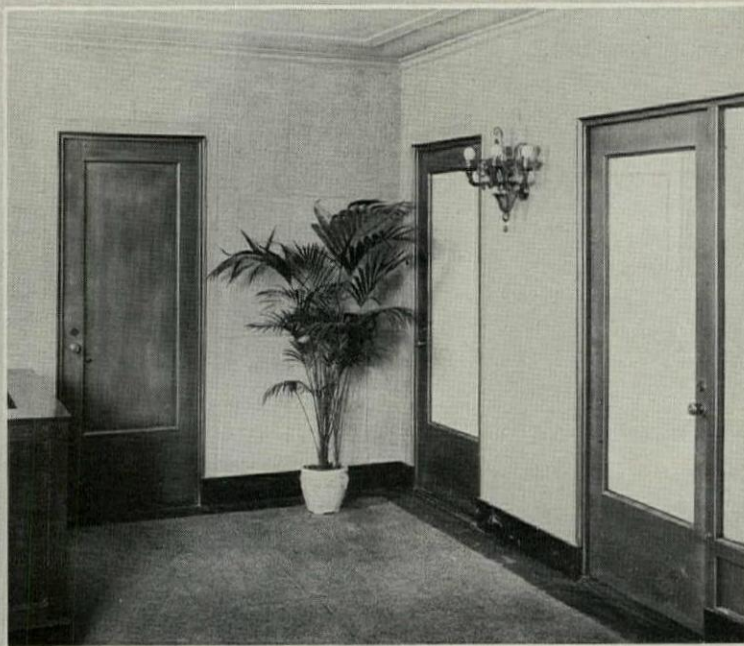
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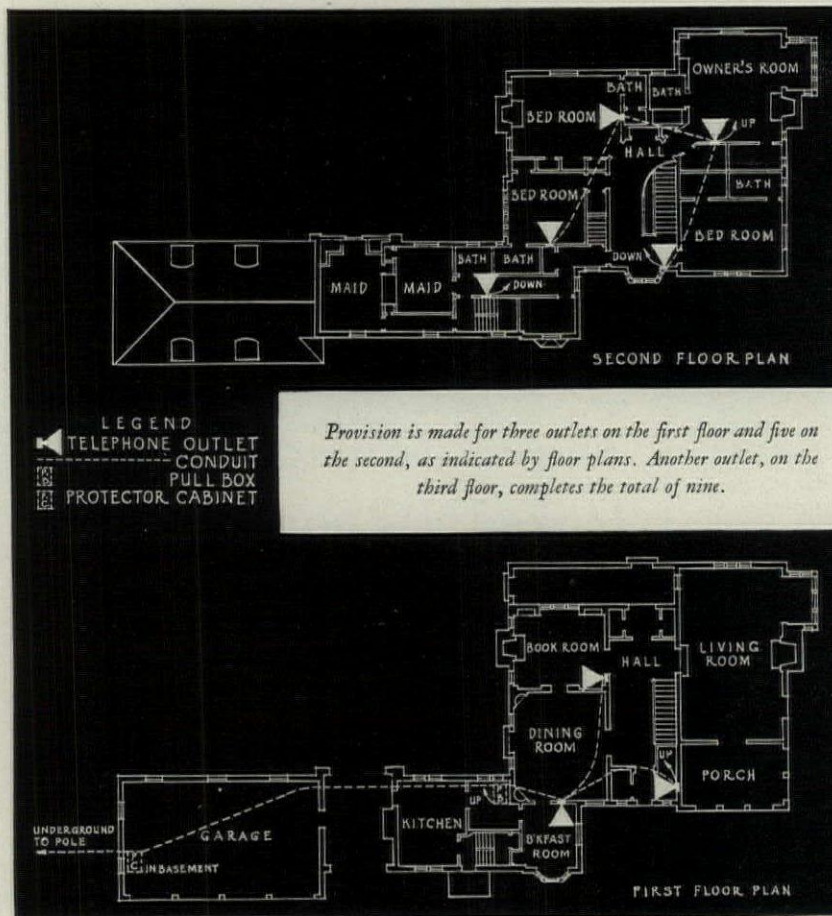
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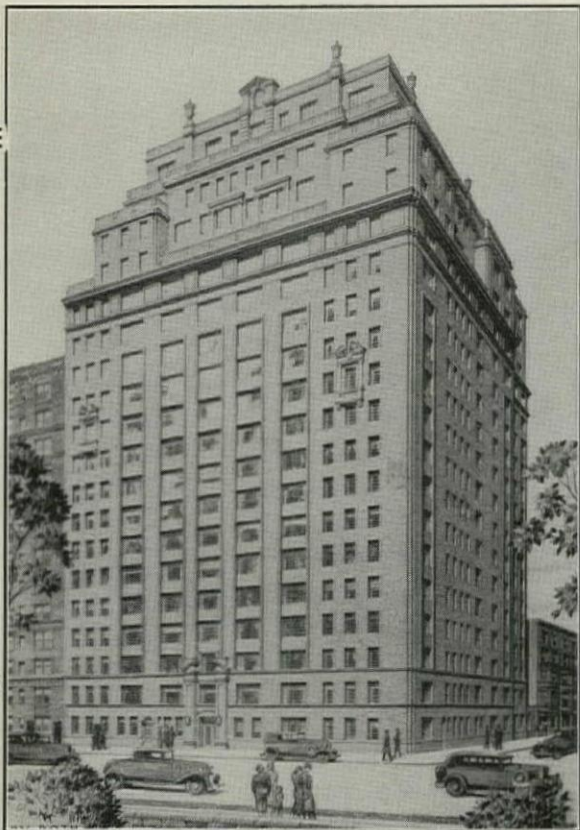


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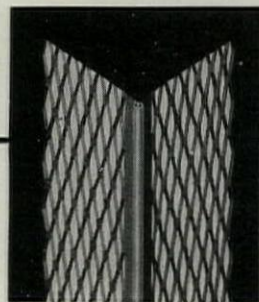
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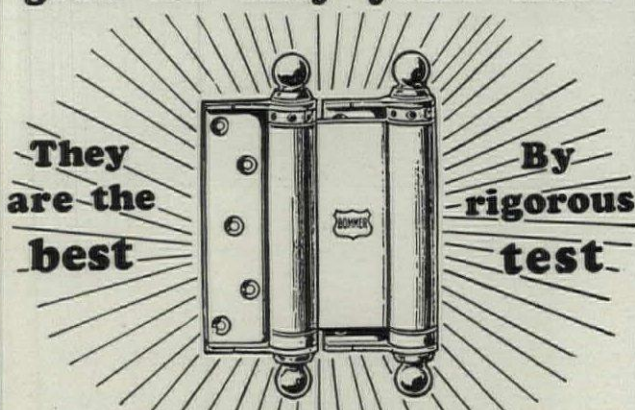


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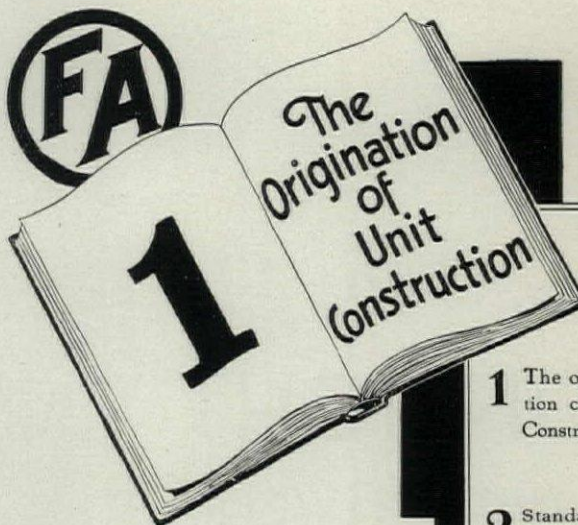
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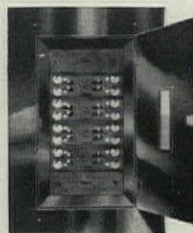


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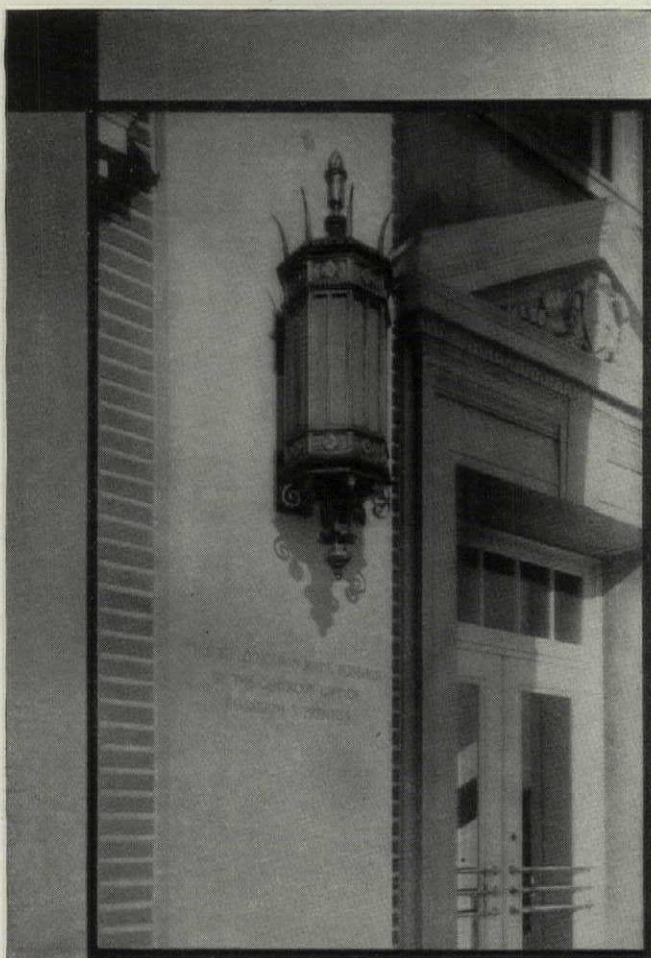
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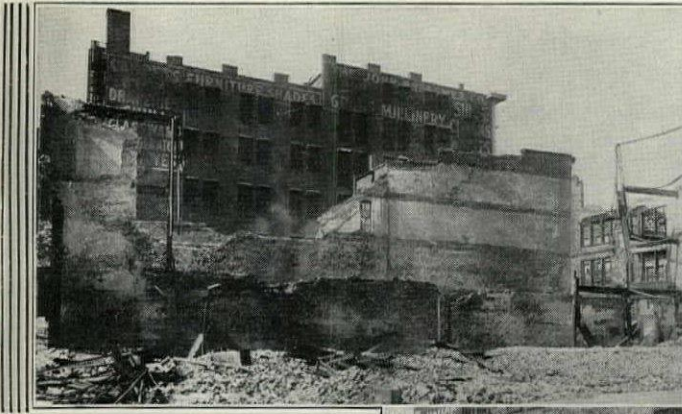
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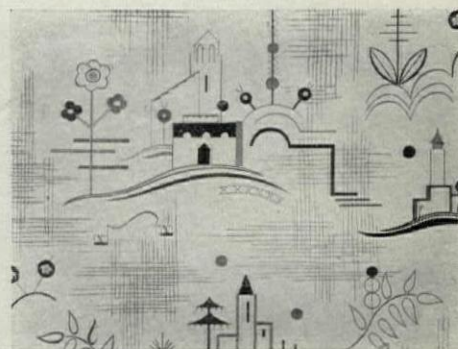
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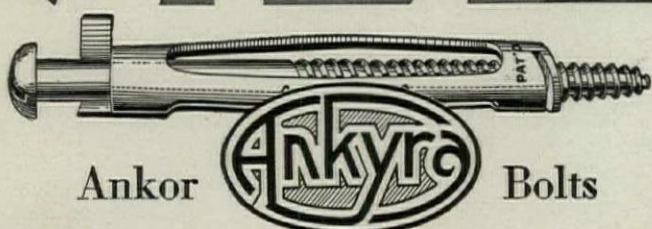
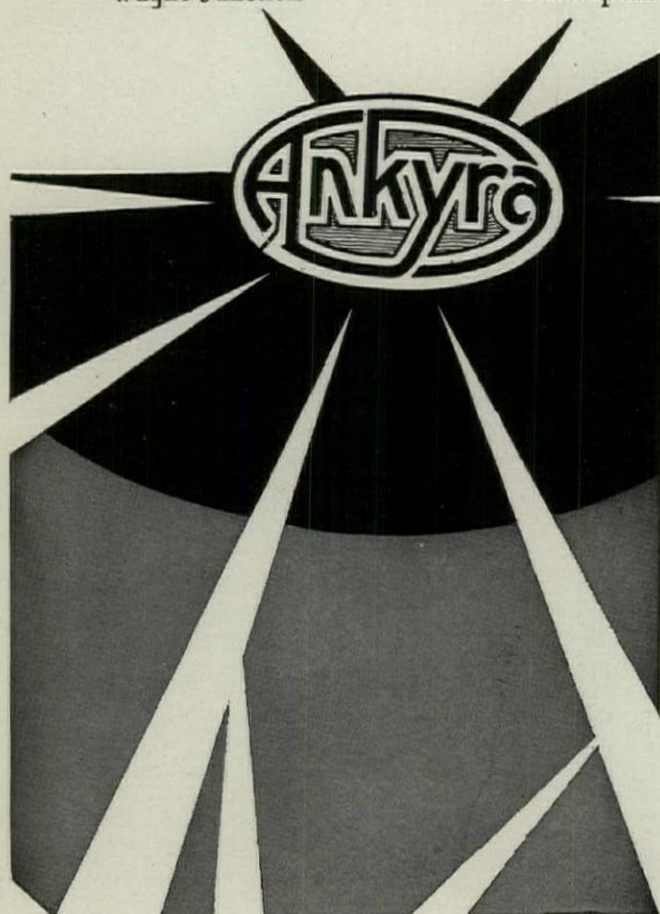


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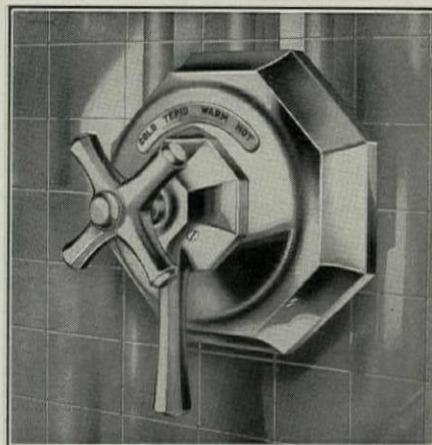
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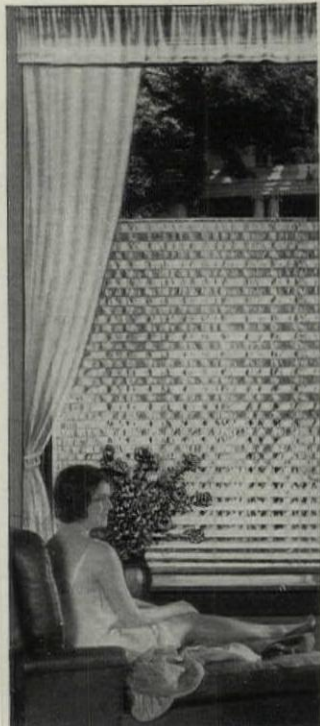


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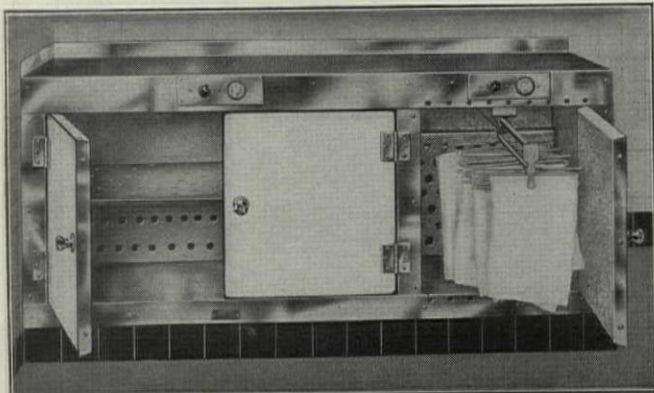
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A Modern Teapot Tempest

The Functionalist Design for Radio City Has Aroused Public Indignation in New York

On another page in this issue, rather condensed reference is made to the controversy provoked in the New York newspapers by the publication of the model of Radio City, the huge Rockefeller project. Such a storm of public protest was aroused that, although the group of buildings is entirely a New York affair, the principle involved becomes of national interest.

The profession is, of course, already acquainted with the general features of the preliminary design for Radio City since all of the architectural papers have shown pictures of the model that caused all the stir. The architects, Reinhard & Hofmeister, and their associated firms, Raymond Hood, Godley & Fouilloux, and Corbett, Harrison & McMurray have, in the April *Architectural Record*, presented their side of the story and have pointed out that economic considerations were paramount. Perhaps some of the criticisms, therefore, were not entirely fair since the critics were without complete knowledge of the factors with which the architects were confronted. And, unfortunately or fortunately as the case may be, only the architects themselves have that knowledge. It is only reasonable to suppose that they realize, better than anyone else, their responsibility to the client, to Columbia University which owns the land, to the owners of nearby properties, and to the general public of the city. They undoubtedly take that responsibility seriously and are going to do what seems to them right and proper.

A mistake was made in the beginning by giving publicity to the original idea that Mr. Rockefeller was going to provide the city with something truly monumental, something that would take rank with the great public squares of the world such as the Place de l'Opéra or the Place Vendôme in Paris. This idea was accepted by the public which thereupon looked forward eagerly to the publication of the designs. With its mouth all made up for frosted cake the public was naturally keenly disappointed when the model revealed that it was to get only bread. It is perhaps only fair to say that the proposed buildings will not be entirely out of harmony with much of contemporary New York, nor will they be less sightly than a large proportion of the modern commercial structures erected during the past few years. A great opportunity to beautify the city has been lost, regretably, but the client is apparently satisfied that the money invested in the project is going to be safe. And that, after all, is the primary consideration with the backers of commercial buildings everywhere. We are not going to like the bread as well as the cake but it may prove to be more nourishing though less edifying. Time will tell.

The whole controversy is interesting because it demonstrates that the public, of New York at least, can get stirred up about architecture and that it does take an interest in the appearance of its buildings. Of course, many of the indignant letters to the press were written by architects, artists, and enlightened citizens who take the æsthetic problem most seriously, but there were many also from obvious laymen from whom such an outburst was not expected. Lack of space does not permit us to quote from even a fair proportion of the newspaper columns that have been given to the discussion in the form of both editorials and letters from readers. Anyone who is interested can secure copies of the *Herald-Tribune* and *Times* over the period covered by the squabble and draw his or her own conclusions.

In an article in the *New York Times* for Sunday, April 5, 1931, written after interviewing the architects and getting their side of the story, H. I. Brock says, "What it will look like, whether it will be beautiful or ugly, is a matter upon which discussion may and will continue to rage. Indeed, this question cannot be rightly answered until the Radio City is a fact and not a dream. Perhaps the final solution of it will have to wait until another generation gives its verdict on the completed work. What we have undertaken to show here is that Radio City is designed and will be executed as a huge machine. The purpose of this machine is to afford maximum facilities and opportunities to the business enterprises of every sort which it is intended to serve. At least it is a bold attempt to solve the greatest problem which modern progress has thrust upon our biggest, most crowded and swiftest moving city."

While we, personally, do not like the designs as published and while they do not seem, to us, to have any great distinction from an æsthetic point of view, we are willing to withhold final judgment until the buildings become a reality. We are told that changes have already been made and that more may be made which will help to make the group easier to look at. We hope that this is so. Meanwhile the functionalists are here having their opportunity to prove or disprove their theories in a big way. Whether architecture in the future is to aim for utility only and let beauty come or not as it will or, as in the past, aim for utility and beauty both will depend largely on the outcome of the present struggle. Radio City will work; its buildings will be tremendously useful; there will be plenty of light and air and every convenience that human ingenuity has been able to devise will be available. Why can't it be beautiful also?

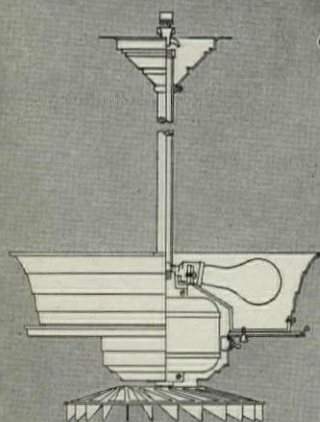
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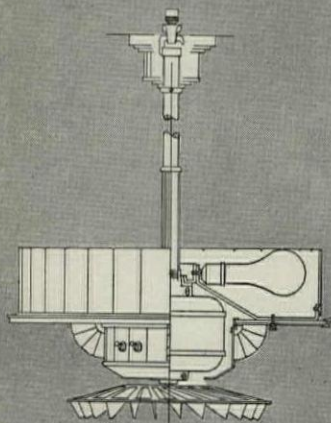
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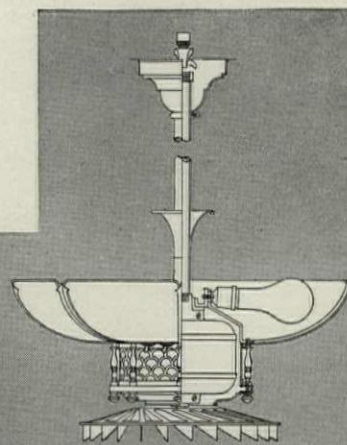
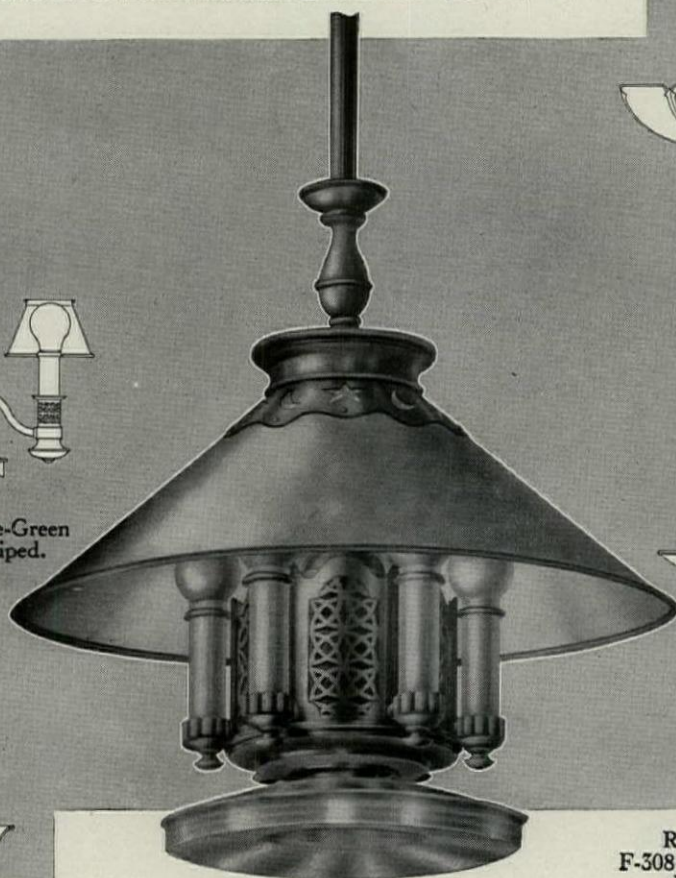
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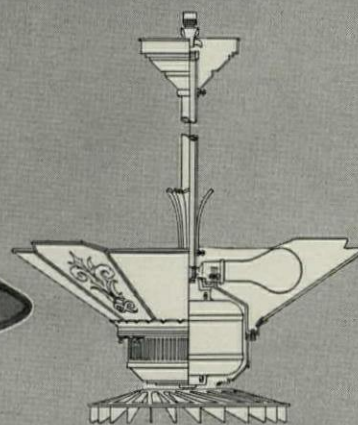
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This Month and Next

We have so many good articles on hand for next month that we cannot find room for all of them but we will describe a few here and hope to be able to work them in. As announced last month we will give considerable space to a discussion by a number of architects, specification writers, draftsmen, and manufacturers' representatives of the problem of better cooperation. We already have received a number of good letters on the subject but would welcome additional comments since every good suggestion will be valuable. For a complete description of what we want refer to advertising page 61 of the April issue. Then sit down and write us *your* ideas.

Wrought Iron craftsmanship is always of interest to the architectural man. We will print in June an article by W. Francklyn Paris on a modern French craftsman who is a master of his art and who combines traditional thoroughness with a personal modernism in design. This man is Georges Szabo, "a *feronnier* of the old school" as Mr. Paris characterizes him, and we are sure that the specimens of his work which will be illustrated will be inspiring to all designers.

We expect a large group of our subscribers to begin, in this

issue, reading the series of three lectures by William Ward Watkin. Next month the lecture will be on "The New Manner in France and Northern Europe," and the author will bring out some of the reasons why contemporary architecture is taking the forms it is.

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One of the problems of the young architect who is just starting in business is that of building a prospect list. How shall he go about finding people who are interested in building and how shall he let these people know of his talents? Royal Barry Wills of Boston, who has been through the experience of starting from scratch to build up what is now a successful small-house practice, has written us a very informative article concerning methods he has found effective.

The color plates for June will show a beautiful rendering by Otto R. Eggers. One plate is of the entire composition and the other a detail at exact size to bring out the technique. The subject is a Presbyterian Church at New Rochelle, New York, by the office of John Russell Pope. The rendering is reproduced as a result of a request from Charles M. Stotz, Jr., of Pittsburgh, who saw the original at one of the Architectural League shows in New York.

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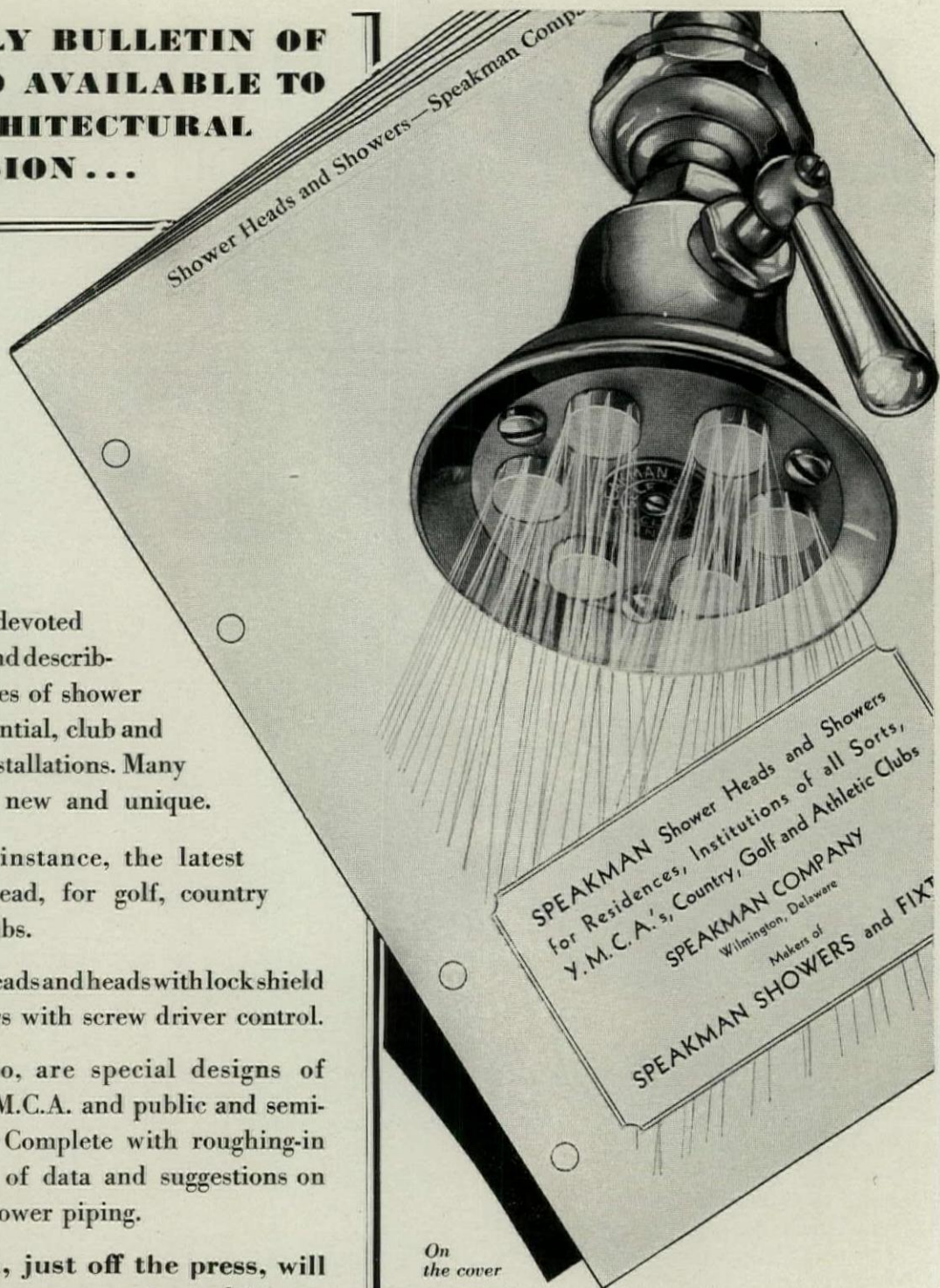
It shows, for instance, the latest cluster type head, for golf, country and athletic clubs.

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PENCIL POINTS
May, 1931

PENCIL POINTS

Volume XII

May, 1931

Number 5

New Houses for Old

By Wells Bennett

"**T**his peppery consommé reminds me somehow of those red Companionate Twos at the House Show. Have you fellows been over?" Duncan and I confessed innocence of companionate life and its housing problems but we accepted the 1941 House Show as a seasonable topic, one on which any live American would have an opinion. It was our noon luncheon custom to fall on a subject, if one offered, and worry it ruminatively along with Lester's *pièce de résistance* of the day.

1941 didn't look too good to me and I took up George Manning's theme in a minor key.

"These shows are held too often. It's just a racket to extract your last dollar and persuade you to turn in perfectly good dwellings. This annual change of manufacturers' models is all bunk. Now take my house, it's two years old and still giving perfectly good performance. We just had heat and cold overhauled and the service man assured me when I paid my first installment on the bill that 'the old ark is good for another three years.' Those were his very words."

"That's what they all say," commented Manning, "but I'll bet it's noisy even now, and you never know when the general timing gears, the silencers, or some other part will quit on you."

"It's good enough for me," I persisted rather sharply, "and it looks like new. I just had the metal parts repolished and you ought to see the entrance—shines like a brass button."

"Yeah, but you should see the 1941 Domestic Eight. The six-room model still has the entrance of your type but the new Eights and Tens have the Ether-Synchronous Doorway—specially tuned to the owners so that the door opens automatically—and silently—as you reach it, no matter what speed you're going."

"Free reeling," said Duncan cryptically, but Manning very properly paid no attention. Duncan sometimes makes those irrelevant interjections.

"As I say, there's no knob, no lock and grating keys, no one but the family can possibly persuade the door to operate—something about one's atomic displacement."

Duncan remarked that he supposed one's atomic displacement wasn't stable, but Manning said there were compensating devices for that. We could see that he was in full cry and I, at least, knew the reason. The Mannings were using a 1937 model Suburban Six and my wife is positive that it had been used as a

demonstrator before George bought it. The finish was now pretty well gone and it rattled badly in any wind above fifteen miles. He frankly described its dilapidation:

"We've spent over five hundred dollars for service this last year and I want to turn the old rattletrap in while I can still get something on it. In another year its used house rating will be zero." He enlarged on one detail: "Our bedroom has been out of commission for over a month. The radio is in the walls you know and the wiring is worn so that it doesn't turn off or tune down. So we keep that door closed and caulked, but even so it's pretty bad. We're getting tired of sleeping on the O'Rourke bed in the living room too, but I didn't want to have that bedroom ripped apart since we're going to turn the house in and it wouldn't make any difference in the allowance one way or the other." This frank disclosure of the Mannings' misery touched us but had not disturbed the main business of the hour. Dunc and I had finished our roast beef *Will Rogers* and George now applied himself to his portion. It required application that day and we all sat back somewhat fatigued to await the gentler encounter with dessert. Duncan egged George on.

"So, you're going to buy a Domestic Eight?"

"No, I think not, though their sites this year are specially good. Mabel and I have about settled on a General Architects' Flexible Eight. Four hundred and thirty-inch street base. There's a house!" He popped a strawberry into his mouth and beamed at us.

"I've seen the advertisements," I countered mildly, but there was no repressing him.

"Wait till you've been to the Show. This job is a beauty. All the latest heat and cold, light, safety, and television features of course, with refinements in furniture and other accessories. For instance, most of the chairs are motor-driven, kitchen service is speeded up with an assembly line, and then there's the Peep-O-Day bed. And is it a real gadget! instead of the old radio alarm this bed tips up slowly, shaking vigorously at intervals and you find yourself up and in good spirits. What?" looking suspiciously at Duncan.

"Nothing," replied that individual solemnly, and the pæan was resumed:

"House clothes are available, matching the finish, but at a slight extra charge."

"All prices f.o.b. Detroit," mumbled Duncan.

"But the big feature is structural glass. Other firms use it for windows and decoration but this job is practically all glass; chassis, floors, roofs, most of the furniture. General Architects' process makes it unique, elastic, unbreakable. There's a wide range of choice as to transparent and opaque units so one's house can have a decided individual touch. Mabel likes the chalet body."

"And just what is the 'flexible feature'?" I queried.

"Oh, two rooms at the back upstairs can be extended for guest room and nursery, or one can be collapsed into a dressing room and the other into a sun terrace or a card room. The change is effortless and takes but a moment."

We were through the meal now, even to settling with Lester and, pondering George's glowing picture, we sat smoking a moment. Duncan hitched back his chair.

"You're practically living in a 'Flexible Eight' right now, aren't you George?" Manning nodded, not displeased.

"Dunc, if I could get you to the Show even you would fall for it." We all laughed, including Duncan. About houses he was a freak for, alone of all my acquaintances, he lived in a brick house. It was far out toward White Plains and he actually owned with it a considerable tract, an acre, he said, in which the house was hidden. To this lonely rustic spot he seemed greatly attached, for he spent much of his spare time there, as did his wife and three children. A

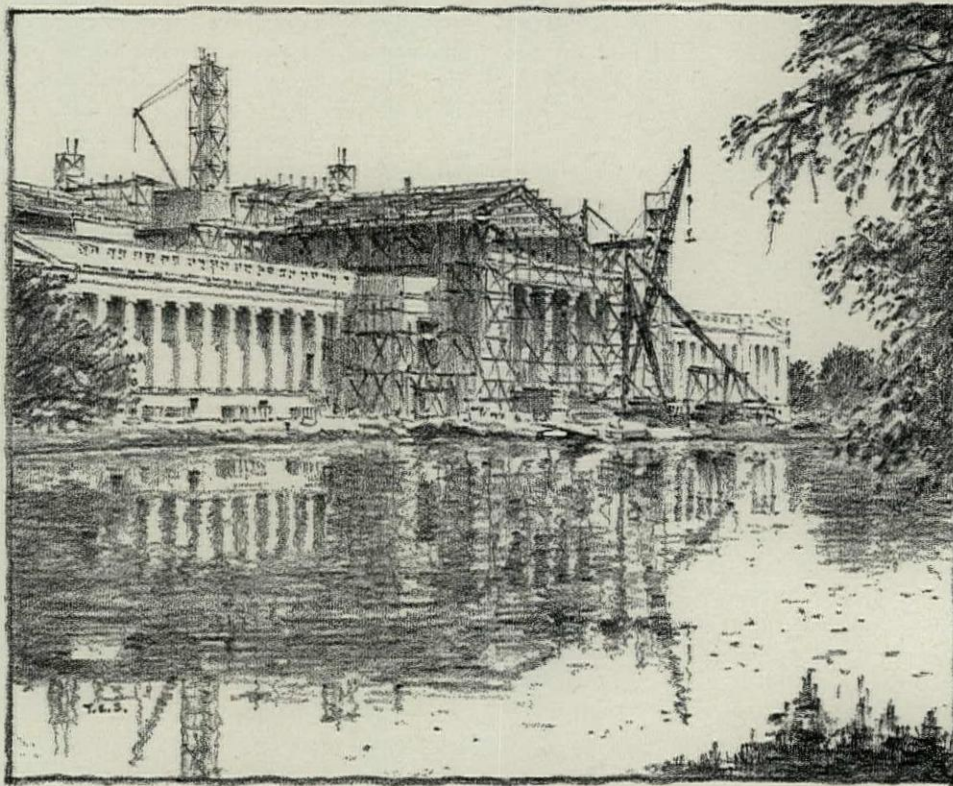
quaint fellow generally, both Manning and I liked him and I know he enjoyed being with us. That was natural enough, for we two were in the world of events and, of course, brought the contemporary viewpoint to him as we thrashed out various problems at our luncheon meetings. Dunc was our audience and he always appeared to like the role. He now spoke with some hesitation:

"My house isn't a machine, it's a permanent, and I suppose you'd say an inert and depressing lump of masonry and wood. It just happens that the Duncans like it. New models—well, I *am* remodeling one wing into a book room and workshop. It's great fun." He stopped, almost embarrassed. I said that I could understand about the books, for my four-shelf kit, books and all, is one of the few things I take with me when we change houses. Manning, I think, could not get the rustic philosophy at all. As we put on our overcoats to go our several ways he said insistently to Duncan:

"But think of the joy of stepping out in a brand new house. Think of the pleasure, the comfort, the better standard of living for your family. Dunc, you don't know what you're missing!" That worthy clapped on his soft felt hat and said quite soberly as he made his way out:

"I guess you're right."

That's the way it is. When we really put the question to Dunc in an argument, he agrees almost too readily.



THE FINE ARTS BUILDING OF THE 1893 WORLD'S FAIR NOW BEING RESTORED

FROM A LITHOGRAPH PENCIL SKETCH BY TRENT ELWOOD SANFORD

Through the generosity of Julius Rosenwald this building is being converted into a permanent Museum of Science and Industry.

Lawrence Wright and His Work

A Versatile Young British Draftsman and Designer

By Page L. Dickinson

It is never an easy task to write about another man's work; if one likes it one is inclined to overpraise it, if one dislikes it one is inclined to pick out the bad and ignore the good. All criticism boils down, in the end, to personal likes and dislikes; but, equally, intelligent criticism must be based on a sympathetic understanding of what the artist is trying to do. In writing of Lawrence Wright I am afraid I shall be inclined to overpraise, partly because although I can see some of his faults they are not the sort of faults that worry me; whereas his good points are very good indeed.

Lawrence Wright has reached the mature age of twenty-four yet, despite this fact, he has retained all his youthful enthusiasm. This, in these days, is a somewhat remarkable achievement. He is becoming well known as an original designer and draftsman of skill and charm in several mediums. There will be more to say on this later.

He took up Architecture for no particular reason and went through the five years' course at Liverpool University, which has been the training ground for so many of the younger, successful men now in practice in many parts of the world.

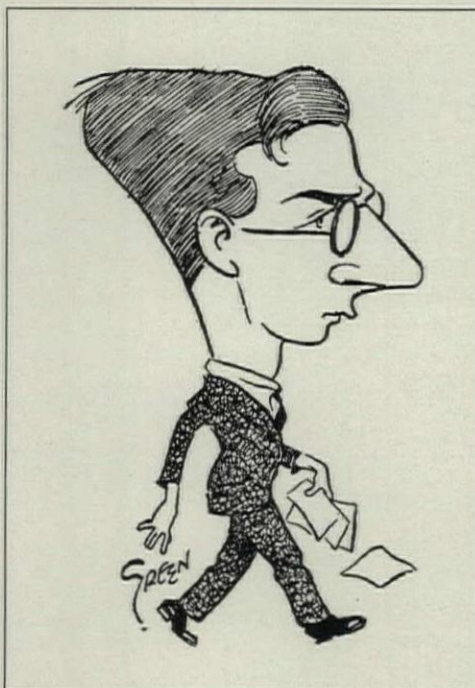
He took his B. Arch. degree with first class honors, winning the Waring prize in color decoration, which resulted in a trip to Sweden.

It is customary for Liverpool students to do a course of measuring in Italy and most men do this in their second year. Wright postponed his Italian tour until his fourth year as he felt he did not know enough history, and that his draftsmanship was not sufficiently good to benefit by Italian study at an earlier stage in his career. One is inclined to agree with him in this, as the second-year student has usually a very sketchy knowledge of history, and one which is hardly adequate to allow much appreciation of refinement of detail, to say nothing of general proportion. In 1929 Wright was placed second in the British *Prix de Rome* competition. The drawings for this, which are reproduced here, furnish a good example of his rendering in India ink and, without going into any criticism of the plan, are a most attractive piece of very lively

draftsmanship. They are full of quality and spirit.

Lawrence Wright took full advantage of university life and by no means confined his activities to his own immediate work. He regarded a university as such and not as a highly specialized technical school. He edited the university magazine and edited it very successfully. He was chairman of the Dramatic Society and took an active part in its productions, so active a part, indeed, that it very nearly, as he says himself, caused him to miss his own third-year examinations.

His university career was crammed full of energy and the acquiring of knowledge of all sorts, except in regard to sports and games, in which he took little interest. I have no wish to disparage games but it is rather a relief to meet an English university man who has spent some of the most valuable years of his life in doing something else than kick a football about. To most of us who have to work, and work hard, the importance attached to athletics at universities is a little irritating. Wright thought so too. Despite this, although of slight frame, he can do a long day on his feet with the best of them. I shall tell a tale of him in this connection in due course.

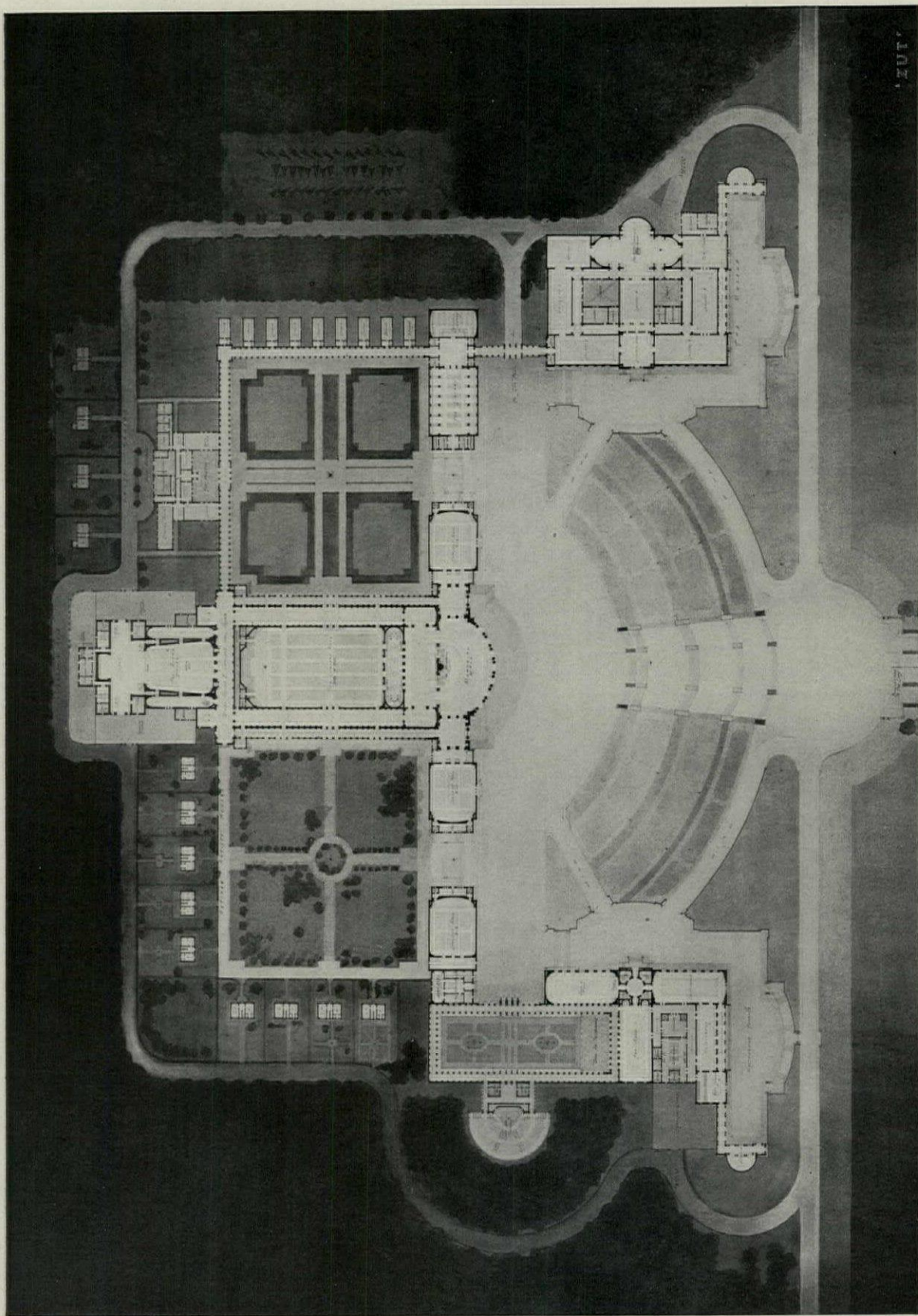


A CARICATURE OF LAWRENCE WRIGHT

On leaving Liverpool, Wright entered the office of Mr. Frank Verity, the well known London architect, where he spent a year, mostly on theatre plans, until he took the plunge and started on his own in a studio-cum-office in Carlton Vale. Since then he has been busy mainly on perspectives and rendered drawings in color for different architects. Like many young members of his profession he has done some "ghosting" although this is not, naturally, his ambition. The ghost system is still a good deal in vogue despite its obvious drawbacks. If the design is successful the poor ghost gets no credit. On the other hand the ghost has little responsibility and provided he pleases his employer can be as experimental and wild as he likes. Little really can be said in defense of the system and there can be no doubt that serious architectural opinion is against it. Whether it will ever cease, however, is another matter.

When it comes to architects' perspectives Lawrence

PENCIL POINTS FOR MAY, 1931



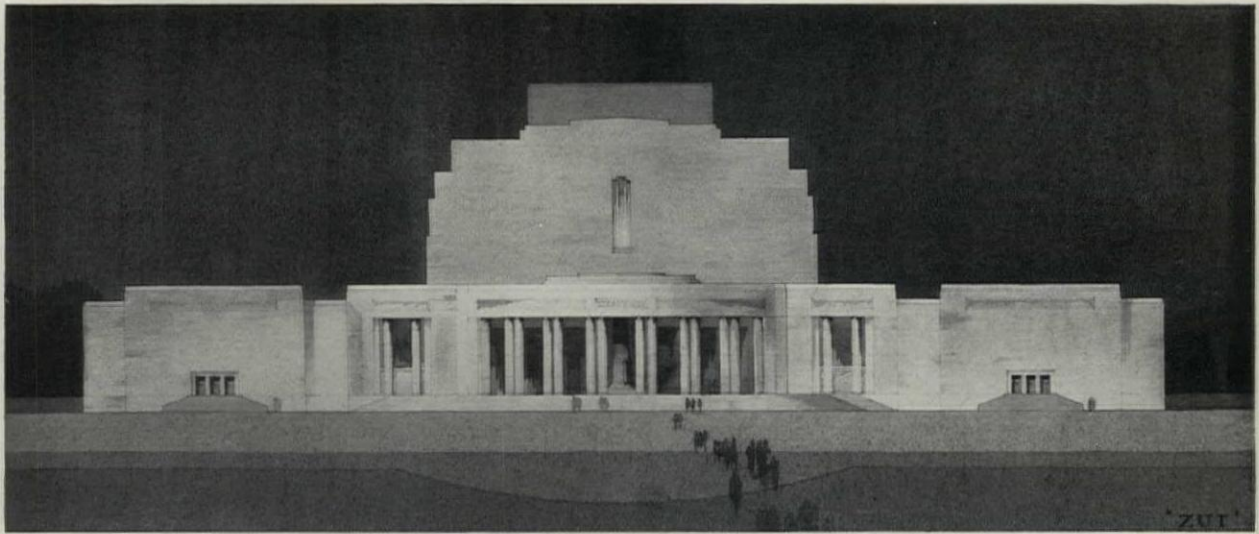
PLAN—"A MEMORIAL TO A MUSICAL COMPOSER"

DESIGN BY LAWRENCE WRIGHT, PLACED SECOND IN FINAL COMPETITION FOR BRITISH ROME PRIZE, 1928-29

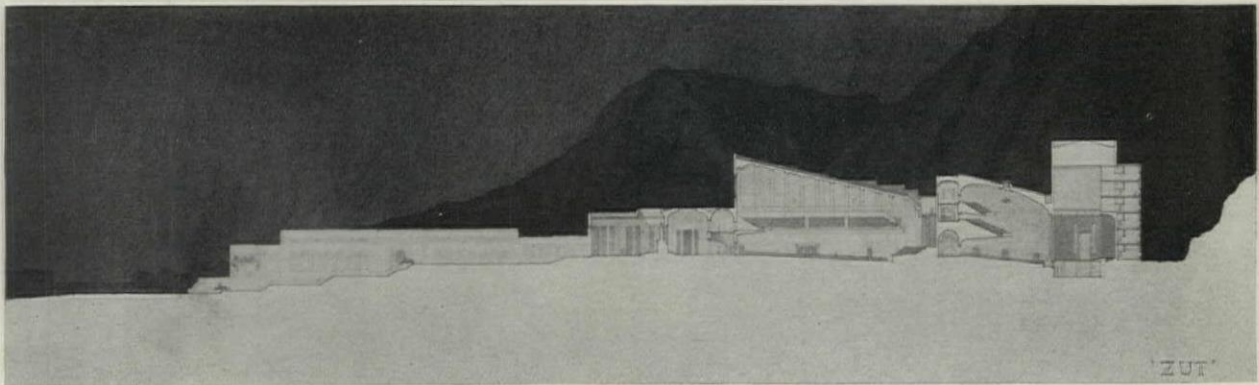
LAWRENCE WRIGHT AND HIS WORK



ELEVATION OF ENTIRE SCHEME

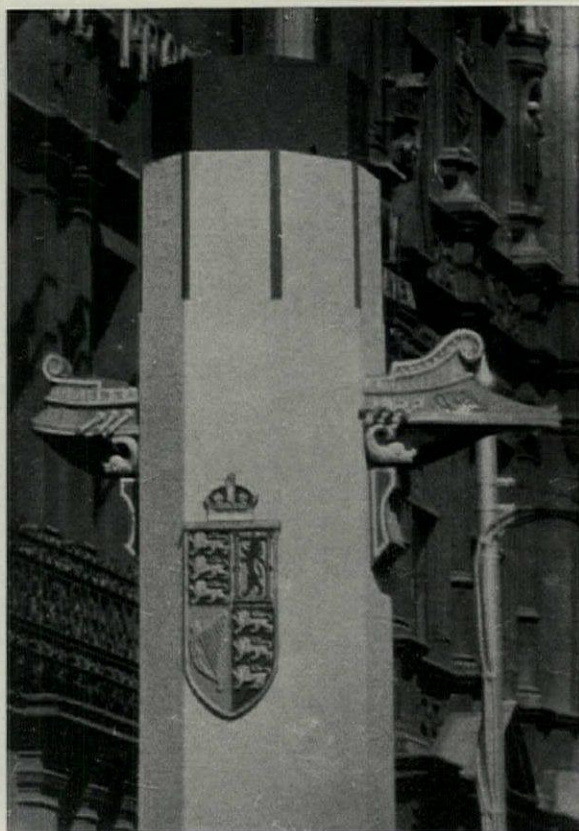
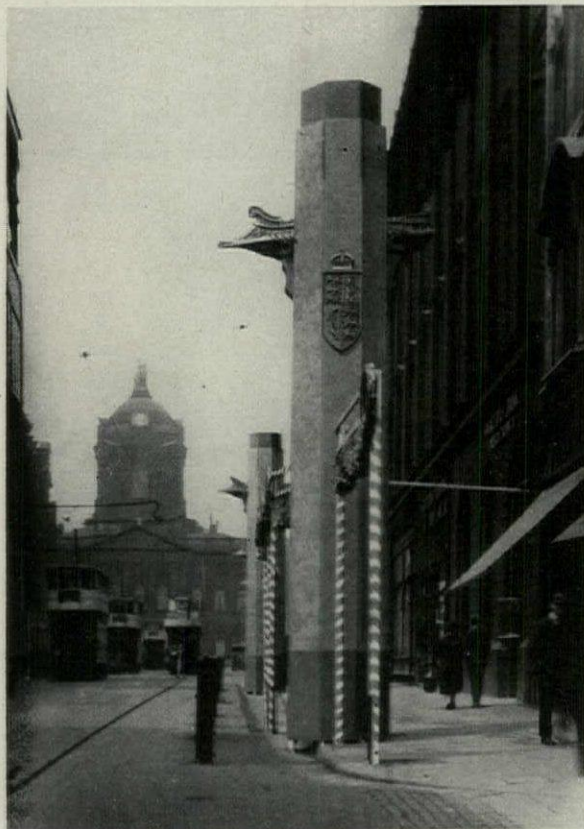


ELEVATION OF CENTRAL UNIT



SECTION ON PRINCIPAL AXIS

"A MEMORIAL TO A MUSICAL COMPOSER"—ELEVATIONS AND SECTION
DESIGN PLACED SECOND IN BRITISH ROME PRIZE COMPETITION, 1928-29

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[330]

LAWRENCE WRIGHT AND HIS WORK

Wright works as follows. If an orthodox, conventional type of water color is insisted on he has, of course, to conform; but where he is given a free hand to draw and render in his own manner, he sets up a building accurately to start with and then puts it aside for a bit. He then, as he describes it himself, goes at it with gusto and a soft pencil, doing something fairly wild and woolly. His favorite medium is tracing paper with an HB pencil, the sort of tracing paper "that eats up an HB pencil most pleasingly." The paper is then mounted on a tinted card and finally a little water color is added. Alternatively, he has red line photo-prints made from the tracing and sketches and colors on these. The drawback to this latter method is that the prints fade and go brown in about six months, but as Wright says "By that time I have been paid and have departed."

He has tried his hand in many mediums, including etching, drypoint, aquatint, and wood-engraving. He says he has not the patience for the last and prefers lino-cut, though he finds it difficult to take lino-cuts seriously: "There is something undignified about the material."

He is a person of many interests, as I have tried to suggest, and is also a man of resource. Once, when sketching in Siena, we were greatly bothered by the local children, who clustered round and obscured the subject. We bribed most of them to go away, but one small girl carrying a baby was particularly persistent and refused to budge. Wright entered into a conversation with her in vile Italian and did a quick drawing of her and her charge. It was presented to the lady, and she, honorably fulfilling her part of the bargain, beat a dignified retreat and we were left in peace. We settled down to serious drawing when there came the sound of running feet from all quarters. Dozens of little girls, each carrying a baby, flung themselves upon us demanding to be drawn! We gave up the unequal struggle and came away. I modified my opinion of Wright's resourcefulness.

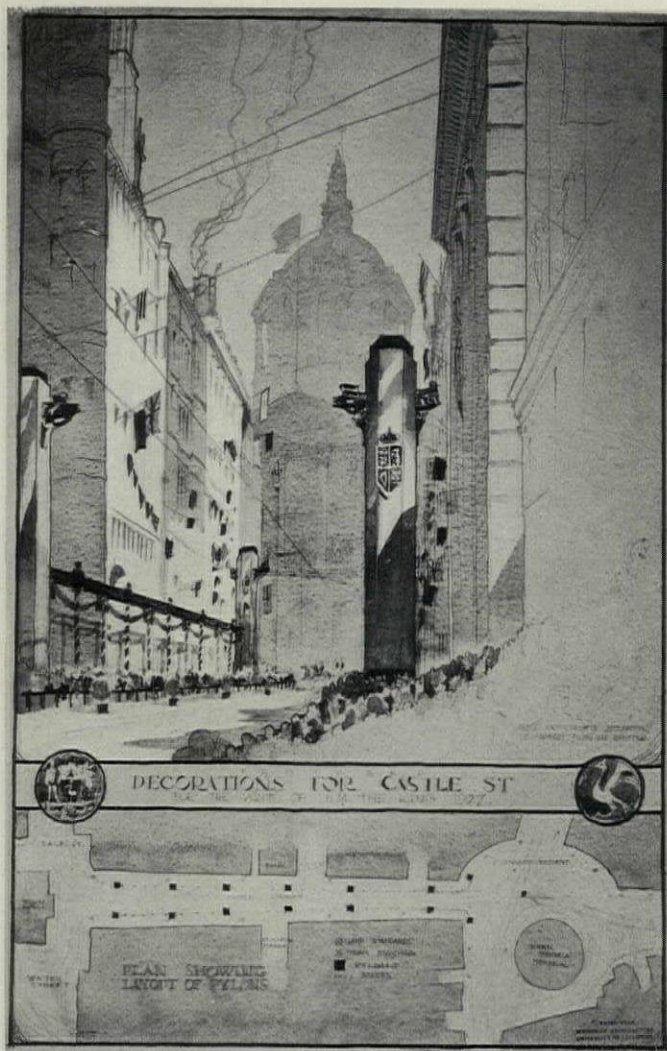
In Stockholm, Wright and his friend used to amuse themselves when sketching by answering questions from Americans in Malay or Italian or any other language of which they knew a few words. This often resulted in their being taken for natives, and the questioners sometimes grouped themselves behind the artists to examine the work in progress. This, however, was a risky business and likely to damage artistic pride—"Hell, pop! This guy is no Samuel Chamberlain!"

Wright, like a wise man, has no definite ideas as to what he is going to do in the future. He thinks that working for other architects, as he is doing, and carrying out his own work as well, is the best training that can be got and more likely to open up the way than sticking as an assistant in an office. He says it leaves him freer to take any sudden offers of cathedrals and town halls from unexpected sources. We can find no fault with this sentiment.

