

Curriculum Vitae

Prof. Dr. Manfred Rühle



born 1938
Stuttgart, Germany

Education

Dec. 1962 Dipl.-Phys. Universität Stuttgart (Physics and Mathematics)
Oct. 1966 Dr. rer. nat. (Ph.D.) Universität Stuttgart (Physics)

Employment

Since April 1, 2005 Emeritus Director
since 1989 Scientific Member and Director at the Max Planck Institute for Metals Research,
Honorary Professor, Universität Stuttgart, Stuttgart
1994-1999 Managing Director of the Max Planck Institute for Metals Research, Stuttgart
1993-1996 Director of the “Institut für Werkstoffwissenschaft” at the Max Planck Institute for
Metals Research, Stuttgart
1991-1993 Interim Director at the Max Planck Institute for Microstructure Physics, Halle/Saale
(transition from an Institute of the Academy of Sciences of the GDR to a Max Planck
Institute)
1986-1989 Professor, Materials Department, University of California at Santa Barbara, CA/USA
1971-1986 Group Leader, Electron Microscopy in Materials Science, Max Planck Institute for
Metals Research, Stuttgart
1970-1971 Visiting Scientist, Materials Science Division, Argonne National Laboratory, IL/USA
1967-1970 Research Associate, Max Planck Institute for Metals Research, Stuttgart

Professional Memberships

- American Ceramic Society
- Materials Research Society
- American Physical Society
- Microscopy Society of America
- German Society for Electron Microscopy
- National Academy of Engineering, USA
- German Society for Materials Science
- The Institute of Materials (London)

Professional Honors

2006 Honorary Member, Deutsche Gesellschaft für Materialkunde (DGM)
2005 Honorary Degree (Dr. Ing. E.h.) from Lehigh University in Bethlehem/PA, USA
2002 Peter G. Winchell Memorial Lecture, Purdue University, West Lafayette/IN, USA
2002 Distinguished Life Member of the American Ceramic Society
1999 Honorary Degree (Dr.-Ing. E.h.) from Hanyang University, Seoul, Korea
1999 Heyn-Denkünze der Deutschen Gesellschaft für Materialkunde
1998 Foreign Associate Member of the National Academy of Engineering of the USA
1997 Distinguished Visiting Professor, Materials Department, University of California at Santa
Barbara
1996 Distinguished Research Fellow, Materials Research Laboratory, University of California at
Santa Barbara

- 1996 Distinguished Lecturer, Frontiers of Electron Microscopy in Materials Science, Chicago/IL, USA
 1996 The Robert Maddin Lecture, University of Pennsylvania, Philadelphia/PA, USA
 1996 Van Horn Distinguished Lecturer, Case Western Reserve University, Cleveland/OH, USA
 1995 Member of the Academia Europaea, London, UK
 1995 Fellow of the Institute of Materials, London, UK
 1995 John E. Dorn Memorial Lecture, Northwestern University, Evanston/IL, USA
 1995 Sosman Memorial Lecture (American Ceramic Society)
 1992 Member, Academy of Ceramics
 1992 Fellow of the American Ceramic Society
 1987 Acta Metallurgica Outstanding Paper Award for 1986
 1983 Prince Award, Arizona State University
 1982 Carl-Wagner-Preis
 1969 Masing-Preis

Professional Activities

- 2004 International Advisory Board, International Center for Materials Research at UCSB, CA, USA
 2004 International Advisory Board, International Center for Young Scientists at NIMS, Tsukuba, Japan
 2002 International Advisory Committee of Shenyang National Laboratory for Materials Science, P.R. China
 2002 International Review Panel on Materials Research in the United Kingdom (sponsored by EPSRC)
 2001-2002 President, German Society for Materials Science
 2000-2003 Chairman of the Scientific Council of the Max Planck Society
 1999 Advisory Board of the Department of Energy (DOE) of the USA
 1999-2000 Member, Board of the German Society for Materials Science
 1995-1997 Member, Council of the Materials Research Society, Pittsburgh/PA, USA
 1994-1997 President, German Society for Electron Microscopy
 1990-1992 Member of Founding Committee of the Technical Faculty of the University of Kiel
 1987-1990 Review Committee, Materials Science Division, Argonne National Laboratory

Scientific Journals

- 2003 Editor-in-Chief, Zeitschrift für Metallkunde
 2002 Editorial Board, Reports on Progress in Physics
 2001-2009 Co-Editor, Annual Review of Materials Research
 1999 Editorial Board, Advanced Engineering Materials
 1998 Editorial Board, Materials Science & Engineering A
 1996-2002 Co-Editor, Interface Science (with D. Srolovitz)
 1996 Regional Editor, Journal of Microscopy
 1996 Regional Editor, Journal of Electron Microscopy
 1996 Editorial Board, Ultramicroscopy
 1995-2003 Co-Editor, Zeitschrift für Metallkunde (with G. Petzow, P. Schepp)

Research Interests

Microstructure-properties relationship of advanced materials. Microstructural characterization of high performance materials with emphasis on transmission electron microscopy, including high-resolution and analytical electron microscopy, structure of grain boundaries in ceramics, analysis of atomistic structure of interfaces, determination of chemical composition of materials with high spatial resolution, bonding and debonding mechanisms at interfaces. Displacive transformations in inorganic materials.