

Amy Yeboah Quarkume, Ph.D., affectionately known as Dr. A, is a daughter of Africa, a scholar, filmmaker, data scientist, and Associate Professor of Africana Studies in the Department of Afro-American Studies at Howard University. She holds a Ph.D. in African American Studies, two master's degrees in Sociology and African American Studies, and certificates of Data Analytics from Harvard Extension School and the University of Massachusetts. Quarkume is an Andrew Mellon New Direction Fellow, a National Center for Atmospheric Research Innovator Fellow, and a White House Initiative HBCU All-Star Campus Mentor.

Quarkume is presently the Director of Graduate Studies for the master's Program in Applied Data Science and Analytics, advancing Howard University's first major effort in becoming a hub for data science social justice research and training for the next generation of data scientists. Her work as a data scientist centers around AI Bias, data inequality, and environmental justice. Currently, she employs an Africana Studies framework to examine the intersections of race and technology. Furthermore, she is the PI of the CORE futures lab, PI in the NOAA Cooperative Science Center in Atmospheric Sciences and Meteorology (NCAS-M), and Co-PI for the Race and Tech lab.

In addition to her achievements, Quarkume is also spearheading with a team of graduate, undergraduate, high school and middle school students the multi-year "What's Up with all the Bias" project, generously funded by the National Center for Atmospheric Research's Innovator Program. This endeavor interweaves climate change, race, AI, culture, and environmental justice, with a mission of shedding light on data pollution issues in Black, Brown, and Native American communities. The project underscores various challenges, such as the need for improved environmental data collection sites, equitable dissemination of environmental information, prompt installation of data collection instruments, and inclusive community engagement in environmental matters. Recognizing the potential pitfalls, Quarkume emphasizes the necessity of thoughtful AI implementation to address these complex issues, striving for comprehensive and lasting solutions.

In the field of Education and Technology, Quarkume has leveraged over 10 years of experience with the the Children's Defense Fund's National Freedom School program and Philadelphia Freedom Schools program in administration and curriculum development to develop human resources training, and study abroad engagement opportunities, with a focus on diversity, inclusion, and cultural responsiveness pedagogy. Additionally, she is the developer of the *HELLO BLACK WORLD* curriculum, designed for Africana Studies majors, minors, and friends in the humanities and social sciences who want to explore and develop data and computer science competencies centered around the presence of African contributions and imagination. She is also an NSF funded I-corp PI, developing an innovative solution designed to facilitate the language learning process for children aged 4 and above, incorporating advanced technologies, including Natural Language Processing (NLP), speech recognition software, and Artificial Intelligence (AI).

Her work in the area of Women's Studies, focuses on Black Women in Higher Education. Her first book [Her Truth and Service: Lucy Diggs Slowe in the Her Words](#) is now available. Her current works examines the intersectionality of the experiences of Black women and environmental justice.

She has published in the Journal of Women, Gender, and Families of Color; Mosaic Magazine; Black Scholar; CLA Journal and is currently working on her second book project titled "Data Pollution and Savage Algorithms." Additionally, she has contributed to and been an invited guest on *BET News*, *PBS NewsHour*, *Direct TV*, *American Radio Works*, *Al Jazeera America's The Stream*, *Philadelphia Community Access Media*, *Roland Martin TV One News Show*, and *Mother Jones*.