



Summer 2017 (May 21 – July 28, 2017)
Undergraduate Research Fellowships Announcement

National Science Foundation Research Experiences for Undergraduates (REU) Site
INTERDISCIPLINARY WATER SCIENCE AND ENGINEERING
Virginia Tech, Blacksburg, Virginia

Application Deadline March 17, 2017 (5:00 PM, EST)

We will begin reviewing applications on March 13, 2017 and continue to accept submissions through March 17, 2017.

Applications are invited from qualified and motivated undergraduate students (rising sophomores, juniors and seniors) from all U.S. colleges/universities to participate in a 10-week (May 21-July 28, 2017) summer research in interdisciplinary water science and engineering at Virginia Tech. U.S. Citizens or Permanent Residents are eligible to apply. The research program is funded through the National Science Foundation – Research Experiences for Undergraduates (NSF REU) program. The 10-week internship will begin on May 21, 2017 (arrival day) at Virginia Tech and end on July 29, 2017 (departure day). The research internship includes a stipend of \$500/week, housing (two persons per room), meals, and travel expenses*. We have already graduated 85 excellent undergraduate researchers, representing 55+ institutions in the United States from our prior sites during 2007-09, 2010- 2013 and 2014-16.

Ten students will be recruited for this program and two of them will travel to India for research. The Indian Institute of Technology Madras (IITM) is the host institution in India. Additional details can be found on the website. Application materials, details of Research Mentors along with summer 2017 research projects and other program activities can be found here: <http://www.lewas.centers.vt.edu/index.php/lewas-nsf-reu/nsf-reu-online-application-2017>

We request applicants to upload their applications along with other required documents by the deadline (application review will begin on March 13, 2017, applications may continue to be submitted until March 17, 2017, 5:00 pm, EST) using the online form found at the link above. Successful applicants will be informed beginning March 22, 2017. Please contact either Dr. Vinod K Lohani (phone: (540) 231-0019; FAX: (540) 231-0970; E-mail: vlohani@vt.edu) or Jennifer Cacciola (phone: (540) 231-5244; E-mail: jcacciola@vt.edu) for questions.

Titles of Summer 2017 Projects

Research Projects for REU Scholars at Virginia Tech (Blacksburg, VA)

Project ID#1: Design and Implementation of a Robotic System for Sample Gathering of Remote Environmental Data for Hydrologic Analysis (Dr. Lohani)

Project ID#2: Greenhouse Gas Dynamics in a Drinking Water Reservoir (Drs. Carey and Schreiber)

Project ID#3: Investigation of the occurrence and fate of pharmaceuticals and personal care products (PPCPs) in urban-impacted watersheds (Dr. Xia)

Project ID#4: Water Quality for Humanity and the Environment (Dr. Dietrich)

Project ID#5: Bacterial Contamination of Water Distribution and Plumbing Pipelines (Drs. Edwards and Pruden)

Project ID#6: Recovery of Nutrients and Water from Wastewater Using an Integrated Osmotic Bio-electrochemical System (Dr. He)

Project ID#7: Effects of Hydrology on Ecosystem Processes and Water Quality of Streams and Rivers (Dr. Hester)

Project ID#8: Hydrologic Controls on Wetland Function at the Great Dismal Swamp (Dr. McLaughlin)

Research Projects for REU Scholars at Indian Institute of Technology Madras (Chennai, India)

Project ID#9: Chemical and Microbial Water Quality in India (Drs. Vikesland and Pruden (VT, USA) and Dr. Nambi (IITM, India))

Project ID#10: PIRE research opportunity (Drs. Vikesland and Pruden (VT, USA) and Dr. Nambi (IITM, India))

*Note: Our travel budget allows for a maximum of \$500 per student working at Virginia Tech and a maximum of \$1,500 for those students travelling to India.