Promoting Health Equity by Increasing the Representation of Minorities in Secondary and Post-Secondary Education in the United States*

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Bio: The Underrepresented Minorities Student Advocacy Group is a 1-year conjoint effort of students who came together to discuss issues of diversity in secondary and post-secondary institutions. Priscilla Auguste is the Chair of the Consortium of Universities for Global Health Trainee Advisory Program (CUGH TAC) and oversaw the overall project development efforts. Emma Herbach, a CUGH TAC member, also led the group by helping to provide oversight, guidance and feedback through the moderating of communications, organization, and facilitation of group efforts.

BACKGROUND

Global health is an emerging field of research and practice that prioritizes the achievement of health equity for people worldwide. The irony is that in the United States students from communities of color, low-income backgrounds, and first-generation college families are underrepresented in a wide array of training programs for professions that promote health equity, including scientific professions. In this report, we refer to the sum of professions promoting health equity as the “global health workforce.” In the medical field, for example, racial and ethnic minorities constitute a disproportionately low number of medical students, physicians, and medical school faculty of all ranks.[24] In fact, underrepresented minorities (URM) comprise fewer than six percent of the 1 million active physicians in the United States (US).[1-5] The problem extends to other scientific fields, as well. The National Science Foundation (NSF) determined that racial and ethnic minorities constitute less than 17% of employed scientists and engineers in the US.[27] This is an astonishing conundrum
considering that it has been well established that a racially and ethnically diverse workforce is critical to advancing the health status of all populations. This is largely due to the fact that increased diversity in the workforce also increases the number of global health workers who focus on underserved communities.\[23\] Furthermore, a diversity of viewpoints improves cultural competencies, contributes to the development of more effective interventions, and is invaluable at the level of critical decision-making with regards to the direction of global health research and the implementation of interventions.\[18\] As such, the current underrepresentation of racial/ethnic minority groups in our workforce poses a serious ethical and operative problem for global health that warrants greater attention.

Barriers to achieving racial and ethnic diversity in the global health workforce are established early in the educational pipeline, beginning with inequities in school funding, access to quality education, and adequate preparation for higher education. In the US today, students of color and students from low-income families receive less state and local funding in their school districts compared to districts in more affluent neighborhoods that serve fewer students of color.\[26\] This is troubling because decades of research show that many students of color start primary school academically behind their peers.\[12\] As students continue down the educational pipeline, they face even more barriers. For example, college admission standards implicitly grant biased preference to students from privileged backgrounds with resources to participate in extracurricular activities, standardized test preparation, and prestigious learning opportunities like unpaid internships.\[21,23,32\] In other words, economic disadvantage and early educational inequities pose critical obstacles to minoritized students’ overall likelihood to enter and complete higher education.\[21,33\] Once at the college level, limited exposure to global health training opportunities, both on- and off-campus (e.g. international experiences), can leave URM students in the dark about post-graduate education and practical learning opportunities that may fit their interests and lead them into the global health workforce. Should an URM student overcome these obstacles and attempt to break into the field as a graduate student or trainee, the lack of diverse faculty in global health poses yet another barrier to both recruitment and retention.\[27\] Escalating fiscal pressures, coupled with increasing costs of tuition, further make it difficult for institutions to meet the financial needs of students from lower socioeconomic levels.

**SOLUTIONS**

We propose solutions for the barriers encountered at the various phases of the educational pipeline. These phases include: 1) retention in primary and secondary education, 2) preparation for post-secondary education, 3) retention in post-secondary education and 4) recruitment to graduate education. Within each phase, we reiterate the issues and propose
solutions for various stakeholders (from individual faculty/mentors to institutions) to take action. Finally, we recommend areas for further research that could aid in addressing these issues.

