



ANNUAL GRANTEE RECEPTION

Celebrating Faculty and Staff Principal Investigators and Project Directors



May 4, 2022



Bucknell
UNIVERSITY

M. LAURA BENINATI

Associate Professor of Mechanical Engineering

- **Projects:**
 - “Tidal Energy: senior design”
 - “Test Rig: senior design”
- **Sponsors:** Adaptide; ExxonMobil



ELLEN CHAMBERLIN

Assistant Professor of Geology & Environmental Geosciences

- **Project:**
“Understanding the Controls on Scroll Bar Morphology and Spacing: Evaluating the Relationship between Channel and Scroll Bar Properties in Rivers with Migrating Chute Channels”
- **Sponsor:** American Chemical Society Petroleum Research Fund, Undergraduate Research Grant



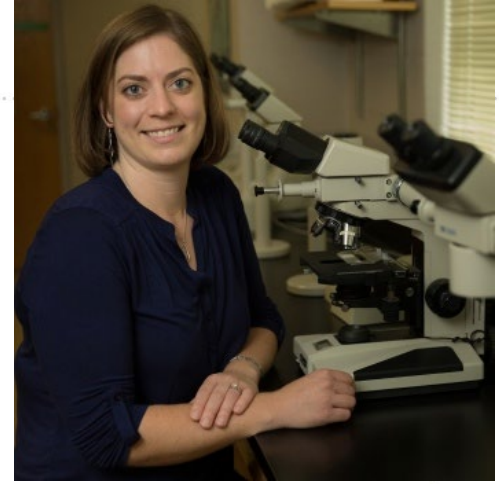
MORIA CHAMBERS

Assistant Professor of Biology

SARAH LOWER

Assistant Professor of Biology

- **Project:**
"Impact of life-stage on immune investment in the common eastern firefly"
- **Sponsor:** The Pittsburgh Foundation



ALAN CHEVILLE

Professor of Electrical Engineering,
T. Jefferson Miers Chair in Electrical Engineering

- **Projects:**
 - “Developing a National Framework for Recognition of Engineering and Engineering Technology Faculty Instructional Excellence”
 - “EEG Testing Suite: senior design”
 - “Drum Synthesizer: senior design”
- **Sponsors:** National Science Foundation; BrainScope; GLG1 Digital



SHANE COHEN

Director, Engineering Corporate Relations

- **Projects:**
Senior Design (multiple projects)
- **Sponsors:** Adaptide; AutoNation; BrainScope; Cabot Corporation; Corning; DeNovo Innovations; Discovery Machine Inc; Evergreen Cleaning Company; ExxonMobil; GLG1 Digital LTD; Jeff Dorst; JLG Industries; Keurig Dr Pepper; Lewisburg Children's Museum; MakiMaki Sushi; PepsiCo; PermaPure; Rusty Rail Brewing Company; Safe Roads; Union County Conservation District; Versabev Inc; West Rock



JEREMY CHOW

Assistant Professor of English

- **Project:**
“Animal Empires: Interspecies Contact Zones in the Global Eighteenth Century”
- **Sponsor:** Institute for Citizens and Scholars, Career Enhancement Fellowship



ANDREW CIOTOLA

Program Manager, Stadler Center for Poetry
and Literary Arts

CHET'LA SEBREE

Assistant Professor of English, Director of the
Stadler Center for Poetry and Literary Arts



- **Project:**
"PCA Arts Organizations & Arts Programs 2021-2022
Funding"
- **Sponsor:** Pennsylvania Council on the Arts



MATTHEW CLARK

Assistant Professor of Biology

- **Project:**
“Identification of neural circuits governing flight control in *Drosophila*”
- **Sponsor:** Charles E. Kaufman Foundation of the Pittsburgh Foundation, New Investigator Grant



RICHARD CRAGO

Professor of Civil & Environmental Engineering

JANINE GLATHAR

Digital Pedagogy & Scholarship Specialist, GIS & Spatial Thinking

- **Project:**
“America View through PA View 2021-2022 funding”
- **Sponsor:** U.S Geological Survey

