

RONALD F. FOX

School of Physics and Center for Nonlinear Science
Georgia Institute of Technology, Atlanta, Georgia, 30332-0430

EDUCATION:

Ph.D. in Theor. Physics, Rockefeller Univ., 1969 (advisors: G. Uhlenbeck and M. Kac)
B.A. in Physics and Mathematics, Reed College, 1964

PROFESSIONAL EXPERIENCE:

2001–present Chair, School of Physics, Georgia Tech
1999–2001 Acting Chair, School of Physics, Georgia Tech
1991–present Regents' Professor of Physics, Georgia Tech
1979–1991 Professor of Physics, Georgia Tech
1974–1979 Associate Professor of Physics, Georgia Tech
1971–1974 Assistant Professor of Physics, Georgia Tech
1969–1971 Postdoc, Dept. of Physics, Univ. of California, Berkeley, CA

ACADEMIC HONORS:

Phi Beta Kappa, 1964; NSF Graduate Student Fellowship, 1964-1965; Rockefeller University Graduate Student Fellowship, 1965-1969; Miller Fellow, 1969-1971, UC Berkeley; Alfred P. Sloan Fellow, 1974-1978; John Simon Guggenheim Fellow, 1985; Fellow, American Physical Society, 1991; W. Roane Beard Outstanding Teacher Award, 1992; GT Sigma Xi Sustained Research Award, 1997; Knowlton Lecturer, Reed College, 1999

SCIENTIFIC ADVISORY COMMITTEES:

Board of Reviewers for Mathematical reviews, 1975-1991
Editorial Board, Journal of Statistical Physics, 1985-1988
Editorial Advisory Board, Journal of Non-Equilibrium Thermodynamics, 1999-

GRADUATE AND POSTDOCTORAL ADVISING (in past 5 years):

Ph.D. students: M. H. Choi and S. Jennings
Postdoctorals: P. Jung (Heisenberg fellow), M. H. Choi, and L. Vela-Arevalo

CURRENT RESEARCH SUPPORT:

Rectified Brownian Motion in Sub-cellular Biology, NSF #0349514 - pending

OTHER COLLABORATORS (in past 48 months):

M. Thorwart, P. Reimann

SELECTED PUBLICATIONS:

1. "A Minnow, an E. Coli and Ubiquinone: The Story of Rectified Brownian Motion" (Invited paper) Proceedings of the *Nanotech* 2004 Conference, March 7-11, (2004).
2. "Generalized Coherent States for Systems with Degenerate Energy Spectra", R. F. Fox and M. H. Choi, *Physical Review A* **64**, 042104 (2001).
3. "Stochastic Versions of the Hodgkin-Huxley Equations", *Biophys. J.* **72**, 2068-2074 (1997)
4. "Uniform Convergence to an Effective Fokker-Planck Equation for Weakly Colored Noise", *Phys. Rev. A* **34**, 3288-3292 (1986)
5. "Gaussian Stochastic Processes in Physics", *Phys. Rep.* **48**, 179-283 (1978)