MAPS EDI Lunch Hour Conversations 2022 – 2021

Contents
Tackling Racial Inequity in Higher Education and STEM ................................................................. 2
SHIFT25: Constructing a fundamental shift in the UK’s ethnicity and equality narrative. ................. 3
Creating an anti-racist culture in scientific labs to improve equity and Inclusion in STEM .............. 4
Unacceptable behaviours: taking collective responsibility................................................................. 5
Race equity and belonging within academia and the scientific community......................................... 5
Tackling Racial Inequity in Higher Education and STEM

In our first event in December 2020, we invited Dr Jason Arday, Associate Professor in the Department of Sociology at Durham University, to discuss dismantling barriers in higher education for minoritized researchers and educators. Following an introduction from Dean of the Faculty Professor Ivan Parkin, the group discussed topics such as institutional racism, methods to tackle inequality and the challenge of solving issues beyond representation.

Arday was a co-author on the Leading Routes report ‘The Broken Pipeline,’ co-authored with members of the UCL Race Equality Steering Group (Paulette Williams, Sukhi Bath). He is the social sciences lead and one of the PIs on recent OFS/RES winning projects with Leading Routes. https://www.bbc.co.uk/news/science-environment-59307390

Black postgraduate students are most likely to drop out of studying science

![Bar chart showing proportion of postgraduate students that left with no award by ethnicity.](image)

Proportion of postgraduate students that left with no award

- **Black**: 6.3%
- **Asian**: 4.4%
- **Mixed**: 4.4%
- **Other**: 4.4%
- **White**: 3.8%

Figures are for UK domiciled science, technology, engineering and mathematics students at UK universities, 2017 to 2018

Source: Higher Education Statistics Agency, Royal Society

Dr Arday is an inspiration and a champion of people. In 2010, Arday ran thirty marathons in thirty-five days to raise money for Shelter and the Shooting Star Children’s Hospice. By 2020 Arday raised a total of £4.5m for seventy different charities, and Arday remains a long-standing trustee of The Literacy Pirates, a Hackney-based charity providing extra support to children falling behind in school.

Originally, the event was scheduled to have breakout rooms to facilitate small group discussion and interaction. However, due to the substantial number of audience questions for Jason, the team decided to have an extended Q&A instead. As these discussions are only an hour long, we are experimenting with ways to encourage interaction and enable everyone to be heard and welcome any suggestions!

To find out more about Jason’s work, and the need for us all to engage with discussions on racial equality, we recommend reading “Fighting the tide: Understanding the difficulties facing Black, Asian and Minority Ethnic (BAME) Doctoral Students pursuing a career in Academia”, Educational Philosophy and Theory (J. Arday, 2020), and “Dismantling Race in Higher Education: Racism, Whiteness and Decolonising the Academy”, Publisher London: Palgrave Macmillan (J. Arday and H.S. Mirza, 2018)


Dr Ying Lia Li: Summary of all MAPS Lunchtime Conversations on Race
SHIFT25: Constructing a fundamental shift in the UK’s ethnicity and equality narrative.

For our second event we invited founding members of SHIFT 25, Michelle Nelson QC and Julie Hutchinson from the East London Business Alliance. SHIFT 25 is a new campaign led by senior and influential Black, Asian and Minority Ethnic professionals, and business organisations. Their mission is collective justice and community action, for example, challenging the link between the criminal justice system & school exclusion & illiteracy. We wanted to discuss how SHIFT25 plans to make a fundamental shift in education, recruitment, and progression by 2025, with a focus on London.

We started with a discussion on how SHIFT25 was founded. Galvanised by the disproportionate impact of the pandemic on ethnic minorities and the murder of George Floyd, SHIFT25 wanted to bring together Black, Asian and minority ethnic professionals and leaders to tackle systemic racism collectively. “We are all involved, individually and collectively, in programmes, initiatives, charities and movements, and have made efforts to improve our own organisations’ track record on diversity in recruitment and progression. Each effort has validity and value. But if we are to use this moment, we must accept it is not enough. We chose this moment in time to make changes that lie within our influence, and we accept that what we have done so far is not enough.” [1]. Most importantly, they acknowledge that addressing prejudice and power is not for ethnic minorities to fight against alone, but action is required to build confidence and hope to younger generations.