DAVID DEL TESTA

Associate Professor of History

- **Project:**
“Judging a Sunset Empire: Martin Troyes as Military Magistrate in late French colonial Indochina and Algeria, 1945-1961”
- **Sponsor:** Gerda Henkel Foundation



LARA DICK

Associate Professor of Mathematics, Mathematics Education

- **Project:**
“Conducting research in Cyprus to explore how Mathematics teachers can use technology to help students learn more effectively”
- **Sponsor:** Fulbright U.S. Scholar Program, Bureau of Educational and Cultural Affairs of the U.S. State Department





JIAJIA DONG

Associate Professor of
Physics and Associate
Dean of Faculty,
Natural Sciences &
Mathematics



SUE ELLEN HENRY

Professor of Education



ABBY FLYNT

Associate Professor of
Mathematics
Statistics & Data
Science



ERIN JABLONSKI

Interim Dean of
Engineering

- **Project:**
"ADVANCE - Catalyst: AGREE: Self-Assessment of Gender, Racial,
and Ethnic Equity in STEM Faculty at Bucknell"
- **Sponsor:** National Science Foundation

DABRINA DUTCHER

Associate Professor of Chemistry, Chemical Engineering

BRIAN KING

Associate Professor of Computer Science

TIM RAYMOND

Professor of Chemical Engineering
Chemical Engineering Department Chair

- **Project:**
“Collaborative Research: Research at Undergraduate Institutions: The role of interactions between organic components on aerosol hygroscopicity”
- **Sponsor:** National Science Foundation



JENNIFER FIGUEROA

Director, International Student and Scholar Services

- **Project:**
"Knowledge at Your Fingertips"
- **Sponsor:** Projects for Peace



SAMUEL GUTEKUNST

John D. and Catherine T. MacArthur Assistant
Professor of Data Science

- **Project:**
"Computer and Information Science and Engineering (CISE) Research Initiation Initiative (CRII): Algorithmic Foundations: Research at Undergraduate Institutions: Breaking Ground on the Circulant Traveling Salesman Problem"
- **Sponsor:** National Science Foundation



SAMANTHA HART

Director, Institutional Equity & Title IX
Coordinator

LINDSEY HIGGINS

Interpersonal Violence Prevention and
Advocacy Coordinator

- **Project:**
"It's On Us to Speak UP Bucknell"
- **Sponsor:** Pennsylvania Department of Education



MATTHEW HIGGINS

Professor of Civil & Environmental Engineering

- **Projects:**

- "Evaluation of Intermediate Thermal Hydrolysis and Anaerobic Digestion Performance"
- "Oxnard Anaerobic Digesters Food Waste Implementation Project"
- "Co-Digestion of Blackbin Wastes at Silicon Valley Clean Water"

- **Sponsors:** Cambi Technology; Carollo Engineers; Silicon Valley, CA



DIANE JAKACKI

Digital Scholarship Coordinator

- **Project:**
“Evolving Hands: Building Workflows and Scalable Practices for Handwriting”
- **Sponsor:** National Endowment for the Humanities



PETER JANSSON

Associate Professor of Electrical Engineering,
Faculty Director of BCSE

- **Project:**
"Detection of the Mach Effect"
- **Sponsor:** Open Discourse Coalition



AMAL KABALAN

Assistant Professor of Electrical & Computer Engineering

- **Project:**
"A Handheld Detection Biosensor for Respiratory Pathogens in Young Children - Stage 2"
- **Sponsor:** Bucknell Geisinger Research Initiative



CHARLES KIM

Associate Professor of Mechanical Engineering

- **Projects:**
 - “Next Gen Thermocouple: senior design”
 - “Tracking System: senior design”
- **Sponsors:** Corning; JLG Industries



ERIC KENNEDY

Associate Professor of Biomedical Engineering

- **Project:**
"Playground Safety Certification Training"
- **Sponsor:** Department of Defense



D. BRET LERAUL

Assistant Professor of Comparative & Digital Humanities
Affiliated Faculty in Latin American Studies

- **Project:**
Regional Faculty Fellowship
- **Sponsor:** Wolf Center for the Humanities, University of Pennsylvania



VIVIEN LEUNG

Assistant Professor of Political Science

- **Project:**
"Asian American Responses to Stereotypes and Implications for Identity"
- **Sponsor:** American Political Science Association,
Advancing Research Grant for Early Career Scholars



