

DR. JOHN EDGAR TEEPLE, consulting chemist, known for his work in the development of the potash industry in the United States, died on March 23, at the age of fifty-seven years.

EDWARD DWIGHT PRIEST, designing engineer in the railway department of the General Electric Company, with which he was connected for thirty-four years before his retirement in 1926, died on March 26.

SCIENTIFIC EVENTS

AUSTRALIAN VITAL STATISTICS

THE Sydney correspondent of the *Journal* of the American Medical Association reports that at the end of 1929 the population of Australia reached the total of 6,414,372. The rate of growth during 1929 was 1.22 per cent. and for the ten years 1.92 per cent., which is probably the highest rate of increase in the world. Excess of births over deaths contributed 70.5 per cent. of the total increase, and net immigration 29.5 per cent. The density of population of Australia is only 2.16 persons per square mile, and varies from one person per hundred square miles in the Northern Territory to 20.22 persons per square mile in Victoria.

The birth rate for 1929, 20.31 per thousand of population, was the lowest ever recorded. Compared with many other countries the Australian rate is low, but it is fortunately accompanied by a low death rate, giving a rate of natural increase that is equaled in few countries. Extranuptial births numbered 4.70 per cent. of all births registered. The proportion of multiple births is one case of twins in every 98 confinements and one of triplets in 14,242 confinements. The average number of children per mother was 2.96, against 2.99 in 1928.

During the year, 60,857 deaths were registered, corresponding to a rate of 9.55 per thousand of the population. This rate was slightly above the average of the previous five years, but nevertheless compares most favorably with other countries. The principal causes of death were: heart diseases, 15.3 per cent.; cancer, 10.3 per cent.; violence, 6.0 per cent.; cerebral hemorrhage, 5.8 per cent.; tuberculosis, 5.7 per cent.; nephritis, 5.6 per cent.; pneumonia, 4.9 per cent. The number of deaths in childbirth was 5.1 per thousand children born. The infant mortality rate for Australia (deaths of children under the age of 12 months) per thousand children born was 51. This rate is the lowest ever recorded in Australia and is, with the exception of New Zealand, the lowest in the world. The rate for New Zealand is 34.

THE PACARAIMA-VENEZUELA EXPEDITION

MEMBERS of the American Museum of Natural History, the American Geographical Society and the New York Botanical Garden are organizing an expedition to the unexplored uplands of southern Venezuela. The plans for this undertaking, which is scheduled to begin the middle of August, provide for

a comprehensive scientific survey of the region. In order to facilitate the administrative and executive details of organization a membership corporation has been formed under the title "The Pacaraima-Venezuela Expedition Inc." At the first meeting of the board of directors Mr. H. E. Anthony, curator of the department of mammalogy of the American Museum of Natural History, was elected president of the corporation; Dr. H. A. Gleason, curator of the New York Botanical Garden, vice-president; R. R. Platt, head of the department of Hispanic-American research of the American Geographical Society, secretary, and Fred H. Smith, bursar of the museum, treasurer. The expedition will be led by staff members from the three institutions above mentioned. Those taking part are: Leader, Mr. H. E. Anthony; assistant leader, Mr. G. H. H. Tate, geologist, who has been on seven expeditions to South America for the American Museum; C. C. Graves, formerly of the Field Museum of Natural History expedition to Alaska and the Arctic, geologist; W. B. Miller, Jr., who has traveled in southwest United States, west and southwest Venezuela and northern Rhodesia, topographer and geologist; C. B. Hitchcock, who has already been to Venezuela, botanist; A. C. Smith, acquainted with Peru and Brazil, chief pilot and topographer; G. A. Thorn, aerial photographer and pilot; A. C. McKinley, an assistant aeroplane mechanic, and C. Broten, the three last mentioned having been members of the Byrd Expedition.

The region of exploration consists of about 40,000 square miles at the headwaters of the Orinoco River between Mt. Roraima, a sandstone table-mountain at the junction of Venezuela, British Guiana and Brazil, and Cerro Diuda, a mountain similar to Mt. Roraima, about 400 miles south, on the upper Orinoco. The expedition plans to map this region by means of aerial photography; to outline its physiography and geology; to make collections of its animal and plant life and to study the Indian tribes.

The plan of the expedition has been presented to General Gomez, President of Venezuela, who is in complete sympathy and has assured the leaders of his full cooperation.

