

OBITUARY

DR. BAINI PRASHAD

DR. Baini Prashad, D.Sc. (Punjab *et* Edinburgh), F.R.S.E., F.L.S., F.Z.S.I., F.A.S.B., F.N.I., one of the most distinguished of the old guard of zoologists in India died unexpectedly at Calcutta on January 18, 1969, a little before his seventy-fifth birthday. In his passing away, India has lost another giant among the pioneers who did yeoman service to Indian Zoology and fostered the development of fishery science in the country.

One of five brothers and one sister, Dr. Prashad was born at Kirtarpur in the Punjab on March 13, 1894 in a family steeped in a tradition of Administrative Service. His father Rai Sahib Devi Das was an Extra Assistant Commissioner, while his grandfather Rai Sahib Gopal Das retired as Commissioner. His maternal grandfather was the Guru Sahib of Kirtarpur.

Dr. Prashad was educated in Lahore and graduated from the Government College, Lahore in 1913, and took the M.Sc. Degree in 1915. During his student days he came under the influence of the well renowned Professor and specialist on Annelida, Dr. J. Stephenson who held the Chair of Professor of Zoology at the Government College. Under his guidance Prashad took the Doctorate Degree of the Punjab University in 1918, his being the first D.Sc. of the University for a thesis submitted by a candidate, earlier awards having been made *Honoris Causa*. In 1927, Dr. Prashad was also awarded the D.Sc., Degree of the University of Edinburgh.

In 1918 he took up appointment in Calcutta as Officiating Director of Fisheries of the erstwhile Bengal, Bihar and Orissa. Here he was associated with Mr. T. Southwell and collaborated with him on investigations on the Indian Shad *Hilsa ilisha* and on fish parasites.

It was a rare honour that he should be the first Indian Director of the Zoological Survey of India previously headed by Dr. Nelson Annandale and Lt. Col. R. B. S. Sewell. At the Survey he maintained the high tradition and standards set by his predecessors and with a select band of hardly a dozen officers which included Dr. H. Srinivasa Rao, the late Dr. Sunder Lal Hora, and Dr. B. N. Chopra, scientific output of a high order was maintained. He organised several faunal surveys and saw that the results were speedily published, drawing in this the help and co-operation of foreign specialists as well.

Due to imminent threat of Japanese air attacks on Calcutta in 1942, the entire Zoological Survey of India was shifted to Banares during his tenure as Director. This was no mean task and was achieved without any loss of valuable scientific material. However, subsequently the fish and insect collections were badly damaged due to unprecedented floods of the Varuna River at Banares in September 1943. Prompt action in the salvaging of the material saved a considerable part of the collections.

Dr. Prashad's interest in animal ecology and evolution was to a great extent aroused and influenced by Dr. Nelson Annandale, Founder Director of the Zoological Survey of India with whom he was closely associated in his formative years at the Survey. His work on the family Vivipariidae is a continuation of the earlier work by Annandale, and this led him to the discovery that the mantle was specifically responsible for the production of shell sculpture. His study of recent and fossil Vivipariidae, their distribution, evolution and palaeogeography is a masterly work well commended. This led him to conclude that freshwater streams were the main channels along which members of this family spread from area to area. He further believed that the evolution of the shell sculpture in the Vivipariidae had a phylogenetic origin and the various series of forms evolved on more or less parallel lines.

The influence of environment on convergent evolution was stressed by him in 1930 and 1931 in his works on parallel evolution of the molluscan faunas of South East Asia and South America, particularly of the members of the gastropod family Ampullaridae (Piliidae), and the pelecypod families Unionidae and Etheridae. He suspected polyphyletic origin of these groups in the different areas where they were originally relict representatives of the fauna of one continental area in another. However, where someone less versed would have jumped to conclusions he was cautious in pronouncing any dogmatic statements. For instance, while considering the respiration of gastropods of the families Neritidae, Ampullariidae, Littorinidae and Cerithiidae based on the great modifications of the pallial roof and some of the components of the pallial complex he was reluctant to speculate on their adaptive or evolutionary implications—enough fodder for another to formulate theories or hypotheses.

His detailed work on the apple snail (*Pila globosa*) appeared in 1932 as the fourth volume in the *Indian Zoological Memoir Series* and is still used widely in the Indian Universities.

The revision of the Indian Nuculidae undertaken by him (1933) was intended as part of the work for a volume on Pelecypoda in the 'Fauna of India' Series, but the latter was unfortunately not completed.

To get a full sense of the range of Dr. Prashad's interests combined as it was with the strictest standard of exact scholarship in his chosen field, one must turn to the bibliography of his works. Suffice it to say that his name will always be remembered in Malacology for the quality of his scientific publications, outstanding among them being the series of monographic revisions of the families Ampullaridae, Nuculidae, Vivipariidae, and the genus *Corbicula* which testify to his critical acumen and masterly exposition.

