

REAP | University of Central Florida 2015



Aadit prepares a solution for depositing copper onto a 3D micro-structure.

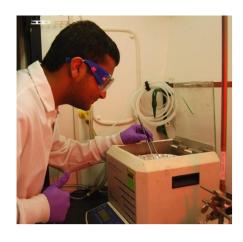
Aadit is no stranger to the lab! This Hagerty High senior is spending his second summer with Dr. Stephen Kuebler's group at the University of Central Florida (Orlando, FL, npm.creol.ucf.edu), through the 2015 AEOP-REAP Program.

Aadit investigates a process for metallizing intricate 3D micro-structures. His work is generating a new technology for manufacturing sensitive, light-weight infrared detectors for medical imaging and firefighting.

Already, as a high school student, Aadit has co-authored a conference proceeding on his research.^[1] He will pursue a degree in biomedical science and attend medical school.

Of the REAP Program, Aadit said: "I believe that the real lab experience I obtain through the REAP program will provide the skills and foundation I need to achieve my goals."

[1] C. M. Schwarz, C. N. Grabill, B. Gleason, G. D. Richardson, A. M. Lewis, A. Vyas, G. D. Richardson, C. Rivero-Baleine, K. A. Richardson, A. Pogrebnyakov, T. S. Mayer, and S. M. Kuebler, "Fabrication and characterization of micro-structures created by direct laser writing in multi-layered chalcogenide glass," in *Photonics West 2015: Adv. Fabrication Technologies for Micro/Nano Optics and Photonics VIII, (SPIE, San Francisco, CA, 2015), pp. 937403-1 to 937403-9.*



Aadit prepares a sample by spin coating a thin film of photo-sensitive material onto a substrate.

REAP is just one element of the Army Educational Outreach Program. The AEOP is comprised of Army-sponsored competitions, internships education opportunities, and research and practical experiences designed to engage and guide students as well as teachers in science, technology, engineering, and mathematics (STEM).