# THE MATH ALLIANCE



DR. DAVID GOLDBERG

Director

As we move into May there is that spring energy in the air. If you are on a college or university campus, it is almost a supernatural force that seems to, no pun intended, spring up around you. Spring is always the season for hope and optimism, and I hope we are all finding ways to be at least a little optimistic, despite the challenges we face in this moment.

Since no one likes a long lecture at the end of the spring term, I will keep it brief. Please keep nominating students for the Facilitated Graduate Admissions Procedure (F-GAP). This is our most important and most successful program, and it runs on the strength of the community we have built together, so let's all stay engaged. We are looking forward to the Career Paths Workshop at the end of this month in Chicago. We have worked hard with our partners at the Institute for Mathematical and Statistical Innovation (IMSI) to put together another dynamic event.

#### Save the Date:

2025 Field of Dreams Conference November 7-9 Atlanta, GA

There will several interesting talks and panels, and a banquet address given by Raegan Higgins, Texas Tech, and President of the Association for Women in Mathematics.

Finally look for announcements about the Field of Dreams Conference coming soon.

Hope everyone's semester (or quarter) is wrapping up nicely, and you are finding ways to keep positive and centered.

## What's Happening Next?

- <u>Career Paths in the Mathematical Sciences</u>
   <u>Workshop</u> Univ. of Chicago, May 29-30, 2025
- 2025 Field of Dreams Conference (FOD 2025)
   Atlanta, GA, November 7-9, 2025

## **ICERM Workshop**

ICERM welcomes participant applications for a topical workshop, "Uncertainty Quantification for Mathematical Biology", held during May 5-9, 2025, on-site at ICERM in Providence, RI, USA.

Workshop details: <a href="mailto:icerm.brown.edu/program/topical\_workshop/tw-25-uqmb">icerm.brown.edu/program/topical\_workshop/tw-25-uqmb</a>

The core goal of this workshop is to foster research and community collaborations at the intersection of computational and mathematical biology, UQ algorithms, and data-driven learning. This workshop aims to galvanize advancements across these fields. The week-long event will feature speakers, tutorials, panel and small-group discussions, and a poster session.

ICERM welcomes applications from faculty, postdocs, graduate students, industry scientists, and other researchers who wish to participate. To apply to attend, please submit an application through the website linked above. Some funding may be available for travel and lodging.

# Short Courses on Obesity, Mathematics, and Causal Inference in Summer 2025!

We invite you to join us at one or both of our in-person NIH-funded short courses being hosted Summer 2025.

Strengthening Causal Inference in Behavioral Obesity Research Dates: Monday, May 12th through Friday May 16th, 2025 Format: In person at University of Alabama at Birmingham (Birmingham, AL)

Course description: Identifying causal relations among variables is fundamental to science. Obesity is a major problem for which much progress in understanding, treatment, and prevention remains to be made. Understanding which social and behavioral factors cause variations in adiposity is vital to producing, evaluating, and selecting intervention and prevention strategies. In addition, developing a greater understanding of obesity's causes requires input from diverse disciplines including statistics, economics, psychology, epidemiology, mathematics, philosophy, and behavioral or statistical genetics. However, applying techniques from these disciplines does not involve routine well-known 'cookbook' approaches. Rather, an understanding of the underlying principles is required so that the investigator can tailor approaches to specific and varying situations.

To apply: Visit our course site at <u>Strengthening Causal Inference in Behavioral Obesity Research</u>

The Mathematical Sciences in Obesity Research
Dates: Monday, July 21st through Friday July 25th, 2025

Format: In person at the B1G Ten Conference Center (Rosemont, IL near O'Hare International Airport)

Course description: The mathematical sciences including engineering, statistics, computer science, physics, econometrics, psychometrics, epidemiology, and mathematics qua mathematics are increasingly being applied to advance our understanding of the causes, consequences, and alleviation of obesity. These applications do not merely involve routine, well-established approaches easily implemented in widely available commercial software. Rather, they increasingly involve computationally demanding tasks, use and development of novel analytic methods and software, new derivations, computer simulations, and unprecedented interdigitation of two or more existing techniques. Such advances at the interface of the mathematical sciences and obesity research require bilateral training and exposure for investigators in both disciplines.

**To apply:** Visit our course site at **The Mathematical Sciences in Obesity** 

Spaces are limited to encourage more engagement among participants and with course faculty, so apply soon. Persons of all genders, race/ethnicities, and ability/disability statuses are strongly encouraged to apply.

#### SCHOLARSHIP OPPORTUNITES ARE AVAILABLE

We look forward to seeing you this summer! Sincerely,

David Allison, PhD, Indiana University

Andrew Brown, PhD, University of Arkansas for Medical Sciences, Arkansas Children's Research Institute

Diana Thomas, PhD, USMA West Point Military Academy Kevin Fontaine, PhD, University of Alabama at Birmingham



# NASHVILLE, TN AUGUST 3-6 2025



#### **KEY DATES**

The 2025 Diversity Mentoring
Program brings historically
underrepresented students,
scholars, and junior
professionals together with
senior statisticians at the Joint
Statistical Meetings

Forms go live on the website

Applications are due

Application results announced

Welcome to Nashville for DMP 2025!

**CONTACT:** 

Dr. Prince Allotey: <u>princeallotey14@gmail.com</u>
Dr. Madhu Mazumdar: mam2073@gmail.com

# Paid Summer Research, Graduate Fellowships, and Graduate programs!

# For Undergraduates

Paid Summer 2025 Undergraduate Research Placements: Over 700+ programs – NSF REU, NASA, NIH and other paid summer research opportunities for undergrads



## For Financial Support in Graduate School

Fellowships and graduate programs in a wide variety of STEM disciplines



For tips on Applying and Associated Resources



