

David Erickson

Dr. David Erickson has been a Senior Research Staff member in the Computational Earth Sciences Group of the Computer Science and Mathematics Division at Oak Ridge National Laboratory (ORNL), in Oak Ridge, Tennessee since 2000. Since 2003 he has been an Adjunct Professor in the Division of Earth and Ocean Sciences of the Nicholas School of the Environment at Duke University in Durham, North Carolina. In 2008 he became an Adjunct Associate Professor in the Department of Civil and Environmental Engineering at the University of Tennessee, Knoxville.

Dr. Erickson received a B.S. in chemistry from the College of William and Mary in Williamsburg, Virginia in 1982. He received his Ph.D. in atmospheric chemistry/chemical oceanography/marine chemistry, with Prof. Robert A. Duce, from the Graduate School of Oceanography, University of Rhode Island in Narragansett, Rhode Island in 1987, generating a thesis on a global numerical model of atmospheric particle fluxes. He trained as a post-doc in climate modeling, marine and atmospheric chemistry and geophysical fluid dynamics at the Scripps Institution of Oceanography, University of California, San Diego in La Jolla, California from 1987-1989.

Dr. Erickson was a Staff Scientist at the National Center for Atmospheric Research (NCAR) in Boulder, Colorado from 1990-1999. At NCAR and ORNL, he has developed several numerical models of global scale biogeochemistry, CO₂ modeling within global climate model frameworks, atmospheric chemistry and a variety of climate simulations investigating the impacts of aerosols, biomass burning and soil moisture anomalies on climate. Dr. Erickson's research interests also include regional climate modeling, numerical modeling of the carbon cycle and modeling the global air-sea exchange of energy, momentum, trace gases and particles. Recent activities have evaluated climate related extreme event frequencies, with implications for policy decisions, national security and detailed energy/policy models. He is a frequent collaborator with NCAR and NASA Goddard Space Flight Center in Greenbelt, Maryland, working on integrating numerical atmospheric transport/climate models, assimilation models and satellite data.

He has served on several international and national advisory committees, including panels and committees of the National Academy of Sciences/National Research Council, the United Nations Environment Programme Panel on the Environmental Effects of Ozone Depletion as well as advisory roles for DOE, NSF, NOAA, NASA and several international governments. He is also on the Scientific Planning Team of the Surface Ocean-Lower Atmosphere Study (SOLAS). Dr. Erickson has 75+ refereed journal publications, 140+ abstracts, book chapters and symposia proceedings and has given over 225 lectures in 29 countries.

Dr. Erickson has extensive outreach experience and has been interviewed and quoted in a numerous venues including the *Los Angeles Times*, *Newsweek*, *US News and World Report*, *USA Today*, *Science*, *Environmental Science and Technology* and *Live Wire*. He has appeared on *National Public Radio* and a variety of television and radio newscasts dealing with climate change, environmental issues, high performance computing and energy/economic simulation and prediction.