SHENANDOAH PARK HIGHWAY

ONE of the most scenic highways of the country, that may ultimately extend for 150 miles, is to be built

along the summit of the Blue Ridge Mountains throughout the length of the Shenandoah National Park area in Virginia. Plans for the construction of this spectacular skyline drive are now being completed by the National Park Service in cooperation with the United States Bureau of Public Roads.

In this connection, decision was reached to limit main-road construction in the park area to this particular project. Already there are roads just outside the proposed park boundary and completely surrounding it, and in addition two lateral roads cross the area. These are the Lee Highway between Sperryville and Luray and the Spottswood Trail connecting Standardsville and Elkton. The tentative plan to construct another lateral road either by way of the Rapidan or the Robertson River Valleys to meet the ridge road has therefore been abandoned.

These final plans are based upon the recommendations of Chief Architect Thomas C. Vint and Assistant Landscape Architect Charles E. Peterson, of the National Park Service, and followed a thorough investigation by them of local conditions. Preliminary surveys have already been made by the Bureau of Public Roads.

While the proposed highway eventually will follow the skyline of the ridge from Front Royal to Rock Fish Gap, between Afton and Waynesboro, the first unit to be taken up for construction is that portion, 50 miles long, between Panorama (Thornton Gap) and Swift Run Gap. At the latter point the road will connect with the Spottswood Trail.

The highway system as proposed under this general development plan will cover the park area more thoroughly than any in the western parks, as it is believed logical to go farther in road development in an area where travel is bound to be heavy owing to its location in or near the more densely populated portion of the United States. Further high-standard road developments, however, will be consistently opposed, since one of the major duties of the National Park Service is to preserve and protect the natural conditions of the wilderness.

Authority for the construction of the highway in the Shenandoah area before the actual establishment of the park was given to the National Park Service that employment might be provided for the sufferers from drought and adverse economic conditions in the Shenandoah Valley.

THE SPRINGFIELD MUSEUM

ACCORDING to *Museum News* plans for the James Philip Gray Art Museum and for an addition to the Natural History Museum have been accepted by the board of directors of the City Library Association, Springfield, Massachusetts. The plans are by E. L. Tilton and Arthur M. Githens, of New York, and

were chosen from a number submitted in competition. They call for two-story structures harmonizing in style and materials with the buildings already on the city library quadrangle, which include the library, the William Pynchon Memorial, the Natural History Museum and the Art Museum. The new art building will be erected on the site now occupied by the George Walter Vincent Smith home; the natural history addition will be on the west side of the quadrangle. The art building will cost about \$350,000; the addition to the Natural History Museum, about \$160,000.

The James Philip Gray Art Museum will house paintings and will thus provide a much needed supplement to the present art building, which is used principally for decorative arts. Pictures will be purchased with the income from a fund of more than \$750,000 bequeathed to the association by Mr. Gray. The natural history addition will furnish needed additional exhibition space, and space for lectures and for the children's work.

Building is expected to begin this summer. The building committee consists of Nathan D. Bill, Edward Kronvall, William B. Kirkham and Hiller C. Wellman. This committee arranged the competition for selecting the architect and named the jury of five to judge the merits of plans submitted. On this jury were Theodore Sizer, of Yale University; Henry R. Shipley and Frederick L. Ackerman, architects of Boston and New York, respectively; Mr. Kirkham and Mr. Wellman, chief librarian of the city library. The successful competitors, Tilton and Githens, have been chosen as architects for the construction of the two buildings.

THE THIRD INTERNATIONAL CONGRESS OF EUGENICS

THE Sixth International Congress of Genetics will be held under the presidency of Professor T. H. Morgan, at Ithaca, New York, in 1932, beginning on August 24. Immediately preceding this congress the Third International Congress of Eugenics will meet in New York City.

According to a statement in the last issue of *Eugenical News*, the First International Congress of Eugenics, which was sponsored by the Eugenics Education Society of Great Britain, was held in London in 1912, under the presidency of Major Leonard Darwin. The second congress in this series was held in New York in 1921, under the presidency of Dr. Henry Fairfield Osborn. The third congress will be held at the American Museum of Natural History, New York, from August 20 to 23, 1932, under the presidency of Dr. Charles B. Davenport, director of the Department of Genetics of the Carnegie Institution of Washington and organizer of the Eugenics Record Office.

The first congress in 1912 set up a Permanent In-