Venkatesh “Venky” Narayanamurti

Benjamin Peirce Professor of Technology and Public Policy, Engineering and Applied Sciences and Physics, *Emeritus*

Harvard John A Paulson School of Engineering and Applied Sciences

and Harvard Kennedy School

Pierce Hall 107D

Harvard University

Cambridge, MA 02138

(617) 384-8211 (617) 496-3742 (FAX)
venky@seas.harvard.edu

*Citizenship:* U.S.A.

*Education:* B.Sc. (Honors), Physics, University of Delhi, 1958
M.Sc., Physics, University of Delhi, 1960
Ph.D., Physics, Cornell University, 1965

*History:* Benjamin Peirce Professor of Technology and Public Policy and Director, Science, Technology and Public Policy Program, Harvard Kennedy School, 2009-2015;Benjamin Peirce Research Professor of Technology and Public Policy at HKS and SEAS (2015 -2020)

Founding Dean, School of Engineering and Applied Sciences, 2007-2008

 Dean of the Division of Engineering and Applied Sciences and John A. and Elizabeth S. Armstrong Professor of Engineering and Applied Sciences and Professor of Physics, Harvard University, 1999 -September 2007

 Dean of Physical Sciences, Harvard University, 2003-2006

 Dean of the Division of Engineering and Applied Sciences and Gordon McKay Professor of Engineering and Applied Sciences, Harvard University, 1998-1999

Dean, College of Engineering and Richard A. Auhll Professor of Engineering, University of California at Santa Barbara, 1997-1998

 Dean, College of Engineering and Professor of Electrical and Computer Engineering, University of California at Santa Barbara, 1992-1997

 Vice President of Research and Exploratory Technology, Sandia National Laboratories Albuquerque, New Mexico, May 1987-January 1992

 Bell Laboratories, Murray Hill, New Jersey: Director of the Solid State Electronics Research Laboratory, 1981-1987; Head of the Semiconductor Electronics Research Department, 1976-1981; Member of the Technical Staff, Physics Research Laboratory, 1968-1976

 Instructor in Physics, Cornell University, 1967-1968

 Asst. Professor of Physics, Indian Institute of Technology, Bombay, 1965-1967

*Awards &* Honorary Doctor of Science, Tohoku University (2009);

Arthur M. Bueche Award , National Academy of Engineering (2018)

*Honors:* Member, National Academy of Engineering (1992)

Foreign member, Royal Swedish Academy of Engineering Sciences (1987)

 Fellow, American Academy of Arts and Sciences (2007)

Fellow, American Physical Society (1981)

Fellow, Indian Academy of Sciences (1974)

Fellow, American Association for the Advancement of Science (1982)

Fellow, IEEE (1986)

Foreign Associate, Third World Academy of Science (1997)

Honorary Member, Materials Research Society of India (1995)

Member, New York Academy of Sciences (1984)

Distinguished Visiting Scientist, Jet Propulsion Laboratory, Cal Tech (1992-1998)

Physicist of the Year Award, American Chapter, Indian Physics Association (1993)

Award of Merit from New York Chapter of the Society of Technical Communications, for paper “Using Sandia Technologies for Improving National Competitiveness” (1993)

Medal of Service, University of Helsinki (1994)

Excellence in Service Award, South Coast Business & Technology Forum (1996)

Innovator of the Year Award, Santa Barbara Chamber of Commerce (1997)

Fellow, California Council on Science and Technology (1997)

Venky Narayanamurti Entrepreneurial Leadership Fund (annual award created at the University of California, Santa Barbara) (1999)

American Physical Society (APS), Centennial Lecturer, 2000

The “Venkatesh Narayanamurti Endowed Chair in Computer Science” was created at the University of California, Santa Barbara (2005) through a generous donation by the Lopker Family Foundation and an anonymous UCSB alumnus.

