



Alabama Research Experiences for Undergraduates



Project Title:

Iodine Plasma Interaction with Spacecraft Materials

Project Reference Code:

UA-Branam1

Host Facility:

The University of Alabama

Host Facility Location:

Tuscaloosa, AL 35487

<https://www.ua.edu/>

Project Description:

Before spacecraft designers will attempt to use iodine as a replacement for xenon in space plasma thrusters, they need to know how the iodine and iodine plasma will affect the spacecraft. The current project is exposing several s/c material samples to expected plasma conditions for the cathode, thruster and structure.

Disciplines:

Plasma Physics/Materials Technology

Is U.S. citizenship required to participate in this project?

No

Name(s) of Mentor(s) and contact information:

Richard Branam (rdbranam@eng.ua.edu)

Internship Coordinator/ HR manager:

Amy Lang (alang@eng.ua.edu)

The name and contact information of personnel at the host facility is provided for further assistance with questions regarding the host facility or the project.

Interns will not enter into an employee/employer relationship with the host facility. No commitment with regard to later employment is implied or should be inferred.