

## **BIOGRAPHICAL SKETCH OF PHOOLAN PRASAD**

Phoolan Prasad worked in the Department of Mathematics (formerly Department of Applied Mathematics till 1989), Indian Institute of Science, Bangalore. After he gave up all official positions, he still works from IISc.

He joined the Indian Institute of Science, Bangalore as a Research Fellow on 9 April, 1965. He held a distinguished chair of MSIL Professorship during 1993-96 in the Mathematics Department of the Indian Institute of Science, Bangalore, was the Chairman of the Department during 1996-2000 and Professor in super-time-scale before his retirement on 31 July, 2006. During 2006-2011, he was Honorary Professor and DAE - Raja Ramanna Fellow at the Indian Institute of Science. And During 2011-2016, he was INSA Senior Scientist and NASI-Senior Scientist Platinum Jubilee Fellow.

As a student of B.Sc. (Hons.) and M.Sc., he won many medals for proficiency in mathematics from Calcutta University during 1962 – 64 and was awarded National Merit Scholarship. For his research contribution in nonlinear waves, he was awarded S.S. Bhatnagar Prize in 1983 by the Government of India and is Fellow of all three academies in India: National Academy of Sciences, Indian Academy of Sciences and Indian National Science Academy.

He has played in India an important role in the development of quality education in mathematics from school education to research. He organized the training camps for International Mathematical Olympiad and worked for the Indian participation to IMO which became a reality since 1989. He was the leader of the Indian team at IMO, 1991 at Stockholm.

He has written more than 75 research papers and 17 review articles on hyperbolic partial differential equations and nonlinear waves, written / edited 9 books, and has written more than 23 articles on mathematical education.

He edited a book "Nonlinear Dispersive Waves in One-dimensional Dispersive Systems" by his teacher P.L. Bhatnagar in Oxford Mathematical Monograph Series (1979) and authored jointly with Renuka Ravindran a

book "Partial Differential Equations" published in 1985 by John Wiley and Wiley Eastern. Most of the material of his third book "Propagation of a curved shock and Nonlinear Ray Theory" by Longman Higher Education (1993), forth book "Nonlinear Hyperbolic Waves in Multi-dimensions", Chapman & Hall/CRC, 2001, and a forthcoming book "Propagation of Multi-Dimensional Nonlinear Waves and Kinematical Conservation Laws" by Springer is based on the research work of his group at the Indian Institute of Science, Bangalore. He was the founding Editor-In-Chief of the RMS Series on Little Mathematical Treasures published jointly by Ramanujan Mathematical Society (RMS).

Since last few years he has again been very active in mathematics education at all levels. He has been giving lectures in INSPIRE camps of 11<sup>th</sup> and 12<sup>th</sup> standard students, organized a 3- day RMS Discussion meeting on school education (with the help of Indian Academy of Sciences), started a new programme of RMS Compact Courses for teaching M.Sc. students in Universities in India and also started Azimpremji University – RMS collaboration in Teacher-Training programme in many cities in India. He continues to organize large number of workshops all over India.

He has visited a large number of universities in Europe and USA as Visiting Professors (including the University of Cambridge) and was also Alexander von-Humboldt Fellow, which provide him opportunity to work in Germany and Austria, the last visit to Germany being in September, 2016. He was a member of the National Board for Higher Mathematics, Government of India from 1986 - 1996 and Vice President of Ramanujan Mathematical Society (1999 - 2001) and then President (2002 - 2003) of the Society.