

ton University, died on March 14 at the age of sixty-four years.

DR. FRANCIS PRESTON VENABLE, professor of chemistry emeritus at the University of North Carolina and president of the university from 1900 to 1914, died on March 18, in his seventy-eighth year.

DR. OMAR E. LOWMAN, a member of the department of chemistry at the Iowa State College for the last ten years, died on February 10 in his forty-eighth year.

W. D'ARCY RYAN, head of the illuminating laboratory of the General Electric Company, died on March 14, at the age of sixty-four years.

DR. FREDERIC SHEPARD DENNIS, professor emeritus of clinical surgery at the Cornell University Medical College, died on March 8. He was in his eighty-fourth year.

DR. ROGER S. MORRIS, head of the medical department of the College of Medicine of the University of

Cincinnati, died on March 2 at the age of fifty-six years.

DR. DAVIDSON BLACK, professor of anatomy at the Peiping Union Medical College from 1919 to 1921, when he was appointed to the chair of anatomy and made honorary director of the Cenozoic research laboratory of the National Geological Survey in China, died on March 15, at the age of forty-nine years. He had been working in the laboratory of the Peiping Union Medical College of the Rockefeller Foundation.

PROFESSOR F. W. HARDWICK, emeritus professor of mining in the University of Sheffield, past-president of the Midland Institute of Mining, Civil and Mechanical Engineers, died on January 24, aged seventy-three years.

PROFESSOR FRANCIS LLEWELLYN GRIFFITH, professor emeritus of Egyptology at University College, London, died on March 14, at the age of seventy-two years.

SCIENTIFIC EVENTS

THE KING OF THE BELGIANS AND PROGRESSIVE SCIENCE

THE following account of the service to science of the late King of the Belgians is given in *Nature*:

A great figure of the War has passed away with the death, on February 17, of Albert I, King of the Belgians, at the early age of fifty-eight years. For nearly twenty-five years he guided his people faithfully, carrying them with him through the War years, urging them on and directing their progress during the not less uncertain years following the Peace of Versailles. His work in the political field has been set forth in many places. We are concerned here with his interest in science and scientific research, of which he was a convincing advocate. He played an active part in the development of scientific institutions in Belgium. The protection of flora and fauna, particularly of tropical regions, early attracted his attention, and in 1909, after a visit to the Congo, he put forward a plea for protective measures which culminated with the creation, in 1929, of the Parc National Albert, a nature reserve of nearly 1,400 square miles. So recently as 1932, King Albert visited the Kivu Park with Professor V. Van Straelen in order to see for himself the effectiveness of the protective measures.

King Albert's name will also be associated with the "Fonds national de la recherche scientifique" in Belgium. Speaking at the one hundred and tenth anniversary of the well-known Cockerill iron and steel works at Seraing in the autumn of 1927, the king declared emphatically that pure science is indispensable to industry, and that the nation which neglects science and the savant is marked for decadence. The appeal had an immediate effect. A great gathering was held at the Palais des Académies, Brussels, which was attended by the king,

ministers of state, and representatives of industry, finance, politics, science and the universities. Again King Albert made a powerful plea for science, poor herself but the creator of riches, for security and independence for scientific workers in order that they might devote themselves entirely to their studies; then he announced the creation of the "Fonds national," to which he invited industrial and financial interests to contribute. King Albert was well known in Great Britain, and on a recent visit, his enthusiasm for scientific research led him to spend an afternoon examining the treasures of the Royal Institution, after which he enjoyed a "laboratory" tea with Sir William Bragg and members of the staff, and watched some experiments with liquid air in illustration of the late Sir James Dewar's work.

EXPLORATION OF THE ANTARCTIC

A SPECIAL correspondent from London reports to the *Herald-Tribune* that a British expedition to the Antarctic will start next autumn, under the leadership of John R. Rymill, who was a member of the British Arctic Air Route Expedition, to explore Graham Land and the waters around Luitpold Land and Charcot Land.

Sir Hubert Wilkins flew over this area in 1929. As a result of his reports it has been generally assumed that Graham Land is not a peninsula but an island, but visibility from the air in the Antarctic is very deceptive. According to the correspondent, Rymill thinks that there is still doubt as to whether Graham Land is an island, and it will be one of the objects of his expedition to clarify this point. It is also believed that there are two channels leading up through Luitpold Land, but owing to the difficulty

of distinguishing ice and land from the air, the existence of these channels still awaits confirmation.

