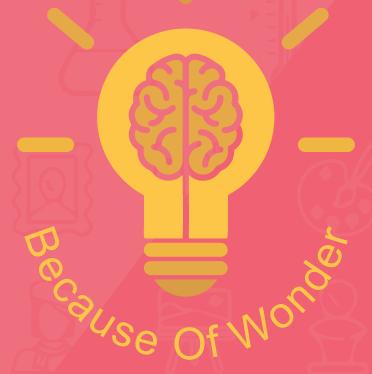
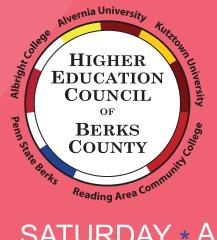
24TH ANNUAL BERKS COUNTY UNDERGRADUATE

RESEARCH & CREATIVITY

CONFERENCE







SATURDAY * APRIL 22, 2023 KUTZTOWN UNIVERSITY





April 22, 2023

Dear Students, Faculty, and Guests,

Welcome to Kutztown University and the 24th Annual Berks County Undergraduate Research and Creativity Conference. KU is very pleased to host this year's event, which is presented by the Higher Education Council of Berks County comprised by Albright College, Alvernia University, Drexel University, Kutztown University, Penn State Berks and Reading Area Community College.

Today, more than 200 undergraduates will showcase their hard work through academic paper presentations, poster displays, and visual exhibits. It is exciting to be a part of what the best and brightest higher education students in Berks County have to offer.

Our organizing committee has a special day planned for you, and I hope you will make the most of it. The keynote address will be presented by KU alumnus Reverend Matthew J. Kuna. Kuna's presentation, 'Because of Wonder: Our (underrated) Premise and Task', will be sure to inform and motivate. I am confident you will find him to be an inspiration.

Also, be sure to support all of the presenters throughout the day and open your mind to new horizons. If you get a chance after the conference, take time to explore our campus --- recognized nationally for its award-winning landscape. You may also want to visit the charming borough of Kutztown, with its many shops and dining options.

Finally, I want to congratulate all student participants in today's event. A chance to present your academic talents in front of your peers is something of which you should all be very proud. I commend you all.

Best wishes in your continued pursuit of academic excellence.

Sincerely,

Kenneth S. Hawkinson, Ph.D.

President

Kutztown University of Pennsylvania

Beginning at 8 am: Check-in at McFarland Student Union

8:00-10:00 am: Morning Refreshment, MSU 223

12:00-2:00 pm: Lunch, MSU 223

	MSU 325	MSU 183	MSU 323	MSU 324	MSU 322	MSU 116	MSU 218
8:45				Papers: Natural/ Physical Science I p. 3		Papers: Education I p. 3	
9:00	Papers: Art, Visual & Creative I p. 4	Papers: Math/ Engineering p. 4	Papers: Social Science I p. 5		Papers: Health Science I p. 5		Posters/ Artwork p. 15-24
10:00	Papers: CSIT p. 6	Papers: Education II p. 6	Papers: Social Science II p. 7	Papers: Humanities I p. 7	Papers: Business p. 8	Papers: Humanities II p. 8	

11:00 am MSU 183

Welcome Address: Provost Lorin Basdin Arnold Keynote Address: KU Alumnus Rev. Matthew Kuna

	MSU 325	MSU 183	MSU 323	MSU 324	MSU 322	MSU 116	MSU 218
12:00	Papers: Social Science V Until 1:30 p. 9 Papers: Art, Visual & Creative II p. 13		Papers: Social Sciences III p. 9	Papers: Humanities III p. 10	Papers: Health Science II p. 10		Posters/ Artwork Until 1:30 p. 24-35
12:30		Performances p. 34					
1:00		Performances Until 2:30 p. 34	Papers: Social Science IV p. 12	Papers: Humanities IV Until 2:30 p. 11	Papers: Natural Physical Science II p. 12	Short Films p. 36	
1:30							
2:00			Papers: Humanities V Until 3:15 p. 13		Papers: Humanities VI p. 14		
2:30							

Notes:

Student Presenters: Please remain in your session for the entire time slot and plan to attend the Welcome & Keynote Address.

The 2023 HECBC Keynote Speaker

one's immediate grasp does not belong merely to the philosopher who searches or the child who develops, plays, and discovers. Authentic wonder invites each of us to discover new interests, ask searching and good questions, and begin to pierce the depths of what we do not know—whether as researchers, practitioners, students, or simple inquirers. Together, we will unpack the meaning and value of this essential (though often underrated) intellectual virtue and chart a path for how to better cultivate it."



Rev. Matthew J. Kuna

Reverend Matthew J. Kuna is a priest of the Roman Catholic Diocese of Allentown and a proud graduate of Kutztown University. He received a Bachelor of Science in Education from Kutztown, concentrating in Spanish and English as a Second Language (2016). During his undergraduate studies, he was a member of the University Honors Program and participated in various undergraduate research initiatives and conferences. After KU, he began studies in the priestly formation program at Saint Charles Borromeo Seminary in Philadelphia, where he received a Master of Divinity (2021) and a Master of Arts in Systematic Theology (2022). In 2021, he was selected as part of the inaugural cohort of the Church Communications Ecology Program at the University of Notre Dame's McGrath Institute for Church Life. This research opportunity allowed him to study digital culture and ecclesial communications, and to present his findings at the university. On June 4, 2022, Father Kuna was ordained to the Priesthood at the Cathedral of Saint Catharine of Siena in Allentown. Currently, he serves as Parochial Vicar of Saint Catharine of Siena Parish in Reading and as Chaplain of Berks Catholic High School.

Panel Presentations 8:45-9:50 am

Natural and Physical Sciences I

Location: MSU Room 324

Moderator: Diane Conrad, Reading Area Community College

Shannon Keller, Kutztown University

Faculty Mentor: Andrew Mashintonio

Effects of Human Presence on Mammal Occupancy at Hawk Mountain Sanctuary, Pennsylvania

This research examined spatial patterns of mammals in a forest ecosystem in the presence of human disturbance.

Camera trap data were used to model occupancy and detection probability at varying distances from trails and roads to determine spatial responses to human presence.

Grace Wanner, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

The Magic of Mushrooms: The Psychological Effects and Potential Health Benefits

Psilocybin Mushrooms, also known as "Magic Mushrooms," have a rich history of medicinal and religious purposes.

Today, mushrooms have gained the reputation of a street drug, but recent studies have shown that the fungi can produce positive mental health benefits.

Abby Wheeler, Kutztown University

Faculty Mentor: Michael Davis

Urban Change and Development: How Energy Consumption is Changing in the Lehigh Valley, PA

The Lehigh Valley is one of the fastest growing regions in the US today. This study examines trends in energy generation and consumption across this area and how it is changing over time.

Monica Badea, Kutztown University

Faculty Mentor: Cristen Rosch

Comparison of the effects of ibuprofen and the natural pain reliever turmeric on the embryonic development of the common chicken, Gallus gallus domesticus

This experiment is designed to compare the effects of ibuprofen and turmeric on embryonic development. We propose that the natural remedy turmeric will be less teratogenic than the over-the -counter NSAID, ibuprofen, and therefore a safer choice for pain relief during pregnancy.

8:45-9:50 am

Education I

Location: MSU Room 116
Moderator: Meg Norris, Kutztown University

Marykate Geppert, Kutztown University

Faculty Mentor: Christopher Bloh

Behavior Intervention Plan - Student Participation

Students may avoid publicly raising their hand to answer a question. An antecedent intervention of vocal prompting when a question was implemented concurrently with the use of positive reinforcement (praise, stickers) if the target behavior occurred.

Victoria Meier, Kutztown University

Faculty Mentor: Christopher Bloh

Behavior Intervention Plan For a Student

I have created and implemented a behavior intervention plan for a student in my professional semester placement. My presentation is about what I did to implement the plan and the results.

(Education I continued)

Hugo Mendez, Reading Area Community College

Faculty Mentor: Bahar Diken

Science Literacy: Climate Change, Technology, and Uncertainty Among the Public

This project addresses the importance of science literacy among the public and brings awareness to climate change,

our technology, and uncertainty within science.

Lauren Weiss, Kutztown University

Faculty Mentor: Andrew Miness

What Textbooks Don't Teach: Restorative Social Studies Curriculum

A fully developed unit plan that emphasizes the untold stories of American History. Designed to highlight issues related to marginalized groups, the curriculum of this unit explores important facets of American History from a restorative lens.

9:00-9:50 am

Art, Visual & Creative I

Location: MSU Room 325

Moderator: Lynn M. Kutch, Kutztown University

Cortney Phillips, Kutztown University

Faculty Mentor: Lynn M. Kutch

Co-presenters: Kahlisha Martin, Kia Vang

Original Graphic Novels

For our project, we created our own short graphic novels. We will use these graphic novels to showcase our creative abilities and to demonstrate how the art of comics and elements of comics theory can be used to tell different stories.

9:00-9:50 am

Math and Engineering

Location: MSU Room 183

Moderator: Rungun Nathan, Penn State Berks

Trevor Wylezik, Kutztown University

Co-presenters: Ashhad Hanafi, Kelsey DeAcosta

Consecutive Integer Matrices

We study square matrices of consecutive integers. We have discovered the general form of the characteristic polynomial for all sizes n and starting values k, and other properties.

Hailey Goodwin, Kutztown University

Faculty Mentor: Lyn McQuaid

Faculty Mentor: Jonah Smith

Magic Squares

Magic squares are grids filled with distinct numbers in which every row, column, and diagonal of the grid sum to the same number. This research includes a description of this sum, a pattern that will always create a magic square, interesting famous examples, and the history of magic squares.

Austin Witinski, Penn State Berks

Faculty Mentor: Eric Lindsey

Soft Robotics

This research informs about the expanding subfield of robotics, soft robotics. This is intended to explain what differentiates soft robotics from traditional hard robotics and elaborate on its potential applications.

9:00-9:50 am

Social Sciences I

Location: MSU Room 323
Moderator: Dale Parson, Kutztown University

Mahwish Ahmed, Penn State Berks

Faculty Mentor: Randall Newnham

Women's Rights in the USSR and Modern-Day Russia

This research project discusses the status and rights of women in the USSR and modern-day Russia, showing how women always depended on the state's economic and political needs. Through my research, I concluded that the role of women in the USSR was contradictory, and that equality was likely an unachievable reality due to perceptions of innate gender differences and the expectation that women should work, while also being responsible for domestic duties.

Alexis Clement, Kutztown University

Faculty Mentor: Meghan Owenz

Preschooler Gender Differences in Self Control and Delayed Gratification

Summary: This study investigates preschool children's skills in self control and delayed gratification by waiting for a larger amount of a snack sitting in front of them. If they could use their skills and wait until the researcher came back, they'd get more than was first given to them.

Michael Thomas, Albright College

Faculty Mentor: Bridget Hearon

Harmful or Helpful? The Effects of Trigger Warnings on Distress Management

Summary: This research concerns the effectiveness of trigger warnings on the management of distress. We tested whether an enhanced trigger warning would help distress and emotional management better than a standard trigger warning as well as no warning.

9:00-9:50 am

Health Sciences I

Location: MSU Room 322
Moderator: Ashley Gray, Alvernia University

Gianna Ellis, Immaculata University

Faculty Mentor: Laurie DiRosa

Co-presenter: Dylan Walter

Using Wearable Technology to Objectively Measure the Effectiveness of Physical Activity Interventions Among Individuals With Intellectual and Developmental Disabilities

The purpose of this study is to objectively examine the effect of physical activity interventions among a population of adults living with intellectual and developmental disabilities (IDD) using wearable technology, which allows researchers to measure the effect our program GetFIT@IU has on stress, sleep, and HRV.

Robert Fife, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

The Daily Chronic: The Impact of Diabetes on Health and Lifestyle Management

Diabetes is a common endocrine disease characterized by high blood sugar levels with insufficient levels of insulin. Diabetes left untreated results in health complications which result in 1.5 million deaths in any given year. This study regards solutions that patients can undertake to control blood sugar and improve overall health.

Hayden Perrone, Penn State Berks

Faculty Mentor: Maureen Dunbar

Examining the Effect of Alcohol on the Migration of Breast Cancer Cells

In this paper, we will discuss research on the effect of alcohol on the movement of breast cancer cells.

10:00-10:50 am

Computer Science & Information Technology

Location: MSU Room 325
Moderator: Rungun Nathan, Penn State Berks

Colin Payne, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

Overcoming Bias and Fake News in Communications

To be an informed citizen, it is important to learn how to spot fake or biased news. Here, I apply a useful strategy (E.S.C.A.P.E.) to news articles about the Ukraine-Russia War to demonstrate how to detect fake or biased news.

Alina Rodriguez, Penn State Berks

Faculty Mentor: Abdullah Konak

Building a Drought Resilience Decision Support System Based on Expert Opinion

My research project involves translating results from an expert survey of drought resilience indicators into interactive visuals which will be displayed on a webpage. The idea is to allow policymakers to better assess their country's resiliency, and thus aid in their decision making.

Kimberly Nicholas, Penn State Berks

Faculty Mentor: Cheryl Nicholas

Real Problems in Fake Worlds - Exploring Toxic Masculinity in Video Games

This research uses a communication lens and grounded approach to study toxic masculinity in first-person shooter video games.

