Thoughts from the Director...

David Goldberg
Executive Director of the Math Alliance

I hope everyone has enjoyed May, and the Memorial Day Weekend always marks the beginning of a lot of summer activity. I often find this is the time I realize the spring semester has been in the books for close to a month, which means my break from teaching is almost 1/3 over! Like many, I am looking forward to something closer to a normal summer, as compared to the last two, though not yet back to "before times". There will be conferences in person and other trips to see family and friends, while still having to acknowledge we are not free from the pandemic and need to continue to limit the risk to others, especially the most vulnerable among us. We also have to be sure to take care of ourselves and our state of mind, and to keep looking at a brighter future for everyone.

We are accepting nominations for F-GAP. We are very proud of this program, which has consistently placed about 75 students in graduate programs each year. Mentors, you received some e-mails which described some changes to the nomination process, and I hope you'll take a moment to think about what students you know should be in this program. If you have students you are advising on summer projects (say REUs) and they should be in F-GAP, be sure to start the process as soon as possible. F-GAP students who are accepted early enough will be invited to be part of the Career Paths Workshop at IMA. If you nominate a student who is accepted into F-GAP, you'll be invited to the workshop as well. This will be our first in-person Math Alliance activity since February 2020, so I am very excited about that and looking forward to meeting our students and mentors there. Also, **only F-GAP students will be invited to this year's Field of Dreams Conference.** So, if you know students in our target group who will be applying to graduate school for fall 2023, you want to be sure they are in F-GAP.

Speaking of Field of Dreams, I am very pleased to announce our Keynote Speaker at this year's conference will be Federico Ardila of San Francisco State University. Professor Ardila has been a Math Alliance Mentor for several years, and has contributed in so many ways to our community and to efforts to broaden participation in STEM. I am sure his will be a very memorable talk. We'll be announcing our other plenary speakers for this year's conference soon.

I hope everyone is going to enjoy the coming summer and we are looking forward to seeing folks at the summer workshop and the Field of Dreams!

Javier Rojo appointed Associate Director for Biostatistics and Data Science

We are pleased to announce that Javier Rojo, Professor of Epidemiology and Biostatistics, and a Dean's Eminent Scholar at Indiana University, has agreed to serve as the Math Alliance Associate Director for Biostatistics and Data Science.

Professor Rojo is very well known in the quantitative science community for his outstanding research and efforts to enhance diversity in a broad range of STEM fields. For many years he has been the Director of the [RUSIS program](#), which was recognized with the [2014 AMS Programs that Make a Difference Award.](#)

He is the recipient of many awards, including the 2018 Etta Z. Falconer Award, the 2020 SACNAS Distinguished Scientist Award, and the 2010 ASA Don Owen Award. He has served the profession in several capacities, including a term as a Program Director at NSF.

As we expand and grow our relationship with biostatistics programs, computational life science programs, and industries (like pharmaceuticals and materials manufacturing), where biostatistics and data science play such a critical role, we are lucky to have someone with the breadth of knowledge and experience of Professor Rojo to provide us with advice and direction. Welcome aboard!!

2023-24 IAS School of Mathematics Applications Now Open!

IAS School of Mathematics
2023-2024 Applications Now Open
Deadline for submission is December 1, 2022

With generous support from the National Science Foundation, the IAS School of Mathematics selects approximately 85 Members per year. The School welcomes applications from mathematicians and theoretical computer scientists at all career levels, and strongly encourages applications from underrepresented groups and mid-career scientists (6-15 years from Ph.D.). Competitive salaries, on campus housing, and other resources are available for researchers in all mathematical subject areas.

Most positions are for one or two terms, but for applicants who cannot leave their jobs or families for an entire term, the School now offers a special two-month membership option.

In 2023–2024, there will be a special-year program, p-Adic Arithmetic Geometry, organized by Jacob Lurie and Bhargav Bhatt; however, membership will not be limited to mathematicians in this field.

More information can be found here: https://www.ias.edu/math/apply/membership.

SIAM Announces the 2022 Class of MGB-SIAM Early Career Fellows

[Society for Industrial and Applied Mathematics](#) (SIAM) announced the inaugural class of MGB-SIAM Early Career (MSEC) Fellows. You can see the full article [here](#).

SIAM selected 10 members and we are very proud to say that **6 of them are Math Alliance Scholars:**

[Kyle Dahlin](#)

[Ranthony A.C. Edmonds](#)

[Reginald L. McGee II](#)

[Iván Ojeda-Ruiz](#)

[Joan Ponce](#)

[Oyita Udiani](#)

Congratulations to all of them for being selected for this fellowship!

Harris-Stowe State University To Participate in the 2022 STEM For All Video Showcase

STEM Growth "Beyond" the Classroom- An Institutional Effort from Harris-Stowe State University will be featured May 10th-17th at https://stemforall2022.videohall.com/

Dr. Ann Podleski, Professor of Mathematics at Harris-Stowe State University, will be featured in the 2022 STEM for All Video Showcase funded by the National Science Foundation. The event will be held online May 10th - 17th at https://stemforall2022.videohall.com.

