GRAND CANYON UNIVERSITY PRESENTS THE

CANYON UNDERGRADUATE RESEARCH SYMPOSIUM FALL 2025

The Canyon Undergraduate Research Symposium is designed to feature exceptional student engagement, experiential learning, and research or industry-inspired projects of our undergraduate students.

MONDAY, DEC. 8

1 - 2 pm | Building 42, Room 224/6



RESEARCH & EXPERIENTIAL LEARNING PRESENTATIONS

Addressing Barriers to FAFSA to Enhance Economic Mobility

Speakers: Jackson Khan*, Jozy Kairu*, Ellie Mohr*, Lily Harris

Faculty Advisor: Evelyn Racette

College Affiliation: CHSS

Loyalty Dynamics Theory

Speakers: Elijah Winslow*, Owen Swanson*, Hope Ingalls*, Liam Kindelberger

Faculty Advisors: Dr. Randall D. Ordovich-Clarkson, Dr. Magen Branham

College Affiliations: CNS, CHSS

Red Light Rebellion

Speakers: Cierra Baca*, Carlos Diaz, Caleb Migura, Elise Ahrens*

Faculty Advisor: Dr. Magen Branham

College Affiliation: CHSS

From Physiology to Psychology: Advancing Health Through Multidisciplinary Research

Speakers: Elise Bayer*, Colton Reger*, Kayley Brennan*

Faculty Advisors: Dr. Zachary Ziegler, Dr. Eddie Smith

College Affiliation: CNS

POSTER PRESENTATIONS

College of Natural Sciences

1) RESTRICTION ANALYSIS AND CLONING OF BIDIRECTIONAL HYDROGENASE OF CYANOBACTERIA SYNECHOCYSTIS SP. PCC 6803

Abigail Veenstra, Tyler Rose, Allison Adkison, Leon Chen*, Isabella Avila-Ambrosi, Leila Balsiger*, Galyna Kufryk

2) PLANT-BASED INDUCTION OF APOPTOSIS IN BREAST CANCER CELLS BY ORIGANUM VULGARE

Arielle Weber, Ana Camorlinga*, Karen Denzler

3) GERMINATION OF PARKINSONIA MICROPHYLLA AND LEUCAENA LEUCOCEPHALA: THE EFFECTS OF SCARIFICATION AND TEMPERATURE

Elissa Santos, Jenna Smith, Neal Adam

4) NATURE'S PHARMACY: EXPLORING THE ANTIOXIDANT AND ANTIMICROBIAL POTENTIAL OF EDIBLE MUSHROOMS

Maame Osei-Fordwuo, Makayla Walizer, Annelise Scruggs, Allison Peschl*, Aaron Millett, Mary Gatta, Ivanna Bautista, Ramesh Velupillaimani

5) TOWARDS ANTICANCER CEPHALOSPORIN DUAL LIGANDS: SYNTHESIS OF RESIN-BOUND CEPHALOSPORIN

Macdell L. Mostow*, Brooklynne J. Kraft, Kathryn Wolff, Arianna Breindel, Jonathan Suggs, Richard Connors

6) INVESTIGATING THE ROLE OF SOD1 AND NF-KB BIOMARKERS IN A MODEL CONNECTING ALZHEIMER'S DISEASE AND DIABETES THROUGH HYDROGEN PEROXIDE AND GLYCERALDEHYDE TREATMENT, WITH MODULATION BY CURCUMIN AND RESVERATROL

Evan Litke, Logan Morris, Sherlin Moses, Hikmet Nural-Guvener

7) LAVANDULA ANGUSTIFOLIA: A NATURAL ALTERNATIVE TO ANTIBIOTICS FOR REDUCING BACTERIAL RESISTANCE

Alexis Foreman, Daisy Savarirajan

8) AEROBIC FITNESS OUTPERFORMS BODY COMPOSITION IN PREDICTING ACFT SCORES AMONG ROTC CADETS AND ACTIVE MILITARY PERSONNEL

