

# The Graduate School Citations for Academic Excellence

Fall 2024

Presented by The Graduate School

318C DeVos Center

616-331-7105

[www.gvsu.edu/gs](http://www.gvsu.edu/gs)

[gradschool@gvsu.edu](mailto:gradschool@gvsu.edu)

in collaboration with the  
Graduate Student Association (GSA)



Dear friends and members of our graduate education community,

At the end of each academic semester, we have the great pleasure to honor those students, staff, and faculty who have distinguished themselves in graduate education at Grand Valley State University. The Graduate School Citation Awards for Academic Excellence and the Graduate Student Association Faculty Awards are proud Grand Valley State University traditions that began in 2006 thanks to the combined efforts of the University Graduate Council and the Graduate Program Directors. The Graduate School and the Graduate Student Association serve as co-sponsors for this event.

The Graduate School Citation Awards recognize excellence in academic performance in several categories. Graduate students are nominated for these awards by staff or faculty members, advisors, graduate program directors, and departmental chairs or school directors. Each recipient receives a certificate of recognition and a graduate honors cord. We are excited to announce the inaugural awarding of the Jennifer Rose Palm Memorial Award for Excellence in Service to Graduate Education which honors GVSU staff who demonstrate exceptional dedication to supporting graduate students. Additionally, the Graduate Student Association honors members of our graduate faculty who have distinguished themselves in mentoring and supporting our students at Grand Valley. Their noteworthy dedication helps to create a vibrant and engaged learning community.

Grand Valley State University is extremely proud of the accomplishments of these graduate students, staff, and faculty members. I commend each of our award winners and wish them a very successful future.

Congratulations!

A handwritten signature in black ink that reads 'Erica Hamilton'.

**Erica Hamilton, Ph.D.**

Interim Vice Provost for the Graduate School  
Grand Valley State University

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**GRADUATE SCHOOL CITATIONS FOR  
ACADEMIC EXCELLENCE  
Fall 2024**

**ACADEMIC EXCELLENCE IN THE DEGREE PROGRAM**

*College of Computing*

- ❖ Henry Ngunjiri, Data Science and Analytics
- ❖ Naomi Sang, Health Informatics and Bioinformatics

*College of Education & Community Innovation*

- ❖ Benjamin Fetterley, Health Administration
- ❖ Christopher Marco, Public Administration
- ❖ Sarah Coutts, Literacy Studies

*College of Health Professions*

- ❖ Arika Lanctot, Occupational Therapy - Masters
- ❖ Hailey Deptula, Speech Language Pathology
- ❖ Lauren Parlette, Physician Assistant Studies

*College of Liberal Arts & Sciences*

- ❖ Daniel Ridders, Communications

*Padnos College of Engineering*

- ❖ Trysten Dembeck, Engineering

## OUTSTANDING MASTER'S THESIS

### *College of Education & Community Innovation*

- ❖ Jaimie Lomonaco, Literacy Studies

### *College of Liberal Arts & Sciences*

- ❖ Keely Dunham, Biology – Annis Water Resources Institute
- ❖ Rheyne Bui, Communications

### *Padnos College of Engineering*

- ❖ Jacob Pung, Engineering

## OUTSTANDING FINAL PROJECT

### *College of Computing*

- ❖ Aditya Dube, Data Science and Analytics
- ❖ Venkata Jagadish Mandava, Health Informatics and Bioinformatics

### *College of Education & Community Innovation*

- ❖ Robert Samuels III, Literacy Studies

### *College of Health Professions*

- ❖ Meryn McClelland, Occupational Therapy – Masters
- ❖ Mikaela Baker, Occupational Therapy – Masters
- ❖ Kaylee Bradeen, Occupational Therapy – Masters
- ❖ Elise Cormany, Occupational Therapy – Masters
- ❖ Jillian Dornan, Occupational Therapy – Masters
- ❖ Rachel Paddinge, Public Health

### *College of Liberal Arts & Sciences*

- ❖ Matthew Gamelin, Communications

### *Padnos College of Engineering*

- ❖ Zackary Rauch, Engineering

## OUTSTANDING PUBLICATION

### *College of Education & Community Innovation*

- ❖ Christopher Marco, Public Administration

### *College of Liberal Arts & Sciences*

- ❖ Janina Mayers, Biomedical Sciences

### *Padnos College of Engineering*

- ❖ Co Nguyen, Engineering

## EXCELLENCE IN SERVICE TO THE COMMUNITY OR PROFESSION

### *College of Education & Community Innovation*

- ❖ Morgan Hanks, Public Administration

### *College of Health Professions*

- ❖ Kathryn Rabine, Physician Assistant Studies
- ❖ Summer Brogren, Speech Language Pathology

### *College of Liberal Arts & Sciences*

- ❖ Mary Parr, Biology
- ❖ Rheyndy Bui, Communications

### *Padnos College of Engineering*

- ❖ Gregory Janes, Engineering

## EXCELLENCE IN LEADERSHIP AND SERVICE TO GVSU

### *College of Education & Community Innovation*

- ❖ Adam Prielipp, Public Administration

### *College of Health Professions*

- ❖ Abby Dunster, Speech Language Pathology
- ❖ Brendan Garfield, Physician Assistant Studies
- ❖ Rachael Vance, Occupational Therapy – Masters

### *Padnos College of Engineering*

- ❖ David Pevic, Engineering

## EXCELLENCE IN PROMOTING DIVERSITY AND INCLUSION AT GVSU

### *College of Health Professions*

- ❖ Capriana Calvachi, Physician Assistant Studies

## EXCELLENCE IN SUSTAINABILITY

### *College of Education & Community Innovation*

- ❖ Sarah Laman, Public Administration

### *College of Health Professions*

- ❖ Joslyn Mixon, Speech Language Pathology

### *College of Liberal Arts & Sciences*

- ❖ Eamonn Powers, Biology

*Congratulations to the Fall 2024  
Graduate School Citation Award Recipients!*

**GRADUATE SCHOOL JENNIFER ROSE PALM MEMORIAL  
AWARD FOR EXCELLENCE IN SERVICE TO GRADUATE  
EDUCATION**

**Fall 2024**

*Division of Enrollment Development and Educational Outreach*

❖ Tracey James-Heer, Admissions & Recruitment

**GRADUATE STUDENT ASSOCIATION FACULTY AWARDS**

**Fall 2024**

**KIMBOKO INCLUSION AWARD**

*Seidman College of Business*

❖ Jonathan Brignall, Accounting

**OUTSTANDING MENTORSHIP AWARD**

*College of Liberal Arts & Sciences*

❖ Todd Aschenbach, Biology

**OUTSTANDING TEACHING AWARD**

*College of Health Professions*

❖ Randalynn Hajek, Clinical Dietetics

*Congratulations to the Fall 2024  
Staff and Faculty Award Recipients!*



# GRADUATE SCHOOL CITATION FOR ACADEMIC EXCELLENCE IN THE DEGREE PROGRAM

Fall 2024

## *College of Computing*

### ❖ **Henry Ngunjiri, Data Science and Analytics**

Henry is an incredibly motivated and talented student on track for an outstanding career in data analytics. His course performance was outstanding within his program. His level of overachievement in courses such as Machine Learning was truly remarkable. He singlehandedly placed top rank on project leaderboards against very stiff competition. He is known for going above and beyond, submitting notebooks packed with impressive visualizations, benchmarking models, and contributing thousand lines of succinct modular code. His enthusiasm for good work is contagious as is his thoughtful questions in courses. As a GA, Henry has implemented impressive autonomous AI agents that can structure their own actions, scrape the web, and extract insights through ensembles, consensus, chain of thought, and recursion, among other approaches. His professional potential is demonstrated by a successful internship at Walmart this summer.

### ❖ **Naomi Sang, Health Informatics and Bioinformatics**

Naomi has consistently demonstrated outstanding academic achievements. Her background in Health and Development Communication from Kenya provides her with a unique perspective, enabling her to excel in group projects and navigate technical challenges with ease. Naomi's persistence, organization, and excellent communication skills make her an exceptional student. Beyond academics, Naomi has excelled in multiple roles, including Programming Specialist in the College of Computing and Communication and Marketing Graduate Assistant in the Padnos College of Engineering and Computing. She is also an intern at the Annis Water Resources Institute and a fellow in both the Cook Leadership Academy and The Build Fellowship. Her active participation in the Health and Bioinformatics Journal Club further reflects her commitment to her field.

Naomi has consistently been among the best in her class, mastering projects and working well with group members. Her projects stand out due to her persistence and quality of work. Naomi's organization and listening skills are among her most admirable qualities, and she maintains a positive attitude in everything she does. Her general attitude towards work is excellent, showing commitment, confidence, thoughtfulness, and hard work in both class and internship projects.

