

are suitable. We would suggest to the Esperantists and Idists that, instead of accentuating their differences, they should endeavour to come to an agreement upon points of difference, and thus present a united front in their campaign in favour of an artificial language.

A FURTHER communication has reached us from Mr. Cyril Crossland (see NATURE, August 4, p. 733), who expresses the view that the use of Hebrew at the Jewish University in Jerusalem is an act of exclusiveness against non-Jews. He urges that Hebrew is a dead language, and only the Zionists are working for its revival, for purely racial and political ends. As a matter of fact, Hebrew is the real living language of the Jews in Palestine. It is the language of instruction of the Jewish schools in Palestine, both elementary and secondary, and is one of the official languages of the country. It would surely be an anomaly to have a Jewish university in Palestine without Hebrew as the language of instruction. Hebrew has already been used for scientific work with great success. To urge that the use of Hebrew means excluding non-Jews is the same as urging that the use of English at a British university means excluding Frenchmen or Germans. Mr. Crossland objects to the statement that Jews are opposed to clericalism, and asks, "Then how is it they remain Jews?" We suggest that he misunderstands the meaning of the word "clericalism," which signifies the usurpation of political power by the clergy, and to this Jews are opposed everywhere. Mr. Crossland refers to the college at Beirut, where instruction is given in English, and to the fact that there are in Palestine native qualified, energetic, and patriotic medical men who can deal with the public health of the country. These facts are irrelevant. Beirut is not in Palestine. Further, public health has been grossly neglected in Palestine, and to object to this being cared for by Jews is an inadmissible attitude.

SOME of the most striking developments of recent years in the education of the medical practitioner have been concerned with the increasing realisation of the need for placing the curriculum upon a solid foundation of pure science. This has in turn reacted upon the teachers of pure science, for it has stimulated their interest in the medical student, with the result that in various universities courses in pure science have been organised with a special eye to his needs. Such a course is illustrated by a pamphlet which has reached us from the University of Melbourne, dealing with the course in elementary physics for medical students in that university. The pamphlet, which is written by Mr. E. O. Hercus, lecturer in natural philosophy, in collaboration with Prof. Laby, is entitled, "Notes on Colloidal State, the Measurement of Blood-pressure, Conservation of Energy in the Human Body." The pamphlet is not a complete syllabus—probably the authorities of Melbourne University have learned what many of our authorities at home have failed to learn—that there is no surer way to deprive university teaching of all life than by forcing it to conform to a cast-iron framework in the shape of a rigid syllabus—but it serves at least to show that the Melbourne course is both interesting and useful. The dispersed condition of matter, solutions, colloids, the processes of filtration and dialysis, the scattering of light, Brownian movement, cataphoresis, coagulation and precipitation, the measurement of blood-pressure, and the energy-changes in the animal body—these subjects are all dealt with in the Melbourne course, and every one of them is of the most immediate importance to the student of the animal body and its functions.

Calendar of Scientific Pioneers.

November 18, 1854. Edward Forbes died.—Though only thirty-nine when he died, Forbes was regarded as the leading British naturalist of the first half of the nineteenth century. He wrote important geological, botanical, and palæontological papers, and furthered the study of marine zoology. Naturalist to the *Beacon* Expedition of 1841, he became professor of botany at King's College, London, and just before his death professor of natural history at Edinburgh.

November 18, 1887. Gustav Theodor Fechner died.—After resigning the chair of physics at Leipzig, Fechner turned to the study of psychology, which he endeavoured to make susceptible to mathematical treatment. He is remembered for the useful Fechner's law.

November 19, 1910. Rudolph Fittig died.—Professor of chemistry at Tübingen, where Ramsay was one of his students, and then at Strassburg, Fittig did original work on the benzene series and made an exhaustive study of unsaturated acids and lactones.

November 20, 1751. George Graham died.—The maker of Halley's mural quadrant and Bradley's sector, "honest George Graham" was the first mechanician of his age, and to him we owe the mercurial pendulum and the dead-beat escapement. He is buried with his master, Tompion, in the nave of Westminster Abbey.

November 21, 1815. James Archibald Hamilton died.—A pioneer among Irish astronomers, Hamilton in 1790 became the first astronomer of Armagh Observatory, founded by Richard Robinson, first Baron Rokeye.

November 22, 1881. Ami Boué died.—Of French descent, but born in Hamburg, Boué studied at Edinburgh, and in 1820 published the first general account of the geology of Scotland. He played a leading part in the formation of the French Geological Society in 1830; and afterwards settled in Vienna, communicating to the Academy of Sciences there important papers on the geology of the Balkan States.

November 22, 1907. Asaph Hall died.—A contributor to many branches of astronomy, Hall achieved popular fame by his discovery on August 11 and 17, 1877, of Deimos and Phobos, the outer and inner satellites of Mars. From 1862 to 1891 he was connected with the Naval Observatory at Washington, and afterwards held a chair of astronomy at Harvard.

November 23, 1826. Johann Elert Bode died.—The founder in 1774 of the *Astronomische Jahrbuch*, fifty-one volumes of which he edited, and known for his enunciation of Bode's law, Bode was a Hamburg schoolmaster who was called to Berlin by Frederick the Great and made a member of the Academy of Sciences.

November 23, 1844. Thomas Henderson died.—The first Royal Astronomer for Scotland, Henderson previously was director of the Cape Observatory. His publication of the determination of the parallax of α Centauri was made only two months later than the publication by Bessel of the parallax of 61 Cygni. These were the first determinations of their kind.

November 23, 1864. Friedrich Georg Wilhelm Struve died.—The fourth son of a Danish professor of mathematics, Struve in 1820 became director of the Dorpat Observatory, whence he removed to Pulkowa as the chief of the famous observatory erected by Tsar Nicolas I. and opened in 1830. Under Struve, Pulkowa became not only a great centre of astronomical work, but the centre also of important geodetical operations. E. C. S.