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**B**Y the death of Professor John Walton on February 13, 1971 the world has not only lost an eminent scientist but also one of the noblest and most gentle personalities whom the writer of these lines has ever known in that most courteous tribe of British gentlemen called "Professors".

Born in 1895, John Walton was the son of the famous British artist, Mr. E. A. Walton who was one of the leading artists in the group known as Glasgow School and President of the Royal Water Colour Society of Scotland.

After having his early education at Daniel Stewart's College in Edinburgh, he entered St. John's College, Cambridge in 1915 and from there he passed his Part II Tripos Examination in Botany with first class, honours. His academic degrees included M. A., and Sc.D. from Cambridge, D.Sc. from Manchester and honorary degrees of LL.D. from McMaster University, Canada, and Dr. es Sc. from Montpellier and Lille Universities in France.

Having been brought up in the Quaker faith he did not join the Army during World War I but in 1918 served on an ambulance train under the Red Cross. He returned to Cambridge in 1918 and joined the brilliant group of palaeobotanists who were at that time researching under Sir Albert Charles Seward, then Professor of Botany and Head of the Cambridge Botany School.

He was botanist to the first Oxford Expedition to Spitzbergen in 1921. In 1922-23 he served as Demonstrator in Botany at Cambridge and from 1924 to 1930 as Lecturer in Botany at the University of Manchester. In 1930 he succeeded Professor F. O. Bower to the coveted Regius chair of Botany at the University of Glasgow and served there with distinction till his retirement in 1962, when he was honoured by being made Regius Professor Emeritus of Botany and from 1967 till his death the Dean of Faculties at the University.

He was a Fellow of the Royal Society of Edinburgh and Vice-President from 1937-40. He was President of the Botany Section of the British Association for Advancement of Science. He was also corresponding member of the Botanical Society of America and honorary member

of the Botanical Society of Poland and Geological Society of Belgium. Being deeply interested in nature conservancy, he worked from 1949 to 1952, as a member of the Scottish Society for Nature Conservancy. From 1949-1954 he was a Forestry Commissioner, Forestry Commission of Great Britain and editor of several National Forest Park Guide Books for Scotland. His other activities included work as Chairman and Vice-President of the Scottish Youth Hostels Association, Governor of West of the Scotland College of Agriculture and Chairman of its Research Committee, President of the Glasgow Tree Lovers Society for many years, President of the Andersonian Society (Naturalists), Glasgow, Member of the Board of Consultants, Muskeg Research Institute, University of New Brunswick, Canada. He inherited a love for the fine arts from his illustrious father and became the Honorary Curator of the Fine Arts Collections at the University of Glasgow. In paying a tribute to Professor Walton after his death, Professor McLaren Young, Professor of Fine Arts in Glasgow University wrote that they found such a sensitive appreciation of art in him that he was an ideal person to whom to turn for a variety of different kinds of advice.

In 1918 he married Dorothy Seward, daughter of his Professor, Albert Seward. Mrs. Walton survives him along with their son, who is a geologist in Canada and daughter, who is a medical doctor in Scotland.

His major contributions include numerous papers on Palaeozoic plants and particularly those from the Lower Carboniferous of Scotland and Wales and from the Lower Gondwanas of Africa. His book, "*Introduction to Fossil Plants*", of which there were two editions in his life time, is still widely used by students of palaeobotany all over the world. Professor Walton's name will remain immortal as the originator of the cellulose peel and transfer preparation techniques and as the discoverer of the first structurally preserved bryophytes from the Carboniferous. The new techniques which he developed created a revolution in the study of fossil plants. Petrified fossils, could now be studied by cutting serial sections like those obtained from living

plants by the use of microtome. Nay, what is not possible even today with a microtome in living plants became possible with the peel section technique in fossils, e.g., the cylindrical peels which he obtained from petrified stems by etching the surface of axes of *Lepidophloios wunschianus* and, thereafter rotating them on a klinostat till the peel solution dried. His transfer technique made it possible to turn compressed fossils upside down by uncovering the surface which used to remain permanently hidden by the rock previously. His new techniques thus enabled palaeobotanists to study fossils in a manner that had never been possible before and what is more, they have helped in locating newer details in previously worked out material.

He was no mere palaeobotanist but his interest included work on living plants like the release of antherozoids from the antheridia of bryophytes and the anatomy of roots of *Equisetum limosum*. His international status as a botanist led to his being invited to give lectures in various countries, France, U.S.A., Canada, Poland, Holland and in India where he was invited to deliver the Seward Memorial Lecture at the Birbal Sahni Institute, Lucknow.

His papers are characterized by a remarkable originality of approach, e.g., his work on the mode of formation of fossil compressions (*Phil. Trans. R. Soc. London*), *Calathospermum*, *Protocalamostachys* (*Trans. R. Soc. Edinburgh*), etc. His theoretical conclusions are marked by a rare brevity and critical appraisal of earlier work so much so that the reader must not only go through the lines of his cryptic remarks but also read between them.

In the proper assessment of his work as Professor of Botany at the University of Glasgow, it would be best to quote from a tribute published in the '*College Courant*' by one of his colleagues, Major S. A. Hutchinson:

"The broad understanding of his subject was reflected in the contributions which he made to many sides of the department's work in his thirty-two years as Regius Professor. His inheritance was a powerful tradition of taxonomic and morphologic teaching, an old building, and the severe financial restrictions of the early 1930's. With enthusiastic vigour he overcame this

situation by obtaining a private donation for a new laboratory. His alertness to changing needs was shown by his decision to allocate this laboratory for advanced teaching and research in plant physiology and mycology. This was the start of other developments which produced a very broadly based department by the time of his retirement. He took a full part in other University affairs, serving as Dean of the Faculty of Science during the difficult period of the Second World War".

"... This is a bare summary of some of the professional achievements of a wise and hardworking man. But those of us who served on his staff know many characteristics which it doesn't reveal. He was a firm, but tolerant and kindly leader. He encouraged his colleagues to develop their ideas in a free intellectual atmosphere, he smoothed their paths and supported them in all ways available to him. He was an unequivocally, almost uncomfortably, honest man, who had a short sharp way with pretentiousness or deceit. But to those who met his standards he was an open-hearted, courteous and sincere friend. His prowess on the tennis and badminton court and earlier on the rugby football field, are well remembered by his contemporaries. His great personal bravery made light of physical disabilities in later life..."

I have had the good fortune of associating myself with him in 1954-1955 and, like many other palaeobotanists all over the world, I owe him a deep debt of gratitude for his generous help in giving material for my work and for his invaluable guidance. A handsome personality, always immaculately dressed, he overwhelmed me by his innate goodness. My stay at Glasgow was made particularly memorable by his and Mrs. Walton's kindnesses and their weekend At Homes and dinners. After leaving Glasgow, I had only one opportunity of meeting him and this was at Lucknow when he came to India in 1964 to deliver the Seward Memorial Lecture. I found him just the same as at Glasgow but he appeared a trifle weak. Needless to say that I shall always cherish the sweetest memories of my visit to Glasgow. In this respect, I am not alone since I have heard many other botanists remembering the kind hospitality of the Waltons with utmost gratitude.