### *College of Education & Community Innovation*

#### ❖ **Benjamin Fetterley, Health Administration**

Ben is a professional student with many family and professional responsibilities who has been successful maintaining a 4.0 GPA throughout his academic tenure. Beyond earning high grades, Ben has also demonstrated excellence in professional leadership in the classroom, with the various teams he has been a part of, and in community activities. Because of the knowledge and experience he brings and his excellent collaborative and engaging style, Ben has often been selected by his peers as the spokesperson or leader of student group projects and initiatives. Ben serves as a model to the MHA program for not only his high academic achievements but also his personal and professional character.

#### ❖ **Christopher Marco, Public Administration**

Christopher has maintained a perfect 4.0 GPA while balancing his responsibilities in community development for the City of Grand Rapids and serving as a half-time graduate assistant. His academic performance is consistently outstanding, with coursework, assignments, and projects often exceeding expectations. Christopher is recognized for his creativity and insight, earning high praise from peers and faculty. His exceptional writing skills are evident in his numerous published articles in reputable journals such as *Governing*, *The Urbanist*, and *Public Square*. In the classroom, Christopher is an active participant, regularly contributing innovative perspectives that enhance the learning experience. His leadership in group projects is exemplary, demonstrating his ability to guide and collaborate effectively. Additionally, his commitment to service is evident through his role as Vice-President of the ICMA, where he has shown dedication to his

field and community. Christopher's recent research, "Economic Development and the Revitalization of Small-Town America: A Comparative Analysis of Four Michigan Communities," is a testament to his rigorous and high-quality academic work. This research stands out as some of the best student work in the MPA program, showcasing his ability to conduct thorough and impactful studies. His unwavering dedication to academic excellence, combined with his leadership and service, makes him a standout individual who significantly contributes to both his academic and local communities.

❖ **Sarah Coutts, Literacy Studies**

Sarah has demonstrated academic excellence by maintaining a high GPA, achieving high grades in her courses. However, beyond grades, Sarah has performed in outstanding ways within her coursework. For example, in Spring/Summer 2024, Sarah was enrolled in EDR 693: the literacy master's project course. Her thoughtful and conscientious persona led her to create a meaningful project centered on developing early literacy screening assessments and corresponding interventions for students needing more literacy support during instruction. Additionally, Sarah stood out in her literacy practicum course (EDR 685), demonstrating thoughtful and excellent application of learning.

### *College of Health Professions*

❖ **Arika Lanctot, Occupational Therapy – Masters**

Arika excels in the classroom and in her fieldwork placements, and she is also a leader within her hybrid cohort. Arika currently holds a 3.94 GPA, has volunteered her time to help with departmental events such as admissions and orientation, and is consistently professional and positive in her interactions with faculty and other students.

❖ **Hailey Deptula, Speech Language Pathology**

Hailey has served as a research assistant in the GV2 Voice and Swallow Lab from fall 2021 to winter 2024, demonstrating outstanding potential for high-quality research. She excels in communication and collaboration, particularly with peers and collaborators from other healthcare disciplines. Actively

involved in several research projects focusing on clinical pedagogical labs and hybrid simulations, she consistently meets deadlines and works independently. Hailey is not only academically accomplished but also kind, hardworking, and a true team player. She was a lead presenter for the oral paper titled “Interprofessional Voice Labs to Develop an Actor-Centered Voice Intervention Model: Comparing Two Student Cohorts of Speech-Language Pathology and Acting” at The Voice Foundation Symposium in Philadelphia.

❖ **Lauren Parlette, Physician Assistant Studies**

Lauren has consistently demonstrated academic excellence throughout her graduate studies, exceeding expectations in both coursework and contributions to the academic community. Her impressive GPA reflects her dedication, while her written assignments and projects showcase advanced analytical skills and critical thinking. In group settings, Lauren excels individually and elevates her peers through collaboration and leadership, highlighting her success in both academic and team-oriented environments. Her intellectual curiosity and dedication to learning inspire her peers, and they are confident she will continue to excel in her professional endeavors.

*College of Liberal Arts & Sciences*

❖ **Daniel Ridders, Communications**

Daniel has demonstrated exceptional dedication in applying his coursework and research to both his professional and personal experiences. He has consistently performed at a high level throughout the graduate program, using his interests and lived expertise to enrich his classwork. I had the privilege of teaching Daniel in communication ethics, theory, and intercultural communication, and guided his independent study project on communication, sports, and small group communication. His study on the role of communication in team sports was particularly significant, highlighting the nuances of small group communication in college sports. Daniel completed the graduate program in Spring/Summer 2024. He was always eager to assist others and share his experiences with new students, providing valuable mentorship and helping them navigate courses and

research opportunities. His contributions have been greatly appreciated by both faculty and peers.

### *Padnos College of Engineering*

#### ❖ **Trysten Dembeck, Engineering**

The faculty is delighted that a zealous student like Trysten, with great potential for self-improvement, seeks greater opportunities. He has been taught in several undergraduate and graduate courses and has shown eagerness to acquire new knowledge. This is evident in his meticulous exploration of hypotheses before accepting them as theories. Trysten's strong desire to understand his subjects and expand his knowledge is clear. His intelligence shone through his master's thesis, where he demonstrated excellent capability in understanding technical papers, implementing ideas, and working tirelessly. He possesses excellent communication skills and maturity, proving to be an effective group leader and member.

**GRADUATE SCHOOL CITATIONS FOR  
OUTSTANDING MASTER'S THESIS  
Fall 2024**

*College of Education & Community Innovation*

❖ **Jaimie Lomonaco, Literacy Studies**

- **Thesis Title:** Reading Intervention Effects on Literacy Development among High School Newcomer English Learners

Jaimie has developed a thesis focused on developing literacy skills in secondary students newly arrived in the United States, many of whom have had interrupted or no prior education. She utilized the Core Knowledge Language Arts (CKLA) program but questioned its effectiveness as an excellent practitioner. Her master's thesis is a remarkable piece of practitioner vision translated into scholarly work, demonstrating through statistical data and analyses that CKLA was effective in developing literacy skills in newcomer multilingual learners at Godwin Heights High School, with significant improvements in spelling, reading comprehension, and word recognition. She concludes that the study's results have important implications for classroom instruction, especially given the increasing number of English Language Learners (ELL) within diverse subgroups, including students with interrupted formal education, no education, and refugees in urban school districts across the United States. Based on these findings, she recommends that educators, administrators, and stakeholders support foundational reading blocks and interventions in secondary multilingual newcomer programs to accelerate literacy. Given Lomonaco's excellent scholarly skills and her contributions to the development of literacy in multilingual learners, she is strongly recommended for the Dean's Outstanding Thesis Award.

*Jaimie's abstract appears on the next page.*

## ABSTRACT

Secondary English learners (ELL) who newly arrive in the US with incomplete or no previous access to formal education, critically need to develop basic literacy skills in reading. This growing population is often placed in subject matter courses, where secondary teachers are unprepared to assist them with developing reading skills to comprehend academic language and the content. Gyovai, L. K., et.al (2009) assert early reading intervention allows secondary Students with Limited or Interrupted Formal Education (SLIFE) recurrent opportunities to process literacy skills and thus establish reading fluency (i.e., speed and accuracy) along with vocabulary recognition and text comprehension strategies. The intervention of five components (phonological awareness, alphabetic principle, fluency, vocabulary knowledge, and text comprehension strategies) are imperative to be a proficient reader. By contrast, inadequacies in any of these areas will interrupt students' literacy development. In order to investigate the impact of secondary language acquisition in the secondary newcomer class, the researcher conducted a study using the Core Knowledge Language Arts (CKLA) curriculum and interventions upon categories of ELL: refugee (R), SLIFE (S), and no SLIFE (NS).

The effects of CKLA curriculum and interventions are investigated using statistical analysis within a quantitative design research methodology to test hypotheses about cause-and-effect relationships among variables. The research analyzed subjects' CKLA assessment scores in spelling, reading comprehension, and word recognition within a single study which allowed the researcher to better understand the population's foundational literacy ability. The design used a match pair component to analyze pairs of subjects. Findings from the study show the interquartile range stabilized (narrowed) and improved (grew in score) after 9 weeks of interventions for each of the ELL subcategories which proved the curriculum and interventions are effective. Results from this study have important implications for classroom instruction due to the increasing number of ELL within the categories of SLIFE, no SLIFE, and refugees in urban school districts within the United States. The responsibility is of educators, administrators, and stakeholders are the foundational reading blocks and interventions in secondary ELL newcomer programs to accelerate literacy.

## *College of Liberal Arts & Sciences*

### ❖ **Keely Dunham, Biology – Annis Water Resources Institute**

- **Thesis Title:** Using airborne eDNA to assess hemlock woolly adelgid (*Adelges tsugae*; HWA) infestations and their impact on Michigan coastal forests

Keely's Master's thesis focused on the early detection and improved treatment of the hemlock woolly adelgid, a recent invasive insect in West Michigan that targets and potentially kills hemlock trees. These trees are keystone forest species, and without treatment, they can be locally and more broadly extirpated. Keely used eDNA passive capture and analysis to demonstrate and correlate adelgid densities without having to climb trees or wait for serious and visible infection to manifest. In short, Keely is clearly well-deserving of this recognition, and we are pleased to forward her nomination.