The presentation, entitled "STEM Growth "Beyond" the Classroom- An Institutional Effort," looks at the perspectives and experiences of students who participated in the Minority Science and Engineering Improvement Program, which created a unique learning community with a cohort of students involved in academic activities outside the classroom. This on-campus academic engagement enhanced faculty-student relationships, helped students discover their interests, and developed strong career goals. The project was funded by the Department of Education - Minority Science and Engineering Improvement Program (MSEIP). You can view it here: https://stemforall2022.videohall.com/presentations/2445.

"STEM faculty are excited to share our MSEIP grant activities in the STEM for All Video Showcase and the profound impact on Harris-Stowe State University students," Dr. Podleski said. "This year's Video Showcase theme of "Access, Inclusion, and Equity" made this an ideal year to showcase our grant activities and outcomes and allow the students to tell the story."

Now in its eighth year, the annual showcase will feature over 250 innovative projects aimed at improving Science, Technology, Math, Engineering, and CS education, which have been funded by the National Science Foundation and other federal agencies. During the 8-day event, researchers, practitioners, policymakers, and members of the public are invited to view the short videos, discuss them with the presenters online, and vote for their favorites.

The theme for this year's event is "Access, Inclusion, and Equity." Video presentations address broadening participation, STEM learning in formal, informal, community, and home settings; design and implementation of STEM and CS programs; research informing STEM and CS teaching and learning; and measuring the impact of innovative programs. Collectively, the presentations cover a broad range of topics, including science, mathematics, computer science, engineering, cyberlearning, citizen science, maker spaces, broadening participation, research experiences, mentoring, professional development, NGSS, and the Common Core.

Last year's STEM for All Video Showcase is still being accessed and, to date has had over 103,000 unique visitors from 178 countries.

The STEM for All Video Showcase is hosted by TERC, in partnership with: STEMTLnet, CADRE, CAISE, CIRCLS, STELAR, CS for All Teachers, NARST, NCTM, NSTA, NSF INCLUDES, and QEM. The Showcase is funded by a grant from the National Science Foundation (#1922641).

Fall 2022 Scientific Workshops at MSRI

The Mathematical Sciences Research Institute in Berkeley, California welcomes registrations for our Fall 2022 workshops, listed below. MSRI workshops are free of charge to attend, thanks to the generous support of our funders, including the National Science Foundation.

(Please check **www.msri.org/workshops** for full details, as some workshop dates or details may be subject to change. An updated schedule of all talks will be posted by organizers in advance of each event.)

August 25-26, 2022- Connections Workshop: Analytic and Geometric Aspects of Gauge Theory
Organizers: Lara Anderson (Virginia Polytechnic Institute and State Univ.), LEAD Laura Schaposnik (Univ. of Illinois at Chicago)

August 29, 2022 – September 2, 2022-**Introductory Workshop: Analytic and Geometric Aspects of Gauge Theory**
Organizers: Aleksander Doan* (Trinity College; Univ.College London), Laura Fredrickson (Univ.of Oregon), Michael Singer (Univ.College London)

September 8-9, 2022- Connections Workshop: Floer Homotopy Theory
Organizers: Teena Gerhardt (Michigan State Univ.), Kristen Hendricks* (Rutgers Univ.), Ailsa Keating (Univ. of Cambridge)

September 12-16, 2022- Introductory Workshop: Floer Homotopy Theory
Organizers: Sheel Ganatra (University of Southern California), Tyler Lawson (University of Minnesota Twin Cities), Robert Lipshitz* (University of Oregon), Nathalie Wahl (University of Copenhagen)

October 24-28, 2022- New Four-Dimensional Gauge Theories
Organizers: Andriy Haydys (Université Libre de Bruxelles), Lotte Hollands (Heriot-Watt University, Riccarton Campus), Eleny-Nicoleta Ionel* (Stanford University), Richard Thomas (Imperial College, London), Thomas Walpuski (Humboldt-Universität)

November 14-18, 2022- Floer Homotopical Methods in Low Dimensional and Symplectic Topology
Organizers: Mohammed Abouzaid* (Columbia Univ.), Andrew Blumberg (Columbia Univ.), Jennifer Hom (Georgia Institute of Technology), Emmy Murphy (Northwestern Univ.), Sucharit Sarkar (Univ. of California, Los Angeles)
 * indicates lead organizers.

Workshop Funding: Established researchers, postdoctoral fellows, and graduate students are invited to apply for funding. Funding awards are typically made eight weeks before the workshop begins. Requests received after the funding deadlines are considered only if additional funds become available. MSRI is pleased to be able to offer a private room for nursing mothers.

Resources for Workshop Attendees: MSRI is pleased to be able to offer a private room for nursing parents. To allow visitors to fully participate in its scientific activities, MSRI is pleased to be able to offer childcare grants to researchers with children under the age of 17. One of the objectives of MSRI's family support program is to contribute toward MSRI's goal of enabling the participation of women and members of other historically underrepresented groups in its programs, workshops, and summer graduate schools.

