

BIOSTATISTICS (BSPH)

Graduate Degree Program
College: Public Health

Abstract

The doctoral program in biostatistics is designed for students with a strong quantitative background and an interest in public health, and biomedical research. The program emphasizes biostatistical methodology as well as practice of biostatistics and data science in public health. It will address workforce shortage in the field of biostatistics while producing future leaders and scholars in public health and biomedical data science. This will be achieved through: 1) advanced training in biostatistical modeling, machine learning, big data computing, epidemiology and public health data science, 2) experiential learning through research opportunities at research centers and institutes within UMD; 3) fostered biostatistical thinking and enhanced data science skills necessary for future careers in academia, pharmaceutical and biotechnological industry, government agencies, and other healthcare and public health administration professional organizations.

Financial Assistance

The Department offers a limited number of graduate teaching and research assistantships. Contact the Director of Graduate Studies for further information.

Contact

Jamie Trevitt, PhD, MPP

Director of Graduate Studies

Assistant Clinical Professor

Department of Epidemiology and Biostatistics

School of Public Health

University of Maryland, College Park

Email: jtrevitt@umd.edu (<https://academiccatalog.umd.edu/graduate/programs/biostatistics-bios/jtrevitt@umd.edu>)

Website: <http://sph.umd.edu/department/epib>

ADMISSIONS

The PhD in Biostatistics program has a two-part application process: applicants must submit the SOPHAS application (www.sophas.org) (<https://sophas.org/>), the centralized application service for schools and programs of public health, and the UMD Supplemental application (<http://terpengage.force.com/community/CustomLoginPage/?GradApp=True>). Both applications must be submitted, complete with all required documents and verified by the scheduled deadline (<https://sph.umd.edu/admissions/graduate-admissions/graduate-application-process/>). Applications will be reviewed when both the SOPHAS and the UMD Supplemental applications are completed.

GENERAL ADMISSION REQUIREMENTS

- A Bachelor's degree
- Minimum 3.0 undergraduate GPA
- Transcripts from all previous coursework
- English proficiency test score (TOEFL, IELTS or PTE) (international applicants (<https://gradschool.umd.edu/admissions/english-language-proficiency-requirements/>))

- Statement of purpose and objectives including career and educational goals, professional experience, and research areas of interest
- Response to personal experiences question(s)

PROGRAM SPECIFIC REQUIREMENTS

- SOPHAS application and the UMD Supplemental application
- Three letters of recommendation
- Resume or curriculum vitae
- A master's degree in public health or a related field
- A writing sample. e.g., Published manuscripts, master's thesis, research paper, etc. If you submit a published manuscript and you are not the first author, please describe the contributions you made to the publication.
- Fit between applicant's goals, expectations and research interests, program competencies and faculty expertise
- Official GRE Test Score submission is required. GRE scores taken within the past 5 years should be in the 50th percentile or higher. Please have ETS send scores to SOPHAS (code 0485).
- Note for applicants with foreign credentials:
- The SOPHAS application requires that applicants submit a WES credential evaluation (https://help.liaisonedu.com/SOPHAS_Applicant_Help_Center/Sending_Your_Official_Transcripts_and_Test_Scores_to_SOPHAS/Sending_Official_Transcripts_to_SOPHAS/2_Foreign_and_French-Canadian_Transcripts/).
- The UMD supplemental application requires the upload of unofficial transcripts issued in the original language with a literal English translation. Visit the Graduate School website for additional information (<https://gradschool.umd.edu/admissions/international-admissions/>).
- Evidence of English Language proficiency is required if the applicant does not hold a degree from a U.S. institution or from one of the English-speaking countries listed on the Graduate School website (<https://gradschool.umd.edu/admissions/english-language-proficiency-requirements/>). Language scores must be submitted both to SOPHAS and UMD supplemental application

For detailed instructions on how to apply, please visit the School of Public Health Website: <https://sph.umd.edu/graduate-application-process/>

APPLICATION DEADLINES

Type of Applicant	Fall Deadline
Domestic Applicants	
US Citizens and Permanent Residents	December 19, 2025
International Applicants	
F (student) or J (exchange visitor) visas; A,E,G,H,I and L visas and immigrants	December 19, 2025

RESOURCES AND LINKS:

Program website: sph.umd.edu/phd-biostatistics (<https://sph.umd.edu/academics/doctoral-degrees/phd-biostatistics/>)

Application Process: sph.umd.edu/apply (<http://sph.umd.edu/apply/>)

Admissions FAQ: sph.umd.edu/graduate-application-faqs (<http://sph.umd.edu/graduate-application-faqs/>)

REQUIREMENTS

- Biostatistics, Doctor of Philosophy (Ph.D.) (<https://academiccatalog.umd.edu/graduate/programs/biostatistics-bsph/biostatistics-phd/>)

FACILITIES AND SPECIAL RESOURCES

Our faculty in the Department of Epidemiology and Biostatistics includes individuals with multi-faceted interests in biostatistics, epidemiology, and bioinformatics. Biostatistics faculty apply statistical techniques including survival and longitudinal analysis, computational statistics, statistical analysis of genomic and proteomic data, machine learning, neuroimaging statistics, (network) meta-analysis, missing data analysis, Bayesian hierarchical methods, and bioinformatics to analyze and interpret health data. Epidemiology faculty have research interests and expertise in the epidemiology of infectious disease and chronic disease with particular focus in the areas of HIV/STIs, cancer, health disparities, cardiovascular disease, obesity/physical activity, and sexual and reproductive health. Additional areas of specialization include social and behavioral determinants of health, aging, cultural competency, and community-based interventions.