*Keely's abstract appears on the next page.*



## ABSTRACT

Invasive species colonization degrades ecosystem structure and function, creating a cascade of ecological consequences. Hemlock woolly adelgid (HWA, *Adelges tsugae*) is an invasive insect that has killed millions of eastern hemlocks (*Tsuga canadensis*), a foundation species in North America. HWA feed on eastern hemlocks, resulting in tree mortality within several years. In Michigan, land managers depend on early detection to contain infestations and respond through forest-level management. Environmental DNA (eDNA) applications have recently become a powerful biomonitoring tool for invasive species detection. This thesis had two main objectives: we investigated whether molecular analyses could assess HWA infestation level and we used eDNA applications to determine if the presence of HWA is altering plant and arthropod communities. To explore both objectives, we deployed 100 airborne eDNA traps to sample nine infested and six uninfested sites in west Michigan. In Chapter II, we compared relationships among HWA crawler counts, qPCR values, and HWA sistens counts from infested sites. We found that qPCR values and crawler counts are good predictors of HWA infestation levels. We recommend that managers use crawler counts to assess infestation levels because it is an accessible method. In Chapter III, we used amplicon sequencing approaches to assess whether HWA infestations are impacting biodiversity. We compared the plant and arthropod genera detected between infested and uninfested forests and across sites. Plant genera were different across sites, but not between infested and uninfested forests. Arthropod genera differed between infested and uninfested forests and across sites. Results indicated that plant communities are not yet impacted by HWA infestations, but that arthropod communities may be responding to the presence of HWA and hemlock decline. Overall, this thesis provides managers with a tool to optimize management strategies and baseline data to understand how HWA may change communities in the Great Lakes region.

❖ **Rheynd Bui, Communications**

- **Thesis Title:** Hyphenated Journeys: Identity Negotiations of Multiethnic Vietnamese Americans Through the Lens of Hybridity

Rheynd Bui has undertaken a significant and personal research project on communication and identity formation, focusing on her experiences as a multiracial/multiethnic individual to interview others about their identity formation. In her thesis, "Hyphenated Journeys: Identity Negotiations of Multiethnic Vietnamese Americans Through the Lens of Hybridity," she used a qualitative approach incorporating autoethnography and in-depth interviews to understand how multi-ethnic people form and maintain their identity. Key findings include language usage, strategies to increase cultural identification, and sharing cultural practices for identity maintenance. The research, which involved participants from West Michigan with Vietnamese and multicultural heritage, utilized the "emotion wheel" to facilitate comfortable and open discussions about identity. This intercultural communication project contributes to immigration research, nuances the theory of hybridity, and sheds light on the ethnic fabric of the West Michigan community. Rheynd's thesis demonstrates her mastery of subject content and qualitative research methods, providing a valuable foundation for further discussions on multicultural and multiethnic identities in the community.

*Rheynd's abstract appears on the next page.*

## ABSTRACT

This study explores how Vietnamese Americans with mixed heritage navigate their identity. Through interviews and autoethnography, it examines how multiracial/multiethnic Vietnamese Americans maintain their Vietnamese identity while constructing their multiracial/multiethnic identity. The findings underscore the importance of several factors of identity maintenance, including seeking cultural security outside the home, language as a key to culture, and the importance of connection through cultural sharing in shaping and expressing multiracial/multiethnic identity. It uses Homi Bhaba's theory of hybridity to understand how these individuals view their hyphenated identities. The research highlights the role of verbal and nonverbal communication in this process. The researcher conducted ten in-depth interviews with a diverse sample of participants whose ages span generations. The research addresses gaps in the existing knowledge on mixed heritage identity negotiation, with implications for intercultural communications. This study aimed to uncover how people understood their complex identities and find strategies for others to do the same providing a nuanced understanding that can inform broader discussions on diversity. The project will also help us understand how people of multiple heritages strategically utilize communication to connect with and maintain ties to their cultural groups. The ultimate hope is that the findings will contribute to academic discourse and practical applications in fostering inclusive environments and promoting intercultural understanding.

## *Padnos College of Engineering*

### ❖ **Jacob Pung, Engineering**

- **Thesis Title:** Magnetic Particle Inductive Sensing Using Superimposed AC Driving Methods

Jacob has enthusiastically accepted the challenge of advancing collaborative research between Grand Valley State University (GVSU) and Western Michigan University. This research focuses on enhancing the features of a new inertial sensor. Due to Jacob's thesis, the direction of this research has shifted. He has applied advanced mathematics and simulations to demonstrate how a magnetic nanoparticle-based sensor can determine rotation direction and has introduced new methods to measure the magnitude of motion. This research aims to improve measurement methods that have been in development for the past eight years.

*Jacob's abstract appears on the next page.*

## ABSTRACT

Gyroscopes have long been used for measuring an object's angular orientation. Methods range from mechanical spinning disks to oscillating spring-mass systems. However, previous gyroscopes can suffer from high maintenance or fragility. Recently, a novel gyroscope has been invented that aims to curb these restrictions through the use of ferrofluid. The purpose of this thesis is to propose a new method of modelling and measuring the signals from the novel gyroscopic device. Rather than simply measuring the device's averaged current consumption via slow measurements, an attempt was made to model the voltage amplitude at any time. This allows both a faster examination of the changing magnitude and phase of the AC signal. This changing phase is the key to determining the direction of rotation of the device. Simulation results indicate that the phase difference between the device under rotation and the device at steady-state are very low and may not be detectable with a large noise-floor.

**GRADUATE SCHOOL CITATION FOR  
OUTSTANDING FINAL PROJECT  
Fall 2024**

*College of Computing*

- ❖ **Aditya Dube, Data Science and Analytics**
  - **Project Title:** Prevalence and Predictors of Medication Therapy Management (MTM) Use Among Adults in the United States

Aditya's project investigates key demographic, socioeconomic, and health-related factors influencing the utilization of MTM services. His analysis identifies significant predictors, such as age, education, income, and geographic location, and provides actionable recommendations to address disparities and improve access to MTM services. This demonstrates his analytical rigor and commitment to addressing real-world healthcare challenges. Although Aditya is a student in the Data Science and Analytics program, he has actively sought opportunities to collaborate in health informatics. He has been an active member of the Health and Bioinformatics (HIB) Journal Club for nearly two years, regularly attending meetings and contributing valuable insights. Earlier this semester, he joined the lab and took on this project, working independently with impressive dedication. While the paper has not yet been submitted, it is on track to be finalized and submitted by the end of the semester, reflecting his consistent effort and focus. Aditya also demonstrated a strong aptitude for interdisciplinary work and a keen interest in applying data science to healthcare in the CIS661 Introduction to Health and Bioinformatics course. His ability to integrate these disciplines is evident in the quality and relevance of his current project.

*Aditya's abstract appears on the next page.*

## ABSTRACT

**Introduction:** Medication Therapy Management (MTM) services play a critical role in optimizing medication use, improving therapeutic outcomes, and reducing healthcare costs. Despite their benefits, the utilization of MTM services remains inconsistent across various demographic and socioeconomic groups in the United States. Understanding the factors influencing MTM use is crucial to addressing disparities and enhancing access to these services.

**Objective:** This study aims to analyze the prevalence and predictors of MTM service utilization among adults in the United States, focusing on demographic, socioeconomic, and health-related factors.

**Methodology:** The study used survey data from analyzing responses from 1,515 participants. Key independent variables included age, marital status, education, income, geographic location, medication cost burden, and the number of medications used daily. Chi-square tests and logistic regression analyses were employed to identify significant predictors of MTM utilization, with statistical significance set at  $P < 0.05$ .

**Results:** Approximately -% of participants reported using MTM services. Significant predictors of MTM use included age, marital status, education level, income, and geographic location ( $P < 0.05$ ). Higher utilization rates were observed among participants aged 18–44, those with higher education levels, and individuals with greater financial resources. Additionally, participants reporting financial hardship and those managing multiple medications were more likely to engage with MTM services.

**Discussion:** The findings highlight disparities in MTM utilization, with younger, higher-income, and better-educated populations engaging more frequently. These results suggest the need for targeted interventions to improve MTM awareness and access, particularly among underserved and vulnerable groups. Strategies should focus on addressing barriers related to financial constraints and increasing outreach efforts in rural and lower-income areas.

**Conclusion:** This study identifies critical factors influencing MTM utilization and underscores the importance of addressing demographic and socioeconomic disparities to expand access to MTM services. Future research should explore additional barriers and facilitators to ensure equitable access and improved healthcare outcomes through MTM services.

