### 2025 McNair Summer Research Presentations

One component of the TRIO McNair Scholars Program is a 10-week summer research project. Each year, students work with a faculty mentor on a specific topic, culminating in a final paper and presentation. At the end of July, students will present their research at the 2025 National McNair Conference at UCLA. If you would like the opportunity to see these presentations at Augsburg, please join us on Wednesday, July 23, from 9:00am to 12:30pm in HC 150. This event is open to all students, faculty and staff. See below for a full list of presenters.

**Note**: Individual presentations are 10-12 minutes long. There will be time at the end of each group for questions and evaluations. Please arrive at the start of each group block to minimize disruptions during the presentations.

For a detailed presentation schedule with research titles, please see below.

#### Group 1 (SSHA): 9:00 - 9:55am

### Isaiah Roufs, Psychology

The Role of MPQ Absorption in Resting-State Alpha EEG in Response to Nature

Mentors: Henry Yoon, Ph.D & Ben Denkinger, Ph.D

### Bethsaida Garcia, Biopsychology & Chemistry

P3b Amplitude and History of Multi-Substance Use in Emerging Adults

Mentors: Henry Yoon, Ph.D & Ben Denkinger, Ph.D

#### Jessica Agudo, Clinical-Counseling Psychology

False Confessions: Investigating Vulnerabilities to Wrongful Convictions

Mentor: Ben Denkinger, Ph.D

#### Jaimie Sinche, Sociology

Barreras Entre Éxito: The Experiences of Latino First-Generation College Students

Mentor: Dr. James Vela-McConnell

## Group 2 (NSMSCS): 10:05 - 11:10am

### Mahamed Yusuf, Biology

Synthesis of limonene and alpha-pinene Derivatives

Mentor: Dr. David R. Hanson

## Anthony Vassallo, Biology

How does particle composition affect organic aerosol?

Mentor: Dr. David R. Hanson

### Luis Millan, Biology

Does Manganese Exposure Cause Changes in Gene Expression in Daphnia?

Mentor: Dr. Matthew L. Beckman

### Ethiopia Kebede, Physics

Identifying Electromagnetic Ion Cyclotron (EMIC) waves using a Convolutional Neural Network (CNN)

Mentor: Dr. Mark Engebretson

### Group 3 (NSMSCS): 11:20am - 12:05pm

#### Laura Chavez, Economics

Contributing Factors of the Service Sector Growth in Developing Economies: A quantitative analysis in developing countries

Mentor: Dr. Ibrahim Keita

# **Hamze Moktar, Computer Science**

Semantic Similarity in Computer Programs Using Large Language Models (LLMs)

Mentor: Dr. Nimanthi Atukorala

# **Armand Bashige, Computer Science**

Enhancing ML Prediction with Ensemble Models

Mentor: Dr. Sayantica Pattanayak