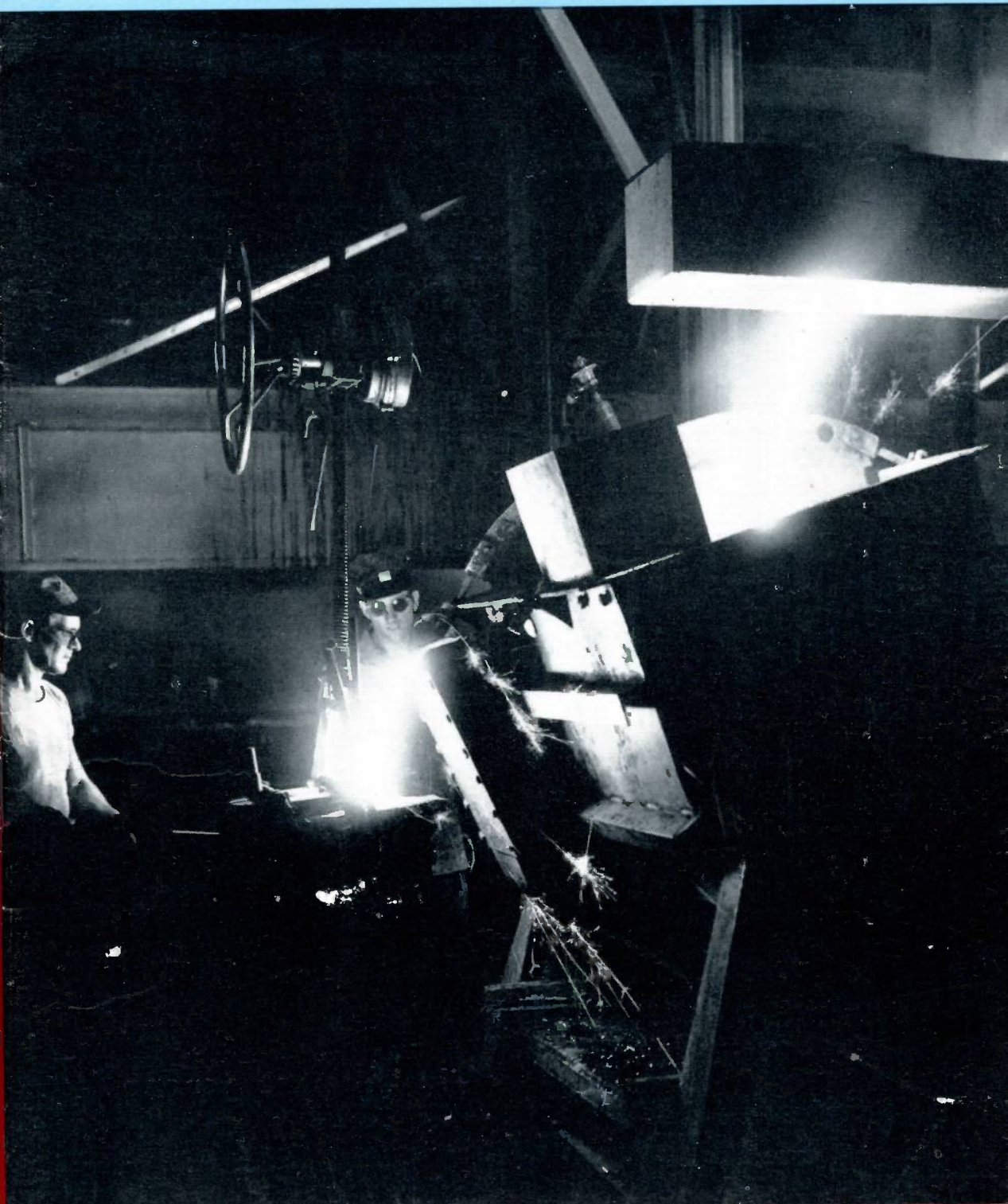


MUELLER Record

JANUARY • 1955





THIS MONTH'S COVER

The illuminating light cast upon the faces of these Iron Foundry workmen is made by white hot molten iron pouring from the cupola at our new Plant No. 4 in Decatur. Molten iron pours from the cupola into a holding ladle and again from the holding ladle into a 300-pound ladle. Details of the new plant will be found elsewhere in this issue.



January • 1955

WALTER H. DYER, Editor

MUELLER Co.

MANUFACTURERS OF WATER AND GAS
DISTRIBUTION AND SERVICE PRODUCTS

FACTORIES
DECATUR, ILL. LOS ANGELES, CALIF.
SARNIA, ONT. CHATTANOOGA, TENN.

SALES OFFICES
NEW YORK CITY SAN FRANCISCO

TRADE MARK

MUELLER
Reg. U. S. Pat. Off.

Member Industrial Editors Association of Chicago
and International Council of Industrial Editors



Recording Our Thoughts

The first section of the Ohio Turnpike, a 22-mile line connection with the Pennsylvania Turnpike at the state line, was opened to traffic December 1.

The section, starting at Petersburg, runs southwest, by-passing Youngstown a few miles to the south. Until now, this heavily congested area has been one of the worst bottlenecks in the route westward. On completion next autumn, the remaining 291 miles of the Ohio Turnpike will extend west from Warren to Columbia in the northwest corner of the state on the Indiana border.

Mueller Co. is proud to have played a small part in making way for this new turnpike. It was necessary to relocate a two-mile stretch of ten-inch natural gas pipeline for the Ohio Fuel Gas Company of Columbus without interruption of service. Mueller line stopper equipment was used to make the tie-ins because a gas flow of 130 pounds pressure had to be maintained during the entire operation which was completed in less than four days.

* * *

As a general rule, the Mueller Record limits news of Mueller Co. personnel and activities of the firm to that which we believe will be of genuine interest to our customers. The major part of the material in most issues concerns people in the industries we serve.

For that reason, we somewhat apologetically prepare this issue. By a coincidence, there is much company news which we believe will interest our customers and friends. Important personnel changes at our West Coast plant, the appointment of two new sales representatives in Illinois and California and the introduction of our officers which is the custom each year at this time, are examples.

It would seem to us that customers would be interested in something of the backgrounds of the people who operate a business such as ours. It is for that reason that we present this issue.

MUELLER RECORD

Best Business Year Since 1950 For Gas Appliance Industry; Here's Why

THREE FACTORS ARE expected to give the gas appliance industry its busiest year since 1950, the head of the industry's trade association reports. These are: the construction of 1,300,000 new homes; record expenditure of \$6,250,000,000 on home modernization, and continued expansion of the nation's natural gas pipeline system during 1955.

"By the end of 1955 at least three major gas appliances will be used in the average home where only one was employed in 1945," H. Leigh Whitelaw, managing director of the Gas Appliance Manufacturers Association, said. "In fact, builders and homeowners throughout the country have begun to adopt the entire 'family' of gas appliances, including the range, water heater, clothes dryer, refrigerator, incinerator and heating system, as standard equipment."

To meet this demand, he said, manufacturers, distributors and dealers are replenishing inventories which have dropped to a near low for the postwar period.

"Furthermore, many gas utilities are returning to their former status as aggressive merchandisers of home appliances," he said. "Gas companies once accounted for at least 80 per cent of all appliance sales, the rest going to dealers, furniture outlets and department stores.

"The situation was reversed a few years ago with the advent of natural gas when utilities began concentrating on enlarging their fuel distribution systems. Now that their facilities have been converted to natural gas, many of the utilities are going to direct selling of appliances or to closer sales cooperation with dealers."

Another factor which, the GAMA official said, indicates a banner year for gas is the increased demand on the industry's laboratories to provide extra facilities for testing the operation, safety

and efficiency of present products and to permit more extensive new-product research.

GAMA estimates that the number of domestic, commercial and industrial users of liquefied petroleum gas will reach a new high of over 7,500,000 customers. The LPG branch of the industry markets butane and propane gases in bulk, bottles or tanks for operating appliances and equipment in rural and suburban homes located beyond the utility mains.

Rural customers, Whitelaw said, now constitute nearly 25 per cent of the national market for gas appliances. He predicted increased rural demand in 1955 as well as extensive use of LP gas in the field of carburetion. This involves use of bottled gas as a fuel for automotive vehicles, tractors, farm implements, irrigation pumps, materials handling, marine and other motorized equipment.

The house-heating division of the gas industry is confident that sales of its equipment in 1955 will continue to surpass those of competitive fuels. Comparative records show that sales of gas central heating equipment (boilers, furnaces and conversion burners) this year are running 14 per cent ahead of last year, while the sales of oil burners, their nearest competitor, have fallen 13 per cent behind 1953 figures.

The heating division's confidence gains further support from a recent nationwide utility survey indicating that gas comfort-heating customers will total 15,000,000 by the end of the new year and will exceed 17,000,000 by the end of 1957.

The same survey, Whitelaw said, shows that the natural gas utility and pipeline companies during the 1954-57 period will spend \$3,551,000,000, including \$1,708,000,000 for transmission and \$1,331,000,000 for distribution. In addition, \$364,000,000 will go into similar

(Continued on page 13)

1955 Looks Even Better

1954 Most Successful Year In History of U. S. Gas Industry



F. M. BANKS

BY F. M. BANKS

*President, American Gas Association
President, Southern California Gas
Company, Los Angeles, California*

THE GAS UTILITY AND PIPELINE companies in the United States achieved new record levels in numbers of customers served, in volume of gas sold to ultimate consumers and in revenues from the sale of gas during 1954. Reserves of natural gas stood at a new high and new customers were added to utility lines at an ever-increasing rate.

In reviewing their most successful year to date, the member companies of the American Gas Association, are almost unanimous in predicting that conditions which helped lift the industry to its high plateau of success in 1954, still will continue. There is every reason to predict that during 1955, the industry will again establish new records for gas service.