- ❖ **Venkata Jagadish Mandava, Health Informatics and Bioinformatics**
  - **Project Title:** Predictors of Online Digital Source Usage for Medical Information

Venkata, a graduate student in the Health and Bioinformatics program, has consistently demonstrated exceptional commitment to academic excellence, innovation, and a strong work ethic. His capstone project for CIS691, titled “Predictors of Online Digital Source Usage for Medical Information,” addresses real-world challenges with thoughtful analysis and meaningful insights. The project identifies key patterns and trends, providing recommendations for improving equitable access to reliable medical information and enhancing digital health literacy. Since 2022, Venkata has been an active member of the Health and Bioinformatics (HIB) Journal Club, regularly attending meetings and contributing valuable insights. Last year, he presented his work at the Graduate Showcase, effectively communicating his research to a diverse audience. He also submitted his research for publication, reflecting his ambition and dedication to the academic community. Venkata’s interpersonal skills and collaborative nature stand out. He excels as both an independent learner and a team player, working effectively with diverse peers. His positive attitude, persistence, and determination make him an exceptional student and researcher. I wholeheartedly recommend Venkata for the Outstanding Final Project Award, as he embodies the excellence this award recognizes.

*Venkata’s abstract appears on the next page.*



## ABSTRACT

**Introduction:** Digital platforms play an increasingly vital role in accessing health information, yet their utilization varies significantly among different population groups. Understanding these patterns is essential to enhance digital health literacy and address healthcare disparities.

**Objective:** This study aimed to identify key demographic, socioeconomic, and health-related predictors of digital platform usage for medication information.

**Methodology:** Data were drawn from 1,521 participants in the 2021 National Consumer Survey on the Medication Experience and Pharmacists' Roles. Variables such as age, education, income, health status, and insurance coverage were analyzed using chi-square and logistic regression tests, with statistical significance set at  $P < 0.05$ .

**Results:** The findings revealed that 48.5% of respondents used digital platforms for medication information. Significant predictors of platform usage included education, income, health status, and geographic location, all with  $P < 0.05$ . Notably, individuals with lower education levels, lower incomes, and chronic health conditions such as arthritis or respiratory issues were more likely to rely on digital platforms. Rural residents also exhibited higher engagement compared to their urban counterparts.

**Discussion:** The results highlight that digital platforms are particularly crucial for individuals with lower education levels and chronic health conditions. Conversely, individuals with higher education levels demonstrated less reliance, possibly favoring alternative sources. These findings underscore the importance of tailored digital health initiatives to improve accessibility and reliability for underserved populations.

**Conclusion:** This research identifies key factors influencing digital health engagement and provides a foundation for inclusive strategies to bridge healthcare disparities. Future research should focus on addressing barriers to digital access and exploring cultural and systemic influences to optimize the role of digital platforms in healthcare delivery.

## *College of Education & Community Innovation*

### ❖ **Robert Samuels III, Literacy Studies**

- **Project Title:** Engaging Home Literacy Environments: Building a Partnership Between School and Home

In Spring/Summer 2024, Robert was enrolled in EDR 693: the literacy master's project course. Being an advocate for his fourth-grade students and recognizing that too many students currently lack the necessary foundational literacy skills to fully engage in increasingly complex texts, he created a project featuring a home literacy initiative to increase parental engagement and develop better home literacy environments for kindergarten through fifth grade students at Fennville Elementary School. Robert's project specifically stood out because of the extensive resources he included in the appendices. Not only did he ground all his ideas in literacy research, but he contributed to the field with original work that can be implemented in elementary buildings with students and parents. Robert's dedication to the education of students is obvious, as well as his commitment to his own growth and learning.

*Robert's abstract appears on the next page.*

## **ABSTRACT**

The reading proficiency levels of fourth grade students in the United States has been stagnant or declining for nearly two decades, an issue only amplified by school closures during the pandemic. Struggling third graders, including those at Fennville Elementary School, are beginning fourth grade without a solid grasp of their foundational reading skills. These skills are necessary for accessing complex text in fourth grade and later. A lack of parental involvement and absence of an engaging home literacy environment has added to these reading deficits. This project analyzes educational theories and research to determine the importance of parent and family engagement in literacy development and effective components to increasing literacy engagement at home. A family literacy night was created based on the research, to coach parents and families on effective literacy strategies to implement at home and provide a useful resource to reference for additional ideas and strategies to engage their children in literacy education.

Keywords: engagement, family, involvement, literacy, parent.

## *College of Health Professions*

- ❖ **Meryn McClelland, Kaylee Bradeen, Mikaela Baker, Elise Cormany, Jillian Dornan, Occupational Therapy – Masters**
  - **Project Title:** Developing a Sensory-Informed Checklist for Individuals with Autism Spectrum Disorder in the Home Environment: A Pilot Study

Kaylee Bradeen, Meryn McClelland, Mikaela Baker, Elise Cormany, and Jillian Dornan completed a project titled "Developing a Sensory-Informed Checklist for the Home Environment: A Pilot Study." This project, part of their Master of Science in Occupational Science and Therapy program, not only met the program's research standards but also demonstrated a high level of commitment to continuing this work. They focused on inclusion, representation, and access in their checklist development. The students collaborated with their faculty advisor and committee members to submit poster presentations to the Michigan Autism Conference and the Michigan Occupational Therapy Association Conference (MiOTA) in 2024, both of which were accepted. Kaylee and Meryn presented at the MiOTA conference in October 2024. Feedback from occupational therapy practitioners, related professionals, and caregivers highlighted the need for this checklist in the community, benefiting not only autistic individuals but also a wider range of sensory needs across the lifespan. This group's work has made a valuable contribution that will guide future MASTERSOT research groups.

Meryn's  abstract appears on the next page.

## **ABSTRACT**

This study aimed to develop a sensory-informed checklist that can be used for the home. The checklist is important as it can help facilitate participation in occupations within the home environment for individuals with Autism Spectrum Disorder (ASD) and/or Sensory Processing Disorder who may be hyposensitive or hypersensitive to sensory stimuli. Interviews were conducted with occupational therapy practitioners (OTP) to collect professional feedback on the checklist. Feedback was analyzed and used to revise the sensory-informed checklist. This version of the checklist will be used in a second phase of research to validate the tool for home environment use.

❖ **Rachel Paddinge, Public Health**

**Project Title:** Characterization of Injury Occurrence due to Postural Orthostatic Tachycardia Syndrome (POTS)

Rachel's project, "Characterization of Injury Occurrence due to Postural Orthostatic Tachycardia Syndrome (POTS)," will be completed in December 2024. Collaborating with Dysautonomia International and two GVSU researchers, Rachel led the project, handling the idea, design, and implementation. Her work aims to better understand the needs of those with POTS. The study used an electronic survey to measure injury frequency and severity, symptoms causing injuries, and quality of life impacts. Results showed that 66% of participants reported at least one injury due to POTS symptoms in the past year. Higher symptom severity increased the odds of injury, and injured participants had slightly worse health-related quality of life scores. Further research is recommended to analyze POTS-related injury risks and develop prevention strategies. Rachel's dedication to this project highlights her commitment to addressing real-world healthcare challenges.

*Rachel's abstract appears on the next page.*

## ABSTRACT

**Background.** Postural orthostatic tachycardia syndrome (POTS) has symptoms that may impact injury risk. This project investigated the likelihood of injury associated with POTS symptoms. **Methods.** A cross-sectional study was conducted to characterize and quantify the occurrence of injury due to POTS symptoms. Data was collected via an electronic survey to measure the frequency and severity of injuries, the symptoms that may cause injury, and the effects on quality of life caused by injuries. **Results.** Most participants reported at least one injury due to POTS symptoms in the past year (n = 1099; 66.0%). A moderate positive Pearson correlation between COMPASS 31 score and injury frequency was found. Logistic regression testing showed that the odds of injury due to POTS symptoms increased by 1.07 times (95% CI [1.05, 1.08]) for each additional point in the COMPASS 31 score. Multinomial logistic regression indicated that the odds of having worse injury severity increased with increased symptom severity. T-tests showed that injured participants had slightly worse health-related quality of life scores on average than non-injured participants. **Discussion.** Further research should be done to further analyze how POTS may impact injury risk and understand how to prevent POTS-related injuries. Use of fall prevention strategies may be useful for individuals with POTS. **Conclusion.** Individuals with POTS appear to have a high risk of injury due to their symptoms. The most common injuries were bruising, abrasions, and inflammation. Health-related quality of life appeared to worsen for those who experienced injury due to POTS in the past year.