10:00-10:50 am

Education II

Location: MSU Room 183
Moderator: Andrew Vogel, Kutztown University

Maria Bustamante, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

Surrealism in Buster Keaton's films

This paper highlights the importance of Buster Keaton to the silent film industry and his legacy with regard to surrealism in his films.

Sophia Glover, Reading Area Community College

Faculty Mentor: Jodie Greene

Racial Injustice in Education: How the Price of Your House Determines Your Future

My paper analyzes racial inequalities in district education caused by real estate prices. I specifically address Reading and Wyomissing school districts.

Emma Smith, Kutztown University

Behind the Lens: Women in Film | Animated Promotional Video

This animated short film acts as a promotional video for a fictional film festival that celebrates women in the film industry. Through visual research and development of skills using Adobe After Effects, viewers are entertained, educated, and encouraged to attend the festival. It has been recognized with a Best in Show and Gold ADDY Award from the American Advertising Federation of the Greater Lehigh Valley in the category of Special Effects and Animation.

10:00-10:50 am

Social Sciences II

Location: MSU Room 323
Moderator: MeeAe Oh-Ranck, Albright College

Maurice Brown, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

America's Pursuit of Diversity: Might the Costs of Affirmative Action Outweigh its Benefits?

The Supreme Court has set its sights on the practice of affirmative action and is expected to deliver a verdict on the matter this upcoming summer. Diversifying America's education and workforce has proven difficult, and affirmative action's attempt at this reflects that its practice has both benefits and drawbacks.

Marrisa Moore, Kutztown University

Faculty Mentor: Andrew Vogel

WUSYANAME: An Examination of the Effects of Names on Implicit Biases and Stereotyping

This study examines the effects of names playing a role in the implicit biases of individuals on job candidates. Participants were given one of two fabricated resumes for either a Caucasian or African American applicant and then asked to rate them on various traits, hireability, and expected job performance outcomes.

Emily Olafson, Kutztown University

Faculty Mentor: Andrew Vogel

After Stonewall: Intersectionality

This is a look into how who or who was not present at Stonewall influenced the early years of the Gay Rights Movement. This investigation was researched through contemporary writings - newspapers and writings from first hand witnesses - as well as later writings found in memoirs from those who were there or knew those who were.

10:00-10:50 am

Humanities I

Location: MSU Room 324
Moderator: Jennifer Murphy, Penn State Berks

Jordan Folks, Kutztown University

Faculty Mentor: Michael Gabriel

King George III: Not a Tyrant, Simply Misunderstood

This paper, based heavily on primary sources, examines the actions of King George III in the events leading up to the American Revolution. It argues that the role the King played has been misunderstood.

Ana Cadiz, Reading Area Community College

Faculty Mentor: Jodi Greene

Bayard Rustin: Peace Maker and a Motivator for Non-Violence

My paper on civil rights leader Bayard Rustin discusses his fight in the 1940s for equal rights in America. It also looks at his historic legacy, including a high school in West Chester being named after him.

Samantha Dunlap, Kutztown University

Faculty Mentor: Eric Johnson

How Napoleon Bonaparte's Art Looting Influenced French Culture and Destroyed Others

During a time of turmoil in French society, Napoleon Bonaparte assumed control as the First Consul and later

Emperor. He decided to save France by reshaping French society and culture through art. He redefined French culture, however, with stolen artwork and the cultural heritage of other nations, thereby destroying other nations' cultures.

10:00-10:50 am

Business

Location: MSU Room 322
Moderator: Lyn McQuaid, Kutztown University

Thomas Lasher, Kutztown University

Faculty Mentor: Mostafa Maksy

A Historical and Prospective Analysis of Johnson & Johnson Financial Statements Summary

The objective of my research is to determine whether JNJ's stock is still a good long-term investment. I plan to analyze the company's operating performance, cash flow, and financial position. The research utilizes financial statement analysis tools, including trend analysis, ratio analysis, and predictive analysis.

Kyle Newman, Kutztown University

Faculty Mentor: Brad Congelio

Faculty Mentor: Doreen Burdalski

A Statistical Analysis of the In-Game Effectiveness of the Mindful Player Process

Using the R programming language, I am attempting to find a connection between the Mindful Player mental skills training process and statistical improvements among high school baseball players.

Amanda Outland, Albright College

Retail Malls Awaken From the Dead

As shopping centers adjust post-pandemic, they face a renewed demand for the in-store experience. In response, shopping centers are now providing a wider range of experiences and moving in a direction where all consumers'

demands are met.

10:00-10:50 am

Humanities II

Location: MSU Room 116

Moderator: Lynn M. Kutch, Kutztown University

Logan Minford, Alvernia University

Process of Craft Coffee

This research explores the history and significance of craft coffee, an industry valued at 9.8 billion dollars, and that refers to the art of creating the best cup of coffee through high quality ingredients and highly experienced roasters.

Leon Sconion, Albright College

Faculty Mentor: John Pankratz

Faculty Mentor: Caroline Fitzpatrick

Detroit Through the Kerner Lens

In this paper, I will introduce readers to the city of Detroit and the riot of 1967 through the lens of the 1968 Report of the National Advisory Commission on Civil Disorders, also known as the Kerner Report. I will explore how they coexist in a causational relationship that remains relevant even now 55 years later.

Sherrin Smith, Alvernia University

The Effects of Other Mothering

Motherhood is a different experience for black women, unlike women of other races. The method of "other mothering" becomes a reliable resource for black mothers who face challenges with raising their children. The findings of this study demonstrate that other mothering is a core value embedded in the world of black motherhood.

11:00-11:50 am

Keynote Welcome: Provost Lorin Basden Arnold

Location: MSU Room 183

Keynote: Rev. Matthew Kuna

"Because of Wonder: Our (Underrated) Premise and Task" Location: MSU Room 183

12:00-1:30 pm

Social Science V

Location: MSU Room 325
Moderator: Jennifer Murphy, Penn State Berks

Faculty Mentor: Bridget Hearon

Faculty Mentor: Caroline Fitzpatrick

Faculty Mentor: Doreen Burdalski

Jules Miller, Albright College

How Parental Anxiety Affects Child Eating Habits

This study examines how certain parental factors, such as anxiety, depression, and stress, influence their children's eating habits.

Anthony Mongeluzi, Alvernia University

Brainwashing By the Media

This study looks at the influences that media have on our opinions and decision making and outlines why it is important for us to understand when a media piece has certifiable information, or if the piece is strictly based on emotion and opinion.

Zoe Satterthwaite, Albright College

The Psychology of Clothing Overconsumption

The goal of this research is to discover what factors compel people to overindulge and overconsume at the expense of the earth. By analyzing consumer buying habits and trends, as well as the psychology behind excessive purchasing, we'll have greater insight into what causes overconsumption.

Samantha Oxenreider, Penn State Berks

Lateral Eye Movement and Misinformation

Eye movement desensitization and reprocessing (EMDR) is a widely used treatment plan for those suffering from PTSD and other mental health problems. However, research suggests growing concerns regarding the eye movement component of treatment and how it affects the memory process. This study assessed whether lateral eye movement distorts memory by increasing susceptibility to misinformation.

12:00-12:50 pm

Social Science III

Location: MSU Room 323
Moderator: Andrew Vogel, Kutztown University

Angela Bonopane, Penn State Berks

Faculty Mentor: Jennifer Murphy

Naloxone Use In Police Departments and Officers' Limitations When Responding

This study explores the role of Naloxone in police departments and the limitations officers face when attempting to divert overdose victims into treatment following a successful overdose reversal. It also aims to promote effective methods of mandating drug treatment and a universal requirement for training.

Arianna Marcucci, Albright College

Faculty Mentor: Marian Wolbers

Cars: The Death of America?

This study will use personal experience and knowledge of car dependency along with additional research to examine automobile reliance. The paper also offers some possible solutions.

Yonjae Choi, Penn State Berks

Faculty Mentor: Jui-Chi Huang

How will the overprotection of players in the e-sports league impact the e-sports industry?

This paper will mainly involve an analysis of contracts signed between players and teams to identify key characteristics in the LoL Championship Korea's labor market and analyze the cases of similar e-sports leagues that share similar characteristics to evaluate the future of the e-sports industry.

12:00-12:50 pm

Humanities III

Location: MSU Room 324
Moderator: Jennifer Forsyth, Kutztown University

Elizabeth Churchill, Albright College

Faculty Mentor: Marian Wolbers

Overlapping Themes in "A Hunger Artist" and "The Yellow Wallpaper"

This paper performs an analytic comparison between the two short stories.

Melvin Diaz, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

I still haven't found what I'm looking for: A Musical Analysis

This research concerns ways that music can provide important life lessons, such as finding satisfaction, striving toward a goal, and attaining happiness.

Dylan Sokolovich, Albright College

Faculty Mentor: Matt Fotis

The Humor of Democracy: Political Satire and Its Censorship in the United States

Political satire is a powerful tool for bringing about change. but its prevalence doesn't protect it from censors. This research explores censorship, from historical examples like Mark Twain's "The War Prayer" to censorship on television and in the digital realm, literature, performances, editorial cartoons, and satiric news shows.

Health Science II

Location: MSU Room 322 Moderator: Mostafa Maksy, Kutztown University

Angelica Malone, Albright College

Faculty Mentor: Hilary Aquino

Cross-Cultural Competency and Mental Health Treatment in Oaxaca, Mexico

The paper emphasizes the need to integrate traditional and modern biomedical practices to improve healthcare services for and preserve cultural heritage of indigenous communities. Oaxaca, Mexico serves as a model for this integration in the United States, with accessible and culturally sensitive healthcare options being crucial to maintaining traditional healing methods' cultural heritage.

Michaela Walker, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

Issues Nurses Face in the Medical Field

The nursing shortage has caused a wide variety of issues. We need to make sure we are able to address and care for their needs so they are able to properly do their job.

1:00-2:30 pm

Humanities IV

Location: MSU Room 324
Moderator: Diane Conrad, Reading Area Community College

Ethan Flanagan, Kutztown University

Faculty Mentor: Michael Gabriel

The Lehigh Valley's Contribution to the American Revolution

This paper examines Allentown, Bethlehem, and Easton's contributions to the war effort during the American Revolution. Topics included within the paper cover the Allen family's relationship with the war, field hospitals within Bethlehem and Easton, and shoe production in Allentown. The paper draws on a range of primary sources, including letters, diaries, and government records, as well as secondary sources from the fields of history and political science.

Joshua Templin, Albright College

Folkways and Werktreue: Analyzing Musical Copyright and the Work Concept

This paper examines musical copyright from a political economy approach by analyzing the work concept and authorship through the lens of capital and systems of ownership.

Michael Sangirardi, Kutztown University

Faculty Mentor: Michael Gabriel

Early American Gunsmiths

This research on Early American Gunsmiths (Roughly 1750-1850) describes the importance of the practice as well as the struggles.

Albert Vargas, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

Theology and Its Purpose

This paper is about theology, and how it affects the understanding and interpretation of religion. This paper will discuss theology versus religion, what it is, and the purpose behind these concepts.

Andrew Archut, Millersville University

Faculty Mentor: Jodi Greene

Colonial Shipbuilding in Philadelphia Bolsters Economy

This topic is of particular interest to Philadelphia natives and the research illuminates the importance of shipbuilding in the city.

1:00-1:50 pm

Social Science IV

Location: MSU Room 323
Moderator: Lyn McQuaid, Kutztown University

Olivia Console, Albright College

Faculty Mentor: Irene Langran

Determining the Effectiveness of France's Development Aid on its Former African Colonies

This research examines the ongoing relationship between France and African countries that were once under France's colonial rule. The paper focuses on themes of neocolonialism and paternalism, and concludes that much of France's foreign aid is ineffective in meeting the developmental needs of African countries.

Jaymi Smith, Penn State Berks

Faculty Mentor: Randall Newnham

Stalin and Putin for Russia

The objective of this analysis was to compare the two infamous leaders of Russia - Stalin and Putin, and to see if the current state of Russia is falling back into old Soviet Stalinist ways. The research contrasted leadership styles, economic strategies, public opinion, and stance on international relations.

Reem Shadid, Albright College

Faculty Mentor: Hayley Munir

Middle Eastern and Muslim Defendants: The Crossroad Between Ethnicity and Religion

In this project, we examine how both religion and ethnicity play a major role in the wrongful convictions of Muslim and Middle Eastern exonerees. Using data from the National Registry of Exonerations, common factors of bias within the legal system are highlighted through the misconduct of legal actors during criminal investigation and court proceedings.

1:00-1:50 pm

Natural and Physical Sciences II

Location: MSU Room 322
Moderator: Mostafa Maksy, Kutztown University

Erin Horack, Penn State Berks

Faculty Mentor: Jill Felker

Co-presenter: Vihn Lu

Antibiotic-Resistant Gene Expression in Water Quality Indicators, Escherichia coli, and Enterococci, Extracted from the Delaware River Basin

This study analyzed the gene expression of antibiotic-resistance within water quality indicators, Escherichia coli and Enterococci, as well as identified the genes contributing to streptomycin resistance within the bacteria. Results from this study illustrated an increased presence of antibiotic-resistance within the Blue Marsh watershed, which may put the public at risk of contracting antibiotic-resistant infections.

