

**WILLIAM G. BECKER**  
Center for Science Education  
Portland State University  
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### **Education**

Ph.D., Chemistry, Boston University, December 1982  
M.S., Chemistry, DePaul University, August 1976  
B.S., Chemistry, DePaul University, June 1975

### **Employment**

Faculty-In-Residence for Assessment, Center for Academic Affairs, Portland State University,  
June 1999 - present  
Professor of Science Education, Director, PSU Center for Science Education, June 1995 - present  
Associate Professor, Director, PSU Center for Science Education, July 1993 - June 1995  
Associate Professor, Honors Program (0.51 FTE) and Associate Professor of Chemistry (0.49 FTE), Portland State  
University, September 1990 - June 1993  
Assistant Professor, Honors Program (0.51 FTE) and Assistant Professor of Chemistry (0.49 FTE), Portland State  
University, September 1989 - June 1990  
Assistant Professor of Chemistry, Portland State University, September, 1983 - June 1989  
Postdoctoral Research Associate, University of Texas at Austin, A.J. Bard, December 1981 - July 1983

### **Honors**

1995 Renew America Award for Environmental Sustainability for the "Teacher  
Internships for Oregon Wetlands Study."  
1992 President's Associates Grant, Portland State University, \$6,000 faculty excellence award, April 1992  
1989 Duane Marshall Distinguished Service Award, Oregon Science Teachers Association, October 1989.  
1988 Burlington Northern Faculty Excellence Award, \$1,500 Portland State University, September 1988.

### **Grants Awarded**

"Northwest Corps of Re-Discovery", National Science Foundation, principal investigator, May 1, 2002 –  
April 30, 2005, \$325,455.

"Portland Horizons Project: Integrating Science Education and Scientific Research," National Science Foundation,  
co-principal investigator, March 15, 1998 - March 14, 2001, \$450,000.

"Science Cornerstone Project: Institution-Wide Reform of Undergraduate Education in Science, Mathematics,  
Engineering and Technology," National Science Foundation, Course and Curriculum Development, co-principal  
investigator, April 1, 1997 - March 31, 2000, \$200,000.

"Forest Monitoring and Research Program for Middle and High School Students," National Science Foundation,  
Teacher Enhancement Program, co-principal investigator, March 16, 1997 - March 15, 2000, \$587,954

Twentieth Century Learning Centers, U.S. Department of Education, Contracting Investigator, June 1, 2000 – May  
31, 2003, subcontract \$138,000, total award \$1,842,988.

Urban Ecosystems Project: Enhancing Interdisciplinary Teaching and Learning in North Portland Middle Schools,"  
U.S. Department of Education, Urban Community Service Program, co-principal investigator, October 1, 1995 -  
September 30, 2000, \$1,797,148.

"Pacific Northwest Environmental Studies Program: A Collaborative Interdisciplinary Curriculum Development  
Project," National Science Foundation, Undergraduate Education, Course and Curriculum Development, co-  
principal investigator, March 15, 1995 - March 31, 1997, \$121,511.

"Development of a Forest Ecology Field Manual for Oregon High School Teachers," Laird Norton Foundation, co-principal investigator, March 1, 1995, \$10,000.

"Biotechnology Interactive Program for Oregon High Schools," M.J. Murdock Charitable Trust, co-principal investigator, February 1995, \$53,300.

"Natural Resource Systems: From Schoolyards to Ecosystems," Oregon State System of Higher Education, Dwight D. Eisenhower Act (P.L. 100-297, Title II), co-principal investigator, December 1, 1993 - November 30, 1994, \$48,442.

"Science in the Liberal Arts Curriculum: An Undergraduate Course Development Project," National Science Foundation, Undergraduate Education, Course and Curriculum Development, co-principal investigator, April 15, 1993 - June 15, 1996, \$199,749.

"Teacher Internships for Oregon Wetlands Study," U.S. Environmental Protection Agency, principal investigator, October 1, 1992 - September 30, 1995, \$154,417.

"A Regional Teacher In-service in Meteorology," National Science Foundation, Teacher Preparation and Enhancement, Directorate for Science and Engineering Education, co-principal investigator, April 1, 1990 - March 31, 1995, \$448,887.

Eighteen additional science education and chemistry research grants totaling \$403,960 from 1982 to 1992.

### **Publications**

L.A. George and W. Becker, "A Classroom Inquiry Project: Investigating the Urban Heat Island Effect", *Journal of Geoscience Education*, accepted 2002.

Flower, M., Ramette, C., and Becker, W. (1996). "Science in the Liberal Arts at Portland State University: A curriculum focusing on science-in-the-making." In A. McNeal and C. D'Avanzo, eds., *Student-Active Science: Models of Innovation in College Science Teaching* (Saunders College Publishing).

### **Presentations at National Conferences**

Becker, W., Ramette, C., Baloch, Z., Redder, J., Sommers, J. (June 2003) "Supporting an Effective Infrastructure for Developing a Culture of Student Learning Assessment." American Association of Higher Education Assessment Conference, Seattle, WA.

Becker, W., Ramette, C., Redder, J., Vurkac, M. (June 2003) "The Vital Role of Student Work Samples in Learning Assessment: What, Where, When, How and Why?" American Association of Higher Education Assessment Conference, Seattle, WA.

Becker, W., Rhodes, T., Ramette, C., Baloch, Z., Sommers, J. (June 2002) "Doing More With Less: Innovative Campus Wide Student Learning." American Association of Higher Education Assessment Conference, Boston, MA

Becker, W., Rhodes, T. & Ramette, C. (2001, May) "Integral Assessment: Aligning Learning Objectives With Student Life." Workshop facilitated at the Pacific Northwest Higher Education Assessment Conference, Spokane, WA.

**Graduate Students:** Claudine Kavanaugh, Doug Saulter, Stephanie Jones

**Graduate and Postdoctoral Advisors:** Gilford Jones, Boston University; Alan Bard, University of Texas at Austin