

SECTION: 10
DATE: April 21, 2022

BOARD OF REGENTS
EASTERN MICHIGAN UNIVERSITY

REPORT

**2021-2022 SYMPOSIUM UNDERGRADUATE RESEARCH FELLOWSHIP
RECIPIENTS**

ACTION REQUESTED

It is recommended that the Board of Regents accept and place on file the Report on the 2021-2022 Symposium Undergraduate Research Fellowship recipients.

STAFF SUMMARY

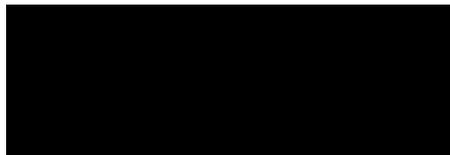
The Symposium Undergraduate Research Fellowship (SURF) is intended to encourage partnerships between undergraduate students and Eastern Michigan University faculty and to facilitate student participation in the annual Undergraduate Symposium. Selected student fellows are matched with faculty mentors in the student's chosen field of study. SURFs engage in a research or creative scholarly project that is of mutual interest between the student and faculty mentor. Students are provided with a \$1,000 stipend; faculty are provided up to \$1,000 to support the project. SURF positions are awarded for one year with the possibility of renewal. As a culmination of the year's work, SURFs present at the EMU Undergraduate Symposium. Eleven (11) students were supported during the 2021-2022 academic year.

FISCAL IMPLICATIONS

None. The cost of awards is fully supported by private donations to expendable funds associated with the Undergraduate Symposium.

ADMINISTRATIVE RECOMMENDATION

The proposed Board action has been reviewed and is recommended for Board approval.



University Executive Officer
Rhonda Longworth, Ph.D.

March 31, 2022

Date



Symposium Undergraduate Research Fellow (SURF) Awards 2021-2022 Research Fellows



Through donor support, the SURF program provides an opportunity for outstanding new and current students to extend their educational experience and academic passion beyond the classroom.

Fundraising efforts for the fellows began enthusiastically in the fall of 2006. Supporters of the Undergraduate Symposium were excited to learn of an opportunity to support student research at a more engaged level. Since the program's inception, donors have supported over 230 unique students. We have donors who have contributed since the beginning, those who chose to support through their estates, and even new donors who are alumni of the program.

Selected student fellows are immediately matched with a faculty mentor in the student's chosen field of study. SURFS are engaged in a research project that is of mutual interest between the student and faculty.

Students are provided with a \$1,000 stipend; faculty are provided up to \$1,000 to support the project. SURF positions are awarded for one year with the possibility of renewal.

As a culmination of the year's work, SURFs present at the EMU Undergraduate Symposium.

***We congratulate the following students on
their research awards!***



Ronia Cabansag

**Sadaf Ali, Faculty Mentor
Communication, Media & Theatre
Arts**

**Molly Luempert-Coy & The DTE
Energy Foundation, Sponsor
Documenting Notable Figures from
Eastern Michigan University's Past**

Eastern Michigan University renamed its Communication, Media, and Theater Arts building in 2020 after finding the theater's namesake frequently performed in blackface. This audio documentary, completed through an Academic Service-Learning Partnership between WEMU and Dr. Sadaf Ali's CTAT 334: Radio/TV News Writing course, highlights the untold histories of other campus buildings and the people whose names they bear. Mark Jefferson, namesake of EMU's Science Complex, and Judy Sturgis Hill, new namesake of the CMTA building, are among the featured figures. This project relies on the university's archives, as well as interviews with archivists, historians, EMU faculty, and other researchers.



Julia De La Harpe

**Chistopher Robbins, Faculty Mentor
Elementary Education
Tom Sidlik, Sponsor**

**The Effects of Time Capsule Writing
on Identity and Mental Health**

A time capsule is a form of writing that allows an individual to document experiences through different periods of their life. Time capsule writing (TCW) can benefit the mental health of the writer, and help them to understand their personal identity. Through studies, benefits and drawbacks of TCW have been observed. TCW can trigger PTSD (Hoyt, 2011), but it can also help to develop writing skills and a more detailed understanding of one's identity (Kinnear, 2004). Within my presentation, I will draw from both personal experience and existing research in order to demonstrate the links between TCW and the development of a person's identity, as well as the impact of TCW on mental health.



Kyla Jones

**Diane Guevara, Faculty
Mentor**

Interior Design

**Retirement Income
Solutions, Sponsor**

**Inclusivity Reimagined
using Research-Based
Design**

Workplace re-entry is a challenge as companies bring back employees and clients to either in-person or hybrid workplaces. The NEXT office suite reflects the new post-COVID work environment. Current research suggests evidence-based design principles such as WELL, reimagining social support, and workplace collaboration allow employees and clients to feel supported post-COVID. This project uses various layouts to create an inclusive environment where one can focus, learn, socialize, or refresh while being socially distanced. Using the WELL Building Standard #87 Beauty and Design and #100 Biophilia throughout the design boosts morale, productivity, and the drive to come back to the office.



Peter Landor

**Cara Shillington, Faculty
Mentor**

Biology

**William Fennel Endowment,
Sponsor**

**Does Size Matter? The
Effect of Size on Movement
in Tarantula**

Body size plays a fundamental role in how organisms interact with their environment. Larger size often means greater survivability due to having fewer predators and more diversified prey. Larger size may also decrease an individual's perception of predation, as larger organisms tend to be more adventurous than their smaller conspecifics. I examined the impact of size on locomotory activity in juvenile tarantulas. Same-aged siblings were divided into three feeding groups resulting in different growth rates and sizes. We compared activity among size groups. Preliminary results indicate larger individuals move both further and faster than smaller sized siblings in a novel arena.