Jhon Mercado, Alvernia University

Faculty Mentor: Caroline Fitzpatrizk

Separations of Components in a Mixture

This research is about the chemical process of separating components. The objective of this research is to know the percentage error of the procedure because you do not always get 100% of components in the separation.

Alexis Taylor, Alvernia University

Faculty Mentor: Jamie Becker

Soil Microbes in a Sauna

The project researches how predicted global warming temperatures for 2050 and 2100 will affect soil microorganisms.

2:00-3:15 pm

Art, Visual & Creative II

Location: MSU Room 325
Moderator: Jennifer Forsyth, Kutztown University

Lacey Franklin Foreman, Albright College

Faculty Mentor: Joycelyn Burdett

Rich Culture

This research project aims to explore the impact of black culture fashion on African American identity. My research project revolves around how black culture fashion is vibrantly designed to uplift and support the black community. The findings of this research will contribute to our understanding of the role of fashion in shaping identity and how black culture fashion can be used as a tool for promoting social justice and uplifting marginalized communities.

Jose Galindo, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

Expression of Indigenism in Peruvian Photography, Literature, Painting, and Music in the 1930s

This research examines how different genres of art can contribute to society's visions about themselves through showing their culture and traditions captured in different pieces of art. Specifically, the research can show people the level of influence that art can have in our lives, taking as an example the indigenism in Peru in the 1930's.

Felicia Oyekola, Albright College

Faculty Mentor: Joycelyn Burdett

Women's Suffrage Movement and Fashion from the Early 19th Century to the Present

This study explores the importance of fashion in marking the people who supported the women's suffrage movement in the past and who pay homage to the movement today.

Rika Sato, Albright College

Faculty Mentor: Joycelyn Burdett

Disappearance of Real Fur In The Apparel Industry

While the disappearance of real fur in fashion fields is simply due to the change of fashion trends, it is also related to a change in people's ideologies. These changes have led the fashion industry to adopt policies for not using animal fur in their luxury brands.

2:00-3:15 pm

Humanities V

Location: MSU Room 323
Moderator: Michael Gabriel, Kutztown University

Eric Bittenbender

Finding the True Cross: Relics of Inspiration in the Crusades

This paper seeks to find the True Cross. That is to say, this paper seeks to better understand the True Cross while discussing the effect that the True Cross and other Christian relics had on Christians in the Middle Ages and today.

Jamilah Hyman, Albright College

Faculty Mentor: Kami Fletcher

Mapping Slavery onto Berks County's Landscape - Charming Forge

George Ege put Charming Forge on the map for its mass production of pig iron, making it extremely useful in assisting the Revolutionary Army in the production of cannon balls. My discoveries compelled me to map out the geographical shift of Charming Forge and understand the forge and its village that slavery built.

(Humanities V continued)

Matthew Thibault, Alvernia University

Faculty Mentor: Caroline Fitzpatrick

The History and Violence of the Irish Republican Army

This paper discusses the history and founding of the Irish Republican Army, as well as violence and acts of terror committed by the Irish Republican Army.

Tyler Fox, Reading Area Community College

Faculty Mentor: Jodi Greene

America and the Holocaust: The Leadup to the Holocaust from the Perspective of an American in Berks County,

Pennsylvania

This research examines the perspective of an American resident in Berks County, Pennsylvania, on the lead-up to the Holocaust and the reasons why American public opinion was not in favor of increasing Jewish immigration. Through a comprehensive analysis of historical data sources, including newspapers, government reports, and personal accounts, this study sheds light on the factors that shaped American public opinion on immigration during a critical period in history.

2:00-3:15 pm

Humanities VI

Location: MSU Room 322 Moderator: Dale Parson, Kutztown University

Reilly Hannan, Kutztown University

Faculty Mentor: Christine Saidi

Co-presenter: Rebekah Nerius

No Woman, No Man: Gender, non-gender concepts of Bantu Matrilineal Communities

This paper will present linguistic, comparative ethnographic, and oral tradition evidence demonstrating that Bantu-speaking peoples living within the Bantu Matrilineal Zone (BMZ) did not conceptualize gender in binary terms.

Laurel Gingrich, Albright College

Faculty Mentor: Joycelyn Burdett

Flappers of the 1920s

My research dives into the relationship between fashion and societal norms during the 1920s. It covers flappers and women picketers who radically changed fashion.

Jennifer Rubio Florian, Kutztown University

Faculty Mentor: Lynn M. Kutch

Beyond Nourishment: The Multi-Dimensional Role of Food in the Lives of Second-Generation Immigrants and Their Mothers

This paper explores the significance of food in maintaining cultural heritage and identity among second-generation immigrant families in the United States. It highlights the central role of mothers in preserving and transmitting cultural food practices to their children.

Emily Johnson, Reading Area Community College Faculty Mentor: Christopher Costello Sick of the Government Flu: How the Corruption of Social Media Undermines the Ethos of Punk Culture

Punk rock's original resistance to oppression has become part of the twenty-first century, specifically in the promise of tech-enhanced democracy. The re-emergence of punk culture on 2010s Tumblr demonstrates that social media seems destined to undermine the idealistic individualism that proponents of computer technology believed Web 2.0 would provide for the betterment of society.

Poster/Artwork Session 9:00 am - 10:00 am

Art, Visual, & Creative

Location: MSU Room 218 Time: 9:00 - 10:00 am

Anne Ambeau, Reading Area Community College

Faculty Mentor:

Polluted Seas

The amount of pollution in the seas has created an issue for environmentalists and sea creatures while human consumption has been steadily increasing. What can we do?n

Victoria Aquino, Albright College

Faculty Mentor: MeeAe Oh-Ranck

Rosario Dress

The dress "Rosario" is a social commentary on Catholic influence in Latino culture. The dress symbolizes the bleeding heart concept seen in Catholic imagery. The "heart break" is caused by the erosion of Indigenous culture due to colonial influence.

Corinne Deichmeister, Kutztown University

Faculty Mentor: Tim Betz

Compendium of Play: A Menagerie of Historical Iconography

Throughout my capstone project I have been researching the history of playing across the world as well as the history of printmaking. This has allowed me to understand how playing cards and printmaking follow each other throughout history and their relation to material culture. As a designer and printmaker, being able to understand how something as innocuous as playing cards have adapted over time helps me bring new ideas and practical knowledge to how I approach my work in the future.

Truc Phuong Ha, Albright College

Faculty Mentor: MeeAe Oh-Ranck

Lovely Nature

The inspiration for Lovely Nature is Alexander McQueen's Nature Savage Beauty Collection. Instead of incorporating bold colors in the Savage Beauty Collection, Lovely Nature contains soft pastel colors that present a different feeling of nature, lending the designs a fairy and princess feeling.

Kamiah Jean, Albright College

Faculty Mentor: MeeAe Oh-Ranck

A Walk on the Boulevard

This fashion design project takes direct inspiration from the Impressionist movement. There are many steps in building a fashion collection, and here I show the various steps incorporated into mine, from seamlessly blending two different impressionist paintings to building a color palette and incorporating many design elements into a cohesive fashion design collection.

Emma Smith, Kutztown University

Faculty Mentor: Dale Parson

Co-presenters: R-E Miller

Data Viz Prototype at Hawk Mountain | Bird Flight Paths

Since 1932, Hawk Mountain Sanctuary has been collecting data on bird flight paths. The goal of this collaborative work is to create an interactive prototype web app to explore the flight path of birds by funneling 10-20 years of collected data into P5, a web-based processing system. By merging technology and design, a dynamic and educational visual program can be produced to support the educational goal of the Hawk Mountain Visitor Center.

(Art, Visual & Creative continued)

Jake Youse, Kutztown University

Faculty Mentor: Lynn M. Kutch

"Trigger Warning!" - A Poster Series on Art Censorship

The original poster series "Trigger Warning" advertises a fictional exhibition based on mostly contemporary art that has been censored for varying reasons. My research explores the scope and scale of art censorship. With this project, I aim to not only call out the injustice of the concept but also give silenced works a chance to speak.

Business

Location: MSU, Room 218 Time: 9:00 - 10:00 am

Asha Johnson, Albright College

Faculty Mentor: Doreen Burdalski

Greenwashing: The Fashion Industry's Dirty Little Secret

With the popularity of sustainability, greenwashing is a marketing ploy that has been a prevalent issue within the fashion industry. Governments all over the world have been actively working to protect consumers against this growing issue by creating regulations and laws surrounding sustainability claims. This study seeks to answer the question whether these regulations are working to protect consumers.

Monique Moore, Albright College

Faculty Mentor: Doreen Burdalski

Combating Counterfeits: Weapons Available for the Brands

In the current age, it is easy for counterfeiters to market fake products. This study investigates existing laws and technology that allow brands to do more than match a serial number to paperwork to secure their products.

Jennifer Nitka, Reading Area Community College

Ifocus eve wear

After attaining my business degree, I would like to open my own optical boutique. My display will present my business plan and samples of the kinds of services I plan to provide.

Erica Zielinski, Albright College

Faculty Mentor: Doreen Burdalski

The Time for the Fashion Industry's Self Regulation is Over, New Legislation will be Taking the Reins

The poster offers an in-depth look into the new legislation coming up in the fashion industry regarding sustainability and ethical production. It also considers How the fashion industry can be impacted by the upcoming laws globally and the potential these laws have to completely restructure the industry.

Computer Science & Information Technology

Location: MSU Room 218 Time: 9:00 - 10:00 am

Patrick Perrin, Kutztown University

Faculty Mentor: Dylan Schwesinger

Long-Term Map Maintenance Using Mobile Robots

This poster presents a new approach to internal map representation and maintenance in autonomous robots to be used in the navigation of dynamic environments. With a more accurate representation of the environment, Simultaneous Localization and Mapping problems may be solved with increased certainty.

Education

Location: MSU Room 218 Time: 9:00 - 10:00 am

Abigail Casner, Kutztown University

Faculty Mentor: Justin Smoyer

3D Printed Flutes: Connecting Physics, Music, & Education

For my project, I researched the construction and physics of a flute in order to create a simple 3D model. This model can be used by low income school districts to provide cheap instruments to students when they may not be able to afford them otherwise. This model could also be modified for students who may have physical limitations, but still want to create music.

Engineering

Location: MSU Room 218 Time: 9:00 - 10:00 am

Peter English, Penn State Berks

Faculty Mentor: Terry Speicher

Co-presenters: ChristopherMoyer, Daniel Guydik Morgan Truck Body Undercoating Spray Robot

A robot designed to automate the process of applying an undercoating spray to a truck body. The robot is intended to more consistently apply the spray than the current manual method.

Emily Kiefer, Penn State Berks

Faculty Mentor: Dr. Rungun Nathan

Co-presenters: Heather Alexander, Alex Blatt, Noah Simpson

Category: Engineering

Instrumented Stroller Dummy

A drawback of running with a stroller is an increase in injury and running inefficiencies. Secondly, strollers can experience significant vibrations and movement, so minimizing these forces would allow for increased safety and comfort. This study investigates how creating a dummy that can measure these forces helps diminish negative side effects on the child.

Orion Kirkpatrick, Penn State Berks

Faculty Mentor: Dr. Rungun Nathan

Co-presenters: Dillon Drane, Ethan Kuhn *Penn State Berks Belt Driven Bicycle*

This project designs and tests a CVT to replace traditional gears and chain on a bicycle. Desired outcome is that the CVT must fit in the place of the cassette and not be a burden to the rider.

Tyler Perry, Penn State Berks

Faculty Mentor: Terry Speicher

Co-presenters: Jonathan Weiss Alternative Energy Microgrid

The alternative energy microgrid will be implemented in the Gaige 114 room at Penn State Berks to supply energy to the ceiling grid. By utilizing solar energy the room will be converted to semi-renewable power, saving money and reducing its environmental impact.

(Engineering Poster continued)

Xavian Rodriguez Faculty Mentor: Dr. Nathan Rungun

Co-presenters: Jacob Vanisko, Timothy Piergiovanni, William Parker

Bulk Sugar Handling

The research team was tasked with designing tests to explore how moisture and particle size affect the clumping of sugar in Gemini Baking Equipment's sugar handling system. Two tests were designed that vary grain size with a known humidity. The first test looks at stationary sugar and the second test utilizes a mimicked pneumatic conveying system.

David Straulescu, Penn State Berks Faculty Mentor: Rungun Nathan

Co-presenters: Christian Gigliano, David Shult, Brandon Williams

Hiker Water Filtration System

Our innovative hiker water filtration system employs a shaft driven impeller that carries water through a lightweight and eco-friendly housing to a 0.01 micron filter that eliminates any contamination, all powered manually through an easy-to-use crank handle. The design is lightweight, it bears a faster flow rate compared to piston pump filters, and it is housed inside a polyethylene housing made to handle extreme wear.

Douglas Wise, Penn State Berks Faculty Mentor: Dr. Rungun Nathan

Co-presenters: Eric Budesheim, Austin Evans, Octavio Orona

Design for a Universal Cab Fairing

This project focused on the design of an adjustable fairing that can be installed on any van-cab model. Water channel testing and spring/mass/damper analysis were used to validate the effectiveness and system response of the design.

