system. With the ever-increasing number of hospital cases in these categories, some answers must be found or these diseases will outrank all others. The difficulty at present is to reproduce these diseases in the laboratory where they can be studied.

A solution to these problems, Dr. Tainter believes, may well lead to a life span of 100 to 125 years between the years 2000 and 2200.

Public Service of Food Industry. The food industry takes very seriously its responsibilities and obligations to the public, Charles Wesley Dunn, president of the Food Law Institute, stated. This industry, with retail sales of \$64 billion a year, is the largest in the nation. It supplies the public with the highest standard food in history.

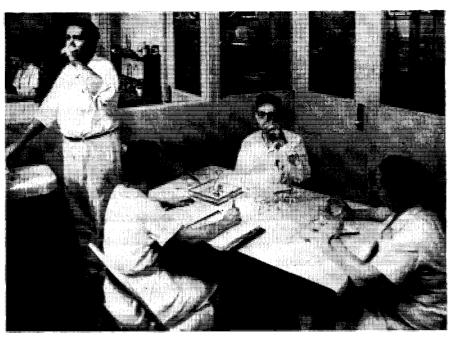
To make further improvements, this industry carries on extensive research and development programs as illustrated by its support of the Nutrition Foundation. It also is carrying on a research and education program in the area of food law through its support of the Food Law Institute.

### industry

## ADM to Make Higher Alcohols From Linseed, Soybean Oils

Vegetable, animal, and marine fats and oils will serve as the raw materials for a plant to be built by Archer-Daniels-Midland for manufacturing unsaturated higher alcohols. The plant is to be built at Ashtabula, Ohio, 55 miles northeast of Cleveland, on a 40-acre site near the city's harbor. Ground-breaking for the plant will occur sometime in June. Actual production is slated to start a year later.

The plant will be close to a supply of



Organoleptic Lab at Monsanto's Queeny Plant

The new organoleptic panel room at the enlarged and renovated analytical laboratories of Monsanto's John F. Queeny plant. Coded samples of Monsanto's flavor and odor products are prepared in the adjoining room and presented to experienced testers in chemically cleaned glassware. Panel judgments are interpreted statistically

metallic sodium, presumably National Distiller's Products Corp.'s metallic sodium plant at Ashtabula. The classical sodium reduction process will be used at the plant, according to Frank C. Haas, vice president of ADM's chemical products division, but new techniques have been developed by ADM researchers to give several manufacturing shortcuts.

Linseed, soybean, and marine oils will be the principal raw materials used for the new alcohols. Soybeans will produce a 92% conversion into alcohols above C<sub>18</sub>; linseed oil, 95%; beef tallow, 65%; and mutton tallow, about 73%. Coconut oil, the favored raw material for alcohol production, produces only about a 10% recovery of the higher alcohols.

According to Haas, use of linseed and soybean oils as a major raw material for higher alcohols is long past due. The linseed molecule, he pointed out, contains more than 800 combinations of fatty acids, while the composition of the soybean oil is almost as complex. In Haas' opinion, these two oils are some of the most promising, but least explored, molecules in existence.

Glycerol and caustic soda will be by-products of the plant,

# Feed Consumption Down; Prices Down 17% from Last Season

Consumption of animal feedstuffs for the first half of the 1952-53 season declined 520,000 tons from the same period last season to a total of 8.9 million tons, according to the Department of Agriculture. Per-animal consumption is also below that for last season and prices have dropped about 17% since the beginning of the season in October.

Among the different types of feedstuffs, USDA reports that consumption of soybean cakes and meals, cottonseed,

### On The Cover-

#### Small Amounts of Chemical Products Improve Nutrition Quality

AN's years of study of the chemical M nature of food products and of the nature of the nutrients required by the body are now beginning to pay dividends at an increasing rate. Years ago he began to understand that proteins, fats, and carbohydrates were needed and he thought that he had come to high understanding of food and health needs. But the discovery of vitamins made him realize that the matter was extremely complex and delicately balanced. Now he is finding increasingly that deficiencies, which can be corrected by mere traces of the right chemical material, can cause serious imbalances and damage. Also

he is seeing ample demonstration that merely having enough to eat doesn't keep a body running right. For example, there are requirements not only for sufficient protein, but also for certain kinds of protein. However, protein quality deficiency can be corrected by supplementation with a small amount of certain chemically pure amino acids or with other foods which are sources of the necessary acids.

On the cover is a graphic demonstration of the small amount of amino acids needed to improve markedly the growth of animals on a cereal diet as shown in the graduate cylinder.