An important theme of the discussion was around the difference between ‘equality’ and ‘equity’ – the latter signifying more than just receiving a fair share – but also inclusion and power in the decision-making process. “Equality achieves [fairness] through treating everyone the same regardless of need, while equity achieves this through treating people differently dependent on need” [2]. One way that SHIFT25 is working towards equity is through corporate engagement – enabling professionals to counteract stereotypes and open pathways for Black, Asian and minority ethnic workers.

Universities play a huge role in career pathways, and obtaining an undergraduate degree has almost become a pre-requisite for entering certain some professions or positions. Michelle mentioned an interesting point; that an undergraduate degree could be considered a human right, in the same way that access to education is. Unfortunately, there still exists barriers for ethnic minority students to enter and flourish within the academic system. Anti-Blackness has been studied at length within the university system [3], with evidence that although ethnic minority undergraduates are well represented, this quickly changes higher up the academic career ladder [4]. We should be mindful that when our students leave university, the way they are seen, despite obtaining a degree from UCL, will still be surrounded by prejudice. Care is needed to create initiatives built specifically for the community without resorting to umbrella terms like ‘BAME,’ with co-creation a priority – “who is at the table? What does success look like?” Even at the curriculum level these questions can transform representation and visibility of minoritized scientists. Universities can work with SHIFT25 to strengthen support for ethnic minority students, especially those in London, ensuring that they do not feel alone as they progress into their professional or research careers.

Creating an anti-racist culture in scientific labs to improve equity and Inclusion in STEM

For our third event we invited Prof Asmeret Asefaw Berhe to talk about creating an anti-racist culture in scientific labs to improve equity and Inclusion in STEM. Prof Berhe is a Professor of Soil Biogeochemistry and Falasco Chair in Earth Sciences. at Department of Life and Environmental Sciences, University of California, Merced.

In this discussion, Prof Berhe explained how a structured approach to collective justice led to the AdvanceGEO partnership; a project to improve work climate conditions by developing bystander intervention workshops. Berhe is Co-PI, working with Prof Erica Marin-Spiotta (Lead PI, UW-Madison) and Billy Williams (American Geophysical Union), Dr Blair Schneider (Kansas Geological Survey) and Prof Meredith Hastings (Brown University), Rebecca Barnes (Colorado College), Prof Allison Mattheis (California State Univ.) and Prof Vicky Magley (Univ. of Connecticut); a range of experts from the fields of psychology, education, biogeochemistry and diversity, ethics and inclusion. This range of experience is one way to make sure that good intentions do not lead to bad conclusions, which can often happen in complex subjects like bullying, harassment, and discrimination. Funded through an NSF ADVANCE fund whose goal is to increase the representation and advancement of women in academic science and engineering careers, AdvanceGEO extends into tackling sexual harassment, bystander training and research.

Alongside their Workshops and community resources page, AdvanceGEO publish academic studies on harassment, bullying, anti-racism and diversity. The project team spans across the research team, and includes an evaluation team, collaborators, and an advisory board. A supplementary grant has funded expansion into the ecological and biological sciences, leading to the ADVANCEEco team.

Prof Berhe highlighted the challenges in raising action to acknowledge systemic racism; although academic research is conducted in public institutions and should reflect the diversity of the taxpayers, this should not be the cornerstone of a call to action. Instead, we should remember that it is a right to access education and therefore policy change is needed, not a debate around moral justice. Multiple studies already show that diverse teams produce better science, get cited more, and make more profitable investment choices.

Science is funded by research agencies, and Prof Berhe remarked how these agencies take notice of the initiatives of professional societies like the National Academy of Sciences and the American Geophysical Society who adopted the Ethics and Equity Centre to promote ethics, integrity, and inclusive practices. At their 2015 annual meeting, AGU members held a late-breaking town hall session to discuss the role that scientific societies play in responding to harassment and listen to expectations of members in organizations like AGU. the AGU partnered with the American Chemical Society, the American Association for the Advancement of Science, Earth Science Women’s Network, American Geosciences Institute, and the Association for Women Geoscientists to host a National
Science Foundation-funded ‘Sexual Harassment in the Sciences: A Call to Respond’ workshop. In 2017, the AGU Scientific Integrity and Professional Ethics Policy was updated to include harassment, discrimination and bullying in its formal definition of research misconduct.