ELENA MACHADO

John P. Crozer Chair of English Literature and
Professor of English
Affiliated Faculty in Latin American Studies

- **Project:**
"Staging Activism in US Latinx Theater"
- **Sponsor:** National Humanities Center Fellowship



KATHRYN MAGUET

Executive Director of the Weis Center

JOHANNA KODLICK

Director of Operations, Weis Center

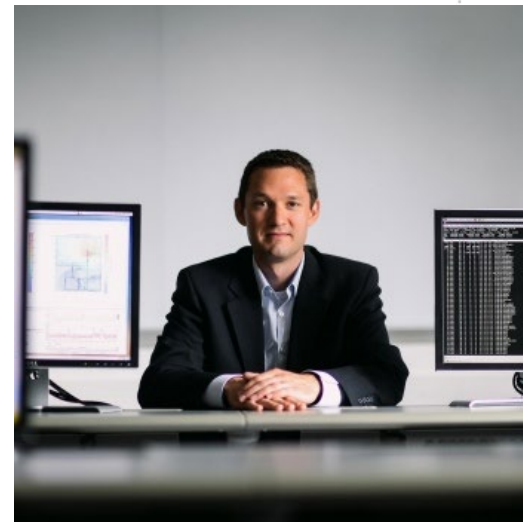
- **Projects:**
 - "Gamelan Cudamani"
 - "Ronald K Brown/ Evidence"
 - "PCA Arts Organizations & Arts Programs 2021-2022"
 - "ARP-NEA-Grants to the Arts"
 - "Micaela Taylor/TL Collective, including advance virtual and in-person residency activities for youth"
- **Sponsors:** Mid Atlantic Arts Foundation; Pennsylvania Council on the Arts; National Endowment for the Arts; Association of Performing Arts Presenters



ALAN MARCHIORI

Associate Professor of Computer Science

- **Projects:**
 - "Tool Analytics: senior design"
 - "GIS Population Composer: senior design"
 - "License Plate Notification: senior design"
 - "Financial Communications: senior design"
- **Sponsors:** JLG Industries; Discovery Machine LLC; AutoNation; Jeff Dorst



EMILY MARTIN

Ellen P. Williams Associate Professor in Music

- **Project:**
“Creative Career Thinking and Defining Success for the post-COVID-19 Artist (Netherlands)”
- **Sponsor:** Fulbright U.S. Scholar Program, Bureau of Educational and Cultural Affairs of the U.S. State Department



MATTHEW MCTAMMANY

Professor of Biology, Environmental Studies & Sciences

- **Project:**
"Little Arnot Run Large Wood Restoration Project, Allegheny National Forest Monitoring Benthic Macroinvertebrate Communities - 2022, 2023"
- **Sponsor:** U.S. Environmental Protection Agency



XIANNONG MENG

Professor of Computer Science

- **Project:**
“UI Simulation: senior design”
- **Sponsor:** Versabev Inc.





DARAKHSHAN MIR
Assistant Professor of
Computer Science



VANESSA MASSARO
Assistant Professor of
Geography



NATHAN RYAN
Professor of Mathematics
Affiliated Faculty in Latin
American Studies

- **Project:**
"Experiences of Algorithmic (Un)Fairness: Integrating qualitative and quantitative analysis to understand experiences of incarcerated individuals in Pennsylvania"
- **Sponsor:** Google Award for Inclusion Research

ELIF MISKIOGLU

Assistant Professor of Chemical Engineering

- **Project:**
"Collaborative Research: Research at Undergraduate Institutions: Engineers making process safety judgements...Mind the Gap! Beliefs vs. behavior"
- **Sponsor:** National Science Foundation



KEVIN MYERS

Professor of Psychology

- **Project:**
“Biobehavioral impacts of food insecurity in a rodent model”
- **Sponsor:** James McKeen Cattell Fund