The expedition will be equipped with an airplane. It is intended that the machine and crates of equipment will be taken in the *Discovery II* from either Stanley or South Georgia to Deception Island next December. Apart from this the *Discovery II* will not be used by the expedition, which is to purchase a suitable vessel.

According to present plans, the expedition will leave for Graham Land at the end of the summer. The examination of the coastal area mentioned may supply the answer to the old question as to whether the Antarctic is one or two continents.

Support of the British Government to the extent of £10,000 has been promised by the *Discovery* Committee, and a contribution of £1,000 is being made by the Royal Geographical Society.

While not taking any part in the organization of the expedition, the committee is interested in everything relating to whaling and hydrographic research, as any information gained by the expedition regarding the habits and food of whales in the Antarctic areas will be of great value to the whaling industry.

It is stated that Rymill is regarded as an excellent leader, and a worthy follower of Scott and Shackleton. He took over the leadership of the British Arctic Air Route expedition when H. G. Watkins, the English explorer, was drowned when the Eskimo kayak from which he was seal fishing, overturned off the coast of Greenland on August 20, 1932.

EXCAVATIONS IN PALESTINE BY GREAT BRITAIN AND THE UNITED STATES

DR. GEORGE GRANT MACCURDY, of Yale University, director of the American School of Prehistoric Research, has announced that the seventh and final season of joint excavations in the Valley of the Caves at the western foot of Mount Carmel by the American School and the British School of Archeology in Jerusalem is to begin this month, with Miss Dorothy Garrod, of the British School, in charge. Dr. MacCurdy reported the opening in the British Museum of an exhibition of the important Palestinian prehistoric remains resulting from six expeditions conducted jointly by the American and British Schools. Miss Garrod conducted five of these expeditions; Mr. Theodore D. McCown, of the American School, had charge of one.

The specimens exhibited come from a group of three caves in the Wady-Mughara (Valley of the Caves) at the western foot of Mount Carmel, twelve miles south of Haifa, and looking over the Plain of Sharon to the sea. There are also exhibited rare specimens from the Cave of Kebara, some ten miles south of the Wady-Mughara group.

A composite section of the three Wady-Mughara

caves represents at least thirteen culture levels, beginning with the Lower Paleolithic of the Mindel-Riss Interglacial Epoch and ending in historic time: Taya-cian, Upper Acheulian, Acheulio-Mousterian, Lower Mousterian, Upper Mousterian, Lower Aurignacian, Middle Aurignacian, Upper Aurignacian, Lower Natufian, Upper Natufian and Bronze Age to Recent. At least 100,000 years have elapsed since man inhabited the lowest relic-bearing level of this composite section.

In addition to the cultural remains there are numerous skeletal remains of fossil man: a thigh bone of pre-Neandertal man, ten almost complete Neandertal skeletons and some sixty skeletons of the Natufian (Mesolithic) race. These Natufians were fond of ornaments, such as beads, pendants, etc. They seemed to have had the habit of removing the two front teeth before reaching the adult stage. Some of their bone sickle hafts were beautifully carved to represent animal forms. They had apparently learned their first lessons in a simple form of agriculture, but had no domestic animals; neither had they learned the art of pottery making. It is expected that remains of a still older race may be found at the bottom of the Tabun cave, where digging from now until the first of July will be carried on.

Coincident with the opening of the exhibition at the British Museum, Mr. McCown arranged a series of exhibits in the main hall of the Royal College of Surgeons. This was also in connection with the annual Hunterian Festival, Austin Chamberlain being guest of honor at the dinner. Mr. McCown, who is on the faculty of the University of California, will remain for another year at least at the Royal College of Surgeons, in order to complete for the two schools his study of the Neandertal skeletons.

THE KILLCOHOOK MIGRATORY BIRD REFUGE

By executive order of February 3, President Roosevelt established the Killcohook Migratory Bird Refuge on areas acquired by the War Department adjacent to Fort Mott, N. J. This, the latest of a series of inviolate sanctuaries for wild fowl established under authorization of the Migratory Bird Conservation Act of 1929, and administered by the Bureau of Biological Survey, U. S. Department of Agriculture, is the first Federal migratory-bird refuge in New Jersey, and also the first in Delaware.

The area of the new refuge embraces approximately 1,440 acres nearly surrounding, but excluding, the Fort Mott Military Reservation and the adjacent Finns Point National Cemetery, both of which are in Salem County, New Jersey. The refuge itself, however, by reason of the interstate boundary at this