He is a young man of strong likes and dislikes. Among the latter he includes sketches of old houses at Dinan and Lisieux, Worcester or Segovia—or anywhere else, in fact, that is much painted and sketched and has picturesque old houses. "They always lean towards each other at the same angle and have the same old man with a stick hobbling towards the vanishing point." I confess I do not agree with this view. Archi-

tects, especially domestic architects, can and do learn a lot by drawing "picturesque, old houses." They can learn about grouping, light and shade, scale of parts, and above all control of color by just this very means. In fact, one can make a strong case out that these things can only be learnt by picturesque sketching. They certainly cannot be acquired by studio work alone. As well attempt to draw the body from casts instead of the live model. I join issue altogether as to Mr. Wright's interpretation of this form of architectural activity. So that's that!

Some two years ago I decided to play Providence and get Lawrence Wright to embark on a new form of



PLAN AND PERSPECTIVE OF CASTLE STREET DECORATIONS

work, or rather a new subject for his lino-cuts. It happens that I am a mountaineer and have for many years been struck by the fact that hardly anyone can successfully paint or draw mountains. This is indeed a fact, and although mountains appear with great regularity in any exhibition of landscapes, they are usually formless and their architecture all wrong. The delightful work in water color of Sir Charles Holmes stands out as a brilliant exception. His anatomy is always correct and as vigorously rendered as that of the figure in an Orpen drawing. I believed that Wright could draw mountains and accordingly got him to join a climbing party in the Snowdon district. There is a story against him here. I took pains to write and explain that he must wear very strong, old clothes, and, above all, heavy boots with nails. When he appeared at breakfast on the first morning, he was immaculately clad in a beautiful, new sports coat, elegantly creased gray flannel trousers and brand new brown shoes, innocent of nails! Like a true artist he had entirely ignored my practical suggestions. However, he acquitted himself very well on the climb selected for the day, the well known Parson's Nose, a fine piece of rock some seven hundred feet high leading to one of the main ridges of Snowdon. On gaining the ridge there is a wonderful panorama and the view towards *Crib Goch* is particularly impressive. Seated on this airy pinnacle, Wright made a drawing

of *Crib* which resulted in the lino-cut reproduced here. I think everyone who sees this delightful print will agree that the artist has succeeded in catching not only the spirit of the mountain but also its fine rock architecture. You can see the very bones of the thing. We had a fine walk along the ridge seen in the print and Wright contributed to the evening's entertainment by singing a pathetic ballad:—

*"Your baby's just gone down the plug hole,
Your baby's just gone down the plug,
The poor little mite
Was so slim and so slight,
It should have been bathed in a jug."*

His voice is a surprising deep base. Heaven knows where it comes from, probably his boots.

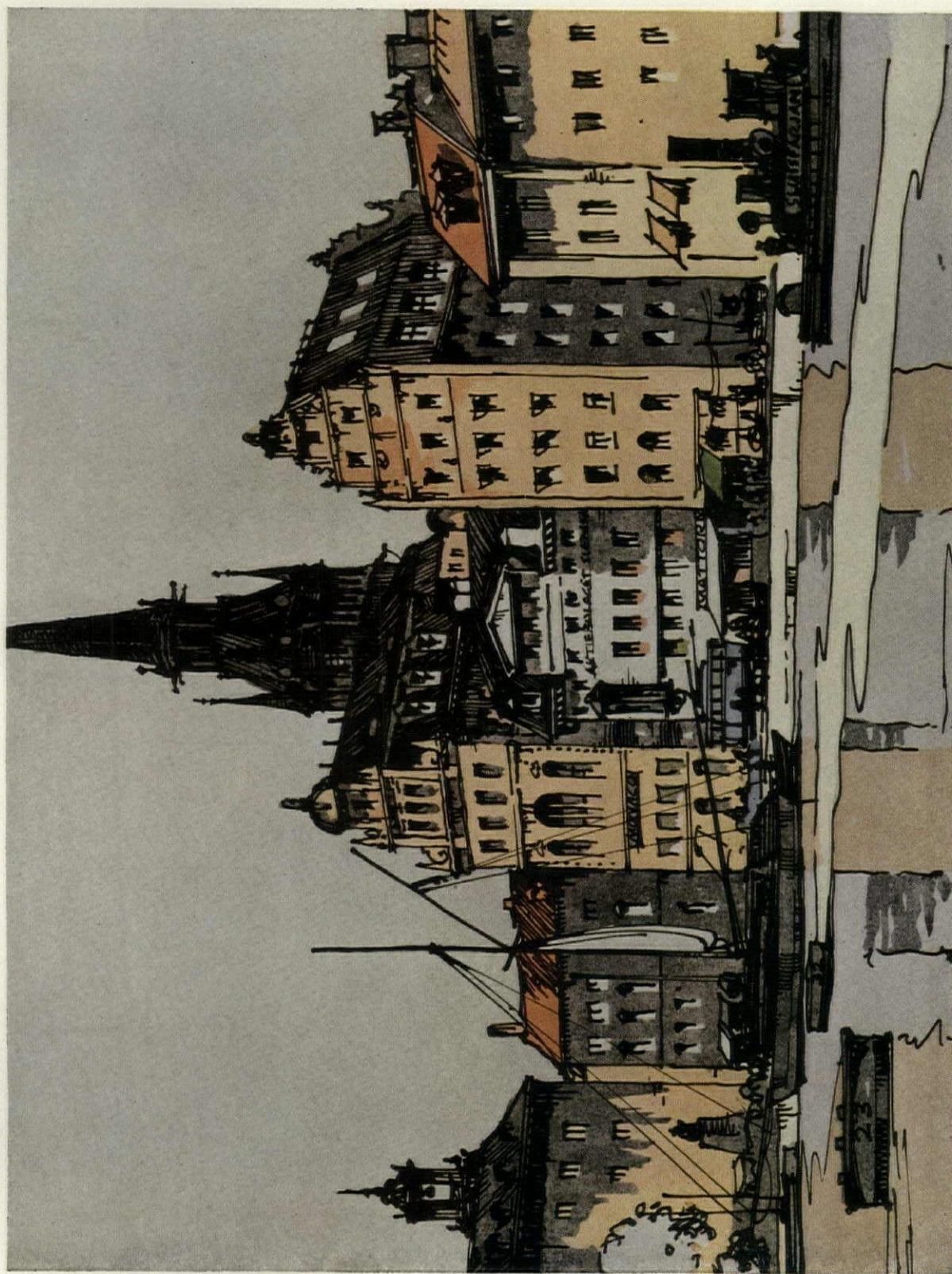
We finished a successful day of art and mountains by a swim in the icy water of *Boch Llywedd*, famous as the scene of King Arthur's last battle and his reputed burying place.

Now let me say a word or two on the actual drawings, which are reproduced here. The sketches and drawings in a light vein explain themselves. Anything added by me would be a case of gilding the lily, or, if you like, vaselining the funereal top hat on the day after granny was planted.

The decoration scheme for Castle Street, Liverpool, was a twelve-hour sketch design competition to be carried out when their Majesties, the King and Queen,



CASTLE STREET AS IT APPEARED WITH WRIGHT'S DECORATIONS FOR THE ROYAL VISIT, 1927
GOLDEN ORANGE PYLONS WITH RED CAPS AND BASES AND BLUE, GREEN, AND GOLD ON THE SHIELDS



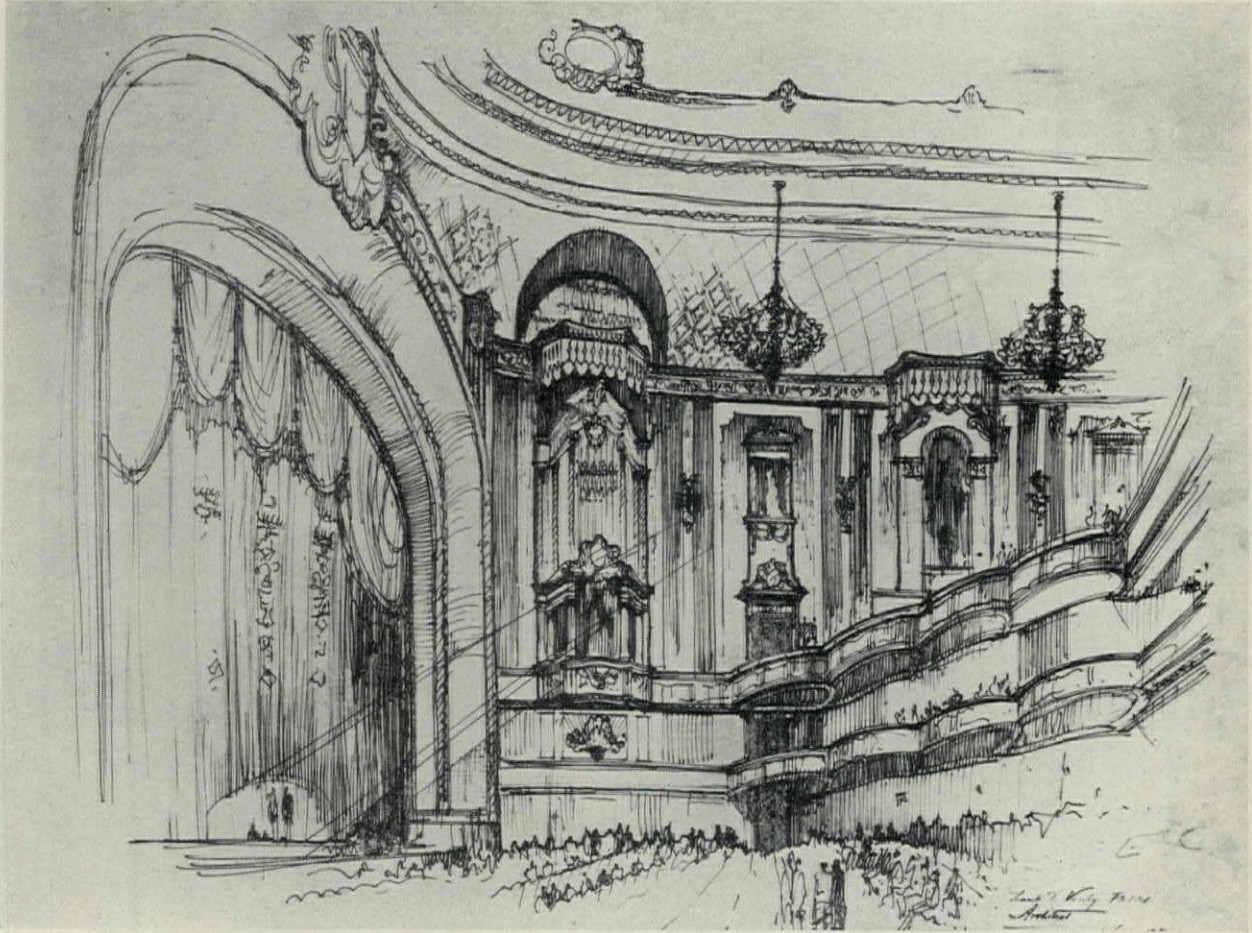
STOCKHOLM

FROM A DRAWING IN INK AND WATER COLOR BY LAWRENCE WRIGHT

PENCIL POINTS
(May, 1931)

PENCIL POINTS SERIES
of
COLOR PLATES

This drawing by Lawrence Wright, whose work forms the subject of an article in this issue, was made on light grey tinted illustrators' board with pen and ink and transparent water color. It might well be a study for a linoleum color block print, a number of which have been made by this artist with great skill. The combination of the black ink with the flat washes of transparent color may suggest an effective scheme for architectural renderings. The original measured 11½" x 9".

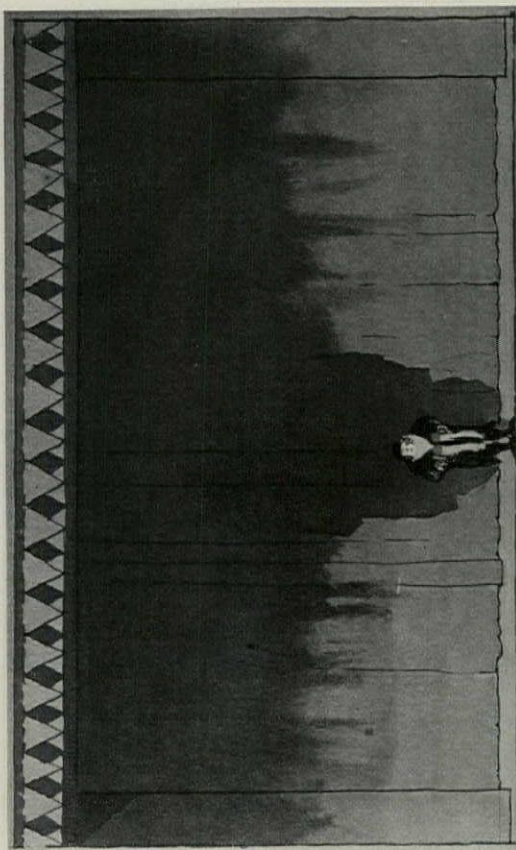


SKETCH FOR A THEATRE INTERIOR—VERITY AND BEVERLEY, ARCHITECTS

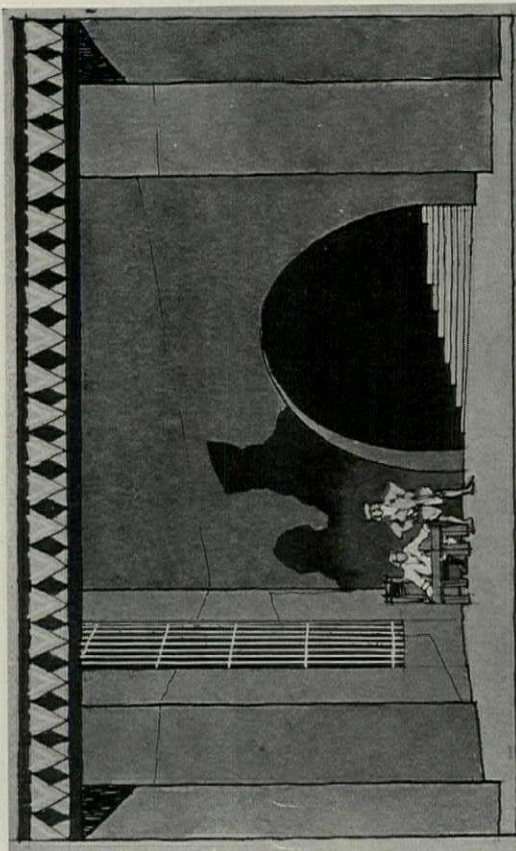
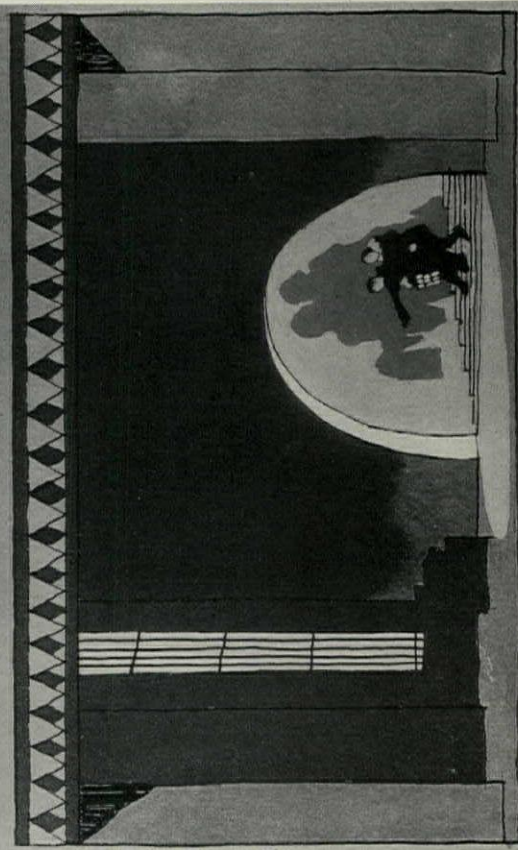


WATERFRONT, COPENHAGEN—PENCIL SKETCH BY LAWRENCE WRIGHT

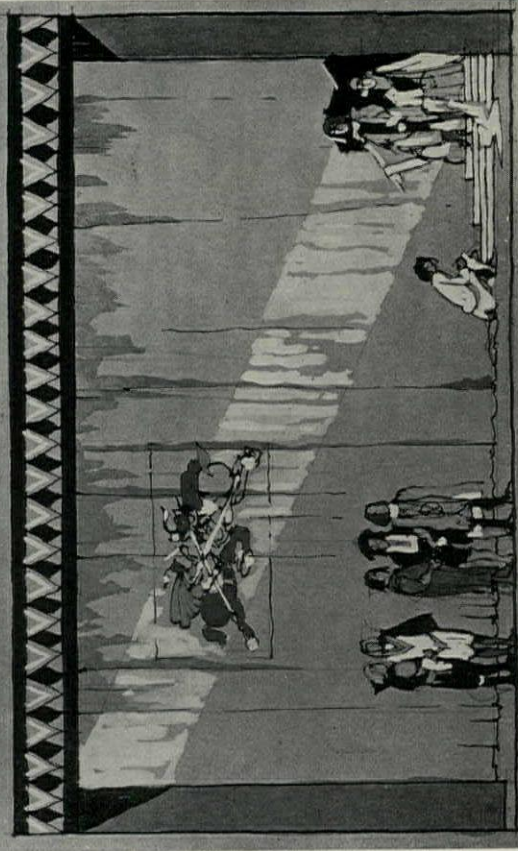
PENCIL POINTS FOR MAY, 1931



SCENE ONE
*Black velvet curtains. Red Flood Box in deep centre casting shadow of Gloucester on
 wall. At entrance of murderers, red foot lights up. On exit of murderer (2)
 and murderer (1) red foot turns and back and open on scene two
 with last phrase of scene.*

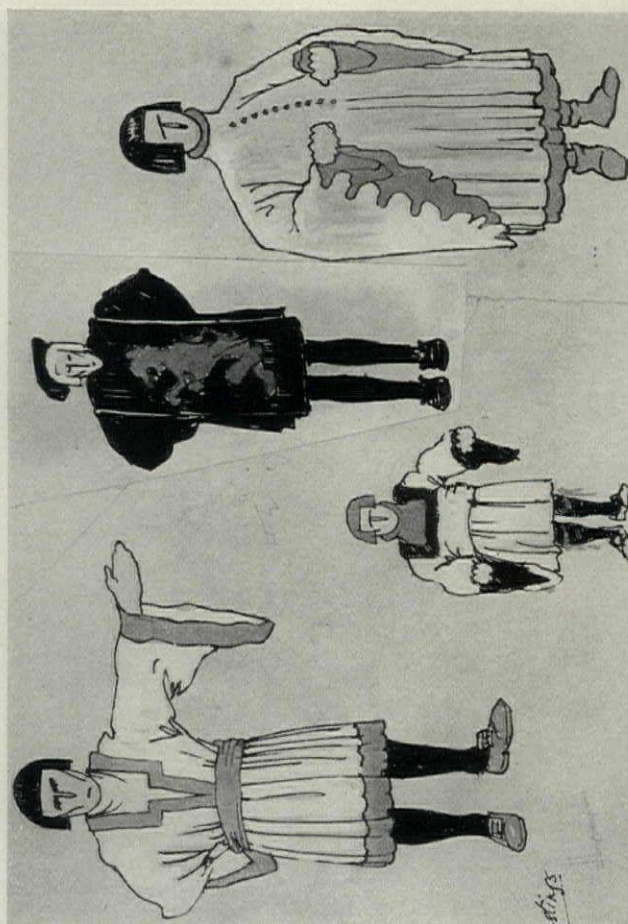
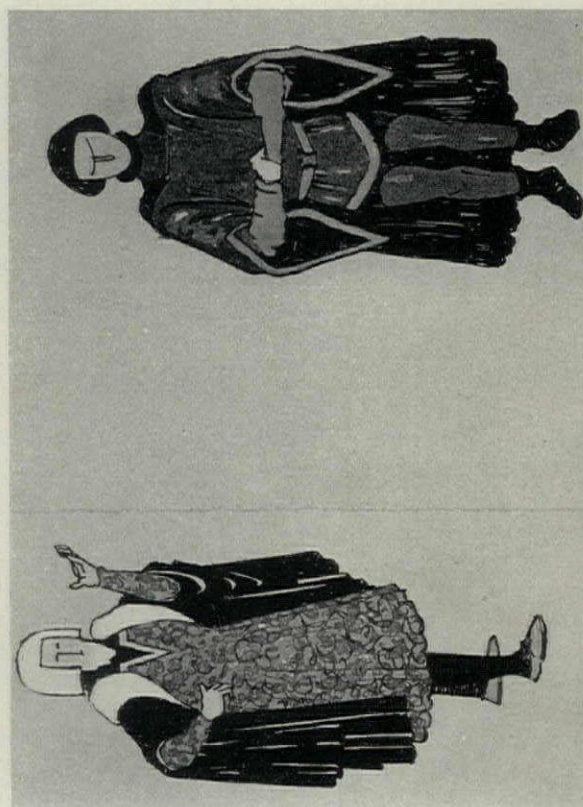
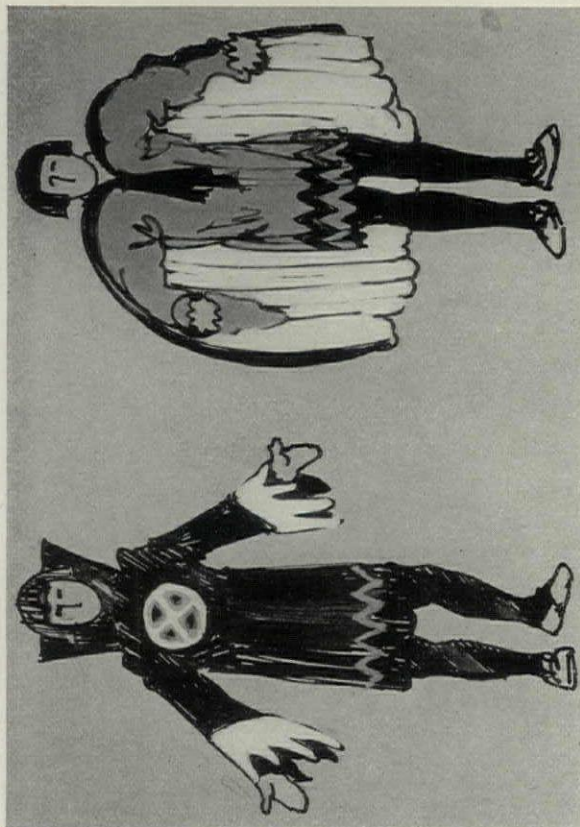


SCENE TWO
*Red Box as for Scene I, plus red foot & hatbox, with exit of Gloucester when all
 die & foot comes up. Gloucester is discovered against
 the wall his final speech.*



STAGE SETTINGS AND COSTUMES FOR "RICHARD III" FOR THE LIVERPOOL UNIVERSITY DRAMATIC SOCIETY
 SIMPLE BUT EFFECTIVE DESIGNS BY LAWRENCE WRIGHT—THE ORIGINALS ARE IN BLACK AND COLOR ON GRAY PAPER

LAWRENCE WRIGHT AND HIS WORK



SOME COSTUME SKETCHES BY LAWRENCE WRIGHT FOR THE LIVERPOOL UNIVERSITY DRAMATIC SOCIETY'S PRODUCTION OF "RICHARD III"
THE ORIGINAL DRAWINGS WERE DONE WITH INDIA INK AND OPAQUE WATER COLORS ON GRAY PAPER



SKETCH BY LAWRENCE WRIGHT FOR THE SHEEN CINEMA—LEATHART AND GRANGER, ARCHITECTS

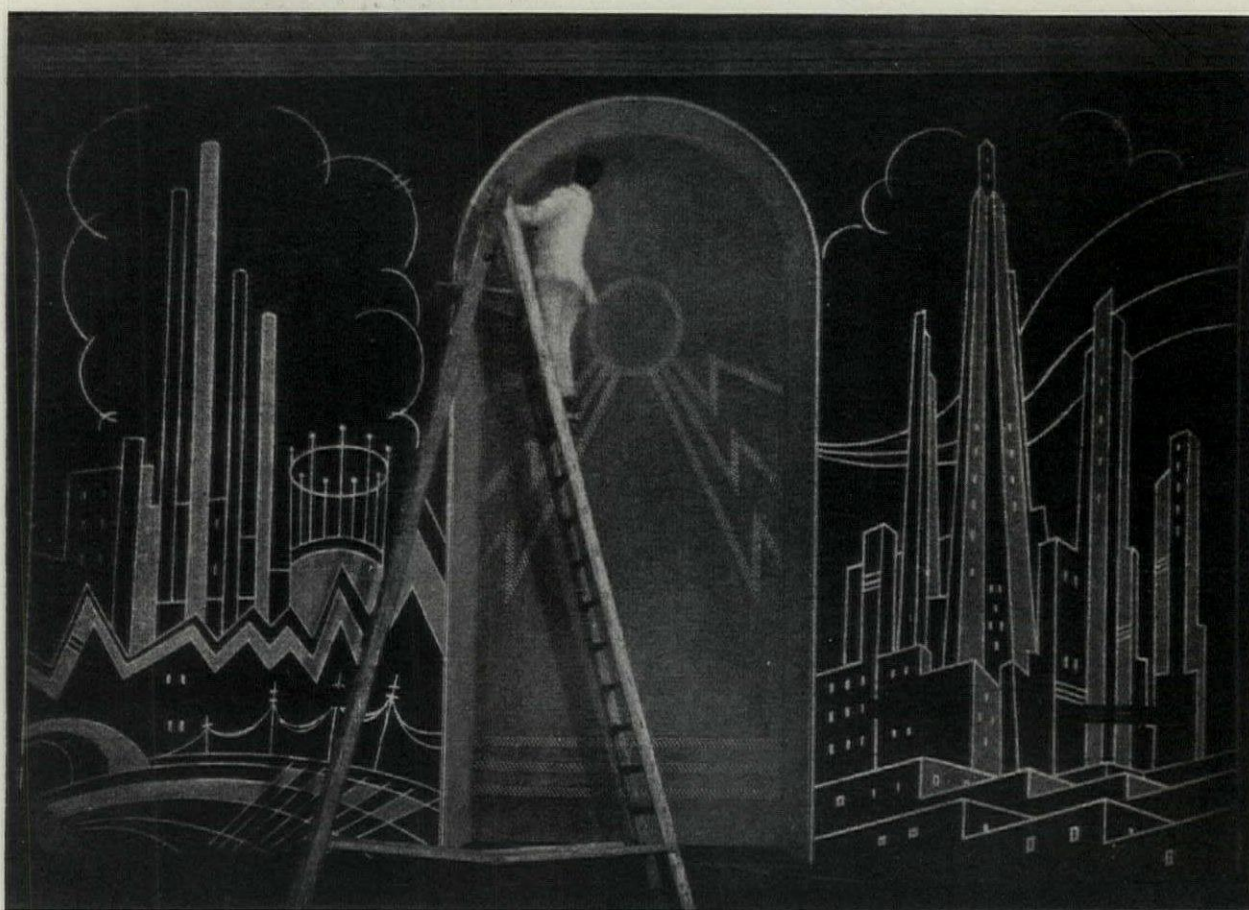
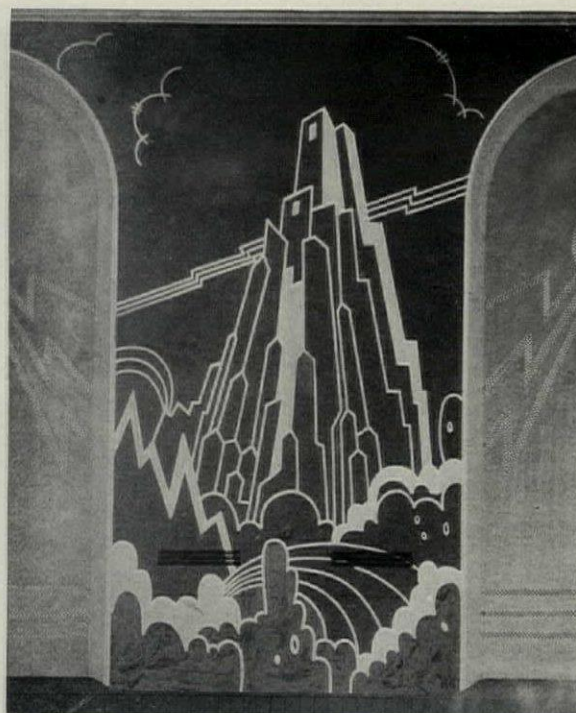
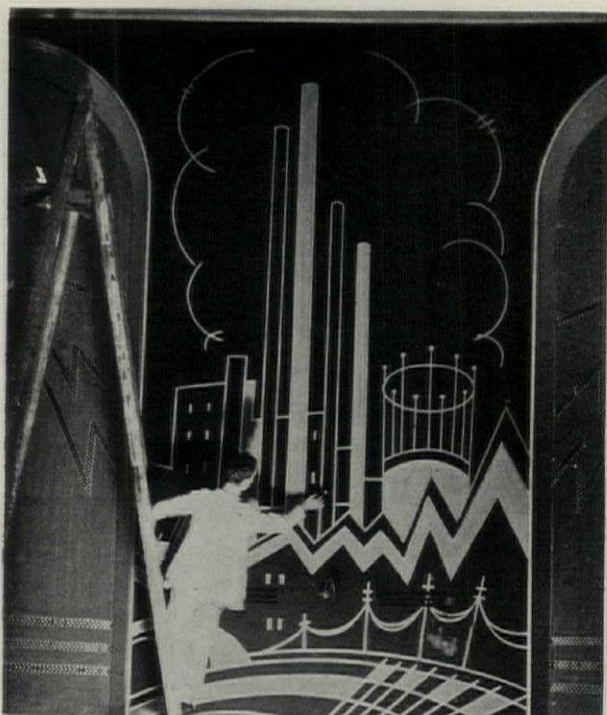
visited Liverpool in 1927. The object of this visit was to open the world's largest dock. The pylons were golden orange with a broken texture, the bases and caps red, with blue, green, and gold in the shields.

The Rome drawings are, of course, as mentioned elsewhere in this article, India ink renderings. The elevation is very good as such and the plan distinctive; but I am not so sure that the perspective would be effective. If Lawrence Wright had had more experience of building, as apart from designs on the drawing board, I don't think he would have done this. It is a bit too "Liverpoolsy." The plan, however, is very attractive and shows a broad and generous vision.

Wright did some interesting designing for the "Century" theatre. This was an amusing effort to produce a provincial repertory cinema (in Liverpool) and caused a considerable stir in dramatic circles.

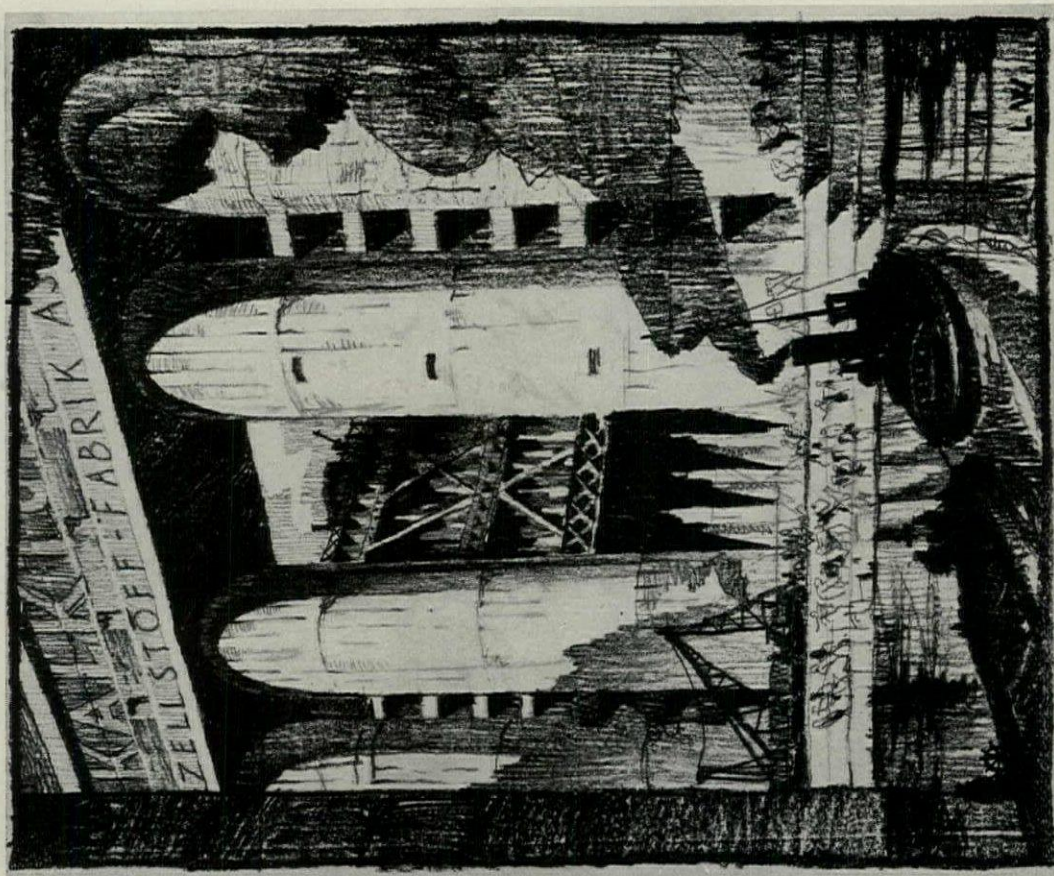
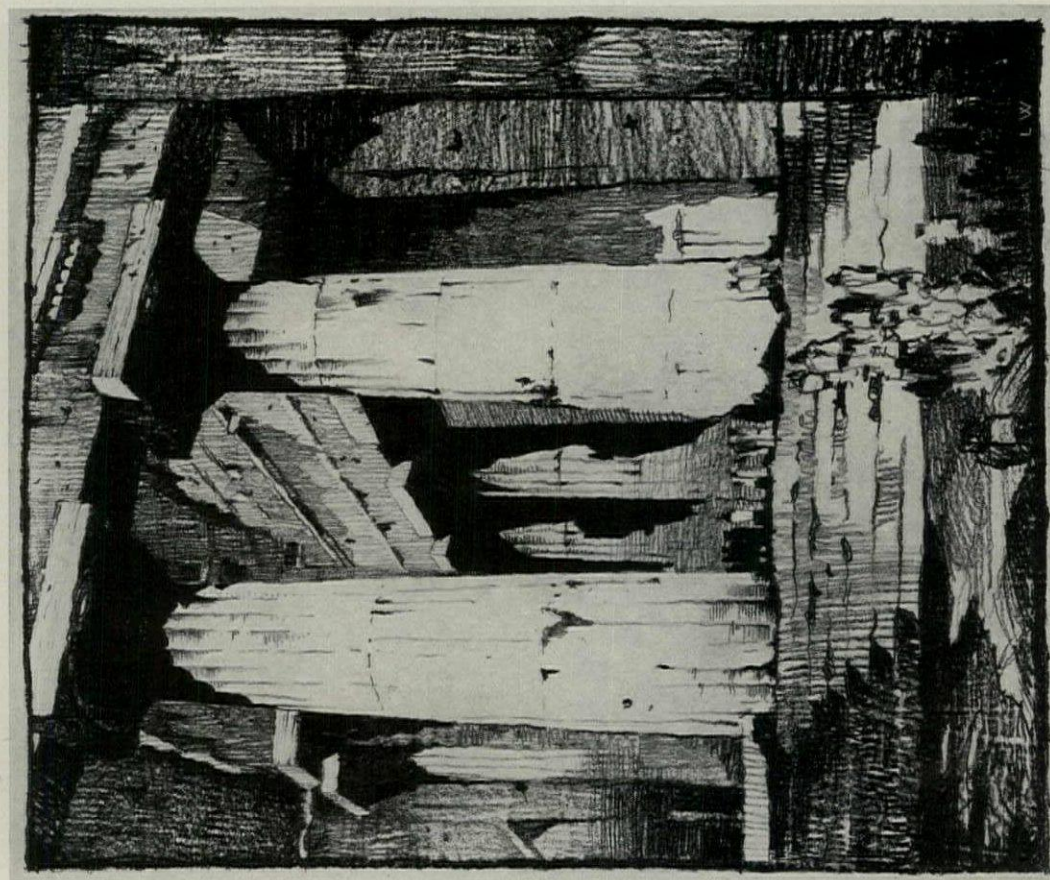
Wright won the competition and his cosmic and comic design caused much comment and produced many advocates both pro and con in regard to his work. All sorts of words were used by the critics: "Rhythm, Message," and even "Symphony." A modest man was occasioned a lot of suffering. In regard to the decorations in this scheme a story may be told. On one occasion Wright was called in to settle a bet between two workmen engaged on the painting. They wanted to know if a bird on the wall was an eagle or a sea gull. Neither was correct: it was a cumulus cloud. In the same scheme was a ventilator which had not been properly covered. An admirer of Wright's was enthusiastic over this and accepted it as the most symbolic and decorative part of the general design. Of such material is the life of the creative artist and may he have a sense of humor if he wants to prosper.

LAWRENCE WRIGHT AND HIS WORK



PORTIONS OF MURAL DECORATIONS BY LAWRENCE WRIGHT FOR THE CENTURY THEATRE, LIVERPOOL
The winning design in a competition being executed for a provincial repertory cinema.

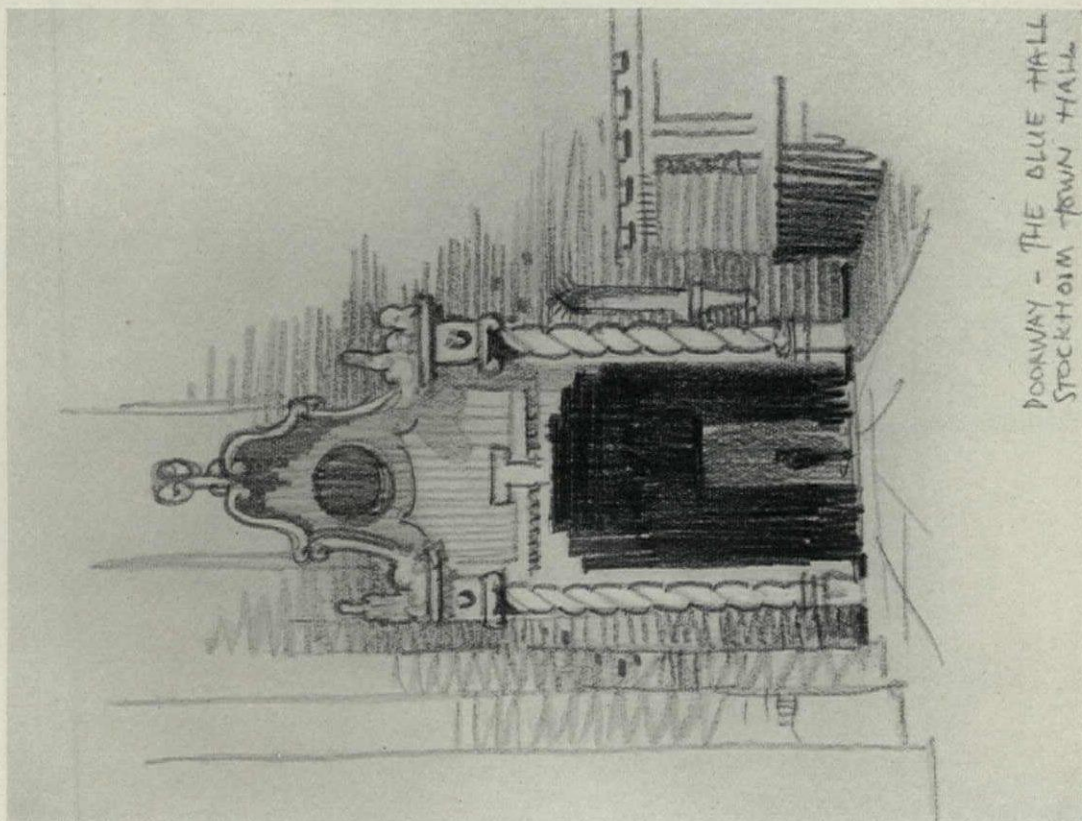
PENCIL POINTS FOR MAY, 1931



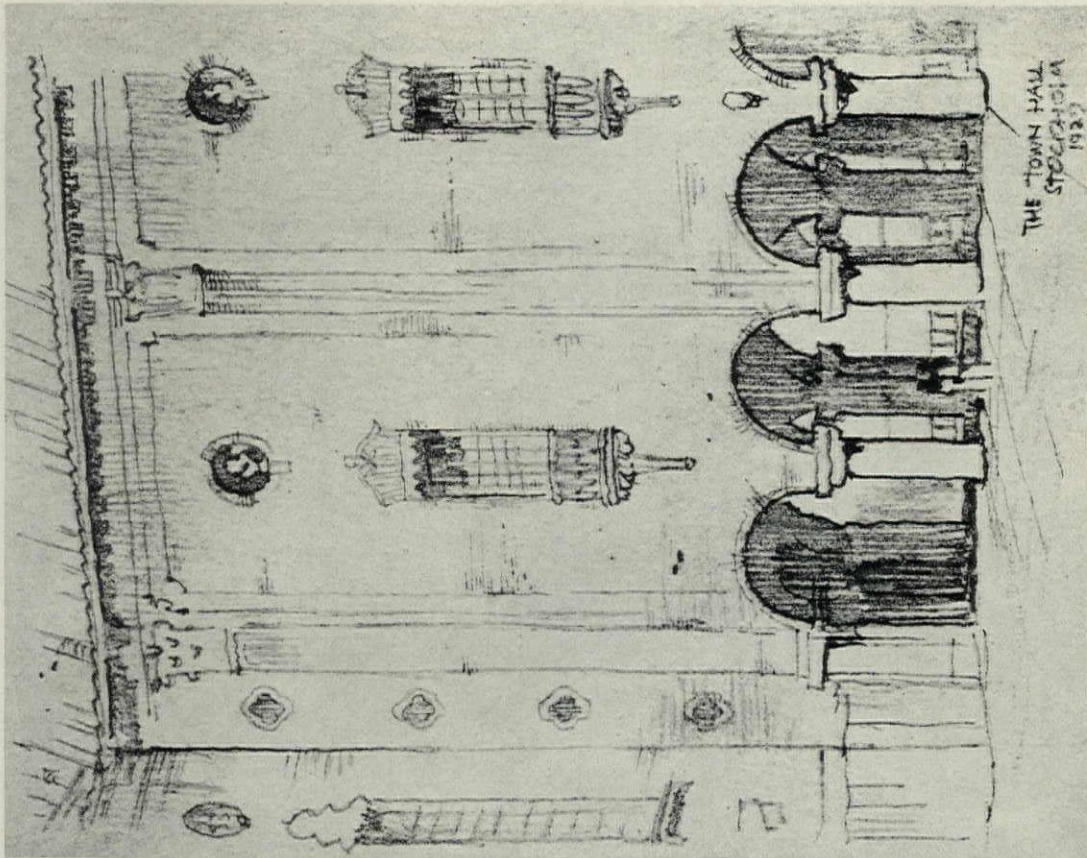
FROM POSTERS BY LAWRENCE WRIGHT FOR THE EXHIBITION OF THE LIVERPOOL UNIVERSITY SCHOOL OF ARCHITECTURE

These were designed to flank the entrance of the Exhibition Building. On the posters themselves the lettering occurs under the drawings. At a short distance the posters appear practically identical.

LAWRENCE WRIGHT AND HIS WORK



DOORWAY - THE BLUE HALL
STOCKHOLM TOWN HALL



THE TOWN HALL
STOCKHOLM
1923

TWO PENCIL SKETCHES OF THE STOCKHOLM TOWN HALL

His stage sets are interesting, although he rather overmodestly calls them "the usual university stuff." The Richard III drawings are full of quality and temperament, their massing is good and the line and color most arresting. In the lighting only amber, red, and white were used. Wright produced the play for the British Drama League Competition.

Apart from such activities Wright is as busy as can be at the drawing board. He is rapidly attaining the

position of being one of the leading perspective draftsmen in London. Many distinguished architects send him work.

Lawrence Wright drinks and smokes, he likes the fleshpots in reason, and is not averse to the society of the opposite sex in moderation. In fact he is quite a human being, despite the fact of his being an architect, with certainly a present and, in the opinion of his friends, a future.



"CRIB GOCH"—LINOLEUM PRINT FROM THREE BLOCKS BY LAWRENCE WRIGHT

The grading was obtained by printing in an office copying press, with the block and paper set to one side, giving an uneven pressure. The red and orange block was inked and printed twice, grading in a different direction for each printing.

The shadow block was printed with black and the sky a violet gray.

The Architect and the Grand Plan

2—Cities Planned as an Entirety

By Francis S. Swales

Editor's Note:—The first part of this series appeared in our March issue. In this part the author discusses some of the ancient practices in the planning of entire cities and traces them through their more modern applications. Since, in a series of this sort, a number of references must be made to illustrations which have already appeared it is suggested that this article be read with a copy of the March issue at hand to turn to as required.

When a camp, domicile, or trading post is founded it is seldom supposed that it will become a city; least of all that it will become a great city. There was no such idea, for example, in the minds of the simple Dutch fur traders who founded New York by fortunate chance at the most strategic point in North America with its wonderful hinterland of rich, natural resources. The location of the ancient cities of European or Western civilization was due to the defensive character of the site. With the establishment of the domicile of the ruler all other elements of the civic plan pointed towards that center. To be sound in our theory of city planning we must note, however, that wherever a new place was founded a route by land or sea led to it, and "radial arteries" were in the first place the roads which converged to the city gates.

Geographical location—with its factors of climate, geological and natural resources—determines the growth, style, and sometimes—as in the cases of Thebes, Pompeii, and Herculaneum—the duration of a city—though political conditions, mainly wars, have had most to do with that. It might, therefore, seem unlikely that cities ever should have been planned with regard to social or economic ideals, because such are never stable, but always more or less, obviously, in flux—hence that all cities must have "just grown." The character and quality of old cities and the things they tell us are mainly to be seen in the extant architecture, sculpture, paintings, and the things we find in museums and in books. The ideals, aspirations, or mere wants of the people; their atavistic tendencies—among which, fortunately, is that to the pursuit of art, particularly of artistic building—are to some degree apparent in the general effect of each city and the gradual accumu-

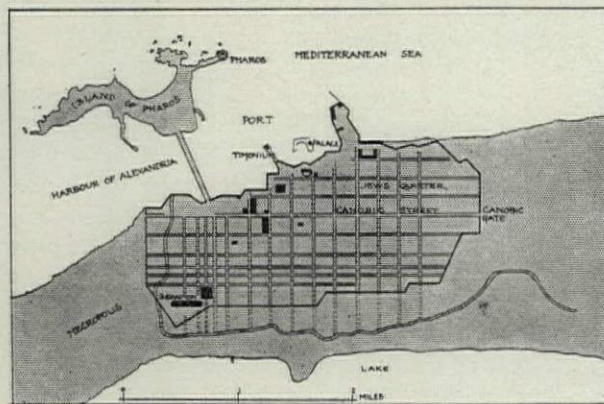
lation of monuments and products of its craftsmen has given every one its own charm. Such would appear to be the case with most of the old cities which please us when seen in reality, or even in pictures.

Yet the horizontal section of the architecture of a city is its plan, and the placing of the chief buildings and their scheme of arrangement is the key to the total effect and organization. From the dawn of civiliza-

tion, down until the tidal wave of mechanical industrialism swept the world—following the political revolutions at the end of the Eighteenth Century—the planning of entirely new cities at points distant from the old, or as a twin colony beyond the walls, or as a new colony within an old city, was carried on, like all other architectural work, more or less at all times. Its part in architectural tradition has been made clear by the study of archaeological excavations made during the past century. As with the individual monu-

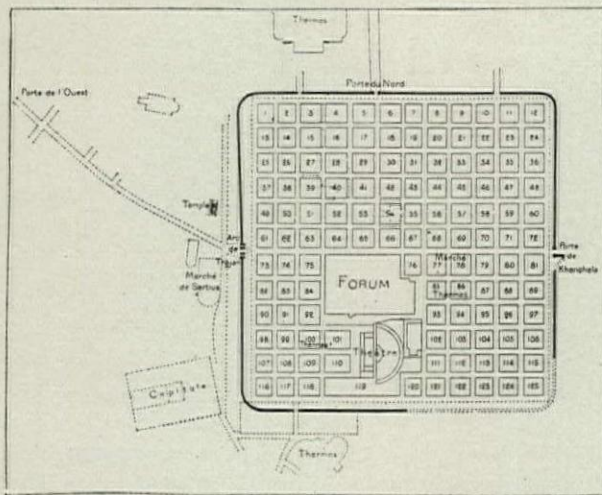
ments and buildings, grand planning is recurrent. Its greatest periods of expression have been during times of peace soon after the atmosphere of war has passed away. In the city planning of Continental Europe, architectural traditions held firmly, even through mediæval times and that of the so-called industrial revolution. In France, particularly at Paris, it accomplished some of its most notable steps during revolutionary conditions.

The plan of a new city designed as a unified whole is the plan of a nucleus or centre adapted to expansion to the whole area into which it may in the course of time find cause to develop. Washington and Canberra, capital cities of new countries, provide examples of the traditional ideas of architectural planning, though each was modern as to its time, and neither is dominated by precedent conditions that had changed; but



PLAN OF ANCIENT ALEXANDRIA

According to Vitruvius, who tells a good story of the architect's proposition of his idea to Alexander, Alexandria was planned by Dinocrates, parts of whose successful designing exist in the modern city, but Sostratos of Cnidos was architect of the great lighthouse numbered among the Seven Wonders of the ancient world.



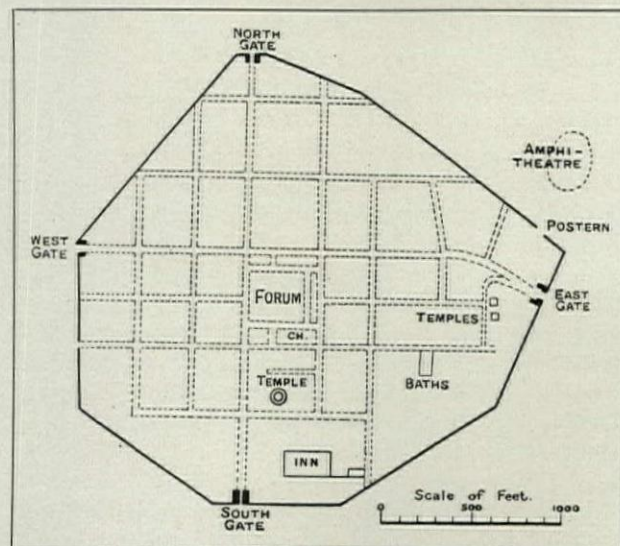
PLAN OF TIMGAD IN ROMAN AFRICA

each is planned to meet anticipated changes in vehicles of transportation and the daily flow to centralization and ebb of decentralization of population which new facilities suggested. Of such central planned parts of a city one predominant type served in nearly all cases of the ancient cities before rapid vehicular transportation began to exert a changing influence. It is that of a square area divided into a "checkerboard" pattern, of nearly square rectangular building sites, by streets running at right angles to one another, two principal streets, one forming the axis and another running crosswise led to the city gates in the surrounding wall. To such gates, also—since all roads led to Rome—the roads from distant points converged. The type is varied mainly by two topographical conditions—that of the hill site and that of the waterfront or port. At the intersection of the main streets is found the agora, forum, market place, or public square—different names of the same thing—surrounded by colonnades, arcades, or cloisters, also different names of the same architectural idea of a surrounding shelter or covered ways containing the places for trade—benches, *bancs*, or counters. At the head of the square, public buildings; and the temple or church (associated with the palace) beyond. From the time of Alexander's conquest of Egypt the usual mark of the organized city down until today is the "checkerboard," or its successor the "gridiron," plan formed around an unroofed place of public assembly, at the centre. Such, for example, is the so-called plan of William Penn for Philadelphia. Axial planning of the fora became the mode at Rome after the period of Roman invasion of Egypt; also the features of the arch as a gateway to break the length of the axial avenue leading to the vista (the thing viewed, the focus or shrine) and to provide a frame or director of attention to it; the free standing column ("Pompey's pillar" at Alexandria is supposed to have been cut from an obelisk), and the nearly square forum surrounded by colonnades.

The influence of formal Egyptian planning upon that of the Western civilizations has been little observed. Yet the typical Greek and Roman checkerboard city centre is found at the, supposed to be, oldest known

remains of a city in the world—the little town of Kahun built to house the workers on one of the pyramids, and estimated by archaeologists to have been built prior to 2500 B.C. Its scheme of arrangement was apparently even then an architectural tradition, as it repeats approximately the plans of the necropolis of Sakkara, and it serves to suggest the probable pattern of the plan of areas of common habitations and business buildings of the great city of Thebes. Literary history is meagre upon this point, but the more recent archaeological excavations provide sufficient indications of the *parti* adopted to enable the architect to reconstruct the general plan of Thebes. However much is left to conjecture, there is also much to be induced from comparison with the remains of Greek and Roman planned colonies, although of much later date, of which knowledge has been made certain by excavations of extant ruins insofar that the cities can be architecturally reconstructed—even as to their details. Such cities as Priene in Ionia, Timgad in Algiers, the remains of the Roman city upon the lines of which the *centro* of Florence was reconstructed, a whole section of Turin, the "Greek City" within Naples, and Roman remains at Caerwent and Silchester in Britain, provide ample evidence of the persistence of the Egyptian idea of fixing upon a nearly square forum as a centre, surrounded by colonnades and public buildings, bounded and paralleled by streets dividing the land into rectangular areas or blocks. In all of the premedieval planned cities the blocks or *insulae* are of varying size, the streets not being spaced at equal distances apart; nor are the streets of uniform width, the axial and principal cross street being the widest, and those leading to secondary gates, as at Timgad, being wider than intermediate streets. The agora of the Greek cities usually occupies a block at one of the angles of the two principal streets, while the forum of the Roman towns, not invariably, lies upon the axis of one of them.

At Silchester, England, the rectangular building sites maintain, although the city wall forms a polygonal

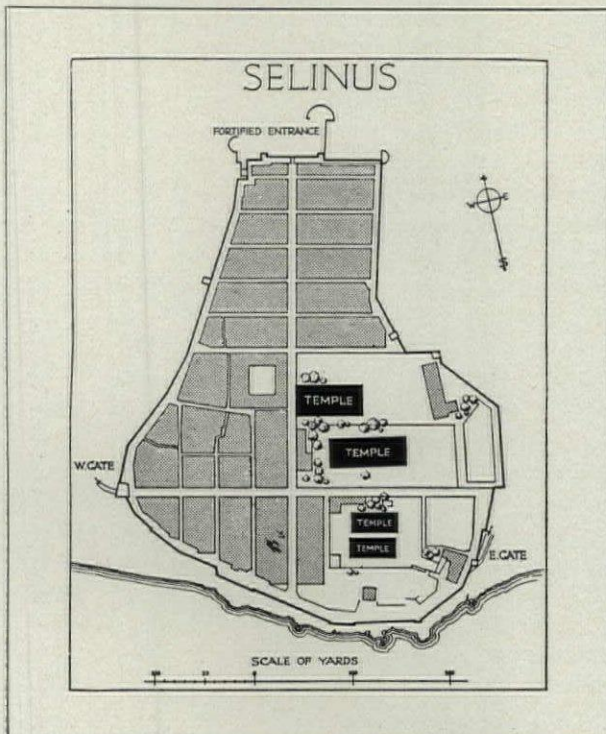


THE ROMAN PLAN OF SILCHESTER, ENGLAND

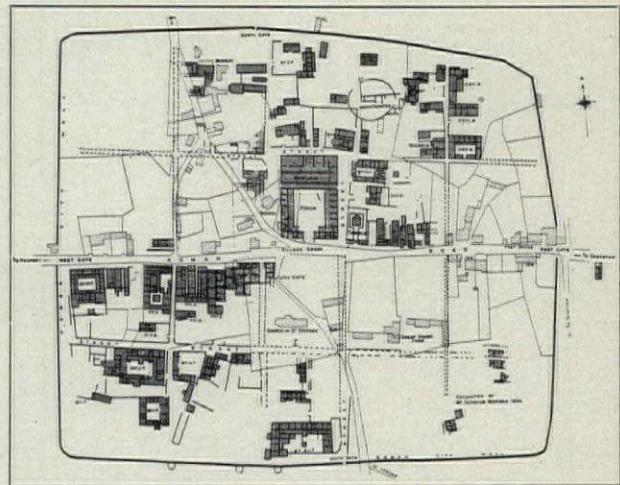
outline, indicating that it was not due to the shape of the city as a whole that the streets were arranged at right angles, but rather that the form of the forum was the determining element. With the exception of Zenobia's great city of Palmyra, the Roman and Greek Colonial cities were small, being planned to house original populations of from one to two thousand inhabitants. Palmyra was a great city whose population is estimated to have been upwards of a million inhabitants, while the population of Thebes and Babylon are supposed to have been as great as those of modern New York and Chicago, respectively.

The walls of the precincts of the Great Temple of Karnak enclosed an area more than a mile square, and probably included a monastic or clerical city surrounding the temple within its precinct, which must have been a city within the greater city of Thebes. Presuming such to have been the case, it may be concluded that the polite or polished persons who denoted the *polis*, or city, were those who lived within the precincts of the temple-palace, and that such was the city which served as the model for the planning of Babylon, the Ionian cities, and those throughout the Western world which adopted rectangular planning. According to Diodorus (57 B.C.) greater Thebes had a circumference (semi-circumference?) of about twelve miles. He also mentions "stately public buildings, residences four and five stories high" and "numerous temples." Strabo, who visited Thebes in 24 B.C., three years after its destruction by earthquake, gives the length of the ruins as 80 stadia (about nine miles).