Eva Long

**Jeffery Bernstein, Faculty
Mentor**

Political Science

**Ed Jakeway, Sponsor
Balancing Free Speech
and Inclusion on College
Campuses**

We seek to understand the conditions under which students believe people should be allowed (or not allowed) to speak on a college campus. These conditions might include the context or content of the speech, characteristics of the speaker, or sponsorship by an on-campus group. We use a think-aloud methodology. Students are given reading material on controversial American figures and asked to "think aloud" as they read and develop their thoughts. This allows for in-depth analysis of both how students *initially* approach First Amendment rights, and of the *conclusions* they come to after pensive, out loud thinking.



Carlos Mellado-Fritz

**Katherine Greenwald, Faculty
Mentor
Biology
William Fennel Endowment,
Sponsor**

**The Stretch Region Within the TTD
Domain of UHRF2 is Likely a
Disordered Region**

Unisexual *Ambystoma* salamanders represent a unique 5,000,000-year-old all-female lineage. They steal DNA from males of sexual species to trigger egg development, but the male genome is not always incorporated into the offspring. I genotyped samples from Indiana and Michigan to identify unisexual genome combinations using PCR to amplify microsatellites. I will compare this recent data to older population sampling to understand how the composition of these populations has changed over time. Due to global climate change, we predict that populations have shifted towards having more unisexu- als, since they may be better adapted to warmer climates than the northern-distributed *A. laterale*.



Imani Peterkin

**Ruth Ann Armitage, Faculty Mentor
Chemistry
Dale and Gloria Heydlauff & AEP,
Sponsor**

**The Method Development and
Validation of Plasma Chemical
Oxidation**

The intent of this study is to confirm the validity of a low-temperature, minimally destructive technique to prepare carbon-based artifacts for radiocarbon dating. Typically, combustion is used to prepare such samples for dating by accelerator mass spectrometry. Combustion completely consumes the sample, leaving nothing for further analysis. In order to preserve some of the sample being dated, we are testing a technique called plasma oxidation in the Archaeological Chemistry lab at EMU. By comparing dates obtained from textiles and rock paintings by the combustion process to those we measure from plasma oxidation, we can determine whether our approach is a reliable alternative.



Olivia Robinson

**Susan Booth, Faculty Mentor
Arts Management
William Fennell Endowment,
Sponsor**

**Where Art Creates Community: An
Overview of EMU AMA's Redirected
Branding Strategy**

Over the COVID-19 Pandemic, The EMU Arts Management & Administration Department realized that despite our remoteness, art continues to foster community. With this fact in mind, EMU AMA set goals for the 2021-22 academic year, including creating brand awareness, unlocking career opportunities for students, and recruiting individuals with artistic and managerial passions.

Collaborating with the School of Communication, Media, & Theatre Arts, Division of Communications, & AMA alumni, EMU AMA is now one step closer toward locating & executing our branding & marketing potential. This presentation intends to introduce our new branding concept & highlight the arts' true impact at EMU & beyond.



Nico Slowik

**Eric Acton, Faculty Mentor
English Linguistics
Ian Pendelton & Vertex
Pharmaceuticals, Sponsor**

**Factors in the Form of Requests and
Directives in the Gaming Community**

Brown & Levinson's (1987) politeness theory claims that the politeness of peoples' requests/directives depends on how involved the request/directive is, how socially close the interlocutors are, and the power relations between them. I investigate politeness in players' requests/directives in online multiplayer gaming via the gaming group OfflineTV. Refining Brown & Levinson's theory, I identify three additional crucial factors in the degree of politeness of players' requests/directives: the (non-)cooperativity of the game, the urgency of the request/directive, and the importance of the request being carried out. For instance, urgent and important requests correlate with hyper-politeness.



Anneliese Vogler

**Alice Jo Rainville & Olivia Ford,
Faculty Mentors
Dietetics**

**Bank of Ann Arbor, Sponsors
Knowledge, Beliefs, and Behaviors
Related to Hypertension in Michigan
Filipino Americans**

Filipino Americans are at higher risk of hypertension (HTN) compared to other ethnic groups. This online survey of Filipino American residents of Michigan (n=50) assessed respondents' health and nutrition-related knowledge, beliefs, and behaviors. Sixty-six percent of respondents reported two or more behavioral risk factors of HTN. Knowledge of these risk factors was assessed using six questions and thirty percent of respondents got two or more incorrect. Sixty percent of respondents agreed that Filipino Americans are at higher risk of HTN. The data indicated that there is a need for education on behavioral risk factors and misconceptions.



Ahmad Zalt

**Carla Damiano, Faculty Mentor
World Languages
Tom Layher, Sponsor**

**Life Experiences of East German
Citizens in Pre- and Post-
Reunification Germany: Gabriele
Eckart's Novel *Vogtlandstimmen***

A writer, poet, and novelist, Gabriele Eckart is a former East German citizen. Previously, I explored the intricacies of Eckart's experiences with State censorship in the former GDR – experiences which led to her escape to West Germany in 1987. In 2021, Eckart published a new, experimental novel entitled *Vogtlandstimmen*. The main characters' commentary reveals (re)sentiments and attitudes of the novel's archetypal East German citizens who live in the Post-Unification present, and whose current situations have resulted from the ramifications of their changed political reality. This study explores the widespread dissatisfaction of the East German population after reunification as revealed in this novel.