

KENTON H. WHITMIRE

Curriculum Vitae

Education

B.S. (1977) in Chemistry, Roanoke College, Salem, Virginia
M.S. (1978), PhD (1982) in Chemistry, Northwestern University, Evanston, Illinois
NATO Postdoctoral Fellow (1981-1982) Cambridge University, Cambridge, England

Positions

Chair, Department of Chemistry, July 1999 – June 30, 2007
Professor of Chemistry, 1994 - present
Alexander von Humboldt Research Fellow, 1987, 1989-1990
Visiting Professor of Chemistry, Université de Rennes, May 1990, November 2000
Associate Professor of Chemistry, Rice University, 1988-1994
Assistant Professor of Chemistry, Rice University, 1982-1988

Editorial Positions

Organometallics Associate Editor, 1996 - 2007

Academic Honors

Phi Lambda Upsilon
James Lewis Howe Award, Blue Ridge Section of the American Chemical Society, 1977
Summa Cum Laude, Valedictorian, Roanoke College, 1977

Affiliations

Board of Governors, Council of Chemical Research, 2006-2008
Chair-Elect (2001), Chair (2002), Past Chair (2003) Greater Houston Section of the ACS
American Chemical Society; member Division of Inorganic Chemistry
Secretary Southeast Texas Section of the ACS 1989, Southeast Texas Section of the ACS
Award Committee 1992 - 1997
Sigma Xi

University and Other Service Activities

Co-PI on NSF ADVANCE Grant, Member of the ADVANCE Leadership Team
President's Committee on Faculty Women, 2005 - 2006
Divisional Advisor for Natural Sciences, 1998 – 2005
Wiess School of Natural Sciences Curriculum Committee, 1998 - 2006
University Teaching Committee, 1990 – 1994 (Chair 1991 – 1993)
Cain Project Faculty Advisory Committee, 2002 – present (Chair, 2003 – 2006)

Residential College Activities

Faculty Associate of Brown College and Jones College (total of 22 years);
Outstanding Faculty Associate, Jones College 2003
Distinguished Faculty Associate (numerous times)

Various Ad hoc Committees including Division and University-wide Awards and Fellowship Committees

Teaching

General chemistry, Honors General Chemistry, Transition Metal Chemistry, the Chemistry of Art, special topics in inorganic chemistry (X-ray diffraction, Instrumental Methods of Analysis, Organometallic Chemistry), graduate seminar courses

Selected Recent Presentations

Making Nanoparticles with Unusual Shapes

Korea University, Jochiwon, South Korea July 5, 2007

The College of William and Mary, Williamsburg, VA, Oct. 20, 2006

Organometallic and Coordination Chemistry of the Heavy Main Group Elements: Lessons for Materials and Biological Applications

Korea University, Jochiwon, South Korea July 6, 2007

Chinese University of Hong Kong, Hong Kong, Aug. 14, 2007

City University of Hong Kong, Hong Kong, Aug. 15, 2007

Hong Kong University of Science and Technology, Hong Kong, Aug. 16, 2007

University of Hong Kong, Hong Kong, Aug. 17, 2007

Nankai University and Tianjin University, PRC (joint seminar), Aug. 21, 2007

University of Canberra, ACT, Australia, Oct. 2, 2007

University of Monash, Melbourne, Victoria, Australia, Oct. 3, 2007

Factors Affecting the Growth of Metal Oxide Nanoparticles – Unusual Materials from Metal Carboxylate Precursors

University of Dortmund, Germany, May 30, 2005

University of Magdeburg, Germany, June 2, 2005

Technische Universität Chemnitz, Germany, June 7, 2005

International University Bremen, Germany, June 10, 2005

Strategies for the Design of Molecular Single Source Precursors to Advanced Materials

University of Leipzig, June 1, 2005

University of Regensburg, June 6, 2005

Assembly of Heterometallic Metal Alkoxide and Carboxylate Compounds for Use as Single Source Precursors to Metal Oxides

National Tsing-Hua University, Hsinchu, Taiwan, May 12, 2004

Academia Sinica, Taipei, Taiwan, May 13, 2004

National Taiwan University, Taipei, Taiwan, May 14, 2004

National Taiwan Normal University, Taipei, Taiwan, May 17, 2004

*Understanding the Effect of Main Group Elements on Transition Metal Clusters:
Materials and Catalysis Applications*

James Madison University, Harrisonburg, VA, Sept. 16, 2002

VPI, Blacksburg, VA, Sept. 21, 2002

Roanoke College, Salem, VA, Sept. 22, 2002

Probing the Limits of Lewis Acidity and Hypervalency in Bismuth Alkoxide Complexes

Université de Bordeaux, Bordeaux, France, Nov. 2, 2000

Université de Lyon, Lyon, France, Nov. 6, 2000

*The Reactivity and Bonding Capabilities of Main Group Elements in Main Group
Element-Transition Metal Cluster Compounds*

Centre National de Recherche Scientifique, Toulouse, France, Nov. 3, 2000

Université de Paris 6, Paris, France, Nov. 7, 2000

Universität Karlsruhe, Karlsruhe, Germany, Nov. 15, 2000

Université de Strasbourg, Strasbourg, France, Nov. 16, 2000

Université de Rennes 1, Rennes, France, Nov. 21, 2000

Recent Research Projects

Discrete and Extended Arrays of Main Group Elements and Transition Metals, National Science Foundation, August 15, 2007 – August 14, 2010, \$363,572.

Main Group Element Chemistry, Robert A. Welch Foundation, June 1, 2007 – May 31, 2010, \$180,000.

Nanomanufacturing: Preparation of Shaped Metal Oxide Nanoparticles, National Science Foundation, through the Center for Biological and Environmental Nanotechnology (CBEN), August 2005 through present. (Graduate Fellowship)

New Bismuth-Transition Metal Coordination Compounds as Molecular Precursors to Heterometallic Oxide Materials, U.S. Civilian Research Development Foundation. Feb 1, 2007 – Jan. 31, 2009, \$12,000.

Electrochemical Processes at Electrode Electrolyte Interface, Assumed supervision of the active Welch grant for Norman Hackerman after his death on June 18, 2007. June 1, 2006 – May 31, 2009, \$156,000.