Washington State University
Student and Faculty Presenters

Samantha Lawrence
PhD Student
Materials Science and Engineering
samantha.lawrence@email.wsu.edu

Samantha Lawrence received her BS degree in Metallurgical and Materials Engineering from Colorado School of Mines in December 2010. She began her PhD in Materials Science and Engineering at Washington State University in January 2011 with Dr. David Bahr as her advisor. Her research interests include corrosion and materials reliability in extreme environments, mechanical behavior of alloys and oxide films at multiple length scales, and environmentally assisted fracture.

Samantha has had a variety of research experiences beyond a university campus, including two summer internships at Nucor Steel Decatur and a graduate research assistantship at Sandia National Laboratories in Livermore, CA. She is an active member multiple professional societies such as ASM, TMS, MRS, and NACE. While an undergraduate at Colorado School of Mines, Samantha founded and served as chairman of the student chapter of NACE. She was awarded the MTI Bert Krisher Memorial Scholarship, the M.C. Miller Memorial Scholarship, and the Sandia Mountain Section Scholarship from NACE in 2010. She was named the Outstanding Graduating Senior in Metallurgical and Materials Engineering. Her research has led to a variety of publications and conference presentations. Samantha enjoys skiing, rock climbing, swing dancing, painting, and playing guitar.

Diane Cook

Huie-Rogers Chair and Professor
School of Electrical Engineering and Computer Science
djcook@wsu.edu

Dr. Cook received her B.S. from Wheaton College in 1985, and her M.S. and Ph.D. from the University of Illinois in 1987 and 1990, respectively. Diane's research interests include artificial intelligence, machine learning, data mining, robotics, smart environments, and parallel algorithms for artificial intelligence. She is one of the directors of the AI Laboratory and heads the CASAS smart home project.

Diane is currently involved in organizing an NSF Workshop on Pervasive Computing at Scale. She is also serving as the general chair for the Ninth Annual IEEE International Conference on Pervasive Computing and Communications and co-program chair for the IEEE International Conference on Data Mining. She is currently guest editing a special issue of the ACM Transactions on Intelligent Systems and Technology on Socially aware computing and a special issue of the Journal of Pervasive and Mobile Computing on Pervasive Health.

Courses Taught

- Introduction to Automata Theory (undergraduate)
- Data Structures (undergraduate)
- Theoretical Computer Science (graduate)
- Design and Analysis of Algorithms (graduate)
- Introduction to Artificial Intelligence (undergraduate and graduate)
- Genetic Algorithms and Neural Networks (undergraduate and graduate, designed course)
- Parallel Algorithms for Artificial Intelligence (graduate, designed course)
- Planning and Robotics (graduate, designed course)
- Planning and Decision Theory (graduate, designed course with P. Gmytrasiewicz)
- Data Mining (graduate, designed course)
- Gerontechnology I and II (graduate, multidisciplinary, designed course)

Honors and Awards

- Anjan Bose Outstanding Researcher of the Year Award, 2010
- WSU/EECS Excellence in Research Award, 2009, 2010
- FTRA Fellow, 2010 - present
- IEEE Fellow, 2007 - present
- IEEE Systems, Man, and Cybernetics Society, Outstanding Contribution Award, 2007
- Best paper award, Florida Artificial Intelligence Research Symposium, 2005
- Charter Member, Academy of Distinguished Scholars, University of Texas at Arlington, 2004

- UTA College of Engineering Research Excellence Award, 2004
- UTA Outstanding Research Achievement Award, 2002
- UTA Keeper of the Vision Award, 2002
- CSE Outstanding Teacher Award, 2001
- Lockheed Martin Award for Excellence in Teaching, 2000
- Sponsored student team with winning entry at AAAI Life On Mars robot competition, 1998
- NSF Career Development Award, 1995
- Halliburton Outstanding Young Faculty Award, 1995
- NSF Research Initiation Award, 1993

Professional Experience

August 2006 - Present
Huie-Rogers Chair Professor, School of Electrical Engineering and Computer Science, Washington State University, Pullman, WA.
August 1992 - 2006
University Distinguished Scholar Professor (2004 - 2006), Professor (2001 - 2004), Associate Professor (1996 - 2001), Assistant Professor (1992 - 1996), Department of Computer Science and Engineering, University of Texas at Arlington, Arlington, TX.
August 1999 - May 2001
Senior Data Mining Consultant, International Business Machines, Dallas, TX.
August 1992 - 2006
Faculty Associate, Automation and Robotics Research Institute, Fort Worth, TX.
June 1991 - August 1991; June 1992 - August 1992
Research Faculty Fellow, NASA Ames Research Center, Moffett Field, CA.
January 1991 - May 1992
Assistant Professor, Department of Computer Science and Engineering, University of South Florida, Tampa, FL.
August 1989 - December 1991
Consultant for the National Center for Supercomputing Applications, Urbana, IL.
January 1990 - May 1990
Assistant for designing and teaching Scientific Visualization course in connection with National Center for Supercomputing Applications, Urbana, IL.
October 1990
Instructor for Connection Machine Graphics workshop, Urbana, IL.
January 1988 - December 1989
Teaching Assistant, University of Illinois, Urbana, IL.
June 1988 - August 1988 and January, 1989
Research Associate in Computer Science, International Business Machines, Almaden Research Center, San Jose, CA.
January 1986 - December 1987
Research Assistant for the Computer Music Project, University of Illinois, Urbana, IL.
June 1984 - August 1985
Software Consultant for Dr. William F. Nowlin, Merrillville, IN.
July 1985 - August 1985
Software Consultant for Gary Methodist Hospital, Gary, IN.
June 1985 - July 1985
Software Consultant for William James and Assoc., Wheaton, IL.
January 1984 - May 1985
Teaching Assistant, Wheaton College, Wheaton, IL.