## *College of Liberal Arts & Sciences*

### ❖ **Matthew Gamelin, Communications**

- **Project Title:** Kneeling for the Anthem: YouTube's Parasocial Interaction with Colin Kaepernick

Matthew's final project exemplifies the best of what world-class communication scholars and professionals do: solve significant issues to enhance communication effectiveness and competencies. His research explores the Colin Kaepernick situation of 2016, using posted videos to examine parasocial interaction, which involves one-sided communication between media consumers and personalities. The study suggests that viewer reactions to these videos may have influenced the NFL's response to the protests in subsequent seasons and indicates that parasocial interaction could be expected in future player protests. This complex and sophisticated project is at the forefront of communication research. Matthew is a highly capable communication professional with the drive, determination, curiosity, and ambition to succeed in the field. His powerful study on protest and sports examines the link between social media, sports, and civic participation, reflecting his strong interest in communication issues related to sports and culture. This project is the culmination of focused coursework and personal interests in communication and professional sports. The research combines scholarly methods and professional skills to create a significant and impactful endeavor. Matthew's ability to integrate digital media tools and sports to examine the impact of civil discourse is particularly impressive. The proliferation of digital tools is increasingly important in both the sports world and political communication.

*Matthew's abstract appears on the next page.*



## ABSTRACT

35 YouTube videos were transcribed through Speechify AI video transcription software and Word Counter AI for relevant word frequencies to determine the presence and themes of parasocial interaction. First developed by Horton and Wohl, parasocial relationships develop as one-sided interpersonal communication between media consumers and personalities. Social media have progressed into a current form of mainstream media that dominates interpersonal communication and with the ability of celebrity figures to interact on these Internet platforms with their audiences becoming much easier, the room for parasocial interaction increases. 35 YouTube videos were selected using the search term “Colin Kaepernick kneeling reactors” and based on selection criteria. Results displayed themes of support and opposition through reactions of YouTube videos posted by different authors. Examples of dialogue from videos are included containing reoccurring words in transcriptions revealing subtopics of one’s right to free speech, the use of the national anthem, and Kaepernick’s use of football as a platform for protest, among others. Implications from this research include how parasocial interaction can be expected for future instances of player protest.

## *Padnos College of Engineering*

### ❖ **Zackary Rauch, Engineering**

- **Project Title:** A Portable Localized Bioimpedance Analyzer

Zach took full advantage of the resources at GVSU to research present designs, develop new technology, and complete a full updated design for a new product in collaboration with the exercise science department. Zach came up with a new electrical and mechanical design with minimal supervision and with few requirements. This design involved an embedded system with a new microcontroller interfaced with a state-of-the-art impedance driver which could have taken a whole team of engineers to design. Zach approached this project with enthusiasm and independence.

*Zachary's abstract appears on the next page.*

## ABSTRACT

This project report details the development of a Localized Bioimpedance Analyzer (LBIA) prototype designed to measure the bioimpedance of human soft tissue. The primary objective was to create a low-cost, portable device capable of providing accurate and precise impedance measurements for clinical and non-clinical environments. Current whole-body bioimpedance gold standards were investigated thoroughly to determine the most appropriate design that would meet the stakeholder requirements. The device utilizes the AD5933 integrated circuit for signal generation and measurement, ensuring simplicity and ease of modification. The design and implementation of each subcircuit were meticulously guided by existing research, circuit application notes, and electronic component datasheets. Key features of the LBIA device include its ability to output an alternating current signal, measure the resulting electrical signal in volts, calculate electrical resistance, reactance, and phase shift, and its compatibility with various power sources, including USB Type-C, battery power, and external power supplies for maximum flexibility of use. The prototype also supports both bipolar and tetrapolar impedance measurements, enhancing its versatility and functionality. Future enhancements for the LBIA device include integrating additional communication interfaces, such as Bluetooth modules or liquid crystal displays, to streamline data collection and analysis. A more in-depth implementation of the USB Type-C connector is also proposed to facilitate direct interfacing with personal computers, providing power and enabling microcontroller programming. In summary, the LBIA device prototype lays a robust foundation for a versatile and marketable product. With its current capabilities and potential for future improvements, it holds promise for making significant advancements in the field of bioimpedance measurement and soft tissue analysis after necessary field testing.

**GRADUATE SCHOOL CITATION FOR  
OUTSTANDING PUBLICATION  
Fall 2024**

*College of Education & Community Innovation*

❖ **Christopher Marco, Public Administration**

○ **Project Titles:**

“An Old Idea That’s New Again: The 15-Minute City” in *Governing*.

“How Copenhagen is Leading the World in Sustainability” in *The Urbanist*.

“Are Superblocks the Future of Urban Living?” in *Public Square: A CNU Journal*

While maintaining an overall 4.0 GPA, Christopher has published three significant magazine articles during his graduate studies in 2024. He has distinguished himself not only as an exemplary student but also as a prolific writer. These publications delve into innovative urban planning models that emphasize sustainability and livability. Christopher explores the 15-minute city concept, Copenhagen’s leadership in sustainable urbanism, and the potential of superblocks to prioritize pedestrians and reduce car dependency. Each article highlights progressive strategies for creating greener, more equitable urban environments. His work is thought-provoking, well-researched, and written with clarity, positioning him as a rising voice in the field of urban planning and sustainability. Christopher Marco’s outstanding scholarship and contributions to important conversations make him a most deserving candidate for the Graduate School Citation of the Outstanding Publication Award.

*Christopher’s abstracts appear on the next page.*

## ABSTRACT

### 1. “An Old Idea That’s New Again: The 15-Minute City” – *Governing*

In this article, Christopher Marco explores the concept of the **15-minute city**, a growing urban planning model that advocates for designing neighborhoods where residents can access most of their daily needs—such as work, school, shopping, and recreation—within a 15-minute walk or bike ride from their homes. He traces the historical origins of this idea, noting its roots in early 20th-century urbanism, and contrasts it with the car-dependent development models that have dominated since the mid-1900s. The article discusses how the COVID-19 pandemic accelerated interest in the 15-minute city, as cities began to reimagine public spaces and mobility in response to public health needs.

### 2. “How Copenhagen is Leading the World in Sustainability” – *The Urbanist*

In this article, Marco examines Copenhagen’s position as a global leader in sustainability. He highlights the Danish capital's ambitious climate goals, including its plan to become **carbon neutral by 2025**, and its commitment to integrating sustainable practices into every facet of urban life. The article discusses Copenhagen's investments in green infrastructure, such as cycling lanes, renewable energy, and climate-resilient urban spaces, as well as the city's innovative approach to public transportation. Marco also delves into Copenhagen's policies around waste management, green building practices, and the integration of nature into urban spaces, which collectively create a highly sustainable urban environment.

### 3. “Are Superblocks the Future of Urban Living?” – *Public Square: A CNU Journal*

Marco’s article explores the concept of **superblocks**, a progressive urban planning strategy designed to prioritize pedestrians and cyclists over automobiles. Originating in Barcelona, superblocks are defined by a grid of residential streets that are closed to most traffic, with limited car access only for residents and deliveries. The spaces within these superblocks are reclaimed for public use, featuring green areas, community spaces, and pedestrian walkways, promoting healthier, more livable environments. He also addresses the challenges of implementing this model in cities that are traditionally car-dependent, including political resistance, cost, and the need for public buy-in.

## *College of Liberal Arts & Sciences*

### ❖ **Janina Mayers, Biomedical Sciences**

- **Project Title:** “Insights into the biocompatibility of biodegradable metallic molybdenum for cardiovascular applications-a critical review”
- **Co-authors:** Brianna Hofman, Indie Sobiech and Maria P. Kwesiga<sup>1</sup>

Janina Mayer joined the MHS graduate program at GVSU in Fall 2023 as part of the HBCU consortium. In her graduate courses, she consistently demonstrates an excellent understanding of the material and applies her knowledge in critical thinking settings. Janina regularly contributes relevant information and asks insightful questions that enhance the overall quality of the courses. Her high-level questions during discussions reflect her deep understanding and eagerness to learn. Janina quickly integrated into a research lab for her thesis work, immersing herself in the literature. Her research focuses on a unique model system to study the biocompatibility of metals for potential cardiovascular disease treatments. She has successfully conducted numerous experiments and mentored undergraduate research students in her lab. Most notably, Janina authored a manuscript that was recently accepted and published in a peer-reviewed journal, making a significant contribution to her field. This publication is in a high-quality journal and is a remarkable achievement, especially as she is the first student in recent years to publish before completing their thesis and the only one to submit a manuscript before the end of the first year. Janina is expected to complete her degree in Winter 2025, and her accomplishments are truly worthy of recognition.

