

# profile...

**A pesticide producer and formulator since 1917, Chipman Chemical has been an active participant in the tremendous development of the ag chemicals industry. Today, 60% of its sales are in products unknown five years ago**

CHIPMAN CHEMICAL was founded in 1917 by Ralph N. Chipman, who previously had been the U. S. representative for Atlas Preservative Co. of England. Striking out on his own, Chipman organized the new firm in Bound Brook, N. J., on the same site where the company's headquarters are located today. In fact, Chipman's first mixing tank is still on the premises and still usable. Although no giant among pesticide manufacturers, Chipman, now with eight plants in the U. S., plays a vital role in providing crop protection.

Since 1926, Chipman Chemical has been a subsidiary of Bernuth, Lemcke Co., an importer of creosote oil and other products. At present, Chipman's four largest plants are at Bound Brook; Pasadena, Tex.; Portland, Ore.; and Palo Alto, Calif. The products manufactured there are mainly herbicides, insecticides, fungicides, and defoliant. Chipman's four other plants are at Bessemer, Ala.; Chicago, Ill.; North Kansas City, Mo.; and St. Paul, Minn., where production is limited exclusively to weed killers.

An affiliated company, Chipman Chemicals Ltd., centralizing its activities in Winnipeg, Man., operates seven plants in Canada. Its product lines are similar to those of its U. S. counterpart. Across the Atlantic, Chipman has another affiliated organization, Chipman Chemical Co., Ltd., in London.

Initially, Chipman Chemical consisted of only one man besides Ralph Chipman. Now it employs close to 200 people, with a peak staff during the busy summer months of about 250.

The first Chipman product was a solution of sodium arsenite, with its primary use as a herbicide, although in various forms it was also employed in killing insects on sheep and cattle and in cleaning decks aboard ship. Sodium arsenite, and arsenicals in general, were for many years the backbone of Chipman's business. Today, the company manufac-

tures over 60 different products of all types—not including special formulations for each individual product.

### **Herbicides Are Major Items at Chipman**

Despite the diversity of its output, Chipman can still give credit to herbicides for a considerable part of its sales.



*The President . . .*

**Warren H. Moyer**

Joined Chipman in 1926

One of the important segments of the company is its railroad division, which supplies herbicides to the railroads for weed control along their right-of-ways. Among Chipman's major items are such nonselective herbicides as Atlas A (sodium arsenite), Chlorax (a mixture of sodium chlorate and sodium borate), and Atlacide (a sodium chlorate-based material). Developed by Chipman in 1926, Atlacide contains special additives that reduce the flammability of sodium chlorate.

In addition to its inorganic herbicides, Chipman also supplies the railroads with

such organic weed killers as 2,4-D and 2,4,5-T. The company also has a fleet of cars available to apply these materials, should the user lack spray facilities.

Most of the inorganic weed killers offered by Chipman are manufactured by the company itself; the company produces all of its own arsenicals. On the other hand, a significant part of Chipman's output consists of formulations of materials produced by others. In addition, Chipman's business involves the direct resale of products.

Next to weed killers, Chipman's most important items are insecticides and defoliant (both types of material being used extensively on cotton). Particularly promising has been Chipman's Shed-A-Leaf defoliant, a chlorate-borate composition developed in 1949 for use on cotton and beans.

The lumber and pulpwood industry today is taking increased interest in Chipman's new debarking formulation, which is applied to the lower part of the tree during the sap-flow season to facilitate the removal of bark. Atlas D, whose principal active ingredient is sodium arsenite, also contains a coloring agent (which makes it easy to determine which trees have been treated) and an animal repellent (to discourage forest animals from eating the poisonous arsenical).

For seed protection, Chipman offers formulations of methoxyethyl mercury acetate (Mema), phenyl mercury urea (Agrox), and phenyl mercury urea and the gamma isomer of benzene hexachloride (Mergamma). These materials find primary application in protecting cotton and grain seeds.

Among Chipman's newer products is a concentrated aldrin solution especially designed for spraying on pelletized fertilizers to control soil insects such as corn rootworm.

