

Faculty Vitae

- Name: Elena G Gregg
- Education: M.S., Theoretical and Applied Spectroscopy, St. Petersburg State University, Russia, 1980; PhD., Optics, State Optical Institute, Russia, 1994.
- Academic experience: State Optical Institute, St. Petersburg, Russia, Instructor/Student Supervisor, 1980 – 2001, part time.
Tulsa Community College, Adjunct Instructor, 2003 – 2006.
Physics Department, University of Tulsa, Adjunct Instructor, 2004 – 2006.
Rogers State University, OK, Adjunct Instructor, 2004 – 2006.
St. Gregory University, Tulsa, OK, Adjunct Instructor, 2005 –2006.
Oral Roberts University, Tulsa, OK, Assistant Professor, 2006- 2014, Associate Professor 2015-present.
- Non-academic experience: St. Petersburg State University, St. Petersburg, Russia Research Assistant. Studied influence of the cryogenic solvents on spectra of the weak complexes of simple substances with hydrogen bonds. 1978 – 1980, part time.
State Optical Institute, St. Petersburg, Russia, Researcher. Conducted research in the Laboratory of Molecular Studies and later in the Laboratory of Picoseconds' Spectroscopy concerning the influence of the absorption of light by complicated molecules. 1980 – 2001, full time.
- Certifications or professional registrations: Radiation Safety Officer Training Certificate. May 2011.
- Current membership in professional organizations: American Association of Physics Teachers (Arkansas-Oklahoma-Kansas Section officer), American Physical Society, American Society of Physics Students.
- Honors and awards: Outstanding faculty member of Engineering Department 2013
- Service activities: ORU Senate (ECPM department representative), Senate General Education Science Committee, Equivalency Committee, Grievance Committee, ORU Radiation Safety Committee, University Publicity and Recruitment Activities (Whole Person Scholarships Interview, Department Tours and presentations during College weekends and Whole Person Scholarships events), Departmental Publicity and Recruitment Activities, ECPM department New Faculty Search Committee, New Faculty Advisor (Dr. Enrique Valderrama), AAPT local chapter Arkansas-Oklahoma-Kansas Section officer, Subject Matter Expert (correlates set of general Physics Learning Outcomes to set of tutorials) for Knight, Johns, Field "College Physics: Strategic Approach" 3d edition for Pearson Publisher 2014. Testing and Evaluating PowerPoints slides for Miller's "Environmental Science" 14th edition for Brooks, Cole Publisher 2014, Content Reviewer for a new Physics Pre Lecture Video product for Pearson Publisher 2014. Oklahoma Women in Science Conference, Tulsa (October 14, 2014)
Christ for Humanity, Domestic Violence Intervention Services, Tulsa, OK.

- List of publications and presentations from past five years: “Teaching Physics in America”, Elena Gregg, AOK Section of AAPT, KS, October 2009. “Influence of Different instructional Methods on Student’s performance”, “Status of Physics Education in United States”, Hawaii University Conference on Education, HI, July 2012. “Improving performance through Motivation”, AOK Section of AAPT, Enid OK, November 2012. “Teaching Biology pre-med Students Introductory Physics”, AAPT, New Orleans, January 2013. “Improving Performance through Motivation: Teaching Biology Pre-med Students Physics”, APS, Baltimore, March 2013. Presentation at AAPT Conference at Butler Community college, El Dorado, KS (October 25-26, 2013). “Improving Performance through Motivation: Teaching Biology Pre-med Students Physics. Quantitate Assessment of Different Instructional Methods”, Conference on Introductory Physics for the life Sciences, Arlington, VA, March 2014. Case Study and Success Story for Cengage Learning (Instructor Engagement Center) and Web Assign Cengage: “Physics Students Boost Test Scores with Enhanced Web Assign at Oral Roberts University”
 “Improving Performance through Motivation: Teaching Biology Pre-med Students Physics” submitted to American Journal of Physics (Physics Educational Research section) Oklahoma Women in Science Conference, Tulsa (October 14, 2014)
- Briefly list the most recent professional development activities: Radiation Safety Officer Training (May 2011, Nevada) , on line Teaching Training 2010, professional development lectures offered by ORU and Publishing companies, participation in preparation of Self Study report for the ABET Inc. (2010-2012), Local Arrangement Chair IEEE Green Technologies Conference, IEEE Business meeting and Student’s Competition (May 2012, Tulsa OK). CSWP Professional Skills Development for Women Physicists conference (March, 2013 Baltimore), Testing and evaluating physics textbooks (“College Physics” by Etkina, Gentile and Van Heuvelen 2012) Subject Matter Expert (correlates set of general Physics Learning Outcomes to set of tutorials) for Knight, Johns, Field “College Physics: Strategic Approach” 3d edition for Pearson Publisher 2014. Testing and Evaluating PowerPoints slides for Miller’s “Environmental Science” 14th edition for Brooks, Cole Publisher 2014, Content Reviewer for a new Physics Pre Lecture Video product for Pearson Publisher 2014. “Women in Science” conferences, Oklahoma City, OK (February 8, 2011 and March 30, 2012). Summer Engineering Camp at ORU (July 2011), NSF training at University of Tulsa (January 8, 2013), Course Equivalency Committee Meeting, Edmond OK (September 19, 2013). "Schools for Tomorrow" Conference, New York, September 17, 2013, "Lifting the Bar for Common Core standards", Tulsa OK, September 24, 2013 (through 8th Floor), Library research with engineering students physics major about latest discoveries and innovations in Optics, Numerous lectures and webinars to improve teaching. On line homework for Physics (Web Assign) and Heat and Thermodynamics (Connect) classes. Use "Desire to Learn", Oklahoma Women in Science Conference, Tulsa (October 14, 2014)
 Teaching innovations:
 MCAT practice test and Force Concept Inventory twice during each semester for pre-med and engineering students. Explore different questioning styles and strategies, different class management styles, different teaching styles, and different assessment strategies.
- Grants: CSWP Professional Skills Development for Women Physicists (March 2013); NSF grant to attend Conference on Introductory Physics for the life Sciences, Arlington, VA, March 2014.