Natural gas systems added nearly 18,000 miles of pipeline to their huge national network, bringing natural gas to some new areas and augmenting supplies in areas already served.

The utility and pipeline companies spent more than one billion dollars in 1954 for construction of new facilities and in expansion of present plants. The industry now has gross assets of more than \$14 billion, and expects to add another billion dollars in new construction during 1955. The American Gas Association estimates that the industry

will spend nearly \$4 billion in the four-year period, 1954 through 1957.

The industry is adding new customers at a rate of more than 800,000 a year and this rate of increase is expected to continue for at least the next two years. By the end of 1955, the industry will be serving more than 29 million customers.

The tremendous growth of our natural gas systems has contributed most heavily to the continued expansion of the gas industry. Today this growing giant serves approximately 25 per cent of the energy used in the United States. More than 95 per cent of all gas sales today are natural gas sales.

At the end of 1954, about 21.9 million customers in the United States were using natural gas and sales totaled approximately 5.9 trillion cubic feet. Conservative estimates by A.G.A. indicate that at the end of 1957 there will be 25.7 million natural gas customers using more than 6.9 trillion cubic feet.

Statistical Review and Forecast

The gas utilities were serving approximately 28,000,000 customers at the end of 1954, including about 260,000 LP-gas customers served directly by gas utility companies. This was a gain of about 750,000 customers, or 2.8 per cent over the 27,250,000 customers, including 300,000 LP-gas customers, on gas utility

lines a year earlier. In addition, some 7,000,000 customers are served with LP-gas in areas not located on gas utility mains. This is a new record for gas utility customers.

More than 22,000,000 customers were receiving natural gas at the year-end, a gain of 5.2 per cent over the previous year. Manufactured and mixed gas customers decreased to about 5,770,000 at the end of 1954, a decline of 5.0 per cent under the 1953 total.

Total sales of utility gas in 1954 amounted to 60,750,000,000 therms, a new high level, that represented an increase of 7.6 per cent over the previous record in 1953.

Natural gas sales reached a new high at 57,440,000,000 therms, a gain of 8.0 per cent over the previous year. Manufactured and mixed gas sales totaled about 3,220,000,000 therms, up 0.9 per cent over 1953.

Revenues from sales of gas in 1954 reached a new record high of more than 3,013,000,000, a gain of 10.8 per cent over the previous record of \$2,719,000,000 established in 1953. Natural gas revenues increased 13.0 per cent to total \$2,544,000,000, also a new record. Manufactured and mixed gas revenues totaled \$448,000,000, up 0.1 per cent over 1953.

Natural Gas System Spreads

Last year the natural gas systems added more than 17,500 miles of new gathering, transmission, storage and distribution lines to their great network. This brings the total pipeline system for carrying natural gas in this country to about 413,000 miles. With an additional 50,000 miles of pipeline carrying mixed and manufactured gas, the nation's system of utility mains totals more than 463,000 miles, or enough to circle the equator 18 times. The pipeline system of the gas industry constitutes the greatest mainline transportation system in the United States.

Temporary certification has been granted by the FPC for the construction of the American-Louisiana Pipeline Company's 1,200 mile line from Texas to Michigan. This 30-inch line will cost about \$130,000,000. Full Commission certification has been granted for the

1800 mile line to be built by the Pacific Northwest Pipeline Company which is to bring natural gas from the San Juan Basin in Colorado and New Mexico to the Pacific Northwest, the only geographical region in the United States not presently served with natural gas. Late in 1954 the 900 mile Gulf Interstate line went into service bringing additional supplies of gas to the Columbia Gas System.

Gas househeating continues to be one of the gas industry's fastest growing markets. Approximately 1.2 million new gas househeating customers will be added to utility lines in each of the next three years, according to estimates by A.G.A. To serve this constantly growing market, more and more use is being made of underground storage of natural gas. At the beginning of 1954 there were 167 underground storage fields located in 17 states, with an ultimate capacity of 1,735 billion cubic feet of natural gas.

In these underground reservoirs, natural gas which has been brought from its original location is stored during the summer months to be drawn upon during the peak load days in the winter. The gas industry spent about \$50 million on underground storage facilities in 1954 and probably will spend a like amount in the next two years on such facilities.

Natural Gas Reserves

Reserve supplies of natural gas continue more than ample to serve the great potential market as well as the huge existing market. The A.G.A. Committee on Natural Gas Reserves estimated that at the beginning of 1954, the total proved recoverable reserves of natural gas in the United States amounted to 211.4 trillion cubic feet. This was a gain of 11.7 trillion cubic feet over the previous record of 199.7 trillion cubic feet a year earlier. This record gain was made despite an all-time high production of 9.2 trillion cubic feet during 1953.

The discovery of 7.1 trillion cubic feet of new natural gas reserves during 1953 as compared with 5.4 trillion cubic feet in new discoveries in 1952 emphasized the important increase in exploration activities during 1953. Further exploration and drilling in existing fields

added 13.4 trillion cubic feet to the nation's proved recoverable reserves.

These estimates include only **proved** recoverable reserves. They do not include to their fullest extent potential reserves in new areas now being developed such as the off-shore fields in the Gulf area and fields like the San Juan basin in Colorado and the Green River basin in Wyoming. Some geologists estimate there are more than 600 trillion cubic feet of natural gas in this country alone.

Preparing For a Great Future

Househeating is not the only field in which the gas industry expects to make great strides in the near future. While it is true that anticipated space heating requirements in 1957 will be about 53 per cent higher than those of 1953, overall sales by gas utilities for 1957 are expected to total nearly 75 billion therms. This would represent a total increase of about 32 per cent over actual sales of 56.5 billion therms of gas in 1953 and about 25 per cent over sales of 60 billion therms in 1954.

The A.G.A. Bureau of Statistics recently estimated that between 1954 and 1958, if consumer purchasing power stays at the present level, and if the gas utilities exerted their utmost in sales and promotional effort, a potential market exists for 59 million gas appliances, mainly gas ranges, automatic water heaters and househeating units.

To meet the increased demands for service, the gas industry between now and 1957 will require 4.6 million tons of steel pipe. Of this amount, 2.9 million tons will be in the form of 16 inch diameter or over, primarily used for natural gas transmission lines. An additional 134,000 tons of steel in other forms, and nearly 500,000 tons of cast iron will be required by the industry in the 1954-1957 period.

Gas Appliances and Equipment

After getting off to a slow start during the early months of 1954 when our nation was returning to a peace-time economy, production and sale of gas appliances responded to the stimulus of the industry's coordinated promo-

tional programs to equal or surpass 1953 levels.

Sales of gas ranges during 1954 were estimated at 2,010,000 units, slightly under the 1953 total of 2,183,000 units. Sales of automatic gas water heaters rose to an estimated 2,250,000 units, compared with 2,182,000 units sold in 1953. Sales of central heating appliances showed a marked gain, reaching an estimated 921,000 units, compared with about 800,000 units sold the previous year. Sales of automatic gas laundry dryers increased about 25 per cent over a year ago, totaling about 200,000 units, against 160,000 sold in 1953. Gas incineration is another new gas service that is becoming increasingly popular. Sales of gas refrigerators are reported to be increasing under the stimulus of new designs and active promotional efforts. All-year air conditioning is enjoying a wider market.

A.G.A. Laboratories

Continuing in the vital role of serving the gas industry and gas consumers as a national "recognized testing agency" for gas appliances, the A.G.A. Laboratories in Cleveland and Los Angeles were the scene of expanding activities throughout 1954, reflecting the steady gains in design development, production and sales of gas equipment. The Laboratories tested almost 6,000 individual appliances and accessories in 1954. Comprehensive testing insured compliance of gas equipment with industry standards of safety, performance and durability. The Laboratories Seal of Approval serves as a reliable customer buying guide and is carried by 95 per cent of all gas equipment sold today. More than 700 field and factory calls were made by field inspectors on equipment manufacturers prior to granting or renewing certification.

In step with the record-breaking testing activity, the Laboratories have engaged in an extensive building expansion program. Administrative offices in a recently erected south wing addition were occupied early last year. To meet the upsurge in testing of central heating equipment, a 17,800 square foot north wing addition was occupied at the year end.

Promotion, Advertising and Research

1954 was the 10th anniversary of the gas industry's coordinated PAR Program-Promotion, Advertising and Research. Two and a half million dollars have been spent during this year on PAR activities to help make gas utility and pipeline operations safer, more profitable and to impress on the American public the convenience and economy of modern gas appliances.

Outstanding accomplishment was the production of a color film under the joint auspices of PAR and the National Association of Home Builders. Various equipment manufacturers likewise cooperated in this production, "A Word to the Wives," which depicts dramatically the wonders of the New Freedom Gas Kitchen and Laundry. Featured is a professional Hollywood and Broadway cast. The film will be shown by TV stations throughout the country and will be available for local showings from gas companies and NAHB chapters.

Tremendous interest was also aroused in laboratory gas range development units made at the A.G.A. Laboratories and shown to utility and appliance manufacturer executives. These units feature greater cleanliness, cooler kitchens and improved performance of top units, ovens and boilers. Adaptation of several of these laboratory developments are now being made by leading manufacturers with the expectation that they will be available to sales floors before the end of 1955.

During 1954, PAR likewise continued its national magazine advertising extolling the many advantages of gas service and gas appliances. Striking ads to presell residential, commercial and industrial consumers on the many benefits of gas appeared in such magazines as THE SATURDAY EVENING POST, McCALL'S, BETTER HOMES AND GARDENS, WOMAN'S HOME COMPANION, TIME and many others. Over 30 million sales messages financed by PAR thus reached the American public in 1954. Many of these advertisements were scheduled to coincide with corresponding local promotional campaigns of gas companies throughout the country.

