

The nexus of Black Lives Matter protests and a pandemic that disproportionately kills Black and Latinx people (1) highlights the need to end systemic racism, including in science, technology, engineering, and mathematics (STEM), where diversity has not meaningfully changed for decades (2). If we decry structural racism but return to the behaviors and processes that led us to this moment, this inexcusable stagnation will continue. We urge the Academy to combat systemic racism in STEM and catalyze transformational change.

Everyone in academia must acknowledge the role that universities—faculty, staff, and students—play in perpetuating structural racism by subjecting students of color to unwelcoming academic cultures (3). Universities are not level playing fields where all students have an equal opportunity to participate and succeed. The misuse of standardized tests such as the GRE excludes students who could have otherwise succeeded (4). Once admitted, Black, Indigenous, and people of color (BIPOC) face challenges when transitioning to college life (5) and are more likely to be nontraditional students. Innovative pedagogies (6) and programs (7) can overcome these challenges but are not widely applied in higher education. Evidence-based, institution-wide approaches focused on equity in student learning are foundational to eliminating structural racism in higher education. Once we abandon the view of "fixed" student ability, more BIPOC students will succeed (8).

Academic culture also fails BIPOC faculty, who receive fewer federal grants due to systemic bias (2) and topic area (10). BIPOC faculty are most likely to invest substantial time in activities that promote diversity, which are devalued in the tenure and promotion process (11). BIPOC faculty are further disadvantaged in tenure decisions through cultural taxation of unequal service and mentoring demands. Given these burdens, BIPOC faculty cannot be expected to be the primary agents of institutional change. Instead, those most empowered to make change—non-BIPOC faculty—must join BIPOC faculty in their efforts to prioritize recruiting, supporting, and championing diversity.

SIGN UP FOR THE SCIENCE eTOC

Get the latest table of contents from Science delivered right to you!

SIGN UP >

Finally, the false dichotomy of "excellence or diversity" must end. Diversity results in better, more impactful, and more innovative science (12), and it is essential to building novel solutions to challenges faced by marginalized and

nonmarginalized communities. Catalyzing these culture shifts in the Academy, however, will require making tenure dependent on excellence in research, teaching, and service that centers on equity and inclusion.

Making STEM equitable and inclusive requires actively combating racism and bias. All faculty, staff, and students should commit to learning about racism, engaging in courageous conversations with non-BIPOC colleagues, and calling out unfair practices to prevent the normalization of discriminatory behavior. Faculty should examine courses for ethnicity and gender performance disparities, ask whether departmental and lab demographics reflect society at large, and actively remedy any disparities.

Breaking down the barriers of systemic racism in STEM and achieving the promise of diversity, equity, and inclusion in STEM require unwavering dedication and real work. It is time to make the commitment to be an agent of change.

Supplementary Material

List of signatories

References and Notes

```
1 K. Bibbins-Domingo, Ann. Int. Med. 173, 233 (2020).
```

```
( 4 GO TO REFERENCE ) • CROSSREF • PUBMED • ISI • GOOGLE SCHOLAR • Find it PUL
```

R. E. Bernard, E. H. G. Cooperdock, Nat. Geosci. 11, 292 (2018).

```
∠ GO TO REFERENCE
• CROSSREF • GOOGLE SCHOLAR • Find it PUL
```

SHOW ALL REFERENCES

eLetters (0)

eLetters is a forum for ongoing peer review. eLetters are not edited, proofread, or indexed, but they are screened. eLetters should provide substantive and scholarly commentary on the article. Embedded figures cannot be submitted, and we discourage the use of figures within eLetters in general. If a figure is essential, please include a link to the figure within the text of the eLetter. Please read our Terms of Service before submitting an eLetter.

(LOG IN TO SUBMIT A RESPONSE)

No eLetters have been published for this article yet.

Recommended articles from TrendMD

Getting genetic ancestry right for science and society Anna C. F. Lewis et al., Science, 2022

New Books Science, 1955 Sharing health data for immigration control affects marginalised communities

Lauren Z Waterman et al., The BMJ, 2021

Taking Charge: Leadership and Committees

Leslie A. Schwindt-Bayer, Oxford Academic Books, 2010

New Books Science, 1964

ScienceScope

Jocelyn Kaiser, Science, 1996

New Books Science Matt Morgan: I'm a celebrity, get me remdesivir!

Matt Morgan et al., The BMJ, 2021

The potential for graphical abstracts to enhance science communication

Rebecca A Krukowski et al., Translational Behavioral Medicine

Black Firefighters and the FDNY: The Struggle for Jobs, Justice, and Equity in New York City

David Goldberg, University of North Carolina Press, 2017

Powered by TREND MD

CURRENT ISSUE