Health Sciences

Location: MSU Room 218 Time: 9:00 - 10:00 am

Alexandra Chierichella Faculty Mentor: Ashley Gray

Co-presenter: Ethan Szekers

Bone-Patellar-Bone Autograft vs Bone-Patellar-Bone Allograft: Which to Choose?

Bone patellar bone autografts and bone patellar bone allografts are two common forms of ACL reconstructive surgery. Graft rupture rate, knee laxity, functional testing, and patient reported outcomes are key factors in determining which type of ACL reconstructive surgery is more beneficial for the patient.

Shantelle Duarte, Penn State Berks Faculty Mentor: Jill Felker

Co-presenters: Erin Horack, Quang Lu

Isolation of Antibiotic-Resistant Superbugs in the Blue Marsh Watershed

This research project is focused on determining antibiotic resistance for the bacteria Escherichia coli within the local Blue Marsh watershed. Samples were collected from 3 sites within the watershed affected by distant attributes. Using the Kirby Bauer diffusion and EPA membrane filtration techniques samples were analyzed.

(Health Sciences Poster continued)

Kevaughn Ferguson, Alvernia University Faculty Mentor: Diane Kraft

Co-presenters: AnthonyFlorkowski Physical Activities Affect on Tics

We are finding relations of exercise to the amount of tics per minute Tourettes patients have. In order to find better ways to treat tics, we are hoping that exercise has a positive effect on the patients.

Abby Fiorilla, Alvernia University Faculty Mentor: Catherine Emenheiser

Co-presenters: SarahDeller, Lexus Jordan, Sinead Gallagher

How occupational therapy contributes to training for emergency service personnel in communities of at-risk populations

The purpose of this research project is to discover modes of best practice protocol that accommodate the needs of at-risk populations. To include the most relevant populations, we divided research perspectives into four themes: autistic adolescents, autistic adults, individuals with mental illness, and older adults.

Casey Flack, Alvernia University

Faculty Mentor: Amy Thomas Effective interventions that promote social participation in elementary schools students with ASD

This research paper focuses on identifying effective interventions to promote social participation in elementary school students with autism spectrum disorder (ASD). Occupational therapists play an important role in supporting these children, and this paper aims to identify evidence-based interventions that can be used to promote social participation in this population.

Olivia Lugo, Alvernia University Faculty Mentor: Ashley Gray

Co-presenters: Nicholas Ferretti

Educating and Supporting Athletes with ADHD: Exploring the Role of Athletic Training

Athletic Trainers work with a wide variety of physically-active individuals, including those who are diagnosed with ADHD. Athletes with ADHD may need different strategies to help them be more effective in the rehabilitation setting.

Samantha Mikos, Kutztown University Faculty Mentor: Daniel Aruscavage

Athlete vs Non-Athlete: Who has it Better? Overall Health and Wellness

My research explores and compares the differences between collegiate athletes' and non-athletes' overall health. Physical and mental health are analyzed over a five-week period, measuring many variables such as eating habits, sleeping schedule, caffeine intake, calories burned, heart rate, and the amount the individuals work out/practice.

Grace Silva, Alvernia University Faculty Mentor: Ashley Gray

Barriers That Adult Trans Individuals Face When Trying to Engage in Organized Physical Activity This study examines the barriers that trans individuals face, such as legislation and policy regarding trans participation, past experiences with marginalization, discrimination, hostility, and a lack of knowledge from healthcare providers and policy makers, which can prevent trans individuals from engaging in organized physical activity.

Nathan Tam, Penn State Berks Faculty Mentor: Lorena Tribe

Electronic structure calculations of cysteine and glutamic acid conformations in the cytosol

This poster presents models of cysteine and glycine as they would appear in the cytosol, the site of glutathione synthesis. Using density functional theory, I performed a conformational analysis and other calculations on the molecules to determine their proper structure.

(Health Sciences Poster continued)

Hannah Ververs, Alvernia University Faculty Mentor: Amy Thomas

Co-presenters: Kealey Smith, Kyleigh Ammerman, Madelyn Snader

Diabetes Self-management Across the Lifespan

This project identifies occupational therapy's role in diabetes management to promote independence and increased lifelong quality of life. Occupational therapy's role fell within the following categories: healthy coping, healthy eating, being active, and taking medications.

Alyssa Yoder, Alvernia University Faculty Mentor: Amy Thomas

Co-presenters: Tiana Mondesir, Meghan Mackle, Ashlee Davies

Occupational Therapy's Role in Urinary Incontinence

This study details types and treatments of urinary incontinence for individuals of various age groups. The project dives into the role of occupational therapy (OT) regarding treatment and management as an emerging practice area within the scope of OT service delivery.

Humanities

Location: MSU Room 218 Time: 9:00 - 10:00 am

Jason Tai, Albright College

Faculty Mentor: Lennie Amores

Teaching the East-Asian Diaspora in the Spanish Classroom

The poster project outlines digital pedagogical resources created to teach the creative work of Spanish authors and artists of East Asian descent. This project contributes to the discussion around the representation of other racial identities and cultures from Spanish-speaking countries that have been excluded from Spanish textbooks and other educational resources.

Alettya Zalapa-Alonso, Alvernia University Faculty Mentor: Ana Ruiz

Pilot Study: Does Exercise Lead to Better Academics?

This study aimed to identify the relationship between physical activity and cognitive functioning among undergraduate students. The study compared the difference in time spent on a task, overall accuracy, and completion of the cognitive activity.

Mathematics

Location: MSU Room 218 Time: 9:00 - 10:00 am

Mackenzie Jackson, Alvernia University

Faculty Mentor: David Shoup

An Improved Mathematical Model of Heart Rate Metrics

The study focused on modeling heart rate data during periods of active exercise and cooling down using modified exponential and normal functions, respectively. Model accuracy was measured by minimizing mean square error. A predictive function was created using a singular parameter, exercise intensity, to be able to predict heart rate data based on any exercise intensity accurately.

(Mathematics Poster continued)

Samuel Murray, Kutztown University

Two-Person Impartial Pebbling Games

certain classes of graphs with variations to the standard pebbling move.

In a two-person impartial pebbling game, two players take turns to make pebbling moves on a given graph, and the first player with no legal pebbling moves loses. In this project, we explore two player impartial pebbling games on

Faculty Mentor: Tony Wong

Faculty Mentor: Tami Mysliwiec

Faculty Mentor: Matthew Stone

1 2

Natural & Physical Sciences

Location: MSU Room 218 Time: 9:00 - 10:00 am

Ian Bechtel, Penn State Berks

Traversing Murky Waters: Detection and Analysis of Neurotoxic Cyanobacteria in Blue Marsh Reservoir Harmful algal blooms are primarily due to cyanobacteria which produce toxins and deplete water quality. The detection and identification of these neurotoxins can show the presence of cyanobacteria in a local

reservoir/watershed.

Isabella Fidler, Kutztown University

The Effects of Shade-Grown Cacao on Biodiversity

Shade-grown cacao farming is hypothesized to aid biodiversity as opposed to clear-cut cacao practices. In order to prove this theory, acoustic diversity indices were used on frequency recordings from varying ages of cacao plots from BFREE research station in Southern Belize. The preliminary results depict a similarity in biodiversity between the established shade-grown cacao plots and the untouched forest control sites thus providing evidence for the hypothesis.

Anthony Florkowski, Alvernia University

Co-presenters: Kevaughn Ferguson

Effects of Physical Activity on Tourette Syndrome Tics: A Systematic Literature Review

The objective of this study was to systematically review the literature on the effects of physical activity on Tourette Syndrome tics. A systematic search of electronic databases was conducted to identify relevant studiesThe literature review suggests that physical activity may have a beneficial effect on Tourette Syndrome tics.

Mariama Gackou, Penn State Berks

Faculty Mentor: Tami Mysliweic

Faculty Mentor: Diane Kraft

Co-presenters: Leila Lipscomb, Shantelle Duarte, Johnathan Parsons

Detectable Antibiotic-Resistant Genes Found in the Sediment of the Delaware River Watershed

This project revolves around the identification and detection of antibacterial resistance in water sources. Sediment samples from different sites were retrieved for DNA extraction and detection.

Kathryn Kuerschner, Kutztown University

Faculty Mentor: Susan Barrows

General Chemistry - Limiting Reactant Experiment

The research conducted was to look at various compounds to be used in a precipitation reaction for a future General Chemistry Experiment. Precipitation reactions allow students to explore solubility rules and stoichiometry.

(Natural and Physical Science Poster continued)

Beau Ma, Penn State Berks Faculty Mentor: James Karlinsey

Co-presenters: Evan Grim

Analysis of Methods of the Degradation of Polyethylene Terephthalate

As polyethylene terephthalate (PET) is resistant to mechanical stress and high temperatures, this study explores methods of efficient degradation and recycling. PET is refluxed in dimethyl sulfoxide (DMSO) solvent with a hydrotalcite catalyst to break it down into an oligomer, which is then further degraded into a monomer using methanol, in order to consider. different concentrations of solvent and PET/oligomer.

Ashley McCurdy, Alvernia University

Detection of Cotton Fiber Transfer by FTIR

This research project entails the use of an instrument (Fourier-Transform Infrared Spectroscopy) to detect the transfer of cotton fibers.

Faculty Mentor: Joseph Kremer

Faculty Mentor: Jamie Becker

Faculty Mentor: Dr. Serapiglia

Faculty Mentor: Todd Underwood

Faculty Mentor: Ian Cost

Jenna Philippe, Alvernia University

Eutrophication and the Skin Microbiome of Frogs

My research project focuses on a fungal disease called Chytridiomycosis that has caused the death and extinction of frogs and other amphibian species around the world. Additionally, it addresses the ecological problem of hypereutrophication in aquatic environments and how this phenomenon may affect a frog's susceptibility to Chytridiomycosis.

Jeremy Philippe, Alvernia University

Soil microbial communities and the invasive species, Japanese Barberry

In this research study, we investigate how Japanese barberry affects the soil in our local environment. This was done through microbial analysis and DNA sequencing of bacteria obtained from soil samples from both Barberry-invaded and non-Barberry plots.

Annmarie Sanderson, Kutztown University

Feathers in Tree Swallow Nests are not Related to Ectoparasite Levels

Tree swallow nests were studied over a three month period and collected at the end of nesting season to examine if feather amounts correlated to ectoparasites present. The results showed that feather amounts in tree swallow nests do not correlate to ectoparasites.

Samantha Seador, Albright College

Co-presenters: KathrynBaptiste

3D Flight Muscle Architecture Reconstruction on Tyto alba Skeletal Model and Muscle Force Analysis

Summary: A 3D musculoskeletal model of a Barn owl (Tyto alba) was developed using Blender, a 3D creation and animation software. Flight muscles were remodeled through drawing, moving, scaling, and attaching muscles to their respective bones. Muscle force analysis was performed on dissected flight muscles.

Social Sciences Poster

Location: MSU Room 218 Time: 9:00 - 10:00 am

Joshua Atunrase, Albright College

Faculty Mentor: Soma Ghosh

The Environmental Costs of Fast Fashion: Can Generation Z Change their Wasteful Ways?

This research project is designed to reduce the gap between ideals and practices of Generation Z with regards to sustainable fashion. It explores ways in which Generation Z can take actions to combat the negative impacts of fast fashion on the environment.

Madison Blickley, Kutztown University

Faculty Mentor: Emily Cripe

Rohrbach Library Website Analytics

My research project focuses on the analytics and data behind the Rohrbach Library website usage.

Taisha Charles, Albright College

Faculty Mentor: Justin Couchman

Ouestion Creation as a Tool to Help Students Learn Mathematics

Question Creation as a Tool to Help Students Learn Mathematics focuses on providing middle school students with a cognitive psychology tool to help them further their retention of mathematics. We tested if creating and answering questions related to their material helps them perform better on a test related to that material.

Martalee Fiori, Reading Area Community College

Faculty Mentor: Carol Bean-Ritter

Fast Food Mindset

This study seeks to determine correlations between eating fast food and where one lives. It also considers connections between cooking capabilities and fast food consumption.

Martalee Fiori, Reading Area Community College

Faculty Mentor: Carol Bean-Ritter

Fast Food Mindset

This study seeks to determine correlations between eating fast food and where one lives. It also considers connections between cooking capabilities and fast food consumption.

Quinton Hartert, Kutztown University

Faculty Mentor: James Jackson

The Healing Power of Memory: A Research Study on the Health Benefits of Nostalgia

This study aims to investigate the positive health benefits of nostalgia and positive memory, delving into the potential clinical applications nostalgia has.

Gabrielle Maramag, Kutztown University

Faculty Mentor: Gregory Shelley

The effectiveness of a trauma-informed skills-building curriculum for parents

This poster displays the methods and results of a formative evaluation of a new parent-oriented skills-building workshop that ran in the Allentown School District in winter 2022. The findings in this study will help future implementations of this program and perhaps other programs similar to it.

Adrianna Moore, Kutztown University

Faculty Mentor: Khori Newlander

Studying Identity and Social Organization at an Historic Village in Northeast Pennsylvania

This is an archaeological analysis of a 19th century, industrial milling village in Pennsylvania. Buttons are used to attempt to discern identity and socioeconomic statuses present at the site.