Lastly, Prof Berhe provided advice on how to tackle uncomfortable topics like harassment or racism; she stressed how history can shine a light on many issues, how problematic scientists have always been around and how policy is not always fit for all. Students will engage if you incorporate such topics into our teaching, and they should learn about the problems they did not cause but should recognise as factors in their experiences.

**Unacceptable behaviours: taking collective responsibility.**

https://www.ucl.ac.uk/mathematical-physical-sciences/equity-edi/unacceptable-behaviours-taking-collective-responsibility

For the fourth event, videos of the new MAPS “Unacceptable behaviours: taking collective responsibility” series were presented. These video resources were supported by the Provost and the full SMT leadership team and will be distributed UCL wide. So, together with the Ivan, we thought it would be good to discuss and present these to the MAPS community this lunchtime conversation seminar.

There are three videos that cover postgraduate students experiencing unacceptable behaviours, sexual misconduct, and staff experiencing bullying.

**Race equity and belonging within academia and the scientific community.**

For our fifth event, we focussed on the early career experience of researchers at UCL and beyond ‘Race equity and belonging within academia and the scientific community.’

On our panel were early career researchers at UCL and beyond:

Ramota Adelakun (she/her) is completing a Ph D at UCL, studying the intersection between biological and social sciences, and is the organiser of the UCL Black Doctoral Student Network @UCLBlackDocNet https://www.grad.ucl.ac.uk/societies/ucl-black-doctoral-student-network.html

Jude Ikechukwu Ayogu (he/him) is a GRS/ORS scholar completing a Ph.D. in the Chemistry Department at UCL with a specialisation on organic synthesis and chemical biology. He is also an academic staff at the University of Nigeria, Nsukka

Pruthvi Mehta (she/her) is a completing a Ph D at the University of Liverpool doing research on supernova relic neutrinos. She is a co-founder of POC Squared (www.poc2.co.uk) and contributing columnist for Physics World (Institute of Physics), https://physicsworld.com/author/pruthvi-mehta/
Karel Green (she/her) is completing a Ph D at the University of Nottingham on Black Holes, AGN and Galaxy Evolution. Karel is a co-founder of POC Squared (www.poc2.co.uk) and contributing columnist for Physics World (Institute of Physics), https://physicsworld.com/author/karel-green/

Abbie Bray (she/they) is completing a Ph at UCL, doing research on photoelectron holography for attosecond physics, and is the coordinator of UCL Women in Physics Group https://www.ucl.ac.uk/physics-astronomy/about/equality-and-diversity/ucl-women-physics-group

In this seminar we heard about the need for students to feel a sense of belonging and will often setup grassroot organisations to fulfil this need as was the case for Ramota, Karel and Pruthvi. Seeking a sense of belonging through joining established groups, for example, Jude deciding to live in student halls as a postgraduate and subsequently becoming a hall warden, or, how Abbie joined the UCL Women in Physics Group before becoming its chair, was also a good strategy for seeking community. It is a reminder for all staff to appreciate how our most precarious community – our students and early career researchers – sacrifice their time to improve our academic environments. There was a call for greater understanding of the challenges that grassroot organisations and societies face in terms of the cost and accessibility to book rooms or provide catering as well as access to data. The latter is of importance when groups are set up to tackle a challenge or bias that they notice through their lived experience or by seeing a lack of representation in their community; having transparent access to the statistics of a department or university is needed to build and maintain trust as often, societies and grassroot organisations are better connected and equipped to understand minoritized groups.

Lastly, the need for more uncomfortable conversations was highlighted with respect to the academic experience. One example was how Pruthvi was able to better understand the challenges of non-native English-speaking scientists, having spent time working on an experiment based in Japan. Many of us take for granted that English is the default language at conferences and in our written articles, but often don’t consider how isolating and disadvantaged this becomes for non-native English speaking scientists; to read more about this please go to Pruthvi’s Physics World article: https://physicsworld.com/a/why-we-need-to-break-down-the-language-divide-in-scientific-publishing/