The plan of the Great Temple-Palace is the out-



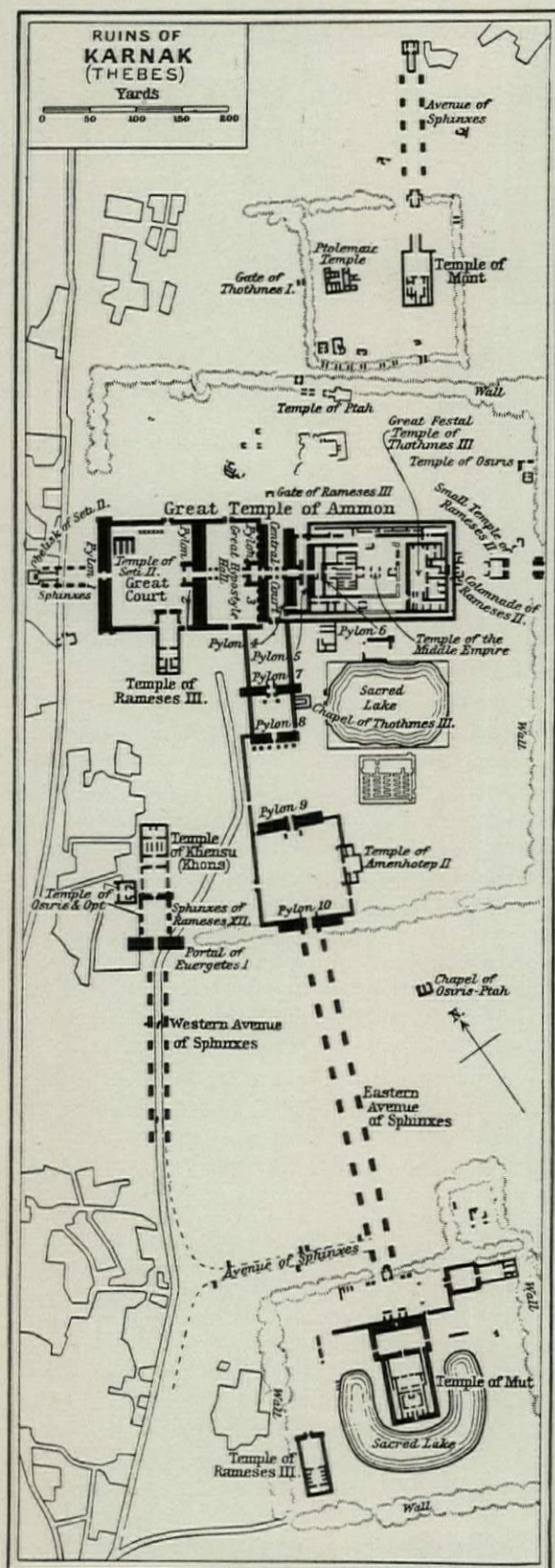
The planning of Selinus in Sicily is attributed to the architect Hermocrates by MM. Hulot and Fougères in their excellent study of the excavations and restorations; by others it is supposed to be one of the cities built in the time of Hippodamus and possibly designed by him.



PLAN OF ROMAN CAERWENT, ENGLAND
ANCIENT BUILDINGS ARE SHADED HEAVILY

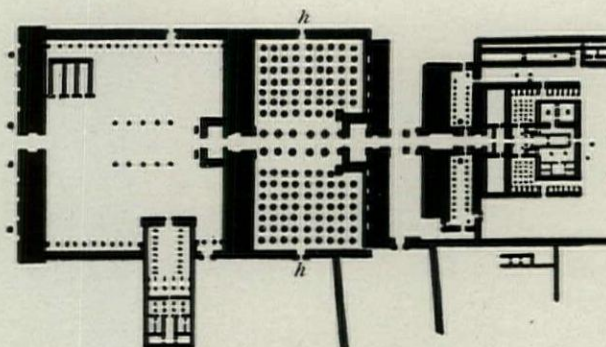
standing example of the "monumental" or fixed traditional theory of planning the civic centre to which subsequent Greek and Roman planned cities conformed a thousand years later. A comparison of it with that of the Forum of Trajan shows the disposition of the parts to be the same; and the dimensions very nearly so. The parts or elements of each include, a dominating centre of attraction or focus—the shrine of the Deity—on an axis of symmetry, preceded by a transverse open space or inner forecourt. Between the inner court and the grand forecourt, or forum, is the hypostyle hall, or basilica—perhaps both were used for the same purposes (on "weekdays") as halls of justice, banking, public accounts, etc.—the colonnades along the forecourt or forum, the pylon gates, and the arches to accentuate the axis, and to give direction to and frame the vista of the temple proper.

The Roman construction gains an extra colonnaded passage in the thickness used by the Egyptian walls; and the lateral colonnaded shelters in the forecourt at Karnak are thus doubled for use in the Forum of Trajan. The design of the latter was the work of Apollodorus of Damascus, a contemporary of the emperors Trajan and Hadrian. The latter was a professional architect, to whom Rivoira attributes the design of the Pantheon and his own mausoleum (Castle of St. Angelo) and the bridge leading to it; as well as the Temple of Venus and Rome. Hadrian visited Thebes in A.D. 130 with his wife Sabina. As a skilled draftsman and painter as well as constructor he would not have failed to note the plan of the Great Temple of Karnak, but probably Apollodorus had been there before him. The arched roof of the Ulpian Basilica eliminates the need of the central columns in the Hypostyle Hall, and acquires clear-story lighting along the length of the hall instead of across it. The gain is in providing floor space, and typical of the progressive theory of architectural planning throughout succeeding ages, but the axis to the shrine is lost in the basilica which becomes a single hall, whereas the hypostyle hall is two halls facing laterally upon the colonnaded passage, or "arcade" between them, with façades lighted by the



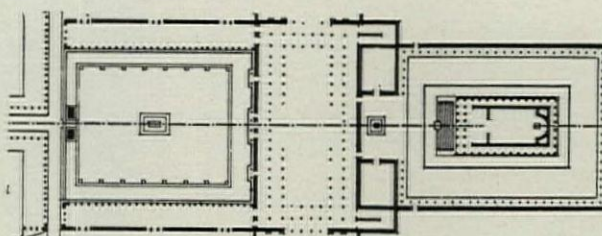
"THE CITY WITHIN THE CITY" AT THEBES

clear-story along the axis of the Grand Plan. Aesthetically, the Roman example also loses comparative quality in its monumentation by blocking the axis leading to the shrine with Trajan's column in front of the entrance to the Temple. Thus, Trajan stands in



KARNAK, TEMPLE OF AMMON

The beginning of the Civic Centre. The long axial vista. Compare the position of the Obelisk of Seti II on the plan to the left with that of the Column of Trajan on the plan below.



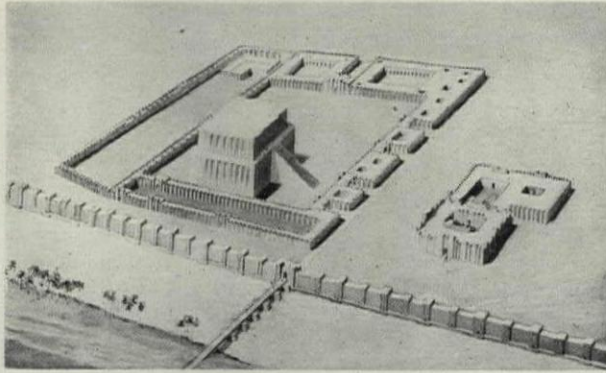
FORUM OF TRAJAN, ULPYAN BASILICA, AND TEMPLE

THE COLUMN OF TRAJAN IS ON AXIS

Note the colonnaded avenue at the left leading to the entrance to the Forum and compare with the Avenue of Sphinxes leading to the Great Court of the Great Temple of Ammon; also the placing of the Obelisk of Seti II on the axis of the avenue of approach.

front of his Deity! The Egyptian architects placed the statues of their emperors beside those of the Deity at either side of the entrance to the shrine; likewise their great obelisks, which were earlier than the colossal statues and seem to have been architectural emblems of traditional guardians of the shrine, recalling the real sentinels who guarded the entrances to prehistoric cave cities. The Colossi of "Memnon," and other such statues were but a more realistic interpretation of such guardians. Of the Colossi of "Memnon"—which were really statues of Amenhotep III and his wife Tiye, Aitken says, "they were fashioned . . . under the chief architect and namesake of Amenhotep III to stand in front of the temple"; also that "they mark the introduction of the huge statue in place of the obelisk." "The record of their arrival in Thebes," he says, "glows with contemporary enthusiasm. 'They were wonderful for size and height and will last as long as heaven' says Amenhotep the architect." They bear numerous Greek and Latin inscriptions, "many were inscribed in the time of Hadrian."

The characteristic elements of the plan of the Forum of Trajan may be noted in those of the Roman colonies in Britain at Caerwent and Silchester, where the basilica occupies the head of the Forum and a niche replaces the site of the temple-shrine. The outer passage of the colonnades surrounding the other three sides of Trajan's forum are replaced by cells, shops, or



ANDRAE AND KOLDEWAY'S RESTORATION OF THE
TOWER OF BABEL

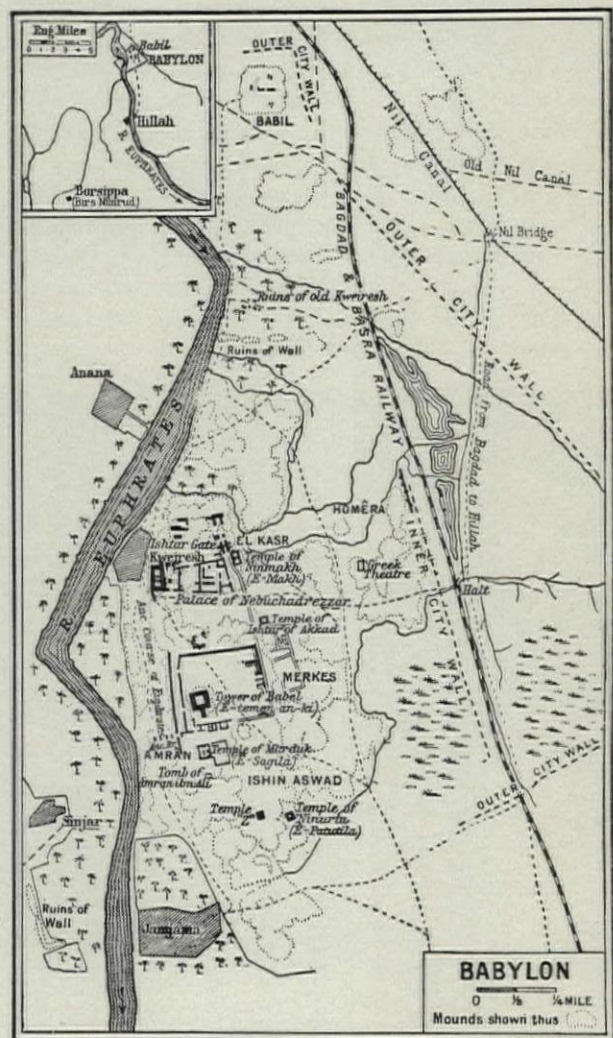
stores, and correspond to the arrangement of the Greek *agoræ*. The temple is placed outside the forum precinct. At Timgad the temple is placed beyond the city wall, near the west gate. In mediæval times the church, replacing the temple, is found near one corner of the market place but not on it, and provided with its own open forecourt or *parvis* as at Montpazier in Aquitaine, France, built by Edward I of England as one of his *Villes Neufs*, laid out by skilled planners brought from England. The association of the temple with the tomb in Egypt finds its counterpart in the churchyard, used as a cemetery in mediæval Europe, and continues to survive in *places* down to the present time, just as the forum survives as the public square, where the shop-front replaces the colonnade, and the city hall takes the place of the basilica.

Beyond the walls of the temple-palace-precinct-city of Karnak (Thebes) wide paved avenues bordered with sphinxes led to city, or civic-centre, gates from other centres at distant points. The reason for the monumentation by sphinxes is not definitely known, but something may be inferred from the similar bordering of the Appian Way to Rome, and *L'Allée des Tombeaux* at Arles, by monuments to notable citizens. Characteristic of such later avenues are the parallel rows of evergreen trees bordering the avenues—transplanted Italian pines, cypresses, live-oaks—providing continual shade. The association of cypress groves and avenues with cemeteries in the Levant also tends to suggest that the orderly tree-planted avenues of modern France have come down, with other traditional forms of architectural planning, from the Thebes of Amenhotep to the Paris of Louis XIV whose architects Bullet and Blondel reintroduced avenue planting as a marked feature of the modern, formal city, *grand boulevard*.

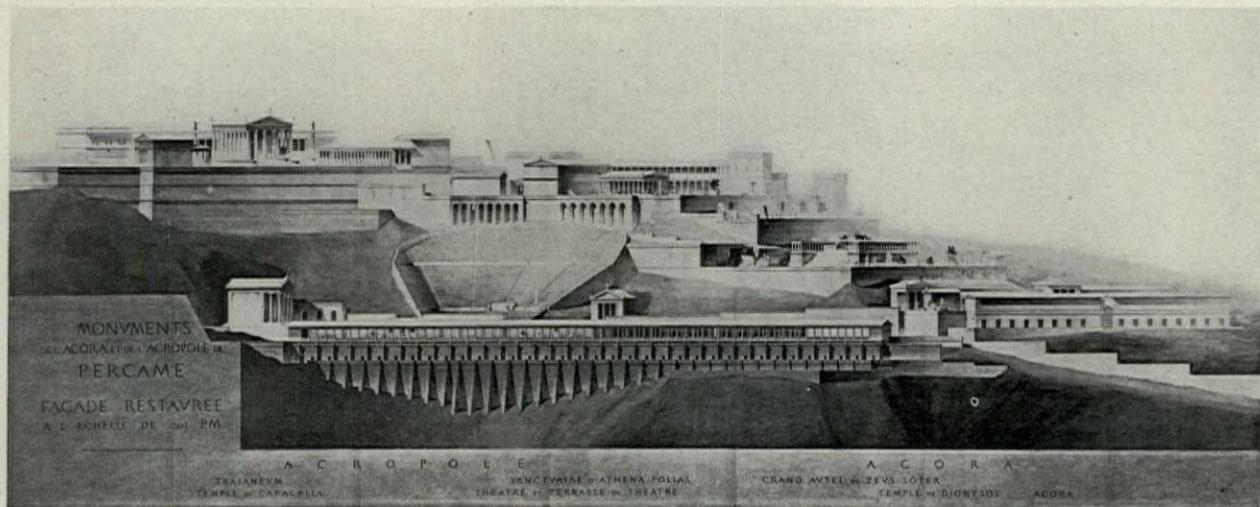
Axis; symmetry; rectangular, formal arrangement of colonnades; sheltered plazas; the broad monumental avenue of approach; monumentation by sentinel forms as the obelisk and flagpole and standing, seated, and recumbent statuary; the series of pylon gateways along the axis; the circulations or ambulatories internally and externally to the forecourt and public halls; the temple entrance upon the focus; and the privacy within the palace grounds; show the grand architec-

tural plan of the Egyptian so-called temple-palace to be the prototype of Roman civic planning.

The excavations of the centre of Babylon by the German archæologist, Koldewey, and the restorations by Andrae, made before the Great War, show a striking resemblance to the group plan of Karnak. The characteristic relation is the great enclosed square containing the "Tower of Babel," or temple, as a forecourt preceding and separated from the palace group of Nebuchadnezzar's Citadel. Nebuchadnezzar destroyed Nineveh in 600 B.C. and planned his new city of Babylon with the help of architects and craftsmen brought as slaves from Nineveh. Nineveh, capital of Assyria, flourished during about 140 years from 745 B.C. (which is the approximate date of the earliest Doric temple in Greece and of the legendary founding of Rome on the palatine hill). It was during this period that Thebes was conquered by the Persians and its chief men carried into slavery. Herodotus (5th century B.C.) says Babylon was laid out in the form of a square with the broad river Euphrates flowing through its midst. Each side was fifteen miles long, and the whole was surrounded by a wall 350 feet high and 87 feet thick in which were a hundred gates of brass. All its streets were wide, straight, and



PLAN OF ANCIENT BABYLON



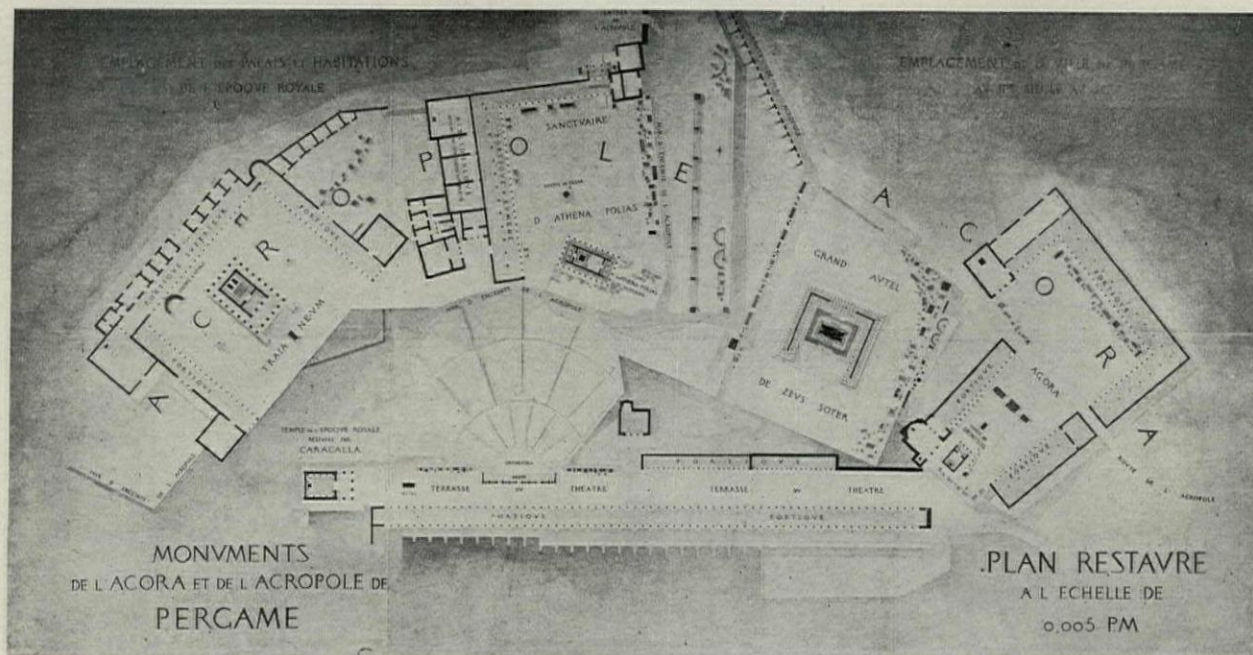
RESTORATION OF ANCIENT PERGAMUM (OR PERGAMON) BY PONTREMOLI

parallel or at right angles to one another. Its temples and palaces stood in stately parks. The "hanging" or terraced gardens, about 400 feet square and 350 feet high were a series of wide stone terraces, supported on arches, containing a thick bed of earth in which large trees, flowering shrubs, and vines were planted. The gardens were irrigated by means of hydraulic pumps and the arched roof construction below the beds of earth was waterproofed by sheet lead, and reeds laid in bitumen. If any faith may be placed in the writings of the ancient travelers, Babylon must have been the most wonderful of all cities, ancient or modern. Certainly the parts unearthed by Robert Koldewey and restored by Andrae establish remarkable evidence to support some belief in them. Although it has often been suggested that the square form of city fortification walls was for the sake of economy of perimeter, consequently of labor and material in the

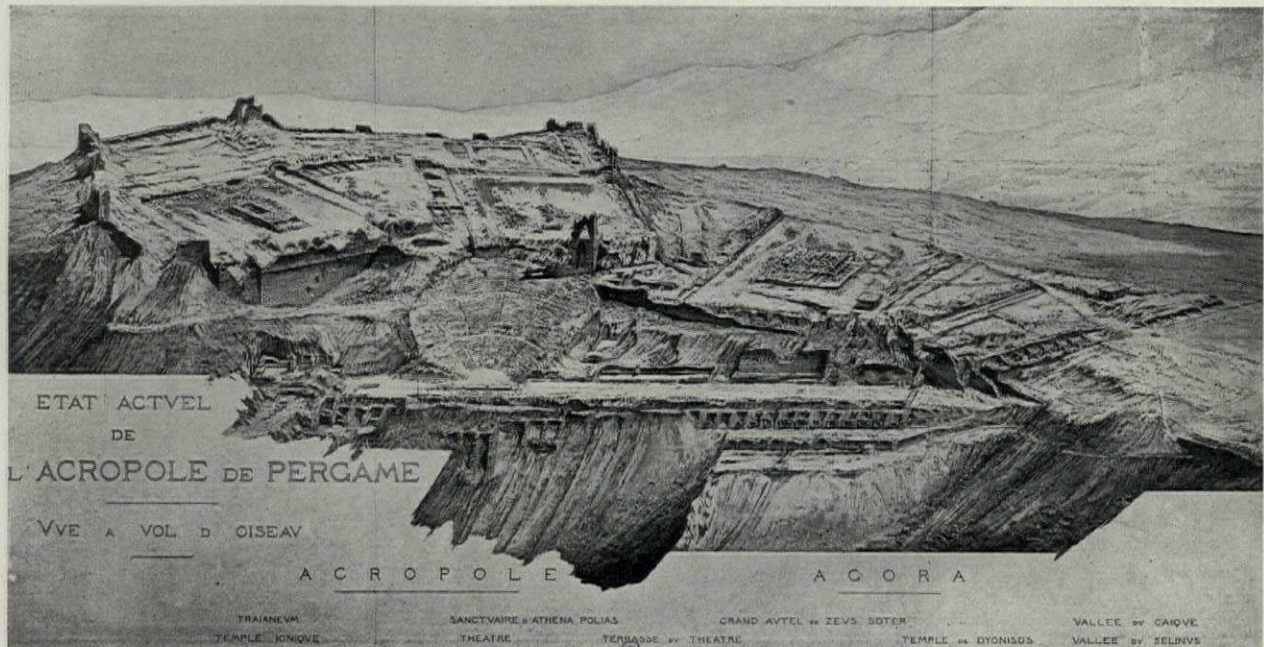
walls, for the area enclosed, nothing in the nature of economy would seem to have been considered by Nebuchadnezzar.

During the latter centuries of declining power of Thebes and the rise of Nineveh and Babylon it may be assumed that Egyptian architects traveled into Assyria and voyaged along the Syrian Coast to Cyprus, Rhodes, Ionia, and Crete. The "city-planning" or arrangement of wide, straight streets around the old temples at Selinus in Sicily prove that the traditional plan of the Egyptians had found its way direct before it appeared in the cities along the Ionian Coast.

The earlier Greek cities, before the time of Alexander, are typified by Athens, where the architecture relates to the Acropolis and the rest of the city had no plan but a mere growth of narrow, winding, unpaved, unlighted alleys running up steep inclines and into an irregular market place. Something, however, of the



PLAN OF THE AGORA AND ACROPOLIS OF PERGAMUM IN THE SECOND CENTURY B.C.



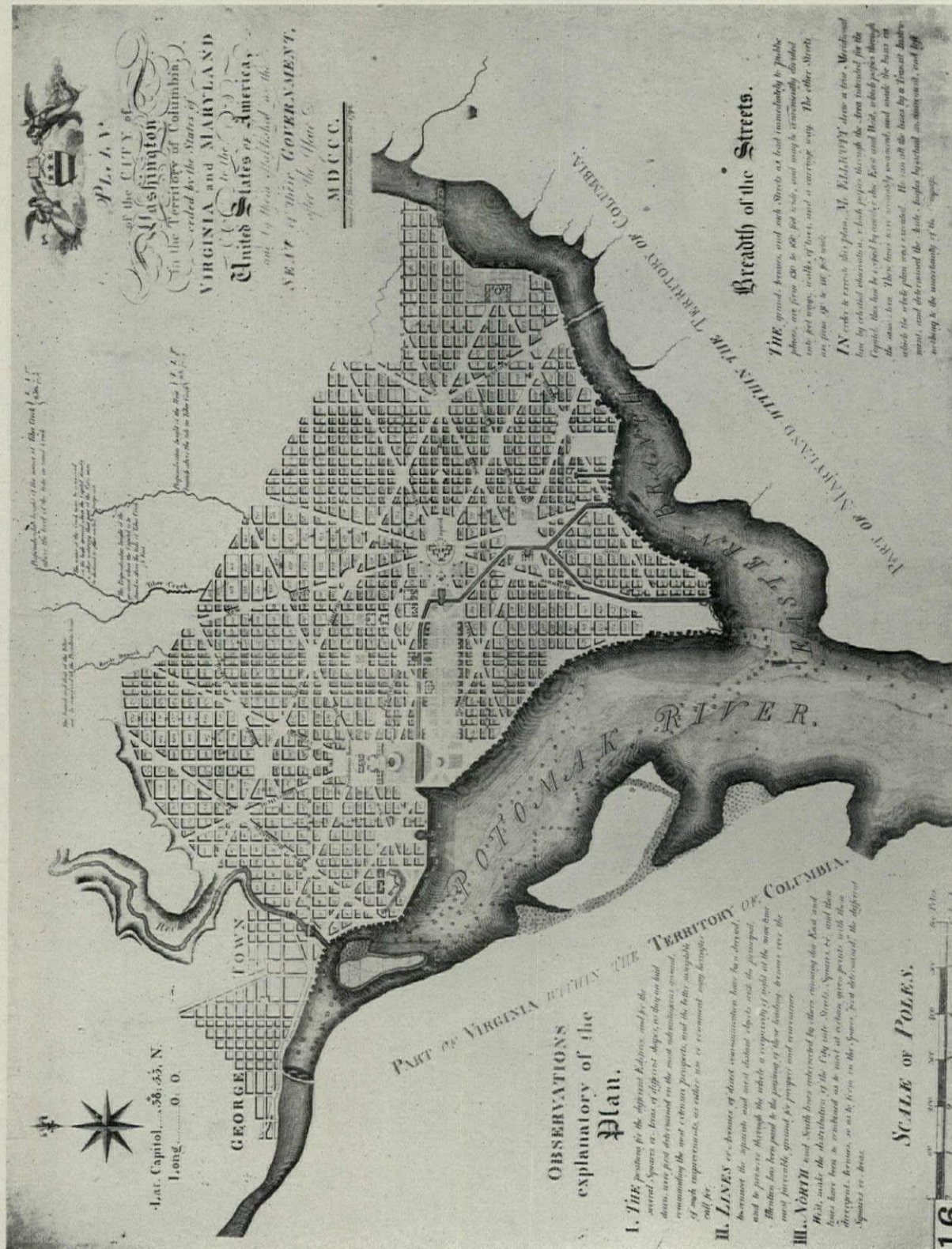
CONDITION OF THE ACROPOLIS OF PERGAMUM AT THE TIME OF PONTREMOLI'S RESTORATION STUDY

order of Thebes and Babylon found its way to the Greek towns of the Ionian Coast where the agora was rectangular, fixed at the centre of the city and surrounded by porticoes. Toward the end of the fifth century B.C., Hippodamus of Miletus, an Ionian architect, was employed to lay out several new cities of Greece—Piræus, the port of Athens, Rhodes, and Thurii in Italy, Selinus, Priene, Antioch, Cyprus, and Alexandria were among other Hellenic Greek cities

built or extended by planning about the same time. Some of them may have been planned in their entirety by Hippodamus (480 B.C.) who, according to Aristotle, planned Piræus and was the first architect to plan cities with wide, straight streets running at right angles to one another and to make proper provision for the grouping (or "zoning") of residences. Diodorus says that Hippodamus also planned Thurii, in southern Italy (443 B.C.) and Strabo credits him with the plan

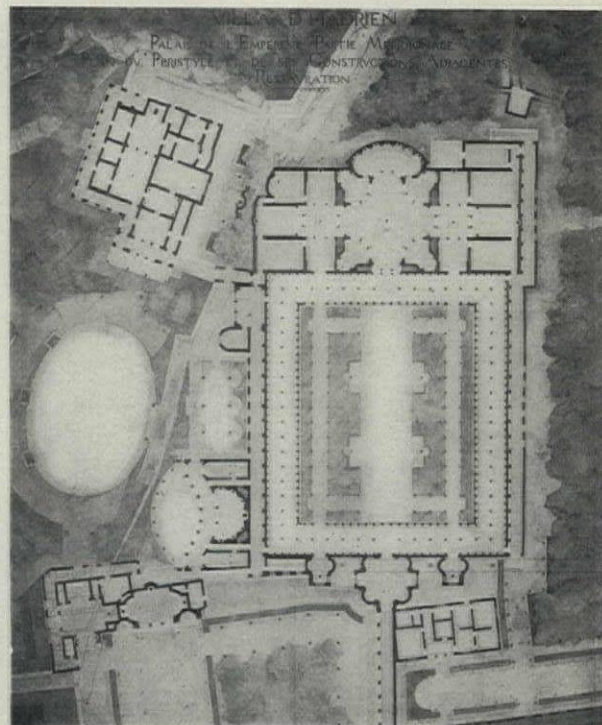


PHOTOGRAPH OF THE THEATRE OF ANCIENT PERGAMUM (PERGAMON)

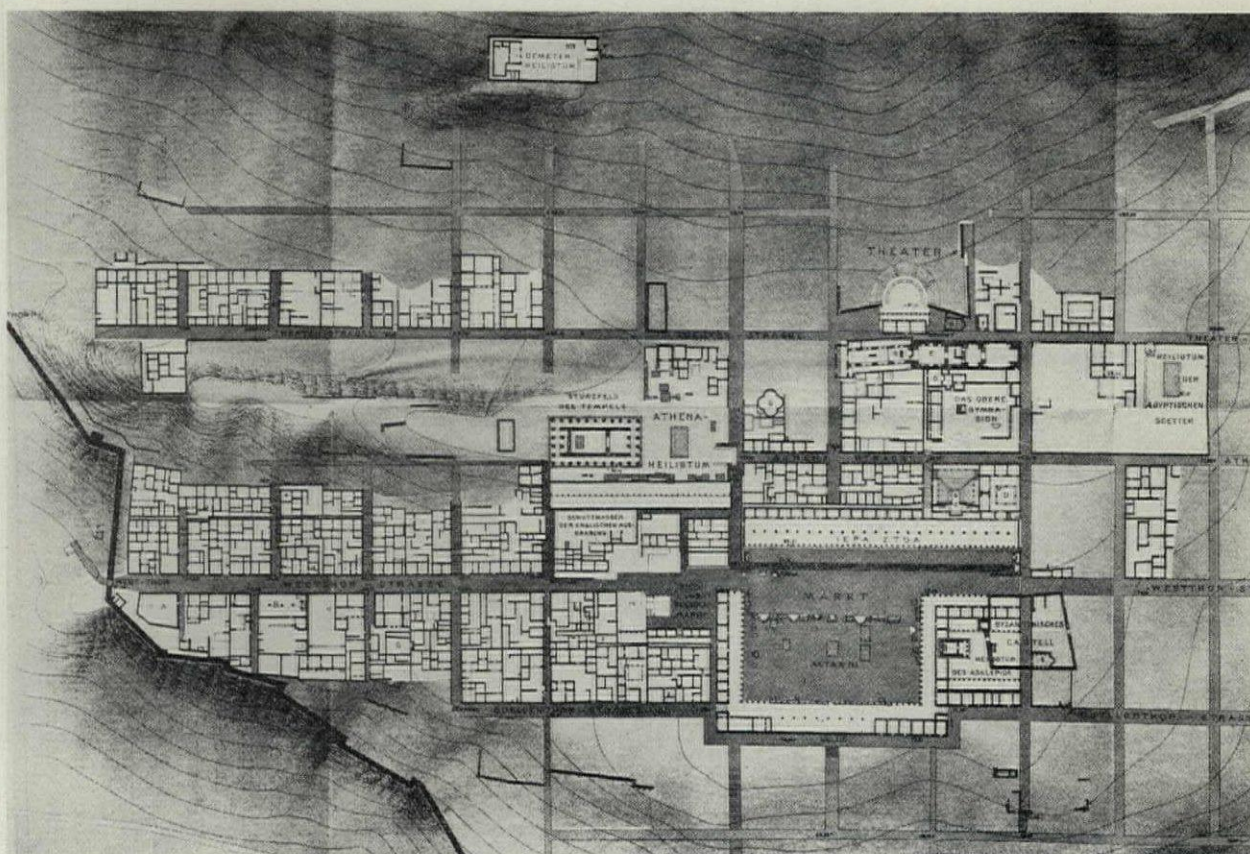


WASHINGTON, DESIGNED BY PIERRE CHARLES L'ENFANT IN CONSULTATION WITH THOMAS JEFFERSON AND GEORGE WASHINGTON
 Note that the work of the surveyor in setting out the lines from the plans of others, or merely measuring, is so described on this drawing as to lead to the erroneous inference that he was the architect of the plan, whereas he was merely a technical assistant.

of Rhodes (408 B.C.) and with the design of the temples in that city. According to Frothingham he also published plans of ideal cities of his design. Priene was a little city of about eighty blocks and perhaps four hundred houses of nearly uniform size. Two blocks were thrown into one by stopping a street where a large site was required for the agora. Having been planned for pedestrian traffic only, its broadest streets, running straight and more or less parallel with the contours, were only twenty-three feet wide, while those at right angles running up the hillside were about half that width. The blocks were divided mainly into four sites for houses each 60 x 80 feet. Each site was built upon over its whole area. The types of houses being similar to those of Pompeii—which was also built mainly as a Greek colony. A great part of Priene was taken up by the stadium, gymnasium, temples, theatre, stoa or open porticoes, town hall, house of assembly, baths, etc.—fine, compact, well-built, within fortified walls, about $1\frac{1}{3} \times \frac{1}{2}$ mile in total dimensions and set in a hillside forest—parks, lawns, or gardens were obviously unnecessary. Water supply was brought from the mountains in earthenware pipes and distributed all over the city. The drainage and sewage system appear to have compared favorably with modern practice. Paving done by the State at Priene and other Ionian cities was of large blocks of limestone, laid in both roadways and sidewalks.



RESTORATION OF HADRIAN'S PALACE, TIVOLI
ENVOI OF GIRAULT, PRIX DE ROME, 1880



PLAN OF ANCIENT PRIENE—EXCAVATED BY MESSRS. WIEGAND AND SCHRADER

Pergamon, another Ionian city, which has been admirably studied in the restorations by M. Pontromoli, is well shown by his illustrations. Its famous library, which rivaled that of Alexandria, contained hundreds of thousands of manuscripts on parchment (which was invented and made in this city, from which it derives its name) and the remarkable sculptures of its altar of Zeus, found in the excavations and now in Berlin museums, are the causes by which it is chiefly known. But its arrangement as a city on a high hillside, 1100 feet above the sea to which its acropolis rises, and the admirable manner in which its vast theatre is fitted into the hill between converging streets providing easy grades between the old lower

town and the Acropolis, make it perhaps equally notable as an early piece of city-planning. Below the theatre is the agora which marks the centre of the city's daily life; still farther down, running into the plain, the regular rectangular blocks of the later Hellenic and Roman parts of the city. "From the heights of Madaras Dag, 1700 feet above the sea, the water of springs was conveyed by leaden pipes a foot in diameter, partly through tunnels and partly in a covered course on the hillside to the Acropolis and the lower city, where it rose in many sparkling fountains. As in its course it had to traverse the plain, it was really an enormous syphon; and it is wonderful how the pipes could resist the pressure," says Percy Gardner.



RESTORATION OF PRIENE—FROM "THE PLANNING OF HELLENISTIC CITIES," BY PERCY GARDNER
ACCORDING TO THE GERMAN EXCAVATIONS OF 1895-98

How the Architect Can Help His Profession by Public Lecturing

By Natt Piper

Editor's Note:—This is the third and last in a series of short articles that point out ways and means whereby the individual architect can work for the good of architecture—and help his own business.

Architects can scarcely realize the ignorance that handicaps the American public at large in the appreciation of things architectural, or artistic. And in public education the case would indeed be hopeless if this same public did not have an underlying desire to learn and to know, even though this desire may be subconscious and unexpressed.

Now, architects can capitalize this innate ambition, and if for any reason they do not think it wise to give an address upon some definite phase of architecture, they can very successfully sugar coat an architectural pill and lecture about subjects closely allied to architecture. Subjects that appeal to the home maker, for instance, or any topic entertainingly presented to instill the thought that through the ages architecture has been a paramount art, will gain for the lecturer an enviable personal reputation, and for his profession a new credit and appreciation.

In preparing a lecture one should select a subject that is familiar. This makes for ease in assembling notes and material. The talk should not be too dry nor too technical, and it must be one wherein architects or architecture has played some part. Human interest must be interjected.

During the talk, and with the above thoughts in mind, it would be a stupid fellow indeed who could not subtly bring in pertinent and interesting things to say about the marvelous attainments of the architects of the past; how different styles of design were perfected or sponsored by architects and how their influence permeated even the simpler arts and crafts.

Just let your imagination and your hobby-tendencies have a chance to develop possibilities as you look over these varied subjects for talks: Samuel McIntyre, the American Who Made Salem; Interior of an Early English Home; The Bookbinder's Art; Italian Furniture of the Renaissance; Colonial Houses of Marblehead; Spanish Ironwork; Informal Gardens; Paintings and Sculpture in the Home; The Woodcarving of Grinling Gibbons; Brief History of Oriental Rugs; Spanish Furniture; The Use of Color; Art in Industry; Garden Accessories and Furniture; The Making of an Etching; Clocks and Clock Makers; Deerfield; Water Color Sketching; Modern Interiors.

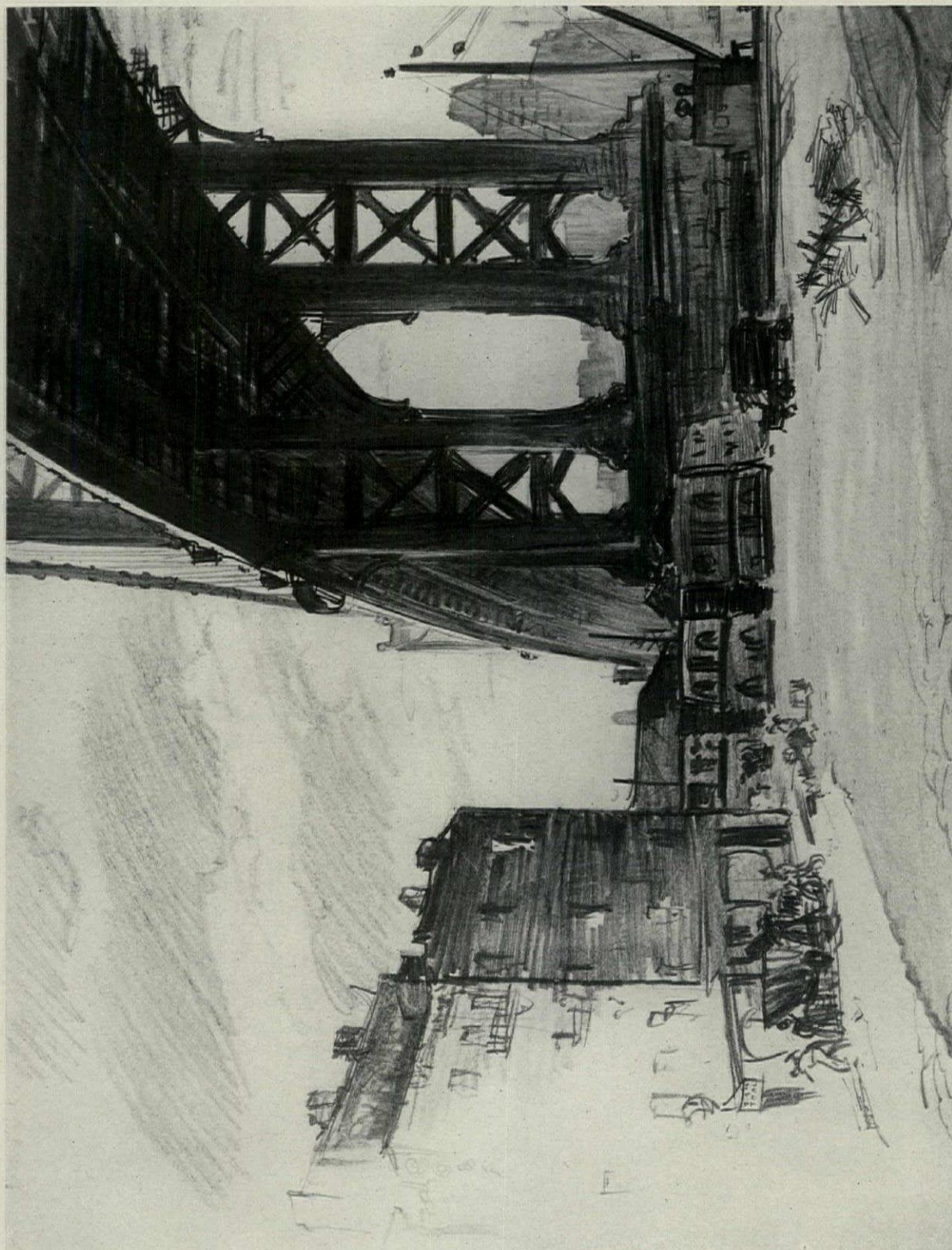
To those above one may add many, many topics. An architect usually has a hobby. Yours may be photography, or illuminated lettering. Talk about

it and show examples of your own or other men's work and never forget to bring in even the slightest allusion that will gain attention for architecture.

For example, if your subject is to be "Period Furniture," call attention to mediæval styles; Gothic chairs; Persian divans; tell interesting facts about the kings and queens of the period; speak of choir stalls and their architectural richness. Recall the glorious Renaissance period—its architects and their works. Show how architectural motifs molded furniture design. Tell of Early English woodwork, and how English oak gained its rich brown patina because of the smoke from open fireplaces. Tell of brick and tile floors in Italy and other countries; explain how stretchers were first provided on chairs and tables for the feet to rest upon and raise them from these cold, damp floors. Speak of the introduction of cane work and colorful brocades from the Far East by way of Portugal and Italy; of wood carving; of the Flemish scroll used in furniture and in architecture; of the acanthus leaf, which was first made important by architects and how both architects and furniture designers for centuries have used it for the enrichment of moldings, legs, and finials. Speak of the brothers Adam, those English architects (even if they were Scotch) who designed not only the exterior of buildings but interiors and all that went into the decorative scheme, and who gave their name to a dignified style. Describe woods used in France and in England, and explain how French and English design led to the development of our own Colonial furniture; give a biographical note or two about Duncan Phyfe; explain that the prominent men of the American colonies studied and appreciated architectural and furniture design and emphasize the enjoyable result of their fine taste in such matters. Speak of the attention that architects give to placing furniture, even in their first sketch, because they know that proper furniture grouping is so essential to the final success of their own work.

From these highlights you see the opportunities to promote the architectural profession. Such a talk will open many eyes to the important place the architect occupies.

Never refuse a chance to talk before men's service clubs, women's clubs, P.T.A. meetings, study clubs, student bodies, technical societies, sales organizations—in fact, wherever there is a worthwhile audience.



FROM A PENCIL SKETCH BY SAMUEL THAL
UNDER MANHATTAN BRIDGE, NEW YORK

Impressions of Modern Architecture

1—The Search for a Direct Manner of Expression in Design

By William Ward Watkin

Editor's Note:—This is the first of a series of three lectures delivered last year at the Rice Institute, Houston, Texas, by Professor Watkin, Head of the Department of Architecture at that college. These lectures were published in the Rice Institute Pamphlet, Vol. XVII, No. 4, October, 1930, and in this form were illustrated with black and white drawings by Claude Edgar Hooton. Believing that the soundness of the author's ideas warranted a larger audience, we asked and secured permission to reprint the lectures in PENCIL POINTS. We hope that they may help to provide a basis for a real philosophy of modern design and we urge all designers to read them thoughtfully in this and in the next two issues.

In undertaking to express my impression of modern architecture, I must acknowledge that difficulty which the wide boundaries of the term "Modern Architecture" present and announce my intention to be that of relating my impressions not of the work of recent building, as such, but of the work of the "modernist."

The "modern" movement is a movement showing a distinct contrast to recent as well as timeworn precedent. It is still a movement of the minority and in contrast with the established current of architectural design. In England, in France, and in our own country it is supported by ardent leaders of a restive group. In the countries of northern Europe and in Germany, it has reached equal acceptance with the established precedent which it seeks to displace.

It is in principle an architecture seeking a clearer directness of expression. It is engaged in the experiment, if we credit its advocates, of meeting science with science, machine with machine, but like all architecture, its measure will lie in its beauty and toward beauty is its aim.

For our purpose it is desirable at the outset to make visual the contrast this new manner affords. The proportionately slight occurrence of the new forms among our prevailing architecture permits their identity with the direct change of expression they are suggesting for our study. We are conscious of new forms which appear bizarre, new masses which are frequently interesting.

We are aware of the conspicuous change of modeling in that typical American structure, the skyscraper. We are conscious of a suggestion of new and finer possibilities of romantic beauty than the imagination of a decade ago conceived. We are also conscious of queer unsightly towers, which we cannot class as architecture, whose too sudden rise is clearly unfortunate.

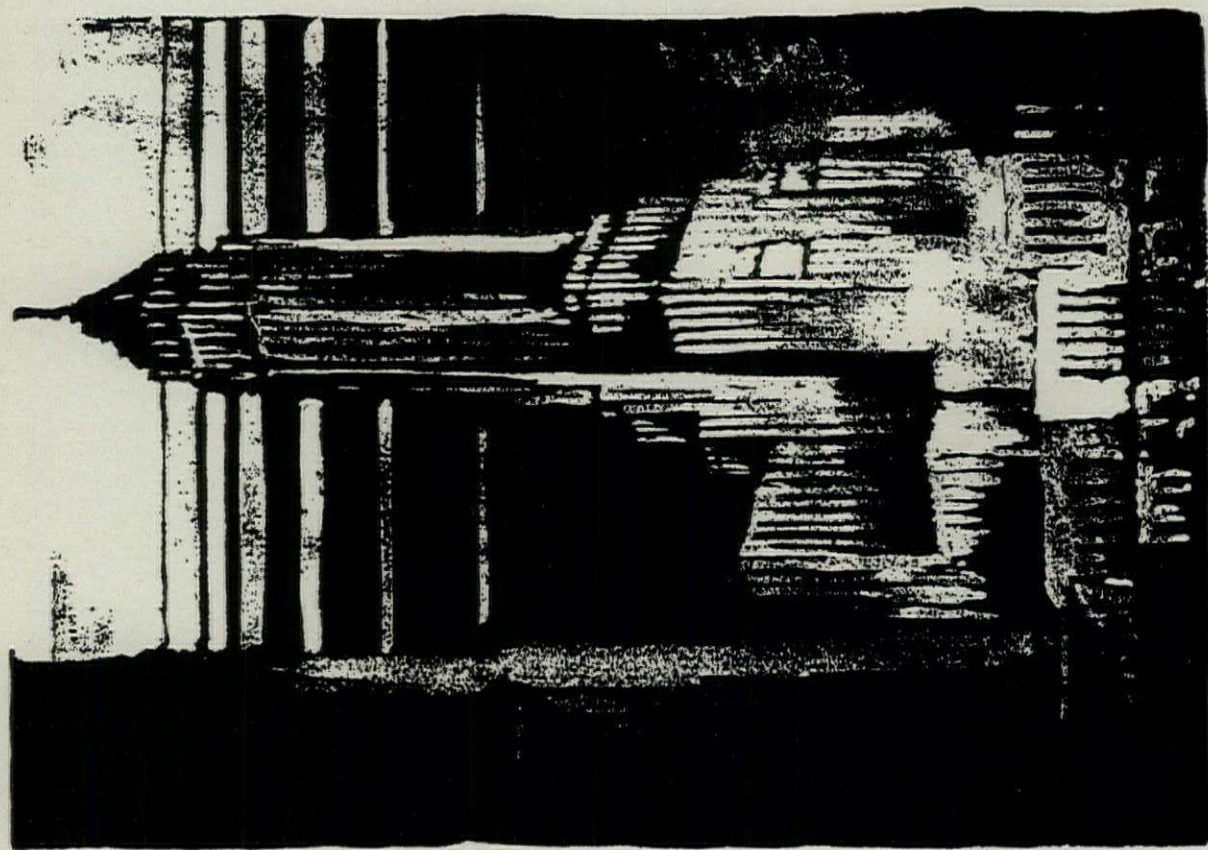
The design of the new Bank of Manhattan Company Building of New York City suggests the finer romance of a gigantic building conceived in terms of geometric composition. It is freer, more interesting and without the monotony of the past. It brings to

us the spirit of a refreshed imagination expressed in terms we can readily understand, freed from the close association of forms established by precedent, whose fitting nature has been too often in doubt. Designs of this character, colossal in their dimensions, inspiring in their suggestion, are appearing with increasing frequency, each helpful to the quality of its successor. They are creating desirable innovation and are unmistakably popular.

The necessary sequence of this review requires me to place this very interesting phase, the tall buildings of America, among my impressions of the new manner and its advent in this country, and, therefore, to defer until later my impressions of the "modern" skyscraper.

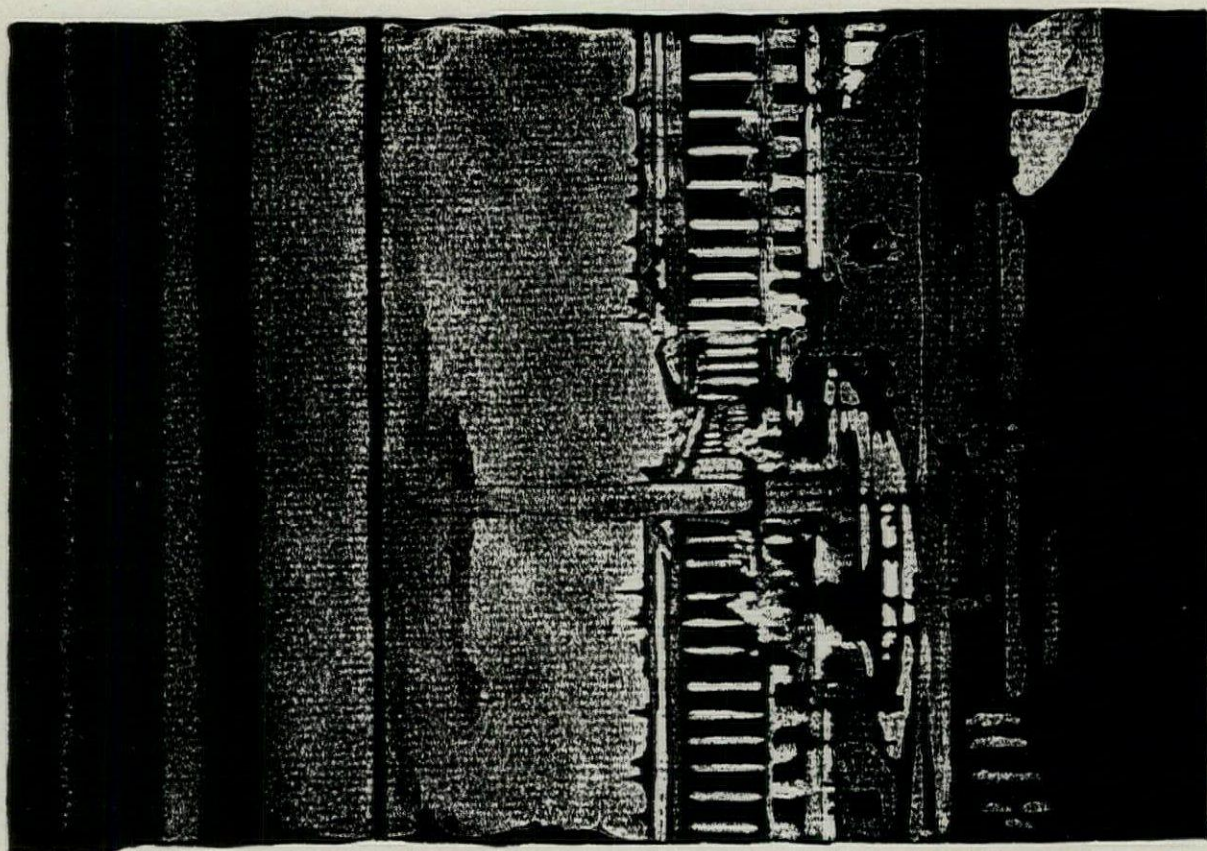
The new manner comes upon the scene as the result of new and vastly enlarged structural and economic forces. It comes as a departure from the orderly, possibly leisurely, process of our architectural endeavor. It interrupts a dull architectural complacency. It comes as the evidence of the revolt, if we care to call it such; at least, the evidence of a strong desire to break from the long established precedent in architecture, very generally embraced by the civilization of western Europe and of America, namely, the forms of the Renaissance.

It is in contrast to such orderly beauty as is represented by the exquisite groups that form the Place de la Concorde in Paris; groups which represent the accumulation of established precedent, the acceptance of an orderly manner in architecture expressive of a quiet, sustained beauty. In such buildings the forces suggested in structure have not been entirely denied, but have been controlled to ends of a classic quiet and with beauty as the single measure of the architecture. Place de la Concorde still bears honor to the French understanding of the charm of historic beauty, free from confusion of changing forms. In America we have grown accustomed to a variety of expression in architecture, to a confusion of type and to a lack of sensitive appreciation of either scale or sustained beauty. With us it has been the individual example in immediate contrast with the individual example of diverse character. In the cities abroad greater uniformity, and



BANK OF MANHATTAN TRUST COMPANY—H. CRAIG SEVERANCE, ARCHITECT

FROM BLACK AND WHITE BRUSH DRAWINGS BY CLAUDE E. HOOTON OF RICE INSTITUTE



PLACE DE LA CONCORDE, PARIS—JACQUES ANGE GABRIEL, ARCHITECT

a vaster extent of buildings in the forms of the Renaissance, have given greater quiet, more impressive beauty, and to a degree much more positive architectural quality. Into such groups as those of Paris, where historic beauty is so sensitive to change, the introduction of examples characteristic of modern building would be most unfortunate. The introduction of modern architecture amid our confusion is less harmful and is even likely to be stimulating because it seeks refreshing directness.

From Florence and Rome of the Renaissance until today "Modern Architecture" as a general term has stood in contrast to "Ancient Architecture," which from all early sources extends beyond Rome into the architecture of Byzantium. It has had like contrast to the term, "Mediæval Architecture," that of western Europe, from Rome until the conscious return again to the modeling on the Roman precedent in the Renaissance.

Would not the architect who rightly values that most outstanding architecture of structure, the architecture of Rome, willingly be more generous of centuries and permit modern architecture, as a term, to extend from the days of Rome without interruption, for certainly the glory of Roman structure was through centuries regained and repossessed in amazing completeness in the mediæval cathedrals in a new and vital manner!

The modernist is offering his new manner in equal contrast to the entire historic field. He is seeking in his more attractive compositions to repossess an equal mastery of an architecture of structure, for in architecture he desires that structure shall suggest and possess clearer, more direct expression. He heralds the new forces of steel and reinforced concrete, and electrical and mechanical power, which have been added in very recent generations to the Roman, Mediæval, and Renaissance elements of structure. He justly holds that when these forces are handled to the ends of beauty, they are as completely a part of architectural design—as real and as vital—as the elements which have descended to us from the age of Constantine.

The modernist is the product of the age. He is, in architecture, the restive spirit of our time. He is summing up the philosophy of the restive spirits of the past century. He joins those who have supported the movements of revolt ever since the romance of mediæval composition gave way to rule and formula.

The universality of the Renaissance in western Europe and recent America needs no explanation. We are not prepared to declare the modernist more sure of displacing it than were the restive spirits which preceded him, yet we are amazed at the contrast he offers and occasionally delighted with the new.

Until the past twenty years we could feel that the new forces in structure were a handicap rather than an advantage to design. Architectural design at the beginning of the twentieth century sought to restrain or subdue the effect of these new elements of structure, or so to cloak them with the forms of the past as to make them meaningless. The effort of design seemed to be to make the lofty building fit into an

historic niche entirely too small for it. We feel today the realness of modern structure seeking to reveal itself. We feel the beginning of a more direct manner, less restrained, less confused, more romantic in the richness of its geometric form, and of correspondingly simpler detail. André Lurcat, in his very recent work termed *Architecture*, tells us: "From this time we move forward to an architecture which will be the exact expression of our age." This is essential to the modernist's creed.

Throughout the seventeenth, eighteenth, and nineteenth centuries in Europe, and throughout the nineteenth century in America (insofar as important architecture was developed in this country), there had been accumulated a vast volume of precedent in building of all types reaching the normal requirements of nations. This architecture, vast in quantity, possessed in its elements a certain likeness of expression, which had to a great degree reached uniformity, possibly approaching monotony. Following the later buildings of the Middle Ages, the romance of composition gave way to an established rule and formula productive of uniformity and it created an architecture having an arranged and formal beauty, the elements of which possessed the evidence of adaptation, to a more or less accurate degree, from the elements of Roman architecture.

It was, however, only the exceptional example that possessed the boldness of Roman massing or the geometry of Roman composition. The great volume of accumulated recent precedent was of buildings of lesser dimension, more uniform in type, more closely juxtaposed, and formed from a relatively infinite repetition of small internal cubicles or rooms. The result was an architecture having fairly correct approximation to Roman surface, in a petty way, but still without the glory of Roman structure.