(Social Science Poster continued)

Hannah Plowmaker, Albright College

Co-presenters: Alisa Hasanaj Self-Caring for the Environment

This study presents a look into the accusations made against self-care companies for greenwashing.

Elisa Rivera, Kutztown University

Faculty Mentor: FangHsun Wei

Faculty Mentor: Soma Ghosh

The Impact of Race on Educational Attainment

This project will explore the relationship between race and educational attainment using statistical data analysis. The results indicate that there is a correlation between race and level of education achieved.

Kierra Smith, Albright College

Faculty Mentor: Soma Ghosh

Sustainable Marketing and its Impact on Consumers' Buying Behaviors

This research investigates how sustainable marketing affects consumers' buying behaviors. The main goal is to understand how consumers rank sustainability amongst other factors that affect buying behaviors as more sustainable buying can promote a greener environment.

Poster/Artwork Session 12:30 pm - 1:30 pm

Art, Visual, & Creative

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Dyshanae Brown, Albright College

Faculty Mentor: Kristen Woodward

Barbie Girl

"Barbie Girl" is one piece of a 10-piece series addressing how traditional gender beliefs rooted in misogyny have affected the way women see themselves. Those influences also include the negative effects of social media and unrealistic beauty expectations.

Mya Glogovics, Albright College

Faculty Mentor: Dorren Burdalski

Are we consuming fast fashion or is fast fashion consuming us?

This research analyzes consumers' shopping habits and methods of disposing of their purchases. The results of overconsumption and increased production have affected our land, water, and air. Over time there will be positive impacts shown on the environment when consumers stop over consumption.

Imani Gonzalez, Albright College

Faculty Mentor: Doreen Burdalski

Can technology in military uniforms potentially save lives?

New technology is discovered and weaved into military uniforms for extreme benefits. Microchips are now alerting active members of the military of possible threats, injuries of others, and more. This research demonstrates that microchips aid in the stability of military uniforms by helping soldiers deter danger.

Stephanie Hegedus, Albright College

Faculty Mentor: Doreen Burdalski

Buying Vogue for Dinner; Can Digital Fashion Journalism Feed Us Like Print Does?

The goal of this research is to gain insight into the future of fashion journalism, specifically regarding the debate between print and digital journalism. Through the analysis of trends, decision-making factors, and innovation in this sector of the fashion industry, a more informed look at how we consume fashion news and stories is developed and presented.

(Art, Visual, & Creative continued)

Eva Labram, Kutztown University

Purge

Faculty Mentor: Colleen Clemens

A visual and literary representation of mental struggle, strength and progress in a nation that constantly seems to be moving backwards.

Olivia Oatman, Albright College

Faculty Mentor: MeeAe Oh-Ranck

Fashion Shouldn't Cost The Earth: Re-Design Fashion Sustainability

For this research, I completed a decomposition analysis on three fiber contents from various brands, administered a survey to analyze consumers' desires to become sustainable, and created a case study comparing two fast-fashion companies. The goal was to determine the level of sustainability in products of certain companies, to bring awareness to consumers, and to determine when fibers will decompose.

Daniel Rumsy

Faculty Mentor: Leigh Kane

Under Construction

Inspired by the murals created under the Work Progress Administration during the 1920s and 1930s, my work explores the relationship between the body and public space. Through a series of paintings, photos, and video art WPA murals are reconstructed and examined in relation to the male body and the role it plays socially.

Meaghan (Alex) Torres, Kutztown University

Faculty Mentor: Samantha Nye

"Should I Seek Fame?"

This artwork visualizes the question, "Should I Seek Fame?" and explores definitions of fame and what far-reaching influences fame can have.

Amina Watson, Albright College

Faculty Mentor: MeeAe Oh-Ranck

Sustainability in Fashion: Asia

By using Eastern techniques of design, primarily from Japan, and researching sustainable fashion practices, traditional elements were utilized to create a concept garment with a modern approach.

Amy Yu, Penn State Berks Faculty Mentor: Pauline Milwood

Grow

My painting is a representation of life's struggles and obstacles as well as the strength that creates that builds your character and helps you grow to become successful.

Computer Science & Information Technology

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Olivia Oatman, Albright College

The New Fashion Trend: Artificial Intelligence

Fashion companies have started to integrate Artificial Intelligence into their businesses through various methods in order to enhance customer experiences. By using AI technology, companies can create an interactive and unique shopping experience that will further enhance their sales and customer relations.

Engineering

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Brock Griesemer, Penn State Berks

Faculty Mentor: Dr. Rungun Nathan

Co-presenters: Nicholas Miller, Caitlin O'Leary, Brandon Shankweiler

American Society of Mechanical Engineers (ASME) Human Powered Vehicle Challenge

The American Society of Mechanical Engineers (ASME) Human Powered Vehicle Challenge is an annual competition for aspiring engineers to design, fabricate, and race a human powered vehicle. This project is the continuation of previous Penn State Berks Mechanical Engineering senior design projects focused on improving upon the current iteration.

Asher Hardin, Penn State Berks

Faculty Mentor: Dr. Rungun Nathan

Co-presenters: EmilyClapper, Sarah Bracy, Chanellor Yenser

DEKA Battery Attachment

Summary: Our project is to attach handles to DEKA batteries for East Penn Manufacturing. The goal is to make the

process semi-automated to relieve strain on operators who currently do this process

Manually.

Ethan Kuhn, Penn State Berks

Faculty Mentor: Dale Litwhiler

Door Motion Energy Harvesting and Storage Investigation - Part II

This study investigates pumped fluid storage and recovery of energy harvested from the motion of swinging doors.

Derek Stoe, Penn State Berks

Faculty Mentor: Nathan Rungun

Co-presenters: Anthony Grim, Daniel Harding, Richard Walters

Morgan Long Rail

Summary: This project aims to design a safer transport method for workers removing long I beams from a tall storage rack. A gantry crane concept was created, and stress analysis was conducted to ensure its safe loading capacity and design for ease of use.

Andrew Straulescu, Penn State Berks

Faculty Mentor: Runun Nathan

Co-presenters: Caleb Erb, George Mousa

Water Flosser

Traditional water flossers require an electric outlet or batteries to operate, which can make them cumbersome and inconvenient for travel. In response to this, we have designed an electric-free and lightweight water flosser that connects directly to the sink faucet. The water flows through the flosser tip, which contains a check valve that regulates the water pressure.

Health Sciences

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Haley Bylina, Alvernia University

Faculty Mentor: Ashley Gray

Co-presenter: Dianna Morganti

The Use of Electrical Stimulation Compared to Cryotherapy for Delayed Onset Muscle Soreness

Delayed onset muscle soreness (DOMS) is an exercise-induced condition that develops after vigorous activity found to be extremely prevalent in the athletic population. Electrical stimulation and cryotherapy are both modalities used to help reduce the symptoms of DOMS.

Hanna Hedrick, Alvernia University

Faculty Mentor: Catherine Emenheiser

Co-presenters: Emily Kemler, Jonathan Vo Auditory Stimulation for Pediatric Diagnoses

The pediatric diagnoses investigated included premature birth, coordination issues, autism spectrum disorders, and emotional regulation issues. Using four themes of interest, the investigation sought to find the best evidence on the effectiveness of auditory stimulation and music on the specific diagnosis for practitioners and parents to utilize.

Nicole Scarle, Alvernia University

Comparison of Transcription Factors Associated with Cardiac Regenerative Medicine

Transcription factors associated with heart development, such as GATA-4 and NKX2-5, are being studied in the area of regenerative medicine. Using databases such as the String database, ChIP-Atlas epigenetic database, and the BLAST database from NCBI, this study examines these transcription factors in regard to their effects both separately and together on various genes.

Humanities

Location: MSU, Room 218 Time: 12:30 - 1:30 pm

Veloie Mastrocola, Albright College

Faculty Mentor: Lawrence Morris

Heterodoxy and Compromised Eschatology in Hamlet

This project deconstructs the religious subtext in Hamlet to reveal a pattern of heterodoxy and theological rebellion. By consulting contemporary historical documents as well as modern interpretations, this paper argues that the play is a polyphonic text that alludes to the perceived danger of religious nonconformity in Elizabethan England.

Evan Santos, Kutztown University

TV and Media: Why it Matters to us and Why it Matters to Me

How much has television and media shaped our world the past 100+ years? How much has it shaped mine just the past 6 years? This historical research and personal memoir looks at its impact on the world and myself.

Natural & Physical Sciences

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Daniel Abramov, Penn State Berks

Faculty Mentor: Lorena Tribe

Interactions of Phenylalanine with Tetrahydrobiopterin: A Computational Study

Gain an understanding of the role of phenylalanine in biochemical pathways, such as the phenylalanine-tyrosine pathway, and of the mechanisms which lead to the accumulation of phenylalanine, which has the potential to cause neurological diseases.

Brianna Beavens, Alvernia University

Faculty Mentor: Lindsay Kraus

Analysis of target genes: RUNXI, SBDS, and MEF2C in pediatric and adult leukemia patients

This bioinformatic based project explores 3 target genes related to leukemia and their own disorders, Components such as expression, death, and tissue specificity were analyzed in both adult and pediatric leukemia patients.

Tyler Cebular, Alvernia University

Faculty Mentor: Joseph Kremer

Salicylic Acid and 4-Nitroaniline Removal from Water Using Magnetic Biochar

Synthesize several magnetic biochars, characterize the batch or batches they are making by spectroscopy, or run a series of spectroscopy experiments to test their reparative power to organic dyes such as phenolphthalein and methyl orange.

Julianne Chen, Penn State Berks

Faculty Mentor: James Karlinsey

Comparison of Acid Catalysts in Fischer Esterification Reactions

Using different acid catalysts in Fischer esterification reactions, different yields from alcohols and carboxylic acids are obtained. With an emphasis on Dowex ion exchange resins, simple Fischer esterification reactions are compared to Dowex resin reactions in terms of yield and sustainability. Different products are analyzed through gas chromatography and IR spectroscopy.

Lauren Conrad, Penn State Berks

Faculty Mentor: Lorena Tribe

First principles theoretical study of serine's structure and function in trypsin

The active site of the serine protease enzyme trypsin is comprised of the following three amino acids: aspartic acid, histidine, and serine. To show the validity of trypsin's generally accepted mechanism where serine is deprotonated by histidine, I used first principle electronic structure calculations and density functional theory. The structure and function of these amino acids are presented.

Gabriella DeMarco, Kutztown University

Faculty Mentor: Adrienne Oakley

Co-presenters: Hannah Sellers

Investigating Environmental Changes in Custis Pond, Savage Neck Dunes Natural Area Preserve (SNDP), Eastern Shore. Virginia

This research project focuses on using sediment cores to investigate environmental changes in Custis Pond, a freshwater pond located in the maritime forest of Savage Neck Dunes Natural Area Preserve on the Eastern Shore of Virginia. Sediments contained in Custis Pond contain a record of environmental change likely resulting from sea level change since the last ice age, ~21,000 years ago.

(Natural & Physical Sciences Poster continued)

Isabelle Hovel, Alvernia University

TTX-resistant sodium ion channel blockers in Frogs

Ralfinamide mesylate, a TTX-resistant sodium ion channel blocker, was unilaterally injected into the optic nerve of three frogs. Behavioral responses to looming, prey, and objects of low reflectance were tested post-injection. Results suggest that blocking TTX-resistant sodium channels selectively affects responses to looming stimuli.

Meghan Johns, Alvernia University

Faculty Mentor: Jamie Becker

Faculty Mentor: Eric Recktenwald

Mining Alvernia's Bacterial Collection for Novel Antimicrobials

This study explored the potential of microbial culture collections as a source of novel antimicrobial agents, identifying Lysinibacillus macrolides and Clostridium butyricum as particularly noteworthy cultures. Further research is needed to confirm, isolate, and characterize these compounds, as well as explore their potential applications in medicine and agriculture to combat antimicrobial resistance.

Giovanna La Spisa, Kutztown University

Faculty Mentor: Laura Sherrod

Mouns Jones Geophysical Project

Archaeologists that work for the Mouns Jones site were interested in finding future excavation sites. A Ground Penetrating Radar and Magnetometer were utilized to attempt to locate roads, paths, and building foundations seen in a 1950s photo and 1719 map. These tools allow for a rapid characterization of this location's subsurface in a non-invasive manner.

Carlen Lazar, Alvernia University

Faculty Mentor: Joseph Kremer

Category: Natural & Physical Sciences

Determination of the Decomposition Rate of Ibuprofen Using Thermal Analysis at Constant Temperatures
High-Performance Liquid Chromatography was used to determine ibuprofen concentrations within a solution. With prolonged exposure to various elevated temperatures, ibuprofen tablets decrease in potency and effectiveness.

Ashley Mattern, Alvernia University

Faculty Mentor: Joshua Smith

Analyzing the Levels of Caffeine in Various Brands and Types of Tea Using High Performance Liquid Chromatography

Caffeine is one of these dietary compounds in tea that can be beneficial for health, but consuming too much can have negative health effects. The aim of this research was to use High Performance Liquid Chromatography (HPLC) to determine how much caffeine was in a singular tea bag and compare it to various popular brands and types of teas.

