on account of better education and transport in recent years, are a potent factor in spreading the disease and in infecting new areas. This is General Graham's last annual report as Public Health Commissioner and he briefly reviews his decennium in that office and indicates the more salient advances.

## THE FIELD MUSEUM ANTHROPOLOGICAL EXPEDITION TO THE NEAR EAST

THE Field Museum Anthropological Expedition to the Near East, sponsored by Marshall Field, has concluded its work for 1934, consisting of an anthropometric survey of the native population of Iraq, and similar studies in Persia and the Caucasus region of the U.S.S.R.

The leader of the expedition, Henry Field, assistant curator of physical anthropology, has returned to his post in the museum, ready to begin the task of assembling and studying the data collected, which has for its purpose an attempt to solve certain racial problems. One of the objectives is to determine the relationship of the peoples of the Near East, both those of to-day and their ancient ancestors, to the modern and ancient peoples of Africa, Europe and Asia. This is a question of great scientific importance into which no satisfactory research has previously been made.

The work of the expedition covered a period of ten months, during which 17,000 miles were traveled, and 3,000 persons were submitted to studies, consisting of anthropometric measurements and observations, the taking of front and profile photographs, hair samples, blood samples, and other data pertinent to tracing racial origins. In addition to its anthropological work, the expedition collected 3,000 animals, 1,000 insects, 2,600 plants and a quantity of geological material, for the departments of zoology, botany and geology.

Mr. Field was accompanied by Richard A. Martin, of Chicago, who as photographer made 7,000 negatives, and in addition collected the zoological material, as well as assisting the leader in the anthropological work. As many as twelve assistants were attached to the expedition temporarily at various points for local work. The anthropological studies were a continuation of the survey begun by Mr. Field in 1925.

Observations were made upon selected subjects from each of the important racial groups. Of special interest in Iraq were the Kurds, flerce-looking mountain tribesmen, of whom 750 submitted to the anthropologists' calipers and cameras, and the Yezidis, fanatical devil-worshipers, 300 of whom cooperated by acting as scientific specimens. Forty separate measurements and observations were made on each

individual. Living in tents as guests of Sheikh Agil, great desert chieftain of the Shammar Beduins, the members of the expedition were enabled to measure 450 members of this tribe.

The expedition made an archeological survey of the North Arabian Desert, crossing from Baghdad to Trans-Jordan Palestine and Syria, and thence returning to Iraq. During this trip a large number of prehistoric flint implements testifying to the existence of early man in this area were collected.

After five months in these areas, the expedition proceeded to Persia, where anthropological studies were made of some 250 individuals. After completing its work in that country, the expedition entered the U.S.S.R. at Baku, and traveled through the Caucasus to Kiev, Moscow and Leningrad. In the mountains of the Caucasus some 200 men and women were studied.

## PENNSYLVANIA'S PRIMEVAL FOREST

EDWARD E. WILDMAN, member of the "Tionesta Committee" of the Pennsylvania Forestry Association, writes that on Friday, November 23, 1934, the National Forest Conservation Commission approved the purchase by the United States Forest Service of 4,000 acres of primeval forest still standing in Warren and McKean Counties, Pennsylvania, in the northwest section of the state, and within the limits of the Allegheny National Forest Reservation. It is known as the Tionesta Tract.

The stand is mainly a hemlock-mixed hardwood type, with fine old trees here and there of black cherry and cucumber. The Pennsylvania Forestry Association has been urging the preservation of this tract for the past three years as a forest laboratory where only observation, not experimentation, should be carried on. It is with this understanding that the commission authorized its purchase. Trails will be made into the forest where they can be laid without cutting, but no camping there is contemplated.

Under the title "The Thousandth Acre," the tract was described by the Allegheny Forest Research director, R. D. Forbes, recently in *American Forests*.

The Forest Service wants to see how this forest maintains itself and its wild life century after century totally undisturbed by man. Its fauna and flora are typical of the Middle Atlantic States, and therefore this tract is unique, for those of the nearest primeval regions now preserved—the Adirondacks on the north and the Great Smokies on the south—are different in many features. Mr. Wildman writes:

Not only professional foresters, but every student of natural history and every lover of the untouched wilderness will be glad to hear of the success of the association in this endeavor. Historically, its preservation is most fitting, for this tract is part of the actual forest that gave the name Pennsylvania to the province when it was granted to William Penn in 1681. Indeed, the association began its work for the preservation of this tract as its part of the program of celebration in 1932 of the 250th anniversary of the coming of William Penn to his province. Philadelphia and other cities along the Delaware celebrated that event in various beautiful and appropriate ways, but for lovers of the out-of-doors, and Penn himself was one, the preservation of this large tract of Penn's own woods will be counted perhaps first in such a memorial program.

