Ange-Therese Akono, PhD, A. M. ASCE
Associate Professor, Department of Civil, Construction, and Environmental Engineering, North Carolina State University

VISION STATEMENT

With your support, I hope to be elected to the EMI Board of Governors so that I can contribute a unique perspective to serve, grow our community, and amplify our impact worldwide. The EMI has been my home and community throughout my career, even as I have sought to push forward the state of the art of Engineering Mechanics through cutting-edge research, education, outreach, and community service, to train the next generation of leaders and address pressing societal challenges.

I have been an active member of the EMI since 2012, when I was a PhD student, and have attended and actively participated in almost every EMI conference since then. Specifically, I have served on the scientific committee of several EMI conferences, organized a Track for a domestic EMI conference, co-organized mini-symposia at both domestic and international EMI conferences, served on EMI technical committees, and served on EMI Award Selection Committees. I am currently an Associate Editor for the ASCE Journal of Engineering Mechanics, the Vice Chair of the EMI Nanomechanics and Micromechanics Committee, and the Chair of the Properties of Materials Committee.

If elected, I will bring my experience, unique perspective, stamina, and enthusiasm to make the EMI stronger, more innovative, and more resilient by: (i) brainstorming new ideas to promote a stronger engagement within technical committees, (ii) working on strengthening existing venues and building new opportunities for mentoring of early career and mid-career researchers within and across technical committees, (iii) strengthening and expanding the EMI connections with industry and national labs to grow the Engineering Mechanics workforce, and (iv) developing new strategies to attract and support more women and members of underserved groups within the EMI community.

SHORT BIO

Dr. Ange-Therese Akono is an Associate Professor in the Department of Civil, Construction, and Environmental Engineering at North Carolina State University. Dr. Akono's research investigates fracture processes in multiscale materials using nanotechnology, with a focus on sustainable energy, construction materials, and advanced bone scaffolds. Despite growing up in poverty, Dr. Akono earned a Diplôme d'Ingénieur from the École Polytechnique (Palaiseau, France), and an MSc and PhD from the Massachusetts Institute of Technology. Dr. Akono received the 2021 ASCE EMI Leonardo da Vinci Award for significant contributions to Fracture Mechanics through a novel method to probe the fracture toughness at the nanoscale. In the field of sustainable energy, her work shed light on the unique fracture response of organic-rich shale. In the field of sustainable construction materials, her work elucidated the toughening mechanisms of carbon-based nanomaterials in Portland materials and alternatives. She has mentored 1 postdoctoral associate, 7 MSc students, 5 PhD students, and 18 undergraduate students. Her work has led to 54 peer-reviewed journal articles, 4 active US patents, and 55 invited lectures. Additional honors received by Dr. Akono include the ASCE New Faces of Civil Engineering Professionals Award (2016), the US-Africa NAE Frontiers of Science, Engineering, and Medicine Invited Speaker (2022), the Johnson & Johnson Women in STEM 2D Scholars Award (2022), and the International Association of Advanced Materials Scientist Medal (2025). Dr. Akono currently serves as a co-Editor-in-Chief for the Elsevier *Forces in Mechanics* journal and as an Associate Editor for the ASCE *Journal of Engineering Mechanics*.