

Erika S. Mesh

erika.s.mesh@gmail.com

- Education**
- Ph.D., Computing and Information Sciences* *In-Progress*
Rochester Institute of Technology, Rochester, NY
 - *Advisor:* Dr. J. Scott Hawker, Department of Software Engineering
 - *Primary research areas:* Modeling and supporting SE process improvement decision-making, Software engineering for scientific research
 - M.S., Software Engineering* August 2012
Rochester Institute of Technology, Rochester, NY
 - Graduate Certificate, Systems Engineering* August 2006
Rochester Institute of Technology, Rochester, NY
 - B.S., Software Engineering* May 2002
Rochester Institute of Technology, Rochester, NY
- Teaching**
- Adjunct Professor*
Rochester Institute of Technology, Rochester, NY
 - Intro to Software Engineering August 2017 – *Present*
 - Intersession Computational Problem Solving January 2016
 - Teaching Assistant*
Rochester Institute of Technology, Rochester, NY
 - Engineering of Software Subsystems January 2012 – December 2012
- Research**
- NSF Graduate Research Fellow* September 2013 – *Present*
Rochester Institute of Technology, Rochester, NY
 - Graduate Assistant* July 2011 – August 2013
Laboratory for Environmental Computing and Decision Making (LECDM)
Rochester Institute of Technology, Rochester, NY
- Work Experience**
- Software Process Consultant* January 2015 – April 2015
United Technologies, Rochester, NY
 - Assisted with external software process assessments of multiple UTC business units worldwide.
 - Sr. Software Engineer* June 2007 – July 2011
PAETEC, Rochester, NY
 - Led the concept development, project planning, development and deployment tasks for a sales quoting utility targeted at external users.
 - Documented existing and introduced new SE best practices to move the team towards a repeatable SE process.
 - Sr. Software Engineer* September 2002 – May 2007
Harris Corp., RF Communications Division, Rochester, NY
 - Requirements analysis, project planning, system design, development, integration, and test for multiple embedded software defined radio waveform communication applications.
 - Training coordinator for the successful CMM Level 3 assessment of a team of 50+ engineers.

- Publications**
- Erika S. Mesh, David M. Tolar, and J. Scott Hawker. **Exploring process improvement decisions to support a rapidly evolving developer base.** In *Proceedings of the 38th International Conference on Software Engineering – Visions of 2025 and Beyond (V2025)*, 2016.
- Erika S. Mesh. **Supporting scientific SE process improvement.** In *Doctoral Symposium of the 37th International Conference on Software Engineering*, 2015.
- Erika S. Mesh, Gabbie Burns, and J. Scott Hawker. **Leveraging expertise to support scientific software process improvement decisions.** *Computing in Science & Engineering*, 16(3):28–34, 2014.
- Erika S. Mesh and J. Scott Hawker. **Scientific software process improvement decisions: A proposed research strategy.** In *5th International Workshop on Software Engineering for Computational Science and Engineering*, 2013.
- Posters**
- Erika S. Mesh. **Why Do Scientists Developing Software Adopt Software Engineering Best Practices?** *CRA-W Graduate Cohort Workshop (CRA-W Grad Cohort)*. 2014.
- Erika S. Mesh. **Decision Support for Scientific Software Process Improvement.** *New York Celebration of Women in Computing (NYCWiC)*. 2013.
- Presentations**
- Erika S. Mesh. **Mapping the Chasm: Using Grounded Theory to Study Academic Scientific Software Development Process Concerns.** RIT Graduate Research and Creativity Symposium (RIT GRCS). 2014.
- Jenna Hecker, Erika S. Mesh, and Swapna Kalpagam Subramaniam. **The Many Paths of Computing Careers.** *New York Celebration of Women in Computing (NYCWiC)*. 2013.
- Wendi Heinzelman, Lorraine M. Herger, Erika S. Mesh, and Ashley N. Smolinski. **Graduate Panel.** *New York Celebration of Women in Computing (NYCWiC)*. 2013.
- Erika S. Mesh. **Development of a Software Process Maturity Model for Computational Science and Engineering Projects.** RIT Graduate Research and Creativity Symposium (RIT GRCS). 2012.
- References**
- Available upon request