It is my desire to mention the evidences, as they have occurred, of those restive spirits in design which have sought to break away from the placid acceptance of the forms of the Renaissance. Architects' criticism of the new movement, in general, has been a criticism of it as a fad, a fashion to be short-lived, and, at best, but a short interruption of the continued current of recent centuries. It is for this reason that, as one forms his impressions of the modernist abroad and at home, it is well to recall the evidences of such restive desire for change as have arisen. The old manner has been supported by inertia and precedent, while the new manner seeks the support of science and investigation.

With the beginning of the nineteenth century there occurred in Europe, particularly in France, a modest revival of the romance of Gothic building. Later there came the Gothic revival of England and a similar interest in mediæval architecture with Pugin and Ruskin in England and with Viollet-le-Duc and Revoil in France. These movements were not productive of work of sufficient value or beauty to exceed the low levels of the Renaissance of their own time. Much of the romanticism that resulted was positively ugly. Each of these restless spirits agreed, however, in

"pleading for truth" in architecture. Each decried the structural insincerity of the Renaissance as it prevailed in their time, and each, in turning to the Gothic, saw in it a certain organic quality stressing in the design the structure which made it possible. They revived the old formula of "structure so ornamental and ornament so structural it is impossible to draw a dividing line between the two." But they produced no likeness to that historic quality.

Certainly the return to the study of the mediæval, as possessing greater beauty because it was mediæval, had no more valid reason than the return to the Roman, as possessing greater beauty because it, in its time, had possessed impressive architectural beauty, and the revival of either possessed a like nature of archæology, which certainly could not meet the demand of the critics for new forms expressive of the new structure and new needs of their time. The spirit of this movement which expressed itself in the desire for romance and for a change of form, away from prevailing custom, was characterized by a positive pleading for scientific building exactly as clear as that of "modern" leaders. Viollet-le-Duc states his case for a new architecture as follows:

"Architecture is the sister of Science; the former undergoes modification and advances hand in hand with the latter, and reaches its point of greatest splendor when Science itself has just passed a glorious stage in its career. But we must make this distinction between Science and Art: Science suffers no eclipses. What it has acquired by means of observation, analysis, and logical deduction is a permanent gain, and is, as it were, incorruptible. It is not so with that art which is the nearest kin to science, viz., architecture. Architecture, whose principles are based more directly than any other art on science, may disregard this support to such a degree as to be entirely unconscious of its value, and so decline. And it can only recover itself by immersion in the vivifying fount of science."

He brings this belief to bear upon the architecture of his time in France by emphasizing the degree to which precedent rather than scientific knowledge controls design among his contemporaries:

"The revival of architecture in the West, toward the middle of the twelfth century, exactly coincides with the great intellectual movement of that period of literature, science and philosophy.

"It was at the beginning of the thirteenth century that attention was turned toward physical and mathematical science; and architecture immediately joined in the movement and completely altered the traditional forms which it had hitherto retained.

"The same phenomenon may be observed in the sixteenth century; it was by taking advantage of the scientific progress of that brilliant epoch that architecture modified the superannuated forms of the period called Gothic.

"But few ages can compete with our own in the glory of its scientific achievements. Do our architects, like their predecessors, equally avail themselves of this source of æsthetic renovation? No. They prefer to ignore the close connection of science with art and to

give to us public buildings of a hybrid style, more or less influenced by the debased architecture of the last two centuries. . . . Purely scientific knowledge should be their starting point to constitute an art deduced from that knowledge and from the requirements of the time."

Such was the text of the leading restive spirit in design of France in the middle of the past century, one who held that for architecture in France the spirit of inquiry and independence was dead.

In comparison with his remarks, let us place the creed of Le Corbusier, the leader of French modernism today. He states:

"Our modern life, when we are active and about, has created its own objects; its costumes, its fountain pens, its Eversharp pencils, its typewriter, its telephone, its admirable office furniture, its plate glass, its safety razor, and the limousine, the steamship and the aeroplane.

"Our epoch is fixing its own style day by day. It is there under our eyes.

"Eyes which do not see.

"A serious-minded architect will prefer respect for the changes of nature to a lazy respect for tradition; to the narrowness of commonplace conceptions he will prefer the majesty of solutions which spring from a problem which has been clearly stated—solutions needed by this age of mighty effort which has taken so gigantic a step forward."

While more than half a century of the most colossal scientific achievement separates these two leaders, we find an amazing likeness of meaning in their ideal for architecture of the future. And lest we feel they emphasize science too strongly, let us recall each had an ardent faith and appreciation of the exquisite beauty of the architecture of Greece, and held that to be an example of the true relation of art and science in architecture.

Cold as Le Corbusier's statement appears, expressed clearly in terms of daily utilitarian objects, let us avoid the pitfall of thinking the solutions he demands are to be devoid of beauty. Let us remember it is he who tells us: "There is no art without emotion. Stones are dead things sleeping in the quarries. Drama lies all around the key achievements of humanity."

The romantic movement, a so-called Gothic revival, rather than a realistic movement, was the manner in which the restive spirit expressed itself. It was an age not ready for realism. It remained for the World War to give the modernist his opportunity.

From England and France this movement spread to America. It was coincident with the building of Trinity Church, New York, by Upjohn, and Saint Patrick's Cathedral by Renwick, works dating from 1840 to 1860. They bring a certain historic beauty possessed in Gothic architecture, a romance of design, however, less complete than the sources from which they originated and without added contribution of an inspiring nature. Still today as one views the confusion of upper Fifth Avenue, Renwick's St. Patrick's becomes a more noble work. Much is being done that is not half so good.

It was just after this time that the architecture of America and, in fact, the architecture of the world, sank to its lowest ebb; the period of poverty in imagination and of pettiness in execution. Therefore, it was a time for the achieving of great victory, and that victory came as a single-handed success to H. H. Richardson. It was his privilege between 1852 and 1877 to give to America work, not fundamentally of influence in a particular style for which he is best known, namely, the Romanesque, but rather to prove again the truths of a great architecture in an age when architecture had declined into a pitiful period of romantic makeshift. His buildings possessed the soundness of robust structure, the massiveness of vast scale, and the romance of impressive composition. His work being in a definite style was weakly interpreted by his followers in meagre and shabby terms. The story of robust structure was forgotten, and the forms of Richardson's Romanesque multiplied in doll-house proportions to absurdity.

Beginning with the early nineties, we have the introduction into American architecture of the structural materials of steel and reinforced concrete. With them came the development of further mechanical and electrical powers, and the introduction of the elevator capable of meeting the possibilities of more lofty structure presented by the opportunity of steel. Among the later works of Viollet-le-Duc had been certain studies in the structural steel forms, available and being developed in the France of his time. These studies were clearly in line with an architecture that should take its form from the new material. They suggested a new architecture modeled on structural steel shapes. They were not productive of work contributing to the beauty of architecture and possibly the thesis of such design is to be found in the Eiffel Tower.

The architecture supported by structure in steel and reinforced concrete in America at once developed an unattractive boxlike character. At best, its bareness was shrouded by a Roman colonnade at its base and an Italian arcade and cornice at its top. The new materials brought about engineering possibilities for success which were quickly understood and achieved, but they brought to architecture a problem whose solution in terms of established precedent appeared hopeless and impossible. The evidences of this boxlike type, however, provoked again the restive spirits of design to new and different formulæ, in which building should correspond in its expression to the structure which made it possible. The leader in this movement was Louis Sullivan of Chicago.

It is strange that the most effective opportunity for the classical manner to express itself in American cities should have been coincident with and should have afforded an effective opening, also, for expression of the new manner. The great group of buildings which constituted the Columbian Exposition at Chicago in 1893 brought to the American people the first pictures of a sustained classical manner in architecture developed on a broad and impressive plan. However, in the building dedicated to transportation at the Columbian Exposition, Louis Sullivan gave us a direct,

vigorous composition, very expressive and of an entirely different mood from the prevailing architecture of that exposition.

In the later nineties, it was his privilege to apply his formula to commercial buildings of the many-storied type. His analysis of such structure was to give to it a form kindred to its type, that from the relatively large openings at the base it should proceed upward in a modest reduction of such openings, that there should be continuity expressed in vertical piers suggesting the steel of the columns, and that between such piers the successive windows should appear in single, simple panels ranging from the second or third stories to near the top of the building. Such was his design of the Wainwright Building in St. Louis. Finally, the design is pulled together by an immense horizontal band coinciding with the attic story and is terminated with a massive, simple cornice of great severity. The design at once appears as a unit. No romance of form beyond the simple geometry of his time occurs. The building is still a simple cube, but certainly more fitting and convincing.

The influence of Sullivan, however, was not so much from the work which he produced, as from the zeal with which he declared his opinions and the vigor with which he attacked the entrenched forces of classical design. He became the leader of modernism in America, and by his writings, the most appreciated of American architects in foreign lands.

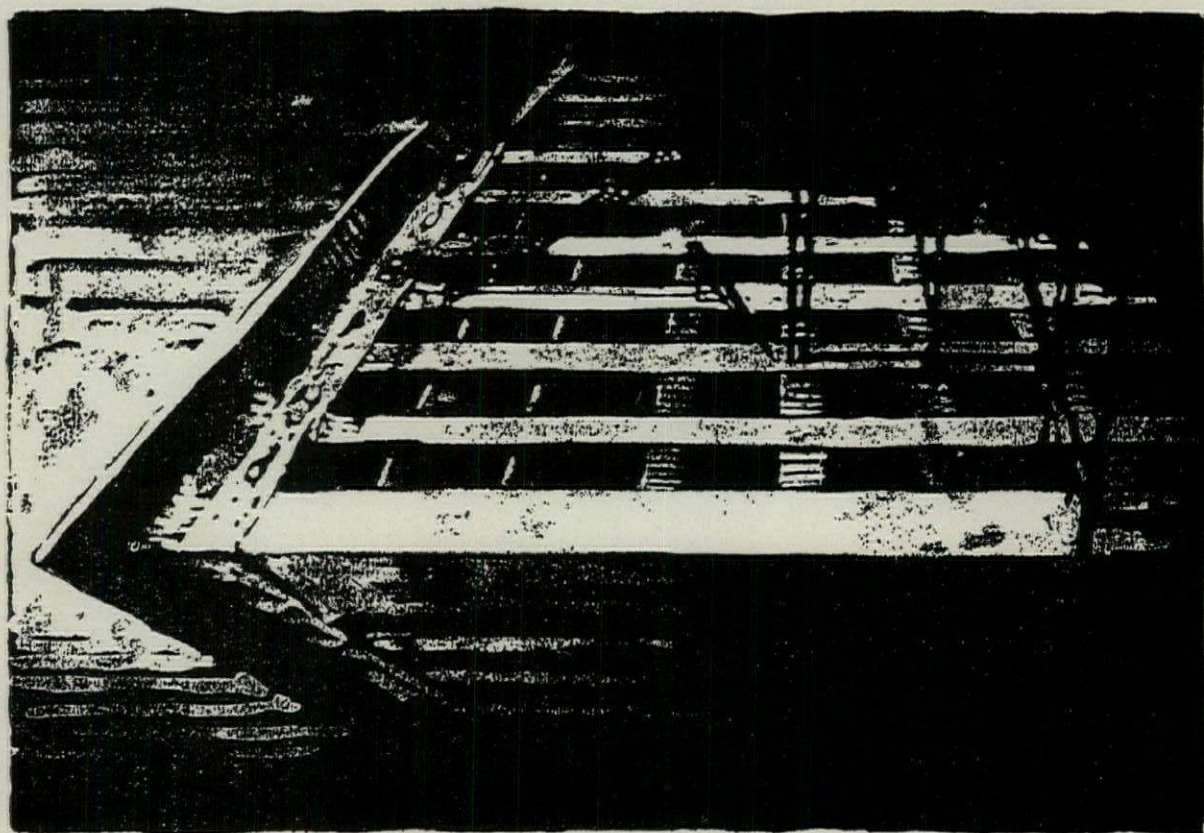
In his autobiography, which he called *The Autobiography of an Idea*, we may read his hope for a new or "modern" architecture:

"In the better aspects of eclecticism and taste, that is to say, through those aspects which reveal a certain depth of artistic feeling and a physical sense of material, rather than mere scene-painting or archæology, however clever, there is to be discovered a hope and a forecast. For it is within the range of possibilities, one may even go so far as to say probabilities, that out of the very richness and multiplicity of the architectural phenomena called "styles" there may arise in the architectural mind a perception growing slowly into clearness, that architecture in its material nature and in its animating essence is a plastic art. This truth, so long resisted because of the limited intellectual boundaries and the deficient sympathy of academic training, must eventually prevail."

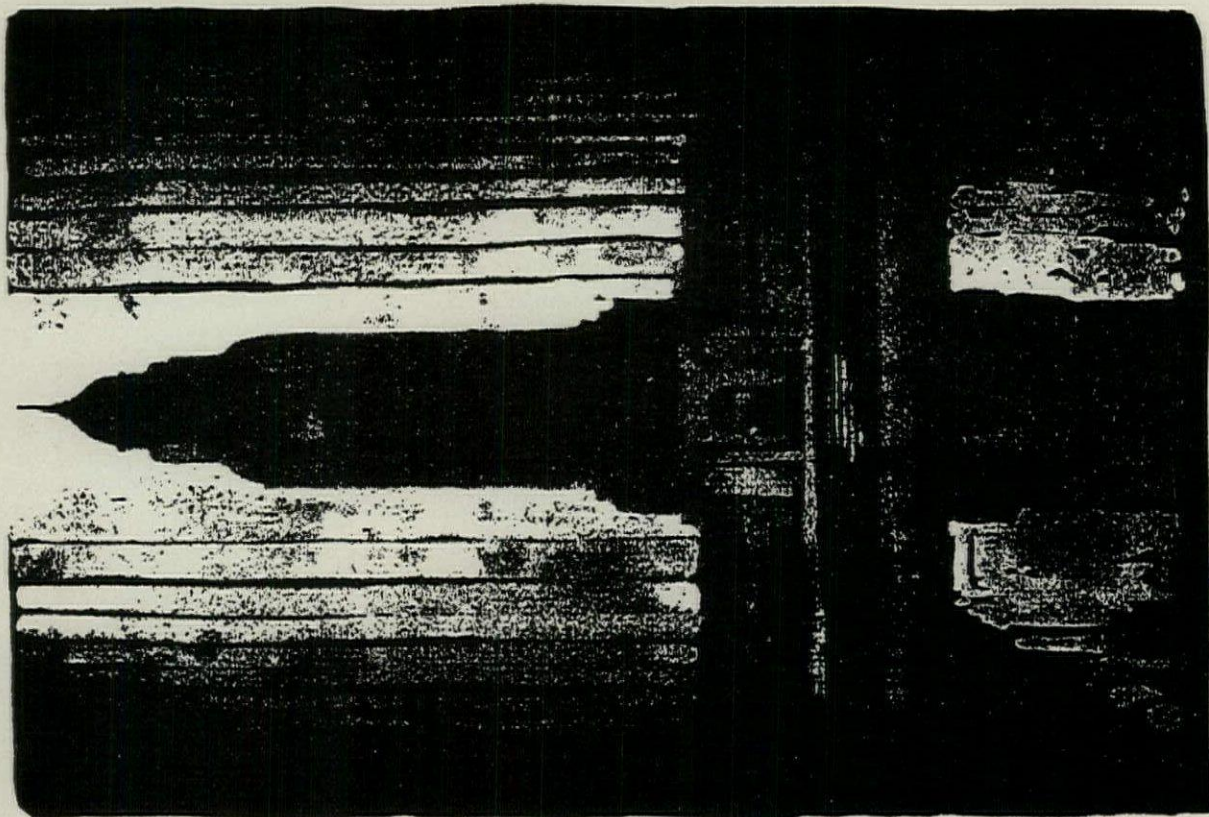
But for Sullivan, his inspiration of the law that "form ever follows function" was from nature, "its power is as gentle and as irresistible as that of the springtime."

In this he was unlike the modernist of today, for our modernists have chosen the machine as their example.

The modernist of today cites for us the first automobile of a generation ago, the horseless carriage, a phaëton impelled by a hidden machine, and shows that art has evolved from this a form of the modern automobile adapted beautifully to the machine requirements of power, speed, and comfort which it represents; that the envelope or covering of the machine has taken plastic fitness to the mechanics of the automobile. On



WAINRIGHT BUILDING, ST. LOUIS—LOUIS SULLIVAN, ARCHITECT
FROM BLACK AND WHITE BRUSH DRAWINGS BY CLAUDE E. HOOTON OF RICE INSTITUTE



NEBRASKA STATE CAPITOL—BERTRAM GROSVENOR GOODHUE, ARCHITECT
FROM BLACK AND WHITE BRUSH DRAWINGS BY CLAUDE E. HOOTON OF RICE INSTITUTE

this theory the modernist proclaims the demand for an architecture so enveloped as to express its meaning, as clearly and as accurately as the modern machine is enveloped. The modernist states "machinery contains in itself the factor of economy which makes for selection. The house is a machine for living in."

Louis Sullivan and his associate and successor, Frank Lloyd Wright, were impressively followed abroad. There contemporary realistic movements among enthusiasts for modern architecture were led by Otto Wagner in Vienna, by De Cuypers in Holland, by Peter Behrens in Germany, and later by Tony Garnier and Auguste Perret in France. In the closing years of the nineteenth century we have in Europe, particularly in France and Belgium, the *Art Nouveau* movement; a movement of radical departure, a strange composition of form, in structure analytical, as Sullivan would have it, but of distorted and unpleasant shape. All of us have had our contact with the *Art Nouveau*. Possibly its examples were too recent for us to look at the modernism of today fairly. Possibly the modernism of the years from 1920 to 1924 abroad appeared too closely related to the *Art Nouveau* movement. I feel, as we examine the better examples of recent design, we shall see that structural honesty and simplicity have triumphed over confused form.

A similar Arts and Crafts movement in Germany and America produced the vulgar and heavy massive style, particularly in furniture, equally denying the refinements of historic precedent.

It would scarcely be fair in considering the restive spirits that have produced the modern leaders in architecture to hold them accountable for the work of either the *Art Nouveau* or the Arts and Crafts movements. Such were probably the product of the low level which architectural effort had reached, and of the lack of genius in the minority which supported these movements.

The second decade of the twentieth century found, for America, serious, progressive, powerful architectural development, but restrained largely within very conservative limits of a carefully studied continuation of classical tradition, a serious return to the finer qualities of the architecture of the Renaissance. Notable public groups and notable buildings of private and commercial character were well studied in a careful and controlled manner by capable men, to the purpose of securing beauty. The success of these men has established in America, up to the present time, a deeply entrenched acceptance of the splendor of classical tradition. Further, as we shall note in considering the new manner here, America chose to frolic with glee in the antique shops of Europe, and to bring back a curious miscellany of style in both architecture and furniture, and to reach a period of eclecticism unequalled in the history of any people, with the result that Italian, Spanish, modern Mediterranean, Norman, English, French, Swiss, and Georgian compositions, meritoriously studied, are to be found arranged side by side in a single limited perspective. Amid such a frolic the thought of design in truthful relation to structure was too dull.

Abroad the modern movement, just prior to the World War, began to take its forms from an economical treatment of reinforced concrete as developed under industrial conditions. Behrens in Germany, with great industrial plants as a motif, Garnier in France, with the industrial city, and Perret with his reinforced concrete solutions were giving quite a splendor of intensely simple form to the architects' vocabulary, and a new stimulant to the imagination; big, positive, clean forms, ready for study toward refinement.

Finally, we cannot prepare the ground for our opinion on modern architecture without accounting for the influence of the great World War. This influence for Europe was, first, that of a complete cessation and interruption of the prevailing powers of formalism and architectural formula, and an interruption or cessation of this character destroyed the established financial security of the conservatives and gave added opportunity for the modernist when work was resumed. Further, the European attitude of mind had been decidedly shaken. New movements, social, economic, and political, resulted at the close of the war. But probably more directly influential than either of these was the absolute demand for a more rigid economy in structure. It became necessary that modern structure in Europe should achieve, by the most simple and inexpensive method, the most complete harmony of the requirements of comfort and purpose in building within the very minimum of expenditure. Here the modernist had the opportunity to demand the discarding of the formal, costly costume of the past.

A more fitting frankness and a more convincing architectural meaning seemed to appear at once with the freeing of architecture from the long accumulated incrustation of historic detail. Buildings emerged clearer, cleaner, and more understandable to the layman; expressing by this directness a greater fitness to the character of our epoch, which is one that seeks to approach its problems in a less devious manner and to adjust them according to facts made available by present-day research.

For America the years after the war gave gigantic opportunity for vast building. So great was this movement that architecture was raised to equal the colossal commercial and industrial structure developed as a result of the war. Design could attempt to interpret the colossal spirit of American commerce and industry. There accompanied this opportunity a lavishness of expenditure so vast that it has no equal within so short a period in all architectural history. Therefore, a variety of design prevailed without a controlling thought or purpose. In it the modernists, still the great minority, were able to accomplish a few monuments of great dimension and test the public attitude toward such innovation.

I feel that no matter how brief or incomplete such a survey may be, it should include the effect produced upon the architectural profession by the work of the late Bertram G. Goodhue. Goodhue's work began at the time when Sullivan's work was at its height. Goodhue's early work was in the spirit of a carefully studied

return to the history of English Gothic, both ecclesiastical and collegiate. In this field, with Cram, he became a leader in bringing to America examples of exquisite architecture based on a carefully studied mediæval precedent. But no figure in recent architectural history made such a marked development in the short period of his professional life, as did Bertram G. Goodhue. He proved himself a "master of many arts." It required a figure of outstanding genius, equal to any of his age, to encourage the acceptance of a fresh study of new and changing forms. With one so capable, the departure from an established character, in which he was leader, to new beauties was an inspiration to other capable men hitherto extremely conservative. In his Nebraska State Capitol, and in others of his later buildings, he turned deliberately from mediævalism and produced designs of amazing simplicity, suggestive not so much of analytical structure, as of opportunity for romantic composition in the monolith. This was of the spirit of the modern. It required that to the spirit of the modern should be brought the architectural quality of beauty. There is no measure, which either the modern or the sustained classicism can eventually approach, for architectural merit, in which beauty is not the final critic.

The development of the architecture which we, for the moment, call "modern," and would study for our impressions of the modern, we can safely say begins with the year 1920, whether it be abroad or at home. Whatever the preliminary studies of past efforts and movements, really successful attempts to apply composition and to approach a romantic beauty have been in solutions dating after that time. It is from that point that we shall take up the examples upon which we shall try to reach our impressions as to the merit of modernism both in Europe and America.

I shall not attempt any prophecy. I shall simply try to give an equally critical selection of the better examples of recent work abroad and at home. Justice to the modern requires, as it does to the work based on classical tradition, that the most meritorious examples be chosen to show the height to which such design offers beauty. It is a work which is rapidly progressing—progressing so fast that publications of last year fail noticeably of reaching the beauty of designs of this year. It has the quality of stimulating the imagination. This much and no more as to its future: unlike similar movements of the past, it comes upon a receptive world—one open to conviction—and unlike similar movements in the past, it comes at a period of

active architectural endeavor to find support from men whose ability is unexcelled. Whether, in itself, it succeeds or not, it has the power to revitalize the imagination even of the most conservative.

I should like to take the liberty of quoting from the very recent work of Hugh Ferriss, *The Metropolis of Tomorrow*.

Ferriss, in his architectural experience, has been closely associated with the illustrating of the more outstanding designs of the past twenty years as developed by the leading architects of America in both the classical and the romantic fields.

He is picturing the metropolis as he sees it from the upper levels of one of its gigantic structures and watches it emerge from the darkness and obscurity of early dawn; I quote:

"Are these masses of steel and glass the embodiment of some blind mechanical force which has imposed itself, as though from without, on a helpless humanity? At first glance one might well imagine this. Nevertheless, there is but one view which can be taken; there is but one fact that can serve as our criterion. The drama is first and foremost a human drama. Those vast architectural forms are only a stage set. Is the set well designed? Indeed, it is not designed at all! In speaking of the city as a whole, it is impossible to say that it did more than come to be built. We must admit that as a whole it is not work of conscious design."

This is his graphic picture of the city of today. Against the absence of design the modernist places "the establishment of standards in order to face the problem of perfection"—"beautiful with all the animation the artist can add to severe and functioning elements."

The modernist proposes, in place of the congested and unhealthful nature of the city of today, a city which shall be built for speed and bathed in sunlight. In the enlightenment of our age we may no longer build and rebuild in ever-increasing confusion upon the plan of the past, but in a broader, saner, more perfect manner reflecting with clarity the effort to design so as to meet intelligently the requirements of modern city life as we know them to be; that our cities shall become both intensely useful and desirable. It is the modernist's creed that order shall replace confusion; that our cities, being the expression of the greatest efforts of man, shall show man's mastery in the spirit of science.

The modernist's approach to his problem is indeed stimulating.



Courtesy of Kennedy & Co.

FROM AN ETCHING BY ALBERT FLANAGAN

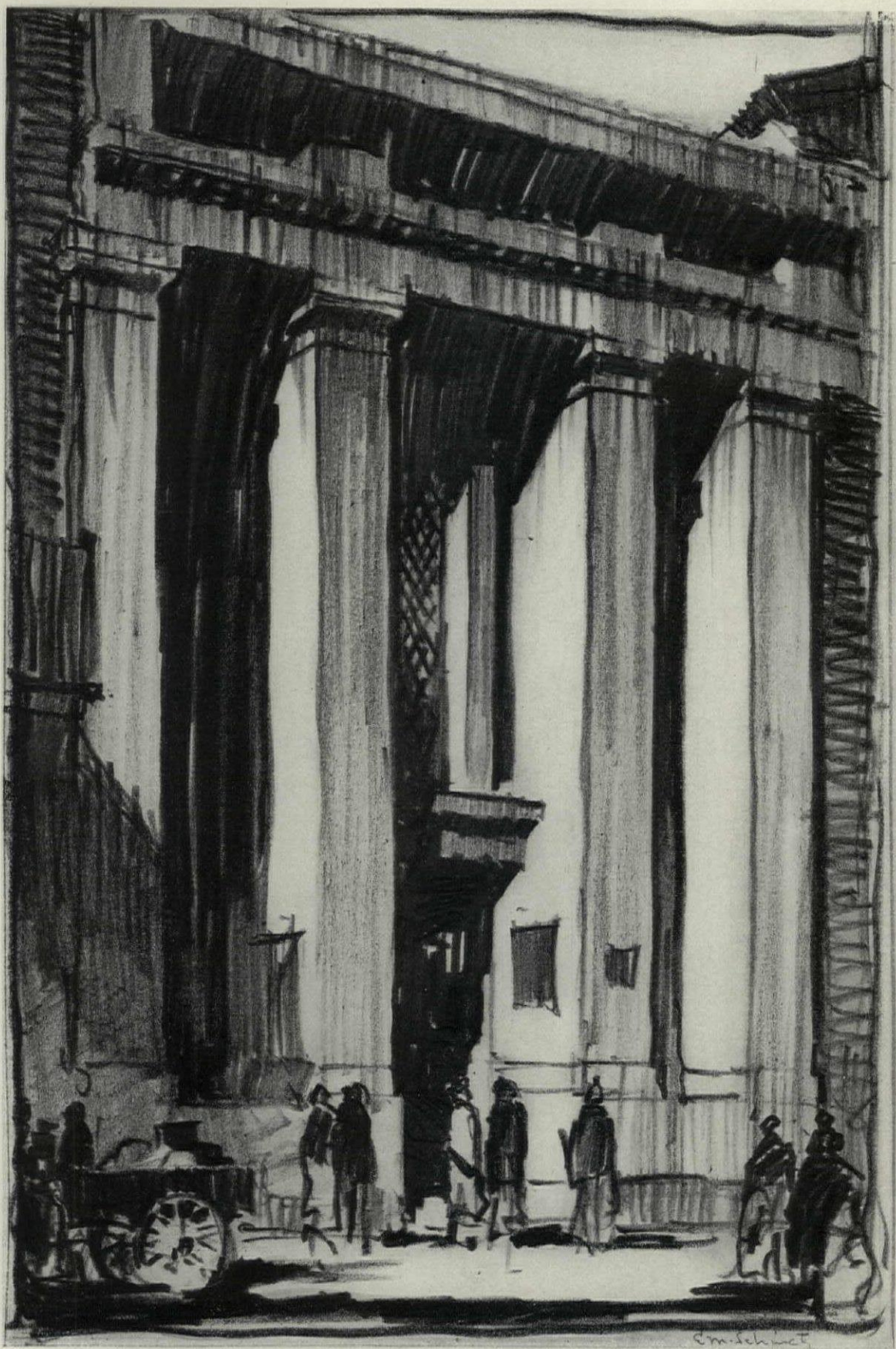
"PLAZA GROUP—TOWERS OF MANHATTAN"

PENCIL POINTS FOR MAY, 1931

VOLUME XII

NUMBER 5

We present here an etching by Albert Flanagan, one of a series he has made of contemporary New York. The original measures $5\frac{1}{2}$ " x $10\frac{1}{4}$ ". The subject is, of course, the Sherry-Netherlands, Plaza group as seen from a corner of Central Park.



THE OLD MINT, NEW ORLEANS
FROM A LITHOGRAPH BY EDWARD M. SCHIWETZ

PENCIL POINTS FOR MAY, 1931

VOLUME XII

NUMBER 5

This striking lithograph is one of the more recent works of Edward M. Schiwetz, the young Texan artist whose drawings were discussed at length in an article in our February, 1929, issue. The original measured 7½" x 11". Since the article on his work appeared, Schiwetz has sketched his way in all mediums from New York across the south and back to Texas. He recently sent us a huge portfolio filled with scores of sketches, some of which will appear shortly in our pages.



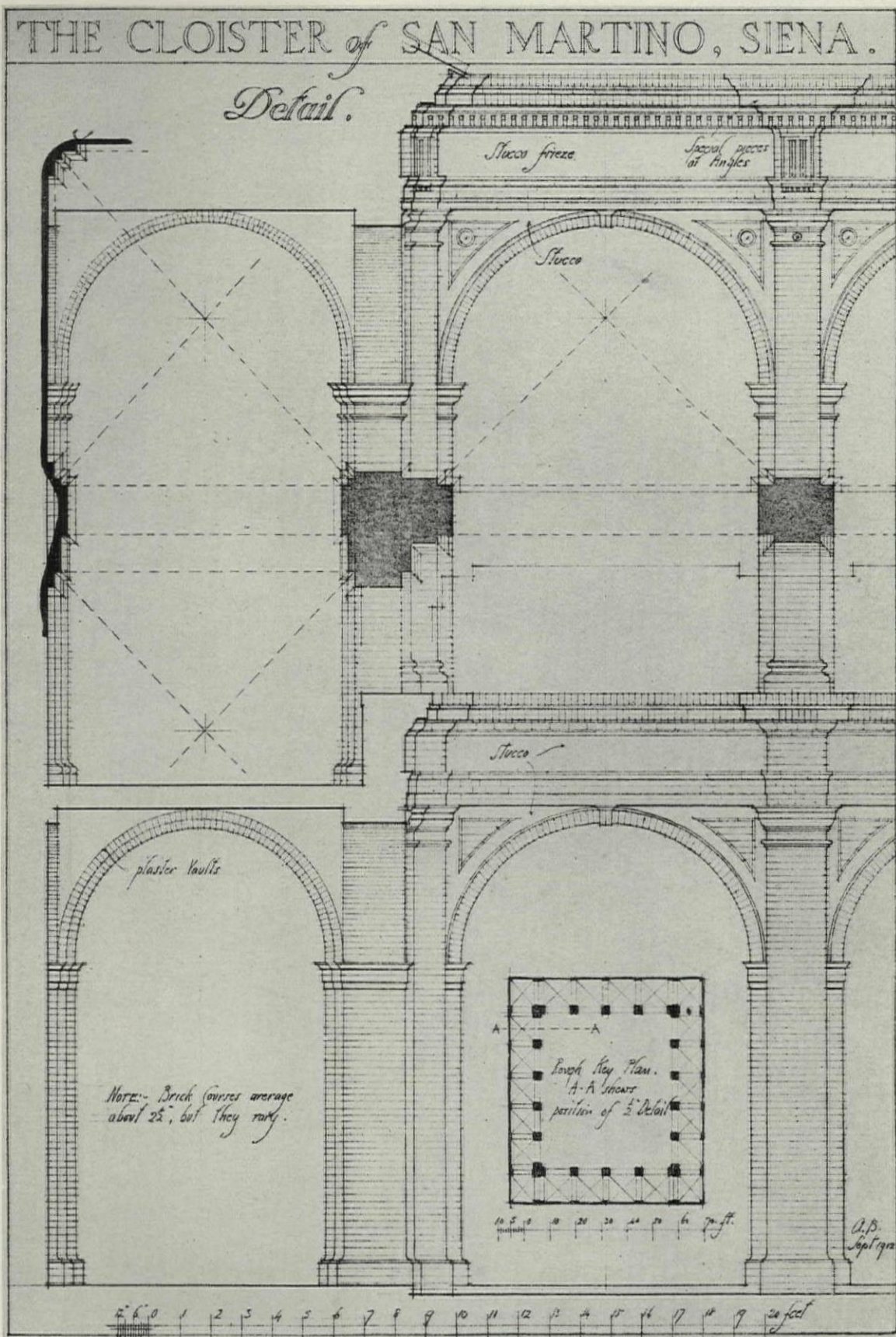
PRELIMINARY STUDY FOR LOBBY OF HOTEL MANGER, BOSTON, MASSACHUSETTS

FROM A WATER COLOR RENDERING BY O. R. FREEMAN FOR THE H. NEWTON MARSHALL COMPANY, DECORATORS

PENCIL POINTS
(May, 1931)

PENCIL POINTS SERIES of COLOR PLATES

The drawing shown on this plate was originally drawn in reverse with pencil on tracing paper and then rubbed onto a sheet of Strathmore water color board. It was then rendered with water color, the greater part transparent, with the introduction of opaque color where highlight or solid color effects were desired. This color study, together with six plates of one and one-half inch scale detail studies in water color and three pencil perspectives, comprised Mr. Freeman's "working drawings" for the decoration of all the public portions of the new Manger Hotel, Boston. In cooperation with the architects, Funk and Wilcox of Boston, and Mr. Charles White, President of the Manger chain, Mr. Freeman developed his designs for the wall treatment early enough in the work to permit incorporation of his motifs in the specially woven rugs and other equipment. Then, by personally supervising the actual painting on the job, he worked out an harmonious decorative scheme, taking into consideration the practical effects of lighting and architectural limitations.



A PLATE FROM THE ARCHITECTURAL ASSOCIATION SKETCHBOOK

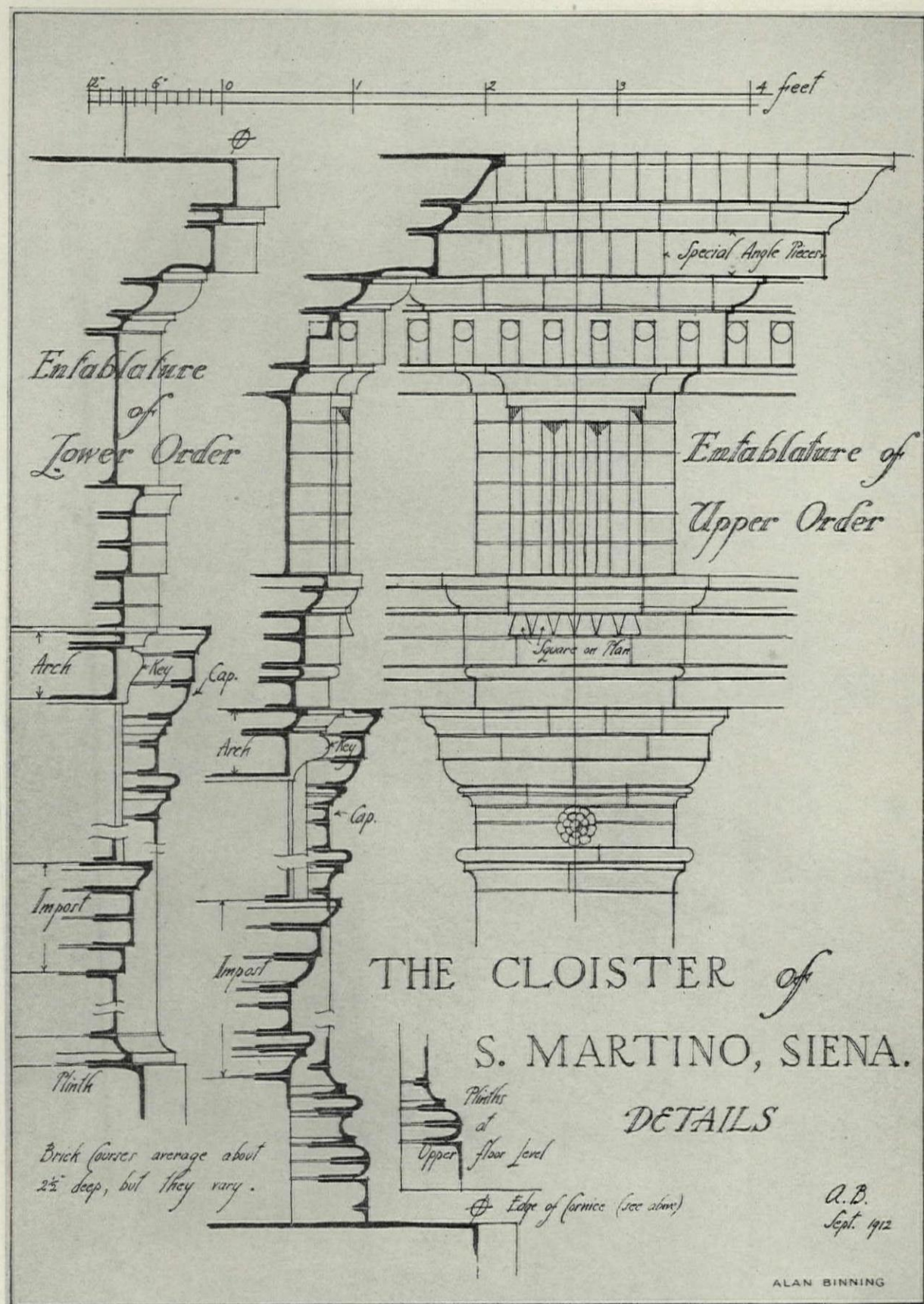
MEASURED DRAWING BY ALAN BINNING

PENCIL POINTS FOR MAY, 1931

VOLUME XII

NUMBER 5

This plate and the following one, which gives details of the same subject, were published in London in the first quarterly part of "The Architectural Association Sketchbook" for 1913.



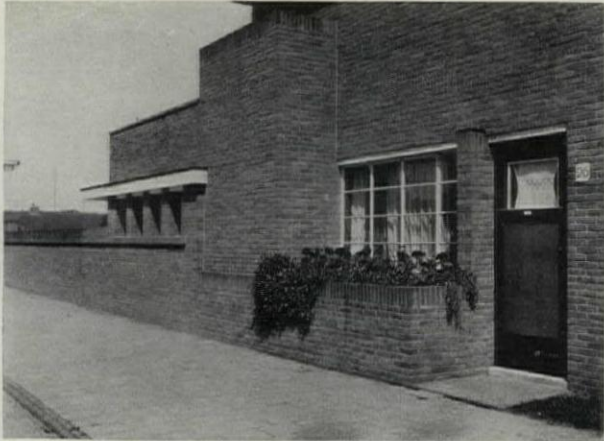
A PLATE FROM THE ARCHITECTURAL ASSOCIATION SKETCHBOOK
MEASURED DRAWING BY ALAN BINNING

PENCIL POINTS FOR MAY, 1931

VOLUME XII

NUMBER 5

This detail sheet, measured and drawn by Alan Binning, was originally published in London in 1913 as a plate in the first quarterly part of "The Architectural Association Sketchbook."



DETAIL OF ABATTOIR, HILVERSUM, HOLLAND
DUDOK, ARCHITECT



DETAIL OF BATHHOUSE, HILVERSUM, HOLLAND
DUDOK, ARCHITECT

Where Are These Modern Buildings?

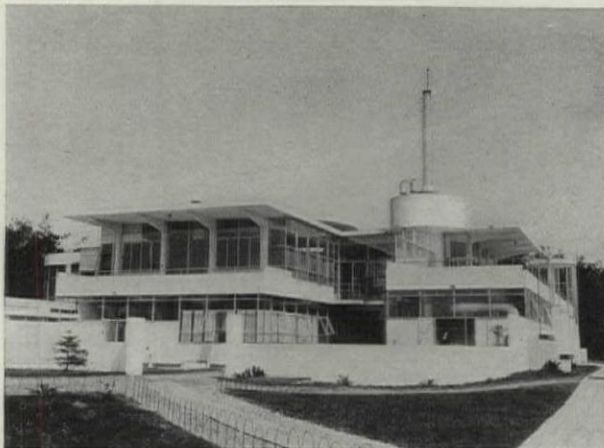
Examples to be Found in Holland and Germany

By Richard A. Morse

Realizing that every year more and more architects and architectural students from the United States are visiting Holland and Germany to see and study what is being done in contemporary architecture, the author thought that some suggestion of what to see and where to find it might prove useful. The outline offered with the following article is obviously far from complete and must in no way be considered a Baedeker to modern architecture. It was followed with great enjoyment and we hope some enlightenment by the author on a trip last summer and the information given is passed on for what it is worth. All the examples listed on pages 375 and 376 were visited and among them are buildings by most of the well known contemporary architects in Holland and Germany. Several of these buildings may be con-

sidered as landmarks in the modern movement. The prospective traveler, seeking out some of those suggested, will certainly discover many more. For convenience of travel arrangements and allotting time, the cities containing the examples outlined have been arbitrarily grouped into the natural geographical districts where they are located.

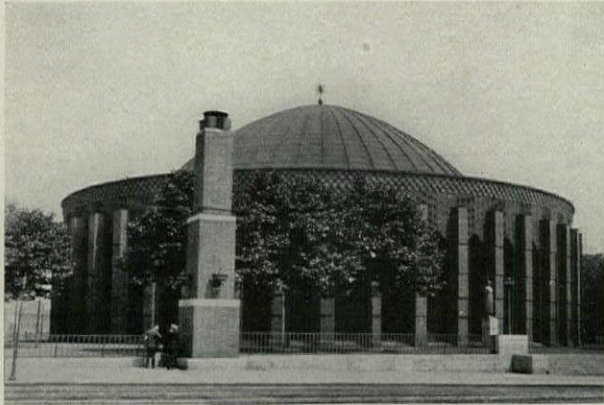
The first district is Holland and the whole country is included because distances are short and transportation is good. The second district is the lower Rhine which includes the cities of Dusseldorf and Cologne. The third district is Berlin, its environs, and the city of Dessau, a short distance away by train. The fourth and one of the most important districts is the city of Stuttgart in south Germany. Falling outside the limit of the areas mentioned is the town of Celle near



ZOONESTRAAL SANATORIUM, HILVERSUM, HOLLAND
BIJVOET AND DUIKER, ARCHITECTS



VAN NELLE FACTORY, ROTTERDAM, HOLLAND
BRINKMAN AND VAN DER VLUGT, ARCHITECTS



PLANETARIUM, DUSSELDORF, GERMANY
WILHELM KREIS, ARCHITECT

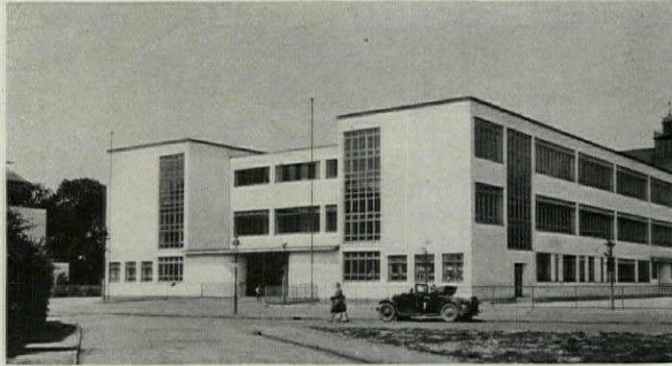


EXHIBITION BUILDINGS, DUSSELDORF, GERMANY
WILHELM KREIS, ARCHITECT

Hanover. By following the suggested system of zones the traveler will find that he can cover the ground systematically and with the least inconvenience.

Holland, the first district covered, is rich with examples of modern brick architecture and has many examples of concrete architecture among which are the Van Nelle Tobacco Factory outside of Rotterdam, a block of workmen's houses at The Hook of Holland, and the Zoonestraal Sanatorium about two miles from Hilversum. The entire country can be covered in ten days and the work in all the towns mentioned can be seen by staying in Hilversum, Amsterdam, Rotterdam, and The Hague. Utrecht can be visited from Hilversum, Haarlem en route from Amsterdam to The Hague, and The Hook of Holland is only a short distance from The Hague. Rotterdam

is a rather unattractive city to stop in and may also be made a side trip from The Hague. Although Hilversum is but a short distance from Amsterdam and could be visited from that city a longer stay is advised as the town is most attractive and the numerous examples of brick architecture by its city architect, Dudok, are well worth more than a casual visit. The travel bureaus in all Dutch towns have someone who speaks English and are very obliging in supplying maps and marking on them where the desired buildings may be found. Much time can be

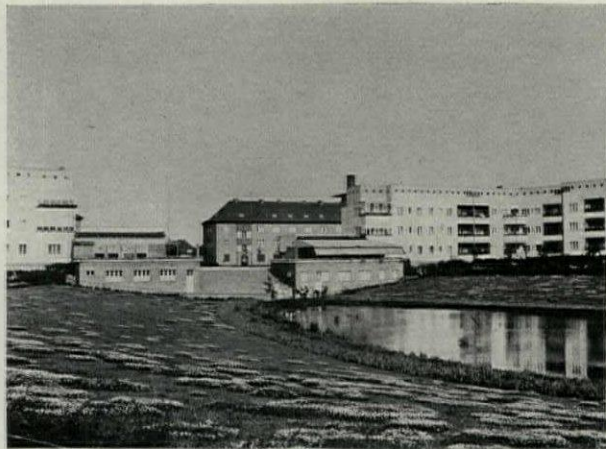


SCHOOL AT CELLE, GERMANY
OTTO HAESLER, ARCHITECT

saved by making the travel bureau in each town your point of departure and always secure a map with the buildings located thereon before starting out. Notice particularly the use of brick in the Netherlands and also notice the use of plain and colored glass blocks



SIEDLUNG, BERLIN-ZEHLENDORF, GERMANY
B. TAUT, ARCHITECT



BRITZ SIEDLUNG, BERLIN, GERMANY
TAUT AND WAGNER, ARCHITECTS

WHERE ARE THESE MODERN BUILDINGS?

DISTRICT 1 HOLLAND

CITY	BUILDING	ARCHITECT	REMARKS
UTRECHT	<i>Post Office</i>		In Town
"	<i>House</i>	RIETVELD	On Road to Bunnik
"	<i>R. R. Administration Bldg.</i>	VAN HEUKELOM	In Town
HILVERSUM	<i>Numerous Schools</i>	DUDOK	In Town
"	<i>Housing Blocks</i>	DUDOK	In Town
"	<i>Town Hall</i>	DUDOK	In Town
"	<i>Bathhouse</i>	DUDOK	In Town
"	<i>Abattoir</i>	DUDOK	In Town
"	<i>Residence</i>	WYDEVELD	Utrechtweg
"	<i>Zoonestraal Sanatorium</i>	BIJVOET & DUIKER	Outside of Town
AMSTERDAM	<i>"Der Telegraf" Bldg.</i>		Downtown
"	<i>Olympic Stadium</i>	JAN WILS	Amsterdam Southwest
"	<i>Synagogue</i>	HARRY ELTE	Jacob Obrecht Straat
"	<i>Municipal Tramways Bldg.</i>	CITY ARCHITECT'S OFFICE	Center
"	<i>Numerous Apt. Blocks</i>	VARIOUS ARCHITECTS	Amsterdam West
HAARLEM	<i>Post Office</i>	J. CROUWEL	In Town
"	<i>Telephone & Telegraph Office</i>	J. CROUWEL	In Town
"	<i>Crematory</i>	DUDOK	In Town
THE HAGUE	<i>Store "De Volharding"</i>	JAN BUYS	Downtown
"	<i>Christian Science Church</i>	H. P. BERLAGE	Residential District
"	<i>Department Store</i>	P. L. KRAMER	Downtown
HOOK OF HOLLAND	<i>Block of Houses</i>	OUD	1 Hour from The Hague
ROTTERDAM	<i>Van Nelle Factory</i>	BRINKMAN & VAN DER VLUGT	Outside of Town
"	<i>Department Store</i>	DUDOK	Center of Town
"	<i>New Suburb</i>	OUD	Across the Maas

DISTRICT 2 LOWER RHINE

CITY	BUILDING	ARCHITECT	REMARKS
DUSSELDORF	<i>Planetarium</i>	WILHELM KREIS	Near Rhine Bridge
"	<i>Exhibition Bldgs.</i>	WILHELM KREIS	Near Rhine Bridge
"	<i>Office Building</i>	PAUL BONATZ	Center
COLOGNE	<i>Office Building</i>	J. KOERFER	In Town
"	<i>Press Exhibition</i>	ADOLF ABEL	Across Rhine
"	<i>Stadium</i>	ADOLF ABEL	

SUGGESTED ITINERARY AND SOME OF THE BUILDINGS TO BE SEEN

PENCIL POINTS FOR MAY, 1931

DISTRICT 3 BERLIN AND DESSAU

CITY	BUILDING	ARCHITECT	REMARKS
BERLIN—WEST END	<i>Universum Cinema</i>	ERICH MENDELSON	Lehninerplatz
" " "	<i>Apartment Block</i>	ERICH MENDELSON	Cicero Strasse
" " "	<i>House of Dr. Sternfeld</i>	ERICH MENDELSON	Heer Strasse
" " "	<i>Gourmenia Haus</i>	LEO NACHTLICHT	Near the Zoo
" " "	<i>Kapitol Cinema</i>	POELZIG	Near the Zoo
" " "	<i>Femina Palast</i>		Nürnberg Strasse
" " "	<i>Titania Palast</i>		Steglitz
" " "	<i>Grünfeld Dept. Store</i>	OTTO FIRLE	Kurfürstendamm
" " "	<i>Various Shops</i>	VARIOUS ARCHITECTS	Kurfürstendamm
BERLIN—CENTER	<i>Kempinsky Haus</i>		Potsdamer Platz
" " "	<i>Restaurant in Wertheims</i>	BRUNO PAUL	Leipziger Platz
" " "	<i>Herpisch Store</i>	ERICH MENDELSON	Leipziger Strasse
BERLIN—SOUTH	<i>Karstadt Dept. Store</i>		Hermann Platz
" " "	<i>Tempelhof Air Port</i>	KOSINA & MAHLBERG	Tempelhof Field
" " "	<i>Siedlung</i>	BRAUNIG	Near Tempelhof Field
" " "	<i>Siedlung Britz</i>	TAUT & WAGNER	Beyond Neuköln
BERLIN—ZEHLENDORF	<i>Siedlung</i>	HUGO HÄRING	Onkel Toms Hütte Station
" " "	<i>Siedlung</i>	BRUNO TAUT	Onkel Toms Hütte Station
BERLIN—WANNSEE	<i>Municipal Bathing Establishment</i>	RICHARD EMISCH	Towards Potsdam
DESSAU	<i>Bauhaus School</i>	GROPIUS	Across Railroad
"	<i>Siedlung</i>	GROPIUS	Near Bauhaus
"	<i>Siedlung for Workmen</i>	GROPIUS	South Side of Dessau

DISTRICT 4 STUTTGART

CITY	BUILDING	ARCHITECT	REMARKS
STUTTGART	<i>Schocken Dept. Store</i>	E. MENDELSON	Eberhard Strasse
"	<i>Railway Station</i>	P. BONATZ	Center
STUTTGART—WEISSENHOF	<i>Houses By</i>	BEHRENS, CORBUSIER,	
" " "	" "	GROPIUS, VAN DER ROHE,	
" " "	" "	ODU, POELZIG, SCHAROUN,	
" " "	" "	B. AND M. TAUT, STAM,	
" " "	" "	RADING, FRANK	

MISCELLANEOUS

CITY	BUILDING	ARCHITECT	REMARKS
CELLE	<i>School</i>	OTTO HAESLER	
"	<i>Siedlung</i>	OTTO HAESLER	

CITIES TO VISIT AND BUILDINGS TO SEE

WHERE ARE THESE MODERN BUILDINGS?



BAUHAUS SCHOOL, AT DESSAU, GERMANY, GROPIUS, ARCHITECT

employed as a building material. To date the Van Nelle Tobacco Co. has been very liberal in showing visiting architects over their plant but permission should be requested in advance in writing.

Upon leaving Holland the next district is the bordering country of the lower Rhine in which are the two cities of Dusseldorf and Cologne. Essen, containing several worth while examples of modern architecture, is also in this zone but, as it was not visited by the author, any attempt to advise the traveler what to see there falls outside the limit of this article. The examples of architecture listed in the two cities considered are largely brick and illustrate some interesting use of this material. The two office buildings, one in Dusseldorf, by Bonatz, and the other in Cologne, by Koerfer, are significant as early examples of "skyscraper" architecture in Europe. A day in each of these two cities should be sufficient and if the reader is pressed for time it is the opinion of the author that he would miss least by omitting this district altogether.

The third district is Berlin, its environs, and the city of Dessau, about two hours away by train. On the way to Berlin route your trip, if possible, through the town of Celle, near Hanover, and see the work of Otto Haesler which includes a school and the Georgsgarten Siedlung. Siedlung, by the way, is a German word with no exact English counterpart and is applied to all group housing. Most of the German siedlungs are composed of multiple dwellings and are usually located on the outskirts of cities. They comprise one of the most interesting developments in modern architecture in Germany since the war and show great study in group arrangement, apartment layout, and low cost of construction.

Berlin is obviously the headquarters during a tour of the third zone as all the things to be seen are within the greater metropolitan area, with the exception of Dessau. A trip to this city may be made as an interlude during the stay in Berlin or en route to Stuttgart. Only the better known architecture has been listed in



DEPARTMENT STORE, STUTTGART, GERMANY
MENDELSON, ARCHITECT



HOUSE AT STUTTGART-WEISSENHOF, GERMANY
LE CORBUSIER, ARCHITECT

Berlin as one is confronted by modern architecture on every hand. Wasmuth's architectural bookstore in the West End has prepared a very complete mimeographed list of modern buildings in and about the city and will give it gladly to any person who asks for it.

Do not try and rush your stay in Berlin; it cannot be done. You will need at least a week or ten days. See a few of the things in the city and then take a day off; roll your bathing suit in a towel, and go out to the Strandbad at Wannsee for a swim. The water will be refreshing and you will have an opportunity to see one of the finest public bathing establishments in Europe. Notice particularly the unique dressing locker arrangement for checking your clothes. Go inside the restaurants, cafés and cinemas listed, the interiors are often more interesting than the exteriors. Eat in one of the many restaurants of the Haus Gourmenia or in Kimpinsky's Haus Vaterland on the Potsdamer Platz. Walk up and down the Kurfurstendamm at night and notice the architectural use of exterior lighting on façades. Take a whole day for the outskirts on the south of Berlin to see the Britz Siedlung, the Tempelhof Siedlung and then spend the late afternoon at the flying field watching the planes arrive from Moscow and Paris. Allow at least half a day to go out to Zehlendorf and see the Siedlungs laid out among the pine trees.

During your stay in Berlin make the trip to Dessau to see the Bauhaus School and the two Siedlungs designed by Gropius. A trip through the school is well worth the time and the two Siedlungs offer an interesting contrast as the one near the school is composed of two-family houses while the other to the south of the city is very low-cost housing for workmen.

Stuttgart, the fourth and last district covered, not only contains some interesting modern buildings but deserves recognition for the impetus it recently gave modern architecture when it invited architects from different European countries to submit plans and supervise the erection of a group of small low-cost houses

known as the "Wissenhof Siedlung." Experimental in nature this group gives one a chance to compare at close range a variety of architectural styles and different uses of materials to solve a common problem. It is probably one of the most unique collections of architecture in Europe. One should have at least two days for Stuttgart as, in addition to the Weissenhof Siedlung, there are some interesting buildings in the city itself. Among these are the Schocken Department Store, by Mendelsohn, and the new Railway Station, by Paul Bonatz.

This article was purposely limited to a few cities in two countries and would be merely a starting point of a really comprehensive study of modern architecture in Europe. Anyone contemplating a trip should compile his own list as the interests of all persons vary. Ask your friends who have been over what they saw and liked; go through more recent files of the architectural magazines and from the pictures pick out buildings which appeal to you. Arrange a list for yourself. The author found it very convenient to group the things he wished to see on small cards by cities. He then routed his trip from a map to avoid doubling on his tracks and arranged his cards in the same order. The whole pack was then carried in his side pocket with the card of the moment on top and notes of new buildings discovered were entered on the backs of cards or on a few extra ones carried for the purpose.

Needless to say the time mentioned as required to see any given district is only the time needed to see the modern architecture. No account has been taken of museums, historical architecture, and historical monuments and the traveler will have to allow for these according to his taste. The trip can obviously be shortened by the omission of buildings or whole districts, but the author believes that if the traveler has his interest at all stimulated by what he sees he will find the list none too long and the allotted time far too short and so—bon voyage!



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MAP SHOWING ZONES OF TRAVEL

RAYNE ADAMS

1881—1931



RAYNE ADAMS

Rayne Adams died following an operation at the Beverly Hospital, April 6, 1931. He was but fifty years old, and in the full meridian of his powers. These powers were exercised in many different fields, for his interests were broad and his talents varied. He was architect, naturalist, sociologist, author and editor.

In the realm of Architecture he

filled many roles. He was known in New York as an outstanding draftsman and designer, working in many of the best offices during the twenty years of his life in that city. His work showed always discriminating taste, sound practical judgment, and technical skill. These traits are clearly evidenced in his own architectural work. The simple but extraordinary charm of his cottage at Annisquam is a witness to his ability to handle even the smallest problem with insight and imagination and a touch of genius.