KURT NELSON

Director, Religious & Spiritual Life

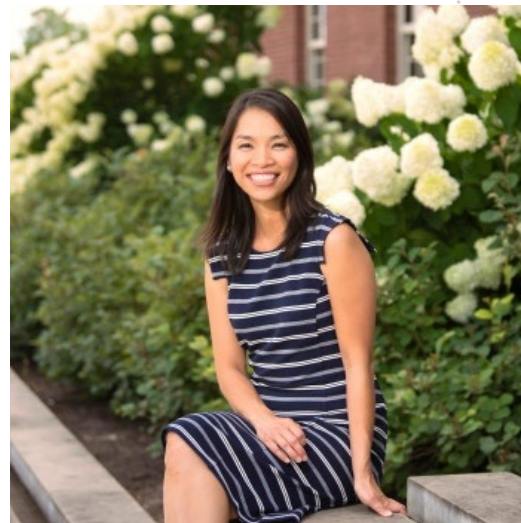
- **Project:**
 - “Implement the interfaith action plan created by Bucknell University at the Institute on Teaching and Learning for Campus-wide Interfaith Excellence”
 - “Interfaith Excellence – Supplemental funding”
- **Sponsor:** Interfaith Youth Core and American Association of Colleges and Universities



CHRISTINE NGO

Associate Professor of Economics

- **Project:**
“Duty and Dedication in the Time of Covid-19: Nurses, Hospitals, and the Future of Care”
- **Sponsor:** Bucknell Geisinger Research Initiative



JOHN PENNIMAN

National Endowment for the Humanities
Chair in the Humanities and Associate
Professor of Religious Studies

- **Project:**
“Revitalizing the Liberal Arts through the Health
Humanities Minor”
- **Sponsor:** National Endowment for the Humanities



MICHAEL PRINCE

Professor of Chemical Engineering

- **Projects:**
 - "Reimagine Play: Enhancing Fluid Flow and Pneumatic Learning Exhibit: senior design"
 - "Yeast Suppression: senior design"
 - "Fair Milk Reclamation : senior design"
- **Sponsors:** Lewisburg Children's Museum; Rusty Rail Brewing Company; Union County Conservation District



IAN PROUD

Engineering Innovation Manager

- **Project:**
“Sewer Inspection: senior design”
- **Sponsor:** DeNovo Innovations



DEEANN REEDER

Professor of Biology

- **Project:**
“Intelligently predicting viral spillover risks from bats and other wild mammals”
- **Sponsor:** National Institutes of Health



RICHARD RINEHART

Director, Samek Art Museum

- **Project:**
"PCA Arts Organizations & Arts Programs 2021-2022 funding"
- **Sponsor:** Pennsylvania Council on the Arts



NATHAN RYAN

Professor of Mathematics

Affiliated Faculty in Latin American Studies

- **Project:**
"In Costa Rica teaching college-level computational mathematics, researching number theory and collaborating on outreach projects to bring mathematics to local schoolchildren"
- **Sponsor:** Fulbright U.S. Scholar Program, Bureau of Educational and Cultural Affairs of the U.S. State Department



P. KHALIL SAUCIER

Professor of Critical Black Studies

- **Project:**
Visiting Scholar at The Pennsylvania State University
Humanities Institute
- **Sponsor:** The Pennsylvania State University



WILLIAM SCOTT

Assistant Professor, Mechanical Engineering

- **Project:**
"Auto Box Folder: senior design"
- **Sponsor:** MakiMaki Sushi



THIAGO SERRA

Assistant Professor of Analytics & Operations Management

- **Project:**
"Computer and Information Science and Engineering (CISE) Research Initiation Initiative (CRII): Robust Intelligence: Research at Undergraduate Institutions: Principled Methods for Compressing Neural Networks through Discrete Optimization and Polyhedral Theory"
- **Sponsor:** National Science Foundation



NATE SIEGEL

Associate Professor of Mechanical Engineering,
Mechanical Engineering Associate Co-Chair

- **Projects:**
 - "Crash Test System: senior design"
 - "Easy Pour: senior design"
- **Sponsors:** Safe Roads; Versabev Inc.