These flexible grants may be used for reimbursement of childcare expenses incurred in Berkeley, or at home, including airfare for children and support for companion caregivers or hired childcare providers in Berkeley or to cover the costs of such help at home. Please note that, because these funds are taxable, they are available only to US Citizens and Permanent Residents, and foreign visitors with a visa status that allows for compensation, such as a J1. We are deeply grateful to our Family Support donors for their generosity.

MSRI is committed to the principles of Equal Opportunity and Affirmative Action. Students, recent PhDs, women, and minorities are particularly encouraged to apply.

MSRI has been supported from its origins by the National Science Foundation, now joined by the National Security Agency, over 100 Academic Sponsor Institutions, by a range of private foundations, and by generous and farsighted individuals.

MSRI- 2023 SRiM Program Announcement

MSRI invites applications for the **2023 Summer Research in Mathematics (SRiM)** program. This program provides space, funding, and the opportunity for in-person collaboration to small groups of mathematicians, especially women and gender-expansive individuals, whose ongoing research may have been disproportionately affected by various obstacles including family obligations, professional isolation, or access to funding. Through this effort, MSRI aims to mitigate the obstacles faced by these groups, improve the odds of research project completion, and deepen their research experience.

The ultimate goal of this program is to enhance the mathematical sciences as a whole by positively affecting the research and careers of all of its participants and assisting their efforts to maintain involvement in the research community.

Program Eligibility

- Groups of two to six mathematicians with partial results on an established project may submit an application to the program.
- Each member of the group must have a Ph.D. in mathematics or advanced graduate standing, and at least one team member must be U.S. based.
- Each group may apply to be in residence at MSRI for a minimum of two weeks, though longer visits are possible. All members of the group must be in residence for the full duration of the visit.
- Applicants may only apply as a member of one research group.
- Participants are provided with lodging, all meals, and reimbursement of travel expenses. MSRI also has access to private sources of funding for researchers with children under age 17 to fully participate in its scientific activities.

For full program details, visit the website: www.msri.org/summer

Applications will be made through MathPrograms beginning **August 1, 2022** and require a Project Description and bio-sketch of each group member, as well as additional information (see program website for details). Applicants may only apply as a member of one research group.

- Lodging at UC Berkeley, meals and reimbursement of travel expenses will be provided.

- For participants with children, MSRI will provide funding that makes it possible for the member to fully take part in the program. This may be in the form of lodging and reimbursement of travel expenses for children who accompany the member to Berkeley, plus lodging and travel expenses for a caregiver. It may also take the form of reimbursement of additional expenses incurred if the children stay home, thus allowing the member to attend the program.

The deadline for application will be **November 1, 2022**. Decisions will be announced in **mid-December 2022.**

Forthcoming Compendium from 2021 MSRI Workshop on Mathematics and Racial Justice

In June of 2021, MSRI held a virtual *Workshop on Mathematics and Racial Justice*, which convened nearly 300 mathematicians, statisticians, computer scientists, and STEM educators to critically examine the role that mathematics plays in today's movement for racial justice. A free and publicly available compendium on the workshop is expected to be released on the occasion of Juneteenth 2022.

Mathematics is often viewed as one of the main tools responsible for scientific progress, and developments in mathematics are behind some of society's most significant technological advancements. While mathematics has been used to push society forward, there are also well documented instances of mathematics being used as a tool of racial oppression. The inequities faced by the Black community have become more and more difficult to ignore, and mathematicians have increasingly been answering the call to engage with issues of social justice within their research, their teaching, and in the broader scientific community. This workshop and the resulting compendium are a part of this movement and make the distinct contribution of centering issues of mathematics and racial justice, with focus on the Black community.

The 2021 keynotes by Robert Berry (University of Virginia) and Rediet Abebe (University of California, Berkeley) set the stage for this volume: Berry, by presenting a historically-informed view of the way mathematics education as it is often implemented dehumanizes people of color, and Abebe, by demonstrating the power of data and computer science to study social problems and guide their solutions. Following their contributions, the workshop was divided into four primary thematic areas, which have also guided the organization of this compendium: Bias in Algorithms and Technology; Public Health Disparities; Racial Inequities in Mathematics Education; and Fair Division, Allocation, and Representation.

The 2021 workshop was organized by Omayra Ortega (Sonoma State University), Robin Wilson (California State Polytechnic University, Pomona), Caleb Ashley (Boston College), Ron Buckmire (Occidental College), Duane Cooper (Morehouse College), and Monica Jackson (American University) and supported by the American Mathematical Society (AMS), the Center for Minorities in the Mathematical Sciences (CMMS), the Mathematical Sciences Research Institute (MSRI), the National Association of Mathematicians (NAM), the National Science Foundation (NSF), and the Society for Industrial and Applied Mathematics (SIAM).

