companies in the exposition would convey a wealth of information to all concerned, among whom the public investor is not the least important.

That the dramatization of products is important is borne out by the enterprise of one of the floor brokers discussed in the New York Times of August 3. He surprised his fellow brokers by hanging on one of the trading posts neat samples of the products of the company in whose stock he is a specialist. It was a new idea and a fruitful one, though perhaps not capable of wholesale adoption on the stock exchange, for as the news item pointed out, how could American Locomotive or U. S. Steel set up a representative display without taking an extra building? The Chemical Exposition does, however, offer a place where for a whole week visitors may be educated in the products of the chemical industry. At the same time, in the hours set apart for their special benefit the technical experts of the industry, without interference on the part of crowds of the public, may further their information and pave the way for immediate substantial business.

## Census Figures

SUFFICIENT data have been derived from the most recent census figures to make available certain sets of statistics of interest to industry. We learn, for example, that chemical plants are located to the number of 450 establishments in 156 counties in 33 states. Such information is helpful in indicating where those who would serve these industries may concentrate their sales efforts, and in time such statistics will be broken down to indicate the character of the establishment. As yet the tables do not distinguish between those which produce but a few thousand dollars' worth annually and those whose sales run into the millions.

Many deductions can be made from the figures which each decennial census makes available, but real difficulty lies in the old question of definition. For the figures indicated above only those plants engaged primarily in the production of acids and compounds are included. No chemist's definition of the chemical industry would coincide with the classification established and maintained by the Census Bureau, and consequently those who delve into statistics, while helped to a greater extent by the figures of the United States census than by the statistics compiled by any other country, must expect many disappointments and failure to get at the particularly significant figures which primarily interest them.

## Technical Men Appreciated

SOME time ago we called attention to the change in the attitude of industry during the present recession in business as compared with former times in regard to technical men. It is true that there has been no such diminution in technical staffs as occurred during the previous business depression. On the other hand, plants that had been producing to their utmost capacity have taken advantage of existing conditions to carry on research and development for which there seemed to be no time a year or so ago. A few men have been made available because of mergers and in some cases because of poor business, with the result that other research staffs have been materially strengthened.

Now and then we find an industry which, very much against its preference, has been compelled, because of economic conditions, to reduce its technical staff. We have been impressed with the attitude of some of these concerns. They have parted with men who have been carefully selected and trained with the same reluctance as they would give up any treasure. They realize that in these men they have no small investment. It has cost time and effort to bring them

to their present state of efficiency, and to lose them is not only to sacrifice all this but in many cases to lose men who have endeared themselves to the management because of what they have done and because of their personalities. It is gratifying, therefore, though not surprising, to find the personnel managers of some of these organizations doing their utmost to find proper places for these men. It is not customary to take such pains unless one has a sound appreciation of the men, of their accomplishments, and of their potentialities.

## Growth of Power

THE increased use of power is a favorite way of comparing the industrial prosperity and the standard of civilization of the various countries. Power is fundamental in quantity production, which has been the delight of countries capable of absorbing a large amount of manufactured goods, and the despair of those in which underpaid hand labor is still the outstanding characteristic of industry.

The Bureau of Mines recently issued tables showing the relative rate of growth of coal, oil, and water power in the United States. Reduced to index numbers, taking the year 1918 as 100, we find the year 1889, which is the first for which water-power data are available, with an index of 20. The preliminary figure for 1929 is 121. This is by far the highest figure in our history, and if stated in trillions of British thermal units is 26,471 contrasted with 4316 in 1889.

A closer study of the figures which were compiled by F. G. Tryon discloses that since the war our consumption of coal has not materially advanced, and indeed was lower in 1929 than in 1920, 1923, or 1926. The total energy consumed, however, has notably increased as indicated. These increases, of course, are accounted for by the use of petroleum and petroleum products and natural gas, and in the steady development of our water-power resources.

The tables also give a direct measure of the total demand for energy and the sources which are preferred by an increasing number of large consumers. Few statistics are more interesting and more indicative of the state of our industry and the consuming capacity of our public than these from the Statistics Section, Coal Division, Bureau of Mines.

## The Chemist's Blue Book

A LTHOUGH it appears in a golden colored cover, the new Directory of the AMERICAN CHEMICAL SOCIETY is the blue book of American chemists. This contains information not to be found elsewhere, and many members have already purchased copies, binding themselves not to use the Directory or allow it to be used for advertising purposes. The occupation of the individual is indicated, and there is the geographical summary. The list of corporation members is impressive, while the honorary membership embraces some of the most famous names in contemporary chemistry. The list of past Presidents and present officers, details of local sections, and dates and places of general meetings are of historic interest. A few men who gain their livelihood as chemists still fail to recognize their duty to their professional organization. Their names are not in this Directory.

There is an important use to which employers of chemists put this list, and those who do not have it available more frequently than is generally realized write the Society's officers to inquire whether one under consideration is a member of the American Chemical Society. These inquiries and this use of the Directory show an intelligent self-interest. Especially in these days of limited employment and readjustment, care should be taken to assist all such employers in securing the best the profession affords.