PAUL SIEWERS

Associate Professor of English

- **Projects:**
 - "Stories of the Civil War in the Susquehanna Valley"
 - "Churches of Coal Country"
 - "Dostoevsky Unplugged Podcast Series"
- **Sponsor:** Open Discourse Coalition



DEBORAH SILLS

Associate Professor of Civil & Environmental Engineering

- **Project:**
“Coupling life cycle assessment (LCA) and quantitative microbial risk analysis (QMRA) to estimate agro-environmental and human-health impacts for using organic waste streams to recover nutrients in agriculture”
- **Sponsor:** Binational Agricultural Research and Development Fund (BARD)



ANDREW SLOBODA

Assistant Professor of Mechanical Engineering

- **Projects:**
 - “Collaborative Research: Improving Engineering Students’ Ability to Model and Analyze Systems Using Free Body Diagrams”
 - “Kern Entrepreneurial Engineering Network 2021 National KEEN Rising Star Award”
- **Sponsors:** National Science Foundation; Kern Family Foundation



SARAH SMITH

Assistant Professor of Chemistry

- **Project:**
"Acquisition of Circular Dichroism (CD) Spectroscope"
- **Sponsor:** George I. Alden Trust



STEVEN STUMBRIS

Director of the Small Business Development Center

- **Projects:**

- "Bucknell University Incubators: Startup Lewisburg & Danville 2021"
- "PA ENGAGE 2021-2022"
- "PA Partnerships for Regional Economic Performance 2021 Funding"
- "Small Business Administration 2021 Funding"
- "Neighborhood Assistance Program Tax Credit 2021-2022: Creative COVID-19 Revitalization Initiative for Rural Small Businesses and Entrepreneurs"
- "Partnership for Regional Economic Performance (PREP) Digital Services COVID-19 Economic Recovery Initiative"

- **Sponsors:** Ben Franklin Technology Partners Northeast Pennsylvania; SEDACouncil of Governments; PREP; Pennsylvania Department of Community & Economic Development, U.S. Small Business Administration



IBRAHIM SULAI

Assistant Professor of Physics & Astronomy

- **Project:**
"Collaborative Research: Particle Astrophysics: Research at Undergraduate Institutions: Searches for Ultralight Bosonic Dark Matter with Atomic Magnetometer Networks"
- **Sponsor:** National Science Foundation



REBECCA SWITZER

Assistant Professor of Chemistry

- **Project:**
“Investigating the Impact of Disease-Associated Mutations on DNA Methyltransferase 1 Function”
- **Sponsor:** National Institutes of Health, Academic Research Enhancement Award (R15)



JONATHAN TORRES

Assistant Professor of Mechanical Engineering

- **Project:**
“Sewer Inspection: senior design”
- **Sponsor:** DeNovo Innovations



JANET VANLONE

Assistant Professor of Education

- **Project:**
“Trauma Informed Practices for Pre-Service Educators”
- **Sponsor:** McDowell Institute, Bloomsburg University



MARGOT VIGEANT

Robert L. Rooke Professor in Engineering and
Professor of Chemical Engineering

- **Projects:**
 - “Cold Brew: senior design”
 - “Enhanced Product: senior design”
- **Sponsors** Keurig Dr Pepper; PepsiCo



BRANDON VOGEL

Associate Professor of Chemical Engineering

- **Projects:**
 - “Carbon Black Feedstock Purification: senior design”
 - “Tank Mixing Design: senior design”
 - “Cleaning Product Design: senior design”
- **Sponsors:** Cabot Corporation; West Rock; Evergreen Cleaning Company



KAT WAKABAYASHI

Associate Professor of Chemical Engineering

- **Project:**
"Systematic Innovation with Solid-State Shear Pulverization of Polymeric Materials"
- **Sponsor:** Corning Incorporated



BENJAMIN WHEATLEY

Assistant Professor of Mechanical Engineering

- **Projects:**
 - “A new approach to characterizing human motor control architecture for improved stroke rehabilitation”
 - “Gas Dryer: senior design”
- **Sponsors:** Bucknell Geisinger Research Initiative; PermaPure



ZHIQUN ZHU

Professor of Political Science and International Relations

- **Project:**
“Travel to Queensland to study Australia’s relationship with the United States in the context of China’s rise as a global power, specifically with regard to trade”
- **Sponsor:** Fulbright U.S. Scholar Program, Bureau of Educational and Cultural Affairs of the U.S. State Department