For the first time in 1954 PAR, on behalf of gas companies in 22 states,

was a principal sponsor of the "Mrs. America" contest. The annual winner, typifying the year's leading American homemaker, is thus closely associated in the public's mind with the use of gas service in the kitchen and laundry of today's modern American home. So successful was this initial sponsorship that it's being continued in 1955. Already local gas company participation exceeds that during 1954 with state contests in 31 states to be conducted by gas utilities.

Also in the offing for 1955 is greatly accelerated PAR research on gas air conditioning. Many housing authorities are convinced that all-year home comfort cooling will be demanded within the next 10 years by most new home purchasers. Already providing good equipment, the gas industry expects and is determined to be ready to provide this coming mass market with even better all-year gas air conditioning equipment. This service will not only make available to Americans hitherto undreamed of comfort throughout their home and not merely in a few rooms, but it will also be welcome additional business for the gas companies during the customary slack summer months.

Gas Industry Development Program

During the year, ten gas companies in strategic areas of the United States designated part of their service territory as Action Demonstration cities under the Gas Industry Development Program, which was launched in 1953 to strengthen the competitive position of gas as a major domestic fuel. The designated cities were: Lincoln, Nebraska; Lansing, Michigan; Abilene, Texas; Ocean City, New Jersey; Fort Wayne, Indiana; Altoona, Pennsylvania; Savannah, Georgia; Pasadena, California; Albuquerque, New Mexico; and Springfield, Massachusetts.

The companies serving these cities are undertaking their own experiments, providing sales, promotion operating and servicing policies. Those experiments which prove successful in these territories presumably will be applied to the rest of the company operations. Also it is expected that other companies will be spurred to similar activities by results from these ten Action Demonstration cities.

(Continued on page 11)

Opportunity Knocking

Arden Sees Gas Appliance Industry Business Increase

By T. T. Arden, President
Gas Appliance Manufacturer Association
Executive Vice President,
Robertshaw-Fulton Controls Company

IF THE COMBINED gas appliance industry doesn't do 10 per cent more business in 1955 than in 1954 it won't be for lack of opportunity.

To begin with, various authorities in government and in private and public home-building agree that the new year will see all-time records set in home construction.

Besides the possibility that more than 1,300,000 new homes will be built, there is a great opportunity for us in the fact that Americans will spend better than \$6,250,000,000 on rebuilding old dwellings adding living space, modernizing kitchens, laundries and basements, and generally providing the setting for a huge replacement market for appliances.

I see where GAMA headquarters figures that by the end of 1955 there will be at least three major uses of gas in the average home where only one existed in 1945. One of the main reasons for this, besides the fact that public acceptance of gas is increasing annually, is that many major builders and realty operators have begun to install the entire 'family' of gas appliances as standard equipment.

Perhaps the best clue to our immediate future is the action taken by manufacturers, distributors and dealers in the final quarter of 1954 to replenish



T. T. ARDEN

low inventories. It took more than wishful thinking to bolster their confidence.

Another sign of the times is the beginning of a return by many gas utilities to their former status as aggressive merchandisers of gas appliances. Apparently many of those who left this field several years ago to concentrate on building their fuel distribution systems and converting to natural gas are now going back to direct selling of gas appliances or closer sales cooperation with dealers.

Still another healthy sign is the tremendous demand being made by manufacturers on the industry's laboratories for approvals, improvement of present products, and extension of new-products research. The fact of the matter is that A. G. A.'s laboratories at Cleveland and Los Angeles tested almost 5,000 appliances and accessories in 1954 and the rate of application is increasing constantly.

It should also be noted here that the new American Standard National Plumbing Code, which GAMA helped formulate, will begin to have a beneficial effect on appliance sales during 1955. Its purpose is to simplify installations of comfort heating, water heating, cooking and other domestic gas equipment.

Opportunity beckons on other fronts, too. Early in 1954 the natural gas utilities and pipeline companies planned to spend \$3,551,000,000 during the 1954-57 period, including \$1,708,000,000 for transmission and \$1,331,000,000 for distribution. In addition, their plans called for expenditure of \$364,000,000 for piping other types of gas, for a grand total of \$3,915,000,000.

Well, it's a matter of record that these plans are being realized right on schedule. As to what they mean to the gas appliance industry, consider the findings of a utility study begun in 1953.

This study showed that by 1957 the number of residential gas customers throughout the United States would increase 12.3 per cent, while the amount of gas consumed would rise 45.2 per cent. The much higher figure for gas consumption meant that people not only would continue to convert to gas, but also would use gas for more purposes in the home than ever before.

The house-heating branch of the industry certainly has been making this prediction look good. Comparative records show that 1954 sales of gas central heating equipment were running 14 per cent ahead of 1953, while the sales of oil burners, the nearest competitor, had fallen 13 per cent behind 1953 figures.

It is now reasonable to expect that gas-heated homes will total 15,000,000 by the end of 1955 and will exceed 17,000,000 by the end of 1957. Meanwhile, incomplete returns on shipments of gas ranges, water heaters and central heating equipment in 1954 indicated that the total in these categories alone would top the combined total of 5,164,900 units shipped in 1953.

In addition to the rosy outlook in urban markets, there is the possibility of a banner year for gas appliances in the rural territories. The number of domestic, commercial and industrial users of LP-Gas is likely to reach a new high of over 7,500,000, and there is good reason to believe that the ratio of rural to metropolitan appliance sales in 1955 will increase substantially. Rural customers absorb nearly 25 per cent of our output.

The use of gas for commercial and industrial purposes continues to zoom.

It's no secret that gas cooking now accounts for 95 per cent of the more than 65,000,000 meals served daily in public eating places and institutions and, if the announced programs of highway and institutional construction go ahead on schedule, the commercial equipment producers are certainly headed for new heights.

A utility survey begun in 1953 indicated that industrial demand for natural gas would increase nearly 30 per cent during the four-year period ending in 1957. A good part of that gain already has been achieved, and research continues to add many new processes to the more than 25,000 existing uses for gas in industry. The biggest percentage gain in industrial demand is expected to materialize in New England, while the largest gain in actual consumption may occur in the four-state region of Arkansas, Louisiana, Mississippi and Texas.

With opportunity banging at every door, all branches of the industry are stepping up their promotional efforts, and the outlook in this respect—as typified by developments in the Gas Industry Development Program—is for closer cooperation among manufacturers, pipeliners and utilities, than has ever been accomplished in any year of our history.

The industry's own prospects are, of course, irrevocably linked with the general outlook for the nation. But it doesn't take an expert to prove that our present national economy is made to order for any industry with a good product and a proven capacity for public service. The gas appliance industry would appear to qualify.

NATIVE TONGUE

"Do your people know anything about religion, Chief?" asked the missionary of the cannibal chief.

"Well, yes, they got a little taste of it when the last missionary was here."

* * *

Nurse: "I think he's recovering consciousness, Doctor. I noticed he tried to blow the foam off his medicine."

Frank O'Dell, Creator of Mueller Heat Control System, Retires Dec. 1.

Frank T. O'Dell, who will be best remembered as the man who perfected and patented the "Mueller Hot Water Heat Control System," retired December 1 after forty years service with Mueller Co.

Mr. O'Dell spent his entire career with our company in the Sales Division and in recent years has been a special representative of the company. He has served as a liaison between our sales representatives, our sales offices and our customers.

As an outstanding expert on fluid regulation and relief valves, he was in a position to provide assistance for our customers everywhere. His territory was all of the United States and he traveled in every state bringing good will for our company to all whom he visited.

It was Mr. O'Dell who originated the heating system now known as the H9500 Mueller Heat Control System. In order to introduce this system to the trade, Mr. O'Dell traveled to all parts of the United States where hot water was used for heating homes. He did an outstanding job in introducing this system to our customers and was largely responsible for its quick acceptance and extensive use.

Mr. O'Dell first joined Mueller Co. in 1914 as a sales representative in the Minnesota territory with headquarters in Minneapolis.

Minnesota in those years was not considered one of our better territories, but Mr. O'Dell's ability as a sales representative was soon proven as business increased in that territory each year he traveled it.

He developed his heat system idea during World War I. He recalls that in 1916 with the war at its height in Europe, Mueller Co. was beginning to play an increasingly important part in war production. At the same time, much of the materials used in the manufacture of our regular line of products was be-



FRANK T. O'DELL

coming more scarce as the days passed and we were limited in what we could sell other than to the government.

It was at this time that he conceived an idea where and how we could increase our sales of relief and water regulating valves. This was by applying these valves to a hot water system for heating buildings.

"I worked out such a system in the rented house in which we were living," he said. "With the permission of the owner, I removed the expansion tank and hand control for the water supply to the hot water heating system and substituted a combination of pressure reducing and pressure relief valves which then formed an automatic system of water supply and pressure relief. To this, I added a regulator for the control of the furnace dampers to economize on coal.

"The oil burner was just being developed," he recalled, "and the use of gas for heating homes was considered a millionaire's privilege. I experimented

Introducing:

E. George Baker, Asst. Sales Manager, Los Angeles Plant

The new assistant sales manager at the Mueller Co. Pacific Coast factory in Los Angeles has a background particularly suitable for the position. He is E. George Baker, and his experience with Mueller Co. has given him a solid grounding in auditing, sales and the factory.

Mr. Baker, whose appointment to the new position became effective December 1, will have complete authority and responsibility for the operation of the functions and personnel of the Los Angeles sales office. He will be directly under the supervision of the office of the general sales manager at Decatur.

A native of Clinton, Illinois, Mr. Baker completed his elementary and high school education in that city and attended Illinois State Normal University at Normal. He was graduated from Millikin University in Decatur, Illinois, with a Bachelor of Science degree in Business Administration. His major was in accounting.

