

Prof. Dr. Bamba Gaye, MD, MSc, MPH, PhD, serves as the Executive Director of the Alliance for Medical Research in Africa (AMedRA), representing 33 countries across the continent. He is an Adjunct Associate Professor of Biomedical Informatics at Emory School of Medicine in Atlanta, Georgia, USA, and a Research Scientist in Preventive Cardiology at the Institute of Health and Development (ISED), Cheikh Anta Diop University in Dakar, Senegal. He trained in medicine, earning his Bachelor of Medicine/Bachelor of Surgery from the University Paris Descartes, Paris, France, and subsequently pursued his MD from Cheikh Anta Diop University, Dakar, Senegal. Dr Gaye obtained his research training in biology and specialized in bioinformatics and pharmacometrics, earning a Master of Science from the National Institutes of Science and Technology, Lyon, France, Centrale Lyon, and the University Claude Bernard, Lyon, France. He pursued advanced studies in integrative epidemiology and biostatistics, earning both a Master of Public Health (MPH) from Paris-Saclay University, Paris, France, and a PhD from the University Paris Descartes, Paris, France.

Dr. Gaye's research focuses on preventive cardiology and non-communicable diseases (NCDs), integrating biomarkers, artificial intelligence, and subclinical atherosclerosis studies to better understand the mechanisms and life course of cardiovascular health. His work spans across the continuum of prevention, from primordial prevention to precision medicine, emphasizing the use of genomics and advanced technologies to transform cardiovascular epidemiology, particularly in low- and middle-income countries.

His groundbreaking research, published in leading journals such as JACC, Circulation, Nature Medicine, JAMA, The New England Journal of Medicine, and The Lancet Global Health, highlights the importance of addressing CVD and NCD burdens globally. It underscores the interplay of environmental, genetic, and lifestyle factors in shaping cardiovascular and overall health, informing tailored interventions to mitigate health disparities.

As a pioneer in collaborative health initiatives, Dr. Gaye is actively building a transcontinental network of researchers, promoting interdisciplinary approaches to address global health challenges. Dr. Gaye plays a central role in strengthening research capacity, driving innovation, and ensuring that health research in Africa is aligned with the continent's unique challenges, priorities, and aspirations.