

tioning was instituted in 1939, but resumed an upward trend in 1943 despite the fact that fat rationing continued and was even intensified in 1947. Similarly in Norway, apparent mortality from cardiovascular disease tended to decrease *before* wartime shortages became acute.

Another question often encountered is whether a change in type of fat eaten may be involved in the possible higher incidence of atherosclerosis. The proportion of animal and vegetable fats in the American diet has remained relatively constant, the authors say, citing U. S. Department of Agriculture tables that show a ratio of 70 per cent animal to 30 per cent vegetable fat available for human consumption both twenty years ago and today. While there has been an increase in consumption of hydrogenated fats, this is not held to have produced a drop in the intake of essential fatty acids. Increased saturation of fats induced by the hydrogenation of shortenings and margarines has been balanced by an increased consumption of other fats and oils, largely unsaturated and with a high content of essential fatty acids, and also by decreases in the use of butter and lard.

The report also calls attention to other common factors in human life which are atherogenic but not related to lipemia. Of these, the most common and best documented is arterial hypertension. Patients with severe hypertensive disease leading to atherosclerotic complications, fatal and nonfatal, have not been found to have a demonstrable association between the incidence of these complications and the levels of serum cholesterol or of the various lipoprotein fractions.

For the general public, the safest guide is "nutritional common sense," or the eating of a balanced, varied diet with caloric intake adjusted to overcome or prevent obesity. The fat content should be sufficient only to meet caloric needs and requirements for the essential fatty acids.

These recommendations do not rule out special dietary regimes for patients or individuals with strong family history of heart disease who are seen by their physicians with some regularity. In such cases, newer concepts of nutrition readily suggest various types of diet therapy which may prove useful to certain patients, and at the same time increase the body of data from which dietary recommendations may be made to the public at large.

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DIABETES IN TURKEY

The incidence of diabetes in Turkey, like its occurrence among the Arizona Indians,¹ is probably the same as it is in Europe and the United States. Joslin¹ gives no data on the occurrence of diabetes in Turkey, and no information appears to be available about the country as a whole. Aksan and Yalcin² in 1950 at the Nümune Hospital in Ankara reviewed the reported incidence of diabetes, which has increased steadily since 1928. This increase is due presumably to more diagnostic examinations in new hospitals combined with better national nutrition. Their² unpublished figures for the year 1956 show that among 16,323 patients admitted to this City Hospital, diabetes occurred in 0.76 per cent. These figures resemble Joslin's estimate for diabetes in the United States in 1946 (0.7 per cent). As far as large hospitals are concerned, the disease appears with the same frequency in both countries. Life insurance has not developed as it has in North America, and the valuable facts on the incidence and life expectancy of diabetic patients in insured populations is lacking in Turkey. In particular, this means that terminal vascular complications are poorly documented. However, for Turkey as a whole, failure to recognize diabetes is still a problem. This may be illustrated by the experience of the pediatric service at Nümune Hospital. In the last ten years, in a 200-bed children's ward, only ten diabetics had been seen without one single case of coma. When this was called to their attention, the staff agreed that most children with diabetic coma died at home, at least in the villages. Of course, the statistics and the improved diagnosis are continuing problems in every country.

Physicians in Turkey lack the aids which are available for diagnosis and treatment in this country. At the 800-bed University Hospital in Ankara, there was one dietitian with three helpers. She was unable to give any dietary instruction to outpatients. Even at their medical centers the preparation and use of diet lists is minimal. Moreover, no diet lists are prepared and distributed by pharmaceutical houses, which have been so helpful in this country. The protein, fat and carbohydrate content of foods is available in Turkish,² but the information is seldom arranged as diets with convenient food exchange units. Translation into Turkish and mimeographing of selected diets of the

The Editors of this Journal, believing that wider knowledge of diabetes in all its aspects will be useful to students and practitioners of this subject, invited Dr. Lukens to summarize his impressions of the problems of this disorder as he encountered them on a recent prolonged visit to Turkey.

American Diabetes Association was a first step in the care of patients in Ankara, and it is hoped that this system will be more widely used. Incidentally, when explaining a diet to a Turkish patient, no attempt is made to use quantification by household measures. No uniformity of such household equipment exists in Turkey. However, kitchen scales are used widely by housewives and cooks, and approximate weighing is successful even among ignorant patients.

There are no peripheral vascular clinics, chiropodists, or others to conduct what Joslin has called "beauty parlors for diabetic feet."

Enough insulin seemed to be available at a modest price for those taking a little trouble to obtain it. In use are varied types and concentrations of insulin from many foreign sources. Insulin is not manufactured in Turkey, although there are enough cattle to provide the raw material. Crystalline insulin was prepared in Professor Aras' laboratory in Ankara, and an approximate assay indicated that the insulin content of Turkish cattle is similar to that of American.

Education of both physicians and patients concerning diabetes is generally less advanced than in America. Intelligent diabetic patients are well regulated, mostly from their own efforts, and physicians have an undue

fear of insulin because they have not accepted the responsibility of using it. In this connection it is well to remember that Turkey has overcome malaria and trachoma, is rapidly bringing tuberculosis under control, and has made enormous strides in public health. As their most serious problems are solved, their good physicians will turn to the care of chronic disease as we are doing in the United States.

Now and in the future, the first need for progress in diabetes will be a group of physicians to spearhead the campaign of education in this field. The Turkish Diabetes Association, centered in Istanbul, should become truly national in scope. In conclusion, visiting a country where nothing exists that is comparable to the American Diabetes Association is one of the best ways to appreciate our diverse activities at home.

REFERENCES

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Friedrich von Müller 1858-1941

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A sincere friendship based on mutual respect and appreciation existed between Friedrich von Müller and Sir William Osler. The personalities of both were entirely different, but their main endeavor in advancing the teaching of medicine was the same. Müller was basically stern by nature while Osler's outgoing, winning personality at once captured the attention of everybody.

The father and grandfather of Dr. Müller were physicians. His mother was from a family of patriarchal merchants in Augsburg. The architectural and monumental beauty of his hometown of Augsburg, the town of the Fuggers and the birthplace of Holbein and Mozart's father, influenced his intellectual development. The impressions a young boy absorbs on his way to school may stimulate his imagination and inventive tal-

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ents more than several courses of humanities.

Friedrich von Müller started his studies in the famous laboratories of the chemist Adolf von Bayer at the University of Munich. Here he met Emil Fischer, the pioneer of protein and carbohydrate chemistry. A lifelong friendship with E. Fischer resulted from this rather short episode as a chemistry student, as Müller soon changed to a medical curriculum. Carl Voit, Professor of Physiology, attracted at this time many students (e.g., A. Rubner, Graham Lusk). He also influenced the training and ideas of young Müller—"A correct figure is better than interesting but unproven speculations."

Dr. Müller, having finished his medical curriculum in Munich, became Assistant (Resident) in 1882 to Carl Gerhardt, Professor of Medicine at the University of Wurzburg. With his chief, he published during this