Retention in Primary & Secondary Education

Promote greater levels of equity in K-12 education

Federal & State Education Departments:

● Strategically allocate federally-controlled school funding to increase capacities among state education departments to improve public education systems, boost spending in underserved school districts, reward local funding efforts for addressing inequalities in finance, allocate state dollars based on district need, and reduce interstate variation in school spending. [14]

Primary & Secondary Education Institutions:

● Decrease racial/ethnic imbalance between the teacher and student population and design education programs to help teachers meet the challenges of culturally diverse educational environments. [36]
● Scale-up individualized tutorial programs for disadvantaged students who fall behind to increase their chances of graduating high school. [6]

Preparation for Post-Secondary Education

Improve preparation for higher education generally

Secondary Education Institutions:

● Institute school counseling programs to support URM in advanced placement courses. [28]
● Form collaborations between high schools and universities from the same geographical regions to coordinate outreach efforts intended to reach or recruit future students/trainees and increase their exposure to the wide variety of professional and academic fields. [13]
● Build partnerships between education and the media industry to develop and disseminate culturally appropriate messages encouraging academic persistence and achievement of academic degrees. [19]
Expose students to the field of global health

Secondary Education Institutions:

- Hire racially/ethnically diverse educators qualified to teach a curriculum that is oriented towards global health and its subfields at the middle and high school levels.
- Expose middle and high school students to the various global health fields early on through medicine and public health career days, volunteer and/or internship opportunities, field trips, and after school programs. \[^{21}\]
- Partner with global health organizations such as the Consortium of Universities for Global Health to increase awareness of Global Health opportunities and programs with students.

Retention in Post-Secondary Education

Create a welcoming environment

Faculty/Mentors:

- Cultivate among URM students a sense of academic belonging and provide social-emotional support. \[^{23}\]

Form inter-institutional collaborations

Post-secondary institutions:

- Share best practices with other institutions regarding how to maintain and increase URM retention. \[^{13,18,32}\]
- Collect input from administrators and faculty on how to identify gifted URM students, nurture their professional development and educational enrichment, and coordinate inclusive curricula that meet a diversity of student needs. \[^{32}\]

Increase faculty and institutional diversity

Post-secondary institutions:

- Hire racially/ethnically diverse faculty members who can serve as mentors who have an understanding of barriers that URM students face. \[^{32}\]
• Support faculty in their endeavors to promote the diversity research agenda through funding and recognition. [13]

• Give an open floor for institutional diversity-related activities that address issues such as cultural competency training. [29]

Address student economic hardships and financial difficulties

Post-secondary institutions:

• Create workshops or programs that are designed to help students attain financial literacy. [21]

• Dedicate scholarship funding to reduce financial burdens that preclude increased minority student recruitment and retention.

Members of the Global Health Workforce:

• Appeal to Senate and House representatives on behalf of URM students when it comes to educational funding for individuals as well as full programs. [18]

Recruitment to Graduate Education

Revise the admissions process

Under/Graduate institutions:

• Prioritize diversity by using qualitative metrics such as an applicant’s ability to overcome adversity and service to their community or society as a whole rather than selecting for achievements accessible to those with the financial or social means [18, 21]

• Develop a clear and persuasive statement on why diversity is desirable for both the program and the profession. [13]

• Consider searching for neutral ways of achieving racial/ethnic diversity. [13]

• Support and conduct research that demonstrates the effects of diversity. [13]

Members of the Global Health Workforce:

• Volunteer for mentorship roles for students at the post-secondary level to provide guidance and help increase awareness.
Further research

- Create a way to evaluate the effectiveness of educational pipeline programs so that they can become stronger and more efficient. [29]
- Conduct a literature review of current programs with information regarding their success in order to learn how to find models of increasing academic achievement to create more effective programs. [18, 19]
- Research what impact school debt has on a URM student/trainee’s decision to pursue, apply, and or matriculate in higher degree level programs. [19]
- Research the barriers to academic achievement for URMs at all educational levels in order to better understand how to make impacts along the pipeline. Such barriers include cultural, linguistic, and societal. [19]
- Conducting more thorough research to assess the best qualitative metrics to use or the extent to which they should be used in admissions. [19]

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REFERENCES


[27] National Science Foundation. Women, Minorities, and Persons with Disabilities in Science and Engineering: 2019 [Internet]. National Center for Science and Engineering Statistics: Table 9-6 Employed scientists and engineers, by highest degree level,


