## NOTES AND MEMORANDA

## **OBITUARY**

Dr. J. N. Keynes (1852–1949)

Dr. John Neville Keynes was born at Salisbury on August 31, 1852, to John Keynes and his wife Anna Maynard Neville. The Keynes family came originally from Normandy, and the name is said to be derived from that of a place called Cahagnes in that province. Dr. Keynes's father inherited a manufacturing business, but early relinquished it to his brother and developed a line of his own in scientific floriculture. In this he won a high reputation, and near the end of his life became Mayor of Salisbury. Among the neighbours and friends of the family were the Fawcetts, and Henry Fawcett (whose father William had founded a drapery business in the town) was influential in persuading John Neville Keynes's parents to allow him to embark on an academic career.

After studying at University College, London, Keynes entered Cambridge University as a member of Pembroke College. He took the Moral Sciences Tripos, which then included political economy, and was Senior Moralist in 1875. In 1876 he became Fellow of Pembroke, and in the same year Fellow of University College, London. In the course of his fellowship he filled the office of Bursar at Pembroke.

In 1882 Keynes married Florence Ada, daughter of the Rev. Dr. John Brown of Bedford. His wife, who survives him, has played a prominent part in the municipal life of Cambridge, has been mayor of the town, and has published, in 1947, a most interesting book of studies entitled *By-ways in Cambridge History*. (I have to thank Mrs. Keynes for her kindness in giving me information and answering my questions about incidents in the life and work of her husband which are not on public record).

Shortly after his marriage Keynes and his wife moved into the house, 6 Harvey Road, which he had built. There he spent the rest of his life, and there Mrs. Keynes still dwells. The original wall-paper (one of Morris's) remains on the walls of the dining-room, little the worse for its sixty-eight years of wear. The Keyneses had two sons and one daughter. It is needless to enlarge here on the splendid gifts and the manifold practical and theoretical achievements of the eldest son, John Maynard, who

became Baron Keynes of Tilton. The younger son, Geoffrey, a distinguished surgeon, is well known to another circle as a bibliographer and authority on the works of William Blake. The daughter, Margaret, married the physiologist Professor A. V. Hill. Intellectual distinction persists in the next generation, for two grandsons are numbered among the younger Fellows of Trinity and one among those of King's, and all three appear to be on the threshold of brilliant scientific careers.

Kevnes's activities at Cambridge were a mixture of teaching, research, and administration, all performed with great thoroughness and efficiency. In Keynes's early years at Cambridge G. F. Browne, afterwards Bishop of Bristol, was working at a scheme for local examinations and lectures under the auspices of the University. Keynes worked with Browne, and succeeded him as Secretary to the Local Examinations and Lectures Syndicate when an ecclesiastical appointment took Browne away from Cambridge. Keynes was university lecturer in Moral Science from 1884 to 1911, Chairman of the Special Board of Moral Sciences from 1906 to 1912, and Chairman of the Special Board of Economics and Politics from 1908 to 1920. He became Registrary of the University in 1910, and held that office until 1925. Before his appointment as Registrary he had already acted as Secretary to the Council of the Senate. After his retirement, at the ripe age of seventy-three, he enjoyed another twenty-four years of mental and physical health and happiness, paying until 1939 frequent visits to the Continent, where he made an extensive collection of the butterflies of Central Europe. Until an advanced age he played golf, often with his friend and colleague in moral science, the late Professor Sorley. He was interested to the last in his very fine collection of stamps.

Keynes was actively involved in the proceedings which led to the separation of economics from moral science at Cambridge. These began with the presentation to the Council of the Senate of a memorial, signed by 131 prominent members of the University, asking for the appointment of a Syndicate to inquire into and report on the best means of enlarging the opportunities for the study in Cambridge of Economics and associated branches of Political Science. Keynes's name is not among the signatories; but, when such a Syndicate was appointed in May 1902, he was one of its members. The Syndicate reported on March 4, 1903, recommending the foundation of an Economics Tripos, and Keynes signed this report. On October 21, 1903, the General Board issued a report recommending the establishment of a Special

Board for Economics and Politics. Keynes was appointed to this new Board on June 13, 1906. The first examination in the Economics Tripos was held in the Easter Term of 1905, and Keynes was an examiner then and again in 1907.

Keynes's most important contributions to knowledge were in formal logic and in the logic and methodology of economics. His *Studies and Exercises in Formal Logic* was first published in 1884. In its original form it contained 414 pages, but it was revised and enlarged in successive editions and contains 548 pages of a larger format in the fourth and final edition of 1906. It soon became a standard text-book, and it has been reprinted in recent years.