Not only as architect and draftsman, but as a writer and critic, Rayne Adams made himself a place. His style was lucid and full of grace, with a vein of quiet and almost quaint humor. His criticisms were so sympathetic that they became appreciations, and yet without any sacrifice of discriminating judgment. At the time of his death he had prepared many articles for publication, one of which has already appeared posthumously.

Architect and architectural critic and writer, Rayne Adams still found opportunity to develop other sides of his gifted nature. His scholarly acquaintance with the entire field of sociology betrayed to his friends the depth of his interest in his fellowmen, and the keenness of his sympathies for human suffering and frustration. His work in this branch of human knowledge brought him into contact with many of the leading minds of his time.

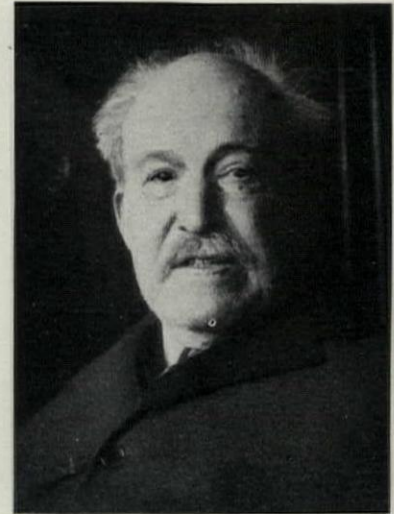
Nor was this all, for his interest in reading, in writing, and in the art of literature lead him into editorial excursions. An anthology of English poetry, and a book entitled *The Honest House* were among his ventures.

Architecture, literature, sociology—these are all intimately related, all grouped close together in the category of the Humanities, but they did not bound Rayne Adams' world, for his love of boundless nature was keen and unwavering, and he found in the beauty of the sea and the rocks and the forests a response that was no less than fellowship. His interest in trees was so profound that he spent many months of the last year of his life in the systematic study of trees adapted to New England conditions, and prepared a comprehensive book on this subject, which is soon to be published.

Here among us has been a man of broad interests, of quiet and simple habits, of warm sympathies, always a true and loyal friend. We mourn his loss.—William Roger Greeley.

MANLY N. CUTTER

1851—1931



MANLY N. CUTTER

Manly N. Cutter, who died at Hawthorne, New York on April 4th, 1931, nearing his eightieth year, closed a life of devotion to the cause of his profession, architecture. At his death, he was the oldest Fellow of the American Institute of Architects. The descendant of an old Puritan family, his education was in the schools of his native city,

Boston, and later in the architectural office there.

He came to New York as a young man looking for larger opportunities and entered the office of one of the leading architects of that day, the late Leopold Eidlitz. Here Mr. Cutter worked on the designs for the Capitol at Albany, on the Drydock Savings Institute, and many other of the problems that Mr. Eidlitz' busy office was called upon to solve. Later, after his marriage, he opened an office for himself and made some of the earliest plans for changes on West 23rd Street when that street lost its homelike character and became one of the most important of busy thoroughfares. He was called upon to design a number of the important private homes in West 59th Street—homes which in turn have had to give way to the march of commercial life.

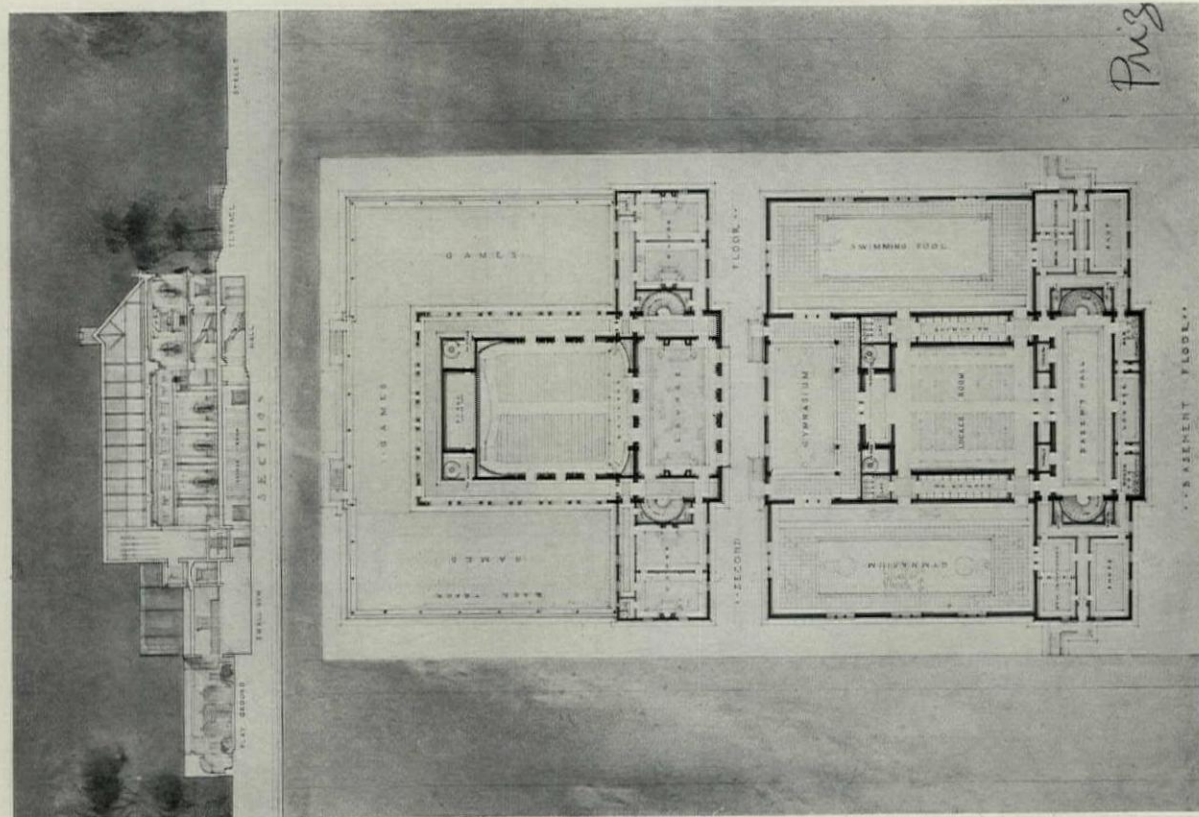
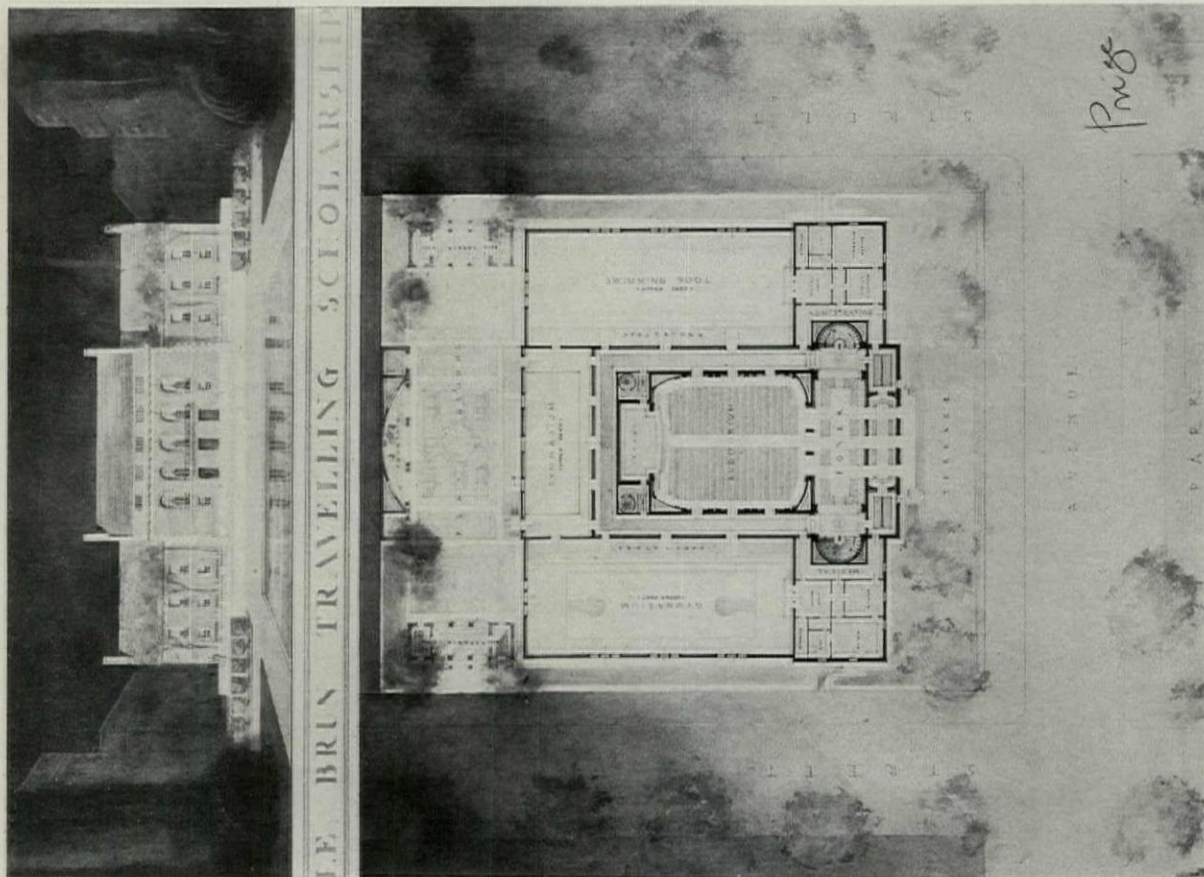
One of the very interesting commissions entrusted to Mr. Cutter was by the late banker, Henry G. Marquand, President of the Industrial Insurance, to create a great Japanese room in his mansion on Madison Avenue. Here for over two years craftsmen worked turning the room into a veritable museum of which Mr. Marquand was the proud owner.

In mid-life ill health caused Mr. Cutter to leave the city in search of a restoration, which was only promised on his going back to nature for a cure. So for over two years he laid aside his drawing instruments and went into the wilds.

When nature reasserted itself he went into the Canadian northwest and became the architect for many of the leading Roman Catholic churches, bringing to their execution his knowledge of the use of cement and his engineering training. Some of these buildings still rank as outstanding examples, notably the Roman Catholic church at Medicine Hat, of how such materials can in the hands of a trained architectural man cover great spaces at the minimum of cost and the maximum of structural beauty. Returning to the States Mr. Cutter went to North Carolina, forming there a partnership which only failed when the World War stopped most of the architectural work of the country.

After the war he came back to New York and worked in many New York offices as an able assistant, until the germ

(Continued on page 392)



PRIZE WINNING DESIGN FOR "A WORKING BOYS' CLUB," BY BRUNO JOHN BASIL
COMPETITION FOR THE LE BRUN TRAVELLING SCHOLARSHIP FOR 1931



PERSPECTIVE OF PRIZE WINNING DESIGN BY BRUNO JOHN BASIL

Le Brun Competition for 1931

The Problem and Report of the Jury of Award

Bruno John Basil of Brooklyn, N. Y., has been awarded the Le Brun Traveling Scholarship of \$1,400 for 1931 by the New York Chapter of the American Institute of Architects for the best design for *A Working Boys' Club*.

The award is made annually to promote the artistic, scientific, and practical efficiency of the architectural profession.

First honorable mention went to Carl Bertel Lund of New York; second to Ralph Aubrey Jeffers, Elkton, Md.; third to Simon Breines, Brooklyn, and fourth to George Daub, Forest Hills, L. I.

The Committee, desiring to follow the intent of the "Deed of Gift" by presenting a practical problem and one which comes under the observation of many communities in various parts of the United States, presented the following problem:

A WORKING BOYS' CLUB—In a large industrial center, it is proposed to build a clubhouse to serve as a recreation and educational center for working boys and young men.

The site is a lot, practically level, measuring 200' by 250'. The 200' faces south on a city park. On the east and west the lot is bounded by narrow side streets. The fourth or north side abuts on existing buildings.

The building is to contain:

A swimming pool at least 75' long, with showers, room for swimming director and seats for spectators at meets.

An auditorium seating 400, with level floor, a stage four feet high and equipment for theatricals.

One main gymnasium at least 70' long and one smaller

gymnasium about 50' long, with lockers and rooms for physical director and assistants. There should also be space for seating 100 spectators in a gallery or otherwise.

The swimming pool room, the auditorium, and the gymnasium should be at least 20' high from floor to ceiling.

A roof playground as large as possible, with cage enclosure, should be provided.

A lounge or library to contain 1,000 books, with table for magazines, a fireplace, etc., should be located near the main entrance.

Two or three rooms for clinics and doctor's office.

Six individual clubrooms and shops, each about 500 sq. ft. in area.

A director's office, an assistant director's office and a superintendent's room should be so arranged that the superintendent can control the entrance and exit of the building from his office.

Two staircases are necessary, but no elevators.

The necessary lavatories—services, etc.

No sleeping quarters are to be provided.

Within the lot limits shall be provided a playground measuring about 1000 sq. ft. for younger children, with shelters or loggias for protection from sun and showers.

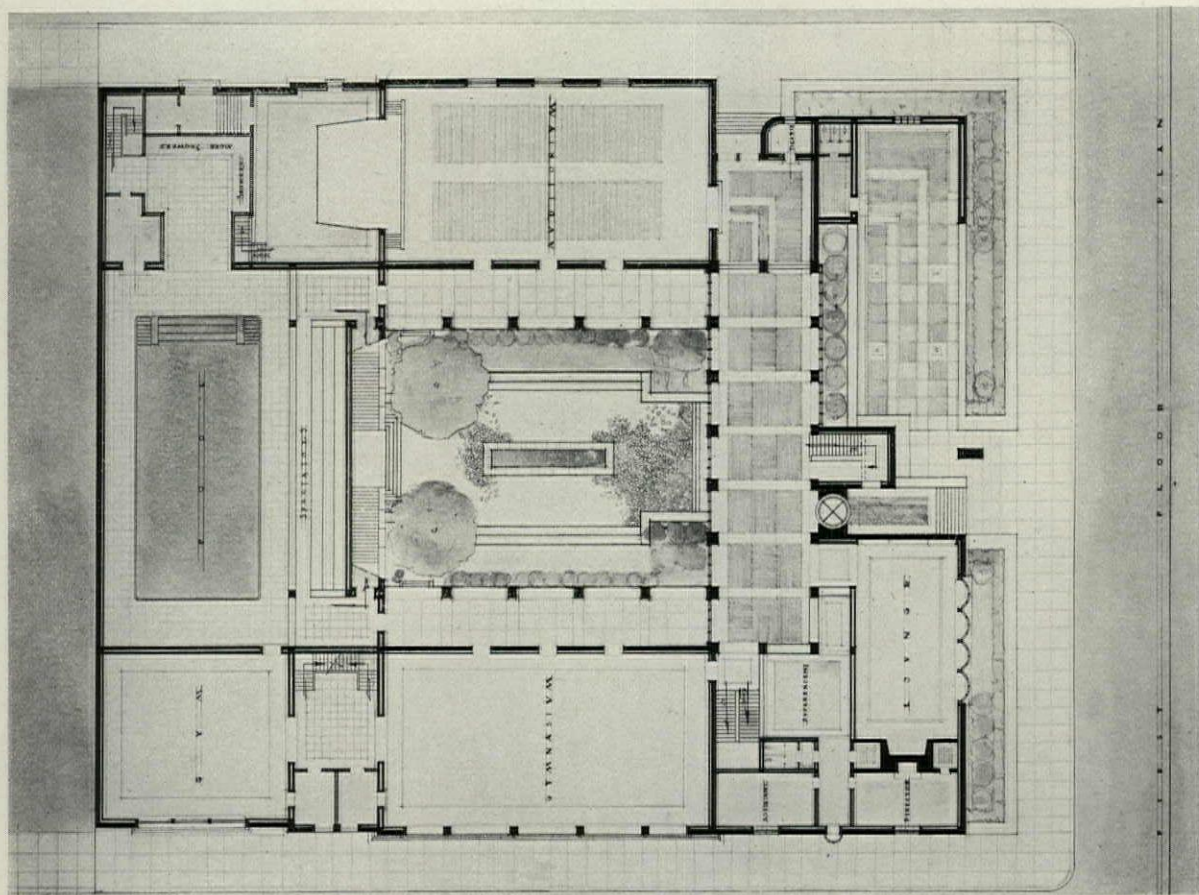
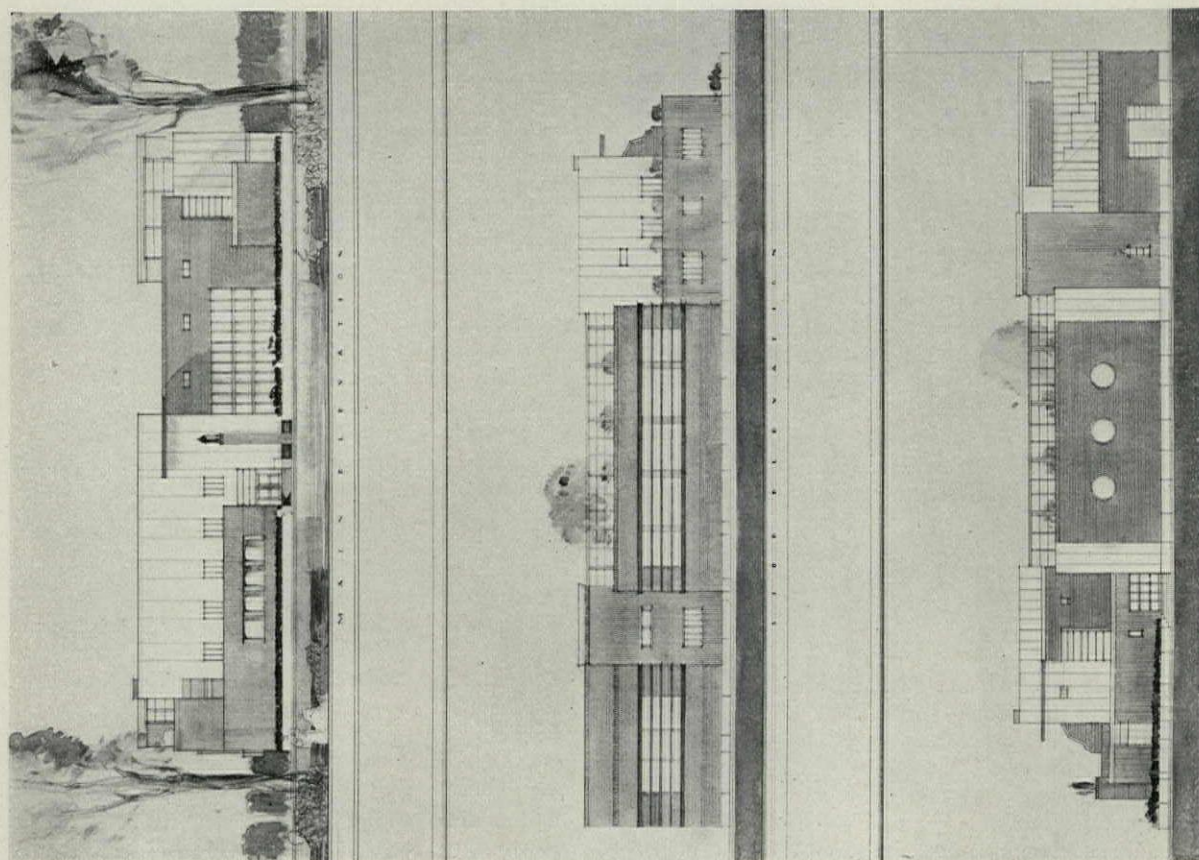
The building should be three or four stories high, with mezzanines if desired, and should be built of brick or brick and stone. Its character should be simple, but cheerful and inviting in appearance.

REPORT OF THE JURY OF AWARD

The prize is awarded to the scheme marked No. 5, because as a whole it shows more general merit than the

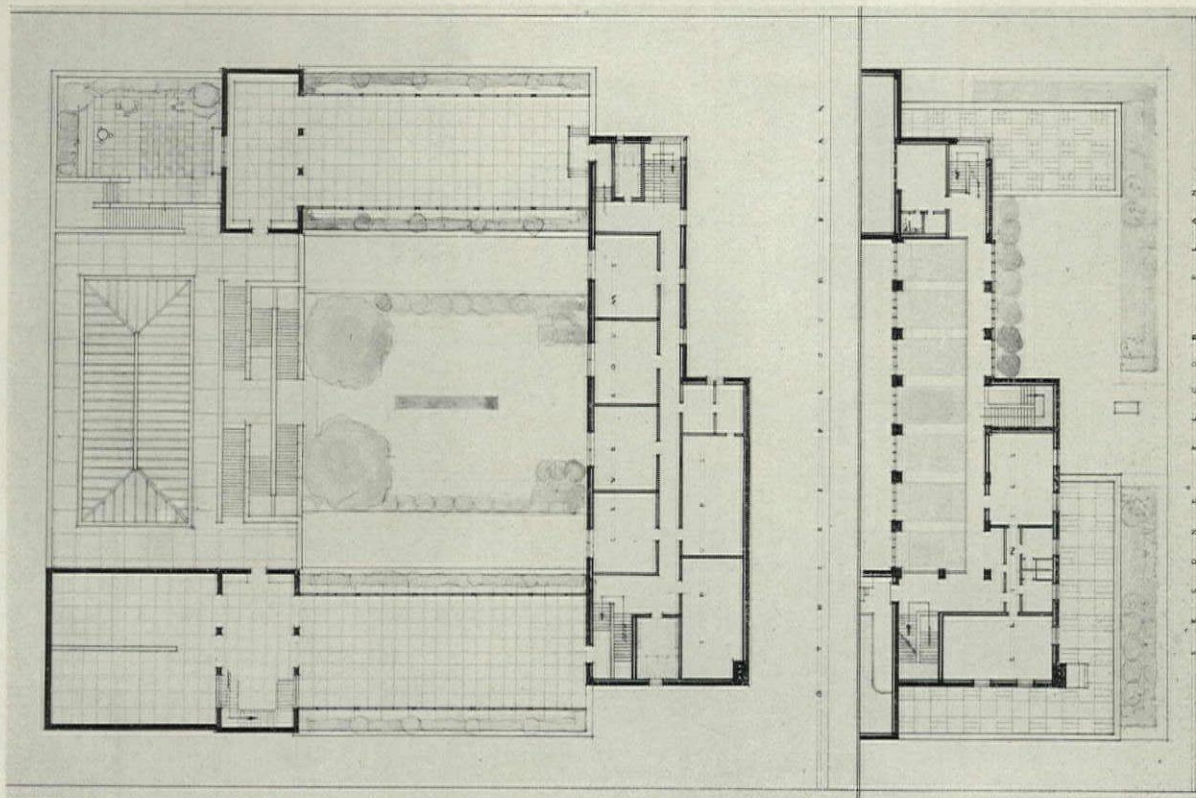
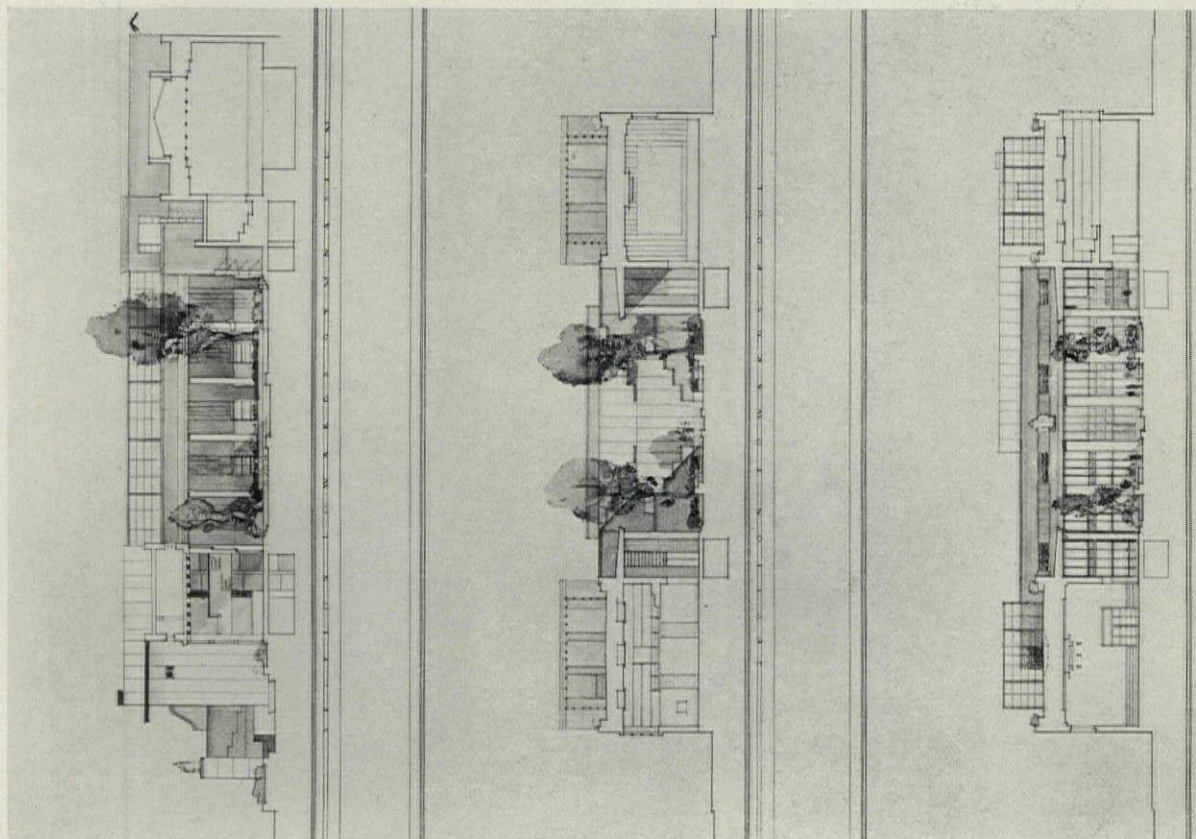
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PENCIL POINTS FOR MAY, 1931

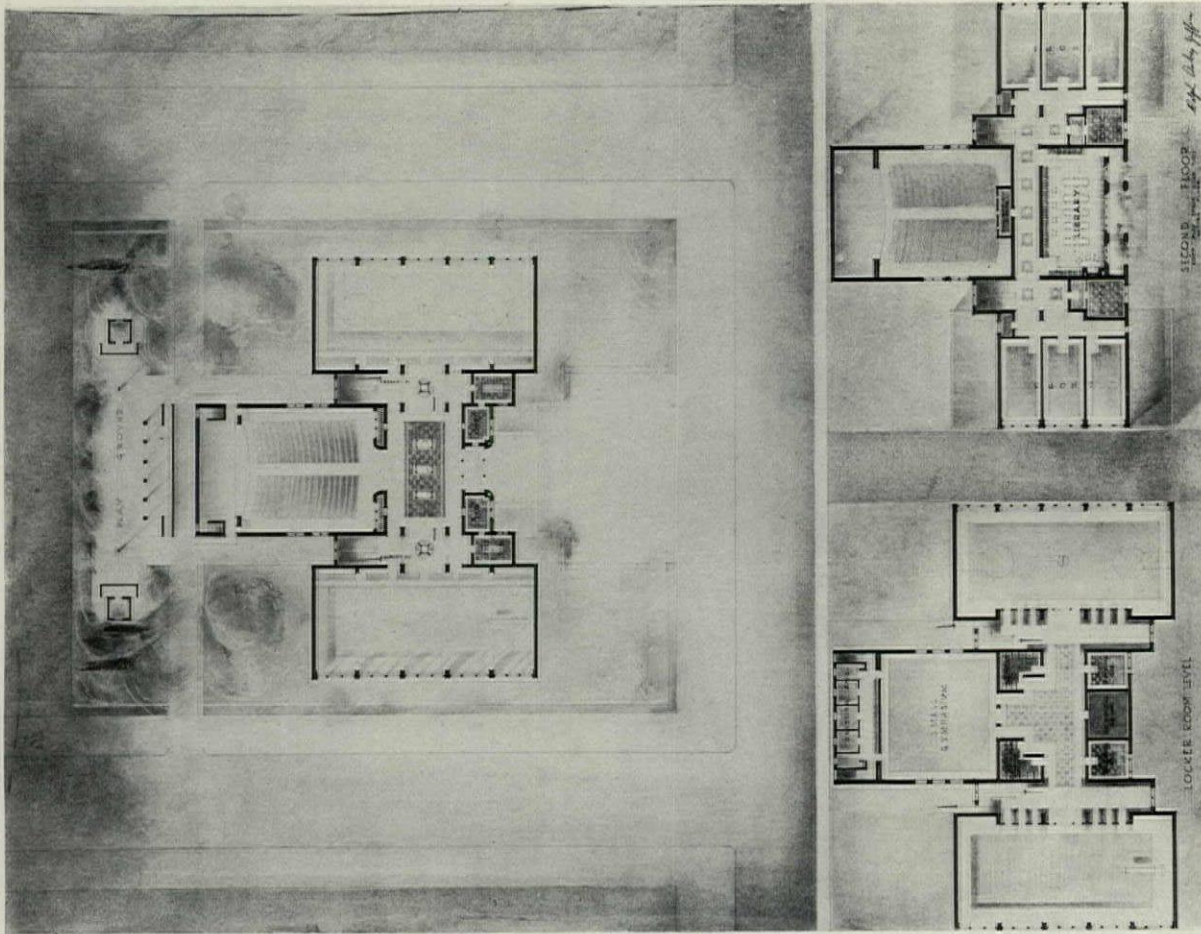
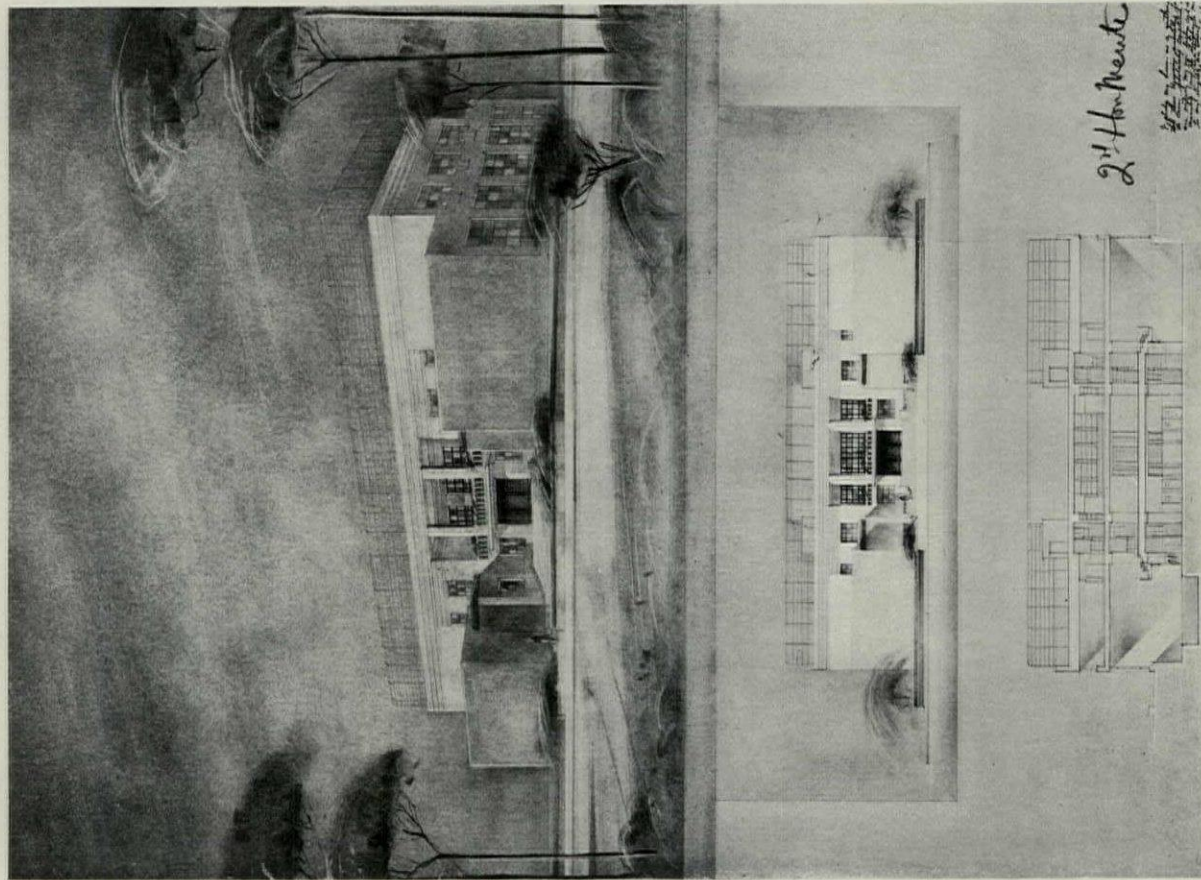


FIRST MENTION DESIGN FOR "A WORKING BOYS' CLUB," BY CARL BERTEL LUND
COMPETITION FOR THE LE BRUN TRAVELING SCHOLARSHIP FOR 1931

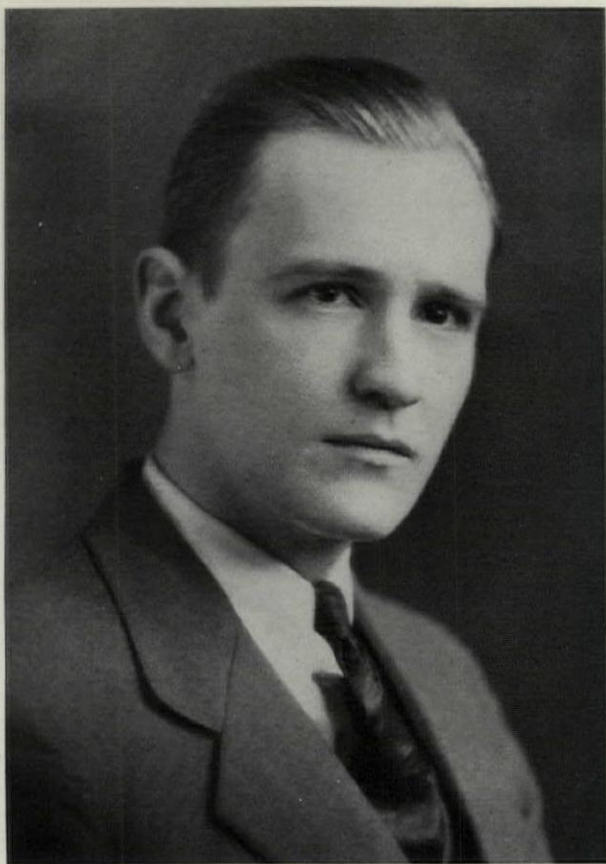
PENCIL POINTS FOR MAY, 1931



FIRST MENTION DESIGN FOR "A WORKING BOYS' CLUB," BY CARL BERTEL LUND
 COMPETITION FOR THE LE BRUN TRAVELING SCHOLARSHIP FOR 1931



SECOND MENTION DESIGN FOR "A WORKING BOYS' CLUB," BY RALPH AUBREY JEFFERS
COMPETITION FOR THE LE BRUN TRAVELING SCHOLARSHIP FOR 1931



BRUNO JOHN BASIL

Bruno John Basil, or Jack Basil, as he is known to his friends, the winner of the Le Brun Traveling Scholarship for 1931, was born in Trieste, Austria, in 1904. He came to the United States and went to grammar school in Newport News, Virginia, later attending high school in Brooklyn, after which he went to Dwight Preparatory School. He entered Yale in 1926 and graduated with a B. F. A. in 1930.

During his attendance at evening high school he worked four years in the offices of Hoggson Brothers and before entering Yale he was employed by John Russell Pope and Eric Kebbon. Since his graduation from Yale Mr. Basil has been in the office of Cass Gilbert in New York. Mr. Basil wishes to thank Parker Morse Hooper, George Mathews, and Andrew Euston for their encouragement and assistance during his student days.

Mr. Basil will sail on the 21st of this month with the group of Beaux-Arts architects that are going to Paris to present a flagpole and base to the Ecole des Beaux Arts. He intends to make a great many sketches and water colors while abroad on the scholarship.

LE BRUN TRAVELING SCHOLARSHIP FOR 1931

(Continued on page 381)

others, both in the distribution and working out of the plan, and in the appropriate character of the elevation, its friendly and inviting quality forming an agreeable contrast to the probable factory surroundings. The clear separation between the parts of the building used by the boys and those used by visitors is well managed. Especially to be commended is the treatment of the playground behind the building and its relation to the building itself. The scheme as a whole has unity and a sense of order and fitness.

No. 43, receiving First Honorable Mention, shows imagination and ingenuity. The easy access to the roof playgrounds and the attractive character of the interior court are excellent features, but the elevation is restless.

No. 31, receiving Second Honorable Mention, has the main rooms well distributed, with the means of access for the users of the club and for visitors clearly distinguished, and the circulation admirably concentrated. The elevation, however, seems lacking in a sense of organization; it does not hang together or express the construction.

No. 11, receiving Third Honorable Mention, has a good arrangement of plan and especially of access to the building. The elevation is uncertain in scale.

No. 15, receiving Fourth Honorable Mention, although it shows some ability in the arrangement of parts, in the full utilization of the roof and of the southern exposure, has a mechanical character and lacks the qualities which would make the building a pleasant refuge from the workers' usual environment.

Respectfully submitted,

LE BRUN TRAVELING SCHOLARSHIP COMMITTEE

Jury { CHESTER H. ALDRICH, *Chairman*
ERIC GUGLER
FREDERIC R. KING
OLIVER REAGAN

THE NEW YORK ARCHITECTURAL CLUB, INC.

TENNIS TOURNAMENT

The New York Architectural Club announces its seventh annual Tennis Tournament. All men in the employ of architects, students of architecture, and allied arts men are eligible to compete. The entry fee is \$3.00 per man in the singles tournament with the privilege of playing in the consolation if losing the first round match, and the further privilege of playing in the doubles.

The winner of the singles tournament holds the William Adams Delano Trophy for one year. Other cups and medals will be given to the finalists and semi-finalists depending on the number of entries received and the success of the tournament.

The tournament is to open the first week in June and finals will be held the latter part of August on the estate of William Adams Delano at Syosset. Mr. Delano extends an invitation to all those connected with architecture and interested in the finals to visit his estate and enjoy its gardens and swimming pool.

The Tennis Committee expects to arrange for an exhibition match with a quartet of ranking tennis players to be announced later.

Entry fees are now being received by Henry M. Barone, c/o New York Architectural Club, 118 East 42nd St., New York. Send your entry fee with your name and address; and name, address and telephone number of employer. The success of this tournament depends on your willingness to cooperate.

NEW YORK ARCHITECTURAL BASEBALL CLUB

The New York Architectural Baseball Club of New York City has organized for the season of 1931 and is desirous of booking games with fast teams, paying a suitable guarantee, anywhere within a radius of one hundred miles from New York City.

Kindly mail all letters to M. L. J. Scheffer, Manager, The New York Architectural Club, Inc., Baseball Team, 2 West 46th Street, 12th floor, New York, N. Y.



HENRY IVES COBB

1859—1931

Henry Ives Cobb died at his home in New York on March 27th at the age of 71. Mr. Cobb was born in Brookline, Mass., on August 19, 1859, the son of Albert A. Cobb and Mary Russell Candler Cobb. He attended the Massachusetts Institute of Technology and in 1881 was graduated from Harvard with a B. S. degree.

Within a few years after his graduation he went to Chicago, where he first attracted wide attention as an expert on steel construction. In 1889 he designed the Owings Building in Chicago, one of the first buildings of its kind constructed in this country. He lived in Chicago for seven years and leaves a number of monuments there in the shape of the Chicago Opera House, the Chicago Athletic Club, the Newberry Library, the Church of the Atonement and the University of Chicago.

Mr. Cobb moved to New York in 1902 after several years' residence in Washington. New York had been his home since that time and here he designed the Sinclair Oil Building, the Harriman Bank Building, the building at 42 Broadway and many other structures. He was the designer of the World's Fair held in Chicago in 1893, and also designed the American University at Washington as well as many Christian Science churches and private residences in various parts of the country. He was known as a pioneer in the use of steel for building construction.

Mr. Cobb was for a number of years an active student of the problems of arbitration and was a member of the first board of managers of the Arbitration Society of America. At his death he was a director of the American Arbitration Association, which was founded only five years ago. He was for many years an active member of the Merchants Association of New York City and from 1924 to 1928 was its vice-president.

Mr. Cobb is survived by his wife, and by seven children: Henry Ives Cobb, Jr., who is an architect; Cleveland Cobb, Candler Cobb, Elliot Cobb, and Boughton Cobb, all of New York; Russell Cobb of Tulsa and Mrs. Leonore Cobb Amory of Boston.

A LETTER FROM LOUIS LEONARD, A.I.A.,
OF CLEVELAND, OHIO

Your article in the March number, entitled 'Random Thoughts on Modernism; Have We Abandoned the Quest for Beauty or is Architecture Still a Fine Art?', has been read.

"The newspaper report from Paris you have quoted is not complete. Why such methods? Are you trying to prove a case by quoting only the side favorable to your point of view? The remainder of the quotation which you left out said that the sensible modern art articles have been retained but the freakish types had been eliminated. Quite another idea when one reads your article.

"Now the imaginative, creative French mind will overdo an idea, exaggerate an idea. That is what has happened but the French people are logical and know when they have been imposed upon; result—the exaggerated side of modernism has been stopped.

"Now this modernism is no whim. It is late arriving, has a serious base and you are now seeing just a beginning.

"America does not understand modernism in architecture. We have been copyists, adapters, always taking the shortest road without using reason and logic in our search for American architecture. Clear thinking was never a quality of the American architect. We have everything necessary to make American architecture except architects.

"We adopted all the externals of French, Italian, Roman, and Greek architecture without knowledge of the principles of architecture.

"You will never see an about face in design and a return to the copying of traditional models. The man in the street now begins to criticize art as he never did before. He sees through the tricks that have been played. Architecture was a conundrum to him before but not so much now. He has begun to understand the meaning of sincerity in architecture.

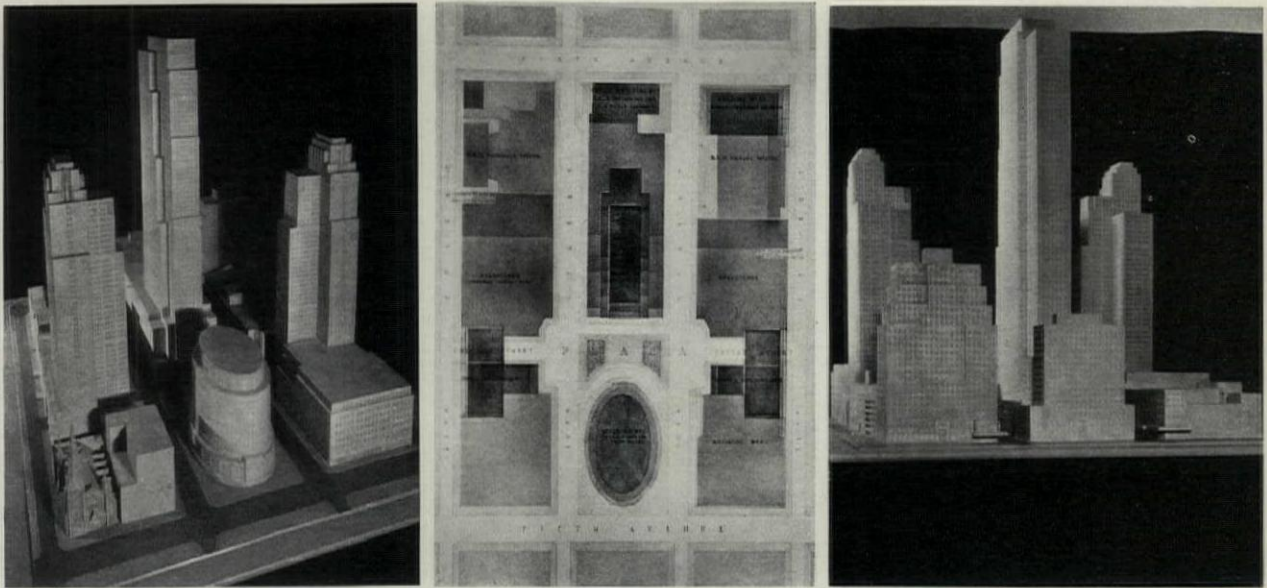
"Functionalism is basic in all good architecture today and before. Don't try to eliminate that side of architecture. No beauty is possible without it as a beginning. Form will take its place as a part afterwards; then we can look for real beauty. There is no fixed form of beauty as the traditionalists would have us believe.

"Things that are functional first can have a chance to be beautiful, not otherwise. 'Where there is life there is beauty,' as Rodin has well said. A body that is dead and does not function cannot be classed as beautiful. We put it where it belongs and nature does the rest.

"If the architects in America had followed Louis Sullivan or Lloyd Wright, that is, solving the problem from the functional point of view as a starter, instead of adapting everything from Europe, and had a true knowledge of the principles of architecture which few seem to have, not even now, we might have had an American architecture by this time. Let the American architectural schools teach real architecture, fitting American conditions with American methods, not European school architecture, eliminate the superficial traditional methods, then we can start something.

"It is much more difficult to produce modern architecture because we cannot lean on the old books of old examples. The old examples can teach principles but not forms. We have to use our art intelligence now. Materials and wants have changed.

"Meet them or confess that we have no art intelligence."



PLAN AND TWO VIEWS OF MODEL OF DESIGN FOR RADIO CITY, FIFTH AVENUE, NEW YORK

*Reinhard & Hofmeister, Architects—Raymond Hood, Godley & Fouillhoux
and Corbett, Harrison & McMurray, Advisory Architects.*

The three illustrations above show, in a general way, one of the preliminary stages in the design of Radio City, the huge Rockefeller project which is to occupy the greater part of three city blocks between Fifth and Sixth Avenues from Forty-eighth to Fifty-first Streets, New York. Publication of these and other views of the model in the New York newspapers started something, for the *Times* and *Herald-Tribune* immediately criticised the designs editorially and subsequently printed many condemnatory letters sent to them by both architects and laymen. The whole thing aroused the public as no other architectural undertaking has ever done and gave New Yorkers last month a subject for controversial conversation lasting far beyond the conventional nine days of newspaper publicity. While lack of space does not permit the publication of much of the public debate there were a few of the letters which deserve to be printed here. The following, by Percival Goodman, New York architect and Paris Prize winner, was published in the *Herald-Tribune* of April 8.

"Amid the tremendous bludgeoning being given Radio City the onlooker stands with amazement writ large—he can only feel that it is all too silly, too unjustified.

"As Architect Corbett says, 'Mr. Rockefeller is not building a monument.' As Architect Hood says, 'Utility was the prime consideration.'

"As Architect Reinhard says, 'It's a money-making proposition.'

"These men are among the eight architects executing this work; they ought to know.

"Radio City was not designed for beauty. Radio City was designed to make money. There is a difference. Radio City is inspired by the same motive that has inspired all other buildings in New York, save the monuments and museums; therefore Radio City, when built, will look like the New York that surrounds it.

"The architects are in no way blameworthy for a solution that lacks beauty and integrity. Money making is not the bedfellow of aesthetics and ethics—that's why New York is such a mess.

"It is called to the attention of Radio City's detractors that architecture is a social art representative of its time

and culture. Any criticism of this effort is a criticism of our time, our culture and our motives; hence, if Radio City is disliked the reason lies deeper rooted than perhaps we are willing to admit."

The next letter, signed "J.E.," was in the *Herald-Tribune* for April 7, and the anonymous writer thereof offers a defence for Mr. Rockefeller against his legion of critics.

"The Radio City designs having received so much criticism recently because of their rigid insistence upon an engineering solution of the problem and their especially emphatic rejection of the idea that any beauty can be arrived at without a proportional sacrifice of practical results, it may be interesting to know the steps by which the appointment of the men in charge of this work was made. This is particularly so as they have themselves maintained a dignified silence, making no reply.

"To read the criticisms one might assume that Mr. Rockefeller had selected his architects at random. Yet, it seems that this is far from being the case. On the contrary, he invited a dozen of the firms whom he considered most prominent in the building of the city's representative structures to submit their ideas to a jury consisting of a number of the most competent architects available. And it was only on the recommendations of this report that he selected from among those thus honored the firm of Reinhard & Hofmeister to take command of the whole development. These names should in themselves disarm criticism.

"Yet to this firm were added Corbett, Harrison & McMurray, Raymond Hood, and Godley & Fouillhoux, who are acting, it seems, in advisory capacity.

"What more could Mr. Rockefeller have done? Certainly his defence, if he needs one, would merely consist in an exhibition of the drawings, inferior to those of Reinhard & Hofmeister, obtained by him for consideration and the publication of the report of the distinguished jury recommending his award.

"In a recent article in a technical publication, entitled 'The New Idea in City Rebuilding,' a description of the tower explains that:

(Continued on page 392)

DETROIT ARCHITECTURAL BOWLING LEAGUE

FINAL STANDINGS

	W.	L.
Albert Kahn, Inc.	52	29
Donaldson & Meier	50	31
Malcomson & Higginbotham & Trout	49	32
Robert O. Derrick, Inc.	48	33
McGrath & Dohmen	44	37
Smith, Hinchman & Grylls	37	44
Hubbard & Wagschal	36	45
Louis Kamper, Inc.	33	48
Weston & Ellington	33	48
Giffels & Vallet	23	58

Individual High—1 game—Bradshaw (AK)	—268
3 games—N. Krecke (H. W.)	—688
Team High—1 game—Donaldson & Meier	—1066
3 games—Donaldson & Meier	—3021

WESTCHESTER COUNTY SOCIETY OF ARCHITECTS

At the Annual Meeting of the Westchester County Society of Architects the following were elected: Howard B. Peare, President; William H. Jones, Vice-President; William C. Halbert, Jr., Secretary; George H. Gilbert, Treasurer. Directors: Charles A. Dewey, E. Dean Parmelee, and H. Lansing Quick.

The first exhibition of the Society will be held in conjunction with the Westchester County Home Show at the County Center in White Plains, May 3 to 10, inclusive. As we go to press the Committee on Architecture and Allied Arts, of which Louis Levine is chairman, is hard at work in representing the Society's participation in this show.

ARCHITECTURAL SKETCH CLUB OF CHICAGO
31ST ANNUAL

FOREIGN TRAVEL SCHOLARSHIP

To encourage and foster architectural education among the young men of the profession, Mr. William K. Fellows, F.A.I.A., of the architectural firm of Hamilton, Fellows and Nedved, 814 Tower Court, Chicago, has donated the sum of \$1,200.00 to be awarded to a deserving and meritorious architect, architectural draftsman or student, to aid him in paying the expenses of a European trip.

Mr. Fellows received his degree at Columbia University, where he won first mention for the McKim Scholarship, and the Schermerhorn Fellowship, which gave him eighteen months of travel and study in Europe. Part of this time was spent at the American Academy at Rome.

He was Instructor of Design at the Chicago School of Architecture for six years and was President of the Architectural Sketch Club for two years.

Mr. Fellows is giving this Scholarship to the members of the Architectural Sketch Club and to the graduates of the Chicago School of Architecture because of his interest in and long association with these institutions, and in recognition of the great benefit he derived from a like period of European study and travel.

The selection of the beneficiary of the Scholarship is to be by means of a competition now being held and the drawings called for are to be submitted for examination and judgment to a jury consisting of at least three practicing architects.

The program for this competition was prepared by a

Committee composed of George M. Nedved, Architect, Chairman, Louis Pirola, Architect, and Edmund J. Ryan, Architect.

The final drawings are due on May 31st, and the winning design will be published in the July PENCIL POINTS.

RADIATOR GRILLE COMPETITION

The program of the Competition for the Design of a Radiator Grille was published in the December issue of PENCIL POINTS. The first four prize winning designs are published in this issue on pages 390 and 391. The program of the competition, which was sponsored by the Harrington & King Perforating Company of Chicago, was prepared by the Architectural Sketch Club of Chicago, which sponsored the Competition.

REPORT OF THE JURY OF AWARDS

We the undersigned Jurors have the honor to present the findings of the Jury relative to the *Prize Competition for Radiator Grille*, sponsored by the Harrington & King Perforating Co., Chicago, Illinois, and so stated by the Program Committee:

First Prize—\$300.00—George H. Recher, Chicago. This design being commendable and meeting the requirements for a radiator grille. It allows for variations and presents a thought in using different metals and construction that may be expected in grilles of special design. The design is an interesting variation and does not become monotonous. The presentation is also commended.

Second Prize—\$150.00—Alexis V. Lapteff, Detroit, Michigan. This presented an interesting treatment. While not important enough for end of a lobby, the idea of using figures and symbols is a very good one and may be developed in work requiring symbolic motives. The presentation is commended.

Third Prize—\$75.00—Miss Ruth A. Dean, Boston, Mass. This was selected as presenting further ideas in getting away from symmetrical geometric design using plant motives. While somewhat open, the addition of a third diagonal would help to enclose the radiator space. The presentation is commended.

Fourth Prize—\$50.00—G. H. Wardner, Jr., Boston, Mass. This design while not new has possibilities which presents itself as of combining different geometric forms. This is a very simple motive and presents an idea which may be carried out when such a motive may be required for flush radiator grilles.

Fifth Prize—\$25.00—Bernard Rogge, Baltimore, Md. The design of the field presents a very interesting motive which with some modification for manufacturing may be used in grilles of lesser importance where a horizontal movement is desired. The design of the center panel is entirely out of keeping with the balance of the grille.

The competition on the whole presented a wide variation of interesting designs. A few showed lack of understanding of material they were working with.

The competition brought together many ideas that the architect and designers have been working on or thinking about in keeping with requirements of the age.

Respectfully submitted,

Jury of Awards { F. L. VENNING, *Chairman*
N. MAX DUNNING
PHILIP MAHER
DAVID W. CARLSON
J. M. FULLER

ARCHITECTURAL LEAGUE OF NEW YORK AWARDS MEDALS

Announcement of the annual awards of the Architectural League of New York was made on April 21st at the Architectural and Allied Arts Exposition, held last month at the Grand Central Palace in New York. William F. Lamb, of the firm of Shreve, Lamb & Harmon, was awarded a gold medal of honor "for the masterful treatment of an office building as exemplified by the Empire State." Eliel Saarinen also won a gold medal "for the distinguished quality of his work in the Cranbrook Foundation" at Cranbrook, Michigan. This is the second time in its history that the League has awarded two gold medals simultaneously.

The silver medal went to Peabody, Wilson & Brown for a group of residences.

The medal of honor in sculpture was won by Lee Lawrie of New York.

The Birch Burdette Long Memorial Prize for distinguished rendering was awarded to Schell Lewis "for the excellent quality of his pencil renderings," shown at the exposition.

No gold medal in landscape architecture was awarded this year.

The medals were presented at the dinner of the Architectural League at the Hotel Roosevelt on April 24th.

The jury on medals of honor in architecture, decorative painting, sculpture and landscape architecture consisted of Raymond M. Hood, ex-officio chairman; Herbert Adams, Louis Ayres, Harold Hill Blossom, A. F. Brinckerhoff, Arthur Covey, Ruth Dean, William Adams Delano, Ulric H. Ellerhusen, Ernest Peixotto, Barry Faulkner, Ely J. Kahn, and John W. Root.

BRIDGE DESIGN COMPETITION FOR 1931

Out of 138 students of engineering and architecture who submitted preliminary drawings in the 1931 bridge design competition held by the American Institute of Steel Construction, ten engineering and ten architectural students have been selected to complete their designs and submit finished renderings for final judgment. Students in 30 institutions in 19 States and Provinces in the United States and Canada participated in the preliminary competition, judged on April 2 by a jury consisting of Dr. Ralph Modjeski, Consulting Engineer; Dr. Shortridge Hardesty, Consulting Engineer; H. H. Murdock, Architect; Clinton Mackenzie, Architect, and F. E. Schmitt, Editor of *Engineering News-Record*.

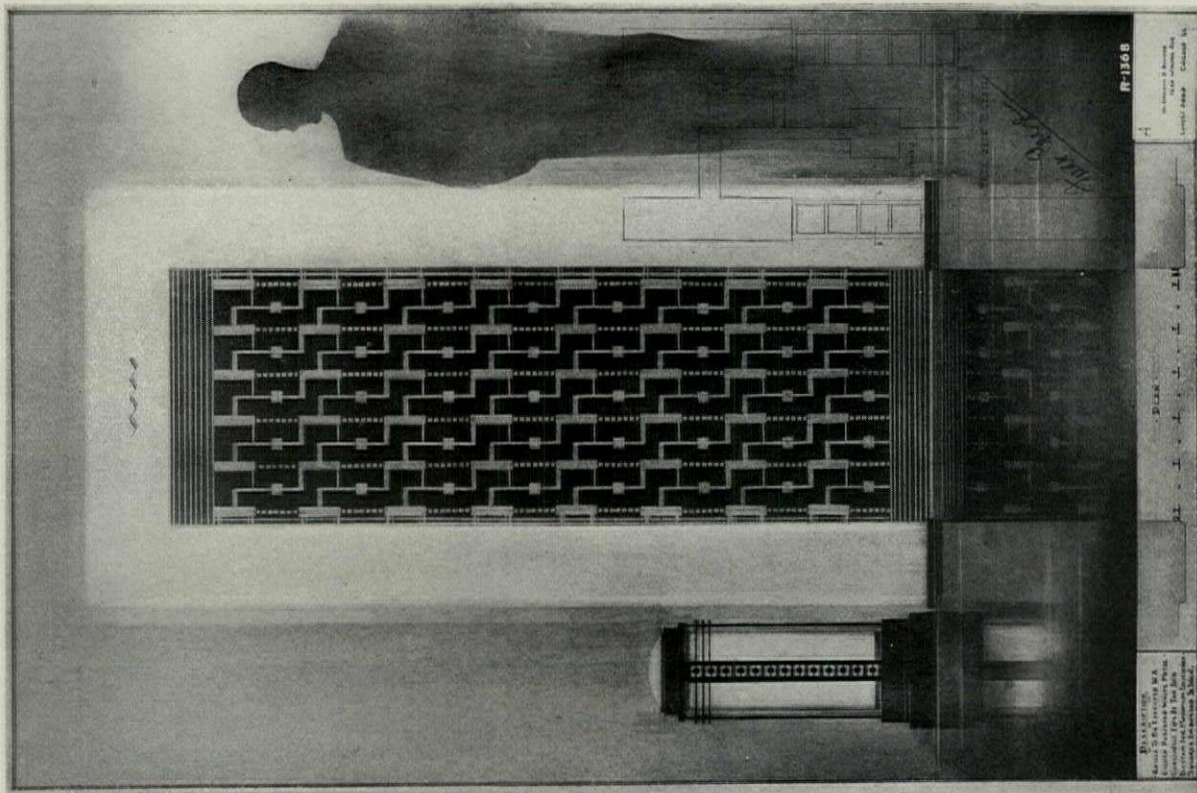
The ten engineering and ten architectural students selected to submit finished drawings will compete for three cash money prizes in each division. The first is \$500, second \$250, and third \$100.

