approximately equal numbers, the shorter range being just under two centimeters. The disintegration-yield from boron is roughly twenty times that of lithium at 600 kilovolts, and the majority of these alpha-particles have a range of nearly 3 cm, with a much smaller number having a longer range. Preliminary measurements indicate that for boron about 4,000,000 protons are required to produce one disintegration at 600 kilovolts. These results are in approximate agreement, both as to ranges and disintegration-yields, with those recently reported in *Nature* by Cockroft and Walton.

Dr. Tuve's lecture will be published in the *Journal of the Franklin Institute.*

OBITUARY

TIMOTHY E. WILCOX

BRIGADIER-GENERAL TIMOTHY E. WILCOX, retired Army surgeon, living in Washington, D. C., died on December 10, at the age of ninety-two years. He was born at North Litchfield, New York, on April 26, 1840. He graduated from Union College in 1861 with an A.B. and received the A.M. degree in course.

A brief tour with McClellan's army ended with typhoid fever. His medical studies were resumed and he received M.D. from the Albany Medical College in 1864. He was immediately appointed assistant surgeon of the 6th New York Heavy Artillery. He attended Jefferson Davis during his detention at Fortress Monroe after the Civil War. He was appointed assistant surgeon in the regular army in May, 1867, retiring as brigadier-general in April, 1904. In November, 1898, he went to Cuba as lieutenant-colonel chief surgeon and was honorably discharged in May, 1899.

General Wilcox was a born naturalist. Everything was fish to his net—plants, animals, minerals, insects, worms, reptiles, fossils, etc. The National Museum and other museums received many rare specimens from him. The fossil horns of a tiny deer and those of a primeval ox are in the National Museum. The snake *Tontilla Wilcoxii* Stejneger was from Arizona. *Townsendia Wilcoxiana* Wood was discovered at Camp Supply, Indian Territory, in the seventies. *Primula Wilcoxii* Wood (?) was from Fort Boise, Idaho. *Panicum Wilcoxianum* Vasey was collected in Nebraska, *Quercus Wilcoxii* Rydberg and a cactus from Fort Huachuca, Arizona. His article in *Nature* in 1879–80 calling attention to the absence of angle worms around Boise, Idaho, caused much comment. He was author of occasional notes and papers in medical and other journals. From 1917 he was nearly blind, but his mind was clear to the end.

General Wilcox belonged to Phi Beta Kappa, Alpha Delta Phi, the Cosmos Club, Biological Society of Washington and the National Geographic Society. He joined the Torrey Botanical Club in 1880, being proposed by Dr. Alphonso Wood. In 1930, after 50 years membership, he was made a life member of the club.

WILLARD W. EGGLESTON
BUREAU OF PLANT INDUSTRY
WASHINGTON, D. C.

RECENT DEATHS

W. ALBERT MANDA, of Orange, New Jersey, a well-known horticulturist, died on March 15, at the age of seventy years.

GILBERT CHARLES BOURNE, emeritus professor of zoology and comparative anatomy at the University of Oxford, died on March 9, at the age of seventy-one years.

DR. ROBERT INNES, formerly astronomer for the Union of South Africa, died suddenly on March 14, at the age of seventy-one years.

WILLIAM CAWTHORNE UNWIN, the British engineer, died on March 17, at the age of ninety-four years.

Nature records the deaths of Dr. C. A. Barber, lately lecturer in tropical agriculture at the University of Cambridge, aged seventy-two years; of Sir Benjamin Gott, chairman of the Commission on Educational and Cultural Films, and formerly head master of the Cheltenham School of Science, aged sixty-seven years, and of Mr. J. J. F.-X. King, the Scottish entomologist, aged seventy-seven years. Mr. King had presented his main collection of British insects to the University of Glasgow. The university is now to receive under his will the portrait of Mr. King painted by Forrester Wilson and the remainder of his collections, together with his library of books on natural history.