*Janina’s abstract appears on the next page.*

## ABSTRACT

Atherosclerotic cardiovascular disease (ACD) is the leading cause of death worldwide. The gold standard of treatment is the implantation of a permanent stent implant that is often associated with complications such as thrombus formation, vascular neointimal response, and stent fracture, which altogether decrease the long-term safety and efficacy of the stent. Biodegradable metallic materials have become an attractive alternative because of the ability to facilitate a more physiological healing response while the metal degrades. Recently, Molybdenum (Mo) has been considered as a potential candidate due to its excellent mechanical and medical imaging properties. Moreover, the biomedical research studies performed to date have shown minimal adverse effects in vitro and in vivo. However, there are still concerns of toxicity at high doses, and the impact of the biochemical mechanisms of Mo on material performance especially in pathophysiological environments are yet to be explored. Mo is an essential co factor for enzymes such as xanthine oxidoreductase (XOR) that plays a critical role in vascular homeostasis and ACD progression. Herein, this review will focus on the biochemistry of Mo, its physiological and pathological effects with an emphasis on cardiovascular disease as well as the recent studies on Mo for cardiovascular applications and its advantages over other biodegradable metals. The limitations of Mo research studies will also be discussed and concluded with an outlook to move this revolutionary metallic biomaterial from the bench to the bedside.

## *Padnos College of Engineering*

### ❖ **Co Nguyen, Engineering**

- **Project Title:** A study of metal-coated polymer lattices manufactured by electroplated stereolithography parts
- **Co-authors:** Abishek B. Kamaraj, and Bibek Kafle

Co Nguyen, a graduate student in Mechanical Engineering at Grand Valley State University, has made exemplary research contributions under her supervisor's guidance, making her an outstanding candidate for the Outstanding Publication Award. Throughout her thesis work, Co has demonstrated impressive independent research and critical thinking skills. Her research on the electrochemical enhancement of polymer lattices has significantly contributed to the field of advanced manufacturing. Notably, her work was selected for presentation at the 2024 SME North American Manufacturing Research Conference (NAMRC 52). As the lead author and presenting author, Co showcased her findings on the impact of lattice structure on compressive performance and strength-to-weight ratio in stereolithography. Her presentation at NAMRC highlighted her ability to effectively communicate complex technical concepts to a professional audience, reflecting the quality and relevance of her work. Additionally, Co has a second manuscript under review for publication in the journal *Advances in Polymer Technology*. This work explores the effect of electroplating nickel on polymer lattice structures, focusing on improvements in mechanical performance. As the primary author, Co has demonstrated her capability to contribute original research insights that bridge the gap between academic theory and practical application. Co Nguyen's publications are expected to substantially contribute to the academic community and serve as valuable additions to Grand Valley's scholarly endeavors. Her commitment to research excellence and effective communication skills makes her a deserving candidate for the Outstanding Publication Award.

*Co's abstract appears on the next page.*



## **ABSTRACT**

Electric fields are produced by voltage or electric charge. These types of fields are measured in volts per meter (V/m). The higher the voltage, the greater the electric field. To depict the uneven layer thicknesses that were witnessed after electroplating, different magnitudes of the electric field were extracted from different regions and assessed. The far left corner and center of the flat region from the solid tensile part were obtained, along with the far left corner, strut corner, and the middle of the strut locations were taken from the lattice tensile bar.

**GRADUATE SCHOOL CITATION FOR EXCELLENCE IN SERVICE  
TO THE COMMUNITY OR PROFESSION  
Fall 2024**

*College of Education & Community Innovation*

❖ **Morgan Hanks, Public Administration**

Morgan Hanks is the User Experience Manager at Kent District Library, where she continuously works to improve the experiences of library patrons. Her responsibilities include leading quarterly leadership training for all KDL managers. Recently, she presented at the mini conference. “Library 2035: Imagining the Next Generation of Libraries” on how libraries can lead in AI innovation and community engagement. Morgan is a Peter C. Cook Leadership Academy Fellow, demonstrating intellectual curiosity, leadership, and a desire to enhance library engagement. She has effectively applied her learning from the MPA program, particularly from the Strategic Management and Planning course (PNH-643) to her work. Morgan recently earned a certification in AI Strategy from Cornell University. Her career trajectory reflects her commitment to excellence, progressing from Library Assistant Supervisor to Circulation Manager, Regional Manager, and now User Experience Manager. Morgan embodies public service values and continually seeks to enhance her skills, leadership, and the library system’s service to the public.

## *College of Health Professions*

### ❖ **Kathryn Rabine, Physician Assistant Studies**

Katherine Rabine has demonstrated outstanding leadership since joining the PAS program Class of 2024 in August 2022. In her first semester, she was elected as the class representative to both the Michigan Academy of PAs and the American Academy of PAs. Katherine excelled in her role, effectively serving as a liaison between the program and these professional organizations, sharing important information with the student body and representing the program. Due to her exceptional performance, the Michigan Academy of Physician Associates amended their bylaws to allow a PA student to sit on the Board of Directors for the first time. Katherine was elected as the first student delegate on the board, showcasing her leadership and dedication. She has represented the program and profession with poise and professionalism, qualities that will benefit her future practice as a PA and the profession.

### ❖ **Summer Brogren, Speech Language Pathology**

Summer Brogren, as a graduate student in the Masters in Speech-Language Pathology program at GVSU, has distinguished herself by focusing on voice disorders and vocal health. With a background in vocal performance, she has passionately elevated public awareness on these issues throughout her studies. Her selection for a prestigious internship at the Mary Free Bed Rehabilitation Center for Voice exemplifies her expertise and dedication. During this internship, she excelled in her clinical responsibilities and took the initiative to educate and support community members affected by voice disorders. Summer's commitment to making a tangible impact in the field, combined with her leadership and advocacy, highlights her as an exemplary emerging professional. She is expected to continue making significant contributions to the community and the profession.

## *College of Liberal Arts & Sciences*

### ❖ **Mary R. Parr, Biology**

Mary Parr is in her second and final year of graduate school, completing her thesis on “Tallgrass prairie plant composition response to fire seasonality and order in southwest Michigan.” She will defend her thesis on November 19, 2024. Mary has an extensive record of service to the community and profession beyond the GVSU campus, making her an excellent candidate for the award. Mary is a woman in STEM, a tribal member of the Sault St. Marie band of the Chippewa, a wildland firefighter, an ecologist, a leader, and a mentor. In addition to being a full-time graduate student, she works full-time as the Stewardship Manager at Pierce Cedar Creek Institute. There, she leads monthly workdays focused on service-learning in natural resource management and collaborates with various local organizations. She also mentors’ undergraduate students and leads workshops on restoration and research efforts. Mary is highly involved in community and professional service outside of her job. She is a Steering Committee Member of the Barry, Calhoun, and Kalamazoo Cooperative Invasive Species Management Area (CISMA) and is active in the Michigan Prescribed Fire Council (MPFC).

### ❖ **Rheyne Bui, Communications**

Rheyne has demonstrated exceptional communication skills for the public good. Two years ago, she served as a Graduate Assistant (GA) for the School of Communications, where she excelled in social media, writing, and digital tools. Her ability to follow directions and apply advice quickly marked her as a promising professional in the field. After completing her coursework, Rheyne applied her skills in the nonprofit sector. She interned at Home Repair Services of Kent County, supporting vulnerable homeowners with essential repairs and upkeep, ensuring they were informed about financial and program resources. Her mission was to help people maintain their homes and avoid losing them due to financial difficulties. Rheyne then took a position at Arbor Circle in Grand Rapids, which provides health and behavioral services for various age groups. She used her digital and writing skills to spread messages of hope and support for those in need of counseling.

## *Padnos College of Engineering*

### ❖ **Gregory Janes, Engineering**

Gregory is an exceptional graduate student with extensive industrial experience and a remarkable commitment to both his community and his profession. As a Graduate Assistant (GA) for the School of Engineering's machine shop, he has provided invaluable support to countless students by assisting them in machining and manufacturing critical components for their projects. Beyond direct assistance, Greg has played a key role in training numerous international students, equipping them with the necessary skills to serve as GAs themselves. Greg's research contributions have made a significant impact in both the community and the industry. His work spans multiple innovative areas, including improving root canal procedures through computational fluid dynamics, enhancing safety systems for prominent automotive companies such as General Motors, Toyota, and Ford, and leading a team of senior engineering students in a confidential optimization project for a major industrial leader. In the field of sustainable energy, Greg has contributed to the development of advanced wind turbine blade designs, aimed at increasing energy efficiency and sustainability.

**GRADUATE SCHOOL CITATION FOR  
EXCELLENCE IN LEADERSHIP AND SERVICE TO GVSU  
Fall 2024**

*College of Education & Community Innovation*

❖ **Adam Prielipp, Public Administration**

Adam has worked to connect GVSU students with valuable development opportunities, including the Gerald R. Ford Leadership Forum. As a founding member and president, he has brought together students, faculty, young professionals, and community leaders for meaningful discussions and leadership development. As a graduate assistant in the Hospitality and Tourism Management program, he advanced the work of Michigan Cares for Tourism, a non-profit focusing on volunteer experiences across Michigan. Adam has served on the executive boards of several student organizations, including the Collegiate Entrepreneurs' Organization, the ICMA graduate chapter, and Lakers Feed Families. He is also a valued member of the MPA program advisory board. His leadership and service make him a natural ambassador for the MPA program, embodying the core values of public service that GVSU strives to instill. Adam's positivity, dedication, and commitment to service make him a standout leader, creating opportunities for meaningful dialogue and leadership development.

