Gough (Lab) DEI statement

I grew up equidistant from Richmond and Washington DC, surrounded by reminders of a shockingly recent racially segregated school system and the legacies of the 'old south'. My Mom taught at "Robert E. Lee Elementary", which proudly displayed a painting of its namesake in the entry way. Monuments to civil war soldiers dotted the landscape, which boasted four major Civil War battles. I attended "Battlefield Elementary", Battlefield Middle", and "Chancellor High", all homages to our region's venerated history. In 5th grade, my teacher assigned us civil war military ranks (though I don't remember which side) as a way of organizing classroom hierarchy and promoting leadership. "The South will rise again!" was the senior quote of at least two graduates from my '93 class. But, one occurrence was particularly disturbing and formative. An African American twenty-something who cut my hair and was less than ten years my senior shared her lasting feeling of alienation and oppression from attending segregated Kindergarten *in my county*. Because of my lived experience as a white male and limited (home or formal) education on the topic, I had no idea that this was even possible – a young adult, hardly older than me, attended a racially segregated school!? Somehow, I'd made it to 16 without even knowing this was a part of *very recent* history. This interaction was formative for two reasons: I started to realize that the legacy of racism and discrimination persists acutely, with lasting consequences for individuals and communities, and I began to understand that my lived experiences were not the same as my black and brown friends.

Fast-forwarding to the present, the experiences and observations of my youth – and several that followed – motivate my commitment to DEI in STEM education. Because I am not a member of an underrepresented minority (URM) group, seeking, hearing, and understanding the experiences, aspirations, successes, and challenges of URM students is essential. DEI requires intentionality and a willingness to be critiqued (which, let's be honest, no one loves) and implement change within systems that are inherently biased, and quite possibly make mistakes along the way. As a teacher and mentor, my approach and priorities are also informed by a substantial body of scholarship that shows *STEM identity* is critical to students' enrollment, retention, and advancement in the sciences; this concept acknowledges that a sense of belonging – at every stage of academic training – is crucial. Additionally, broader inclusion, in my view, requires the authentic valuation of non-traditional experiences and achievements, other than convenient (but incomplete and sometimes biased) metrics such as GPA and AP course enrollments.

In my time at VCU, my commitments to DEI include: securing funding through the National Science Foundation to mentor a non-traditional post-bacc, a mid-career teacher, and a diversity of researchers; co-founding the chapter of a professional organization (ESA SEEDS) dedicated to increasing DEI in ecology; and participation in 1-on-1 personalized DEI training based on 8-week observations of my instruction in my classroom. When pursuing funding for research, I am intentional about writing DEI into the structure of grants. Within the lab, engaging a diversity of students enriches our scholarship in numerous ways and is a pillar of our lab's culture and values.

However, my (and the lab's) DEI work is incomplete and, moving forward, will further emphasize the preparation of non-traditional students and URMs for careers and graduate programs in STEM, particularly ecology. I (and we) have a considerable amount of work to do. Fewer than 2% of the 150+ students enrolled in my *Forest Ecology* course, taught since 2011, identified as African American. And, while several students in my research lab are "non-traditional" (e.g., first gen college students, had prior careers, are working parents), engaging a greater diversity of *undergraduates* as collaborators in career-shaping research that promotes their STEM identity is a priority. Meaningful progress on this front requires a multi-pronged approach that engages students early in their academic training, provides low commitment/risk entry points and sufficient compensation for their time, and promotes those with non-traditional preparation and metrics of potential. In the Gough lab, we are committed to and enthusiastic about this important, mutually beneficial, and challenging work ahead, and, to the extent possible, modeling – even if imperfectly – the changes needed to enhance DEI in the sciences as a whole. Because, for us, no action is not an option.