During his visits abroad he worked on collections in the important Natural History Museums in several European countries, the United Kingdom, and the U.S.A., and also studied modern methods of exhibition and display in Natural History Museums in the U.S.A. These ideas he tried to introduce in the staid Indian Museum, Calcutta of which he was for over fifteen years Chairman of the Committee of Management and Ex-officio Trustee. As Director of the Zoological Survey of India he also edited the *Records of the Indian Museum*, the *Memoirs of the Indian Museum*, the then *Fauna of British India Series* and in 1938 the Silver Jubilee Number of the Indian Science Congress Association entitled 'Progress of Science in India during the past 25 years.'



DR. BAINI PRASHAD (1894-1969)
(Photo by E. G. Silas—taken in April 1968)

He delved into the history of Zoology in India and wrote especially on some of the Pre-Linnéan writers of Indian Zoology. Yet another sphere of his interest was the protection and conservation of our vanishing wildlife, both animals and plants, a theme on which he addressed the National Institute of Sciences of India as its President in 1943. Until his death he was closely associated with the Bombay Natural History Society, the oldest and foremost organization in this country concerned with nature conservation, as a Member of its Advisory Committee.

From the beginning of his scientific career he had been associated in one way or other with fishery research in the country. The year 1943 appears to be a turning point when he started taking a more positive interest in marine research in general and fisheries research in particular. It was then that he took a leading part in initiating the formation of the Central Fisheries Research Institutes for both marine and freshwater fisheries research. In fact, fishery science in this country owes a deep debt of gratitude to him for the categorical recommendations contained in his Memorandum on the Post-war Development of Indian Fisheries (1944). He clearly spelt out that it was not in the interest of fisheries development in the country that the proposed new institutes should be tagged on to the Zoological Survey of India, which would only tend to make them subsidiary activities of the latter. Though still Director of the Zoological Survey of India, this impartial attitude clearly shows his foresight and vision and more than all largeness of heart. His recommendations made it feasible for the separate establishment of the central fisheries Institutes to be considered and endorsed by the Fish Sub-Committee of the Policy Committee on Agriculture, Fishery and Fisheries in their Report of 1945. After Independence he became India's first Fisheries Development Adviser and retired in 1953 after which he was for a short time also associated with the Fisheries Department in West Bengal as its Director.

As a scientist Dr. Prashad enjoyed great reputation in international circles and represented India at several International conferences. He was a Member of the Indian Delegation to the Food and Agricultural Organization of the United Nations at its First Session at Quebec in 1945 and at the Second Session at Copenhagen in 1946. He served as a Member of the Fishery Advisory Committee of the FAO, for three years and on account of his pioneering work in the organization of fisheries research in India he was elected the first President of the FAO sponsored Indo-Pacific Fisheries Council.

He served on several Committees and recognition of his scientific work received several honours and was elected to the Fellowship of different scientific bodies in the country and abroad. He was a Stephenson Research Gold Medallist and was awarded the Joy Gobind Law Gold Medal of the Asiatic Society of Bengal for his Zoological Researches. In 1943, by the then British Government he was awarded the Order of the British Empire (O.B.E.). He was President of the Zoology Section of the Indian Science Congress in 1923 and President of the National Institute of Sciences of India for the years 1942 and 1943.

After retirement he served as a Member of the Board of Scientific Terminology and had been carrying out work in connection with the preparation of Hindi terminology of scientific terms in Zoology and Medical Sciences. For some time he was also in charge of the Zoology Unit of the Editorial Staff of the

'Wealth of India' Dictionary. After retirement he also became involved with a research project on Indian termites in connection with an ICAR Scheme.

All through his life Dr. Prashad retained a keen interest in Persian literature. He carried out intensive work on the Sultanate and Moghul Periods of Indian History, and translated a number of important historical works from Persian to English. At least one was still in press at the time of his death.

Few would know that Dr. Prashad was a connoisseur of rare books and manuscripts and had built up an exceptionally good library of rare works on Malacology and Persian literature valued at more than Rs. 4 lakhs at Lahore which was completely lost during partition. This and the loss of their ancestral home was a great blow, but he never showed it.

As a person, Dr. Prashad was tall and of heavy build. He was highly cultured and an aristocrat among scientists. In his heyday he was virtually an autocrat in whose towering personality many an upstart shrivelled. Both as a scientist as well as an administrator he was a leading force and a man of strong feelings. Though reserve in manner he never hesitated to express an opinion. He had a way of uttering these in the most forceful manner. Though at times he put on a formidable and devastating front, he had an instinctive sympathy for youth who proved themselves. If you disagreed with his views and were able to prove that he was in error, you found that the 'front' disappeared and that mutual understanding was increased.

The last time we met was at Cochin in April 1968. With age he had mellowed, but retained the same alertness and poise and the singular way of shooting questions and before the answer could be completed, remarking 'Yes, I know it, I know it.' During this particular visit he was tremendously impressed with the development of the fishing industry around Cochin and when the topic turned to it with a satisfying and knowing smile he would often repeat 'Yes, I knew it, I knew it.'

In view of his keen interest and foresight in fishery research and the development of marine research at large, he was elected the first Honorary Member of the Marine Biological Association of India in 1959. He was highly appreciative of the work the Association was doing to foster marine research in this part of the world.

To Mrs. Prashad, their two sons and daughter we extend our deep sympathy.

E. G. SILAS