Eli Jury Award Lecturer, University of Miami, 2005

Benton Lecture, University of Florida, Gainesville, 2009

Numerous keynote lectures at major international conferences over the years

Visiting Professor, Harvard Business School, 2008-2009

Asian American Engineer of the Year Distinguished Science and Technology Award, Chinese Institute of Engineers, 2012

*Service:* Member, Panel on Public Affairs (POPA), American Physical Society (APS)—1984-1987

Chairman, American Physical Society Subcommittee on International Scientific Affairs (SISA)—1984-1986

Organizing Committee on the International Conference on Physics of Semiconductors—1984, 1986

Organizing Committee on the International Conference on Modulated Structures—1984, 1987

Organizing Committee of the Conference on Physics of VLSI—1984

Organizing Committee on the International Conference on Phonon Scattering in Solids—biennially since 1975

Editorial Advisory Board, *Superlattices and Microstructures*, since 1984

NAS Research Materials Briefing Panel—1982

Vice Chairman NAE/NRC Panel on “Photonics Science and Technology”—1987, 1988

Member AIP Committee on International Scientific Affairs—1986, 1987

Chairman, Advisory Board, School of Electrical Engineering, Cornell University—1989-1991

Science Board and Regional Council, Santa Fe Institute—1987-1991

Chairman, Science Board, Synchrotron Radiation Laboratory, Stanford University—1991-1992

Microfabritech Board, U. of Florida—1989-1990

APS Council Nominating Committee—1989-1991

Editorial Board, AT&T Technical Journal—1987-1991

Science Board, Air Force Phillips Lab—1990-1991

Vice-Chair, IUPAP Commission on Physics for Development—1990-1996

Chairman, Alliance for Photonics Technology Advisory Board—1990-1991

Review Panel on the Future of MRLs, NSF—1992-1993

Enrico Fermi Award Committee, Department of Energy—1992

Advisory Board, Mechanical and Electronics Engineering Division, Los Alamos National Laboratory—1993

Member of the Microelectronics Science Board, Jet Propulsion Laboratory (Cal Tech)—1987-1998

Physics Board, Brooklyn Polytechnic—1989-1993

Cornell Nanofabrication Facility Policy Board—1991-1993

NSF Engineering Advisory Board—1992-1996

Chair, Inertial Fusion Advisory Committee, Dept. of Energy—1992-1995

External Examiner for Professor of Applied Physics, University of Helsinki—1993

UC President’s Task Force on Research and Technology Transfer—1992-1993

UC President’s Science and Technology Evaluation Panel for the National Laboratories—1993-1998

Visiting Review Committee, Ginzton Laboratory, Stanford University—1993

UC President’s Director’s Review Board, Lawrence Livermore National Laboratory—1993-1994

Public Information Advisory Committee, NAE—1993-1998

General Conference Chair, 5th Annual Workshop on Ballistic Electron Emission Microscopy (BEEM), Mohonk, NY—January 1994

Industrial Advisory Board, Los Alamos National Laboratory—1994-1999

Materials Advisory Board, Los Alamos National Laboratory—1994-1998

NSF Director’s Strategic Planning Group—June 1994-1995

UC President’s Council on the National Laboratories—1994-1998

Chair, Science Panel, Corporate Research Laboratories, Exxon Corporation—1994

Editorial Board, *Current Opinion in Solid State and Materials Science*—1994-2003

Program Committee, International BEEM/STM Workshop, Berlin, 1995

Organizing Committee, International Phonon Scattering Conference, Ithaca, NY, 1992; Hokkaido, Japan, 1995

NASA Review Panel for Low Temperature and Microgravity Physics—1995

Visiting Committee, Physics, Brookhaven National Laboratory—1996-1999

Visiting Committee, Physics, University of California at San Diego—1996

Advisory Board, School of Electrical Engineering, Cornell University—1996-

George Pake Prize Committee, American Physical Society—1996 (Vice-Chair)-1997 (Chair)

Chair, Visiting Committee, Applied and Engineering Physics, Cornell University—1996

Chair, Condensed Matter and Materials Physics Panel, National Research Council, Board of Physics & Astronomy—1996-1999, as part of decadal Physics Survery

Board of Directors, Terabit, Inc.—1997-1998

Board of Directors, Surface/Interface Inc.—1997-1998

Member, Solid State Sciences Committee, National Research Council, Board of Physics and Astronomy—1998-2001

Chair, Visiting Committee, Materials Science, Brookhaven National Laboratory, 1999

Scientific Advisory Board, Nova Crystals, 1999-2002

Chair, Advances Scientific Computing Initiative (ASCI), Blue Ribbon Panel, US Department of Energy—1999-2001

Dean’s Leadership Council, Princeton University—2000-2004

Chair, Visiting Committee, Department of Electrical Engineering, Princeton University—2000