2022 JSM DIVERSITY WORKSHOP AND MENTORING PROGRAM

The 2022 JSM **Diversity Workshop and Mentoring Program** brings historically-underrepresented BIPOC (African/African-American, Hispanic/Latino, and Native American) graduate and undergraduate students, post-doctoral scholars, and junior professionals together with senior-level statisticians and faculty in academia, government, and the private sector in a structured program at the annual Joint Statistical Meetings. This year in Washington D.C., we host both a Workshop and a Mentoring Program as separate but related activities.

The **Diversity Workshop** will provide interactive sessions focused on career enhancement skills for statisticians at early- to mid-career levels. Statistics professionals, including (1) faculty from BIPOC-serving institutions who advise and mentor undergraduates in math and related disciplines, (2) faculty influential in the faculty and/or student recruitment processes at their home institutions, and (3) statisticians currently working in government or industry interested in establishing relationships with talented statisticians who may be candidates for future employment or research/service collaborations, are also invited to attend.

In addition, a small group of workshop applicants will be selected to participate in the **Mentoring Program**, which will match individuals with mentors, and include programming to support effective mentor-mentee relationships.

Interested students and professionals are encouraged to apply on or before May 31. Limited student travel funding support is available. Full consideration for travel funding will be given to applications received by May 31. Applications received after May 31 will be considered as space allows.

Important Dates

May 31
Applications Due
Interested individuals should apply on or before May 31 for full consideration including financial support.

Mid June
Notification
You should expect to hear back from us about your application, mentor and whether we can provide you with financial support.

Aug 07
Diversity Workshop
Interactive sessions on career enhancement skills for early- to mid-career persons in academia, industry and government.
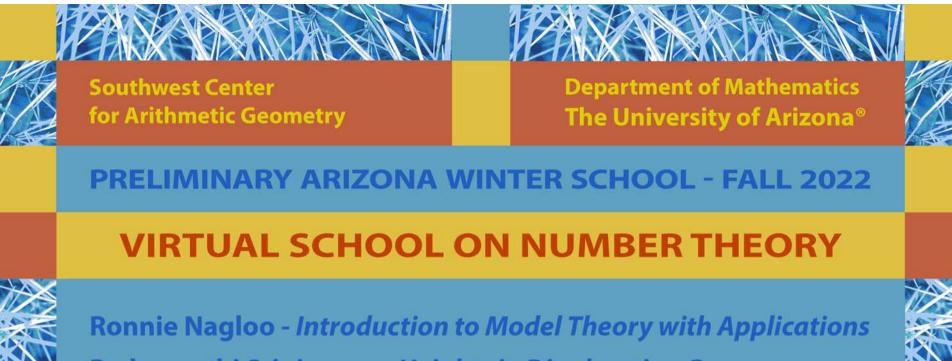
Aug 08-10
Mentoring Program
Small group discussions on effective mentor-mentee discussions, and one-on-one meetings with your mentor.

Want to apply? Need more information?

Visit us at https://community.amstat.org/cmis/events/dwmp/dwmp2022

Questions? Email Dr. Emily Butler at emily.lynn.butler@gmail.com

Virtual

ASA

STATFEST 2022

A Conference for Undergraduate Students

Organized by the American Statistical Association's
Committee on Minorities in Statistics

Saturday
September 17, 12pm ET

Join us!

StatFest encourages historically underrepresented undergraduate students to consider careers and graduate studies in the statistical sciences.

Enjoy one packed half day of discussion panels and talks from established professionals, academic leaders, and current graduate students.

Cost   **FREE**, registration required

Questions?   Contact co-chairs:
                  Dr. Therri Usher   therri.usher@fda.hhs.gov
                  Dr. Brittney Bailey   bebailey@amherst.edu

**More
Information**   https://community.amstat.org/cmis/events/statfest/statfest-2022

Collaborative Undergraduate Biostatistics Experience (CUBE)

Mission Statement

The mission of the Collaborative Undergraduate Biostatistics Experience (CUBE) program is to provide undergraduate students who are underrepresented in STEM programs with training and mentorship in a real-world collaborative data science research project in the health sciences. The program also includes a professional development track that runs alongside the collaborative data science research experience, offering mentoring in communication, presentation skills, resume writing, career options, graduate applications, and much more.

What is CUBE?

CUBE is an 8-week training program designed to provide undergraduate students who are underrepresented in STEM programs the opportunity to engage in a full-time (~40 hours/week) collaborative data science experience in the health field, along with related professional development activities. The goal is to offer students an experience working with a real-world dataset under the mentorship of experienced data scientists and clinical experts, to help them determine if they want to pursue a career in collaborative data science, and to provide them with professional development skills for the workplace or for graduate school.

Who will host and mentor students?

Two students will be hosted and mentored by Virginia Tech faculty and staff on the Health and Technology campus in Roanoke, VA.
Two additional students will be hosted and mentored by University of Virginia faculty and staff in Charlottesville, VA.

Program Dates: June 6, 2022 through July 29, 2022

Stipend: $4800 (housing and social outings will be covered by the program; student is responsible for food/meals; this stipend is taxable to the student)

Where can students apply?

https://biostat.centers.vt.edu/cubeprogram.html

Application Deadline: April 30, 2022

Where will the students stay?

