STRATEGIES FOR MENTORING AND RETAINING UNDERREPRESENTED MINORITIES IN MEDICAL PHYSICS PRACTICE ENVIRONMENTS

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PRACTICAL STEPS TO TAKE

Foster Science Identity
Provide Holistic Mentorship
Avoid Exclusionary Practices
Support URM colleagues

CLOSE YOUR EYES AND PICTURE A PHYSICIST
You can't be what you can't see.
This is what a physicist looks like.
We Can Do it! (Rosie the Riveter)

**REPRESENTATION MATTERS**

**FOSTER PHYSICS/SCIENCE IDENTITY**

Physics Identity is a strong predictor of career intentions and achievement for undergraduate students. 1,2

Minorities remain in STEM fields for much longer when they 1,2,3

- Have built a strong identity in their field
- Value the objectives of the field
- Have self-efficacy, or believe in their ability in the field

**WHAT CAN NON URM MENTORS DO?**

- **Identify**
  - Perceive your mentee as a physicist
  - Recognize that some behaviors that are perceived as "professional" are just white American cultural norms
  - Many behavioral stereotypes of URMs come so seamlessly to scientific thinking.

- **Establish**
  - Establish a common identity with your mentee
  - Favorite Imaging Modality?
  - Have a stubborn grandmother?

- **Share**
  - Share personal struggles with your mentee

- **Discuss and acknowledge**
  - Openly discuss and acknowledge how race or other minoritized status can be a barrier to a mentee's success.
Minors who advance the furthest have a strong network of mentors and sponsors. They share full developmental relationships with mentors, rather than just instructional relationships.

**HOLISTIC MENTORSHIP**

What can non URM mentors do?

1. Learn about and understand the power dynamics and systems of oppression on a global and local scale.
2. Believe the experiences of URMs (leadership, colleagues, and mentees) when they tell you about them. Fight the urge to believe only your perceptions are accurate.
3. Be culturally competent.
   - Listen to your mentee’s needs. They may be different than your initial assumptions.
   - Understand that overwhelming emotions around social and political events may need to be dealt with to make space for clear scientific thinking.

Avoid exclusionary practices.

- Minorities will advance further when they feel psychologically safe.
- Do not pretend race, gender, and other minoritized statuses aren’t a factor:
  - I don’t see color.
  - All Lives Matter.
  - You’re just like one of the guys.
  - You don’t look autistic.
  - Nobody can tell you’re gay anyway.
  - Rappers can say it.
Offer sponsorship to stereotypically presenting minorities.

- URMs are often expected to “earn” a mentor’s or sponsor’s endorsement by proving that they don’t exhibit any stereotypical traits of their minoritized status, while non-URMs are given the benefit of the doubt.

If you know you aren’t the best role model for a minority mentee, help them find someone who is, and then work on becoming a better role model for the next potential mentee.

Support URM colleagues

Effective role modeling requires a mentee to identify with their mentor.

- It is helpful for minorities to receive mentorship from senior minorities.
- Studies have found that mentors who are culturally competent and understand power dynamics and oppression are highly successful in mentoring URM students.

Senior URMs pay a high price for being mentors

- Called upon more often because there are few available minorities for EDI efforts.
- Time away from academic or clinical duties due to larger share of mentoring activities.
- Institutions often do not value mentoring efforts.
- Leadership/colleagues may feel indifferent or even contempt for EDI efforts.
- Helping minority mentees navigate academic and institutional culture and other personal issues can mean reliving traumas.
- Mentors may need to disclose less physically apparent (e.g., disability, and LGBTQ+ status) to benefit mentees.
REFERENCES


QUESTIONS?