Advisory Board, Miller Institute for Basic Research in Science, U.C. Berkeley—2000-2006

External Reviewer for Department of Electrical & Computer Engineering, Northwestern University-2001

External Review Board DIMES (Delft Institute of Micro Electronics), Delft, Netherlands, 2002

Chair, Committee of Visitors, Division of Materials Research, National Science Foundation, 2002

DIMES Scientific Council (Delft Institute of Micro Electronics), Delft, Netherlands, 2003-2005

Member, Engineering Dean’s Leadership Council, Cornell University, 2003-2008

Member, Academic Advisory Council, Industrial Research Institute (IRI), 2003-2005

Member, National Academy of Engineering, Finance and Budget Committee, 2003-2009

Member, Advisory Board, Mathematical and Physical Sciences, NSF, 2003-2006

Member, Brown University Advisory Council on Engineering, 2004-2009

Member, Brookhaven National Laboratory Board, 2004-2005

Member, Alliance for Science and Technology Research in America, (ASTRA) Board, 2004-2005

Member, Review Committee, Engineering and Physical Sciences Research Council, United Kingdom, 2004

Chair, Dan David Prize Committee, 2005

Member, Engineering Dean’s Council, Public Policy Committee, 2005-2008

Member Center For Integrated NanoTechnologies (CINT) Executive Governance Board, Sandia National Laboratory, 2005-

Member, Council on Competitiveness, National Innovation Initiative Strategy Council, 2005

Member, National Research Council’s MRSEC Assessment Committee, 2005-2007

Member, Mork Family Department of Chemical Engineering and Materials Science Advisory Committee at the University of Southern California, 2006-2008

Chair, Yale University Engineering Visiting Committee, 2006

Member, President’s Council, Olin College, 2006-

Member Review Committee, Tata Institute for Fundamental Research, Mumbai, India 2007

Overseer, NRC Report on Future of Condensed Matter and Materials Physics (CMMP) 2010

Member, Stokes Programme, Physics Panel, Science Foundation Ireland, 2007

Chair, Advisory Panel on Light Source Facilities, National Science Foundation, 2007-2008

Member, Committee on International Security and Arms Control, the National Academies, 2008-2010

Chair, NAE Nominating Committee, 2008-2009

Member, University Advisory Council, Semiconductor Research Corporation, 2008-

Member, Dean’s Advisory Board, College of Engineering, Boston University, 2008-

Member, Program Review Panel, Materials Department, University of California, Berkeley, 2008

Chair Elect, Panel on Public Affairs (POPA), American Physical Society, 2009-2011

Member, Electronics Engineering Peer Committee, NAE, 2009-2012

Member, Advisory Board, WPI-Advanced Institute for Materials Research, Tohoku University, Sendai, Japan, 2009-2017

Chair, Search Committee for Director of Division Materials Research, NSF, 2009-2010

Governing Board, Indo-US Science and Technology Forum, 2009-2013

Juror, Infosys Foundation Prize in Engineering Sciences, 2010-

Brain Trust, US Department of Energy, ARPA-E, 2010-2013

Committee on Science, Engineering and Public Policy (AAAS), 2010-2016

Review Board, Center for High Technology Materials, University of New Mexico, 2010

Advisory Board, Energy Frontier Research Center, University of Michigan, 2010-2013

Advisory Board, Energy Frontier Research Center, UCSB, 2010-2013

Advisory Board, Energy Frontier Research Center, MIT, 2010-2013

Chair, University of California review committee for Governor Gray Davis Institute (CITRIS), 2010

Elected to Council of the American Academy of Arts and Sciences, 2010-present

Elected Foreign Secretary, National Academy of Engineering, 2011-2015

Board of Directors of American Academy of Arts and Sciences, 2014- present

Member, Search Committee, Queen Elizabeth Prize for Engineering, 2012, 2014

Steering Committee, on *The Public Face of Science*, American Academy of Arts and Sciences, 2016-2020

Committee of Visitors to review Materials Science and Engineering Department of Univ. of Washington, Seattle, Feb 2016

Committee of Visitors, Physical Scenes Division of University of Chinese Academy of Sciences (2017)

Chair, Temporary Nominating Committee for Foreign Member Diversity, NAE (2018 -2020)

Board of Trustees, Olin College of Engineering, 2020-present

Visiting Committee, M.S Chadha Global India Center, Princeton University (2020-present)