Students participating in Virginia Tech's program will be housed in a furnished apartment, equipped with a full kitchen, at the historic Patrick Henry Hotel.

Who supports the CUBE Program?

The integrated Translational Health Research Institute of Virginia (iTHRIV); Virginia Tech's College of Science and the Department of Statistics; the Fralin Life Sciences Institute (FLSI), the Institute for Society, Culture, and Environment (ISCE), and CBHDS.

More info about CBHDS at
biostat.centers.vt.edu/
Follow us on Twitter @VT_Biostats

UCONN
UNIVERSITY OF CONNECTICUT

Statistical
Data Science Lab

NSF

SMT

UCSAS
Since 2019

2022 UConn Sports Analytics Symposium (UCSAS)

Saturday, October 8, 2022   `http://uconnsportsanalytics.org/`

Back in-person and supported by the NSF in 2022, the UCSAS focuses specifically on students (graduate, undergraduate, and pre-college) who are interested in sports analytics. Organized by the UConn Statistical Data Science Lab of the Department of Statistics, UCSAS aims to: 1) showcase sports analytics to students at an accessible level; 2) train students in data analytics with application to sports data; and 3) foster collaboration between academic programs and the sports industry.

Keynote Presentations

- Kathy Evans (Tentative), Vice President, Research and Information System, Monumental Basketball
  "A Review of Causal Inference in Sports"
- David Bergman, Associate Professor, University of Connecticut
  "Integration of Analytics Techniques for Algorithmic Sports Betting"

Panel Discussion: Sports Data Science Competitions

- Alison Lukan (moderator), Seattle Kraken Contributor and TV Analyst for Root Sports.
- Michael Lopez, Senior Director of Football Data and Analytics, National Football League.
- Brendan Kumagai, MS Student in Statistics, Simon Fraser University (2022 Big Data Bowl Winner).
- Megan Risdal, Product Manager, Kaggle.
- Asmae Toumi, Director of Analytics, PursueCare (2021 Big Data Bowl Winner).

SMT Data Challenge   The newly added data challenge is sponsored by SportsMedia Technology (SMT), an industry leader in sports data collection and visualization. SMT has provided anonymized in-game player and ball location data for multiple minor league teams over multiple seasons. The goal of the data challenge is to analyze an aspect of player movement (e.g., baserunning, movement while fielding, backing up a play) within this spatiotemporal dataset. The submission deadline is Monday, August 1 at 11:59pm. Finalists selected by the data challenge judging committee will be invited to present their works in the poster session with travel support, and the winner will be announced at the closing ceremony.

Poster Session   A virtual poster session is scheduled for 11:30–13:30. We invite submissions from all, especially students (pre-college, undergraduate, or graduate, with travel support), with interesting works on any topics of sports analytics. The submission deadline is 11:59 pm, Friday, September 30, 2022. A student poster award, decided by the Student Poster Award Committee, will be presented at the closing ceremony.

Training Workshops   Six 50-minute workshops are offered in three concurrent tracks during 13:45–15:35. They provide trainings from jumpstart to advanced sports analytic skills.

	Introductory Track	Intermediate Track	Advanced Track
13:45–14:35	Introduction to R	Hockey Analytics	Web Scraping for Sports Data
14:45–15:35	Introduction to Python	Baseball Analytics	TensorFlow in Sports Analytics

Registration   The symposium is open to anyone with an interest in sports analytics. The registration fee is minimal ($5 for students and $10 for non-students) to get an accurate count for planning and logistics.

Sponsorship   Depending on the contribution level, sponsors will be recognized through customary channels, including names of sub-events. Please contact Dr. Jun Yan (`jun.yan@uconn.edu`) for details.

SMT DATA CHALLENGE

For this data challenge, your goal is to analyze an aspect of player movement (e.g. baserunning, movement while fielding, backing up a play) for minor league baseball players. SMT has provided in-game player and ball location data for multiple teams over multiple seasons. This spatiotemporal information can fuel a thoughtful analysis to answer questions that are difficult or impossible to answer with manually collected data or subjective observation. Since this challenge provides the opportunity to work with previously unavailable player tracking data, your analysis should involve player motion; this includes any topic that uses player location data over time. Below are a few example topics.

| BASERUNNING
- How could you evaluate a batter's chance to advance to second base on a ball in play? Or, for a runner on first base, the chance to advance from first-to-third on a single or first-to-home on a double?
- What circumstances are most likely to induce pickoff throws? Given a situation involving pickoff throws, what baserunner behavior is most likely to result in a stolen base? A successful pickoff?
- How would you evaluate a baserunner's ability to read a ball in play?

| FIELDING
- When a ball in play reaches the outfield, what aspects of fielding are most important in preventing a baserunner from advancing, or a batter from taking extra bases?
- How would you evaluate a player's fielding ability in the context of judgment and risk-taking? For example, how would you compare a player who attempts and fails to make a difficult play (possibly leading to an error) to a player that does not attempt to make a play?
- How would you evaluate a fielder's ability to read a ball in play?
- What attributes are most important to fielding and assisting on infield groundouts? Double plays?

| GENERAL
- How could you estimate expected runs throughout the course of a play based on player and ball locations and use that to evaluate player baserunning and fielding?
- Which baserunning and fielding abilities are most predictive or most consistent from season to the next?