Juliette Mcilvride, Penn State Berks

Faculty Mentor: James Karlinsey

In this project, different indicator dyes and fluorophores are examined for their spectral characteristics. Using the findings, the potential for their use as quantitative pH indicators is explored.

Juliette Mcilvride, Penn State Berks

Co-presenters: Jenicy Strong, Maceo Cardinale Kwik

Connecting Problems: "P = NP" and Decoding Hawking Radiation

With the advancement of quantum technology and quantum computing, classical cryptography, which is what we currently use to keep information safe, will soon be completely futile. We consider then a famous problem in the field of quantum physics – decoding Hawking radiation. In this work, we discuss the relationship between quantum computing and quantum mechanical systems.

(Natural & Physical Sciences Poster continued)

John Miller, Albright College

Faculty Mentor: Andrew Samuelsen

Pursuit of Understanding the Mystery of Marcescence in American Beech Tree

This study attempts to understand why juvenile and middle-aged American Beech trees hold their leaves throughout the winter while older trees do not. It is believed that younger trees have a higher nitrogen content in their leaves.

Grace Miloszar, Kutztown University

Faculty Mentor: Alexander Hernandez

Initial Assessment of Helminth Parasitism in Yucatan Howler Monkeys (ALOUATTA PIGRA) from Toledo District, Belize

The research reports on the diversity of gastrointestinal parasites that infect a population of howler monkeys sampled in Belize in 2022. We found two species of parasites in 18 fecal samples collected from the Toledo District.

Ali Naqvi, Penn State Berks

Faculty Mentor: Tami Mysliwiec & Jill Felker

Co-presenters: Olivia Sullivan, Emma Diliberti, Leila Lipscomb, Jonathan Parsons

Quantification and Classification of Microplastics and Isolation of Microplastic Residing Bacteria in the Blue Marsh Watershed

Microplastic pollution is an anthropogenic stressor affecting the Blue Marsh Watershed. The total number of microplastics in the studied water samples was 845, and the classifications were fibers (51%), nurdles (46%), and fragments (3%) respectively. These results suggest that the presence of microplastics may contribute to poor water quality in the Blue Marsh Lake.

Samantha Peterson, Alvernia University

Faculty Mentor: Joshua Smith

The Determination of Acetaminophen by Reversed High Performance Liquid Chromatography and Fourier Transfer Infrared Spectroscopy

This research provides information on the detection of acetaminophen using High Performance Liquid Chromatography and Fourier Transfer Infrared Spectroscopy.

Abby Robinson, Albright College

Faculty Mentor: Kayla Gordon

Antibiotic resistant genes in the raw and treated drinking water of the Schuylkill Watershed

This study used qPCR to analyze antibiotic resistant genes to commonly administered antibiotics in local drinking water samples. The results found resistant genes to sulfonamide, methicillin, gentamicin, and tetracycline.

Brenna Robinson, Penn State Berks

Faculty Mentor: James Karlinsey

Evaluating the Effect of Buffer Composition on the Electroactivity of Acetaminophen

Cyclic voltammetry (CV) is used to study the production of N-acetyl-4-quinoneimine hydrate from

N-acetyl-4-quinoneimine, the oxidized form of acetaminophen. The effects of different borate buffers on CV profiles, including conductivity and pH, will be studied.

Presenter: Kayla Williams, Alvernia University

Faculty Mentor: Jamie Becker

The Role of Freshwater Mussels and Environmental DNA in Monitoring Water Quality and Ecosystem Health This study explores the use of environmental DNA (eDNA) as a tool for the detection and conservation of freshwater mussels. Researchers can gain more insight into the health of aquatic environments and assist in protecting freshwater mussels by monitoring environmental changes in freshwater mussels using environmental DNA (eDNA).

Social Sciences

Location: MSU Room 218 Time: 12:30 - 1:30 pm

Samantha Bean, Reading Area Community College

Faculty Mentor: Carol Bean-Ritter

Anxiety and Procrastination Research

The research is assessing how procrastination and anxiety relate to each other. An experiment is conducted which prompts the participants to make a checklist of at least five items and assess how their anxiety and procrastination is before and after.

Lillian Carney, Albright College

Faculty Mentor: Gwendolyn Seidman

The Effects of Narcissism and Relationship Threat on Mood and Partner Perception

My research study examined the effects of narcissism and relationship threat on mood and partner perception. Participants were randomly assigned to one of two conditions, a control group in which they were asked to describe a typical day, or a relationship threat condition where they were asked to describe a time they felt hurt by their partner. The results showed that narcissists who were exposed to a relationship threat had elevated feelings of anger and shame as opposed to those who were not narcissists.

Jacob Charsky, Penn State Berks

Faculty Mentor: Nathan Greenauer

Screen Content on Sleep Quality

The present study investigated the extent to which device screen exposure before bed affects the amount of time it takes us to fall asleep and the quality of sleep throughout the night. In order to accurately track sleep, Fitbits were given to participants and were worn for four nights. Fitbits track sleep duration, the number of awakenings, and how long it took you to fall asleep.

Arianna Cruz, Penn State Berks

Faculty Mentor: Nathan Greenauer

How romantic attachments are influenced by our childhood perception

This study investigated the long-term effects one's memory of childhood experiences with their parents can have on the perception of future relationships. It was hypothesized that recalling positive or negative experiences with parents would differentially affect perceptions of current romantic relationships.

Katryn-Dare DeCola, Penn State Berks

Faculty Mentor: Nathan Greenauer

You Are What You Wear; : How Clothing Influences Aggression

This study investigated whether enclothed cognition regarding police uniforms. Specifically, we examined the extent to which wearing a uniform moderated aggressive behavior in a shoot/don't shoot paradigm between aggressive behavior and police uniforms.

Kimberly Diaz, Reading Area Community College

Faculty Mentor: Jodi Greene

Transgenerational Effects of The Holocaust

This poster presentation will outline the psychological trauma Holocaust survivors endured and how their future children were also affected. It will demonstrate how the event not only took a toll on those who were victims but also continued to be a traumatic experience for the generation to come.

(Social Sciences Poster continued)

Troy Dietrich, Penn State Berks

How your character can affect your choices

Faculty Mentor: Nathan Greenauer

Faculty Mentor: Nathan Greenauer

Faculty Mentor: Jennifer Jacobson

Faculty Mentor: Nathan Greenauer

Faculty Mentor: Nathan Greenauer

Faculty Mentor: Carol Bean-Ritter

Faculty Mentor: Soma Ghosh

The present study investigated how player-based moral choices in video games can be affected by the avatar that they are given. We hypothesize that moral choices in the game will be influenced by the moral framework of the assigned character, even when that framework contradicts that of the player.

Xiomara Dominguez, Penn State Berks

College Student's busy lifestyles can lead to memory errors

The present study focuses on how high task demands, like those associated with school and work, can lead to difficulty in remembering or distorting memories. Participants read a detailed description of a job candidate for whom they later completed a job application that varied in length and time to complete. We hypothesized that increased task difficulty would increase memory errors.

Olivia Donnini, Kutztown University

History and Current State of Secularism in the United States

This research project examines the history of the foundation of church and state. It examines the current state of religion in the United States as a society, and studies how policies and court systems do or do not facilitate a separation of church and state.

Jocelyn Ewing, Penn State Berks

Collegiate Mentor Programs and Its Effect on Mentors

The study investigated the psychological consequences that participation in mentor programs has on mentors. To date, most research has focused on the positive effects on mentees. Comparatively little research has examined the impact of such programs on student mentors. We explored the effects of mentor programs on students across several dimensions.

Stefanie Guenther, Penn State Berks

Ghosting Attitudes Through Perceived Attractiveness

Previous research has focused mainly on heterosexual females' perspective and experiences with ghosting, or suddenly ceasing communication without explanation.. The current study extends previous findings by examining the phenomenon of ghosting among heterosexual and queer communities.

Ariana Irwin, Reading Area Community College

Fast Food and Social Class

In my research, I was looking to see the effects of having an abundance of fast-food restaurants. I also considered whether these same neighborhoods have the same access to healthier options such as fresh fruit and vegetables.

Mijon Powell, Albright College

Co-presenters: Naja Jackson

The Role of Artificial Intelligence in a Sustainable Energy Future

This research project explores the role of Artificial Intelligence (AI) in creating a more energy efficient economy and cleaner environment, including opportunities and challenges for AI.

(Social Sciences Poster continued)

Presenter: Jaydis Rosario, Reading Area Community College

Faculty Mentor: Carol Bean-Ritter

What Affects the Productivity of Memory?

My research project explores how productivity affects memory. It focuses on adults' ability to remember and explores the question whether we are being productive and staying busy, or feel so overwhelmed, we often don't get things done.

Kristin Santana, Immaculata University

Faculty Mentor: Toe Aung

Social Sciences

Adolescent Sleep, Attention, and Suspension

The correlation that lack of sleep, lack of an attention span and suspension hold. It is inspired by a loved one's ADHD and their class disruptions as an adolescent.

Alexander Torzone, Penn State Berks

Faculty Mentor: Nathan Greenauer

Social Loafing and Group Productivity

The present study examined the effects of social loafing on group productivity in the area of college group projects. The results can inform group leaders and college students about the importance of communication, and the negative effects associated with social loafing in group settings.

Yarali Villar, Penn State Berks

Faculty Mentor: Nathan Greenauer

Are individuals delaying marriage?: Emerging adults' attitudes towards marriage

The present study focuses on how financial independence, financial security, and societal factors such as family influences, social media, and cohabitation have influenced this shift toward delaying marriage. Using a series of self-report measures, we examined the influence these factors had on beliefs about the importance of marriage, marriage timing, and divorce.

Emily Wang, Penn State Berks

Faculty Mentor: Nathan Greenauer

Social relations and their effect on academic motivations

This study examined the influence of social relationships on a student's academic performance. Specifically, we assessed the role of social interactions, self-efficacy, and place attachments on academic performance.

Alexandra Weitzel, Penn State Berks

Faculty Mentor: Nathan Greenauer

Arousal and Mood on Memory Accuracy

The present study investigated how differing arousal levels of images and mood can impact memory formation and memory intrusions. Memory intrusions are measured by remembering more or less of the information encountered. It measured if participants falsely altered a stimulus or correctly recalled the image shown in the learning phase after placement in a mood group.

Julia Winkler, Penn State Berks

Faculty Mentor: Nathan Greenauer

Do Dogs Make You Happy When Life is Hard?

This study examines the effect of dogs on humans' experiences of stress and anxiety. Participants were either shown infant dog images, adult dog images, or no images before solving a series of timed mental math equations created to induce stress. Exposure to images of dogs is expected to moderate the effects of stress.

Cassidy Yanarella, Penn State Berks

Faculty Mentor: Nathan Greenauer

Attachment Style and its Relation to Ghosting Roles

This present study explores the relationship between attachment styles and ghosting. The aim of this study was to evaluate the relationship between attachment styles and the likelihood of being ghosted or ghosting others.

Performance 12:30 pm - 1:00 pm

Art, Visual & Creative

Location: MSU, Room 183

Madeline Marous, Penn State Berks

The Call Me Annie Project

I am a vocalist, multi-instrumentalist, and songwriter. Music is my passion and my creative outlet, and I have used it to tell stories. This performance will feature an EP called *Moon & Shadow*, which narrates the four core things that can send people into the darkest nights in their life with the moon as their only light.

Sarah Mengel, Kutztown University

Glittersmoke: A Collection of Queer Poems

The selected poems showcase the queer experience in various ways. From non-binary depictions and women-loving-women relationships, the poems aim to display the artistic, raw nature of queerness.

Performance 1:00 pm - 2:30 pm

Art, Visual & Creative

Location: MSU, Room 183

Faculty Mentor: William Litman

Faculty Mentor: Ellen Walter

Faculty Mentor: Ellen Walter

Adam Miller, Reading Area Community College

"Finding Ease in Disease"

"Finding Ease in Disease" is a spoken word poem that highlights some personal symptoms and feelings in regard to dealing with a mental health disorder. It is my hope that some comfort and commonality can be found through the words and also help erase the stigma still surrounding mental health and empower all those who are coping with a mental health issue or diagnosis.

Isabella Morgalo, Reading Area Community College

What Happens in Baggage Claim Stays in Baggage Claim

Emotional Baggage, by award winning playwright Nina Shengold, is a creative and unique spin on the unseen struggle of unclaimed luggage at an airport baggage claim. The protagonist, a panicky carry-on bag, finds herself in unclaimed luggage and, throughout the endeavor, meets a group of more luggage in the same situation.

Tim Cescon, Reading Area Community College

Co-presenters: Kyle Conrad, Mara Nagle

Just Let Loose

The relationship between writer/director and actor has always been a complicated one. Grammar, built-in pauses, character movement, delivery, etc., are all defined and imagined by a writer well before they are taken to the stage. In adapting this play, I wanted to hone in on that separation of the written play and what actors should feel like in-character.