## GRANTS OF THE ELLA SACHS PLOTZ FOUNDATION

During the eleventh year of the Ella Sachs Plotz Foundation for the Advancement of Scientific Investigation, eighty-three applications for grants were received by the trustees, forty of which came from the United States, the other forty-three from thirteen different countries in Europe, Asia and Africa. The total number of grants made during 1934 was twenty-seven, one of these being a continued annual grant. Fourteen of the new grants were made to those working in science outside of the United States.

In the eleven years of its existence, the foundation has made two hundred and twenty-seven grants, and investigators have been aided in Argentina, Austria, Belgium, Chile, China, Czechoslovakia, Esthonia, France, Germany, Great Britain, Hungary, Italy, Jugoslavia, Latvia, Netherlands, Palestine, Poland, Portugal, Roumania, South Africa, Sweden, Switzerland, Syria and the United States.

The list of investigators and the purpose of their researches aided during 1934 is as follows:

Dr. Z. M. Bacq and Dr. M. Florkin, Liége, Belgium, study of the action of various drugs, in relation to the autonomic nervous system, and to the potassium content of the blood serum; Dr. S. J. Crowe, Johns Hopkins Hospital, continuation of experiments on the physiology of the ear; Professor Ludwig Braun, Vienna, Austria, continuation of studies of heart disease; Dr. Douglas R. Drury, University of Southern California Medical School, investigation of experimental renal insufficiency; Dr. Hans Dworzak and Dr. Kurt Podleschka, Prague, Czechoslovakia, study of the growth of ovaries transplanted into the eyes of rabbits as influenced by different hormones; Professor Dr. Philipp Ellinger, London, England, continuation of work on the physiology, pathology and pharmacology of the kidney, and research on microscopical observations of the beginnings of cancer by method of intravital staining; Dr. Giovanni Favilli, Florence, Italy, work on Brucella polysaccharides; Professor René Gayet, Paris, continuation of researches on the output of blood from various organs; Dr. Arthur Grollman, Johns Hopkins University Medical School, continuation of chemical studies on the nature of the adrenal cortical hormone and an investigation of its physiological interrela-

tionships in the organism; Dr. Ellis H. Hudson, Deir-ez-Zor, Syria, investigation of the Arab type of childhood syphilis; Dr. H. D. Kay, Berks, England, investigation concerning the relationship of phosphorus deficiency to rickets; Dr. Edgar Lederer, Paris, continuation of work on carotinoids and vitamins; Dr. David Marine, Montefiore Hospital, further study of experimental exophthalmos and thyroid hyperplasia together with the effect of the antigoitrous agent (ascorbic acid) on these conditions; Dr. Ernst Mueller, Presbyterian Hospital, New York City, capillary pressure estimations; Dr. John P. Peters, Yale University School of Medicine, certain studies of water and salt metabolism, with special reference to nephritis; Dr. Hermann Pinkus, University of Michigan Medical School, investigations with cultures of human tissues, particularly in connection with cancer work; Dr. Eugene Pollak, Vienna, Austria, study of lipoid catabolism in the central nervous system; Professor Hans Pringsheim, Paris, researches in the chemistry and biochemistry of polysaccharides; Dr. Samuel H. Proger, Boston Dispensary, continuation of work on the effect on patients with heart disease of lowering the level of energy metabolism by means of prolonged dietary restriction; Dr. Jane Sands Robb, Syracuse University Medical School, study of the conduction paths in the mammalian ventricles; Professor Rothberger, Vienna, Austria, electrocardiographic research; Thorndike Memorial Laboratory, Boston City Hospital (Professor George R. Minot, director), continued since 1927 in recognition of Dr. Francis W. Peabody's services to the foundation; Professor Waldschmidt-Leitz, Prague, Czechoslovakia, study of the ferments in cancer; Dr. Carl J. Wiggers, Western Reserve University, continuation of work on the dynamics of the coronary circulation; Dr. William F. Windle, Northwestern University, study of the development of behavior in the embryo correlated with the development of intrinsic structure in the nervous system; Dr. M. M. Wintrobe, Johns Hopkins Hospital, studies of the morphological changes in red blood corpuscles in animals; Professor René Wurmser, Paris, continuation of studies of oxidation reduction phenomena in cells.

The maximum size of grants will usually be less than \$500. Applications for grants to be held during the year 1935–1936 must be in the hands of the executive committee before May 1. There are no formal application blanks, but letters asking for aid must state definitely the qualifications of the investigator, the character of the proposed research, the size of grant requested and the specific use of the money to be expended. Only applications complying with the above conditions will be considered. It is also highly desirable to include letters of recommendation from the directors of laboratories or clinics in which the work is to be done.

## THE ANNUAL MEETING OF THE SMITH-SONIAN INSTITUTION

NOTABLE scientific advances in the face of seriously curtailed income were reported to the Board of Re-