



UNIVERSITY of HAWAII®
WINDWARD
COMMUNITY COLLEGE

SCI 295V Introduction to STEM research

1-3 Var. (CRN 64322)

T:1630 - 1730, S:1230-1600

INSTRUCTOR: Jacob Hudson

OFFICE: Imiloa 112

OFFICE HOUR: S:1130 - 1230

TELEPHONE: 808-956-9112 **EMAIL:** jacobh@hawaii.edu

EFFECTIVE DATE: Spring 2023

WINDWARD COMMUNITY COLLEGE MISSION STATEMENT

Windward Community College offers innovative programs in the arts and sciences and opportunities to gain knowledge and understanding of Hawai'i and its unique heritage. With a special commitment to support the access and educational needs of Native Hawaiians, we provide the Ko'olau region of O'ahu and beyond with liberal arts, career and lifelong learning in a supportive and challenging environment — inspiring students to excellence.

CATALOG DESCRIPTION

SCI 295 offers a research experience in science, technology, engineering, and/or mathematics emphasizing the application of the scientific method to a specific project. Repeatable for up to 6 credits (3 hours cooperative education/work experience per week per credit).

Activities Required at Scheduled Times Other than Class Times

Students should keep a log, or blog, of their progress.

STUDENT LEARNING OUTCOMES

As a result of taking this course, students can expect to attain the following outcomes:

1. Use research and technology skills to access information from multiple sources.
2. Design and implement a plan to solve a specific STEM-based research project.
3. Collect, analyze and interpret data generated by the selected research project.
4. Communicate conclusions in written and/or oral form.

COURSE TASKS

Follow all lab safety protocols.

Each project will require individual student responsibilities be met in order for a successful project outcome. As such, timely communication with all team members as well as the mentor is required.

All students will take part in the High Powered Rocketry Certification process (at least level I).

ASSESSMENTS AND GRADING

While individual grading and assessments will be discussed at the beginning of the semester, and will depend on the project and the number of credits the student is trying to accrue, the following can act as a guide:

1 credit	Attendance of at least 3 hours/week HPR Certification	2 page final paper
2 credits	Attendance of at least 5 hours/week HPR Certification	4-5 page final paper
3 credits	Attendance > 8 hours/week HPR Certification	5-10 page final paper

COURSE CONTENT.

Research will be associated with the Hawaii Space Grant Consortium and Project Imua. As such, missions may include A Rocket Launch for International Student Satellites (ARLISS), The Experimental Sounding Rocket Agency's (ESRA) America's Space Cup Challenge, or The RocSat program hosted by Colorado Space Grant (COSG).

LEARNING RESOURCE

There are several web sites that the student can go to:

Tripoli High Powered Rocketry Association (www.triploi.org)

National Association of Rocketry (www.nar.org)

Experimental Rocketry Organization of the Pacific – AEROPAC (<https://dev.aeropac.org>)

ADDITIONAL INFORMATION

- MySuccess: Students may be referred for extra help or advising through MySuccess. Students can also explore resources at MySuccess.Hawaii.edu and windward.hawaii.edu/MySuccess

DISABILITIES ACCOMMODATIONS

If you have a physical, sensory, health, cognitive, or mental health disability that could limit your ability to fully participate in this class, you are encouraged to contact the Accessibility Counselor to discuss reasonable accommodations that will help you succeed in this class. Roy Inouye can be reached at (808) 235-7448, royinouye@hawaii.edu, or you may stop by Hale Kāko'o 106 for more information.

SEX DISCRIMINATION AND GENDER-BASED VIOLENCE RESOURCES (TITLE IX)

Windward Community College is committed to providing a learning, working, and living environment that promotes personal integrity, civility, and mutual respect and is free of all forms of sex discrimination and gender-based violence, including sexual assault, sexual harassment, gender-based harassment, domestic violence, dating violence, and stalking.

If you or someone you know is experiencing any of these, WCC has staff and resources to support and assist you. To report an incident of sex discrimination or gender-based violence, as well as receive information and support, please contact one of the following:

Jojo Miller, Confidential Advocate
 Phone: (808) 348-0663
 Email: advocate@hawaii.edu
 Office: Hale Kāko‘o 110

Desrae Kahale, Mental Health Counselor & Confidential Resource
 Phone: (808) 235-7393
 Email: dkahale3@hawaii.edu
 Office: Hale Kāko‘o 101

Karla K. Silva-Park, Title IX Coordinator
 Phone: (808) 235-7468
 Email: karlas@hawaii.edu
 Office: Hale ‘Ākoakoa 220

As a member of the University faculty, I am required to immediately report any incident of sex discrimination or gender-based violence to the campus Title IX Coordinator. Although the Title IX Coordinator and I cannot guarantee confidentiality, you will still have options about how your case will be handled. My goal is to make sure you are aware of the range of options available to you and have access to the resources and support you need.

For more information regarding sex discrimination and gender-based violence, the University’s Title IX resources and the University’s Policy, Interim EP 1.204, go to manoa.hawaii.edu/titleix/

ACADEMIC INTEGRITY

Work submitted by a student must be the student’s own work. The work of others should be explicitly marked, such as through use of quotes or summarizing with reference to the original author.

In this class, students who commit academic dishonesty, cheating or plagiarism will have the following consequence(s):

Students will receive a failing grade for plagiarized assignments.

All cases of academic dishonesty are referred to the Vice Chancellor for Student Affairs

ALTERNATE CONTACT INFORMATION

If you are unable to contact the instructor, have questions that your instructor cannot answer, or for any other issues, please contact the Academic Affairs Office:

Windward Community College is an equal opportunity, affirmative action institution.

- Location: Alaka'i 121
- Phone: (808) 235-7422