He joined Mueller Co. in February,

Frank O'Dell . . .

with this system for about two years until I was satisfied that it was marketable."

Mr. O'Dell later convinced Mueller Co. of the saleability of his idea, received a patent for the product and was largely instrumental in placing it on the market.

As the years passed he came to be our best known sales representative. Customers from coast to coast in our metropolitan as well as our smaller cities know Frank T. O'Dell by his first name. His reputation as an expert in the field grew, and his knowledge of the industry coupled with his genuine sincerity and love of mankind helped to develop our company's excellent relations with friends and customers that we enjoy today.



E. GEORGE BAKER

1947, in the Accounting Department as a branch ledger clerk in our main office in Decatur. In this position he kept books for Mueller Co.'s Los Angeles and Chattanooga plants. In October, 1947, he was promoted to senior cost clerk, and in 1949, he was named chief time clerk for the Decatur factories.

The latter position gave Mr. Baker an opportunity to become familiar with the operation of the factories. He spearheaded the move to standardize our present time keeping system now in effect.

In 1950, he was transferred to the Sales Division as a sales correspondent. Following army service during the Korean War, he returned to Mueller Co. and in 1951 was appointed assistant to the assistant sales manager of the Decatur plant's Water Products Department.

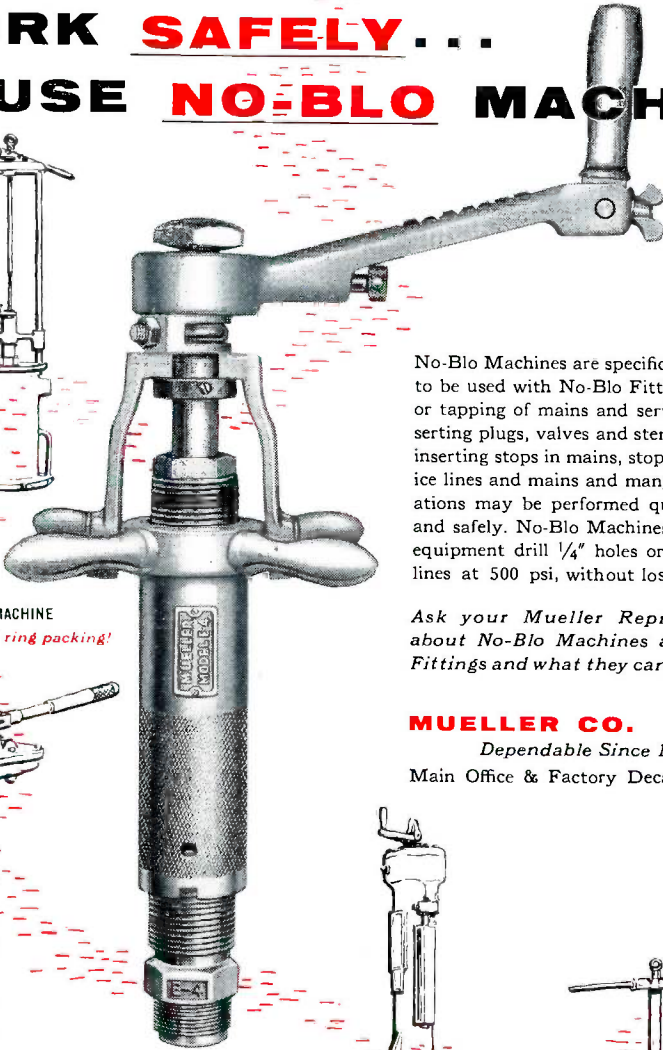
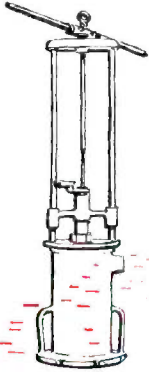
Mr. Baker next served as assistant to the assistant vice president in charge of sales, and in August, 1953, was given the position of administrative assistant.

During World War II, Mr. Baker served with the Transportation Corps and was stationed at the New York Port of Embarkation as an auditor. In 1950, he was recalled to service and oddly enough was assigned to the same office and job at New York's Port of Embarkation as that of his previous service.

MUELLER

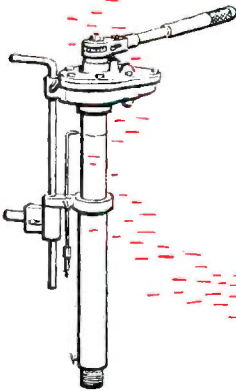
WORK **SAFELY...**

USE **NO-BLO MACHINES!**



No-Blo Machines are specifically designed to be used with No-Blo Fittings. Drilling or tapping of mains and service lines, inserting plugs, valves and stems in fittings, inserting stops in mains, stopping off service lines and mains and many other operations may be performed quickly, easily and safely. No-Blo Machines and related equipment drill $\frac{1}{4}$ " holes or stop off 12" lines at 500 psi, without loss of gas!

"E-4" DRILLING MACHINE
Now with "O" ring packing!

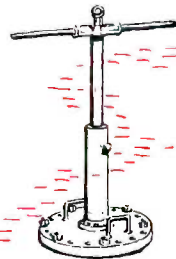


Ask your Mueller Representative about No-Blo Machines and No-Blo Fittings and what they can do for you.

MUELLER CO.

Dependable Since 1857

Main Office & Factory Decatur, Illinois



Best Business

(Continued from page 3)

facilities for other types of gas, for a grand total of \$3,915,000,000. During the same period the gas industry will buy 2,878,000 tons of steel pipe for major transmission, while pipe for other purposes will increase the industry's requirements to 4,642,000 tons.

On the basis of another study begun in 1953, the GAMA director said, it is estimated that by 1957 the number of residential customers throughout the U. S. will increase 12.3 per cent, while the amount of gas consumed will rise 45.2 per cent.

"The much higher figure for gas consumption," he said, "bears out our belief that not only will homeowners continue to convert to gas, but also that gas will be used for more purposes in the home than ever before."

Gas appliance and equipment manufacturers see production increases during 1955 up to 10 per cent over 1954 figures. Total shipments of gas ranges, water heaters and central heating equipment alone are expected this year to top the 1953 total of 5,164,900 units.

The use of gas for commercial and industrial purposes continues to rise substantially, Whitelaw said. Gas cooking now accounts for 95 per cent of the more than 65,000,000 meals served daily in public eating places and institutions and, if the progress of industrial gas research continues at the present pace, hundreds of new uses for gas in industry will be added in 1955 to the more than 25,000 different processes already employed.

Industrial demand for natural gas, said Whitelaw, will increase by nearly 30 per cent in the four-year period ending in 1957, with New England expected to show the biggest percentage gain (113 per cent) and the four-state region of Arkansas, Louisiana, Mississippi and Texas the largest gain in actual consumption (to more than 14 billion therms).

Thousands of nuts go into the making of an automobile, but it only takes one to spread it over a highway.

1954 Most Successful

(Continued from page 7)

The ten companies already are reporting much better appliance sales results for themselves and for local dealers than would have been accomplished otherwise. All of the companies concerned are so impressed with the results that they are continuing the action programs next year and are using the successful activities throughout their entire systems. This work has been aptly phrased by one leader in the industry as "an example and inspiration to the rest of us."

Conclusion

The industry is marching steadily along the road to improved services, sales and utilization. Important new developments in gas appliance design hold a promise of modernity that cannot be matched by competitive appliances. New sales and merchandising techniques developed under the Action Demonstration programs are bringing bigger shares of the new home market and the replacement market. The industry is alert to competition but not awed by it. Such favorable attitudes must result in new records in sales, customers and revenues in 1955 for the gas industry.

One of the duties of an employer is to write occasional letters of recommendation. At a loss to know what to say concerning a doubtful applicant, one personnel executive responded as follows:

"Dear Sir: When you come to know the applicant as we know him, you will appreciate him as we appreciate him."

* * *

There had been a horrible train wreck and one of the two English majors found himself slipping from life.

"Goodbye, Charles," he groaned to his friend, "I'm done for."

"Don't say that, Jim boy," gasped the other in horror. "For heaven's sake, don't end your last sentence in a preposition."

* * *

"Bob sure has a wide acquaintance."
"Yes, I saw him out with her last night."

Two New Sales Representatives Appointed



JOHN T. LEAHY

The appointment of two members of Mueller Co.'s Sales Division as sales representatives has been announced by Robert H. Morris, vice president and general sales manager.

Robert R. Lugo, Jr. who since August, 1953, has been an order interpreter in the sales office at our Los Angeles plant, has been assigned, effective December 1, 1954, to cover a part of the Los Angeles area and portions of Southern California extending to the Arizona and Nevada borders.

John T. Leahy, assistant to A. O. Yonker, assistant sales manager in charge of water products at our Decatur office, will travel our Southern Illinois territory.

Both territories are newly created, each having previously been a part of a large area covered by a single representative. The new areas were set up to give our customers more efficient representation.

Mr. Lugo, an Air Force veteran of World War II and a native of Los Angeles, attended Los Angeles City College and the University of Southern California. He was engaged in sales work before joining Mueller Co. in Los Angeles.



ROBERT R. LUGO, JR.

As order interpreter, he gained much valuable knowledge of Mueller products which will greatly assist him in being of service to his customers.

He is married and has one child. In his new position, he will continue to make his home in Los Angeles.

Mr. Leahy came to Mueller Co. from St. Louis in June, 1953. He is a graduate of St. Louis schools and studied mechanical engineering at Washington University of St. Louis before entering sales work. Prior to joining Mueller Co., he spent considerable time in sales and administrative work.

He is a Navy veteran of World War II, is married and has two children.