Elizabeth Liu, Megan Bratetic, Jake Laufenberg, Kaitlyn Wabakken, Anthony Acevedo, Spencer Posey SGT, Zachary Ziegler, FACSM

POSTER PRESENTATIONS

College of Engineering and Technology

9) SOLAR COOKING STONE

Aaron Mayhew, Diana Ramos, Tyson Miller, Vaughn Paape

10) QUICK CUP SANITIZER

Bryce Cornel, Jacob Raines, John Tatum, Zack Baptista, Brenda Cimental, Craig Price

11) THREADED ROD CLEANER

Micah Drumm, Marcielo Salas, Joseph Barr, John Mulligan, Craig Price

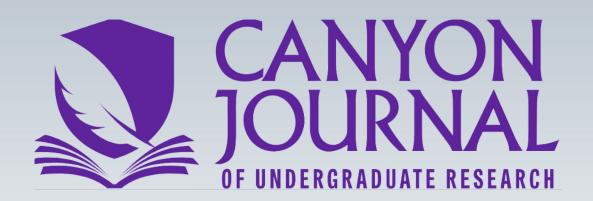
12) DRONE WITH TILTING PROPELLERS

Candace Cavaco, Jonathan Shuman, Taylyn Uemoto, Riley Kollbaum, Emily Lister

13) SPEAKER TEST STAND PHASE II

Kevin Konrad, Logan Waltjen, Ashlyn Glaser, McKenzy Gleadle, Dhivya Sundar, John Berkheimer, Ada Puyot





The Canyon Journal of Undergraduate Research (CJUR) is dedicated to the publication of exemplary faculty-mentored and peer-reviewed research produced by undergraduate students at Grand Canyon University (GCU). The CJUR is multidisciplinary with original, contemporary research in alignment with the Boyer Model of Scholarship. This publication is inclusive of a competitive manuscript selection process that undergoes rigorous peer-review.



CURRENT ISSUE



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CANYON UNDERGRADUATE RESEARCH CONFERENCE

SPRING 2026

The Canyon Undergraduate Research Conference (CURC) will feature multidisciplinary research and projects from undergraduate students. GCU and community guests are invited to explore engaging poster presentations and compelling oral presentations featuring undergraduate learners from the following programs: Canyon Emerging Scholars, Canyon Journal of Undergraduate Research authors and the Honors College.

MONDAY, APRIL 13, 2026

1-5 PM | Grand Canyon University 3300 W. Camelback Rd. Phoenix, AZ 85017 Antelope Gymnasium | Building 22



1-2:30 PM | Poster Session

- 1 2:30 PM: students available to present their research posters
- 2:30 4 PM: posters available for viewing

1 - 1:30 PM | Dean's Welcome for Prospective Students

• Dr. Breanna Naegeli | Dean, Honors College

2:15 - 5 PM | Oral Presentations

- Canyon Undergraduate Research Symposium
- Canyon Journal of Undergraduate Research authors
- Canyon Emerging Scholars participants
- Honors College showcase finalists

SPECIAL THANK YOU TO THE RESEARCH DEVELOPMENT SUBCOMMITTEE

Katalina Inzunza Herrera (Chair) - Honors

Dr. Breanna Naegeli - Honors

Dr. Scott Greenberger - Research & Grants

Dr. Jon Valla - CNS

Jared Trask - CAM

Dr. Alicia Kozimor - COE

Dr. Lindy Gaudiano - COE

Erin Boling - CCOB

Robert Loy - CET

Tara Chavez - Research & Grants

Marc Eilers - CONHCP

Anya Cofrancesco - Honors

Brittney Berry - CHSS

Nyomi Young - COT

Dr. Eric Peterson - CHSS

Dr. Galyna Kufryk - CNS

Rick Holbeck - Online Instruction

Dr. Christy Torkildson - CONHCP

Dr. Katherine Fetter - CONHCP

Dr. Brandon Warner - CONHCP

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Kacey Carvajal - CCOB

Savannah Hansen - CCOB

SPECIAL THANK YOU TO UNIVERSITY LEADERSHIP & ACADEMIC AFFAIRS FOR YOUR ONGOING SUPPORT.