We emphasize that this list is not exhaustive, and participants should feel free to study an aspect of player movement that interests them.

| REGISTRATION
Participants can register a team of up to four people at the SMT Data Challenge Registration Page

| SUBMISSION REQUIREMENTS
Please submit
- A short paper on your study in PDF format (max: 3000 words)
- A GitHub repo link containing code files and .csv files with results

Submissions are due by Monday August 1, 11:59pm Eastern Daylight Time.

| JUDGING CRITERIA
A panel of judges from across academia and the sports industry will judge your submissions based on the following:
- How original is the analysis?
- How applicable is the analysis?
- How appropriate were the methods used?
- How well did you communicate your findings? This includes both written text and visualizations. How did the use of facts, data-supported narratives, anecdotes, visual aids, etc. buttress storytelling?

We will notify winners in early September.

Lecturer in Mathematics Position
Announced at Purdue University

PURDUE
U N I V E R S I T Y

Applications are invited for a position of a Lecturer in Mathematics. Candidates must have M.S. or Ph.D. (or equivalent) in mathematics or in closely related areas. Two years of experience in mathematics teaching at the junior college or university level desired.

Duties include teaching first-year courses such as precalculus and applied calculus and possibly second-year courses such as linear algebra and differential equations. Working with staff, TAs, assist in coordinating courses, carrying out instructional goals. Opportunity for summer teaching. Start date is August 15, 2022.

Starting academic-year salary is in the $58,000 to $62,000 range, commensurate with experience. All applications are to be submitted via https://careers.purdue.edu/job-invite/19168/.

Review of applications will begin on **June 1, 2022** and will continue until the position is filled. For more information about our department, see www.math.purdue.edu/.

A background check is required for employment in this position. Candidates must have the ability to work in the U.S. without immigration sponsorship from Purdue University.

Purdue University's School/Department of Mathematics is committed to advancing diversity in all areas of faculty effort, including discovery, instruction, and engagement. Candidates should address at least one of these areas in their cover letter, indicating their past experiences, current interests or activities, and/or future goals to promote a climate that values diversity and inclusion.

Purdue University is an EOE/AA employer. All individuals, including minorities, women, individuals with disabilities, and veterans are encouraged to apply.

Presidential Postdoctoral Fellowship in Mathematical Biology
Position Announced at Arizona State University

Presidential Postdoctoral Fellowship in Mathematical Biology (Job #92397)
The School of Mathematical and Statistical Sciences (SoMSS) at Arizona State University (ASU) invites applications for up to 2 postdoctoral scholar positions in the area of mathematical biology.

The School of Mathematical and Statistical Sciences, part of The College of Liberal Arts and Sciences, invites applications for two Presidential Postdoctoral Fellow positions, with an anticipated start in the 2022-2023 academic year. Fellows will conduct research in mathematical biology, with a faculty mentor in the School of Mathematical and Statistical Sciences. The Fellows' activities will include production of relevant scholarly products, contributions to grant proposals, participation in the School's seminars, teaching up to two courses per year, and mentoring of students. Fellows will bring life experiences and expertise that promote diverse representation in the mathematical sciences. With grants from the National Science Foundation, National Institutes of Health, Department of Defense, National Security Agency and more, our mathematics and statistical sciences faculty are leading game-changing research, training and education projects. In particular, mathematical biology at ASU has a world-class reputation in mathematical ecology, epidemiology, neuroscience and medicine.

Qualifications and Characteristics
Minimum qualifications
- PhD in mathematics, applied mathematics or a closely related area by August 10, 2022.
- Demonstrated potential for excellence in research and teaching.
- Demonstrated understanding of and potential for success working on diversity, equity and inclusiveness issues in the mathematical community

Desired qualifications
- A documented research record in an area that meshes with the research interests of current SoMSS' faculty members in the mathematical biology group, which includes mathematical ecology, epidemiology, neuroscience and medicine
- Demonstrated potential for establishing interdisciplinary collaborations
- Experience and/or expertise in research, teaching, mentoring, and/or service, that address disparities faced by Black communities, as well as by communities of Color

This position is located at the Arizona State University at the Tempe campus. All postdoctoral fellowship positions are for one year. Options for an additional one or two years of funding or a transition to a tenure track position may be offered, depending on each fellow's progress and training needs. Faculty tenure track appointments will require a process of review within the designated tenure home unit.