SCIENTIFIC EVENTS

REPORT OF THE COUNCIL FOR CHEMISTRY

IN its report for 1932, according to a summary given in *Nature,* the Federal Council for Chemistry refers with regret to the necessary postponement of the ninth International Congress of Pure and Applied Chemistry and the eleventh conference of the International Union of Chemistry, which were to have been held in Madrid in 1932. The next meeting of the union will take place in the spring of 1934 in Madrid,

and not in Switzerland, as previously arranged. During the year, the Verein Oesterreichischer Chemiker and the Svenska National Kommitten för Kemie were elected members of the International Union. The report refers to a conference on chemical documentation, held in Paris in October, 1932, and indicates that the Federal Council and the Division of Chemistry and Chemical Technology of the U. S. National Research Council are in complete agreement with regard to certain criticisms of the activities of the International Committee dealing with the reform of biochemical nomenclature. The efforts of the British Standards Institution to extend the use of the words "British Standard" to include "chemical substances used in manufactures, photography or philosophic research and anti-corrosives" were supported by the Federal Council. The Board of Trade agreed to the institution proceeding with an application to register provided that it was in a position to submit support from the appropriate trade association or similar body. The report says: "In October, a committee consisting of Dr. E. F. Armstrong, E. R. Bolton, Dr. L. H. Lampitt, Professor G. T. Morgan, Emile Mond, Professor J. C. Philip, Sir William Pope, J. Davidson Pratt and D. Rintoul was appointed 'To consider how the resources of the various bodies concerned with the professional and scientific welfare of chemists can be most economically and efficiently utilized.' This committee has met on several occasions, and will present, early in 1933, a report on its findings for consideration by the Federal Council."

THE YALE NORTH INDIA EXPEDITION

THE last chapter of one of the greatest geological events in the earth's history, resulting in the elevation of the Himalayan mountains, was witnessed by prehistoric man, according to evidence uncovered by the Yale North India Expedition, led by Dr. Hellmut de Terra, research associate in geology at Yale University. The expedition, which also included Mrs. de Terra, Professor G. E. Hutchinson, of the department of biology, and Mr. G. E. Lewis, paleontologist, has just returned to New Haven after spending the past fifteen months in the Himalayas.

Traces of prehistoric man in the form of knives, scrapers and other implements and the remains of a mammoth, whose former existence in the Himalayas has been hitherto unsuspected, comprised two of the more important finds made by the expedition. The geographical, geological and zoological information obtained is expected, it is said, to change present ideas about the early history and origin of the world's highest mountains.

Dr. de Terra has issued a statement in regard to the exposition in which he says:

The paleolithic implements and the mammoth were found in formations that had been thrown into earth folds during the upheaval and indicate that prior to that time the southern Himalayas were considerably lower in altitude. The rise of the Himalayan range must have continued into historical times. The present high relief of the mountains is a recent achievement and ancient man looked upon a Himalayan range of quite a different appearance from that which modern man sees. We have found proof that prehistoric man in Northern India must have witnessed the last great mountain-making event, which resulted in the present great height of the Himalayas and neighboring high ranges.

The collections made by the expedition have just arrived at New Haven, where most of them will be placed in the Peabody Museum of Yale University. The members of the expedition will complete their investigations here by further study of the finds and their relation to their environment.

ANNIVERSARY OF THE PHILADELPHIA COLLEGE OF PHARMACY AND SCIENCE

THE one hundred and twelfth anniversary of the founding of the Philadelphia College of Pharmacy and Science was celebrated on February 23 with a special convocation at which the honorary degree of master of pharmacy was conferred upon Dr. George Denton Beal, one of the directors of the Mellon Institute of Industrial Research at Pittsburgh. Dr. Beal then delivered at the exercises an address on "Advances in Pharmacy through Scientific Research," in which he reviewed the relation of pharmacy to other sciences and pointed out many instances of the ways in which the practise of pharmacy has stimulated research and scientific advancement not only in pharmacy but also in chemistry, bacteriology, biology and physiology.

The evening of Founders' Day at the College was featured by a testimonial banquet to Professor Frank Xavier Moerk, who is completing his fiftieth year as a member of the teaching staff at the Philadelphia College, where he is at the head of the department of analytical chemistry and is one of the executive officers of the faculty. Dr. Lewis C. Scheffey, 1915, Philadelphia physician who is president of the Philadelphia College Alumni Association, acted as toastmaster.

A feature at the testimonial banquet was the graphic portrayal by undergraduates in the dramatic society of outstanding events in Professor Moerk's career. This dramatic presentation was arranged by Registrar John E. Kramer, 1925. Felicitations of the board of trustees were extended by Professor Joseph W. England, 1883, its chairman, who is head of the scientific department of the Smith, Kline and French laboratories. Dr. Henry V. Arny, 1889, dean of