His experience as an assistant to Mr. Yonker has given him the training necessary to perform the duties of an efficient sales representative.

Charles (pointing to choke lever): You say your car uses too much gasoline? Know what this is for?

Mary Ann (airily): Oh, that! I never use it, so I keep it pulled out to hang my handbag on.

Mueller Co.'s New Plant No. 4 Geared For Improved Service to Customers

Mueller Co. is keeping pace with the increased requirements of water and gas distribution!

A new mechanized all modern plant housing both Iron and Brass Foundries, a Core Room tuned for high production, our Pattern Shop, Chemical Laboratory, Iron Machine Shop, and several other departments of our Decatur factories was built and placed into operation more than a year ago.

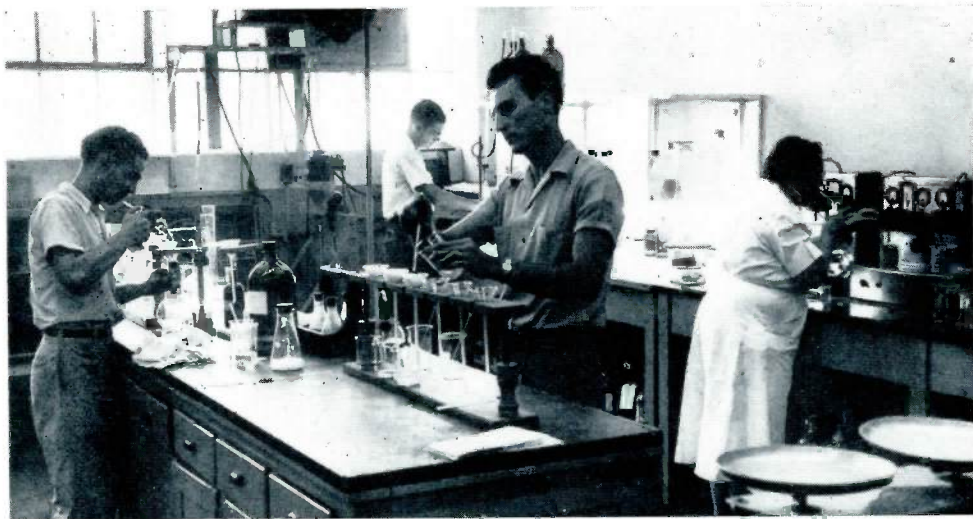
Now, for the first time, we introduce this plant to our customers and friends through the pages of the Mueller Record.

The phenomenal growth of the water and gas industries prompted Mueller Co. Management some time ago to plan the necessary steps that would enable us to continue to offer the best in service. It takes time to manufacture a quality

product in the field of water and gas distribution and service, and it was apparent that to meet the expansion of the industries we serve, we too would have to expand.

The result was the construction of a new plant in Decatur. Facilities at the new factory, known as Plant No. 4, were designed to greatly enhance our ability to provide improved service to the water and gas industries.

Placing this plant in operation is but one of a series of moves planned by Mueller Co. Management to further step up the production pace, not only in Decatur, but in our other plant cities as well. Maintaining the best in quality products while continuing to improve service to the customer is the goal of Management at this time.



The Chemical Laboratory plays an important role in the manufacture of Mueller Co. Products. To guarantee that proper materials are used, the laboratory staff runs daily analysis for our Brass and Iron Foundries, assuring us that our customers are always receiving the best in service and quality.

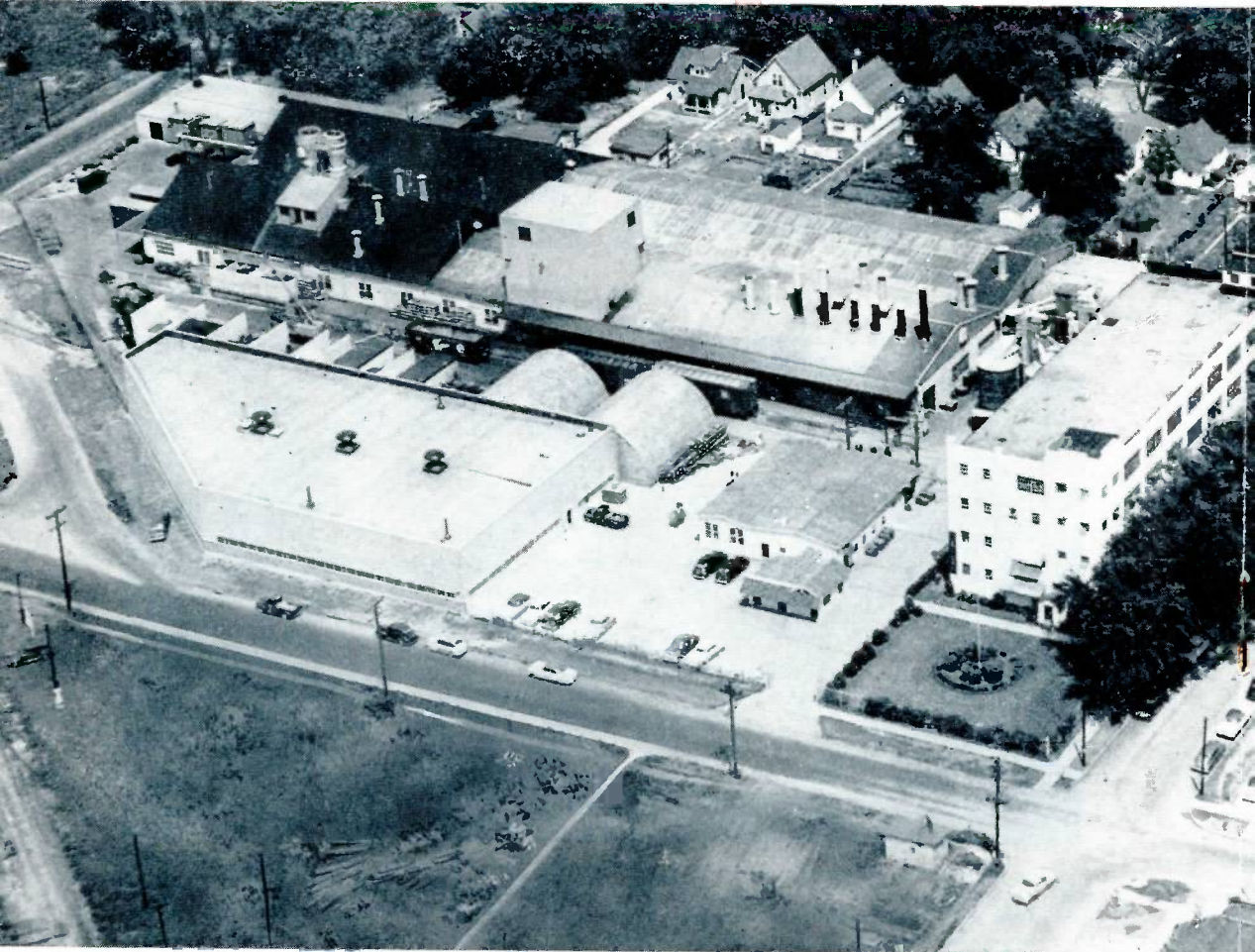
A review of the first full year of operation at Plant No. 4 points up the fact that our customers can not only look forward to improved service, but will also continue to receive the same quality products for which Mueller Co. is so well known.

Many customers and friends already have had an opportunity to visit one of our plants in Decatur, Chattanooga, Los Angeles or Sarnia, Ontario. In every

instance, the visitor expressed his interest and pleasure in a plant visitation. Since the great majority of our customers will never be able to visit our plants, we thought it particularly appropriate that the plant tour literally be brought to the customer.

Photographs on the eight pages included in this article will give the reader an idea of what he would see on a plant visitation of Plant No. 4,

Here's Plant 4 As Seen From 100



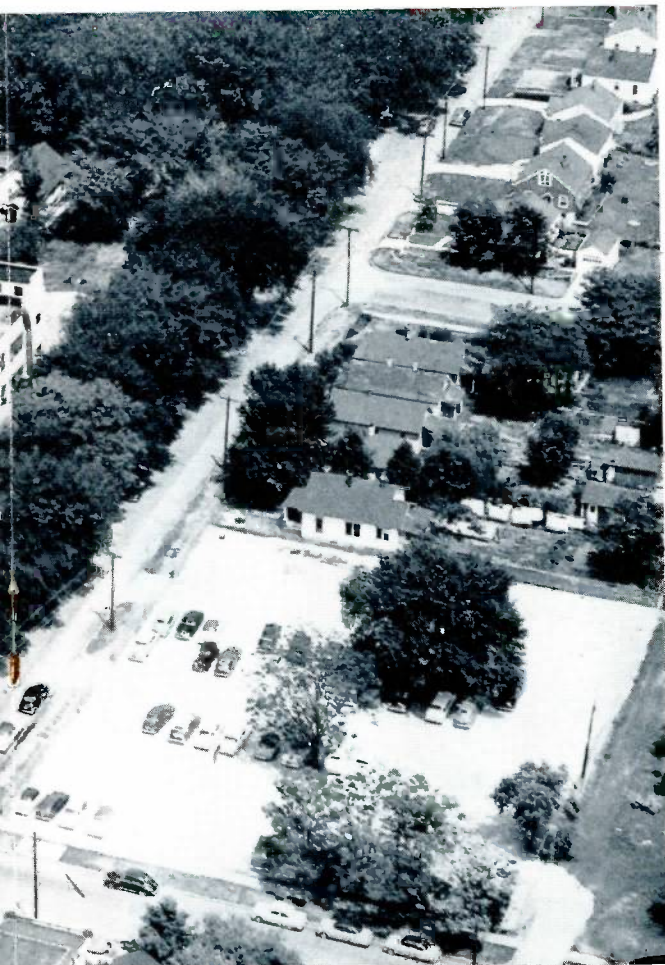
Bringing both the Iron and Brass Foundries under one roof is one of the chief advantages in the new setup of our Decatur factories. Formerly, the Iron Foundry was located in a separate Decatur plant known as Plant No. 2.

