Audrey Pettengill

(707) 628-7964 · pettengilla@yahoo.com · apettengill@ucmerced.edu References available upon request.

SUMMARY

I am a dynamic and motivated research assistant with a strong desire to develop my skills in molecular techniques, data analysis, and experimental design to advance my understanding in neurobiology, genetics, and stem cell biology. Through hands-on experience managing Drosophila, conducting genetic analysis, and conducting research on Hermetia illucens for sustainable waste management, I have developed a robust skill set in molecular biology, genetics, and neurobiology. Additionally, I have asisted in data collection for meta-analysis projects, organized research articles, corresponded with researchers to ontain specific data, and located and analyzed relevant data for my research purposes. I believe my dedication to research as an undergraduate for the past two years has demonstrated my commitment to learn and enhanced my ability to contribute to collaborative research efforts.

RESEARCH EXPERIENCE

Cleary Lab, Michael Cleary PhD, University of California, Merced Undergraduate Research Assistant

January 2023 - Present

- Managing Drosophila stock and gaining experience creating new fly genotypes through various crosses. Preformed larval brains and immunofluorescent antibody stains.
- Conducting research to optimize Hermetia illucens (black solider flies, BSF) for sustainable waste management and greenhouse gas reduction. This research includes preforming DNA extraction, PCR, and microsatellite genotyping using fragment analysis.

Social & Health Psychology Applied Behavioral Research for Promotion & Prevention (SHARPP Lab), Martin Hagger PhD, University of California, Merced January 2024 - Present

Undergraduate Research Assistant | Research Assistant Leadership Team

- The SHARPP Lab studies psychological correlation on health behavior and aims to develop theories to promote health behavior change. The project I am currently working on explores the link between political orientation and health outcomes.
- Assist in data collection for meta-analysis projects under the supervision of senior researchers.
- · Organize research articles and maintained a comprehensive database of relevant literature.
- Correspond with researchers to obtain specific datasets and information crucial to ongoing studies.
- Locate and analyze relevant data using statistical methods and software to support research objectives.
- Research Assistant Leadership Team involves leading research assistants with various aspects of the lab including holding office hours, guiding students through various programs used In lab, and planning lab activities.

EDUCATION

Bachelor of Science, Developmental Biology University of California, Merced | Expected in 2025 Bachelor of Arts, Psychology University of California, Merced | Expected in 2025

Dean's List: Fall 2023, Spring 2024 Dean's List: Fall 2023, Spring 2024

Nanoscale Microscopy Lab Summer Institute Program University of California, Los Angeles | 06/2018

Conducted a comprehensive exploration of key microscopy techniques essential to nanoscience research: fluorescence microscopy, scanning probe microscopy, and electron microscopy.

Applied knowledge to interdisciplinary projects spanning molecular sciences, biotechnology, material science, chemistry, biochemistry, and engineering fields within the realm of nanoscience.

LEADERSHIP

Director of Delta Gamma Dialogues 08/2023 - Present

- · Elected position
- Prepare presentations for chapter meetings, summarizing key developments within the chapter.
- Communicate policies and procedures to ensure compliance with chapter standards.
- Create detailed plans outlining timelines, goals, budgets, volunteer needs and other requirements for chapter.

Campus Activities Board

09/2022 - 06/2023

- · Served on Campus Unity Board and as Decor Chair.
- · Organized and managed large-scale events.
- · Created marketing materials to promote campus events.
- Collaborated with vendors to coordinate services.

Research Assistant Leadership Team (RALT) - SHARPP Lab September 2024 - Present

- Leading other research assistants through various SHARPP Lab items such as using lab programs and discussing lab expectations.
- Hold weekly office hours for students who need extra support in lab.
- Create unity by planning lab activities.
- · Assists in recruiting potential new lab members.

VOLUNTEER EXPERIENCE

Clinical Experience Grassroots Clinic (Dr. Cline M.D.)

Summer 2021 - Present

- Shadowed Dr. Cline M.D. during medical procedures, gaining insight into patient care and medical decision-making.
- Assist with patient interactions, observed diagnostic processes, and learned about medical treatment planning.
- Develop understanding of healthcare delivery in a community-based setting, emphasizing holistic patient care and teamwork.

Service for Sight, Delta Gamma Sorority

Spring 2023 - Present

- Provide support for the five schools founded by Delta Gamma for visually impaired children as well as various other North American organizations promoting sight preservation and conservation efforts.
- · Participate in fundraising events and awareness campaigns to support the mission of Service for Sight.
- Contribute to community outreach initiatives aimed at improving access to eye care and education on visual health.

Lab Tours for Bobcat Day, University of California, Merced

Spring 2024

- Provided tours of Cleary Lab during Bobcat Day events.
- Engaged with prospective students and their families, providing insights into research activities and student involvement opportunities.