The ten engineering students selected to compete are: J. B. Striowski of University of Manitoba; A. Lyall House of Montana State College; Covert Robertson, Jr., of University of Michigan; C. J. Robin of Armour Institute of Technology; E. A. Johnson of Armour Institute of Technology; C. B. Voldrich of Purdue University; R. M. Morris, Robert B. Kleinschmidt both of University of Pennsylvania; Jeremiah C. Iandolo of University of Pennsylvania; and D. E. McLeod of Lafayette College.

The ten architectural students selected to compete are: R. F. Weber of Atelier Adams Nelson, Chicago; Harry Burge of University of Southern California; R. O. Deeter of University of Illinois; A. C. Sachtleben of University of Illinois; W. A. Ganster of University of Illinois; J. L. Bennett of University of Illinois; L. E. McCullough of Iowa State College; G. E. Crippen; A. L. Johnston of Iowa State College, and L. W. Casey of Iowa State College.



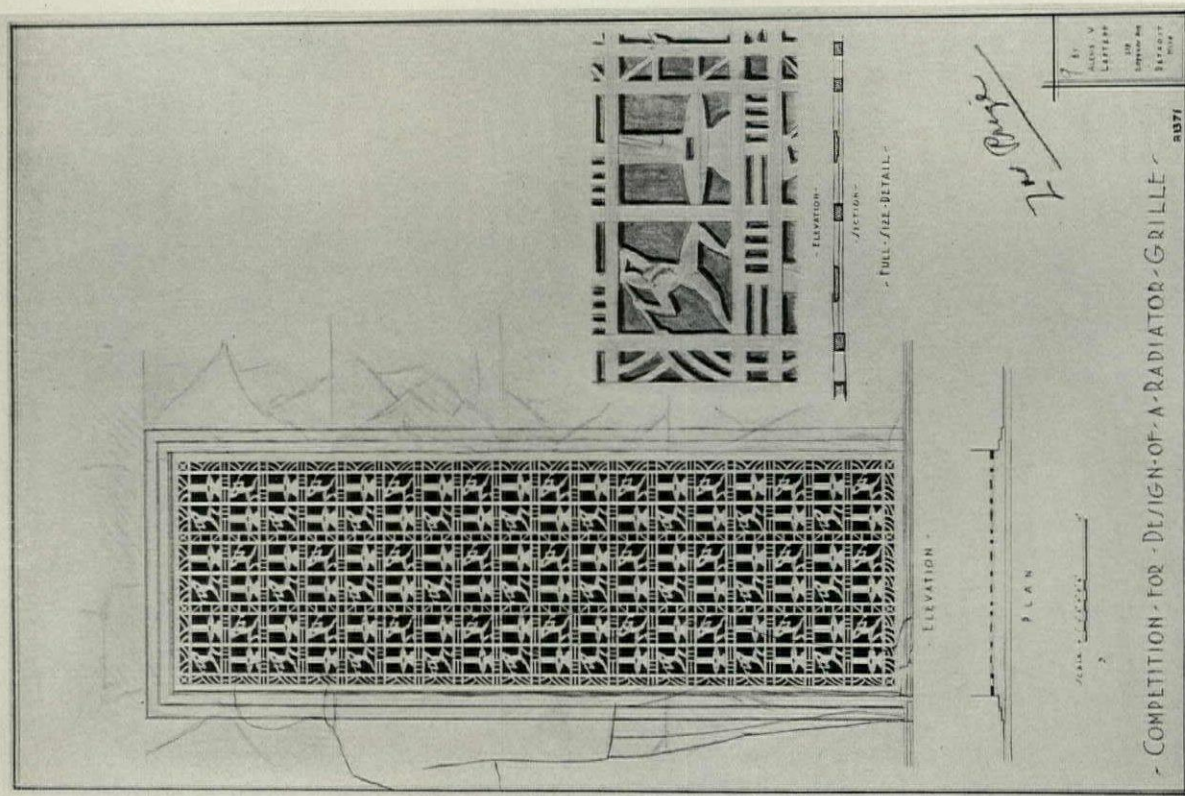
MEMBERS OF THE MELBOURNE, AUSTRALIA, UNIVERSITY ARCHITECTURAL ATELIER AT WORK



FIRST PRIZE DESIGN BY GEORGE H. RECHER

COMPETITION FOR THE DESIGN OF A RADIATOR GRILLE

See text on page 388.



SECOND PRIZE DESIGN BY ALEXIS V. LAPTEFF

COMPETITION FOR DESIGN OF A RADIATOR GRILLE

RADIO CITY

(Continued from page 387)

"Problems of windbracing, economic framing and anchorage are considerably less complicated by reason of such a plan, and, conceived from the first stages of its development purely as a functional integer which will achieve æsthetic distinction through the expression of its nature, it marks another milestone in the process of abandoning accepted formulas of architectural design."

"Why harp upon the unfortunate remarks with which Mr. Hood and Mr. Corbett have come to the defence of their principles? Mr. Rockefeller took the most elaborate precautions to arrive at the best. The selection of Messrs. Reinhard & Hofmeister is the result. They have achieved a scheme composed of units, each a functional integer of æsthetic distinction; these mark a milestone in the abandonment of accepted formulas of architectural design."

"Could the result be bettered? Can the city ask of these conspicuous buildings that they present symmetrical masses balanced in a composition which shall give pleasure to an æsthetic appreciation developed in the study of the best buildings, the best groups, of the world's architecture?"

"Evidently not. For by a procedure which cannot be bettered Mr. Rockefeller has arrived at the selection of Reinhard & Hofmeister and they, ably assisted, have produced this result. It is hardly fair to criticise one who so conscientiously and painstakingly has thus approached this great work. The carrying charges on the property alone would have caused a lesser man to drive his architects. Yet they have been urged to make the most elaborate studies without regard to time or cost."

"It is for the city and the public to cease criticism and to study rather to appreciate this noble experiment in functional integers, relying on Mr. Rockefeller's continued good judgment to see that the whole will achieve an æsthetic distinction never heretofore attained in architectural design."

It is understood that the designs that appeared in the newspapers have subsequently been somewhat changed. If any revised models or drawings are released for publication they will be shown in a later issue.

MANLY N. CUTTER

(Continued from page 379)

of the disease which caused his death prevented active participation in the changing struggle of building styles. Mr. Cutter was a charming personality, always willing to give help and advice to young men who were to travel the same road that he had done as members of the profession whose rewards were never to be recorded in terms of money. He could always be counted upon by those who, like himself, loved truth in architecture. It is fitting that a moment shall be taken in this too busy world to note the passing of a man full of years, who never did a mean action, never conceived a thoughtless design, never made an insidious criticism, or even expressed envy of others' success, always content to do his day's work as that work came to be done. His requiem might well be, "He did what he could faithfully."

A CORRECTION

In the February issue, on page 123, we published a design submitted in the PENCIL POINTS SMALL HOUSE COMPETITION and erroneously credited it to John B. Anthony and John Foster. We do not know the true author of this design, but if he will communicate with us we shall be glad to give him proper credit.

COURSES AT ROME IN ITALIAN ARCHITECTURE

The Italian Inter-University Institute of Rome (I.I.I.), constituted by Royal Decree, July 27, 1928, is offering a series of *Culture Courses in Italian Architecture* to be held in Rome in July and August, 1931.

As stated in their program, the fundamental basis of these courses will be the study of the monuments and, indeed, of the entire architectural life of Rome. Also the study of Italian architecture and its function during the different periods.

There will also be subsidiary lectures, and explanatory visits to monuments during which sketches and measured drawings may be made (Rome, Tivoli, Frascati, Ostia, Viterbo, Nemi, Orvieto).

This study of the marvelous patrimony of the past will be completed by the examination of some special examples of modern architecture and construction; by the study of modern city and town planning evolved on the model of old Italian towns; by a technical study of anti-seismic or quake-proof buildings; and finally by the study of and the visit to modern workmen's dwellings.

The teaching in these courses will be of an essentially practical nature.

Directors, teachers and lecturers have been selected from leading authorities and personalities in each respective field, and include among others: Prof. Sen. Gentile, President of I.I.I.; H. E. Prince Boncompagni, Governor of Rome; H. E. Marcello Piacentini, Arch., Member of the Italian Academy; Prof. Hon. Calza-Bini, Arch., President of the Workmen's Cooperative Dwelling Institute; Prof. Comm. Gustavo Giovannoni, Director of the Royal School of Architecture, Rome; Prof. Sen. Corrado Ricci, Art writer and expert critic.

Tuition fee for courses, Lire 1,000 (about \$53, plus small extra expenses for short excursions, amounting probably to less than \$10 altogether).

Instruction Trip, Lire 2,650 (about \$140, or \$135 for people who have been attending courses; all expenses paid).

For further information, arrangements and registration, apply to: Casa Italiana, Columbia University, Amsterdam Avenue at 117th Street, New York City; Compagnia Italiana Turismo, 545 Fifth Avenue, New York; American Express Company; Thos. Cook & Son.

A CORRECTION

In the article on "Metals and Alloys" appearing on page 239 of the March issue of PENCIL POINTS, the third sentence in the last paragraph on the left-hand column should have read, "To obtain the full benefit of the copper in iron and steel, the copper should be alloyed with the molten metal in considerable proportions, usually from *two-tenths to five-tenths of one per cent.* and sometimes even higher," instead of *twenty to fifty per cent. and sometimes even higher.*

A CORRECTION

On page 224 of the March issue we published a rendering with the following caption: "From a Pencil Rendering by Jeremiah Schmidt—Proposed New First National Bank, New Braunfels, Texas—Jeremiah Schmidt, Architect." This should have read: "From a Rendering in Conté Crayon—Proposed New First National Bank, New Braunfels, Texas—Jeremiah Schmidt, Architect, Rendering by Samuel Vosper."



DRAFTING ROOM FOR THE ATELIER

SAN FRANCISCO ARCHITECTURAL CLUB

The San Francisco Architectural Club has recently moved into a new home and now occupies the entire fourth floor at 130 Kearny Street, a location acknowledged to be ideal, situated in the midst of the major architects' offices, and on the edge of the financial district. The plan and arrangement of the quarters are excellent. The furnishings and equipment are of the best, selected with good taste, and never before has the club had a more cheerful or a more inviting home. Visitors are always welcome.

Every phase of the club activity is equally well provided for. A splendid atelier, well lighted, clean and roomy, a well equipped classroom and a good library appeal to the student. A fine lounge with easy-chairs, billiard and pool tables, radio, piano, and tables for many varieties of games, a well stocked rack of current magazines, etc., entice those who seek rest and recreation.

A business meeting, with perhaps an interesting talk or short lecture, followed by entertainment, with refreshments, brings all the members together once a month, while card games, dances, and affairs of a kindred nature bring their families and friends together less frequently, yet often enough to enjoy their association.

Finding it necessary to move to a new location at a time when the general business depression was being felt most keenly, when many members were unemployed, it was decided to have as much of the work as possible done by club members. Therefore under the direction of a competent

superintendent all the general work was done by home talent. Sensing that the members were not afraid, or ashamed, to help themselves, contractors and material houses offered their aid.

The plumbing, rough and finish, was completely donated, fixtures and a beautiful terra cotta drinking fountain being donated by local supply houses. The electric wiring was done at cost and the electric fixtures were practically given to the club. A beautifully paneled entrance lobby was made and installed by a local firm specializing in interior woodwork at a cost barely covering installation.

The entrance vestibule with textured plastered walls, stencil ornament and a tile entrance motive, specially designed, made by one firm and set up by another, was a complete gift to the club by collaboration of the four contractors concerned. Cork tile and linoleum floors, with the club emblem inlaid, were installed at less than cost. An art stone mantel, pieces of furniture, and the many little odds and ends that comprise the finishing touch were donated by friends of the club.

A recent drive has added about 50 new names to the membership. Old and new members alike are enthused over the new home. The appointment of an executive secretary, who is in attendance both day and evening, has given the club a businesslike aspect that is appreciated by all.

The energetic group of officers elected in January to take charge of affairs during 1931 has done splendidly so far: Ira H. Springer, President; C. Jefferson Sly, Vice-President; Donnell E. Jaekel, Secretary; S. C. Léon-haeuser, Treasurer; F. M. Sanderson, Executive Secretary. Directors: Wm. Helm; W. E. Mooney; Stanton Willard.



BILLIARD ROOM



LOUNGE AND RECEPTION ROOM

HERE AND THERE AND THIS AND THAT



This department conducts four competitions each month. A prize of \$10.00 is awarded in each class as follows: Class 1, sketches or drawings in any medium; Class 2, poetry; Class 3, cartoons; Class 4, miscellaneous items not coming under the above headings. Everyone is eligible to enter material in any of these four divisions. Good Wrinkle Section: a prize of \$10.00 is awarded for any suggestion as to how work in the drafting room may be facilitated. No matter how simple the scheme, if you have found it of help in making your work easier, send it in. Competitions close the fifteenth of each month so that contributions for a forthcoming issue must be received by the twelfth of the month preceding the publication date in order to be eligible for that month's competitions. Material received after the closing date is entered in the following month's competition.

The publishers reserve the right to publish any of the material, other than the prize winners, at any time, unless specifically requested not to do so by the contributor.

THIS MONTH the prizes have been awarded to:

- Class I—Clement J. Ford, New York.
- Class II—Frank Verrastro, Brooklyn, N. Y.
- Class III—Ernest R. Gilbert, Richmond, Va.
- Class IV—Robert T. Gidley, Melrose, Mass.

The lithograph by Clement J. Ford, printed below, is a reproduction of the artist's first use of this popular medium. The original drawing measures $5\frac{3}{4}$ " x $8\frac{1}{2}$ " and was printed from the stone by George Miller.

THE FOLLOWING poem is an impression of the Cathedral at Senlis by Alexander Richter, of New York. The Cathedral dates from the 13th Century. Mr. Richter was shown the Cathedral from crypt to pinnacle by the ancient caretaker "who looks as old as the Cathedral."

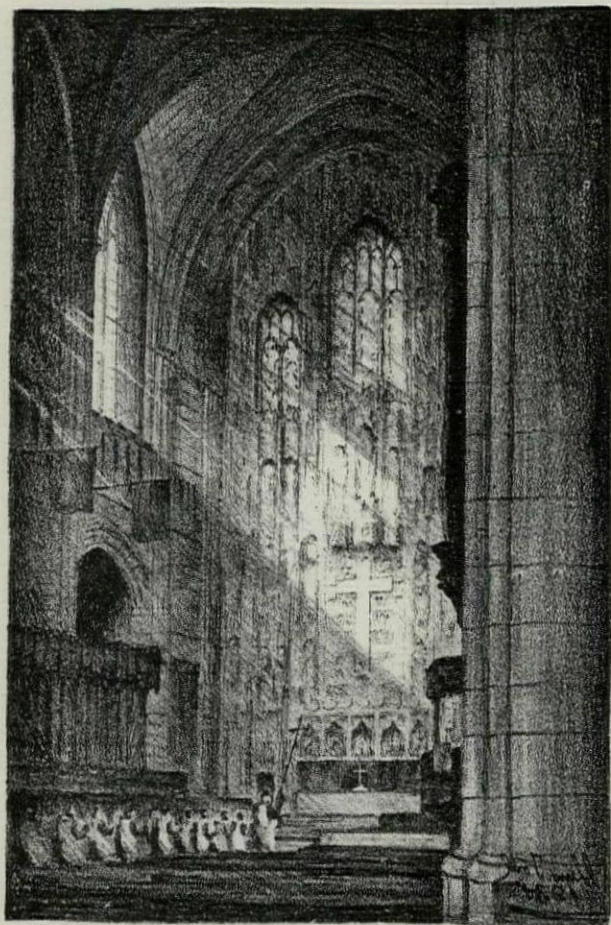
SENLIS

By Alexander Richter

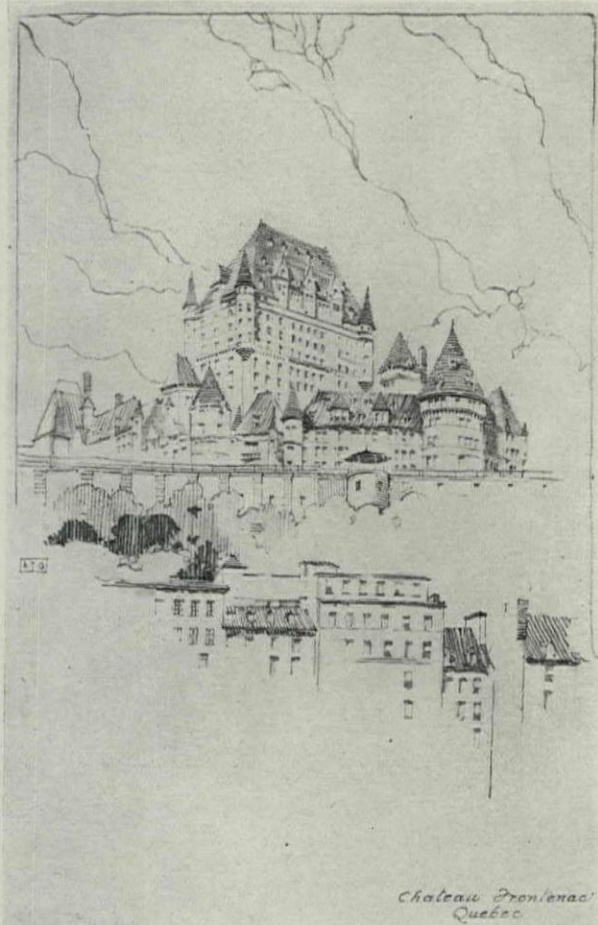
Gray, old, strangely beautiful,
Strong stone, slowly turning to sand;
Once clearly defined tracery,
Long vanished—soft shadows now.

Gargoyles, thrust from flying buttresses,
Grimacing dragons in years long past;
Strength, expression—all vanished
Like a strong man grown very old.

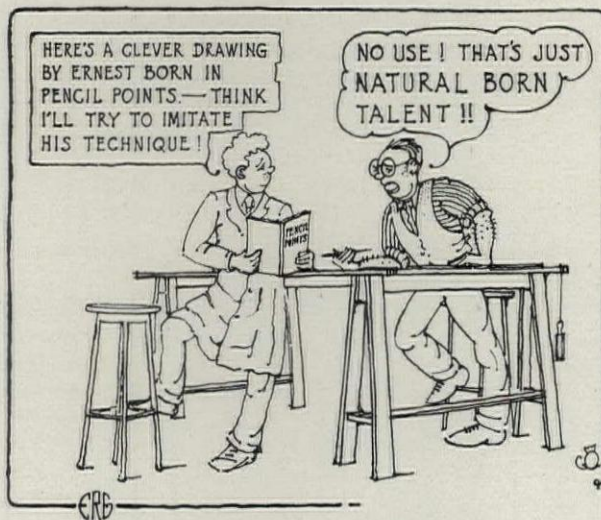
Sharp, crisp Gothic mouldings,
Edges worn round by a million rains—
Utterly changed, yet so utterly lovely;
Perfect notes in a glorious symphony!



LITHOGRAPH BY CLEMENT J. FORD, OF NEW YORK
St. Thomas' Church, New York
(PRIZE—Class I—April Competition)



FROM A PENCIL DRAWING BY ALFRED T. GRANGER,
OF HANOVER, NEW HAMPSHIRE
Château Frontenac, Quebec



CARTOON BY ERNEST R. GILBERT
(PRIZE—Class III—April Competition)

Mr. Verrastro, in submitting *The Subway Riders*, tells us that "it has never been published in any newspaper or magazine." Surely something should be done about the dreadful conditions existing in New York subways, which are so vividly described here.

THE SUBWAY RIDERS

By Frank Verrastro

(PRIZE—Class II—April Competition)

At early morn the people meet,
From every avenue and street,
They get on a subway station,
To bring them to a point of destination.

Some are seated and some stand,
And some creep in the best they can.
Some open their mouths as though to yawn,
And someone says, "Get off my corn."

The air is perfumed with onions and rum,
Then someone yells, "Get out, you bum."
Some make faces as though discontented,
And some with their noses at something they've scented.

Some read papers, others magazines,
Of different languages and different means.
Some who papers never buy
Read the news from the persons near by.

When one wishes to get out,
He has to let out an awful shout.
He pushes and cries with exclamation
"I wish to get off at this very station."

This is the way the people ride,
Sway in the cars side to side.
They reach at the point they have decided
All weary and tired.

LITTLE EDDIE'S ARCHITECTURAL PRIMER

By Robert T. Gidley

(PRIZE—Class IV—April Competition)

See the solemn man with bone rim glasses!
Yes. Is he a doctor?
No. He is an architect.
What is an architect?
Ask someone else—we're too modest!
What does an architect do—if anything?
He holds conferences.
Are conferences good for business?

Yes—for the cigar business. They are also fine for golf and getting rid of unwanted callers.

When a client walks into an architect's office and gives him a job what does the architect do?

You mean what *would* he do, don't you, Eddie? Probably drop dead. But let's stick to practical problems.

What is the difference between an architect and a contractor?

Usually there are a number of differences between the architect and the contractor before a job is done.

Does the architect draw the plans for a building himself?

Not if he can help it. He employs draftsmen to make the working drawings. Sometimes, however, he makes sketches with a 6B pencil.

Does he have a sketching pad?

Oh, no! He prefers the middle of a working drawing—any working drawing. A soft pencil sliding around on a finished drawing helps him to talk and express himself. Give him a nail and he'd have to take up carpentry.

When a building is done what does the architect get?

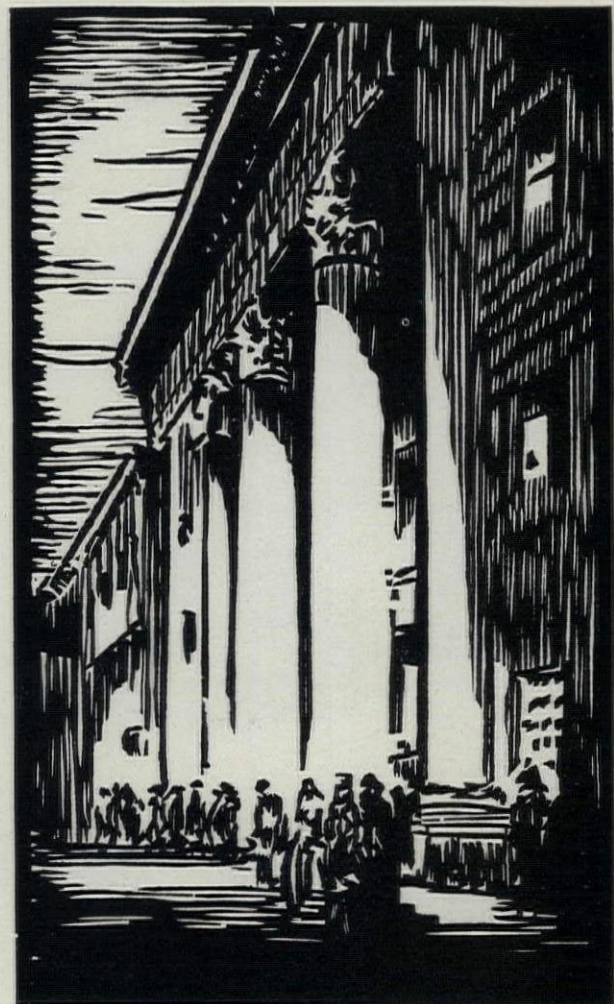
We could tell you but the editor would only censor it!

Who was the first architect?

Noah. He designed and built the Ark. But the job was all wet when it was done. It's very much the same today.

Do architects put their names on buildings they design?

Occasionally a brave one does. But after he has listened to the comments of the owner and other architects who didn't get the job he usually sneaks down at night and chisels it off.



LINOLEUM PRINT BY HERBERT HEYWOOD
"U. S. National Bank, Portland, Oregon"

ARCHITECT WARNS AGAINST LOW BIDS WITH IDEA OF "SKINNING" JOB

The following letter was sent to us by Harry P. Nichols of the American Abrasive Metals Co. It is reprinted from the *Weekly Bulletin* of the Associated General Contractors of America. The letter was sent recently to all bidders for a school building let by Mr. L. N. Boney, Architect, Wilmington, N. C.

In Re Belvoir School: To all Contractors:

In regard to the bids which are to be presented next Monday for the erection of Belvoir School in Pitt County, I feel the following comment would be just to all parties concerned.

For the past twelve months much of the work which has been let has gone at figures too near the cost of good construction and this makes it hard on the contractor, for he naturally tries to get out as light as possible and oftentimes he is tempted to "skin" a little here and a little there to pick up some of the difference between the price of his contract and the amount which his contract should have been.

In this connection let me suggest and urge that each of you figure this job at a price which will build that part of the work, included in your contract, in a first-class and workmanlike manner. The job will be inspected daily and the plans and specifications will be interpreted literally. Please be governed accordingly.

Yours very truly,

(Signed) LESLIE N. BONEY

The following comments on Mr. Boney's letter are also reprinted from the *Weekly Bulletin*.

"We heartily concur in the suggestions of Mr. Boney in that a job cannot be bid at cost and take a chance of 'skinning' for profit and expect to deliver construction that will be entirely satisfactory to both the owner and architect."

"Nothing is so easy as to cut prices; and nothing is so hard as to get them back when once they have been pulled down. Any child can break an egg by throwing it on the floor, but all the learned scientists in the world cannot pick it up again. Any fool can cut prices, but it requires the combined power of the industry to put them back again."—Selected.



"I distinctly told you that Playboy's room should have southern exposure!"



CIRCLE TOWER, INDIANAPOLIS

Architect: Rubush and Hunter, Indianapolis, *Specification Engineer:* S. E. Fenstermaker, Indianapolis, *General Contractor:* Wm. T. Jungclaus Co., Indianapolis, *Plumbing and Heating Contractor:* Callon Bros., Indianapolis


Circle Tower, heralded as the finest office building in Indianapolis, is a worthy addition to the downtown development of this progressive city. Modern to the minute—excellently located—it brings new standards in luxury and convenience to the Hoosier Capital.

All specifications for materials and equipment were scrutinized in a most thoroughgoing way with a view to intrinsic worth and also to what might increase the prestige of a distinguished building.

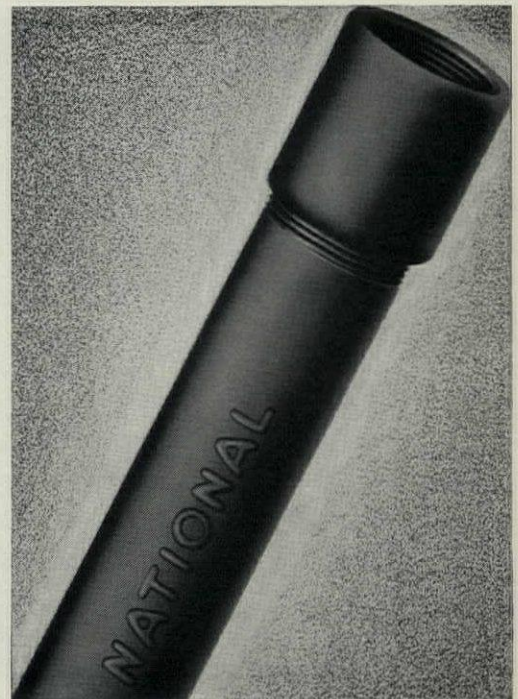
In keeping with this principle, NATIONAL Pipe was chosen for the major pipe tonnage—one more testimony to the standing of—

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Publications on Materials & Equipment Of Interest to Architect, Draftsman and Specification Writer

Publications mentioned here will be sent free unless otherwise noted, upon request, to readers of PENCIL POINTS by the firm issuing them. When writing for these items please mention PENCIL POINTS.

Modine Copper-Cast Radiators.—A.I.A. File No. 30-c-4. Data bulletin No. 3-A explains in detail the construction, operation and installation of a new type of radiator for use in office buildings, hotels, public buildings and apartments. Specifications, installation details, capacity and dimension tables. 12 pp. Standard filing size. Modine Manufacturing Co., Racine, Wis.

Atlantic Terra Cotta Wall Units.—A.I.A. File No. 9-c. Supplement No. 1 illustrates and describes numerous installations of Atlantic wall units in office buildings, public buildings, schools and colleges, hospitals, etc. Included are color plates showing a variety of surface finishes and colors. 18 pp. $8\frac{1}{2}$ x 11. Atlantic Terra Cotta Co., 19 W. 44th St., New York, N. Y.

Log Cabin Built with Shevlin Log Siding.—New brochure with plans, exterior and interior photographs, lumber bills and useful suggestions on the construction of log cabins. 16 pp. $8\frac{1}{2}$ x 11. Shevlin, Carpenter & Clarke Co., 900 First National-Soo Line Building, Minneapolis, Minn.

Weisway Leakproof Shower Cabinet.—A.I.A. File No. 29-h-3. New illustrated folder with color plates describes in detail the construction, erection and installation of a newly developed type of shower cabinet. Dimension table. 6 pp. $8\frac{1}{2}$ x 11. Henry Weis Manufacturing Co., Elkhart, Ind.

Capitol Cast-Iron Concealed Radiators.—A.I.A. File No. 30-c-4. Useful data book for architects and heating engineers, just issued, completely describes the construction and advantages of a new line of cast-iron concealed radiators for use with steam, vapor, vacuum and water systems. Rating tables, charts, drawings, etc. Included are illustrations of numerous models of enclosures, accompanied by descriptive text, detail and dimension drawings. 32 pp. Standard filing size. United States Radiator Corp., First National Bank Bldg., Detroit, Mich.

Still Better Vault Protection.—New brochure presents detailed description of the Bankers Electric Protective Association's systems of vault protection, together with illustrations of the various items of equipment and complete specification data. Particular stress is placed on the new service arrangement whereby these systems are installed, inspected and maintained through the A.D.T. organization. 16 pp. $8\frac{1}{2}$ x $11\frac{1}{2}$. American District Telegraph Co., 155 Sixth Ave., New York, N. Y.

Portland Cement Stucco with Medusa Waterproofed White Portland Cement.—A.I.A. File No. 21-d-1. Attractive new publication with descriptive and specification data covering the use of this kind of cement in the production of stucco for both exterior and interior finishes. A number of the more popular textures are illustrated. Tabular matter. 20 pp. $8\frac{1}{2}$ x 11. Medusa Portland Cement Co., 1002 Engineers Bldg., Cleveland, Ohio.

Published by the same firm, "Terrazzo with Medusa White Portland Cement (Plain and Waterproofed)." A.I.A. File No. 22-e-1. New document prepared especially for architects and specification writers dealing with the subject of Medusa white portland cement for use in terrazzo work. Included are complete set of specifications and color plates showing designs and color schemes. 12 pp. $8\frac{1}{2}$ x 11.

Banishing the Twilight Zone from Modern Buildings.—A.I.A. File No. 31-f-232. Publication A-1204, just issued, presents a discussion of present-day principles and practice in the interior lighting of modern buildings. Included are engineering data and photographs showing lighting installations in offices, lobbies, drafting rooms, bedrooms and many other building interiors. 24 pp. $8\frac{1}{2}$ x 11. Westinghouse Lamp Co., 150 Broadway, New York, N. Y.

Published by the same firm, "Skylines Beyond the Twilight Zone." A.I.A. File No. 31-f-24. Publication A-1208 contains a discussion of modern principles and practice in floodlighting, together with a description of the advantages of floodlighting and recommendations useful in making such installations. Photographs and descriptions of Westinghouse floodlighting equipment and numerous installations are included. 24 pp. $8\frac{1}{2}$ x 11.

Build the Beauty In.—Attractive brochure illustrating and describing the ideal line of built-in furniture for living rooms, bedrooms, dining rooms, kitchens and bathrooms. 24 pp. Wm. Cameron & Co., Inc., Waco, Texas.

Maintenance Paints and Waterproofing Compounds.—New manual with color charts and descriptive data covering the application of this line of paint and waterproofing materials for plant maintenance work. Standard filing size. Toch Bros., Inc., 386 Fourth Ave., New York, N. Y.

Wilson Sectionfold Doors—Operating Overhead.—New folder with complete data and specifications covering Wilson Sectionfold doors for use in public, private and community garages, factories, warehouses and other commercial buildings. 4 pp. $8\frac{1}{2}$ x 11. The J. C. Wilson Co., Norfolk, Va.

Cromar Oak Floors.—Illustrated publication giving a detailed description of the various operations performed in the production of this type of factory finished oak flooring. 24 pp. The Cromar Co., Williamsport, Pa.

Ludowici Shingle Tile Specifications.—Series of folders printed in colors with specification and brief descriptive data covering five different types of shingle tile suitable for various roof treatments. Ludowici-Celadon Co., 104 South Michigan Ave., Chicago, Ill.

New Facts on Oil Heating for Architects and Engineers.—A.I.A. File No. 30-g-1. Revised edition of architect's manual discusses Oil-O-Matic fundamentals as well as the many applications of Oil-O-Matic heat. Included are capacities of the new model JJ burner for commercial installations, together with diagrams, illustrations, suggested specifications and regulations of the National Board of Fire Underwriters. 36 pp. Standard filing size. Williams Oil-O-Matic Heating Corporation, Bloomington, Ill.

Stedman Reinforced Rubber Tile.—Series of new descriptive bulletins with color plates covering the application of this type of reinforced rubber tile flooring for hospitals, hotels, office buildings, banks and stores. Stedman Rubber Flooring Co., South Braintree, Mass.

How to Use Flexwood.—A.I.A. File No. 19-e-5 or 28-c. Illustrated bulletin on the subject of Flexwood, a new wood product that permits paneling of wall surfaces in the master cabinet woods and is applied with ordinary paper hanger's tools. Included are diagrams and chart describing the various kinds of wood and their uses. 6 pp. $8\frac{1}{2}$ x 11. The Flexwood Co., 919 North Michigan Ave., Chicago, Ill.

Published by the same firm, "Flexwood Specification No. 4." A.I.A. File No. 28-c. Standard filing size folder with instructions for hanging and finishing Flexwood on plaster walls. 6 pp. $8\frac{1}{2}$ x 11.

Red Top Metal Arches.—New folder describing the Red Top metal arch which provides a unit plaster base for all types of plastered arched openings in residences and apartment houses. 4 pp. $8\frac{1}{2}$ x 11. United States Gypsum Co., 300 West Adams St., Chicago, Ill.

Published by the same firm, "Red Top Basement Sash and Coal Doors." Descriptive data, dimensions and details covering this type of sash and equipment for the modern basement. 4 pp. $8\frac{1}{2}$ x 11.

Union Metal Columns and Pergolas.—A.I.A. File No. 12m. Catalog No. 50-d. Attractive book describing and illustrating this line of metal columns for homes and public buildings, also pergolas and garden equipment. Specifications, construction and installation details. 40 pp. $8\frac{1}{2}$ x 11. The Union Metal Manufacturing Co., Canton, Ohio.

Published by the same firm, "Union Metal Floodlighting Equipment." Catalog No. 62 illustrates numerous designs of floodlighting equipment, sign and lighting standards suitable for building fronts, swimming pools, playgrounds, service stations, amusement parks, etc. Construction details. 12 pp. $8\frac{1}{2}$ x 11.

Featherweight Concrete Insulating Roof Slabs.—A.I.A. File No. 12-e-2. Catalog 102, just issued, contains complete information with specifications, essential data, weights and dimensions, detail drawings covering concrete insulating and nailing concrete roof slabs for use on public, industrial and railroad buildings. Typical installations. Useful document for architects and draftsmen. 48 pp. $8\frac{1}{2}$ x 11. Federal-American Cement Tile Co., 608 South Dearborn St., Chicago, Ill.

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flooring is so fabricated that terrific pressure separates the wood fibres themselves, rather than the plywood joints.



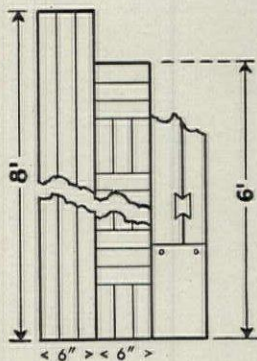
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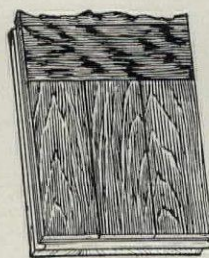
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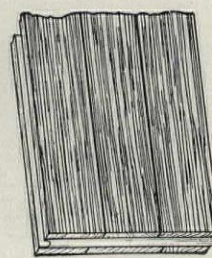
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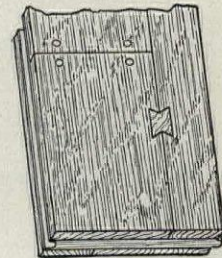
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Position Wanted: Position wanted by architect in any capacity. Will go anywhere. Salary secondary. Box No. 500, care of PENCIL POINTS.

Position Wanted: Secretary, young woman, seven years' experience, desires position in architect's or contractor's office in New York City. Can take full charge of office if necessary including stenographic work, accounting and specification work. Box No. 501, care of PENCIL POINTS.

Position Wanted: Experienced decorator and buyer wishes position with architect, also to do secretarial work. Box No. 502, care of PENCIL POINTS.

Position Wanted: Young man, has had two years of architectural schooling in the day and two at night, and is still continuing. Has had three years' experience with one of the biggest architects. Wishes position as Junior draftsman. Box No. 503, care of PENCIL POINTS.

Position Wanted: Young man, 18, attending Frank Wiggins Trade School (Los Angeles) specializing in "Homes—Not Houses," would like position in a drafting office to help pay incurred education expenses and to gain experience. Permission to use instructor's name. Free to travel in summers. Box No. 504, care of PENCIL POINTS.

Position Wanted: Young architectural draftsman, graduate of Georgia School of Technology. Experienced in Mill-work and general drafting, designing and rendering. Salary secondary. Box No. 505, care of PENCIL POINTS.

Position Wanted: Architectural designer who has been trained in the office of leading New York architects is offering his services on individual residential projects. Preliminary renderings, working drawings and details. References and examples of work submitted upon request. Box No. 506, care of PENCIL POINTS.

Office Space for Rent: Architect has more space in his drafting room than he can use at the present time and would like to share it with another architect who is in need of a place in which he can do his own work and obtain the general services of the office. Location in Grand Central Zone. Box No. 507, care of PENCIL POINTS.

Position Wanted: Fifteen years' experience on church, school, bank and institutional work as draftsman and squad leader. Thoroughly experienced in all office and outside practice, and able to handle work from designers' sketches to completed building. Want a permanent position with a fair salary. Age 35 and married. Box No. 508, care of PENCIL POINTS.

Position Wanted: Architect-designer and draftsman. Specialist on modern school design, layout and construction. Able designer with long-time experience in leading architectural offices. Graduate of accredited architectural school. Age 36. Would consider any location. Box No. 509, care of PENCIL POINTS.

Position Wanted: Architectural draftsman desires permanent connection with reliable architect or architectural firm in New York City or Chicago. Chicago Technical College student, three and a half years' experience making general drawings and details in varied types and classes of work. Capable of working from preliminary sketches. Salary \$150.00 per month to start. Age 26. Box No. 510, care of PENCIL POINTS.

Position Wanted: Architectural draftsman, 11 years' experience, desires to connect with a small general or residential office needing the services of an energetic and businesslike young man, able to care for all office details, both design and construction, and also, when necessary, to go out and get new business; a neat and rapid draftsman and experience in contact work. Salary moderate. Box No. 511, care of PENCIL POINTS.

Position Wanted: Architectural draftsman, 15 years' experience on church, residence, theatre, office building and hospital work. Have supervised the production of large operations from sketches to finished building, including field superintendence. Box No. 512, care of PENCIL POINTS.

Position Wanted: Squad boss, experienced in all classes of work except churches. Available May 1st. Just completed a three-million-dollar job. Prefers location between New York and Washington. Married, 31 years old. Rapid and extremely accurate draftsman. Will assume charge of project or work on boards. Specifications, superintendence. Box No. 513, care of PENCIL POINTS.

Position Wanted: Young European architect, having essential knowledge of modern art as well as the period styles, plans, elevations, interiors and details; with eight years' experience in Europe and one and a half in the United States; will do any drafting work on very reasonable salary. Communicate with Box No. 514, care of PENCIL POINTS.

Project Man, Designer, Renderer, desires connection with architectural office in eastern U. S. or Canada, where a thorough knowledge of promotion and planning of commercial and residential projects would be of value. University graduate. 14 years' experience, 6 years' connection with New York office. Age 36. Married. Box No. 515, care of PENCIL POINTS.

Position Wanted: Architectural designer and draftsman, with extensive experience in prominent offices. Graduate of an accredited school. Able to render projects in perspective. Versed in the styles including modernistic, commercial, residential and monumental work, working drawings, scale, detail and competitions. Salary easily arranged. Will accept position anywhere. Box No. 516, care of PENCIL POINTS.

Position Wanted: Young man, 24 years of age, desires permanent position in office or field upon graduation this June from University of Detroit in architectural engineering. One year's experience in a prominent engineer and architect's office. Best references as to character and ability. Permanence and advancement desired. Box No. 517, care of PENCIL POINTS.

Position Wanted: Designer-draftsman, thoroughly familiar with all styles and modern architecture. Sketching, designing, detailing, working drawings, perspectives and renderings in all mediums. Box No. 518, care of PENCIL POINTS.

Position Wanted: Architectural draftsman, 8 years' experience, planning, detailing, designing and rendering of apartments, residences, and country houses. Neat worker and capable of making working drawings from sketches to full size details. Box No. 519, care of PENCIL POINTS.

Position Wanted: Architect thoroughly familiar with all types of buildings, planning, etc., with knowledge of structural engineering as incorporated in building construction. 48 years old. Would consider reasonable investment with reliable concern in New York City if desired. Box No. 520, care of PENCIL POINTS.

Position Wanted: Young architectural draftsman now studying second year at Mass. Inst. of Technology. Age 20. Two years' office experience. Best references. Job anywhere in Eastern states at reasonable salary. Available June 1st. O. Dvorn, 48 Hereford St., Boston, Mass.

Position Wanted: Draftsman-designer, College man, 8 years' experience in New York City, all types of buildings. Desires position with architectural firm in Rocky Mountain Region after May 1st. A. B. Paulson, 1119 Sunnyside Ave., Salt Lake City, Utah.

Position Wanted: Beginner would like job in architect's office. Willing to work and learn and gain experience. Salary secondary. Have had complete course in architectural drafting and building construction. Age 20. Good reputation and the best of references. Russell Hileman, 1127 Lake Drive, Plymouth, Indiana.

Position Wanted: Competent architectural draftsman, 13 years' varied experience, desires to change location. Partnership considered. Ohio preferred. Box No. 521, care of PENCIL POINTS.

Position Wanted: Young man, 19, architectural student-draftsman, desires position in architect's or builder's office. Michael Zywetke, 152 Boerum Street, Brooklyn, N. Y.

Position Wanted: Architectural tracer and junior draftsman, 19, desires permanent position in Chicago assuring opportunities for advancement. Salary secondary. Is neat, honest, ambitious and above the average in ability. Some experience on residences. Graduate of Chicago Technical College. Walter Wischstadt, Itasca, Ill.

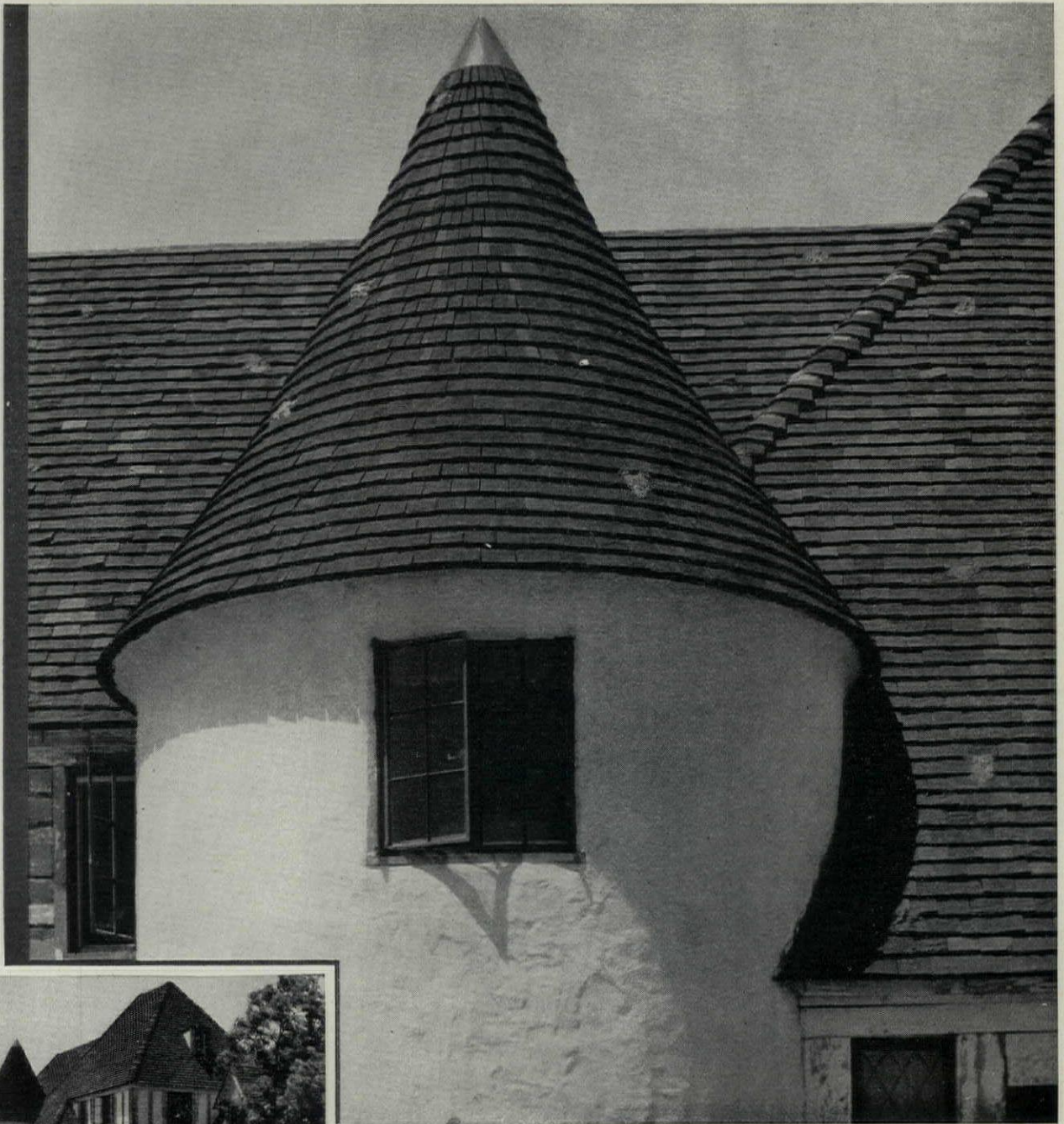
Position Wanted: Graduate of a technical school in architectural and free hand drawing. Five years' experience at bricklaying. Anxious to become connected with an architect as tracer, messenger or any other possible way. Salary no object. William Carney, 519 West 138th Street, New York, N. Y.

Position Wanted: Young man, 17 years of age, wishes position in an architect's office. Is a graduate of an architectural course and has six months' experience. Peter Rodetis, 203 East 107th St., New York, N. Y.

Position Wanted: Junior draftsman desires position in architect's or builder's office; tracer or enlarger to scale. High School training and 1st year architectural student at Cooper Union. Joseph Szabo, 411 East 82nd St., New York.

Position Wanted: Young man, 16 years of age, ambitious. Wants position as junior draftsman. Graduate of Industrial High School. Salary no object. William Gerard, 341 East 119th St., New York, N. Y.

(Other items on page 138, Advertising Section)



Residence of Arthur W. Coote, Architect, Great Neck, N. Y.

CAPPED with a roof of Ludowici Tile, the tower of this charming house gains its full significance. The pattern is "Antique" Shingle,—specially shaped tile being used on the hips. There is no type of architecture and no size of building for which there is not a pattern and color of Ludowici Tile precisely suitable. The beauty is as enduring as the protection is complete. On request, we will have a representative call, or mail our illustrated catalogue. Much information is contained in our pages in Sweet's.

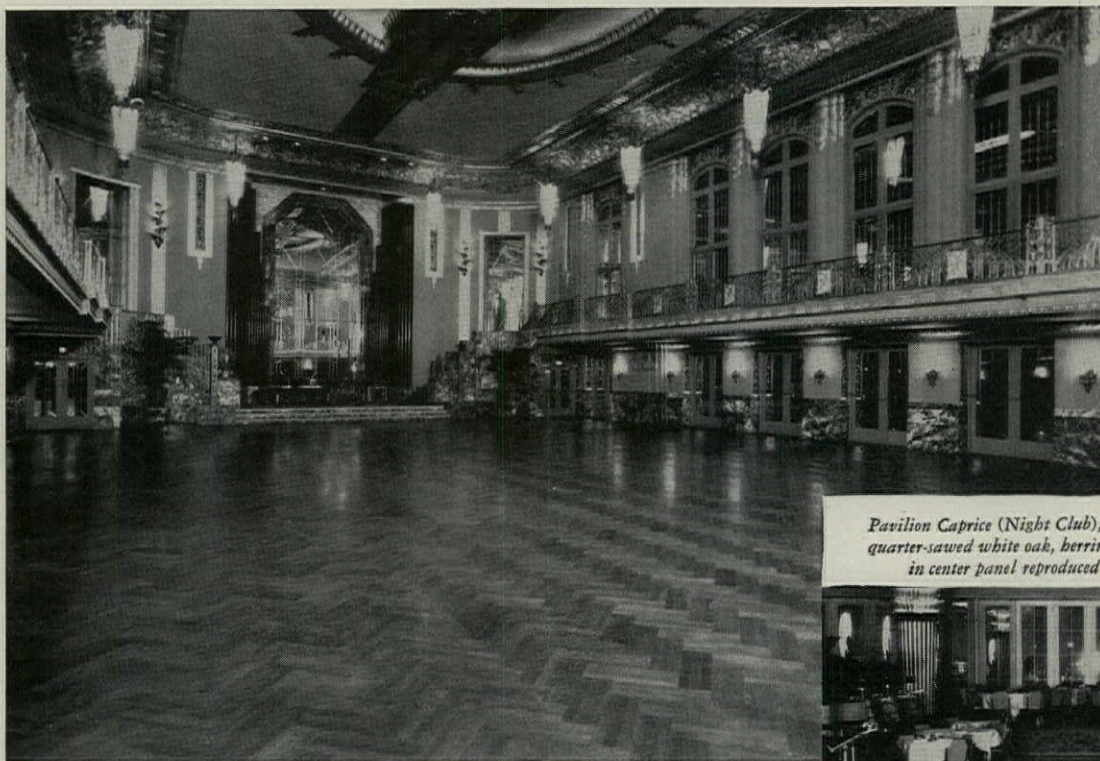
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Main Dining Room with dance floor of clear American walnut mastic squares laid diagonally.

WOOD-MOSAIC MASTIC



Hall of Mirrors (Main Ball Room) floored with Wood-Mosaic mastic blocks of quarter-sawed white oak in cluster herringbone pattern.

Pavilion Caprice (Night Club); dance floor in mastic blocks of quarter-sawed white oak, herringbone pattern. Note star motif in center panel reproduced in satinwood and teak.





Starrett's Netherland-Plaza, Cincinnati, Ohio. W. W. Ahlslager, Architect; Delano & Aldrich, Associate Architects; Starrett Bros., Inc., General Contractors. All wood floors designed and installed by Cincinnati Floor Co.

BLOCKS IN NETHERLAND-PLAZA

IN rooms where the highest degree of serviceability, fireproof construction and genuine beauty must be combined, Wood-Mosaic Mastic Wood-Block Flooring is the logical selection today. This was again demonstrated by the fact that these blocks, adapted in both wood and design to various architectural schemes, were used in the main dining room, main ball room and night club of the new Netherland-Plaza, Cincinnati.

Designed and laid by our agents, Cincinnati Floor Co., these noteworthy floors illustrate the type of cooperation and expert facilities for installation available to architects everywhere. . . If you are interested in the natural charm, the wide variety of effects and real economy of fine wood floors, send for our architect's handbook, "Mastic Wood-Block Flooring". *Genuine Wood-Mosaic flat-backed, mastic blocks have been in continuous and successful use for over 25 years.*

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Flint Handmade Faïence

In the Edsel B. Ford residence shown below, recipient of a recent A. I. A. Honor Award, Mr. Albert Kahn, the architect, included twelve bathrooms in Flint Handmade Faïence. Using simple gray tiles as a background, he created interiors of striking originality—in keeping with the character and prize-winning distinction of the entire home.

The Alvan Macauley residence makes notable use of both Flintcraft and Flint Handmade Faïence, in combination. Two of the interiors are shown on the right.

For residences of quality, specify Flint tiles. We shall be glad to send you catalogs and suggestions for the use of Flint Handmade Faïence, Flintcraft, and Vitrocraft in sun-rooms, bathrooms, terraces, garden pools, and for other residential purposes.

HONOR AWARD 1930
American Institute of Architects
Detroit Chapter

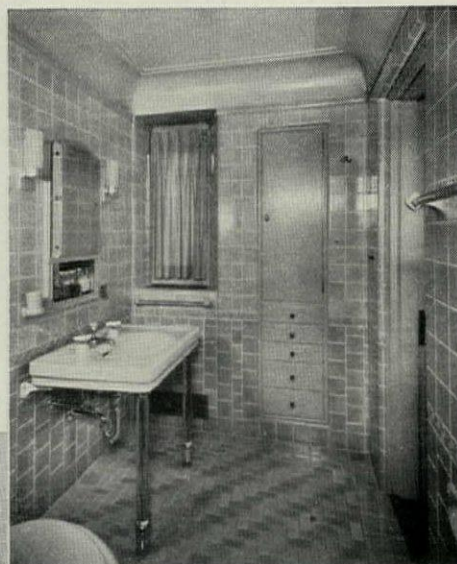
Awarded to Mr. Edsel B. Ford, for the distinguished residence at Grosse Pointe Shores, Michigan

Albert Kahn, Inc., Detroit, Architects
General Mosaic Co., Detroit
Tiling Contractors

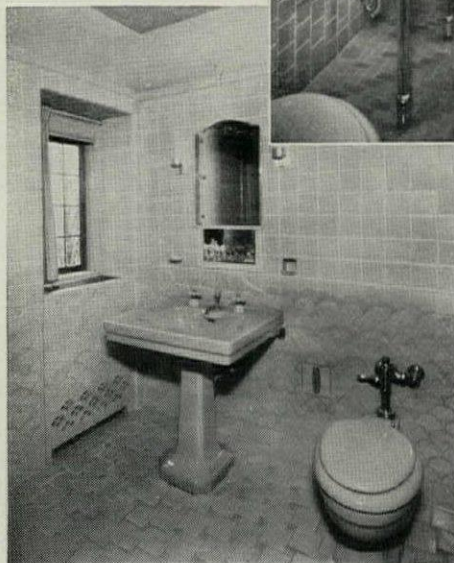


To the right: bathroom interior in the Grosse Pointe, Michigan, residence of Alvan Macauley, President of the Packard Motor Car Company. Walls are in Flintcraft, the machine-made tile of faïence quality. Floors, Flint Handmade Faïence.

Albert Kahn, Inc.
Detroit, Architects
The Netting Company,
Detroit
Tiling Contractors



To the left: Another bathroom in the Alvan Macauley residence. The fish-scale design is successfully combined with Flintcraft. Floors are in hand-made faïence



FLINT FAÏENCE AND TILE CO., FLINT, MICHIGAN

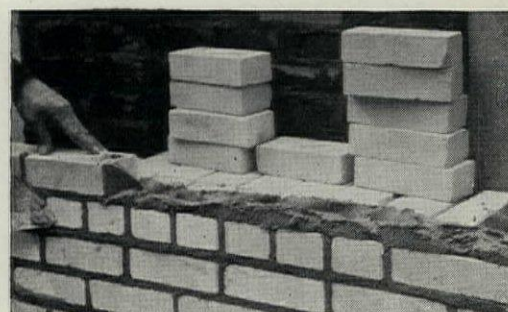
Speed!