Applications and Inquiries
Applications can be submitted online via https://www.mathjobs.org.   Application materials should include (1) a curriculum vita; (2) a letter of interest describing how you meet the qualifications noted above; (3) a diversity statement addressing how your past and/or potential contributions to diversity, equity, and inclusion will advance ASU's Charter; and (4) contact information for 3 references including email addresses. **Application deadline is 4:00 pm AZ Time, Sunday, May 8, 2022.** Applications will continue to be accepted on a rolling basis for a reserve pool. Applications in the reserve pool may then be reviewed in the order in which they were received until the position is filled.

The College values our cultural and intellectual diversity, and continually strives to foster a welcoming and inclusive environment. We are especially interested in applicants who can strengthen the diversity of the academic community.

A background check is required for employment.

ASU is a VEVRAA Federal Contractor and an Equal Opportunity/Affirmative Action Employer. All qualified applicants will receive consideration for employment without regard to race, color, sex, religion, national origin, disability, protected veteran status, or any other basis protected by law. For more information on ASU's policies, please see: https://www.asu.edu/aad/manuals/acd/acd401.html and its complete non-discrimination statement at: https://www.asu.edu/titleIX/.

In compliance with federal law, ASU prepares an annual report on campus security and fire safety programs and resources. ASU's Annual Security and Fire Safety Report is available online at https://www.asu.edu/police/PDFs/ASU-Clery-Report.pdf. You may request a hard copy of the report by contacting the ASU Police Department at 480-965- 3456.

COVID-19 Vaccination - Arizona State University is a federal contractor and subject to federal regulations which may require you to produce a record of a COVID-19 vaccination. For questions about medical or religious accommodations, please visit the Office of Diversity, Equity and Inclusion's webpage.

Teaching Postdoctoral Scholar Position
in Mathematics at University of Kentucky

Applications are invited for a Teaching Postdoctoral Scholar position in the Department of Mathematics at the University of Kentucky in Lexington, Kentucky beginning in Fall 2022. The successful candidate is expected to teach six courses per academic year, normally three courses during each semester. The teaching postdoc will receive formal and informal training regarding contemporary instructional methods, including classroom practices, assessment, and supervision of teaching assistants. Additional opportunities for professional development include seminars and workshops offered by both the Mathematics Department and the UK Center for the Enhancement of Learning and Teaching. The initial appointment will be for one year and is expected to be renewed for an additional year, subject to satisfactory performance and funding availability.

Applicants must have a Ph.D. degree in mathematics or closely related fields by the time the appointment begins and are expected to present evidence of excellence in teaching.

Applicants will need to submit job market materials to MathJobs.org. These materials should include: the standard AMS Cover Sheet for Academic Employment, a curriculum vitae, a statement on teaching experience, quantitative assessments of teaching, a statement on inclusion, diversity, and equity (described below) and at least three (3) letters of reference, at least two of which address teaching and/or supervision of teaching. Evidence of experience or interest in teaching large classes is valued.

All application materials must be submitted online at http://www.mathjobs.org/jobs/.

As a department and university, we are strongly committed to creating an inclusive and effective teaching, learning, research, and working environment for all (see https://www.uky.edu/sotu/diversity-and-inclusivity). For your statement on inclusion, diversity, and equity, in one to two pages, applicants are asked to reflect on their commitments, approaches, and insights related to inclusion, diversity, and equity.

Applications will be reviewed as they are received. Applications submitted by **April 15, 2022**, will receive full consideration.

For more information about the department, please visit http://www.math.uky.edu.

The University of Kentucky is an Equal Opportunity Employer and encourages applications from veterans, individuals with disabilities, women, African Americans, and all minorities.

Non-Tenure Career Track Assistant Professor of Mathematics and Statistics Position Announced at Washington State University, Vancouver

The Department of Mathematics and Statistics at Washington State University, Vancouver invites applications for a full-time, non-tenure-track position at the rank of Assistant Professor (Teaching), Career Track faculty position.

The successful applicant will be a scholar whose field is in mathematics, applied mathematics, statistics, or a closely related field, who is strongly committed to developing quality educational experiences while also being deeply interested in mentoring and contributing to campus diversity, equity, and inclusion efforts. The position will begin on August 16, 2022, on the Vancouver campus. Screening of applications will begin on **June 3, 2022**. Questions regarding the position can be addressed to Janet DeWitt, Search Committee staff support, jldewitt@wsu.edu.

Job Duties: The teaching load is 4/4. Instruction is 80% and service is 20%. The successful applicant is expected to teach introductory-level and upper-division courses within the Mathematics and Statistics curriculum. These classes include: precalculus and calculus sequence courses, differential equations, linear algebra, probability and statistics, mathematical analysis, and other upper-division courses. Candidates must demonstrate a strong commitment to teaching and service.

Required Qualifications:
• Ph.D. in Mathematics, Statistics, or a closely related field.
• Evidence of successful teaching ability at the undergraduate level and a commitment to mentoring students from diverse backgrounds
• Commitment to, knowledge of, and/or experience with WSU Vancouver's strategic goal to promote an ethical and socially just society through an intentional commitment to equity, diversity, inclusion, and belonging. (https://www.vancouver.wsu.edu/strategic-plan)

Preferred Qualifications:
• Experience in teaching introductory and upper-division courses in mathematics, applied mathematics, and statistics Industry experience.