The Brass Foundry formerly was located in our main plant which is known as Plant No. 1. The area at Plant No. 1 which was occupied by the Brass Foundry is now utilized for warehousing finished products. This enables us to

increase the manufacture of goods regularly stocked in order that the customer may receive his order promptly whenever possible.

Probably no department in the new plant has saved more production time than that of the Core Room. For example, several cores are blown at one time rather than the single cores as in the past. In addition, cores are baked in a matter of minutes as compared to former procedures of an hour or more.

100 Feet in the Air

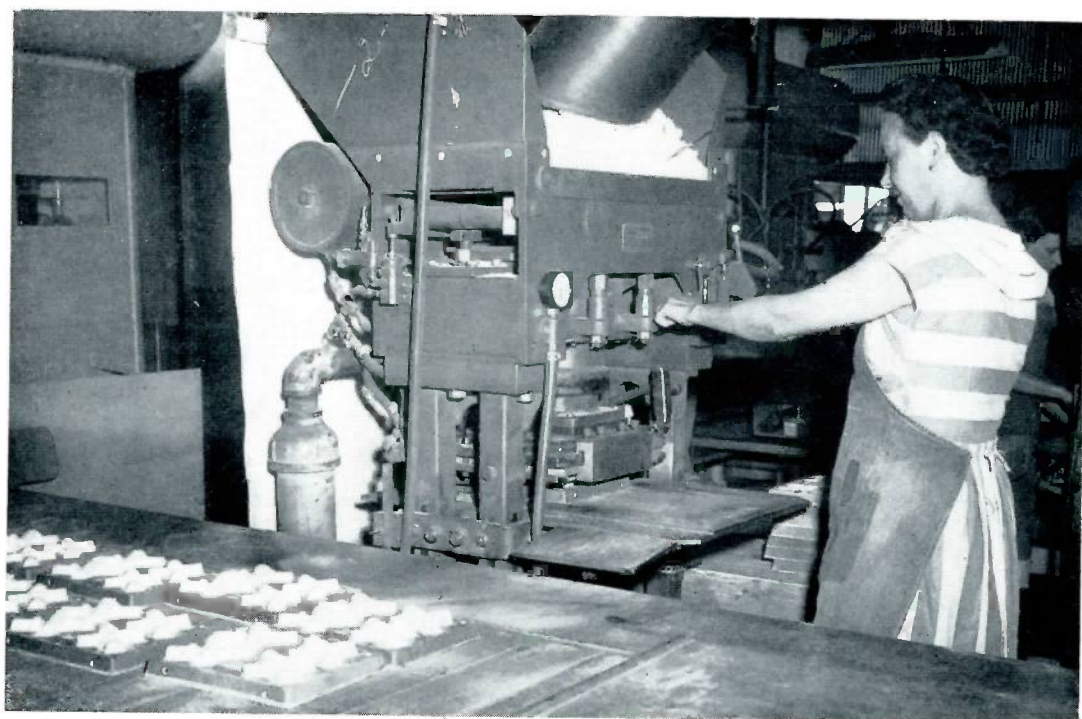


Here is Plant 4 as viewed from nearly 1,000 feet in the air. The four-story building at right is occupied by the Core Room, Pattern Shop, Production Control Department, Chemical Laboratory and a number of other departments. The long building attached to the rear of the four-story building is the Iron and Brass Foundries. The Iron Machine Shop is housed in the building at front left. A spur track bisects the machine shop and foundry building where freight cars are spotted.



When a new product is designed for production, the Pattern Shop is responsible for creating the necessary pattern and core box equipment. Besides maintaining equipment on hand, pattern makers work with engineering groups in the development of new processes such as shell moldings and plastic core boxes for the foundries.

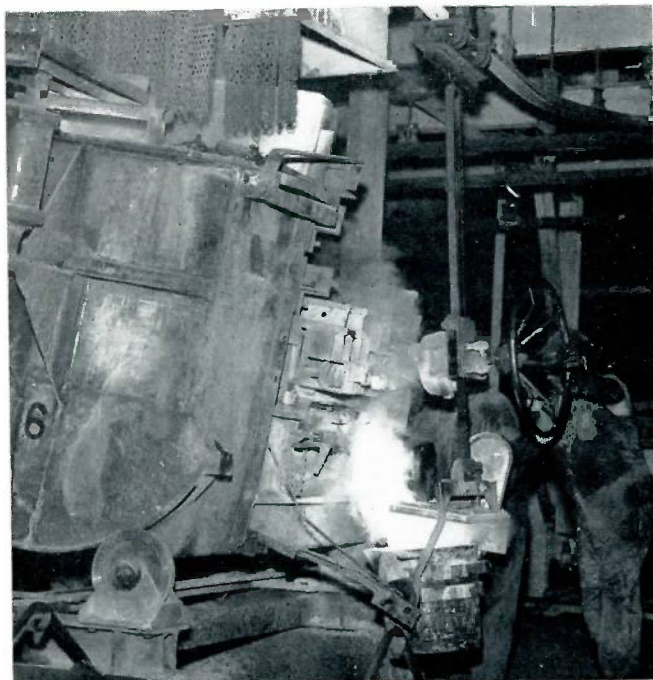
Time saved in the manufacturing process means improved service for the customer. The machine below is one example of the many time-saving features in our new Decatur plant. This machine blows cores in plastic dryers, some of which are shown as they move automatically to the core oven. Several cores are blown at one time rather than single cores formerly blown in metal boxes. In addition, cores are baked in a matter of minutes as compared to former procedures of an hour or more.





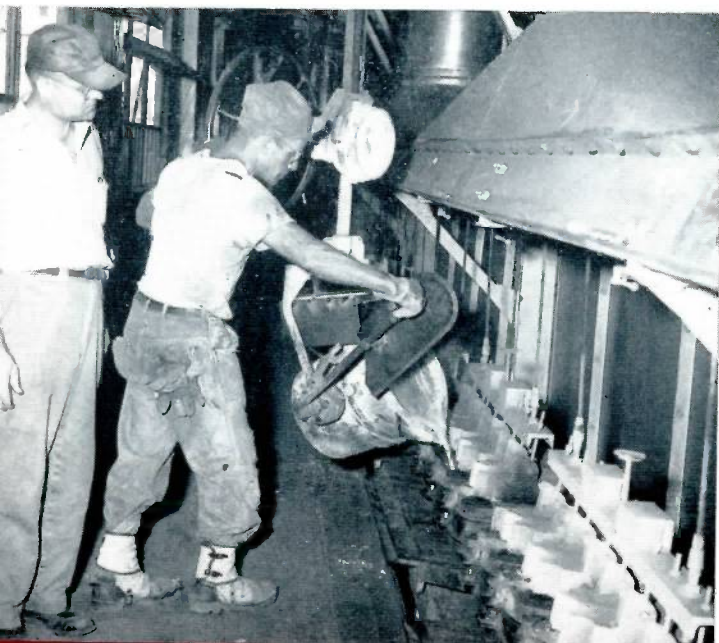
Baked cores are cleaned and inspected by our large staff of Core Room inspectors before being conveyed to the core storage area.

A Brass Foundry furnace operator pours molten brass from a furnace into a 300-pound ladle. The metal is taken from here via a system of monorails to the pouring section.





Visible above are a part of our Plant 4 machine molders each of whom makes molds and places them on the individual cars of the train. To maintain a high rate of production, four trains are in constant operation. While molds are being placed on one train, they are being poured in the second. The third is in a cooling section and the fourth is going through the shake out area where sand and castings are shaken from the flasks. Note the train of molds being dumped in the background.

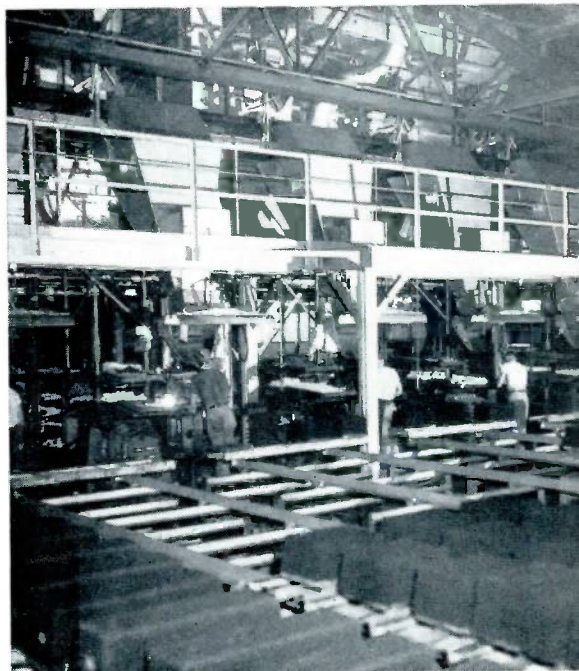


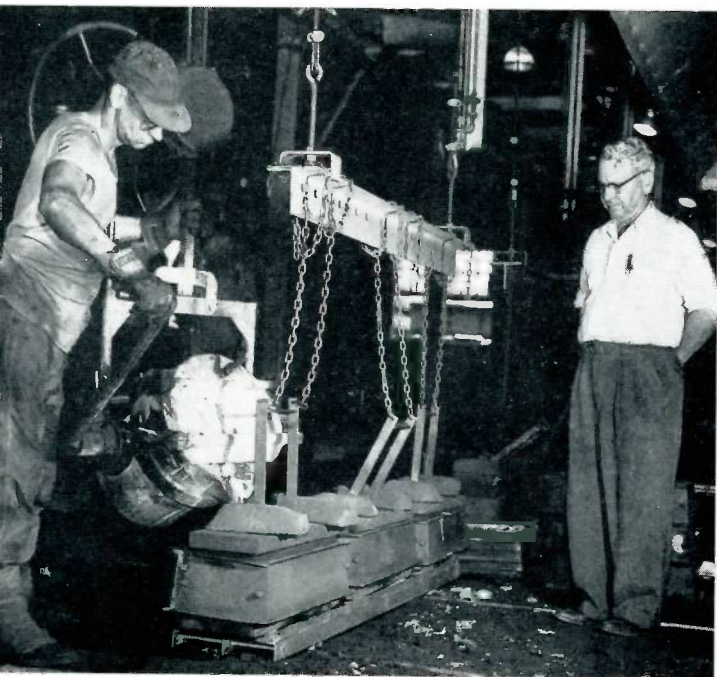
The Brass Foundry foreman looks on as a ladleman pours molten brass into a train of molds shortly after they were made by machine molders. The train is in the pouring zone. After pouring, the train leaves this section and is pulled to the cooling site before being dumped.