*College of Health Professions*

❖ **Abby Dunster, Speech Language Pathology**

Abby has stood out as a leader amongst her fellow students during both her undergraduate and graduate programs at GVSU. Abby served as President for GVSU's chapter of the National Student Speech Language Hearing Association (NSSLHA) 2022-2023 and was active in encouraging member participation and planning events. Since then, she has continued to serve her fellow students by organizing informal events, such as decorating spirit wear. She also demonstrates leadership skills by advocating for other students who may feel less comfortable doing so, encouraging and welcoming incoming students, and acknowledging and "cheering on" the work of others. Related

to service to the community, she has also represented GVSU by sharing her research at conferences.

❖ **Brendan Garfield, Physician Assistant Studies**

Brendan Garfield emerged as an exemplary leader within the Physician Assistant Studies program. He was committed to fostering community and collaboration among his peers. As the President of the Richard Paul Clodfelder Student Society, he played a pivotal role in engaging all program members, creating an inclusive atmosphere where every student felt valued and heard. Brendan's exceptional communication skills were a hallmark of his leadership. He consistently ensured that both students and faculty were well-informed about upcoming events and activities. Brendan also took the initiative to ensure the technological connection between the Grand Rapids and Traverse City campuses was intact, facilitating a smooth flow of information and resources for classes and meetings. His efforts significantly improved the learning experience for students across both locations. Brendan's positive attitude and unwavering dedication were evident in all his endeavors. He approached every task enthusiastically and professionally, managing additional responsibilities with remarkable ease. With his strong leadership skills, Brendan will become a powerful advocate for both his patients and the PA community.

❖ **Rachael Vance, Occupational Therapy – Masters**

Rachael excels both in the classroom and in her previous role as a Graduate Assistant, and she is a leader within the traditional cohort. She currently holds a 3.97 GPA, served as a Graduate Assistant for the program in AY 2023-24, and has worked as a research assistant throughout 2024. Rachael has volunteered her time for departmental recruitment events and is always professional and positive in her interactions with faculty and other students. In class, she is consistently prepared, engaged, and embodies the spirit of hard work, persistence, and striving for excellence. Her respect for others and professional behavior are notable. Beyond the classroom, Rachael has displayed excellence in leadership. As a Graduate Assistant within the Occupational Science and Therapy Department, she was responsive to requests, delivering high-quality work. She expanded her role by speaking to Grand Valley undergraduate students to promote the OT program. As a

Research Assistant, she demonstrated her skills as a high-caliber student, taking the lead on aspects of the project. Despite her busy schedule, she also participated in student-organized service opportunities.

### *Padnos College of Engineering*

#### ❖ **David Pevic, Engineering**

David's leadership journey is highlighted by his founding of the GVSU Casting Club, which has significantly impacted both the college and its students. Under his leadership, the club excelled in two consecutive Cast in Steel competitions, earning accolades for the university. His efforts have fostered a sense of community and enthusiasm within the club. In addition to his work with the Casting Club, David has been a remarkable mentor to undergraduate students. As a teaching assistant for the EGR 185 First Year Design course, he provided invaluable guidance on robotic projects, actively supporting students through complex technical challenges. His enthusiasm and approachable demeanor made him an excellent mentor, enhancing the learning experience for first-year students. David's leadership qualities are matched by his strong academic record. He has consistently demonstrated a deep understanding of mechanical engineering concepts and a commitment to academic excellence. His well-rounded accomplishments combine leadership, service, and academic prowess.



**GRADUATE SCHOOL CITATION FOR EXCELLENCE IN  
PROMOTING DIVERSITY AND INCLUSION AT GVSU  
Fall 2024**

*College of Health Professions*

❖ **Capriana Calvachi, Physician Assistant Studies**

Throughout Capriana's time at Grand Valley State University, they have actively promoted inclusion and diversity. As the Traverse City Chair of the Justice Equity Diversity and Inclusion (JEDI) team of the RPC Student Society, they focused on increasing education and understanding of healthcare challenges in rural and underserved communities. Their commitment to inclusion began during their undergraduate studies, where they participated in research to improve healthcare access for marginalized communities and worked on projects to protect the traditional herbal medicines of the Maasai tribe in Kenya. They are also passionate about enhancing healthcare quality for LGBT patients and have encouraged peers to engage in webinars and discussions on LGBT inclusivity. Through these efforts, they aim to foster a more inclusive and understanding environment within the university and the broader healthcare field.

**GRADUATE SCHOOL CITATION FOR  
EXCELLENCE IN SUSTAINABILITY  
Fall 2024**

*College of Education & Community Innovation*

❖ **Sarah Laman, Public Administration**

Sarah has demonstrated a strong commitment to environmental sustainability and social justice throughout her academic and professional career. In the MPA program, she focused on creating equitable communities with an emphasis on environmental issues. As the director of marketing and development at Comprenew, she addressed digital inequity and promoted responsible electronics recycling. Sarah also co-founded the Last Mile Café, a Michigan-based B-Corp coffee roastery prioritizing social impact. As Chief Impact and Sustainability Officer, she directed charitable efforts supporting youth-at-risk, environmental justice, criminal justice reform, and clean drinking water. Sarah's passion, vision, and leadership make her an exemplary candidate for this award, inspiring positive change in her community and profession.

## *College of Health Professions*

### ❖ **Joslyn Mixon, Speech Language Pathology**

As a graduate student in the Masters in Speech-Language Pathology program, Joslyn has shown unwavering commitment to sustainability in environmental, economic, and social domains. Environmentally, Joslyn reminds everyone to recycle, use sustainable products, and promote eco-friendly practices among peers and faculty. Economically, Joslyn initiated conversations with faculty and peers about equity, marginalized populations, and how speech-language pathologists can maximize impact while minimizing costs for underserved communities. Socially, Joslyn championed inclusive programming and cultural awareness to create a supportive environment for diverse voices in speech-language pathology. Their advocacy has strengthened a sense of belonging and enriched the community. Joslyn's leadership and dedication to sustainability extend well beyond the classroom and clinical work, making them a role model for peers and a true agent of positive change.

## *College of Liberal Arts & Sciences*

### ❖ **Eamonn Powers, Biology**

Eamonn has developed a research project focused on the detection and quantification of migrating Lake Sturgeon, a species listed as "threatened" by the State of Michigan. His project compares different types of sonar technologies to detect fish, which is particularly useful in the cloudy waters of the Grand River where visual detection of adult migrating sturgeon is nearly impossible. Alternative methods of collection, such as gill nets, can cause harm and result in fish mortality. The status of Lake Sturgeon in the Grand River remains uncertain, with unknowns about the number of adults returning to spawn in the spring, the survival of offspring, and the genetic structure of the population. Answers to these questions are crucial for the best management of this endangered species, which holds cultural significance for Indigenous people in the Great Lakes region. Eamonn has not only been involved in research efforts to better understand this population but has also dedicated significant time to sharing his research with the public through presentations and workshops.

**JENNIFER ROSE PALM MEMORIAL AWARD FOR EXCELLENCE  
IN SERVICE TO GRADUATE EDUCATION  
Fall 2024**

❖ **Tracey James-Heer, Admissions and Recruitment**

**Nominated by:** Angelina Quezada-Reynolds, Admissions & Recruitment

Tracey James-Heer is a dedicated and compassionate professional who has significantly impacted graduate education at Grand Valley State University. Her leadership in initiatives like the Graduate Learners Transformation Team and the HBCU/HSI Consortium has enhanced resources and created pathways for students from diverse backgrounds. Known for her exceptional support to students, faculty, and staff, Tracey cultivates a positive and collaborative environment. Her mentorship and unwavering commitment to student success have made her a cornerstone of the admissions team. Tracey's ability to balance professional duties with personal commitments further highlights her dedication and work ethic. She consistently goes above and beyond in her role, ensuring that each graduate student receives the guidance and support they need to succeed. Her warm and friendly demeanor, combined with her innovative approach to recruitment and retention, has made a lasting impact on the university community. Tracey's contributions to graduate education are unmatched, and her dedication to creating an inclusive and supportive environment is evident in all she does. Tracey's work ethic is remarkable, and she approaches every task with diligence and attention to detail. Her ability to inspire a positive and encouraging atmosphere has been instrumental in helping students navigate the challenges of their programs. She has been a wonderful mentor, guiding colleagues and students alike through new experiences and pushing them to believe in their capabilities. Her leadership extends beyond her professional duties, as she balances her career with being a supportive wife and mother, showing her commitment to both her family and her work. In her 26 years in Admissions and Recruitment, Tracey has shown an unwavering commitment to Grand Valley and its mission and values. Her proactive approach to improving recruitment efforts and enhancing Graduate Admissions services has streamlined processes and made students' lives easier.