Apply online at: https://bit.ly/Math_Prof

Multiple Visiting Assistant Professor Positions in Mathematics Announced at Wake Forest University

Department of Mathematics is seeking applications for several Visiting Assistant Professor positions. Review of applications will begin immediately and will be accepted until positions are filled. We seek highly qualified candidates who have a commitment to excellence in teaching. A Ph.D. in Mathematics or a related area is preferred, but exceptional candidates with a Master's degree in Mathematics or a related area will also be considered. The department has 16 tenure-track faculty, two teaching professionals and five teacher-scholar postdocs. The department offers both a B.A. and a B.S. in Mathematics, a B.S. in Applied Mathematics, and a B.S. in Mathematical Economics. The department also has a graduate program offering an M.S. in Mathematics. The teaching load for this position is three courses per semester.

The Department of Mathematics at Wake Forest University takes seriously the charge to be a space which is truly welcoming to all, and we are actively engaged in work to remove barriers to success and create new systems of support for students and faculty. We especially encourage applications from those belonging to groups traditionally underrepresented in the sciences. For details, please see http://www.math.wfu.edu.

Wake Forest University is a private, coeducational institution dedicated to academic excellence in liberal arts, graduate and professional education. Founded in 1834, the University is ranked among the top 30 national universities. With 5,400 undergraduates and 3,300 graduate and professional students, the student-faculty ratio is 11:1. Wake Forest is a collegiate university offering a vibrant intellectual community with a rich cultural life, an impressive array of facilities, and an active athletics community. The University has a deep institutional commitment to public service and engagement with the world, as indicated by the motto "Pro Humanitate." For quick facts about the University, go to https://admissions.wfu.edu/facts/.

A complete application will include a letter of application, curriculum vitae, teaching statement, and three letters of recommendation from individuals who can speak knowledgeably about the candidate's teaching. Applicants are encouraged to post materials electronically at https://www.mathjobs.org/jobs/list/19495. Hard copy can be sent to Dr. Sarah Raynor, Wake Forest University, Department of Mathematics, P.O. Box 7388, Winston-Salem, NC 27109 (raynorsg@wfu.edu, http://www.math.wfu.edu).

Wake Forest University is an AA/EO employer and values an inclusive and diverse learning community and campus climate.

MEGL Outreach Director Position Announced
at George Mason University

The Department of Mathematical Sciences at George Mason University invites applications for a renewable 1-year position at the rank of Term Assistant Professor, to begin in August 2022, with the possibility of paid training during Summer 2022.

The Mason Experimental Geometry Lab (MEGL, https://megl.science.gmu.edu/) is a research and outreach program within the Department of Mathematics. The research branch of MEGL engages undergraduate and graduate students in semester-long faculty-led projects focused on visualization and computation, reaching approximately 24 students across 6 projects each semester. The outreach branch of MEGL engages the community through small-group activities at nearby schools, reaching approximately 1000 students through 30 events each semester.

Responsibilities:
The position is formally a Term Assistant Professorship, a full-time teaching position.

The MEGL Outreach Director devotes 50% effort to teaching 2 courses per semester and 50% effort to outreach tasks:

- Learning, scheduling, and conducting existing outreach activities, aiming each semester to conduct 30 activities reaching 1000 students,
- Coordinating the outreach team, consisting of 1 graduate assistant, 2 paid undergraduate assistants, and occasional volunteer assistants,
- Maintaining the outreach network, currently consisting of 260 schools, libraries, and other venues in the Northern Virginia region,
- As time permits, developing new material, including new activities or follow-up materials.

Required qualifications:

- Excitement to share mathematics with others via fun, hands-on activities,
- Enthusiasm for serving a diverse student body and outreach network,
- Demonstrated strong administrative and organizational skills,
- Experience delivering outreach content in mathematics,
- Mathematics teaching experience at the university level,
- Master's degree in mathematics, or equivalent coursework.
- Hold a Ph.D. Degree in mathematics or a closely-related field, or expect to receive one by Summer 2023,
- (A successful candidate who does not complete their PhD by Summer 2022 will be hired as an Instructor, and promoted to Term Assistant Professor upon completion of their PhD based upon evaluation of performance over total period of service.)

Preferred qualifications (not strictly required):

- Experience developing mathematical outreach activities,
- Experience in K-12 mathematics curriculum and pedagogy,
- Experience in group-based teaching methods,
- Research and leadership experience at a lab in the Geometry Labs United network.

For more information about the position, email the MEGL Director Anton Lukyanenko at alukyane@gmu.edu, or the Department of Mathematics at math@gmu.edu.

For full consideration applications must be received via https://www.mathjobs.org/jobs/list/19782 by **April 25, 2022,** but applications will be accepted until the position is filled. Applications must include a cover letter, curriculum vitae, teaching statement and at least 2 letters of recommendation, one of which discusses teaching. Letters specifically addressing this position's unique requirements are particularly welcome