

Disparities in Our Medical Education: Our Curriculum is Not Equitable

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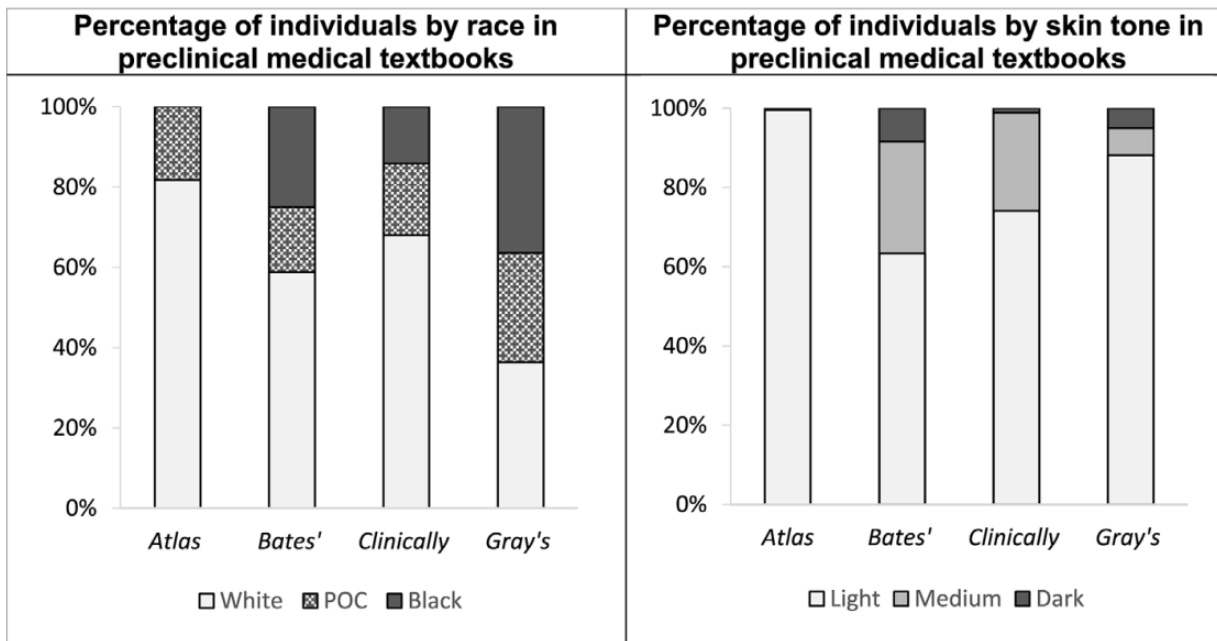
Medical schools across the country, including our own Indiana University School of Medicine (IUSM) have failed us drastically in one category: diagnosis of skin conditions for all skin tones. As a rising 3rd year medical student with rotations looming around the corner and as the thoughts of residency begin to creep into my mind, I have started to reflect on the quality of my medical education. Wherever you are in your medical education journey, think back to any time in which you were learning about a disease which was presented with some sort of skin manifestation. When has that manifestation been described or shown on skin that was non-white? Impetigo, blanching lesions, purpura, and even APGAR scores are all taught to us through the lens of white physicians practicing on white patients. If I was born either pink or blue, both would have been abnormal as the child of two Black parents.

During my first semester of medical school, in the trials of human structure and anatomy lab, a professor was talking about physical changes that happen during pregnancy. He mentioned that most areolas are pink unless the person has been pregnant before, in which they turn brown. At that moment, my GOP0 self had to pause the video and conduct a self-examination to make sure that I hadn't been seeing my body wrong my entire life. After battling with the internal struggle of if I wanted to speak up and possibly risk tainting my professional reputation before I even created one, I decided to reach out. The professor

responded, without judgment, saying that "no one had ever caught that error before." With IUSM being the largest medical school in the country, the fact that no one has caught the error in the many years of that presentation being used speaks to the huge problem we face. In addition to the lack of representation, there's also a lack of people willing to address that issue for the sake of our future patients.

That story is just one example of the many times in which I, as a Black woman, have not felt like my "standardized" medical education has prepared me to practice medicine with a diversified population. According to the latest census data, the US population is 57.8% white, 18.7% Hispanic/Latino, 12.1% Black, and 5.9% Asian¹. Of those ethnicities, a variety of skin tones are represented, many of which we are not prepared to accurately diagnose based on our current educational materials. A recent national study of dermatology residents reported that there was a significant difference in their confidence in diagnosing dermatologic conditions on skin of color². The study also found that those residences with specific curricula for skin of color reported higher confidence in their diagnosing skills.

Medical schools are not the only ones at fault for this lapse in education; this issue extends beyond the lectures presented in the classroom. The majority of the commonly cited textbooks that medical students use also disproportionately represent skin tones in pictures. The heralded Atlas of Human Anatomy, Bates' Guide to



Note. Reprinted from Representations of race and skin tone in medical textbook imagery, Louie, P and Wilkes R. 2018, Social Science and Medicine.

Physical Examination & History Taking, Clinically Oriented Anatomy, and Gray's Anatomy for Students were found to display 74.5% light, 21% medium, and 4.5% dark skin tones when placed into a computer algorithm using a total of 10 skin tones classifications³.

I am certainly not the only medical student sounding the alarm on this growing problem in medical education. In 2020, a medical student at St. George's University of London, Malone Mukwende, had the similar concerns and created a database called Mind the Gap: A Handbook of Clinical Signs in Black and Brown Skin⁴. Since its creation, not only has he achieved international awareness of the problem but also created tools to fix it. Other databases like visualDx are taking notice, but change is a slow process. As students at IUSM, it is up to each of us to follow the lead of our colleague and advocate for our quality of education, helping us become doctors better suited to confidently diagnose and treat patients of different skin tones and backgrounds. Being an ally is a verb — be the student who questions what a dermatological

manifestation may look like on different skin tones, the professor who includes pictures of all skin tones in their presentations, or the person who advocates for representation of skin tones in the curriculum. The quality of care for our diversified patient population depends on it.

References:

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- (2) Gupta R, Ibraheim MK, Dao Jr H, Patel AB, Koshelev M. Assessing dermatology resident confidence in caring for patients with skin of color. Clinics in Dermatology. 2021;39(5):873-878. doi:10.1016/j.clindermatol.2021.08.019. Accessed May 15, 2022.
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