

CHRISTOPHER M. BENDER

Curriculum Vitae as of January 2012

Division of Natural Sciences and Engineering
University of South Carolina-Upstate
800 University Way
Spartanburg, SC 29303

Phone: 864/503-5755
FAX: 864/503-5366
cbender@uscupstate.edu
<http://faculty.uscupstate.edu/cbender>

Education

PhD, Cornell University, August 1998 (Inorganic Chemistry (with a minor in Materials Science))
MS, Cornell University, August 1995 (Inorganic Chemistry)
BS, University of Central Florida, May 1993 (Chemistry)

Employment

2004-present, USC-Upstate, Associate Professor of Chemistry
1998-2004, USC-Upstate (formerly USC-Spartanburg), Assistant Professor of Chemistry
1993-1998, Cornell University, graduate student (research and teaching assistant)

Honors and Awards

Doc's List (Student Gov't Association Appreciation Award) (2003 and 2011)
Bank of America Excellence in Teaching and Advising Award (2002)
Vice Chancellor for Student and Diversity Affairs Award (2002)
Who's Who Among America's Teachers (2002)
USC-Upstate Impact Faculty Member of the Year (for Outstanding Service) (2000)
DuPont Teaching Award (Cornell University) (1995)

Courses Taught at USC-Upstate through Spring 2012 [# of semesters]

General Chemistry I (SCHM W111) [34]
General Chemistry I Lab/Recitation (SCHM W111L) [19]
General Chemistry II Lab/Recitation (SCHM W112L) [4]
Quantitative Analysis (SCHM W321) and lab [9]
Internships in Chemistry (SCHM W395)-2 students [3]
Undergraduate Research (SCHM W499)-2 students [2]
Inorganic Chemistry Lecture (SCHM W511) [7]
Instrumental Methods (SCHM W522) and lab [5]
Junior/Senior Seminar (SCHM 397/599) [4/3]

Service to USC-Upstate

Chemistry Club Advisor (1999-2004, 2010-present)
Diversity Committee (2000)
Faculty Senate (2009-present)
Graduate Committee (2003-2004, chair)
Honors Committee (1999)
Interdisciplinary Studies Committee (2002)
NSE Scholarship Committee (2004-2011)
Peer Review Committee (NSE, 2004-2010, 2012; FACS 2008-2009, Informatics 2011, Library 2008, 2012, MCS 2009-2010)

Phi Kappa Phi Honor Society, Grants and Scholarships Coordinator (2003-present)
Refund Committee (2002-present)
Return to Learn Taskforce (2009)
Science Fair Committee, Judge Coordinator (1998-present)
Student Affairs Committee (1999-2002, chair from 2000-2002)
Task force on Student Feedback (1999)
Task force on Sexual Harassment (1999)
Search Committees [*Physics Instructor (1999)* • *Chemistry, Organic Chemist (2001, 2002, 2006)* • *Chemistry Instructor (2009)* • *Chemistry Analytical Chemist (2011, 2012)* • *FALL Division Chair (1999)* • *English, Composition Instructor (2002)* • *English, Linguistics (2005)* • *English, American Lit (2006)* • *Assistant Student Life Director (2001)* • *Housing Director (2002)* • *Lab Manager (2001, 2006)* • *NSE Division Chair (2004)* • *Nursing Dean (2005)*]

Professional Affiliations

American Chemical Society (member since 1995)

- 2005 Chair of the local section, Western Carolinas
- 2006-2008 Olympiad Coordinator for Western Carolinas Section

Materials Research Society (1997-2006)

Publications

1. Jinxin Gao, Christopher M. Bender, and Catherine J. Murphy “Dependence of Gold Nanorod Aspect Ratio on the Nature of the Directing Surfactant in Aqueous Solution” *Langmuir* (*Langmuir* **2003**, 19, 9065-9070).
2. K. K. Caswell, Christopher M. Bender, and Catherine J. Murphy “Seedless, Surfactantless Wet Chemical Synthesis of Silver Nanowires” in *NanoLetters* (*NanoLett.* **2003**, 3(5), 667-669).
3. Jack A. Turner, Christopher M. Bender; Jason Clark, Francis Skipper “Water Quality in Cowpens National Battlefield” report to the National Parks Service summer 2001.
4. Christopher M. Bender, James M. Burlitch, Duane B. Barber, Clifford R. Pollock "Synthesis and Fluorescence of Neodymium-Doped Barium Fluoride Nanoparticles" in *Chemistry of Materials* (*Chem Mater* **2000**, 12, 1969-1976).
5. Barber, D. B.; Pollock, C. R.; Beecroft, L.L.; Ober, C. K.; Bender, C. M.; Burlitch, J. M. “Amplification by Optical Composites” in *Advanced Solid State Lasers*; Pollock, C. R. and Bosenberg, W. R., Eds.; OSA TOPS Vol. 10; Optical Society of America: Washington, DC, 1997; pp 386-389.

Book Chapters

1. Bender, Christopher M.; Chemistry Chapter. In *CliffsTestPrep ASVAB*; Grayson, Fred N., Ed.; Wiley Publishing: New York, 2003; pp 67-78.

Presentations

1. Jinxin Gao, Christopher M. Bender, and Catherine J. Murphy "Dependence of gold nanorod aspect ratio on the nature of the directing surfactant in aqueous solution", paper number 118. Presentation at the 226th ACS National Meeting, New York, NY, September 7-11, 2003.
2. *(Invited)* "Environmental Research on the Cowpens Battlefield Watershed," Christopher M. Bender, Jack A. Turner, Jason Clark, Francis Skipper. Presented at the Fall meeting of the Junior Academy of Sciences, Converse College (October 21, 2000)
3. "Synthesis of Pr and Yb Co-doped Nano-crystallites for Optical Composites," Christopher M. Bender,^{*} James M. Burlitch,^{*} Duane B. Barber,[§] and Clifford R. Pollock,^{§*} Department of Chemistry and [§]School of Electrical Engineering, Cornell University. Presented at 212th Annual American Chemical Society Meeting, Orlando, FL, August 1996, poster INOR 335.
4. "Synthesis of Doped Nano-crystallites for Optical Composites," Christopher M. Bender,^{*} James M. Burlitch,^{*} Duane B. Barber,[§] and Clifford R. Pollock,^{§*} Department of Chemistry and [§]School of Electrical Engineering, Cornell University. Presented at 211th Annual American Chemical Society Meeting, New Orleans, LA, March 1996; paper INOR 654.
5. Michael Hampton, James Slattery, and Christopher Bender, "A New System for Evaluation of Chemical and Thermodynamic Characteristics of Hydrogen Storage Compounds", DOE/NREL Hydrogen Program Review Meeting, Cocoa Beach, FL, May, 1993.
6. James Slattery, Christopher Bender, and Michael Hampton, "Coupled Differential Scanning Calorimetry, Pressure Measurement, and Gas Chromatography as a Technique for Evaluating the Suitability of Metals for Hydrogen Storage", 1993 Annual Meeting of the Florida American Chemical Society, Orlando, FL, May, 1993.
7. James Slattery, Christopher Bender, and Michael Hampton, "Determination of the Thermal Properties of Metal Hydrides Upon Hydrogen Uptake and Release", Annual Meeting of the Florida Section American Chemical Society, Tampa, FL, May, 1991.
8. M. D. Hampton, C. Bender, and J. Slattery, "Determination of the Hydriding Characteristics of Alkali Metal and Alkaline Earth Metal Hydrides by Thermal Analytical Methods", 20th Annual Conference of the North American Thermal Analysis Society, Minneapolis, MN, Sept., 1991.