Castings are sent through a cleaning process which removes adhering sand and cores, and gives them a golden bronze appearance for which our products are well known. They are sorted, placed in pans and then travel on a conveyor to the four men at left who inspect them and remove any with visible defects. Once inspected, castings continue their journey to the grinders where gates and fins are removed. Two grinders are shown at right.

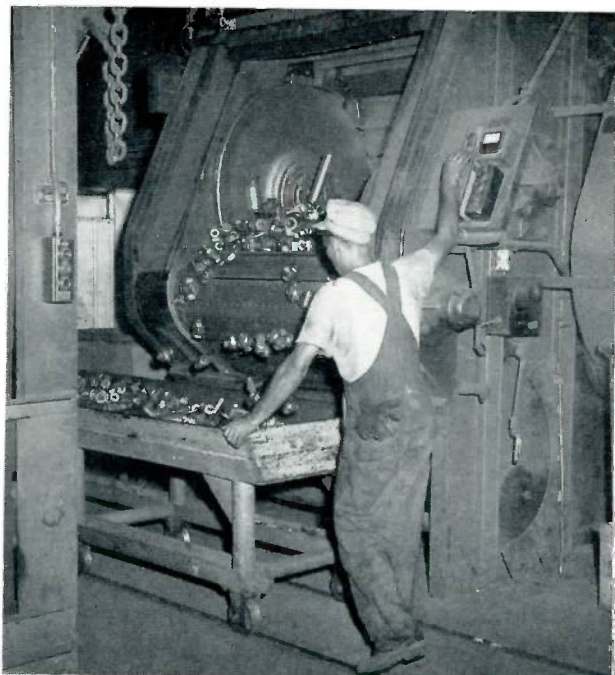
At right is an over-all view of our Iron Foundry Pallet System. This shows the storage of molds on pallets where they remain until the pouring operation begins. Sand conveyors and mold hoppers can be seen at the top of the photo.





At left a ladleman pours molten metal into the molds while our Iron Foundry foreman looks on. Following the pouring operation, castings are shaken from the mold and placed in hoppers where they are cooled.

After cooling, the core sand, gates and sprues are removed and castings are loaded into the Wheelabrator where they are tumbled and blasted with fire iron shot which removes adhering sand. The photo below left shows castings being removed from Wheelabrator onto a large sorting table. They are inspected and identified and then placed in containers in preparation for grinding. At right, a grinding operator grinds off the gate of an iron casting.



Lyle R. Huff Elected Vice President; Other Company Officers Re-elected

Lyle R. Huff, general controller and assistant treasurer of Mueller Co., was promoted December 7 to vice president and general controller at our company's election of officers and directors.

Other officers and directors were re-elected at the annual meeting.

Mr. Huff joined Mueller Co. in 1950 and was appointed general controller and assistant treasurer in 1952. He formerly was an auditor for the Phillips Petroleum Company, an acting instructor at the University of Illinois and a member of the firm of Gauger & Diehl, Decatur, Illinois accountants.

Albert G. Webber, Jr., was re-elected president and treasurer of Mueller Co. for the ninth consecutive time. He also serves as chairman of the Board of Directors.

Other officers re-elected are:

W. H. Hipsher, executive vice president.

Leo Wiant, administrative vice president.

Robert H. Morris, vice president and general sales manager.

Frank H. Mueller, vice president and director of engineering.

O. E. Walker, vice president and works manager.

L. J. Evans, vice president in charge of Eastern Sales.

C. H. Martin, secretary.

Nine persons were re-elected to the Board of Directors.

They are:

W. H. Hipsher
Addie E. Mueller
Frank H. Mueller
Pauline V. Mueller
Richard E. Pritchard
Charlotte Mueller Schluter
Lenore Mueller Schmick
Albert G. Webber, Jr.
Leo Wiant.

Officers and directors of Mueller, Limited, were re-elected December 8 at the annual meeting of the Board of Directors in Decatur.

George W. Parker was re-elected president and treasurer. Other officers re-elected are R. M. Nicolson, vice president and general sales manager; R. J. Skippon, vice president and factory manager; J. Milne, secretary; and C. S. Browett, plant controller and assistant secretary.

Eight persons were re-elected to the Mueller, Limited, Board of Directors. They are:

W. H. Hipsher
J. Milne
Ebert B. Mueller
R. M. Nicolson
George W. Parker
R. J. Skippon
Albert G. Webber, Jr.
Leo Wiant

Just for Fun

According to news reports our jet planes have passed the speed of sound and are fast approaching that of gossip.

* * *

A man on a park bench sat quietly as though asleep, while two other men, one on each side of him, were going through the motions of fishing. With deadly seriousness they'd cast, jerk the lines and swiftly wind imaginary reels. A policeman sauntered over, shook the man in middle and asked, "Are these two guys your friends?"

"Yes, they are, officer."

"Well get them out of the park then."

"Right away, officer," said the man, as he began to vigorously row an imaginary boat.

* * *

We heard a fellow remark the other day that there were just as many careless drivers forty years ago, but the horses had more sense.

MUELLER CO. OFFICERS

As Mueller Co. enters its ninty-eighth year of service, we can look back on a growth that has paralleled the tremendous advance of the water and gas industries. We feel that our very existence is due to the growth of these industries, and we have remained abreast of both by inventing and perfecting products befitting their needs or by improving old products to meet new situations.

This great expansion of water and gas industries makes it no longer possible for our officers and directors to become personally acquainted with each customer and friend of Mueller Co. Yet, each of them does wish to acknowledge their appreciation for the position we maintain in the water and gas industries. They are sincerely grateful for the friendship of those whom they serve.

Each year at this time, the Mueller Record is pleased to take this opportunity to introduce the officers of Mueller Co. to our customers and friends. To each of you throughout the United States and abroad, we present the men who guide the destiny of our firm. They join us in saying to you . . .

Best wishes for a prosperous New Year.



OUR BOARD OF DIRECTORS

MUELLER CO.

W. H. Hipsher
Addie E. Mueller
Frank H. Mueller
Pauline V. Mueller
Richard E. Pritchard
Charlotte Mueller Schluter
Lenore Mueller Schmick
Albert G. Webber, Jr.
Leo Wiant

MUELLER, LIMITED

W. H. Hipsher
J. Milne
Ebert B. Mueller
R. M. Nicolson
George W. Parker
R. J. Skippon
Albert G. Webber, Jr.
Leo Wiant



ALBERT G. WEBBER, JR.

President and Treasurer



LEO WIANT

Administrative Vice President

W. H. HIPSHER
Executive Vice President





LYLE R. HUFF

Vice President and General Controller



ROBERT H. MORRIS

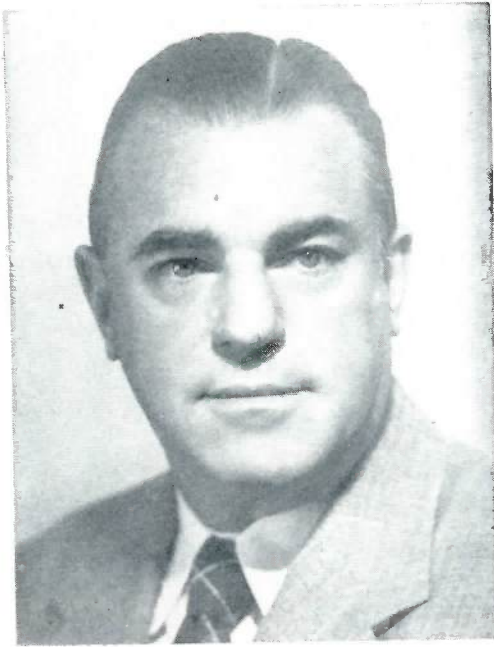
Vice President and General Sales Manager