FROM THE MIXER TO THE WALL
WITHOUT A MOMENT'S DELAY

INSTANT PLASTICITY

is another great feature of
improved Carney Cement

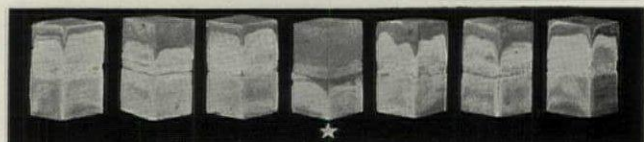


SMOOTH, fast-working mortar without delay is another of the important characteristics that is now part of this greatly improved Carney Cement. Straight from the mixer to the wall, without soaking, slaking or waiting goes this remarkable new material—yet its plasticity is far better than any mortar you have ever seen.

Instant workability is but one of the great advantages that Carney Cement now brings to the

building profession—its new moisture resisting quality definitely checks the spread of efflorescence and forms a water tight joint that eliminates the curse of wet walls. (See test below.)

Our chemical laboratories spent two solid years in the development and perfection of this superlatively fine bonding material. Architects and builders who witness our demonstrations, which we will gladly make for you, tell us that this new Carney Cement presents one of the greatest scientific advancements in the history of mortar cement production. You will want to see the Carney demonstration before starting your next masonry job—call or write our nearest office.



Carney specimen (marked by star) together with six other masonry material specimens were made. The mortar for all was mixed, one part cement to three parts sand, by volume. The same quality common bricks were used—the sand and water were identical and all specimens were the same age. They were placed together in one receptacle containing one half inch of sodium sulphate solution, and left standing for 48 hours. Efflorescence became apparent above all the mortar joints except the Carney joint within 24 hours and continued until the condition shown above was reached. This test demonstrates how completely the Carney mortar joint now resists the invasion of salts in solution. It also illustrates immunity of the Carney joint to moisture absorption.

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cludes scores of instruments, and all the items needed in the drafting room ... in both quality and price for "every purpose and every purse." Dietzgen equipment may be secured from any Dietzgen branch or through leading dealers throughout the United States, Canada, Mexico and other countries.

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ÆTNA spent a year trying to find a better floor for the same money — or as good a floor for less



LARGE corporations are accustomed, it would seem, to spend time before spending their money.

Aetna Life investigated for upwards of a year trying to find a better buy than Sealex Battleship Linoleum. It couldn't be done. Western Union even went so far as to conduct actual service tests with many floor materials. Sealex Floors won this competitive contest also!

City Bank Farmers Trust Co., Standard Oil, Equitable Life, Westinghouse, are other leaders who have chosen Sealex Battleship Linoleum. Purchasing floors by the acre, these buyers could not afford to make mistakes. Instead of cheap hard floors they chose the long-run economy of durable resilient floors — shock-absorbing, noise-reducing floors that increase employee efficiency.

Address inquiries to our Architectural Service Department. Ask about Bonded Floors — Sealex materials backed by a Guaranty Bond.

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uses CL Air Circuit Breakers

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All main circuits, leading from the eight Westinghouse switchboards, are protected with sixteen one to three-pole CL air circuit breakers ranging in size from 800 to 4000 amperes.

These breakers with one-piece frame, unbreakable carbon contacts, compactness, accessibility, durability and velvety-finished copper parts are

adequately serving many other modern industrial and commercial buildings.

If your file, 31-D-44, does not contain copies of Circular 1705-C which completely describes these breakers, write our nearest office.

One of eight Westinghouse Switchboards in the Carew Tower, equipped with 4000-ampere CL Breakers. This is the main Hotel Switchboard.



The 48-story Carew Tower, Cincinnati, with Fountain Square in the foreground.



Architect—W. W. Ahlschlager, Chicago. Associate Architect—Delano and Aldrich, A. I. A. General Contractor—Starrett Construction Company, Chicago. Electrical Contractor—Hatfield Electric Co., Inc., Cincinnati.

OTHER WESTINGHOUSE EQUIPMENT in the Carew Tower

- 2 theater switchboards
- 42 elevators
- 57 metering panelboards
- 148 lighting panelboards
- 19 power panels and cabinets
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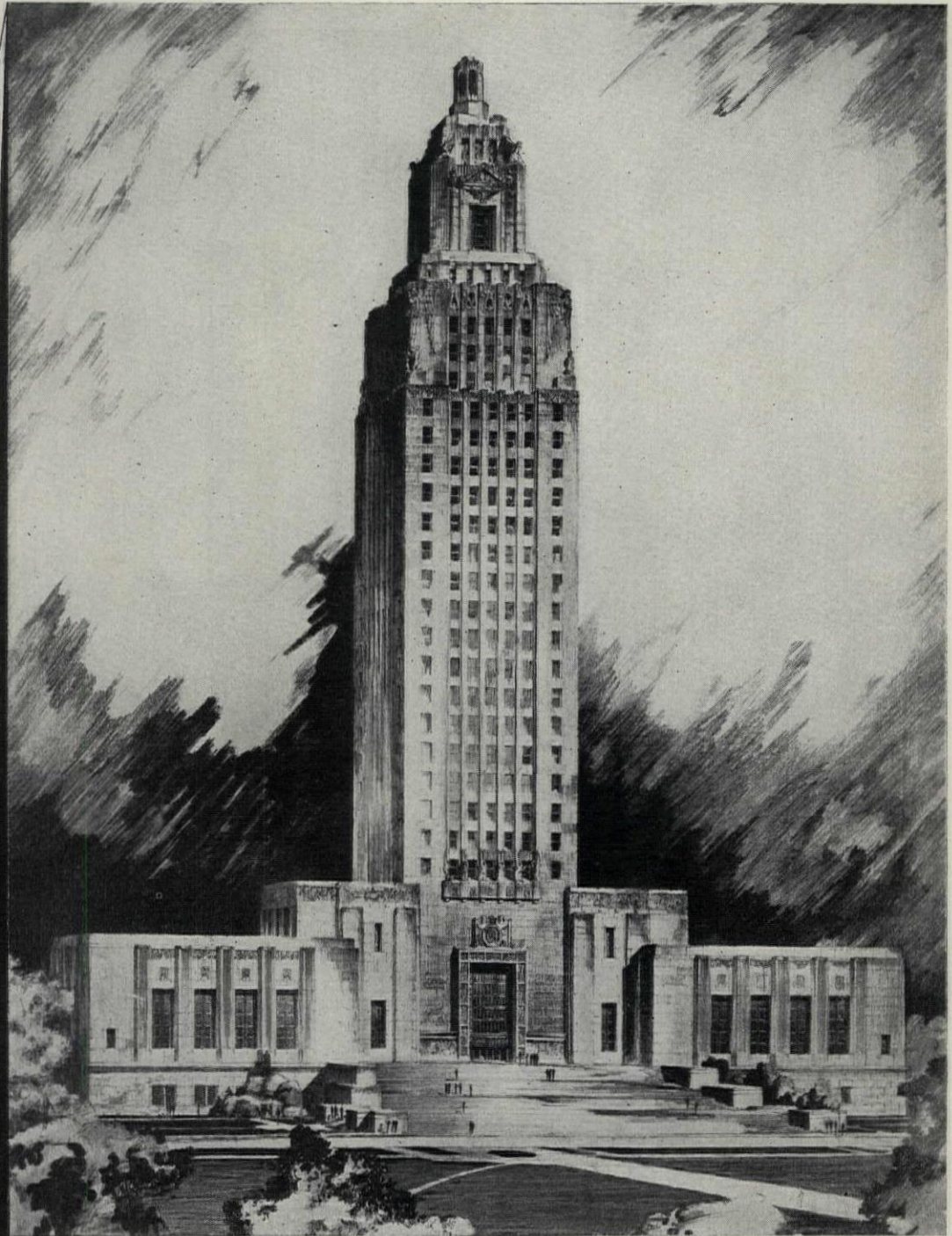
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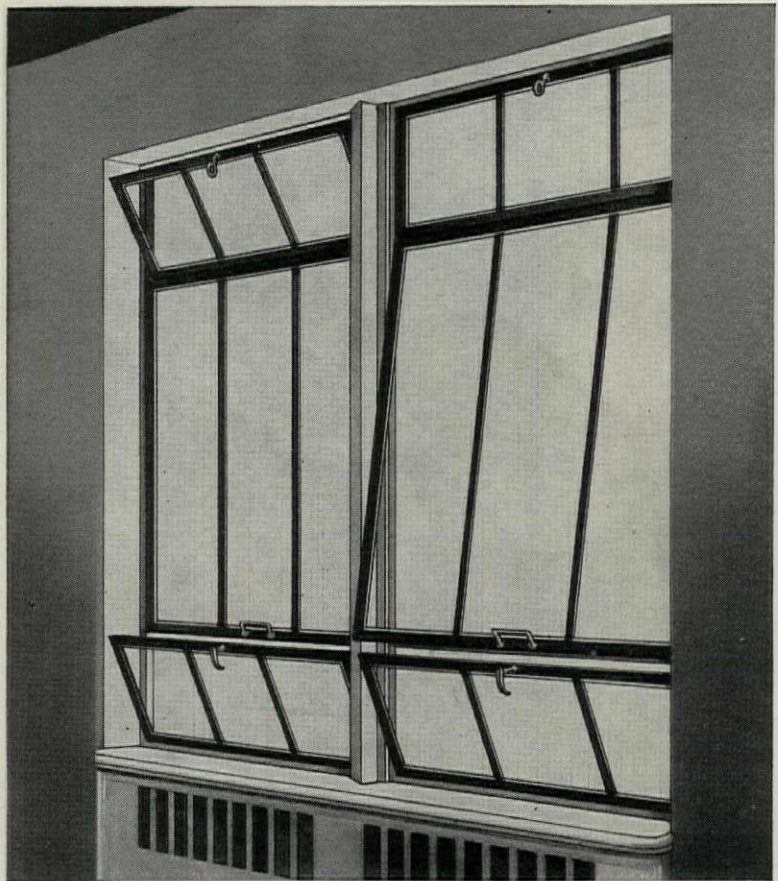
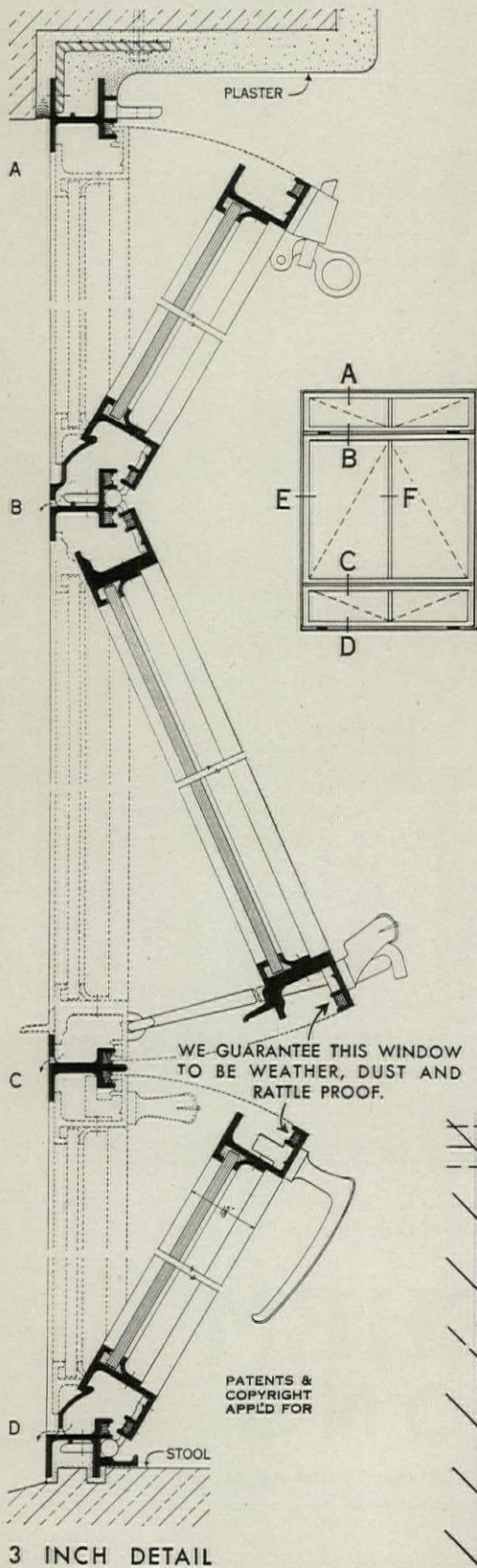
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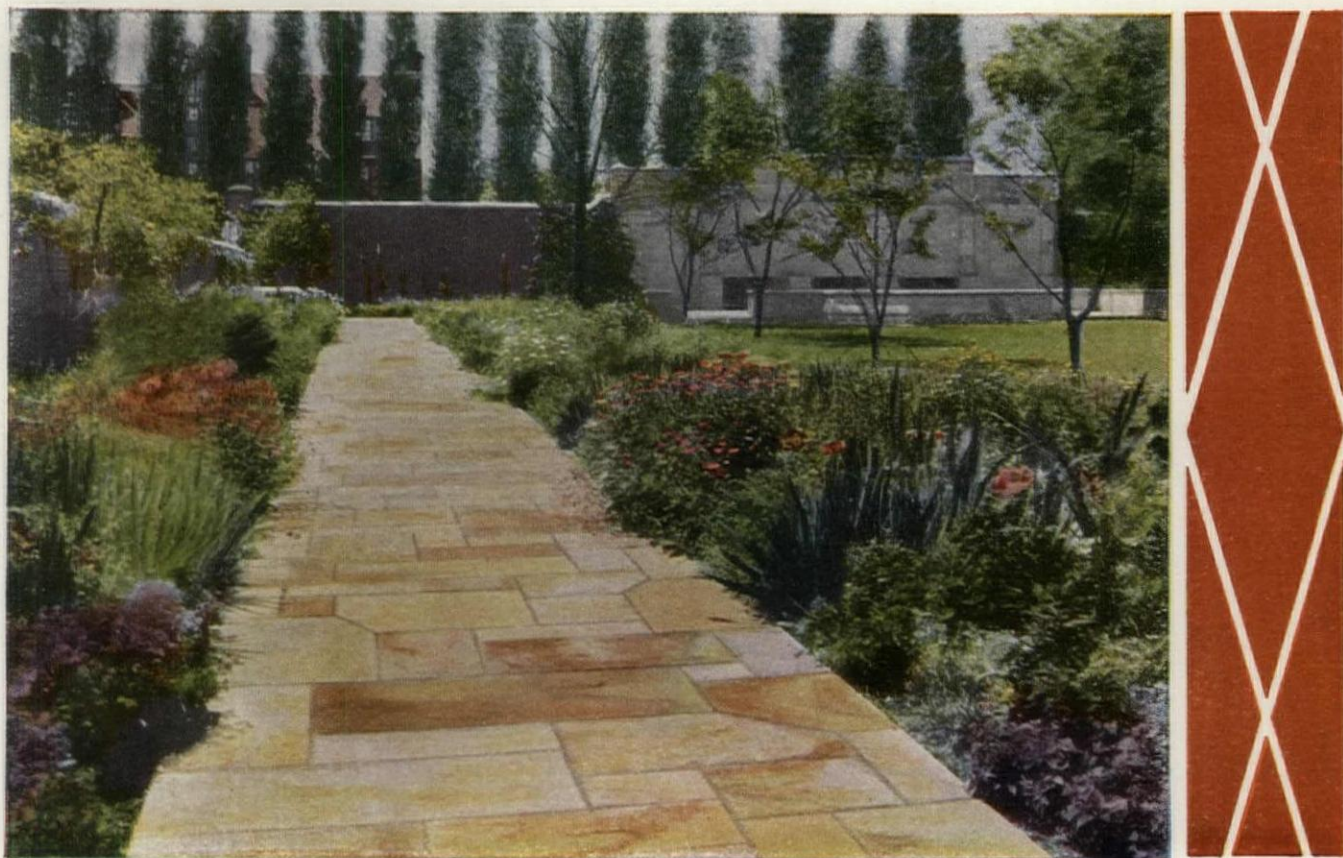
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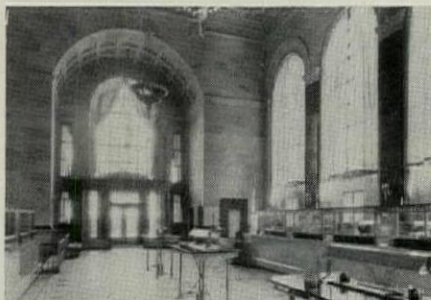
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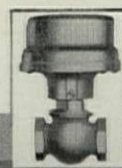
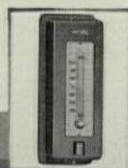
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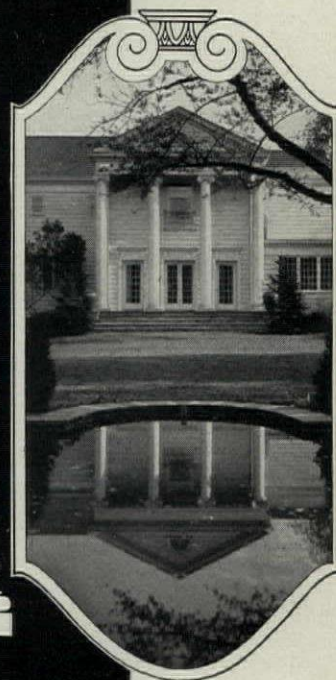
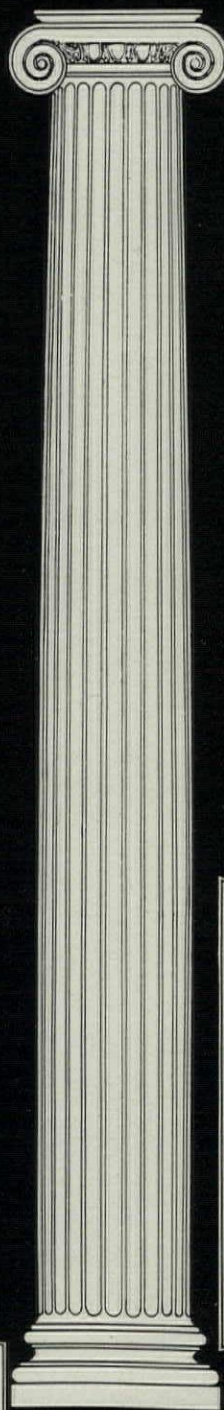
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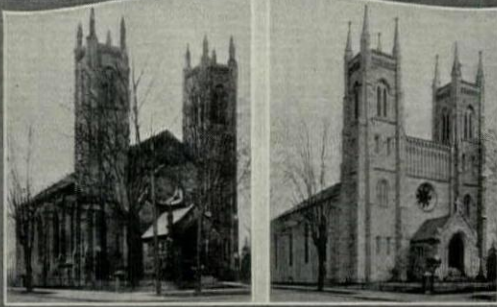


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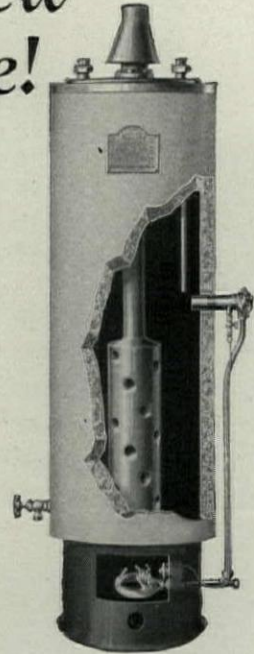
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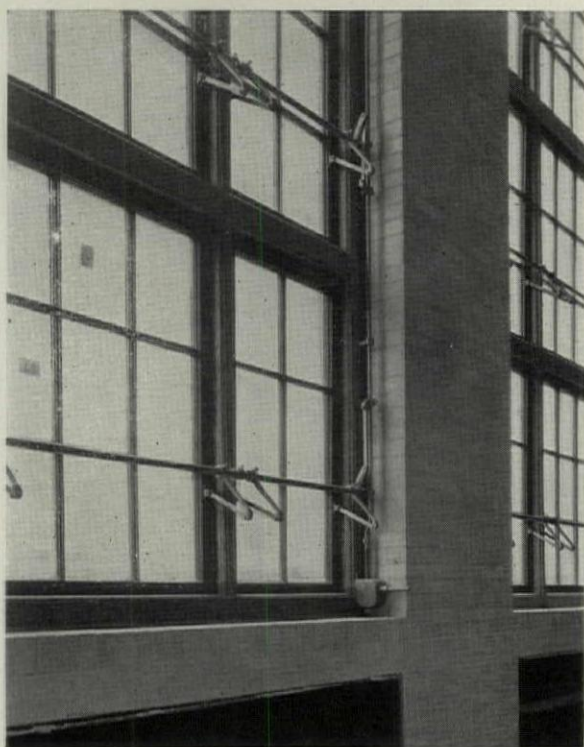
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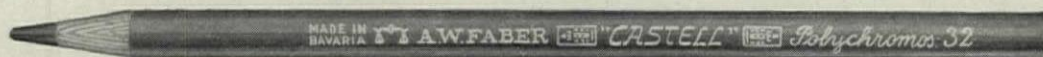
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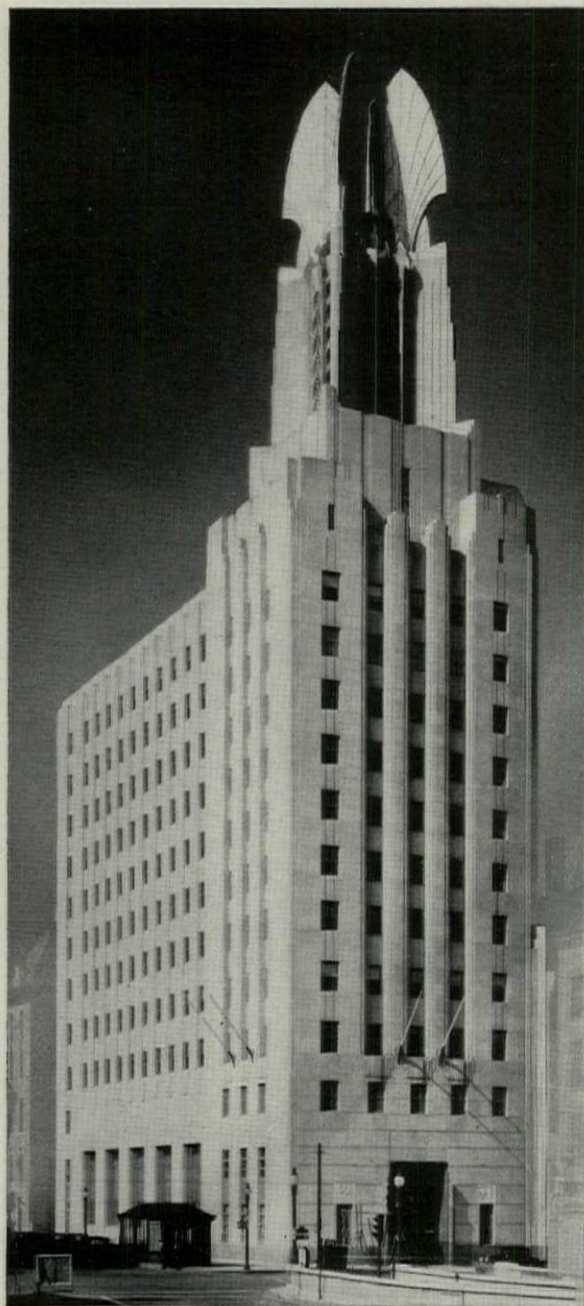
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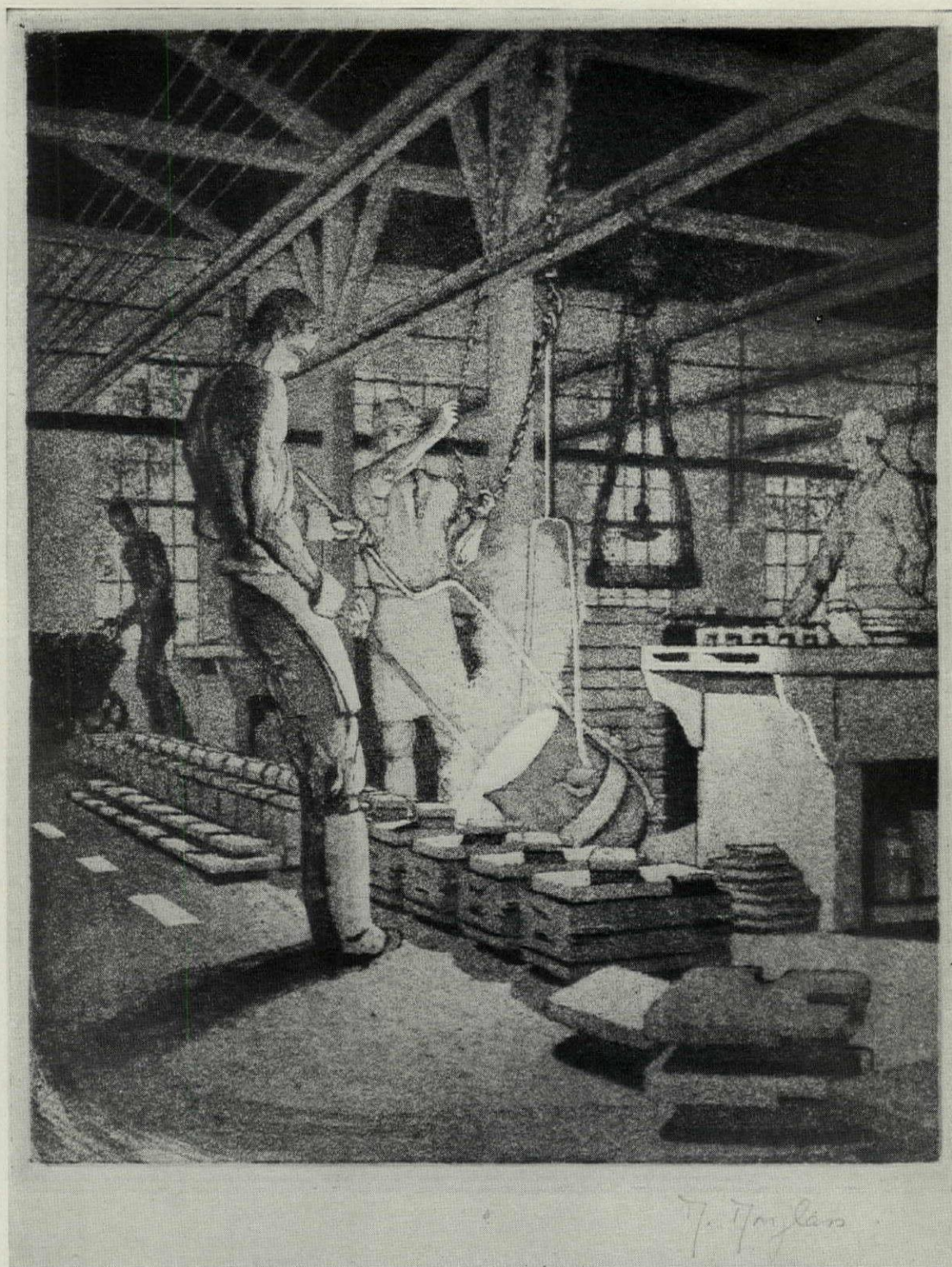
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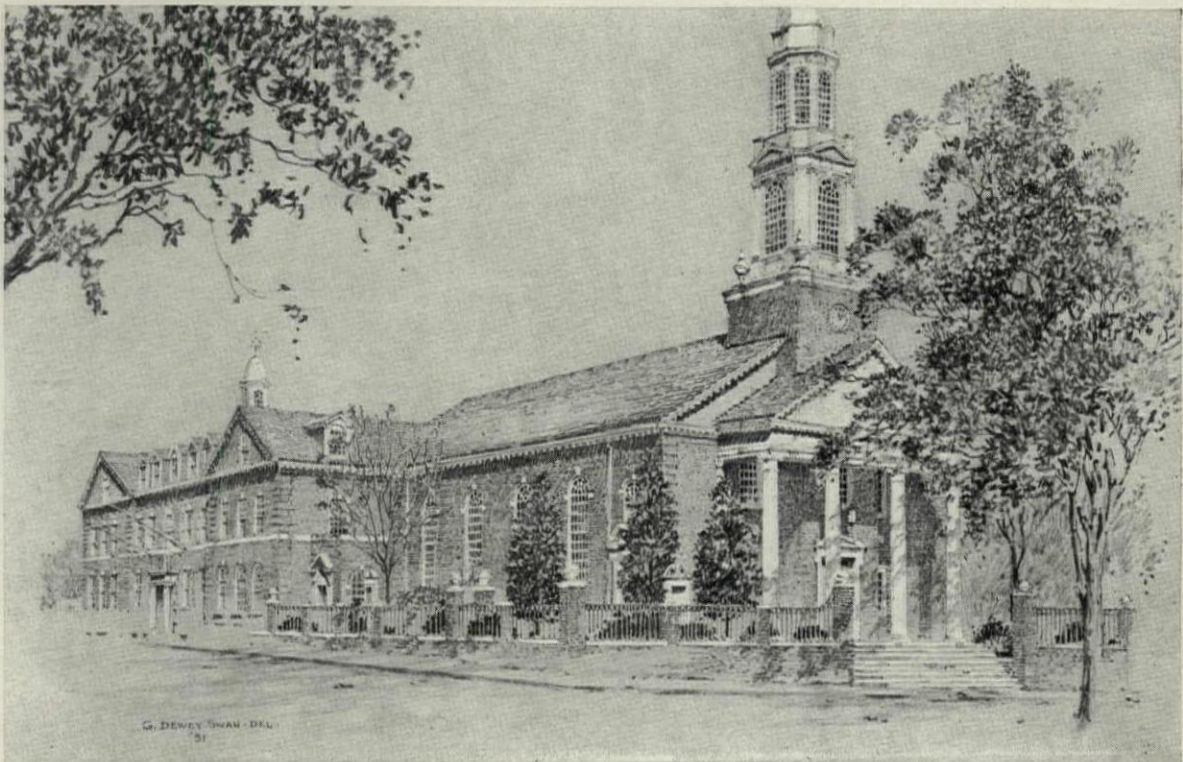
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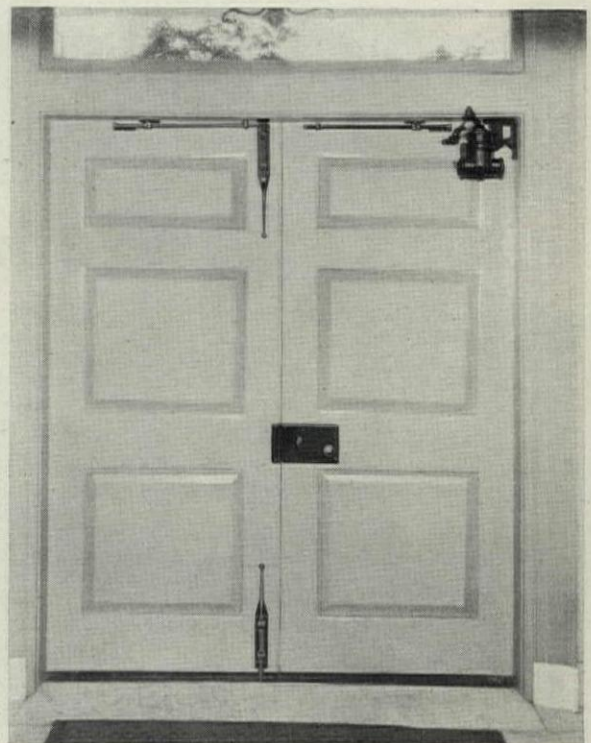
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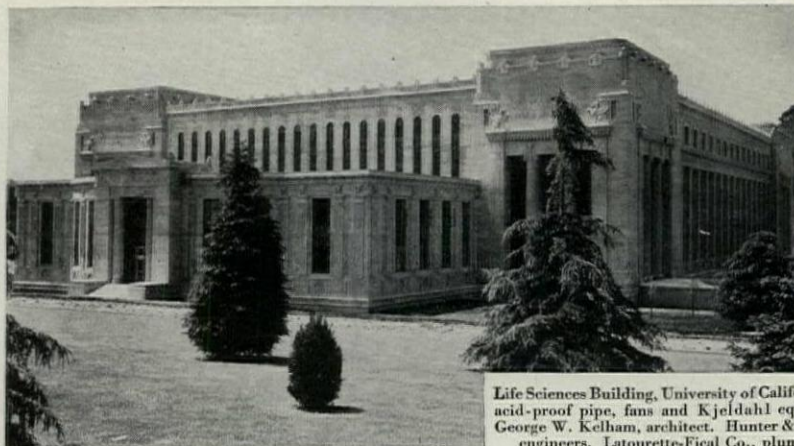
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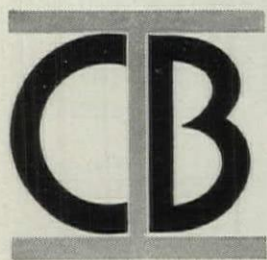
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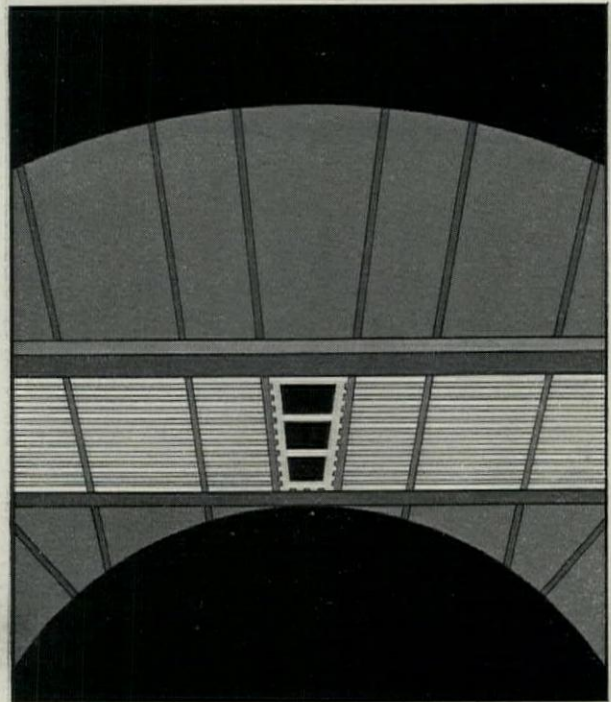


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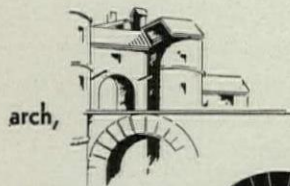
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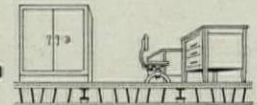


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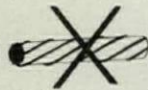


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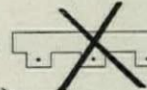


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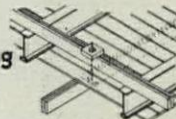


has no joists



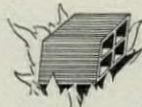
. All stresses are taken by

structural units of known and uniform strength. Hung centering



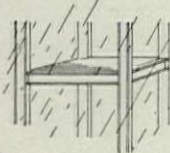
speeds construction, saves cost. Fire resist-

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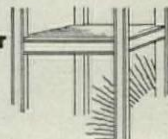


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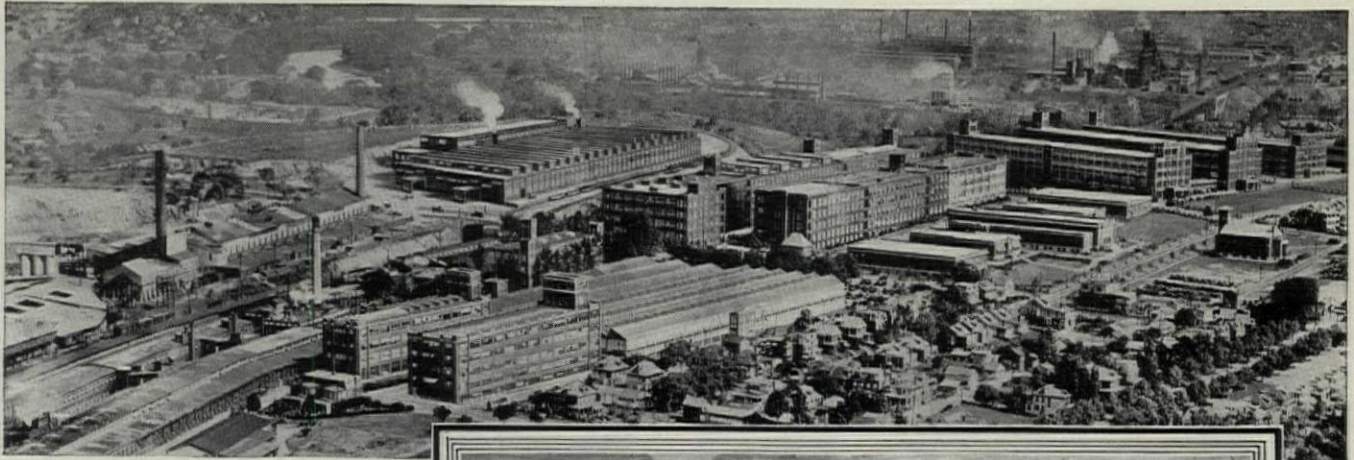
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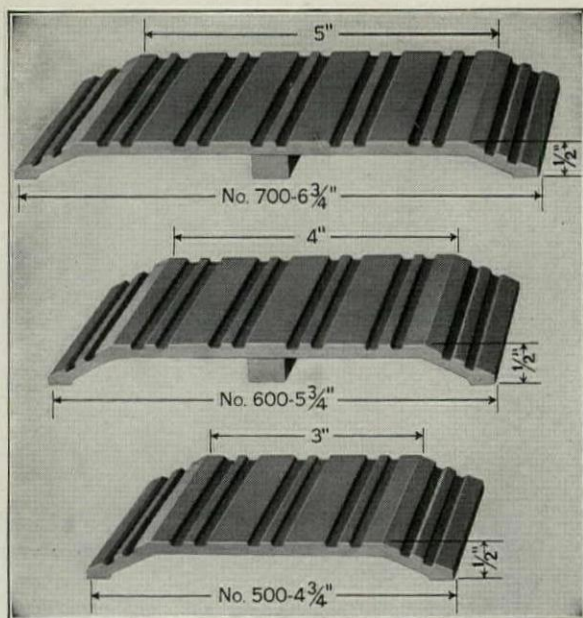
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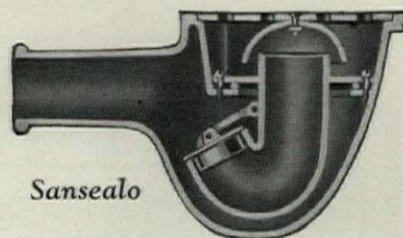
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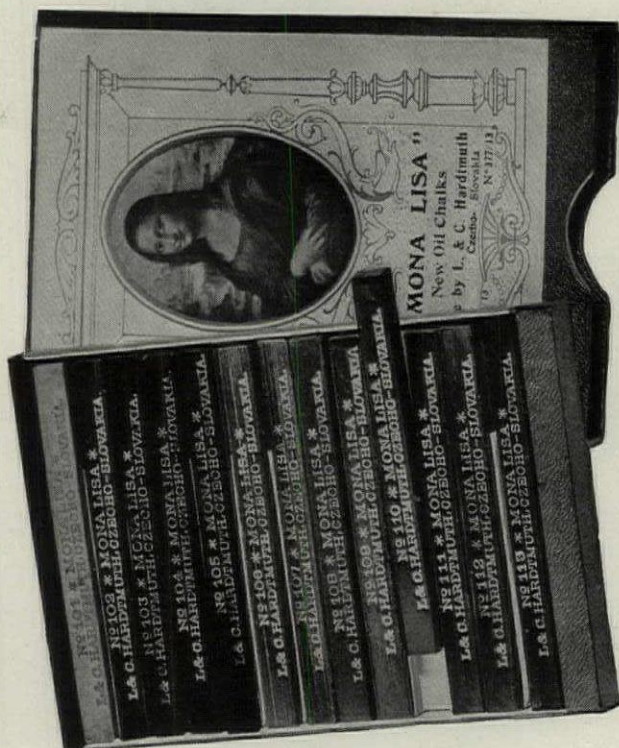
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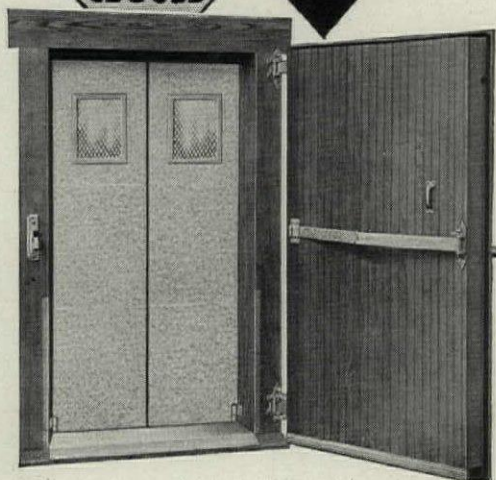
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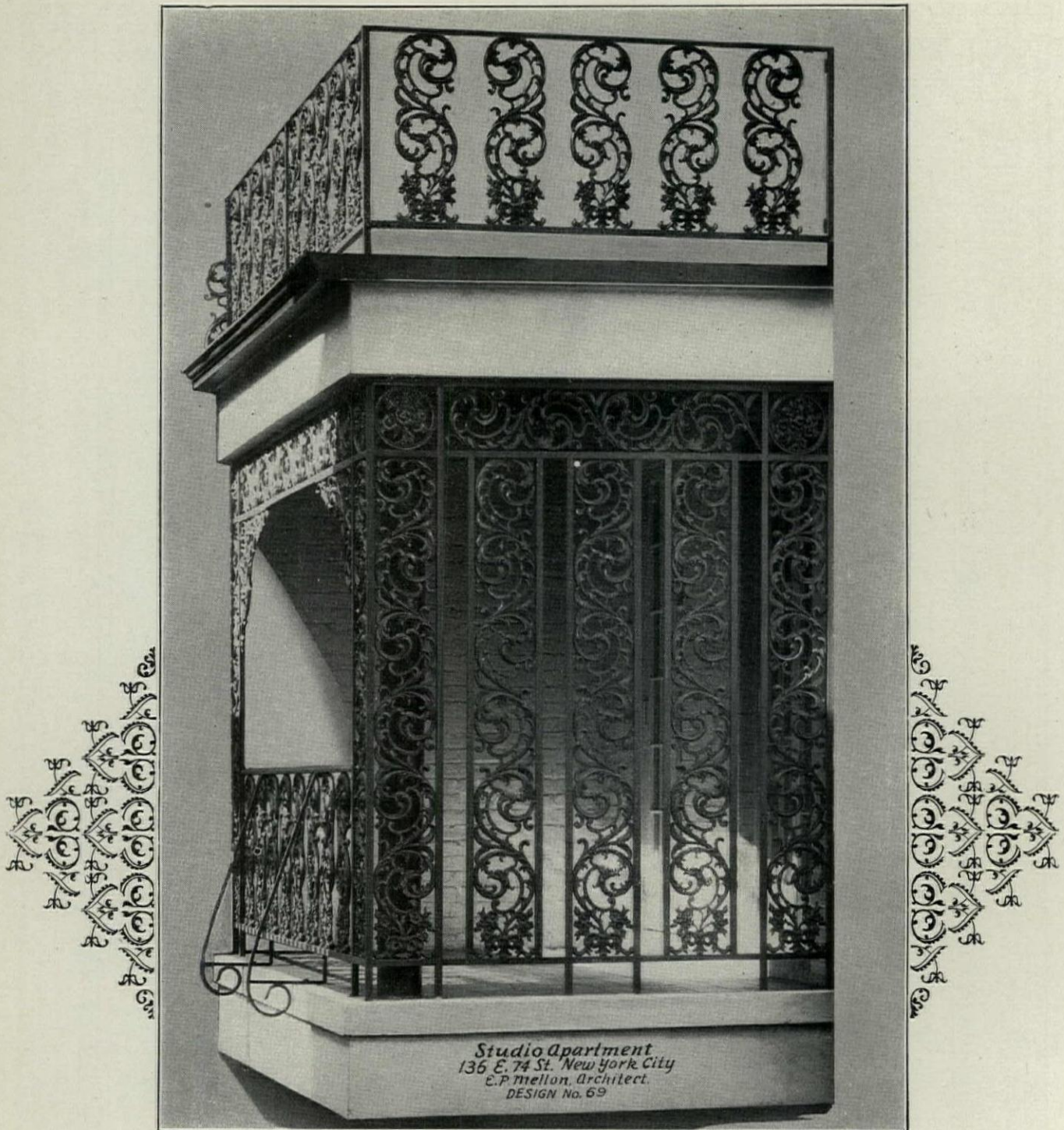
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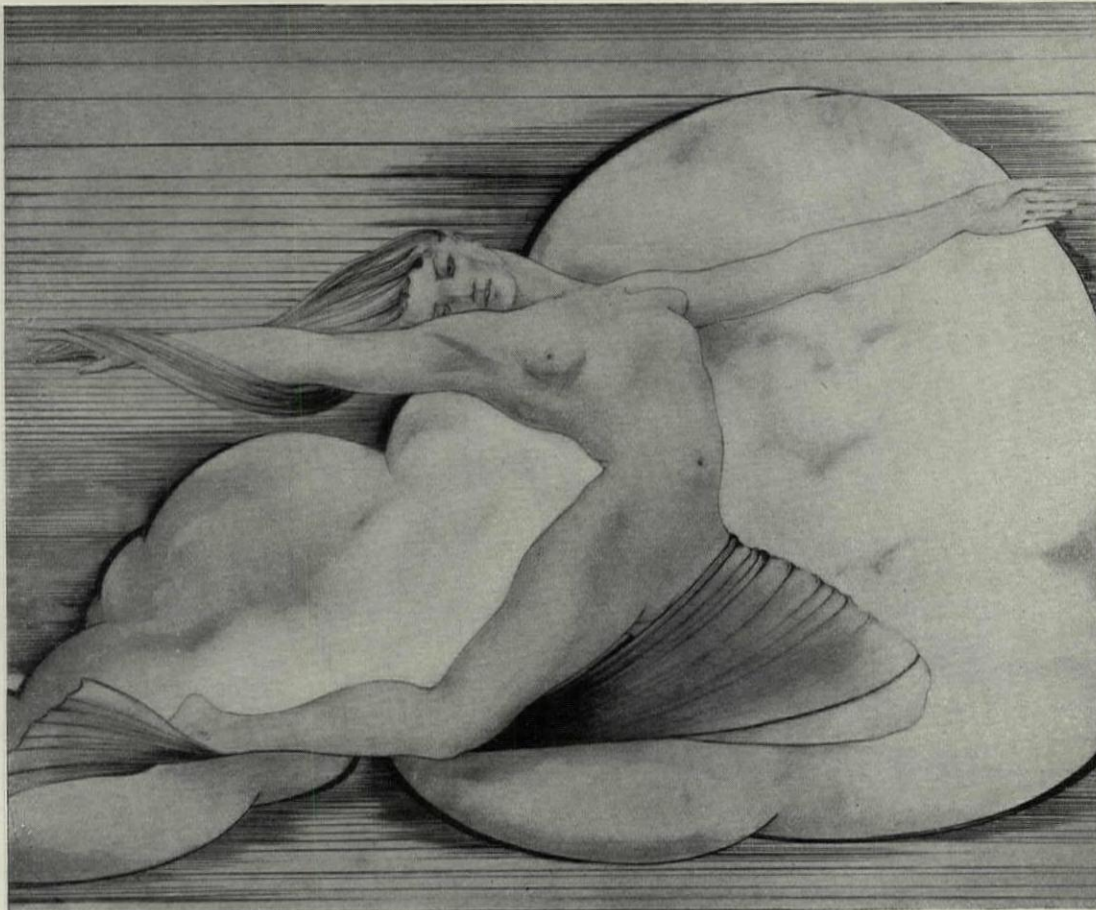
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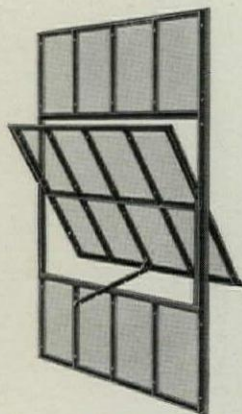
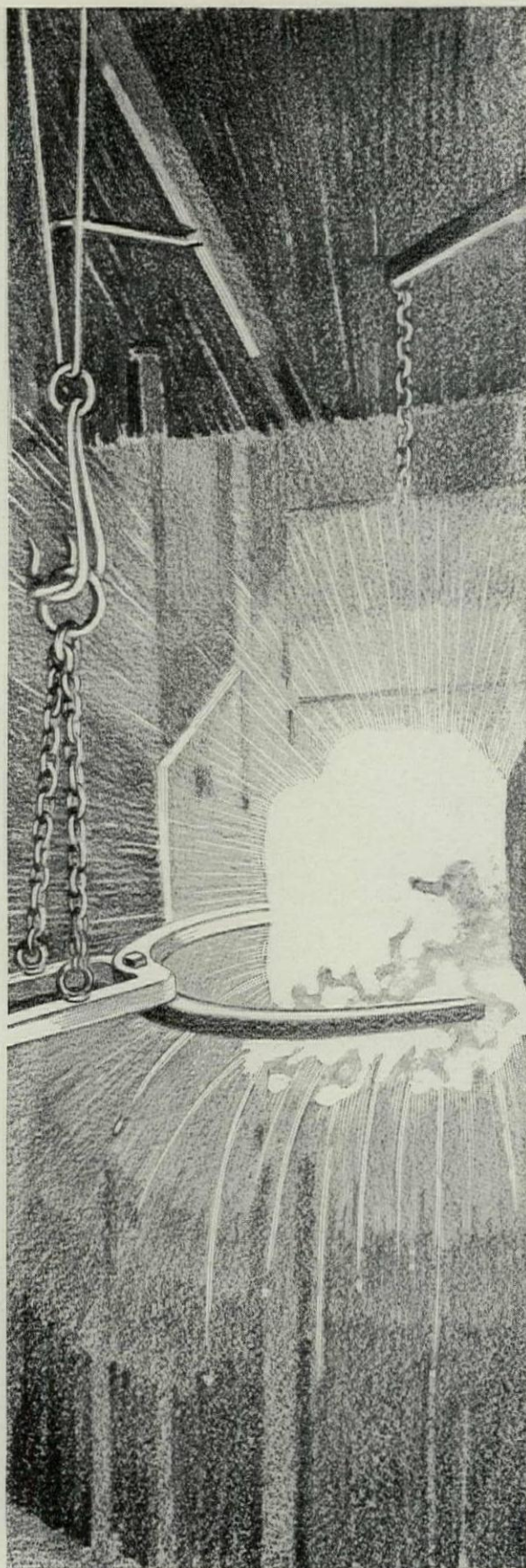
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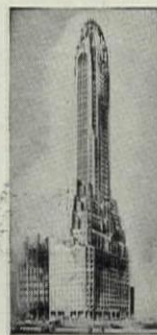
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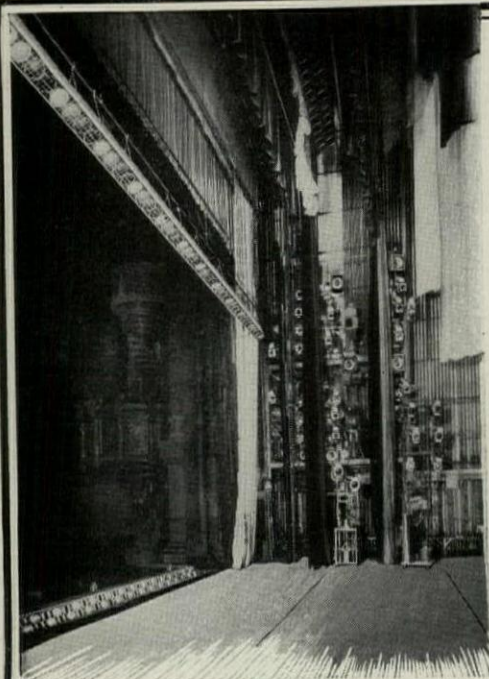
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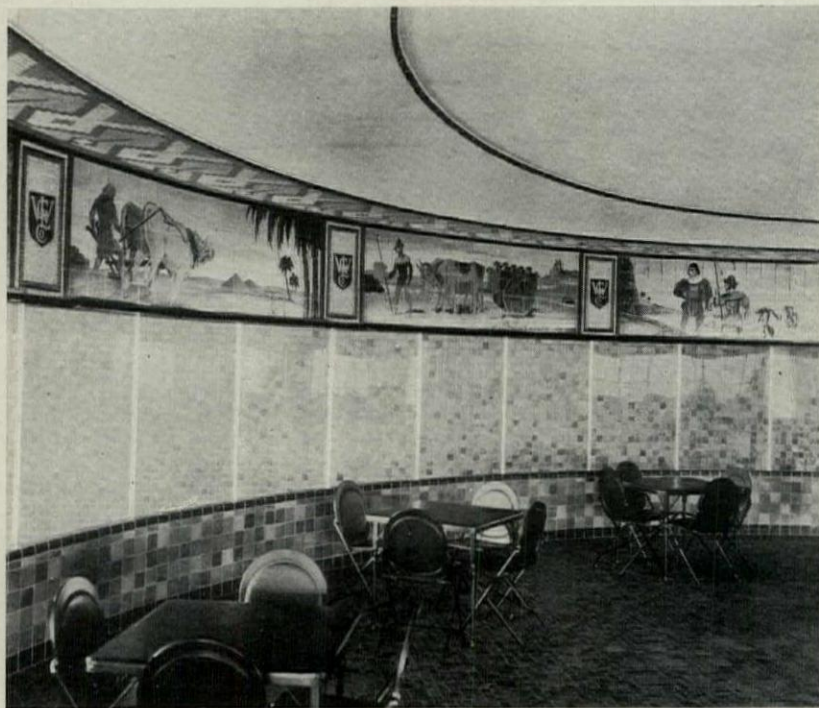
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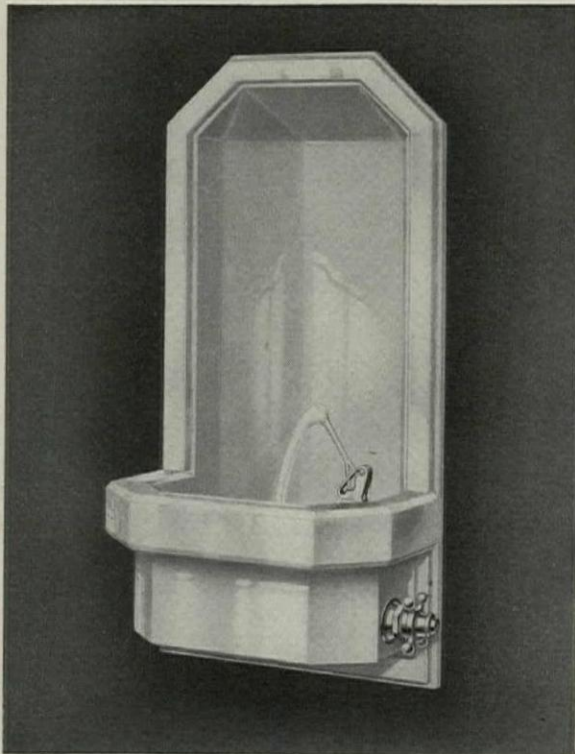
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with new modern features



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A further addition to our already complete and modern line.

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Distinctive Halsey Taylor two-stream projector located above rim of receptor prevents contamination of water outlet in case of stoppage in trap and meets the requirement of the American Public Health Association. (Lip guard and hood are furnished when demanded. Many health authorities, however, do not approve of such guards, realizing that Halsey Taylor two-stream projector with localized drinking mound is preferable to contaminating contact with the guards by the face, nose or lips.)

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Halsey Taylor fountains always have been considered practical because of the localized drinking mound formed in the stream, and automatic control which assures constant height regardless of pressure variation.

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Saves water. Drinking mound makes it unnecessary to project large volumes of water from orifice, as is done in other types of angle-stream fountains in order to provide a satisfactory drink.

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New patented automatic stream control guarantees uniform height of drinking stream under varying line pressures. A satisfying drink can be obtained on pressures as low as five lbs.