(Performances continued)

Emma Rothermel, Reading Area Community College

Faculty Mentor: Ellen Walter

Co-presenters: Bella Morgalo, Kyle Conrad, Finn Jackson, Juan Salas, Mara Nagle, Tim Cescon

Mon Partenaire De Rêve

Summary: The protagonist finds himself at a French restaurant on a tropical island after a messy divorce and ongoing custody battle. After getting waited on from Kitty, she disappears. He then proceeds to find himself in a magical realistic state of mind about the waitress.

Maggie Kline, Reading Area Community College

Faculty Mentor: Ellen Walter

Co-presenters: Kyle Conrad, Tim Cescon

From the City that Brought the World's Greatest Invention: The Cheesesteak

David Ives, a renowned playwright, screenwriter, and novelist introduces us into the wacky, zany, and wonderfully hilarious world of The Philadelphia. Here things are never as they seem, and the people are odd, yet charming. The Philadelphia pokes lightheartedly at Pennsylvania's very own city, and what it means to be in a "Philadelphia."

Finn Jackson, Reading Area Community College

Faculty Mentor: Ellen Walter

Co-presenters: Bella Morgalo, Mara Nagle, Emma Rothermel

A Teacher, an Altruist, and a Despairer walk through the Fourth Wall

A Teacher lectures to a class (the audience) on the art of Drama and what makes "good" theater. The subjects of this lecture are two characters in a scene, a suicidal Jumper on the ledge of a rooftop and a Good Samaritan attempting to save them from their fate. The Teacher pauses, rewinds, and interjects the scene so often that the characters frustratedly rebel against the Teacher in a hilarious fourth wall break.

Short Film 1:00 pm - 2:00 pm

Art, Visual & Creative

Location: MSU Room 116

Nysair Green, Albright College

Faculty Mentor: Matthew Garrison

ONE NIGHT STAND Documentary (Trailer)

A trailer showcasing the rage, the moshpits, and the rebellion of the Ken Carson and Destroy Lonely North America Tour 2022. It's a movie, an experience, a Rage Tape.

Kristy Jo Mahoney, Kutztown University

Faculty Mentor: Michael Johnston

Co-presenters: Vera Clauser, Abigail Gardula

Doc Trilogy: Journeys of Self-Discovery

A trilogy of short documentaries created by and about three students majoring in Cinema, Television, and Media Production. Abigail shares her passion for Future Farmers of America, Kristy Jo shares her love of yoga, and Vera shares his journey transitioning gender. Each film shares the story of a student's journey of self-discovery.

Art, Visual & Creative

Location: Lobby Area by MSU 218 Time: 9:00 am - 2:00 pm

Dale Parson, Kutztown University

Student Custom Coding & Improvisation of a Photo-based Visual Instrument

This is a video loop on a computer monitor submitted by Dr. Dale Parson. 15 Kutztown University students from Fall 2022 CSC220: Object-Oriented Multimedia Programming, created a Final Project, video 33:53 mins:secs. STUDENTS: Justus Hamm, Christopher Lipovsky, Rebekah Underwood, Paul Barton, Amber Kulp, Daniel

Gorman, Armando Velazquez Santiago, Kylee Hager, Jesse Quier, Madison Schlott, Luis Feliz, Marcello

Feliciano, Michael Colandene, Palak Dilawari, Ryan Livinghouse of Kutztown University

Art, Visual & Creative

Location: Upper Level Railing Time: 9:00 am - 2:00 pm

Daniel Rumsy

Faculty Mentor: Leigh Kane

Under Construction

Inspired by the murals created under the Work Progress Administration during the 1920s and 1930s, my work explores the relationship between the body and public space. Through a series of paintings, photos, and video art WPA murals are reconstructed and examined in relation to the male body and the role it plays socially.

First	Last	Time slot	Room	College/University	Category	Format
Daniel	Abramov	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Mahwish	Ahmed	9:00 - 9:50 AM	MSU 323	Penn State Berks	Social Sciences	Paper
Heather	Alexander*	9:00 - 10:00 AM	MSU 218	Penn State Berks Reading Area	Engineering	Poster
Anne	Ambeau	9:00 - 10:00 AM	MSU 218	Community College	Art, Visual & Creative	Artwork
Kyleigh	Ammerman*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Victoria	Aquino	9:00 - 10:00 AM	MSU 218	Albright College	Art, Visual & Creative	Artwork
Andrew	Archut	1:00 - 2:15 PM	MSU 324	Reading Area Community College	Humanities	Paper
Joshua	Atunrase	9:00 - 10:00 AM	MSU 218	Albright College	Social Sciences	Poster
Monica	Badea	8:45 AM - 9:50 AM	MSU 324	Kutztown University	Natural & Physical Sciences	Paper
Kathryn	Baptiste*	9:00 - 10:00 AM	MSU 218	Albright College	Natural & Physical Sciences	Poster
Samantha	Bean	12:30 - 1:30 PM	MSU 218	Reading Area Community College	Social Sciences	Poster
Brianna	Beavens	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
lan	Bechtel	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Eric	Bittenbender	2:00 - 3:00 PM	MSU 323	Kutztown University	Humanities	Paper
Alex	Blatt*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Madison	Blickley	9:00 - 10:00 AM	MSU 218	Kutztown University	Social Sciences	Poster
Angela	Bonopane	12:00 - 12:50 pm	MSU 323	Penn State Berks	Social Sciences	Paper
Sarah	Bracy*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Maurice	Brown	10:00 - 10:50 AM	MSU 323	Alvernia University	Social Sciences	Paper
Dyshanae	Brown	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Artwork
Daniel	Brown*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Eric	Budesheim*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Maria	Bustamante	10:00 - 10:50 AM	MSU 183	Alvernia University	Education	Paper
Haley	Bylina	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Ana	Cadiz	10:00 - 10:50 AM	MSU 324	Reading Area Community College	Humanities	Paper
Macao	Cardinale Kwik*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Lillian	Carney	12:30 - 1:30 PM	MSU 218	Albright College	Social Sciences	Poster

First	Last	Time slot	Room	College/University	Category	Format
Abigail	Casner	9:00 - 10:00 AM	MSU 218	Kutztown University	Education	Poster
Tyler	Cebular	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Tim	Cescon	1:00 - 2:00 pm	MSU 116	Reading Area Community College	Art, Visual & Creative	Short Film
Tim	Cescon*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Tim	Cescon*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Taisha	Charles	9:00 - 10:00 AM	MSU 218	Albright College	Social Sciences	Poster
Jacob	Charsky	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Julianne	Chen	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Alexandra	Chierichella	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Yonjae	Choi	12:00 - 12:50 pm	MSU 323	Penn State Berks	Social Sciences	Paper
Elizabeth	Churchill	12:00 - 12:50 pm	MSU 324	Albright College	Humanities	Paper
Emily	Clapper*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Vera	Clauser*	1:00 - 2:00 pm	MSU 116	Kutztown University	Art, Visual & Creative	Short Film
Alexis	Clement	9:00 - 9:50 AM	MSU 323	Kutztown University	Social Sciences	Paper
Lauren	Conrad	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Kyle	Conrad*	1:00 - 2:00 pm	MSU 116	Reading Area Community College	Art, Visual & Creative	Short Film
Kyle	Conrad*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Olivia	Console	1:00 pm - 1:50 PM	MSU 323	Albright College	Social Sciences	Paper
Arianna	Cruz	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Ashlee	Davies*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Kelsey	DeAcosta*	9:00 - 9:50 AM	MSU 183	Kutztown University	Mathematics	Paper
Katryn-Dare	DeCola	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Corinne	Deichmeister	9:00 - 10:00 AM	MSU 218	Kutztown University	Art, Visual & Creative	Artwork
Sarah	Deller*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Gabriella	DeMarco	12:30 - 1:30 PM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Melvin	Diaz	12:00 - 12:50 pm	MSU 324	Alvernia University	Humanities	Paper
Kimberly	Diaz	12:30 - 1:30 PM	MSU 218	Reading Area Community College	Social Sciences	Poster

First	Last	Time slot	Room	College/University	Category	Format
Troy	Dietrich	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Emma	Diliberti*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Xiomara	Dominguez	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Olivia	Donnini	12:30 - 1:30 PM	MSU 218	Kutztown University	Social Sciences	Poster
Dillon	Drane*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Shantelle	Duarte	9:00 - 10:00 AM	MSU 218	Penn State Berks	Health Sciences	Poster
Shantelle	Duarte*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Samantha	Dunlap	10:00 - 10:50 AM	MSU 324	Kutztown University	Humanities	Paper
Gianna	Ellis	9:00 - 9:50 AM	MSU 322	Immaculata University	Health Sciences	Paper
Peter	English	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Caleb	Erb*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Austin	Evans*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Jocelyn	Ewing	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Kevaughn	Ferguson	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Kevaughn	Ferguson*	9:00 - 10:00 AM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Nicholas	Ferretti*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Isabella	Fidler	9:00 - 10:00 AM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Robert	Fife	9:00 - 9:50 AM	MSU 322	Alvernia University	Health Sciences	Paper
Martalee	Fiori	9:00 - 10:00 AM	MSU 218	Reading Area Community College	Social Sciences	Poster
Abby	Fiorilla	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Casey	Flack	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Ethan	Flanagan	1:00 - 2:15 PM	MSU 324	Kutztown University	Humanities	Paper
Anthony	Florkowski	9:00 - 10:00 AM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Anthony	Florkowski*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Jordan	Folks	10:00 - 10:50 AM	MSU 324	Kutztown University	Humanities	Paper
Tyler	Fox	2:00 - 3:00 PM	MSU 323	Reading Area Community College	Humanities	Paper
Lacey	Franklin Foreman	2:00 - 3:00 PM	MSU 325	Albright College	Art, Visual & Creative	Paper

First	Last	Time slot	Room	College/University	Category	Format
Mariama	Gackou	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Shaili	Galan*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Jose	Galindo	2:00 - 3:00 PM	MSU 325	Alvernia University	Art, Visual & Creative	Paper
Sinead	Gallagher*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Abigail	Gardula*	1:00 - 2:00 pm	MSU 116	Kutztown University	Art, Visual & Creative	Short Film
Marykate	Geppert	8:45 AM - 9:50 AM	MSU 116	Kutztown University	Education	Paper
Christian	Gigliano*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Laurel	Gingrich	10:00 - 10:50 AM	MSU 323	Albright College	Humanities	Paper
Муа	Glogovics	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Poster
Sophia	Glover	10:00 - 10:50 AM	MSU 183	Reading Area Community College	Education	Paper
Imani	Gonzalez	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Poster
Hailey	Goodwin	9:00 - 9:50 AM	MSU 183	Kutztown University	Mathematics	Paper
Nysair	Green	1:00 - 2:00 pm	MSU 116	Albright College	Art, Visual & Creative	Short Film
Brock	Griesemer	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Evan	Grim*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Anthony	Grim*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Stefanie	Guenther	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Daniel	Guydik*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Truc Phuong	На	9:00 - 10:00 AM	MSU 218	Albright College	Art, Visual & Creative	Artwork
Ashhad	Hanafi*	9:00 - 9:50 AM	MSU 183	Kutztown University	Mathematics	Paper
Reilly	Hannan	2:00 - 3:00 PM	MSU 322	Kutztown University	Humanities	Paper
Asher	Hardin	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Daniel	Harding*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Quinton	Hartert	9:00 - 10:00 AM	MSU 218	Kutztown University	Social Sciences	Poster
Alisa	Hasanaj*	9:00 - 10:00 AM	MSU 218	Albright College	Social Sciences	Poster
Hanna	Hedrick	12:30 - 1:30 PM	MSU 218	Alvernia University	Health Sciences	Poster
Stephanie	Hegedus	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Poster

First	Last	Time slot	Room	College/University	Category	Format
Erin	Horack	1:00 - 1:50 PM	MSU 322	Penn State Berks	Natural & Physical Sciences	Paper
Erin	Horack*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Health Sciences	Poster
Isabelle	Hovel	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Jamilah	Hyman	2:00 - 3:00 PM	MSU 323	Albright College	Humanities	Paper
Ariana	Irwin	12:30 - 1:30 PM	MSU 218	Reading Area Community College	Social Sciences	Poster
Finn	Jackson	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Finn	Jackson	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Mackenzie	Jackson	9:00 - 10:00 AM	MSU 218	Alvernia University	Mathematics	Poster
Naja	Jackson*	12:30 - 1:30 PM	MSU 218	Albright College	Social Sciences	Poster
Kamiah	Jean	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Artwork
Meghan	Johns	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Emily	Johnson	2:00 - 3:00 PM	MSU 322	Reading Area Community College	Humanities	Paper
Asha	Johnson	9:00 - 10:00 AM	MSU 218	Albright College	Business	Poster
Lexus	Jordan*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Shannon	Keller	8:45 AM - 9:50 AM	MSU 324	Kutztown University	Natural & Physical Sciences	Paper
Emily	Kemler*	12:30 - 1:30 PM	MSU 218	Alvernia University	Health Sciences	Poster
Emily	Kiefer	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Orion	Kirkpatrick	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Maggie	Kline	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Kathryn	Kuerschner	9:00 - 10:00 AM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Ethan	Kuhn	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Ethan	Kuhn*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Giovanna	La Spisa	12:30 - 1:30 PM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Eva	Labram	12:30 - 1:30 PM	MSU 218	Kutztown University	Art, Visual & Creative	Artwork
Thomas	Lasher	10:00 - 10:50 AM	MSU 322	Kutztown University	Business	Paper
Carlen	Lazar	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Leila	Lipscomb*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster

First	Last	Time slot	Room	College/University	Category	Format
Leila	Lipscomb*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Vihn	Lu*	1:00 - 1:50 PM	MSU 322	Penn State Berks	Natural & Physical Sciences	Paper
Quang	Lu*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Health Sciences	Poster
Olivia	Lugo	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Beau	Ma	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Meghan	Mackle*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Kristy Jo	Mahoney	1:00 - 2:00 pm	MSU 116	Kutztown University	Art, Visual & Creative	Short Film
Angelica	Malone	12:00 - 12:50 PM	MSU 322	Albright College	Health Sciences	Paper
Gabrielle	Maramag	9:00 - 10:00 AM	MSU 218	Kutztown University	Social Sciences	Poster
Arianna	Marcucci	12:00 - 12:50 PM	MSU 323	Albright College	Social Sciences	Paper
Madeline	Marous	12:30 - 1:00 pm	MSU 183	Penn State Berks	Art, Visual & Creative	Performance
Kahlisha	Martin*	9:00 - 9:50 AM	MSU 325	Kutztown University	Art, Visual & Creative	Paper
Veloie	Mastrocola	12:30 - 1:30 PM	MSU 218	Albright College	Humanities	Poster
Ashley	Mattern	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Ashley	McCurdy	9:00 - 10:00 AM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Juliette	Mcilvride	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Victoria	Meier	8:45 AM - 9:50 AM	MSU 116	Kutztown University	Education	Paper
Hugo	Mendez	8:45 AM - 9:50 AM	MSU 116	Reading Area Community College	Education	Paper
Sarah	Mengel	12:30 - 1:00 pm	MSU 183	Kutztown University	Art, Visual & Creative	Performance
Jhon	Mercado	1:00 - 1:50 PM	MSU 322	Alvernia University	Natural & Physical Sciences	Paper
Samantha	Mikos	9:00 - 10:00 AM	MSU 218	Kutztown University	Health Sciences	Poster
Adam	Miller	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Jules	Miller	12:00 - 1:15 PM	MSU 325	Albright College	Social Sciences	Paper
John	Miller	12:30 - 1:30 PM	MSU 218	Albright College	Natural & Physical Sciences	Poster
Nicholas	Miller*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
R-E	Miller*	9:00 - 10:00 AM	MSU 218	Kutztown University	Art, Visual & Creative	Poster
Grace	Miloszar	12:30 - 1:30 PM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster

First	Last	Time slot	Room	College/University	Category	Format
Logan	Minford	10:00 - 10:50 AM	MSU 116	Alvernia University	Humanities	Paper
Tiana	Mondesir*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Anthony	Mongeluzi	12:00 - 1:15 PM	MSU 325	Alvernia University	Social Sciences	Paper
Adrianna	Moore	9:00 - 10:00 AM	MSU 218	Kutztown University	Social Sciences	Poster
Monique	Moore	9:00 - 10:00 AM	MSU 218	Albright College	Business	Poster
Tyler	Moran*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Bella	Morgalo	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Isabella	Morgalo	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Bella	Morgalo*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Dianna	Morganti*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
George	Mousa*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Christopher	Moyer*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Samuel	Murray	9:00 - 10:00 AM	MSU 218	Kutztown University	Mathematics	Poster
Mara	Nagle*	1:00 - 2:00 pm	MSU 116	Reading Area Community College	Art, Visual & Creative	Short Film
Mara	Nagle*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Mara	Nagle*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Ali	Naqvi	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Rebekah	Nerius*	2:00 - 3:00 PM	MSU 322	Kutztown University	Humanities	Paper
Kyle	Newman	10:00 - 10:50 AM	MSU 322	Kutztown University	Business	Paper
Kimberly	Nicholas	10:00 - 10:50 AM	MSU 325	Penn State Berks	Social Sciences	Paper
Jennifer	Nitka	9:00 - 10:00 AM	MSU 218	Reading Area Community College	Business	Artwork
Olivia	Oatman	12:30 - 1:30 PM	MSU 218	Albright College	Computer Science & Information Technology	Poster
Olivia	Oatman	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Poster
Emily	Olafson	10:00 - 10:50 AM	MSU 323	Reading Area Community College	Social Sciences	Paper
Caitlin	O'Leary*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Octavio	Orona*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Amanda	Outland	10:00 - 10:50 AM	MSU 322	Albright College	Business	Paper

First	Last	Time slot	Room	College/University	Category	Format
Samantha	Oxenreider	12:00 - 1:15 PM	MSU 325	Penn State Berks	Social Sciences	Paper
Felicia	Oyekola	2:00 - 3:00 PM	MSU 325	Albright College	Art, Visual & Creative	Paper
William	Parker*	9:00 - 10:00 AM	MSU 218 Lobby by	Penn State Berks	Engineering	Poster
Dale	Parson	9:00 - 2:00 pm	MSU 218	Kutztown University	Art, Visual & Creative	Short Film
Johnathan	Parsons*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Colin	Payne	10:00 - 10:50 AM	MSU 325	Alvernia University	Computer Science & Information Technology	Paper
Patrick	Perrin	9:00 - 10:00 AM	MSU 218	Kutztown University	Computer Science & Information Technology	Poster
Hayden	Perrone	9:00 - 9:50 AM	MSU 322	Penn State Berks	Health Sciences	Paper
Tyler	Perry	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Samantha	Peterson	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Jenna	Philippe	9:00 - 10:00 AM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Jeremy	Philippe	9:00 - 10:00 AM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Cortney	Phillips	9:00 - 9:50 AM	MSU 325	Kutztown University	Art, Visual & Creative	Paper
Timothy	Piergiovanni*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Hannah	Plowmaker	9:00 - 10:00 AM	MSU 218	Albright College	Social Sciences	Poster
Alexandru	Popescu*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Mijon	Powell	12:30 - 1:30 PM	MSU 218	Albright College	Social Sciences	Poster
Elisa	Rivera	9:00 - 10:00 AM	MSU 218	Kutztown University	Social Sciences	Poster
Abby	Robinson	12:30 - 1:30 PM	MSU 218	Albright College	Natural & Physical Sciences	Poster
Brenna	Robinson	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Alina	Rodriguez	10:00 - 10:50 AM	MSU 325	Penn State Berks	Computer Science & Information Technology	Paper
Xavian	Rodriguez	9:00 - 10:00 AM	MSU 218	Penn State Berks Reading Area	Engineering	Poster
Emma	Rothermel	1:00 - 2:30 pm	MSU 183	Community College	Art, Visual & Creative	Performance
Emma	Rothermel*	1:00 - 2:30 pm	MSU 183	Reading Area Community College	Art, Visual & Creative	Performance
Jennifer	Rubio Florian	2:00 - 3:00 PM	MSU 322	Kutztown University	Humanities	Paper
Daniel	Rumsey	9:00 - 2:00 pm	MSU Upperlevel	Kutztown University	Art, Visual & Creative	Artwork
Daniel	Rumsey	12:30 - 1:30 PM	MSU 218	Kutztown University	Art, Visual & Creative	Artwork

First	Last	Time slot	Room	College/University Reading Area	Category	Format
Juan	Salas*	1:00 - 2:30 pm	MSU 183	Community College	Art, Visual & Creative	Performance
Annmarie	Sanderson	9:00 - 10:00 AM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Michael	Sangirardi	1:00 - 2:15 PM	MSU 324	Kutztown University	Humanities	Paper
Kristin	Santana	12:30 - 1:30 PM	MSU 218	Immaculata University	Social Sciences	Poster
Evan	Santos	12:30 - 1:30 PM	MSU 218	Kutztown University	Humanities	Poster
Rika	Sato	2:00 - 3:00 PM	MSU 325	Albright College	Social Sciences	Paper
Zoe	Satterthwaite	12:00 - 1:15 PM	MSU 325	Albright College	Social Sciences	Paper
Nicole	Scarle	12:30 - 1:30 PM	MSU 218	Alvernia University	Health Sciences	Poster
Leon	Sconion	10:00 - 10:50 AM	MSU 116	Albright College	Humanities	Paper
Samantha	Seador	9:00 - 10:00 AM	MSU 218	Albright College	Natural & Physical Sciences	Poster
Hannah	Sellers*	12:30 - 1:30 PM	MSU 218	Kutztown University	Natural & Physical Sciences	Poster
Reem	Shadid	1:00 pm - 1:50 PM	MSU 323	Albright College	Social Sciences	Paper
Brandon	Shankweiler*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
David	Shultz*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Grace	Silva	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Noah	Simpson*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Kealey	Smith*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Sherrin	Smith	10:00 - 10:50 AM	MSU 116	Alvernia University	Humanities	Paper
Jaymi	Smith	1:00 pm - 1:50 PM	MSU 323	Penn State Berks	Social Sciences	Paper
Emma	Smith	9:00 - 10:00 AM	MSU 218	Kutztown University	Art, Visual & Creative	Poster
Emma	Smith	10:00 - 10:50 AM	MSU 183	Kutztown University	Art, Visual & Creative	Film
Kierra	Smith	9:00 - 10:00 AM	MSU 218	Albright College	Social Sciences	Poster
Madelyn	Snader*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Dylan	Sokolovich	12:00 - 12:50 PM	MSU 324	Albright College	Humanities	Paper
Derek	Stoe	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
David	Straulescu	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Andrew	Straulescu	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster

First	Last	Time slot	Room	College/University	Category	Format
lenicy	Strong*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Olivia	Sullivan*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Natural & Physical Sciences	Poster
Ethan	Szekers*	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
lason	Tai	9:00 - 10:00 AM	MSU 218	Albright College	Humanities	Poster
Nathan	Tam	9:00 - 10:00 AM	MSU 218	Penn State Berks	Health Sciences	Poster
Alexis	Taylor	1:00 - 1:50 PM	MSU 322	Alvernia University	Natural & Physical Sciences	Paper
oshua	Templin	1:00 - 2:15 PM	MSU 324	Albright College	Humanities	Paper
Matthew	Thibault	2:00 - 3:00 PM	MSU 323	Alvernia University	Humanities	Paper
Michael	Thomas	9:00 - 9:50 AM	MSU 323	Albright College	Social Sciences	Paper
Meaghan Alex)	Torres	12:30 - 1:30 PM	MSU 218	Kutztown University	Art, Visual & Creative	Artwork
Alexander	Torzone	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Кia	Vang*	9:00 - 9:50 AM	MSU 325	Kutztown University	Art, Visual & Creative	Paper
acob	Vanisko*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Albert	Vargas	1:00 - 2:15 PM	MSU 324	Alvernia University	Humanities	Paper
Hannah	Ververs	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
⁄arali	Villar	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Ionathan	Vo*	12:30 - 1:30 PM	MSU 218	Alvernia University	Health Sciences	Poster
Michaela	Walker	12:00 - 12:50 PM	MSU 322	Alvernia University	Health Sciences	Paper
Dylan	Walter*	9:00 - 9:50 AM	MSU 322	Immaculata University	Health Sciences	Paper
Richard	Walters*	12:30 - 1:30 PM	MSU 218	Penn State Berks	Engineering	Poster
Emily	Wang	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Grace	Wanner	8:45 AM - 9:50 AM	MSU 324	Alvernia University	Natural & Physical Sciences	Paper
Amina	Watson	12:30 - 1:30 PM	MSU 218	Albright College	Art, Visual & Creative	Artwork
.auren	Weiss	8:45 AM - 9:50 AM	MSU 116	Kutztown University	Education	Paper
onathan	Weiss*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Alexandra	Weitzel	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Abby	Wheeler	8:45 AM - 9:50 AM	MSU 324	Kutztown University	Natural & Physical Sciences	Paper

First	Last	Time slot	Room	College/University	Category	Format
Kayla	Williams	12:30 - 1:30 PM	MSU 218	Alvernia University	Natural & Physical Sciences	Poster
Brandon	Williams*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Julia	Winkler	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Douglas	Wise	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Austin	Witinski	9:00 - 9:50 AM	MSU 183	Penn State Berks	Engineering	Paper
Trevor	Wylezik	9:00 - 9:50 AM	MSU 183	Kutztown University	Mathematics	Paper
Cassidy	Yanarella	12:30 - 1:30 PM	MSU 218	Penn State Berks	Social Sciences	Poster
Chanellor	Yenser*	9:00 - 10:00 AM	MSU 218	Penn State Berks	Engineering	Poster
Alyssa	Yoder	9:00 - 10:00 AM	MSU 218	Alvernia University	Health Sciences	Poster
Jake	Youse	9:00 - 10:00 AM	MSU 218	Kutztown University	Art, Visual & Creative	Poster
Amy	Yu	12:30 - 1:30 PM	MSU 218	Penn State Berks	Art, Visual & Creative	Artwork
Alettya	Zalapa-Alonso	9:00 - 10:00 AM	MSU 218	Alvernia University	Humanities	Poster
Erica	Zielinski	9:00 - 10:00 AM	MSU 218	Albright College	Business	Poster

