

NEWS and VIEWS

Science and the Classics

We had thought that the old controversy between science and the classics had been finally disposed of, but a resolution submitted on January 22 to the Lower House of Convocation of Canterbury came perilously near raising it once more. The resolution was moved by Dr. E. G. Selwyn, dean of Winchester, who urged that the revival of classical education is necessary for the good of the Church and of the nation. The classical outlook, in his view, stands for humanism, which includes the belief in absolute standards of conduct and in individual personality. Classics must, however, be made less specialized, and more room must be found for science. On the other hand, it must be recognized by science that concentration on material things imposes certain limitations. Thus in Dr. Selwyn's view, although modifications in the classical type of education are desirable, science would be admitted almost as a poor relation, presumably in deference to the needs of the times.

While no broad-minded man of science would wish to deny that an educational system based on science alone has very definite shortcomings, it is surely out of the question to suggest that any useful purpose can be served by relegating science to a subordinate position in twentieth-century studies. Science and the classics both have a place in modern culture, but should competition arise, it is to be expected that science should be given the greater share of attention. Dr. W. R. Matthews, dean of St. Paul's, discussing the resolution, emphasized that scientific studies have provided openings for many minds not naturally able to profit by classical studies, and pleaded for an all-round education including science. Eventually, the original resolution was modified and carried, with two dissentients, in the following form: "That this House, while recognizing the great value of scientific and other modern studies, is of opinion that wider recognition of the importance of classical education is urgently needed in the interests of the Church and nation and for the maintenance of a stable civilization and culture after the war."

Endeavour

Imperial Chemical Industries, Ltd., has just issued the first number of a new quarterly journal, *Endeavour*, which is designed to record the progress of the sciences in the service of mankind and as evidence of British scientific enterprise. The issue, which is priced at 5s., is well produced, carrying forty-eight pages of text, and well bound, with a drawing on the cover of the barque *Endeavour* which, commanded by Captain Cook, was sent out in 1768 by the British Admiralty to chart the South Pacific Ocean and observe the transit of Venus. After a brief statement by Lord McGowan of the purpose of the new journal, the number opens with a short article on "Science and the Community" by Sir William Bragg. The main feature of this initial number is Dr. H. Spencer Jones, the Astronomer Royal, on the "Distance of the Sun". Other articles are equally as authoritative, as may be judged from the following selection: Dr. C. H. Waddington, "The Epigenotype"—the author's name for the whole complex of development processes which lie between genotype and phenotype; J. G. Crowther,

"Sciences in the U.S.S.R."—though the author confines himself to the physical sciences; we suggest that this be followed by one on the biological, agricultural and medical sciences, for which the world has much to thank the U.S.S.R.; A. L. Bacharach, "The Manufacture and Use of Vitamins"—in which emphasis is placed on British contributions to this important branch of science; G. V. Jacks, "Prospects for Soil Conservation"; F. Fairbrother, "The Cyclotron"; etc.

The edition of *Endeavour* before us is in English. There are to be other editions in Spanish, French and German, and a total distribution of 25,000 copies is contemplated to be sent to colleges, scientific institutions, universities and prominent individuals in foreign countries and the British Empire. The influence of the journal will therefore be much more than national, and we warmly welcome it since, as Sir James Jeans says in a communication, it "will help to make the beneficent advances of science the common property of all nations and of all races". As Lord McGowan points out, *Endeavour* will help to throw the light of science overseas especially to those parts of the globe where intimate contact with Great Britain is at present more difficult to maintain. Emphasis is laid on British scientific work, but as Lord McGowan says, the journal will not be marked by any narrow insularity, as is sufficiently guaranteed by the contents of this inaugural number. We congratulate the editor and Imperial Chemical Industries, Ltd., on this remarkably attractive and efficient achievement and wish it the success which its cause so richly deserves.

Wealden Iron Ore

It is well known, as was recently mentioned in a letter in *The Times*, that iron ore occurs in various parts of the Weald, where mining and smelting were carried on by the Romans, and were continued until the nineteenth century. Smelting ceased in 1828, and mining in 1858. The Wealden iron industry was highly decentralized, and consisted of a large number of small works. It bears no comparison with that of modern times. E. Straker, in his book "Wealden Iron" (1931), lists more than 225 furnaces, forges and bloomeries spread in time over several centuries. The life of many of these was short. The largest works were at Ashburnham; of these, Mr. Straker records that the annual output was about 350 tons. Wealden iron ore is usually a clay-ironstone and occurs in nodules and in thin beds up to a maximum of two feet in thickness, interbedded with shale. Sometimes a pale grey sideritic rock is present. The Wadhurst Clay furnished the bulk of supplies, but the other Wealden formations, and also a ferruginous superficial deposit—an ironstone 'pan' or 'shrave'—yielded their quota. Much was mined from bell-pits, which were rarely more than twenty feet deep, although some were upwards of forty feet in depth. Shale excavated with the iron ore was sold as 'marl' for agricultural purposes; indeed, agriculture and iron ore working seem to have gone hand in hand in many instances. Many quarries were opened primarily as 'marl pits', but all ironstone encountered was separated and sold when sufficient had been accumulated.

The last attempt at exploiting Wealden iron was at Snape Mine, Wadhurst, during 1857-58, ore being sent to Staffordshire. Two beds were worked, one up to two feet in thickness. Both beds were irregular in occurrence, sometimes dying out completely for a