### **Moyer President Since 1953**

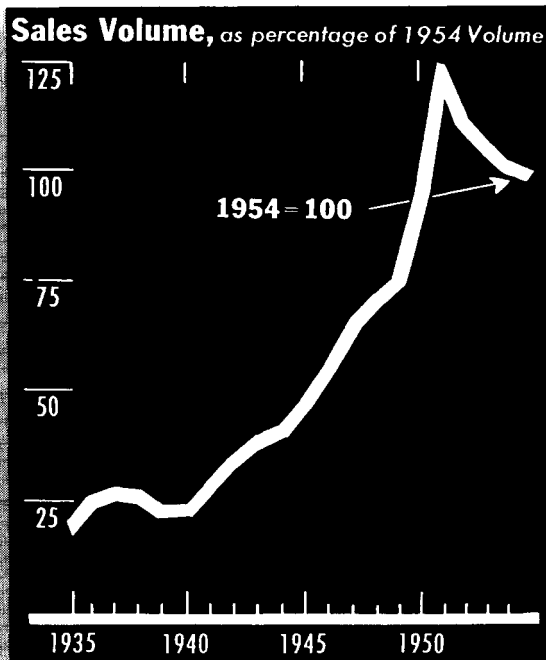
Over-all operations of Chipman Chemical are directed by Warren H. Moyer, who has been president since 1953. Joining Chipman in 1926, Moyer advanced from manager of the railroad division, to treasurer of the company, to vice president, and then to president. During World War II, he was chief of the insecticide and fungicide unit of the War Production Board.

Second in command is Byron P. Webster, vice president, who has been with the company since 1921. Sales manager of the agricultural division is William F. Hall, who has been with Chipman since 1930. Research is directed by Irvin W. Bales, who joined the company in 1936. Thus, Chipman's management team has been with the company from 19 to 34 years.

At Chipman, an increasing emphasis is on research and technical service. The company's main research laboratory

**CHIPMAN  
CHEMICAL CO.**

Starting in 1917 as a producer of sodium arsenite, Chipman Chemical has grown into a diversified manufacturer and formulator of agricultural chemicals. Today, about 70% of its sales are based on products developed within the past 10 years



is at Bound Brook. In addition, all Chipman plants have quality control facilities. The company's total research staff (not including control workers) consists of about 10 people.

In much of its research, Chipman works closely with agricultural experiment stations, as well as with individual growers. Chipman has also given grants-

in-aid to agricultural colleges to carry forward its research programs.

Over the years, Chipman has been an active participant in the phenomenal upsurge of the agricultural chemicals industry. The company remembers, perhaps a bit nostalgically, the days when a manufacturer could sell a single compound such as calcium arsenate for con-

trolling cotton insects. Now a company has to be ready to supply 15 or 20 formulations for this single application.

In repeated instances, the company has seen its products replaced by newer materials. For example, its once widely used lead arsenate has now largely been displaced by DDT on apples and by DDD on tobacco. Its calcium arsenate has been largely supplanted by benzene hexachloride, toxaphene, and other organic insecticides on cotton. As the newer and better materials have been introduced, Chipman has been prepared to supply them. Today, about 70% of its sales are based on products unknown 10 years ago. About 60% of its sales are of products unknown five years ago.

Although business is prospering comparative figures for total sales during recent years may not be as impressive as expected. In part, this results from declining prices of many major items. As an example, 50% DDT spray powder, which once sold for 90 cents a pound, is now down to 21 cents a pound. A cotton dust containing DDT, BHC, and sulfur, which in 1947 sold for 21.5 cents a pound, is now down to 10 cents a pound.

The company reports that, despite keen competitive situations that occur time and again, it is doing well, although below the peak level of 1951. The current year, the company says, has started out significantly better than 1954.

No. 7 | of the

ADVANCES IN  
CHEMISTRY  
SERIES

# Agricultural Applications of Petroleum Chemicals

Tree Spray Oils . . . . . Influence of Particle Size on Application of Sprays . . .  
Insecticide Efficiency of Isoparaffins . . .  
Solvents for DDT . . . Control of Weeds with Mineral Spirits . . . Pest Control in Agriculture . . . Thermal Oil Fogs . . . Oils in Mosquito Control . . . Nematocidal Action of Halogenated Hydrocarbons . . .

104 pages . . . . . paper bound . . . . . \$1.50

American Chemical Society  
1155 Sixteenth St., N.W., Washington 6, D. C.

Get higher formulation yield . . .  
cut formulation costs with these  
two highly efficient insecticidal  
solvents. For prices, tests,  
specifications, write -

Cut formulation  
cost... with  
**TOXISOL A & B**

**RICHFIELD®**  
Manufacturers of Richfield  
Weedkiller "A" (contact herbicide)  
Richfield Aquatic Weedkiller

**RICHFIELD OIL CORPORATION**  
555 South Flower Street, Los Angeles 17, California