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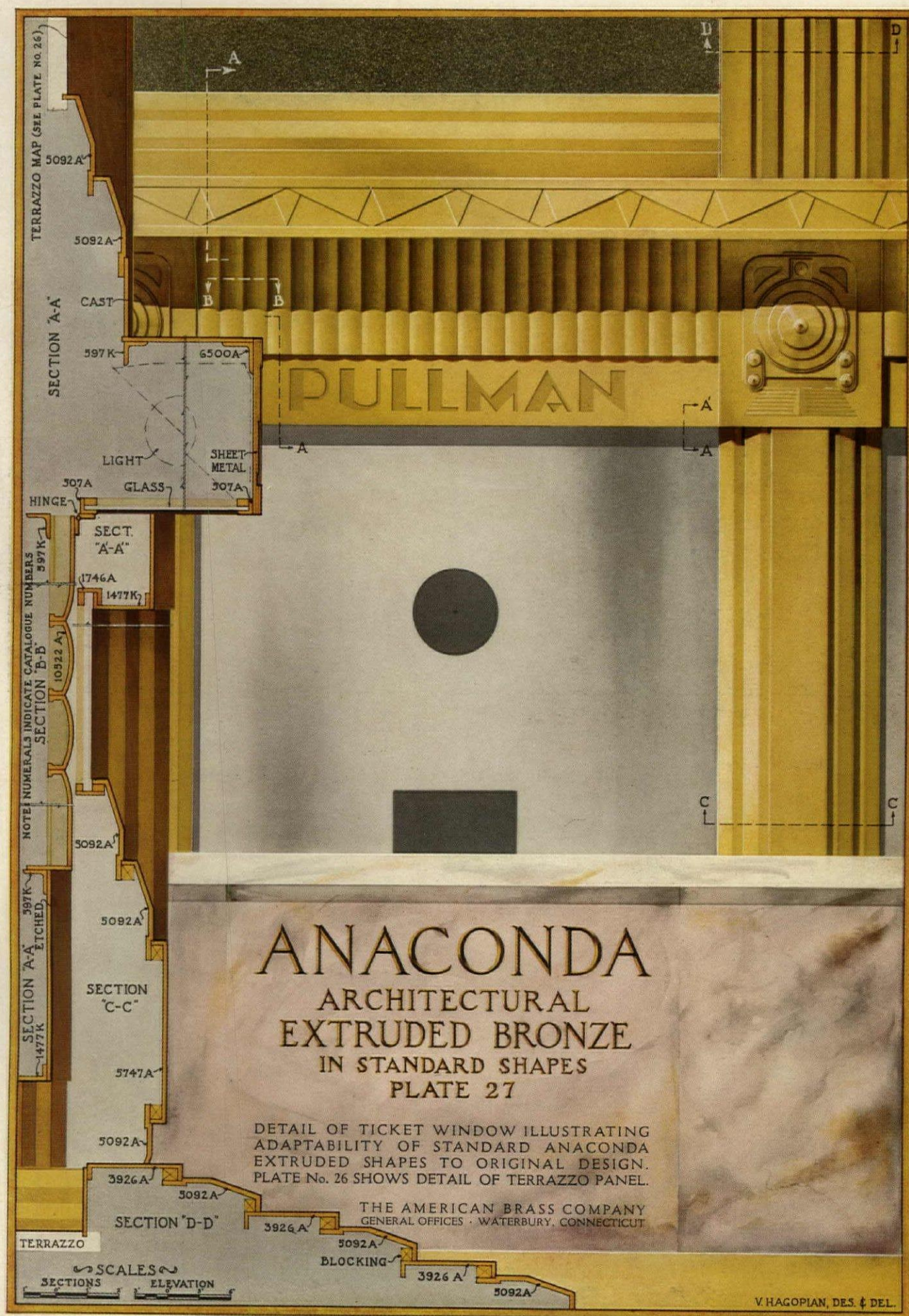
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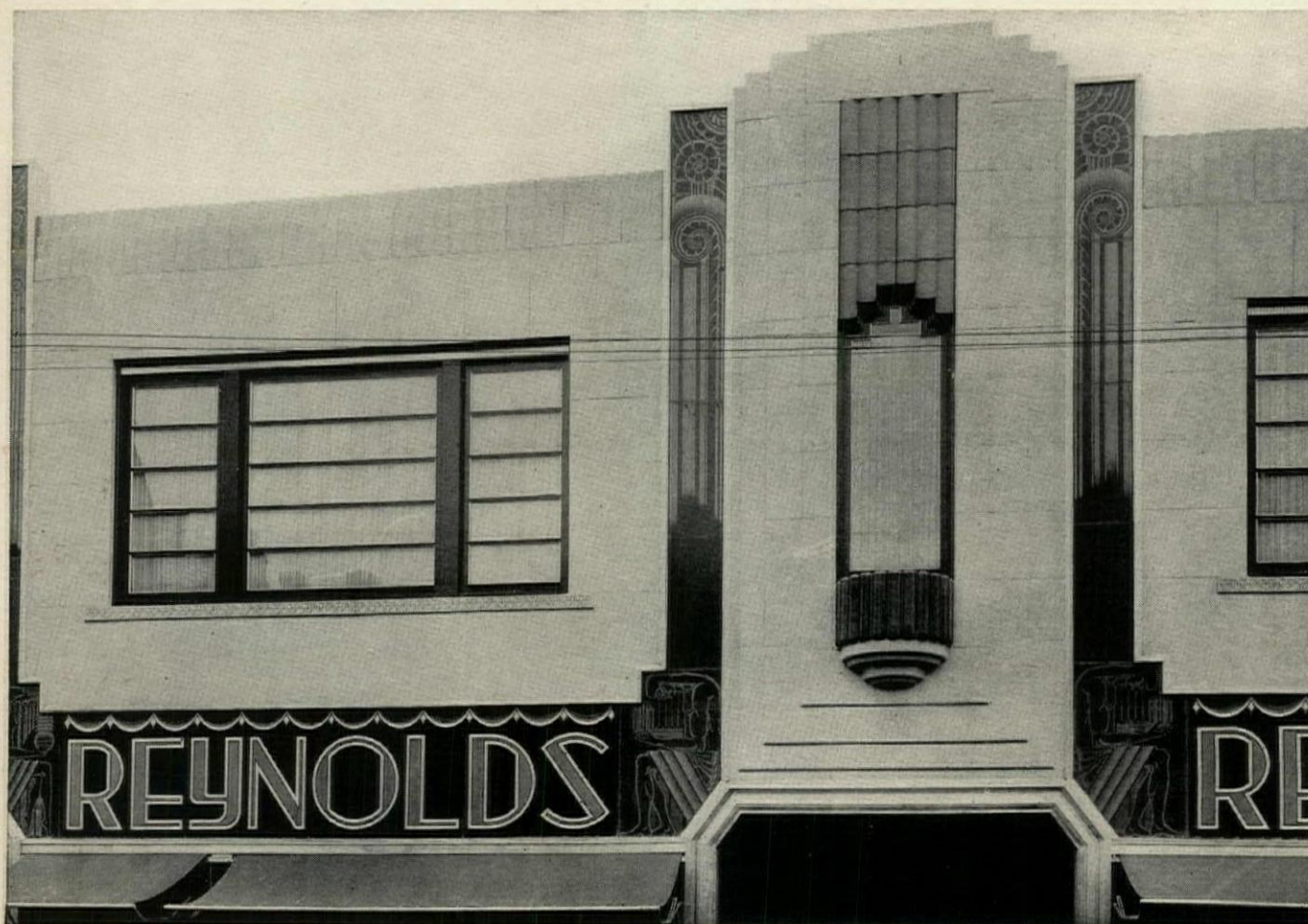
HALSEY TAYLOR

Drinking Fountains

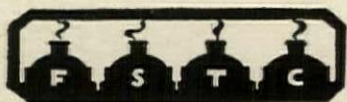




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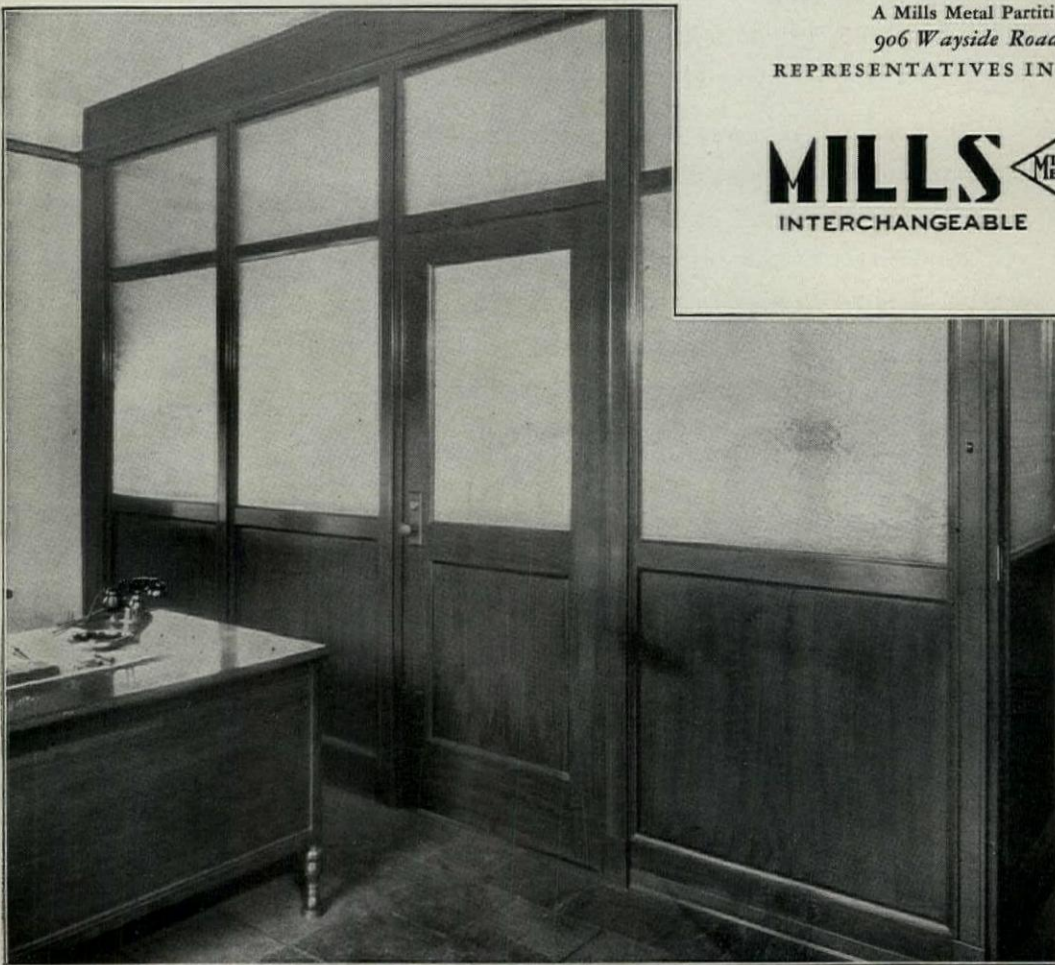
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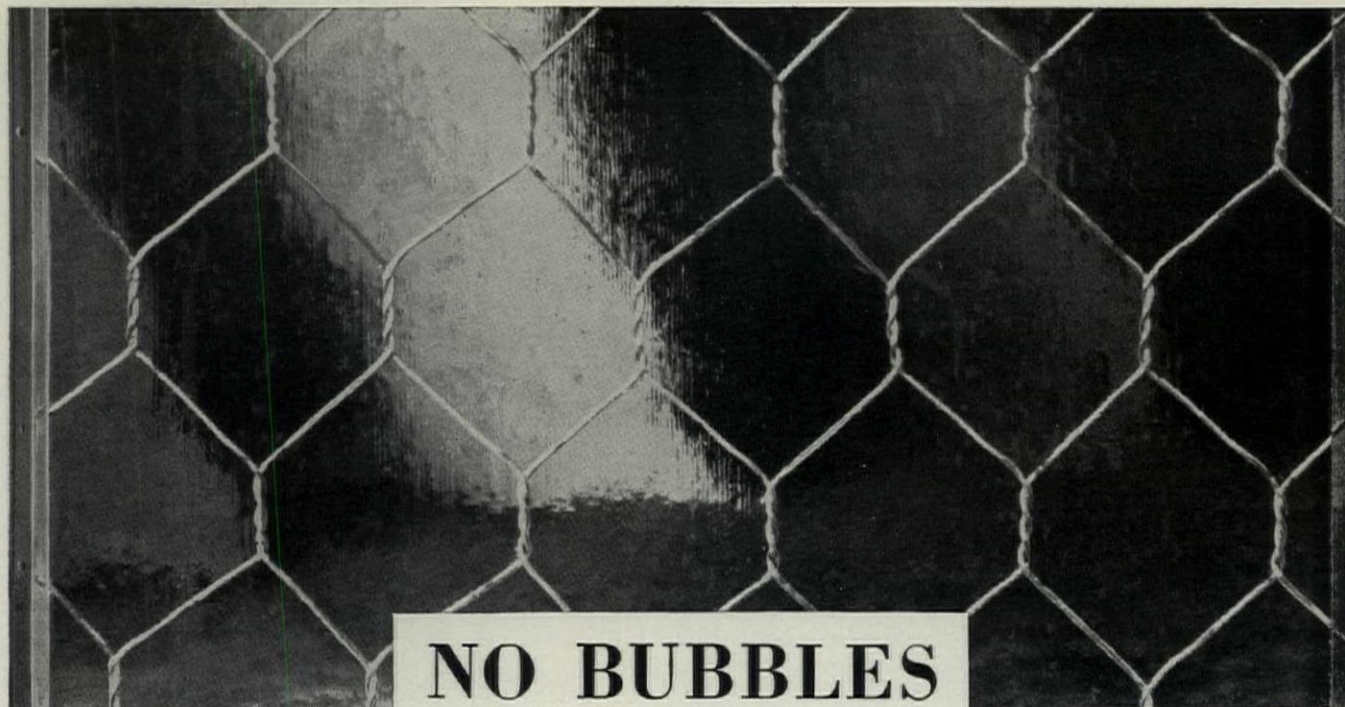
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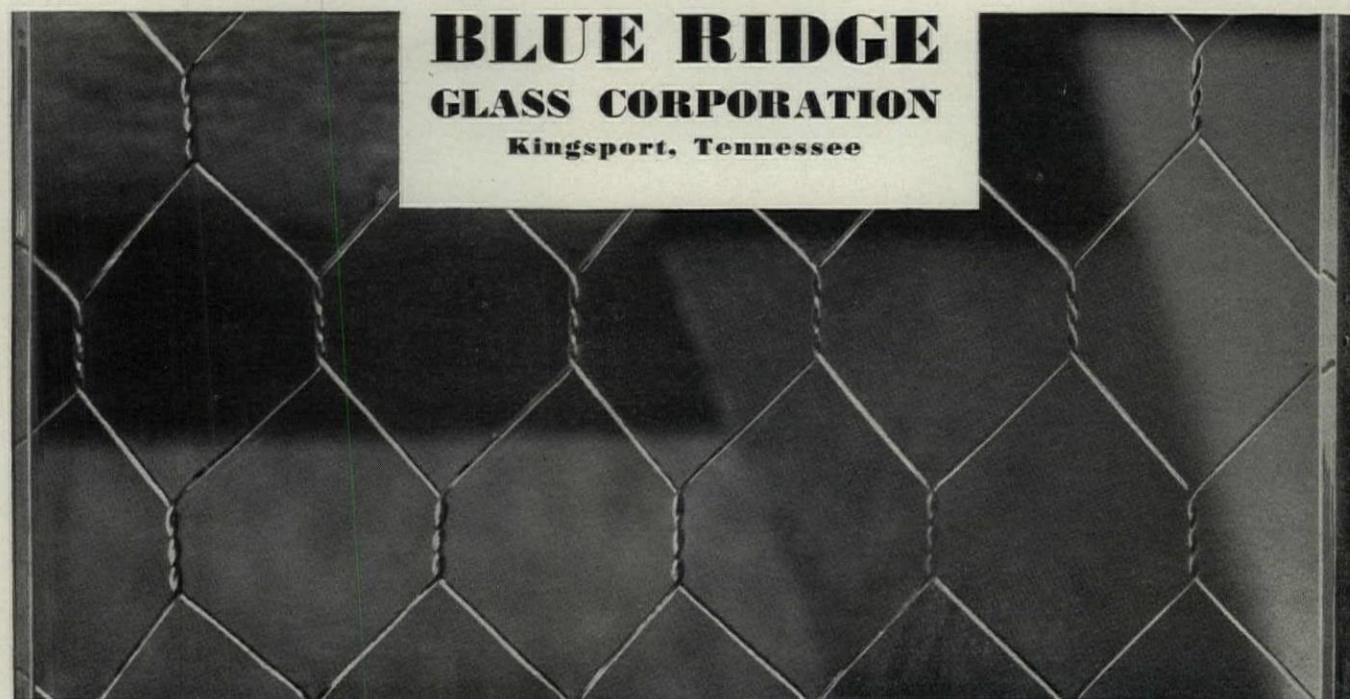


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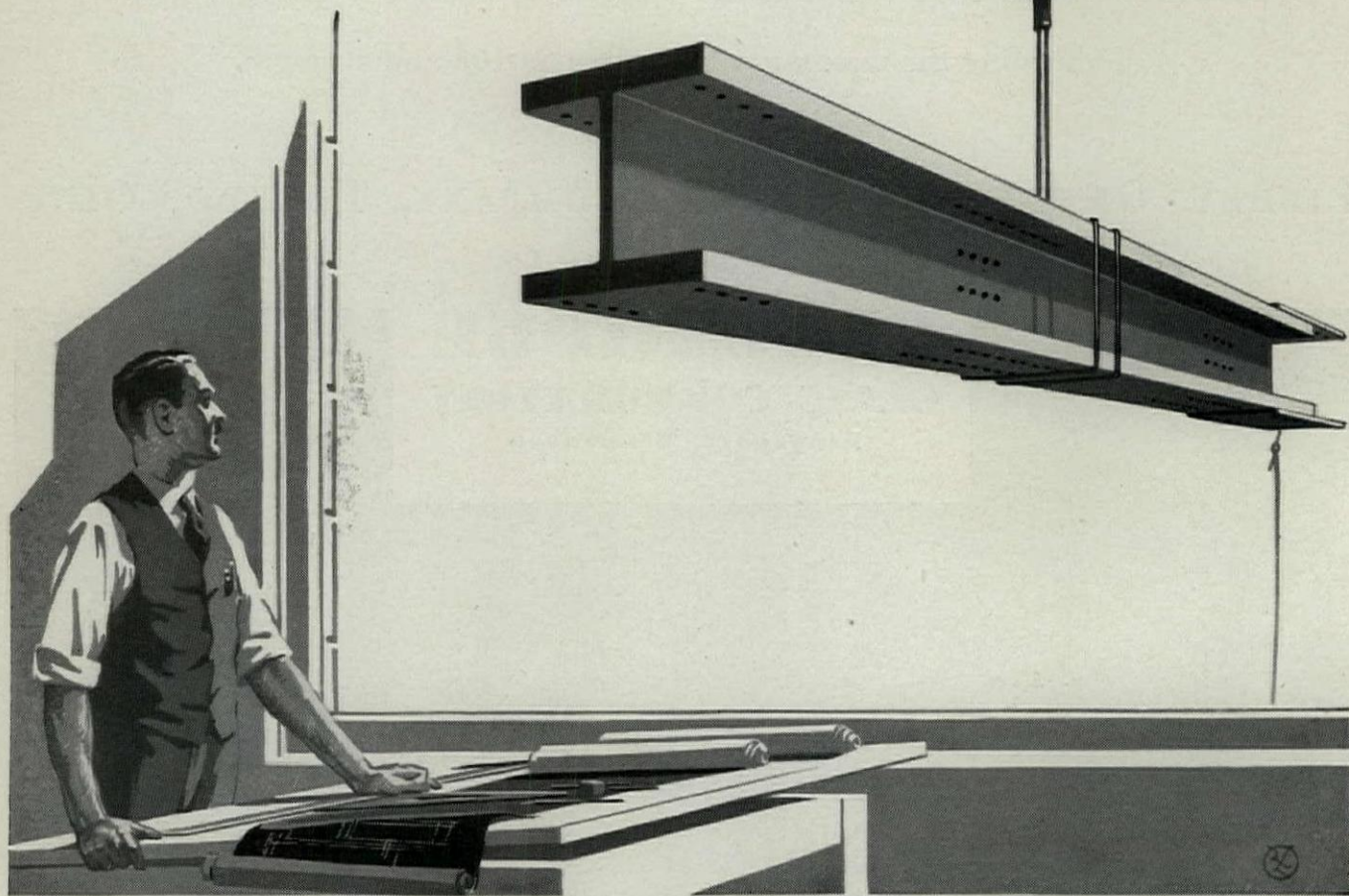
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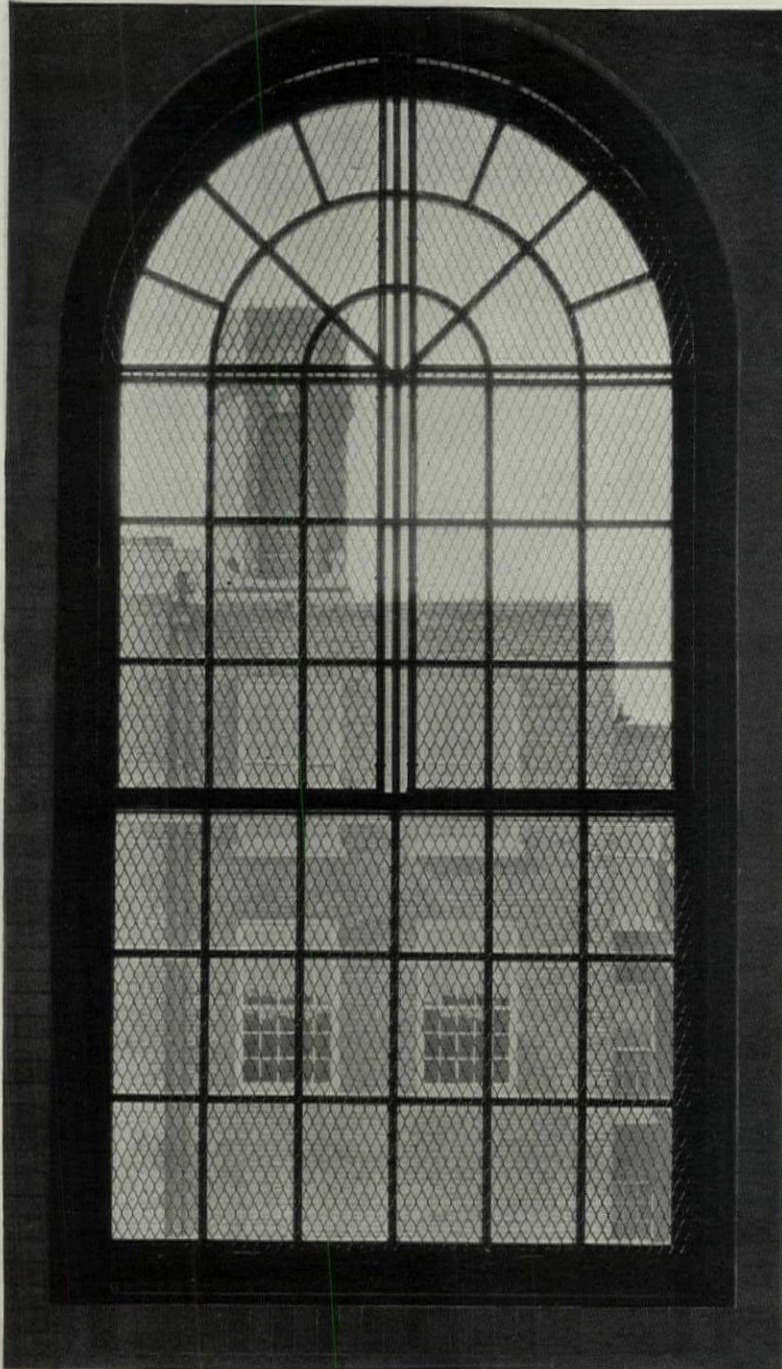
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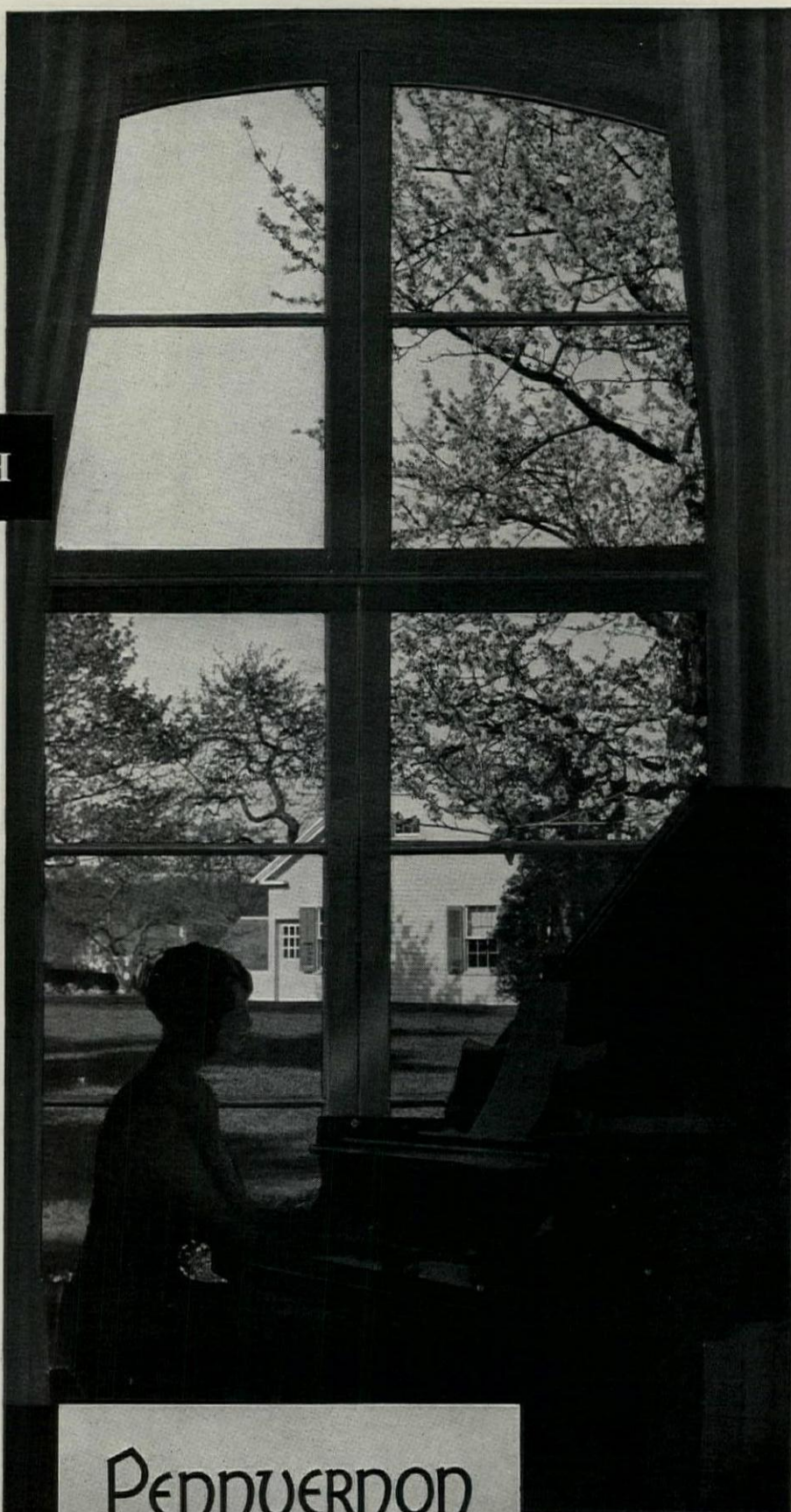
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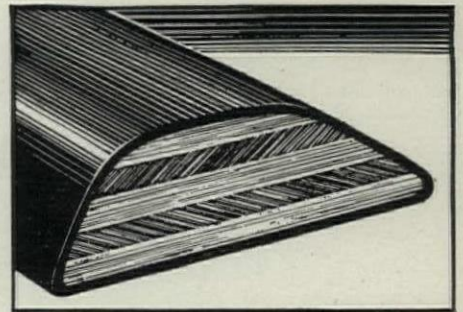
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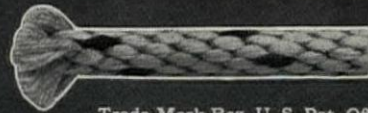


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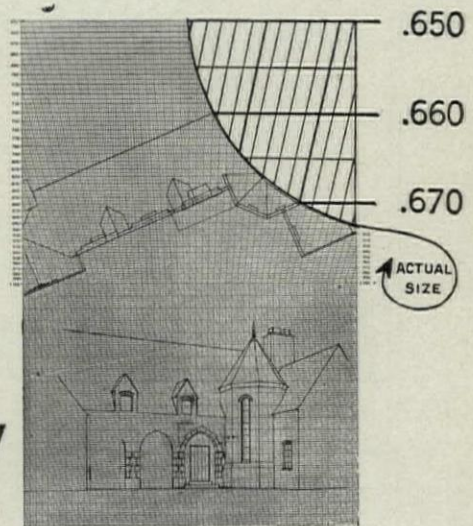
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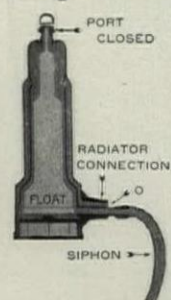
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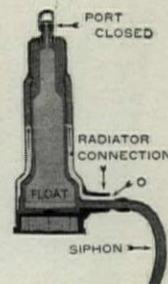
No. 1—If for any reason water completely fills a No. 2 Hoffman Vacuum Valve, the float rises and closes the port. The valve is now a sealed chamber which air must enter before water can run out.

AIR CHANNEL

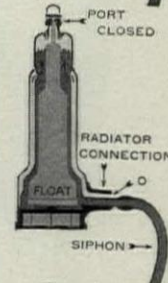
FLOAT

SIPHON

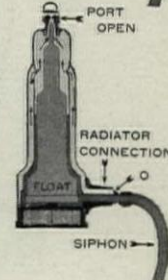
No. 2—Air starts to enter through opening O, and water starts to run out of siphon. But note the difference; instead of bubbling through water as in other valves, the air is compelled to move through special channels, pushing the water ahead of it until these channels are free of water.



No. 3—Air is collecting at top of valve and an equal amount of water has run out. Notice particularly that the port remains closed until the air channels are completely cleared of water.



No. 4—Enough water has run out to permit the float to drop and open the port. But now the outlets of the air channels are above the water line in the valve. There is no water in the path of the air. No matter how forcefully air may be driven into the valve, it cannot blow water out of the open port.



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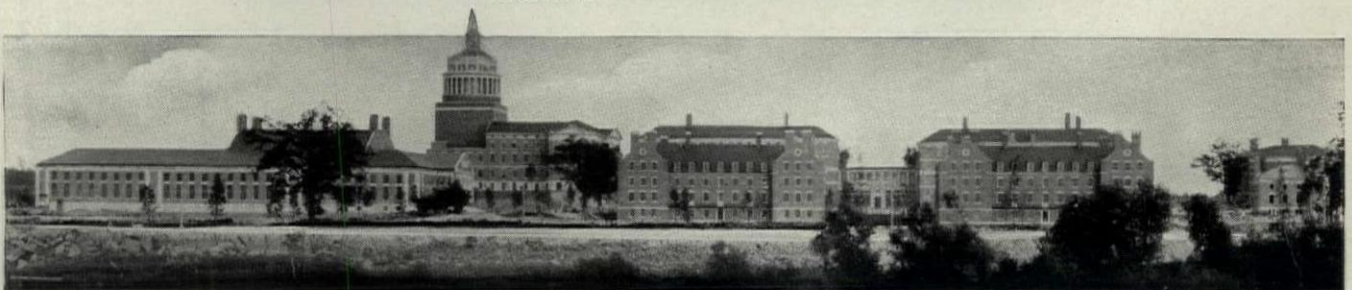
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River Campus, College for Men, University of Rochester, Rochester, N. Y. Architects: Gordon & Kaelber, and their assistants, Philip Merz, Leonard Waasdorp. Consulting Architect: Charles A. Platt. Landscape Architect: Olmstead Bros. Engineer: Allen S. Crocker. General Contractor: A. W. Hopeman & Sons Co. Heating & Ventilating Contractors: Bareham & McFarland; Warnock & Zahndt; Wright & Alexander.

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And because Pondosa shrinks so little and is easily shaped, permitting excellent workmanship, and beauty in line and contour, built-ins hold their dimensions even under exacting conditions of wear and temperature. Joints stay tight. The grain remains flat. Doors open without sticking. Soundly constructed, reasonably maintained, cabinetwork will retain its fine appearance for many years.

You can specify this all-purpose pine for almost any work a softwood is called upon to do. In public buildings, in private homes, or in commercial and industrial buildings . . . anywhere that a light, strong wood is required, this is the pine to use. Specify Pondosa by name. Western Pine Manufacturers Association, Portland, Ore.

“Stubbornness has kept more men from amounting to something than anything else I know. If more fellows had the knack of letting good tools and good workmen shape 'em into something worth while—like the way Pondosa Pine handles—there wouldn't be so many rejects.”

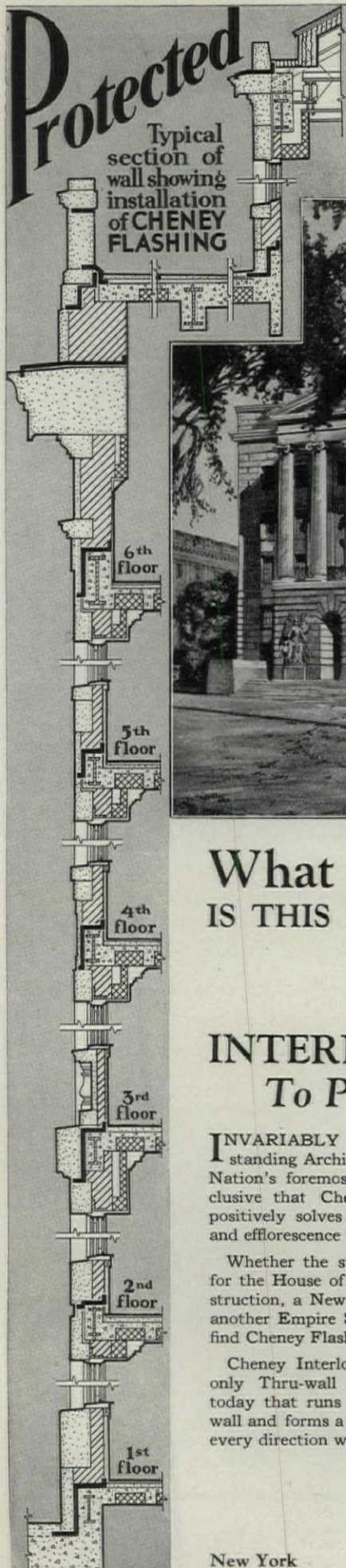
—From the philosophy of the boss-carpenter

PONDOSA PINE
THE PICK O' THE PINES



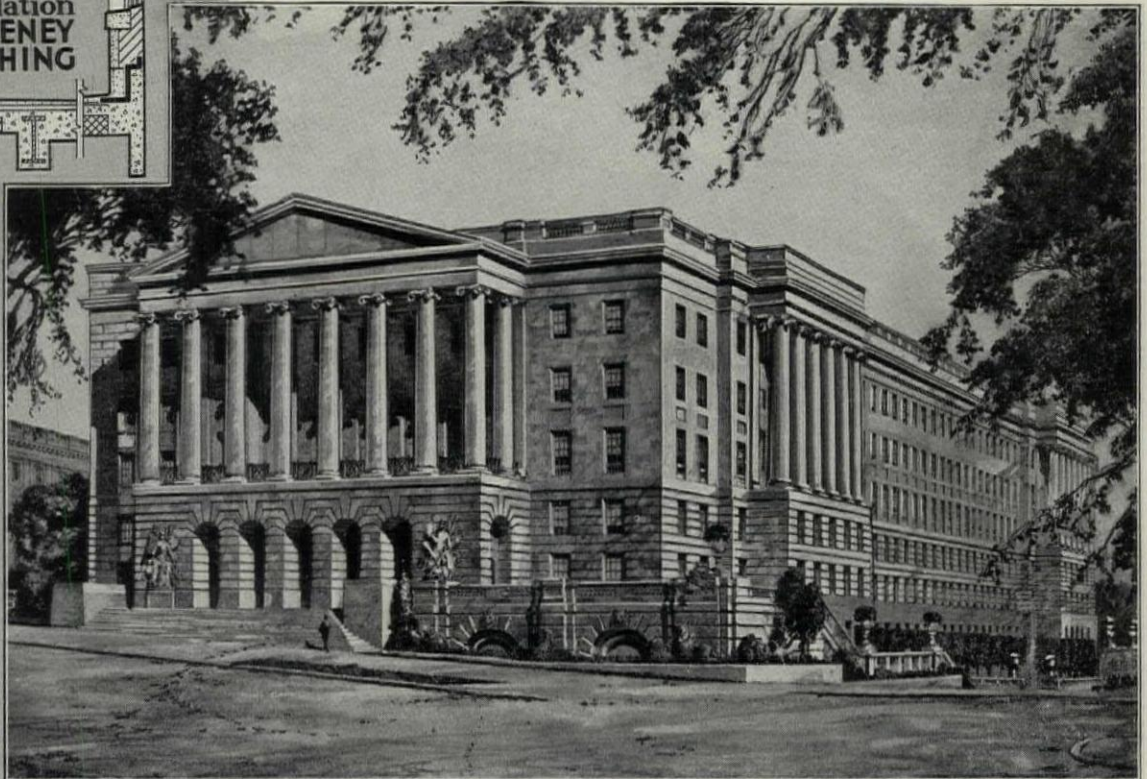
THE FAMILIAR PINE-TREE TRADE-MARK HAS BEEN USED FOR YEARS TO PROTECT HOME OWNERS, LUMBER DEALERS, ARCHITECTS AND BUILDERS





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What Remarkable Proof of Efficiency
IS THIS NATION-WIDE ACCEPTANCE AND USE OF

CHENEY

INTERLOCKING THRU-WALL FLASHING
To Prevent Seepage -- Leaks -- Efflorescence

INVARIABLY specified by the Nation's Outstanding Architects and persistently used by the Nation's foremost Contractors—the proof is conclusive that Cheney Interlocking Wall Flashing positively solves the problems of seepage, leaks, and efflorescence in Masonry Walls.

Whether the structure is a new office building for the House of Representatives, now under construction, a New York-Cornell Hospital Group, or another Empire State Building, generally you will find Cheney Flashing used extensively.

Cheney Interlocking Thru-wall Flashing is the only Thru-wall Copper-flashing on the market today that runs completely through the masonry wall and forms a positive unbreakable key-bond in every direction within the mortar bed.

The slight additional cost of Cheney Flashing is many times offset by the elimination of dowels—as in the Empire State Building, where the resultant saving made the cost of the Cheney Flashing less expensive than plain copper.

Cheney Flashing is made of 16-ounce copper, comes to the job ready-made to exact shape—and slips easily into the mortar bed as the masonry progresses without soldering or loss of time; the ends hook together to form a continuous flashing.

Cheney Service—Our engineers are available to assist in supervising installations and detailing plans and specifications. There's no obligation. Valuable information is contained in the new Cheney Catalog, which will be sent gladly on request.

The Cheney Company

Winchester, Massachusetts

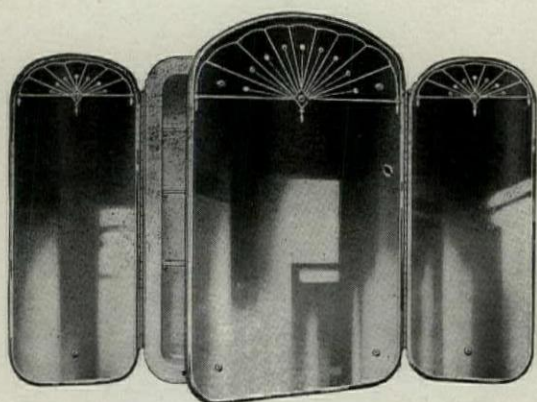
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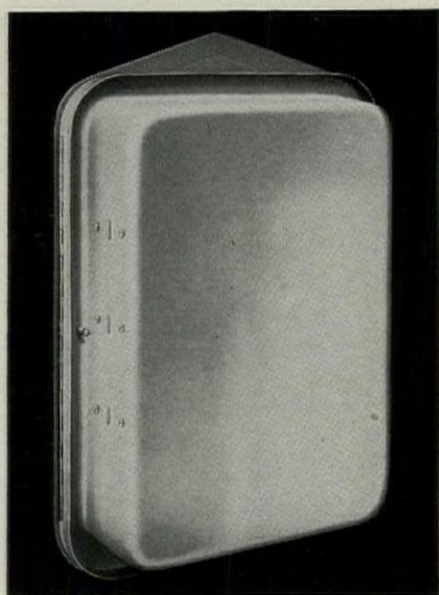
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Consider *this* Point in Cabinet Construction



The Imperial is made in two sizes. No unsightly space is visible between side wings and center mirror. Hinges and all other metal parts, ordinarily nickel plated, are chromium plated in this model.



Corcoran Cabinets are the Original and Only One-Piece Steel Cabinets. No cracks—no seams—no welded joints—no raw edges. The above photograph illustrates the rounded corners and seamless, jointless cabinet body found only in Corcoran Cabinets.

Entire Body Drawn from One Piece of Steel

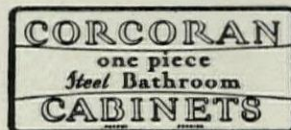
An advantage? Yes!—for it affords positive protection against wall moisture and provides real sanitation through rounded corners, inside and out, absence of crevices, seams and joints.

It is this unique method of construction that individualizes Corcoran Cabinets. In homes, apartment buildings, hotels, in fact, anywhere, they arrest attention. Superior manufacturing, plus several exclusive and patented features, have won for Corcoran a following among architects and builders that is indeed gratifying.

42 MODELS

Venetian Mirrors, Vanity with side wing mirrors, regular insert type models and hotel cabinets. All types furnished in small and large sizes.

Write for our new catalog, illustrating the various models.



Stocks Carried in Principal Cities

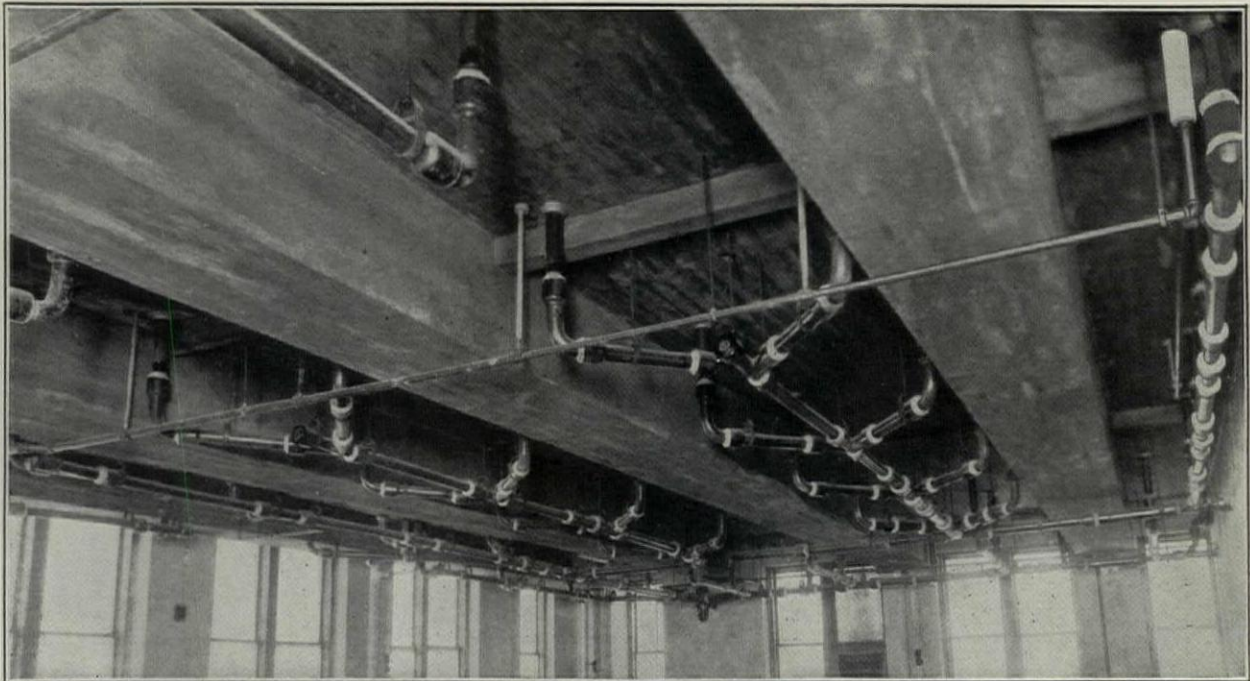
CORCORAN

The CORCORAN MANUFACTURING COMPANY

Norwood

Dept. PP-531

Cincinnati, Ohio



KNIGHT-WARE Waste Lines in Columbia Presbyterian Hospital Centre

The above photo was taken in the 10th floor laboratory and shows quite clearly the method of hanging KNIGHT-WARE Pipe and Fittings. There were 96 Outlets on this floor. KNIGHT-WARE was used exclusively in this structure for all Acid Proof Waste and Ventilating Lines.

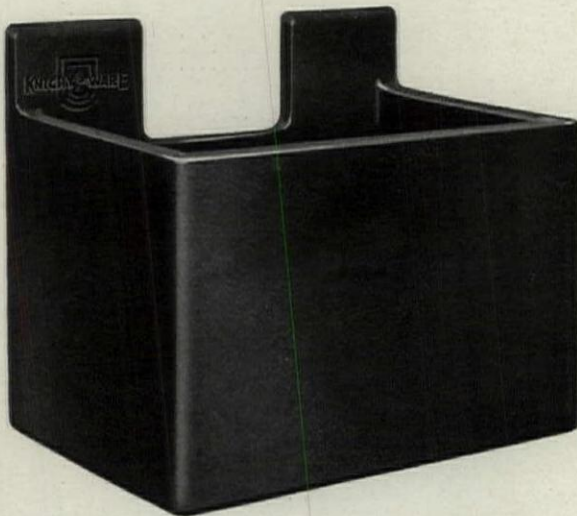


Figure 238—Laboratory Sink with Back cut out for Trough

We manufacture any and all designs of Acid Proof Laboratory Sinks, Acid Sumps and Catch Basins, Ventilating Flue Caps and any acid proof equipment for the building.

Our new 48 page catalog on KNIGHT-WARE LABORATORY EQUIPMENT

containing complete details and fully illustrated will be mailed upon request. Send for your copy.



Safe from Attack by Corrosives

KNIGHT-WARE Acid Proof Chemical Stoneware Waste, Drain and Ventilating Lines installed into your building is permanent insurance against attack by acids or corrosives so long as the building shall stand.

Further, KNIGHT-WARE is not expensive; in fact costs less than many other so-called acid resisting materials. It is easily and economically installed, only one hanger being required per length of pipe or fitting. Joints are readily made that are acid proof and will stand far in excess of any pressure they will ever be called upon to withstand.

Experience and knowledge derived from our many KNIGHT-WARE installations are yours for the asking. May we be of service?

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Extending research facilities in the interest of a more complete service to the architectural profession is the purpose of the newly organized association of oak flooring manufacturers known as Southern Oak Flooring Industries, with headquarters in Little Rock, Ark. Ralph E. Hill, formerly of the Long-Bell Lumber Corporation, is secretary-manager. The oak flooring industry of the United States, represented by its largest mills, comprising two-thirds of the oak flooring business of the country, has recognized the necessity for providing a more thorough and detailed information service for architects. For this purpose the association has established a highly competent research division with able architectural counsel employed in analyzing the factors connected with construction in which oak flooring can be utilized to best advantage. It is expected that the association will be ready this year to announce new uses which will effectively feature oak flooring in the changing picture of American architecture.

That it is possible to apply a sheet steel roof deck to a warped surface which curves in two or more directions at the same time has recently been demonstrated in a successful manner in the Paramount Theatre at Fort Wayne, Ind. The main difficulty that had to be overcome was in the installation. On a flat or on a sloping roof where the purlins are horizontal and parallel in at least one direction, the installation of a steel roof deck is not a difficult one, but in the curved or dome type of roof, such as used on the Paramount Theatre, while the purlins may be an equal distance apart, the distance from surface to surface is variable and must be accurately computed. A Holorib steel roof deck was designed for this building, and by estimating the rate of increase of the distance between the purlins, it was possible to lay out the entire job, and have the sheets cut to the exact length necessary.

Announcement is made of the formation of the Florida-Louisiana Red Cypress Co., Jacksonville, Fla., which is to serve as a marketing organization to handle the entire Tidewater red cypress output of the following mills: Wilson Cypress Co., Putnam Lumber Co., Glenwood & Shamrock, Cummer Cypress Co., A. Wilberts' Sons, Brooks-Scanlon Corp.

The B. F. Sturtevant Co., Hyde Park, Boston, Mass., announces the introduction of the Sturtevant Filtricooler, a compact air washing and air conditioning unit suitable for a wide range of applications, especially public buildings and theatres. The Filtricooler was designed to cool, filter and humidify as much air as a nine-foot air washer, where both are handling the same amount of water at the same water pressure and with an equal air velocity.

The Weyerhaeuser Forest Products, St. Paul, Minn., announces the introduction of a new precision structural lumber, 4-Square Guide Line Framing, the latest addition to the 4-Square line which was introduced to the lumber trade three years ago in packaged form. It is now being produced in all standard sizes from 2 x 4 to 2 x 12, and in all standard lengths from 8 to 20 feet. This new product is dressed on four sides, and both ends are re-buttled square and smooth which eliminates the necessity of squaring the ends before using and insures a perfect joint at the ends with less effort. Each piece is cut to exact length and is stamped with the Weyerhaeuser guarantee as to grade, species and seasoning. Another feature of this new lumber is that it is marked on one face every inch of its length with guide lines which extend the entire width of the lumber. These machine accurate inch calibrations, pressed lightly into the face, serve as reliable measurements from either end.

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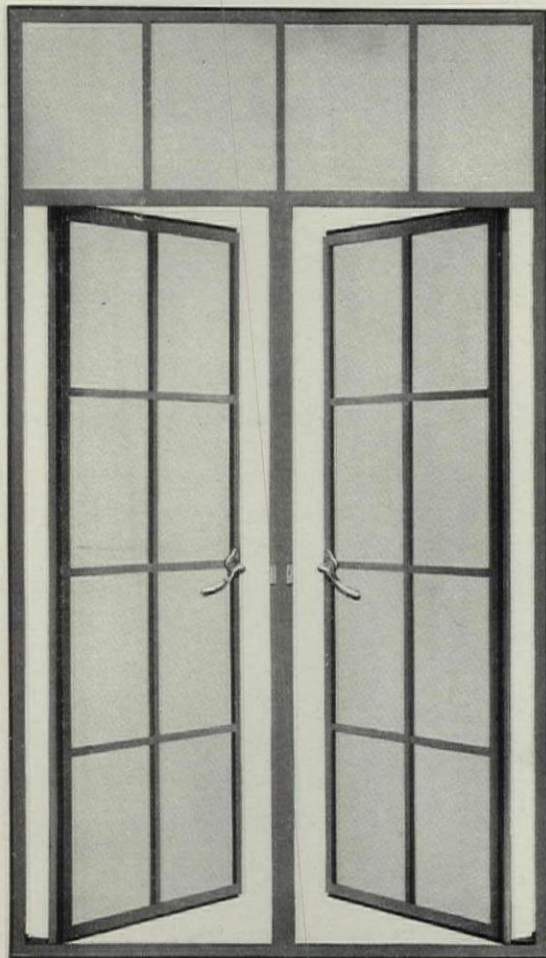
In its Residence Type and Heavy Type Steel Casements Truscon provides quality windows for the most modest or pretentious building. Practically any requirement can be met by the standardized units and sizes, with consequent economies.

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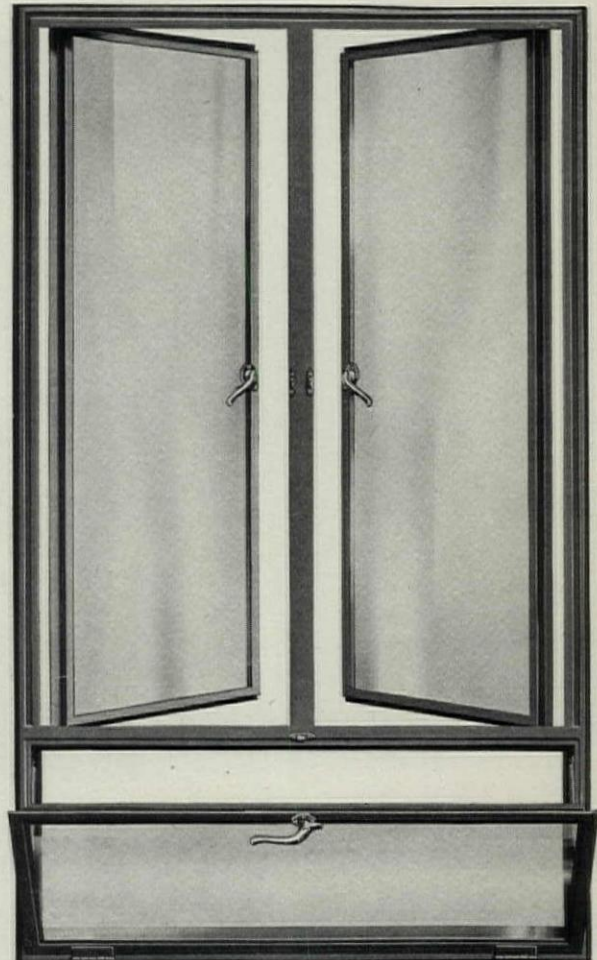
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COMPARE the photos below with any welded jobs you've ever seen before . . . compare the fittings!

They're not bends. They're not mitres. They're TUBE-TURNS, *the seamless drawn fittings for pipe welding*, now being used on dozens of jobs like the Empire State Building, the New York Hospital and Cornell Medical College Ass'n., the Bank of Manhattan Building, the new Waldorf, the Fidelity-Philadelphia Building, the Union Carbide & Carbon Building, Chicago.

Tube-Turns have seamless, *uniform* walls—no thinning of outside walls, no thickening or buckling of inside walls, no flattening of cross-section.

They combine greater strength and less weight than any other type of stock fittings.

They have no interior or exterior projections or shoulders—therefore cause less pressure-loss and can be nested closer, in less space.

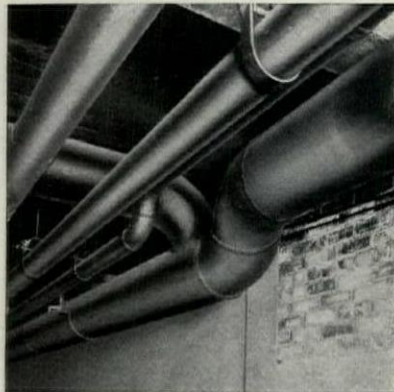
Being made of the same material as the pipe in the line, they have the same



Tube-Turns are extensively used in the Empire State Building. Shreve, Lamb & Harmon, Architects. Meyer, Strong & Jones, Inc., Consulting Engineers. Starrett Bros. & Eken, Builders. Baker Smith & Co., Heating Contractors.



A 6" expansion loop in the Empire State Building, fabricated on the job from 90° Tube-Turns and straight pipe.



3", 10" and 14" Tube-Turns greatly simplified the pipe-design of this Chase Copper & Brass Company Plant job at Cleveland. The Austin Co., Engineers and Contractors. The Smith & Oby Co., Piping Contractors.

factors of expansion and contraction—no leaks, no line strains.

Having a constant radius of $1\frac{1}{2}$ times the nominal pipe size, they are easier to design.

They are stocked in 45°, 90° and 180° types—or can be easily cut to form angles of *any* desired degree.

They can be fabricated, *on the job*, into any conceivable offset, compound or "special".

They are installed with easy welds, *straight across the pipe*.

Get All the Facts!

Tube-Turns have many other advantages and economies that can help you to improve your welded piping. All the facts are given in Bulletins No. 103 and 105—the latter a description and cost-comparison of an installation for the U. S. Bureau of Standards. *Use the coupon for getting your copies.* No obligation, of course. Tube-Turns, Incorporated, 1331 South Shelby Street, Louisville, Kentucky.

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TUBE-TURNS, Incorporated, 1331 S. Shelby St., LOUISVILLE, KY. Gentlemen: Please send me, without obligation, Bulletins No. 103 and 105, giving full details about Tube-Turns, the seamless steel fittings for pipe welding.

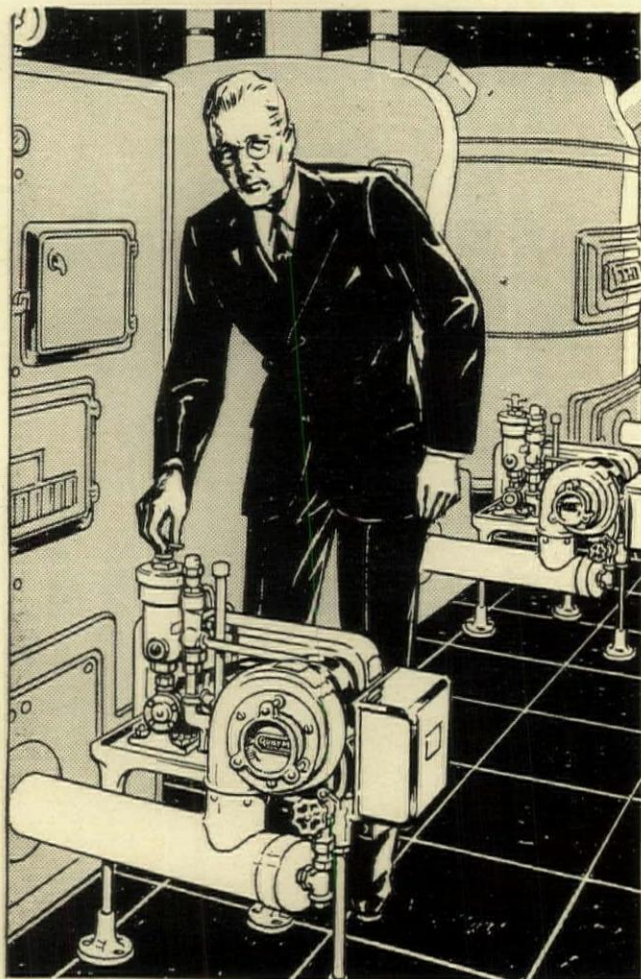
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QUIET MAY OIL BURNER



SEE SWEET'S CATALOGUE
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SPECIFICATIONS.

You'll find complete QUIET MAY specifications in Sweet's Catalogue, Pages D-5245 to D-5256 inclusive. If further information on a particular problem is desired, please write direct to May Oil Burner Corp., Baltimore, Md.

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And that's just one phase of the plus you get in a QUIET MAY. Each individual part of a QUIET MAY is tested for factors of safety far in excess of what is required.

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See Sweet's Catalogue for complete specifications or write direct for further information . . .

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AUTOMATIC OIL BURNER

America's Foremost Electrical Engineers



make possible

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Elevator
Performance
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