# New Products and Equipment...

# Unit Manufactures Neutral Solution Fertilizers

A high-capacity, continuous-flow, neutral-solution fertilizer plant is introduced by chemical plants division, Barnard & Leas Mfg. Co.

Named the B&L CoactoR, it consists of automatically controlled reaction circuit, evaporative cooling system, and all necessary internal piping, and is designed for ready installation by connecting raw material supply lines, finished product lines, and wiring for available power.

The unit receives raw material (anhydrous ammonia and phosphoric acid) direct from tank cars and produces a neutral solution liquid fertilizer that can be stored in ordinary nonpressure black iron tanks. A wide range of ammonium phosphate solutions and complete fertilizer formulas can be produced as well as aqueous ammonia. Controls are preset for the desired formula and can be changed for producing various fertilizer solutions. Automatic safety control instantly stops material flow if raw material supply is shut off.

The B&L CoactoR is available in capacities up to 20 tons of neutral solution liquid fertilizer per hour.

Further information can be obtained from Dept. A&F, Barnard & Leas Mfg. Co., Inc., Cedar Rapids, Iowa.

# Chloropicrin Added to Dow Fumigant Line

Chloropicrin, one of the oldest fumigants known, has been added to the line of fumigants produced by Dow Chemical. It will carry the trademark name Picfume.

This fumigant is effective for control of a wide range of organisms, including such soil pests as nematodes, insects, bacteria, fungi, and weed seeds. It is used also for control of rodents and many pests of stored grain and other commodities.

Picfume is nonflammable and is stable at temperatures normally encountered at use. It readily vaporizes into the air and penetrates well. Its irritating vapors give excellent warning of its presence, which minimizes hazards to users.

Its earliest general field use was in pineapple fields in Hawaii under the pioneering efforts of Maxwell Johnson during the early 1930's. Some newer and cheaper soil fumigants have largely displaced it, but chloropicrin is still unsurpassed for the control of soil diseases in high value crops.

Picfume will carry directions, based upon results of the most recent research and field testing, for use in soil fumigation, fumigation of grain and other stored commodities, and rodent control. Further data can be obtained from Dow, Dept. A&F, Midland, Mich.

## Portable Converter for Anhydrous to Aqua Ammonia

A portable ammonia converter has been designed and manufactured by J. C. Carlile Corp. The converter is mounted on a short lowboy trailer and is capable of speeds up to 45 m.p.h. between stations. The converter is timed to arrive at a station at the same time as a railroad car of anhydrous ammonia. Conversion is accomplished directly from the car and no provision is necessary for storage of anhydrous. A tank car of anhydrous can be converted to aqua ammonia in four to seven hours with the unit. According to the company, the converter can be connected at an aqua station in about

Further information is available from Dept. A&F, J. C. Carlile Corp., 425 Cooper Bldg., Denver 2, Colo.

### New Formulation of Thiram Seed Protectant

An improved thiram product for dry (dust) treatment of seed has been announced by Du Pont. It is Arasan 75 thiram seed disinfectant and protectant, containing 75% thiram, in comparison to 50% thiram in Arasan, which it replaces. The increased thiram content makes it possible to provide greater protection for certain seeds with less total dust applied. In addition to the increased concentration, the new product is a wettable powder which facilitates its use in slurry or sprays for certain specialized applications.

Further data can be obtained from Dept. A&F, product information service, Du Pont Co., Wilmington, Del.

#### Antioxidant for Poultry Feed

Eastman Chemical Products is offering an agricultural grade of butylated hydroxytoluene to the poultry feed industry for use as an antioxidant. The poultry feed industry has been using DPPD (diphenyl p-phenylenediamine) as an antioxidant, but it has been withdrawn from such use by manufacturers because of recent findings concerning its toxicology (AG AND FOOD, May, page 385).

BHT is offered in the form of free-flowing, nondusting granules to feed manufacturers and to manufacturers of feed concentrates. According to Eastman, research at the University of Connecticut indicated BHT to be the equivalent of DPPD for vitamin stabilization, growth stimulation, pigmentation, utilization of vitamin A from carotene, and protection against encephalomalacia.

Further information can be obtained from Dept. A&F, Eastman Chemical Products, Inc., 260 Madison Ave., New York, 16, N. Y.

### Carotene Analysis Aid

Fisher Scientific offers Sea Sorb 43, a specially processed sea water magnesia, for use in analysis of carotene in hays and dried plants. According to Fisher, the magnesium oxide product combines high surface area, large pore size, and mechanical strength with a high degree of basicity and an ionic crystal structure. Sea Sorb 43 is the trademark name of Westvaco Chemical Division of Food Machinery, and the product is available exclusively from Fisher in laboratory quantities.

In addition to carotene determination, Sea Sorb 43's other suggested uses are in chromatographic work on chlorophyll, xanthophyll, steroids, hydrocarbons, organic acids, phospholipids, antibiotics, and vitamins. It can also be used in catalysis, dehydration, isomerization, and dehydrogenation.

Further information can be obtained from Dept. A&F, Fisher Scientific, 308 Forbes St., Pittsburgh 19, Pa.

#### Sorbic Acid

A mold- and yeast-growth inhibitor for use in a range of food products is being made available by Pfizer. Called Sorbistat, the inhibitor is sorbic acid, action of which has been evaluated in such foods as cheese, pickles, fish, soft drinks, prepared gelatin fruit salads, potato salads, chocolate sirup, and cakes. In concentrations effective against mold and veast spoilage, Sorbistat is said not to affect appearance, taste, or odor of foods, nor to retard normal microbiological curing of cheeses. It is a stable, easily stored, white crystalline powder which may be applied by dusting. It can also be used as a solution of sodium sorbate.

A half-pound sample and technical information are available from Dept. A&F, Chas. Pfizer & Co., Inc., 630 Flushing Ave., Brooklyn 6, N. Y.