

Curriculum Vitae of Prof. Prem B. Bisht, M.Sc., Ph.D. (Physics)

Name: Prem Ballabh Bisht

Present Appointment: Professor , IIT Madras (Chennai, India)

Contact Information: Department of Physics, Indian Institute of Technology Madras Chennai, 600 036, Tel. no. 22574866 (Off). 5866 (Lab), 6866 (Home)
E-mail address: bisht at iitm dot ac dot in

Research Areas: Ultrafast lasers, nonlinear optics and dye lasers, Time-resolved fluorescence microscopy & spectroscopy Whispering gallery modes and Förster energy transfer, Optical parametric amplifiers and fluorescence upconversion

Academic/Professional Qualifications:

B.Sc. in Physics, Chemistry, Maths Kumaun University, Naini Tal, India (1983)
M.Sc. in Physics: Kumaun University, Naini Tal, India (1985)
Ph.D.* in Physics: Kumaun University, Naini Tal, India (1991)
**Title: Time-domain spectroscopy of the excited state.*

Awards/Honours:

Senior research fellowship (Council of Scientific and Industrial Research) (1991)
TIFR visiting fellowship, 1991.
MONBUSHO fellow (1991).
JSPS Fellow (1995).
Member, Indian Laser association, Indian Association of Physics Teachers, Indian Science Congress

Career History/Visiting positions:

Visiting Scientist, TIFR, Mumbai (1991),
Research Associate (Monbusho), IMS, Okazaki (1991-1993)
Research Associate (JSPS), Kyoto Institute of Technology (1995-1996)
Assistant Professor (1997-2003), Associate Professor (2004-2008) at IIT Madras, India
IITM-BMBF visitor at Ludwig Maximillian University, Munich, Summer 2002-2004.
Erasmus-Mundus visiting scholar at Heriot Watt University, Edinburgh, Feb-Mar 2009.

Teaching:

More than 15 years of experience in teaching the following courses at undergraduate (B. Tech) and postgraduate level (M. Sc., M. Tech., Ph.D.) at IIT Madras:

Laser Theory, Nonlinear Optical Processes and Devices, Photonics; *Foundations of Experimental Physics (Ph.D.)*, *Introduction to Engineering Physics*;
Introduction to Electrodynamics (Physics II), Mechanics, Optics and Electromagnetism ,
Experimental Techniques, and Lab Course (B. Tech, M. Tech., M. Sc. and Prep. Course).

Research Achievements:

i. Awarded major research grants: Over ₹2.5 Crores (Over US\$650,000)

DST, New Delhi	:	₹ 86 Lakhs.
CSIR, New Delhi		₹ 28 Lakhs
DRDO, New Delhi		₹ 88 Lakhs
BRNS, Mumbai		₹ 57 Lakhs

ii. Supervised 7 Ph.D. and 20 M.Sc./B.Tech. students in last 12 years. Currently 5 Ph.D. + 1 M.Sc. students are working towards their degrees.

iii. Published over 60 papers in refereed scientific journals. Presented over 85 papers in International and national level conferences. 1 National and 1 international patent granted, 1 is pending.

Updated: March 2012 by PBB.