**GRADUATE STUDENT ASSOCIATION  
OUTSTANDING TEACHING AWARD  
Fall 2024**

*College of Health Professions*

❖ **Randalynn Hajek, Clinical Dietetics**

**Nominated by:** Elizabeth Kalafut, Master of Science in Clinical Dietetics

Elizabeth writes, "Professor Hajek's dedication, innovative teaching, and compassionate mentorship have profoundly influenced my academic and professional journey in the Clinical Dietetics Master's program. She has a remarkable ability to engage students in both academic and practical experiences while fostering a supportive and inclusive learning environment that encourages personal and professional growth. In *CD 516: Food and Culinary Science*, Professor Hajek inspired creativity and critical thinking. Her talent for turning scientific concepts into real-world applications made every lesson engaging and directly relevant to our future careers. Her hands-on laboratory sessions allowed us to formulate high-calorie, high-protein supplements for ketogenic populations, modify protein content for patients with metabolic disorders such as phenylketonuria (PKU), adjust dietary fats for therapeutic purposes, and prepare texture-modified foods for dysphagia patients. Additionally, tours of Ada Valley Meats and the United Dairy Industry provided us with valuable insights into the diverse roles dietitians play in corporate settings. Professor Hajek's mentorship extended far beyond the classroom. She encouraged us to attend the Food & Nutrition Conference & Expo (FNCE) and even organized a networking dinner for students and alumni, giving us meaningful opportunities to connect with professionals in the field. Her support during challenging times was particularly impactful.

**GRADUATE STUDENT ASSOCIATION  
OUTSTANDING MENTORING AWARD  
Fall 2024**

*College of Liberal Arts and Social Science*

❖ **Todd Aschenbach, Department of Biology**

**Nominated by:** Mary R Parr, Master of Science in Biology

Mary writes, "Dr. Todd Aschenbach has been an unwavering source of encouragement and mentorship for countless students during his time at GVSU, but especially for me over the past decade. I could write a short novel about the many times Todd has supported me, but I will keep it brief for this nomination letter. For me and many other students, Todd has been a profound source of support and inspiration, enabling us to achieve success in academics and our early professional careers. Unlike other professors, Todd frequently invites local professionals from his network to speak with students during class. Additionally, his field labs take students to local conservation organizations, where we perform ecological restoration projects that provide critical hands-on experience and develop essential skill sets for entry-level positions. I will always be thankful for Todd's influence during my undergraduate education and early career. He encouraged me to follow my interests and explore opportunities in other states, which allowed me to establish a career in ecological restoration and fire ecology. Early on, Todd was instrumental as a reference and provided letters of recommendation that helped me secure life-changing positions, such as my first job with The Nature Conservancy Minnesota Chapter and a highly competitive grassland fellowship with The Nature Conservancy Nebraska Chapter. When Todd posted a graduate position, I was intrigued but hesitant, as I was working full-time as the Stewardship Manager for Pierce Cedar Creek Institute, managing 850 acres, a fire program, and conservation projects. Todd encouraged me to apply, and over the past two years, he has been incredibly flexible and supportive, accommodating my schedule as a non-traditional student working 30+ hours a week while enrolled as a full-time graduate student."

**GRADUATE STUDENT ASSOCIATION  
KIMBOKO INCLUSION AWARD  
Fall 2024**

*Seidman College of Business*

❖ **Jonathan Brignall, Department of Accounting**

**Nominated by:** Aseel Ayes, Master of Science in Accounting

Aseel writes, "For many years, Jonathan, a graduate professor at Seidman, has led a group of students in the Volunteer Income Tax Assistance (VITA) on-campus program, dedicating every Saturday during the busy tax season to preparing income tax returns for underserved community members. His clients include homeless individuals, retirees, college students, hardworking people juggling multiple jobs, and those who speak little to no English. Jonathan's unwavering commitment to these diverse populations reflects his deep dedication to serving those in need and inspires me every day to do the most I can for the people in my community. As someone from a diverse background, I can personally attest to the profound impact Jonathan has had on students like me. He actively recruits mentors and students from various backgrounds, creating an inclusive environment where we feel supported and empowered throughout our academic journeys. His dedication to uplifting underrepresented groups resonates deeply, as he devotes his personal time to serve and advocating for them."

## GRADUATE STUDENT PRESIDENTIAL RESEARCH GRANT RECIPIENTS

### Spring/Summer 2024

Anderson, Katelyn. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Impacts of homemade pumpkin fertilizer on soil health and Escherichia coli (E. coli) concentrations on a West Michigan farm*

Mikaela Baker, Kaylee Bradeen, Elise Cormany, Jillian Dornan, Meryn McClelland. College of Health Professions, Occupational Science & Therapy.

Title: *Validating a Sensory-informed Checklist for the Home*

Clare Belkowski, Cortney Day, Hannah Hall, Janel Ritt, Holly Treber. College of Health Professions, Occupational Science & Therapy.

Title: *Occupational Performance Issues for Students Following a Concussion*

Dennis, Kaylynn. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Sink or Source? Quantifying ecosystem metabolism and its role in the carbon cycle in a Great Lakes Estuary*

Doorn, Taylor. College of Liberal Arts & Sciences, Biology.

Title: *Using NDVI to Predict Plant Composition in the Arctic*

Keely Fitch, Kylee Marcussen, Jessica Pekrul. College of Health Professions, Physical Therapy.

Title: *Patient Perceptions of the Physical Therapy Experience in a Pro Bono Setting*

Greene, Jillian. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Using remote sensing to quantify methane emissions from Michigan's Estuaries*

Hiers, Seth. College of Liberal Arts & Sciences, Biology.

Title: *Determining Origin of an Isolated Great Lakes Plant Species, Agoseris Glauca*

Arika Lancot, Audrey Maynard, Emily Benke, Kimberly Meany, Samuel Szarowicz. College of Health Professions, Occupational Science & Therapy.



Title: *The State of School-Based OT Practice Regarding Concussion-Related Vision Disorders*

Tardani, Renee. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Cyanobacterial Community Responses to Treatment Interventions and Species Composition Dynamics Along Inland Public Beaches in Muskegon County*

Tisdale, James. College of Liberal Arts & Sciences, Biology.

Title: *Application of LiDAR for fine scale analysis of American marten foraging habitat*

Trapp, Michael. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Investigating age-0 trout survival on the north branch of Michigan's Au Sable River*

Vander Stelt, Victoria. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Investigating Trout Stressors in the AuSable River*

## **Fall 2024**

Kelley, Jaylyn. College of Liberal Arts & Sciences, Biomedical Sciences.

Title: *Storage Optimization for Kidney Transplant*

Olszewski, Mitchell. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Freshwater fish as a bioindicator for Escherichia coli (E. coli) in contaminated river systems in Michigan*

Smith, Alyssa. College of Liberal Arts & Sciences, Biology – Aquatic Sciences.

Title: *Investigating Great Lakes Coastal Wetland Food Web Dynamics using a Novel Stable Isotope Tracer Approach*

Wiler-Beltman, Maisie. College of Liberal Arts & Sciences, Biology.

Title: *Lady's slipper orchids and fire: examining occurrence, mycorrhizal associations, and the influence of fire in *Cypripedium* spp*

## **GRADUATE STUDENT ASSOCIATION OFFICERS**

**President:** Lauren King, Higher Education

**Vice President:** Silvester Mbugua, Cybersecurity

**Finance Officer:** Albert Okwei, Public Administration

**Communications Officer:** Mae Zurita, Higher Education

### **Advisors:**

Dr. Matthew Christians, Cell and Molecular Biology

Dr. Sarah Nechuta, Public Health

Dr. Tonisha Jones, Criminal Justice

## **GRADUATE COUNCIL OFFICERS**

### **Chair:**

Dr. Amy Campbell, Psychology

### **Vice-Chair:**

Dr. Lara Kessler, Accounting

### **Policy Subcommittee Chair:**

Dr. Amy Campbell, Psychology

### **Curriculum and Program Review Subcommittee Chair:**

Dr. Mark Staves, Cell and Molecular Biology



Erica Hamilton, Ph.D., Interim Vice Provost for the Graduate School

Jennifer A. Moore, Ph.D., Interim Assistant Vice Provost

Trista Shumway, Assistant Director of Programming and Communication

Sheri DeVries, Administrative Assistant to the Vice Provost for the Graduate School

**Graduate Assistants:**

Skye Gerald, Applied Computer Science

Aruna Karkee, Philanthropy and Nonprofit Leadership

Samsriti Satyal, Applied Computer Science

**Student Assistant:**

Katelyn Keech, Health Communications (undergraduate)

**The Graduate School**

401 W. Fulton St

318C DeVos Center

Grand Rapids, MI 49504

Phone: 616-331-7105

Email: [gradschool@gvsu.edu](mailto:gradschool@gvsu.edu)

Website: <https://www.gvsu.edu/gs/>