L. J. EVANS

Vice President in Charge of Eastern Sales



MUELLER RECORD



FRANK H. MUELLER

Vice President and Director of Engineering



O. E. WALKER

Vice President and Works Manager



C. H. MARTIN

Secretary



R. M. NICOLSON
*Vice-President and
General Sales
Manager*



R. J. SKIPPON
*Vice-President
and Factory
Manager*



**GEORGE W.
PARKER**
*President and
Treasurer*

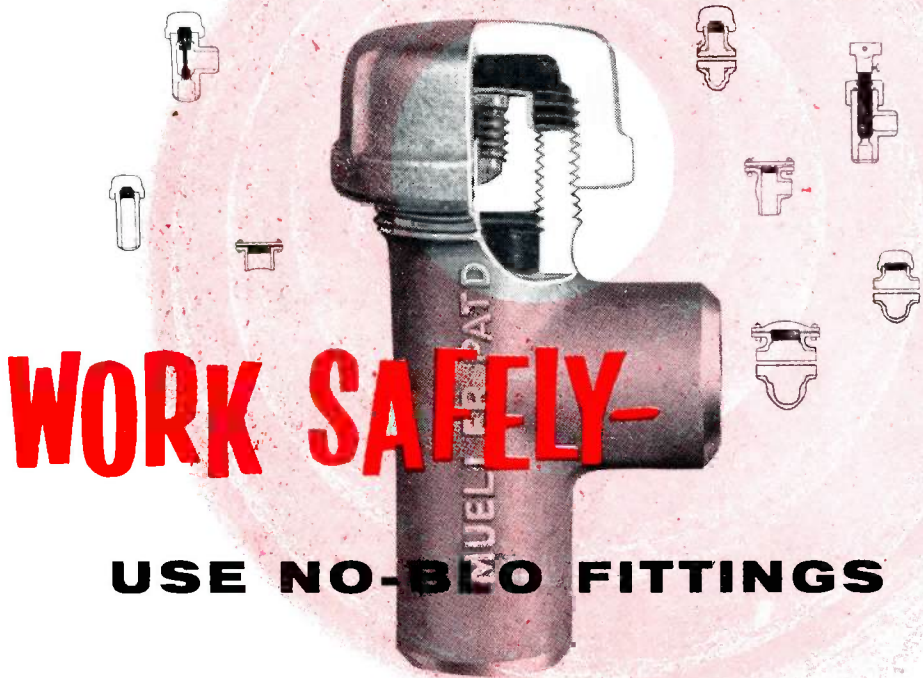
**MUELLER, LTD.
SARNIA,
ONTARIO**

J. MILNE
Secretary

C. S. BROWETT
*Plant Controller and
Assistant Secretary*



MUELLER®



WORK SAFELY—

USE NO-BLO FITTINGS

Patented

A complete line of No-Blo Fittings permit practically all distribution operations to be performed quickly and safely, under pressure, without loss of gas.

The "heart" of the No-Blo Method is an exclusive inner plug, stem or valve that may be installed or removed through a valve, under pressure. For example, the No-Blo Service Tee shown is welded to the main and the service line completed. Next, a control chamber or gate valve is attached to the top of the tee, a drilling machine is attached and the main drilled. This puts the service in operation. The valve is then closed, the drilling machine removed and the drill replaced by the plug



After remounting the drilling machine and opening the valve, the plug is screwed securely into the top of the tee. The drilling machine and valve may now be removed — without escape of gas. A completion cap "buttons up" the fitting and provides a positive double seal.

This same basic procedure is used with other No-Blo Fittings to make service connections, connect temporary lines, stop off mains and service lines for repair or replacement, extend lines, install stops and a myriad of other operations.

Ask your Mueller Representative about the full line of No-Blo Fittings and how they can solve your distribution and maintenance problems.

MUELLER CO.

Dependable Since 1857

MAIN OFFICE & FACTORY DECATUR, ILLINOIS

35 Years Service

J. L. Logsdon, General Manager at Factory In Los Angeles, Retires

J. L. Logsdon, vice president and general manager of the Los Angeles plant, ended 35 years of colorful service with Mueller Co. on his retirement January 1. He first became associated with our company as a sales representative in 1919; however, his knowledge of Mueller products dates back several years prior to that time.

Mr. Logsdon recalls that as a boy out of school he went to work for a large wholesale hardware and plumbing concern in San Diego in May, 1912. "I became manager of the concern's plumbing division," he said, "and it was there that I first learned of Mueller products. We stocked them as our high-grade line of plumbing brass goods as well as Mueller water works goods."

He said that he was very impressed with the way plumbers always ordered Mueller products for use on the best jobs, and he soon found himself trying to sell Mueller products to every customer who called.

When Mr. Logsdon joined the Navy in World War I, he already had decided to seek employment with Mueller Co. after his return from service. He left the service in 1919 and, after applying for the position was appointed a sales representative by Adolph Mueller, company president, who in those days hired all sales representatives. He was assigned to the San Francisco area on May 5, 1919.

Armed with a 30-pound sample case in one hand and a brief case with catalogs of our full line in the other, Mr. Logsdon began calling on plumbers, architects and engineers. He remembers that his first mode of travel was by walking or streetcar. Three years later, he bought a model-T Ford which, he says, at least made it easier to carry the sample case.

His San Francisco territory was extended in 1925 to take in the San Francisco Peninsula down as far as Palo Alto.



J. L. LOGSDON

In 1929, his territory again was extended to include the Monterey Peninsula 135 miles south of San Francisco, and the Northern California Coast line up to the Oregon border. In these territories, he began to call on not only plumbers but water companies and some of the gas utilities.

Again in 1933, Mr. Logsdon's territory was expanded to include the San Joaquin-Sacramento Valley and as far east as Reno, Nevada. He traveled this territory until June 15, 1940, when he was transferred to the Los Angeles plant and appointed assistant manager of the Pacific Coast factory and sales.

On December 31, 1944, Mr. Logsdon was appointed general manager for the Pacific Coast which included factory operations and sales territory in the seven states now served by the Los Angeles plant.

He was elected to the position of vice president in charge of Western sales in July, 1950, and on December 9, 1952, he was elected vice president and general manager of the Los Angeles plant.

Mr. Logsdon is an active member of many professional, civic and fraternal organizations. In retiring from Mueller Co., Mr. Logsdon said he would like to wish his many friends in Mueller Co. and customers of the company best wishes for their continued success.

Earl E. Bright Named Plant Manager At Los Angeles Factory December 1

Earl E. Bright, who on December 1 was appointed plant manager of our Pacific Coast factory in Los Angeles, becomes another of many Mueller Co. leaders who have advanced through the ranks.

Mr. Bright began his career with Mueller Co. on July 1, 1935, as a miscellaneous machine operator in the Los Angeles plant's Brass Machine Shop, two years after that plant was built and placed in operation. The past 19 years have seen him advance to the top of that plant's table of organization.

As plant manager, he will be in charge of all divisions of the plant and will direct its operations in cooperation with O. E. Walker, vice president and works manager, whose office is in Decatur.

After a few months as a machine operator, Mr. Bright was moved to the Tool and Pattern Making Shop where he remained for two years. In 1937, he returned to the Brass Machine Shop as a set-up man, and from this spot he advanced to assistant foreman of the Brass Machine Shop in 1942. He was promoted to foreman of the shop in 1946.

He was elevated to the position of production superintendent in 1950, a capacity whereby he actually served as assistant to the vice president and general manager of the plant. Mr. Bright was promoted to factory superintendent in 1952, the position he has held until



EARL E. BRIGHT

his recent appointment to plant manager.

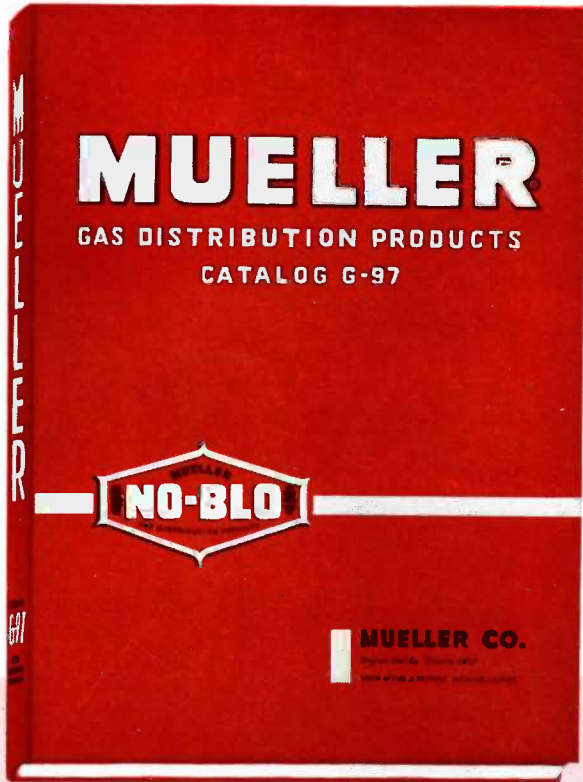
He is a member of the Merchants and Manufacturing Association of Los Angeles. Born February 6, 1917, at Independence, Kansas, Mr. Bright moved with his family to Los Angeles in 1924. He has lived there since that time. His wife, Dorothy, is a native Californian, and they are the parents of one son, Randy Lee. He received his education in Los Angeles.

More than 80 per cent of the average family's income went for necessities in 1900, according to the Chamber of Commerce of the United States, while today the average family spends less than 60 per cent of its income on such needs as food, shelter and clothing. And—largely because of machines, mass production, standardization—those necessities are better, more plentiful, and less expensive.

When government operated the railroads during World War I, taxpayers had to make up a daily deficit of nearly \$2 million, says the Chamber of Commerce of the United States. During World War II, when the railroads remained under private management, they paid the federal government an average of more than \$3 million a day in taxes. The taxpayers were ahead \$5 million a day.

MUELLER®

Catalog G-97
...318 pages
with over 1100
illustrations
and tables...
20 sections
which cover
the complete
Mueller line of
Gas Distribu-
tion Products
...plus useful
engineering
information.



Announcing

THE NEW MUELLER GAS DISTRIBUTION PRODUCTS CATALOG G-97

You may expect your copy of the all-new Mueller Gas Distribution Products Catalog to arrive sometime late in January. If you would like additional copies, please drop us a note - Mueller Co., Decatur, Illinois.

MUELLER CO.

Dependable Since 1857

MAIN OFFICE & FACTORY - DECATUR, ILLINOIS