It is an extremely good book, far and away the best which exists in English on the old-fashioned formal logic and its main developments in the nineteenth century. Keynes settled a number of ancient and troublesome controversies by drawing the necessary distinctions and embodying the results in clear definitions. In this respect his contributions to the discussion of connotation and of existential import and his distinction between what he called "conditional" and "hypothetical" propositions were particularly valuable. Another admirable feature of the book is the treatment of logical diagrams, with its clear recognition that Euler's diagrams have certain existential implications which need to be made explicit if fallacies are to be avoided. connection Keynes showed that, except in the case of the universal negative proposition, an alternation of several of Euler's diagrams is needed to cover precisely the amount of knowledge and ignorance expressed by each of the four standard forms A, E, I and O. The extreme clumsiness of this system for diagrammatic illustration of the various moods and figures of the syllogism then becomes painfully apparent.

In the first edition of Studies and Exercises the last Part, consisting of 125 pages, is devoted to a treatment of the logic of "complex propositions," i.e., propositions which are in the A, E, I or O form but whose subjects and/or predicates are (in the most general case) disjunctions of conjunctions of simple terms and their contradictories. In the latest edition this topic is relegated to a long Appendix, but it remains an important part of Keynes's contribution to formal logic. The problem had been treated in England in various ways by de Morgan, by Boole and by Jevons, and in Germany by Schröder, and Keynes was, of course, well acquainted with their work. His originality consisted in devising and clearly formulating simple, elegant and powerful methods of

treatment, which involve no technical mathematics and depart to the least possible extent from the traditional logic of "simple" propositions.

A great merit of Studies and Exercises is the vast number of interesting and ingenious problems and theorems in formal logic which it provides as practice for the student. Very many of these are marked "K," and these were devised by Keynes himself. The only rivals to them are the numerous examples marked "J." These are due to that very great Cambridge logician W. E. Johnson of King's. Keynes always received and always generously acknowledged great help and inspiration from Johnson. In this connection I cannot resist quoting from a letter which I received from the late Lord Keynes soon after Johnson's death in 1931:

'He used, when I was a child, regularly to lunch at Harvey Road with my father; I should think almost once a week. My father was then writing his book on logic, which would frequently be a matter of conversation and discussion. They seemed to me in those days to sit endlessly over the meal, and I would be in a fidget to be allowed to get up and go. . . . '

When Keynes became Registrary Johnson took over from him the task of lecturing on Logic for the Tripos.

Keynes's one book on Economics, The Scope and Method of Political Economy, was published in 1890, and went into a second edition in 1897. My opinion on points of economic detail would be of no value, but, speaking as an interested outsider, I may say that the book seems to me to have the characteristic merits of Keynes's logical writings. It replaces vagueness and muddle, which had led to long-continued and profitless controversy, by clearly drawn and defined distinctions. The two conceptions of economics as a positive, abstract, deductive science, on the one hand, and as an ethical, realistic, inductive science, on the other, are clearly distinguished and discussed in the Introduction. Then a valuable distinction is drawn between economic uniformities, economic ideals, and economic precepts, and in the light of this the relation of political economy to morality and practice is fully discussed. In the next two chapters Keynes considers the nature of economics as a positive science and its relation to general sociology. After a chapter on the nature and limitations of definitions in political economy there follow three chapters on method, one on the method of "specific experience" generalised inductively, one on the deductive method, and one on symbolical

and diagrammatic methods. Next comes a chapter on the relation of political economy to economic history, with a valuable appendix on the limits of the validity of economic doctrines. The book ends with a chapter on the use of statistics in economic inquiries, followed by a note on the main precautions needed in using statistics in economic reasoning. Keynes's book probably remains to this day the most important contribution made by an Englishman to a topic which has been much neglected in this country, though cultivated intensively by German economists. Unfortunately, both of Keynes's books are at present out of print.

Keynes supplemented this book by contributing a number of important articles on allied topics to Palgrave's Dictionary of Political Economy. His main interests are well shown by the following titles: Analytical Method, A posteriori Reasoning, A priori Reasoning, Deductive Method. He corresponded frequently with Palgrave, and a considerable number of Palgrave's letters to him survive among his papers.

The large and distinguished congregation at the memorial service in Pembroke College Chapel, and the moving brief address by the Master, bore witness to the affection and respect in which Keynes was held. It was a fitting tribute to an eminently useful unpretentious life of clear, honest thinking and hard efficient work in the service of science and of the University of Cambridge.

C. D. BROAD

Trinity College, Cambridge.

Professor Pigou adds the following personal recollections of Dr. Keynes:—

I have two principal memories of Dr. Keynes, first as having examined with him in the early days of the Economics Tripos, secondly as having sat on the Economics Board for a number of years under his chairmanship.

The first time I examined, as a very nervous recruit, Dr. Keynes was chairman of the examiners, and I corrected some papers along with him. I remember feeling very shaky about my placings and a great sense of relief when I found that they agreed substantially with his. He had what, I imagine, was a very unusual method of dealing with examination papers. He would split them up, reading everybody's answers to the first question separately, mark them, and then go on to treat all the other questions in the same way. I don't know whether even he