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An Anti-Racist Introductory Seminar Outline to Combat the Interconnectedness of Medical Racism and Maternal Morbidity and Mortality Rates Among Black Women in the United States.

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Abstract

Given the massive maternal morbidity and mortality crisis experienced by Black women in the United States, this thesis aims to combat one crucial aspect of this problem. Among the top eleven most developed countries in the world, the United States markedly surpasses them all as the leader in maternal mortality despite its leading advancements in biomedical technology. More specifically, the maternal mortality crisis disproportionately affects Black women in America as this population is much more likely to die of pregnancy-related causes than any other racial group in the United States. In response, researchers and organizations have published literature outlining their proposed solutions. Many of these solutions emphasize the importance of creating an education tool that will teach maternal medicine providers about the present-day impact of generational oppression, discrimination, and systemic racism that Black women are left grappling with at the expense of their own health. However, preliminary research has found that healthcare providers, regardless of specialty and level of education, are often not required to participate in training that aims to confront their own perceptions and biases that may, even if unintentionally, inform or persuade their patient care. Furthermore, this thesis will focus on creating an evidence based anti-racist introductory seminar outline that will begin the process of better informing maternal medicine healthcare providers in four key areas: the necessity of addressing implicit bias, centering the voices of Black women through their narratives of trauma, history of injustice in maternal medicine at the cost of Black female bodies, and understanding race as a social construct.

Introduction

Among the top eleven most developed countries in the world, the United States markedly surpasses them all as the leader in maternal mortality despite its leading advancements in biomedical technology. Published in a 2020 issue brief titled, "Maternal Mortality and Maternity Care in the United States Compared to 10 Other Developed Countries," Tikkanen et al. (2020) found that in comparison to 10 other high-income countries, those being: Canada, Germany, New Zealand, Sweden, Australia, France, the United Kingdom, and Switzerland, the United States had a collective average of 17.4 maternal deaths per 100,000 live births. For greater context, none of the other countries surpassed an average maternal death per 100,000 live births of 8.7, but even more eye-opening, the average of the aforementioned countries together is 4.72 maternal deaths per 100,000 live births (Tikkanen et al., 2020).

More specifically, the maternal mortality crisis disproportionately affects Black women in America as this population is much more likely to die of pregnancy-related causes than any other racial group in the United States. Utilizing data collected from the Pregnancy Mortality Surveillance System, the Centers for Disease Control and Prevention (2020) analyzed the average pregnancy-related death from 2014 through 2017 and discovered that non-Hispanic Black women suffered from pregnancy-related deaths at a rate of 41.7 deaths per every 100,000 live births contrasted against non-Hispanic white women who experience an average of 13.4 deaths per every 100,000 live births. This disparity amounts to a shocking reality in which Black women are over three times more likely to die as a result of pregnancy-related complications than their white counterparts, regardless of other social determinants of health such as level of education or socioeconomic status. To quote the Biden-Harris Administration's 2022 briefing room statement titled "A Proclamation on Black Maternal Health Week," "the inequities that

Black mothers face are not isolated incidents but, rather, the byproduct of systemic racism in our society that has festered for far too long." (Biden-Harris Administration, 2022).

In response to this reality, a plethora of researchers and organizations have published literature with multifaceted guidelines to address this problem. Several of these reports emphasize the importance of creating an educational tool for providers that will teach them about the present-day impact of generational oppression, discrimination, and systemic racism that Black women must grapple with at the expense of their own health. This recommendation serves as fuel in the creation of an evidence-based anti-racist introductory seminar outline for maternal medicine healthcare providers that will better equip them to provide more culturally competent care, thus improving clinical decision making and maternal healthcare for Black women in the United States. By researching and piecing together this educational tool, the essential goal is to begin the process of better informing maternal medicine healthcare providers in four key areas: the necessity of addressing implicit bias, centering the voices of Black women through their narratives of trauma, history of injustice in maternal medicine at the cost of Black female bodies, and understanding race as a social construct.

Methods and Materials

Using a literature review as the foundation of this research will allow for a greater exploration into the interconnectedness of medical racism and maternal mortality rates among women of color, specifically Black women, in the United States. In doing so, this research will be able to concretely contextualize the impact of medical racism on patients in maternal medicine. After establishing a clear connection, this research will be used to create the elements that would be included in an introductory seminar outline, using an evidence-based approach to enhance awareness of unconscious biases and address how medical racism, even if unintentional,

leads to poor patient outcomes and contributes to the maternal morbidity and mortality crisis facing the United States.

This thesis research is founded upon an amalgamation of online and print resources including but not limited to peer-reviewed journal articles, periodicals, medical journals, and non-fiction books. Using CINHAL, a research database for nursing and allied health professionals, Education Research Complete, a database for education students, educators, policymakers, and PubMed, the leading biomedical and life sciences database both nationally and globally, this research is cemented in evidence-based sources to not only establish and maintain credibility, but also to magnify the utmost gravity of this crisis. From there, each of the four elements in the introductory seminar outline are identified. A rationale detailing the importance of each element and its appropriateness to the maternal morbidity and mortality crisis that disproportionately affects Black women are also discussed.

Literature Review

The Maternal Mortality Crisis

Mehra et al. (2020), work to highlight an ugly truth about the specialized field of maternal medicine. The authors begin with unsettling statistics detailing the dramatic rise in poor maternal and infant health outcomes in the United States incongruent to the major and award-winning advancements that have been made in the medical field. In the "Global, regional, and national levels of maternal mortality, 1990-2015: a systematic analysis for the Global Burden of Disease Study 2015," the Global Burden of Disease (GBD) 2015 Maternal Mortality Collaborators found that the United States had an alarming increase in the number of maternal deaths, maternal mortality ratios per 100,000 live births, and annual rate of change in maternal mortality ratios from 1990-2000, 2000-2015, and 1990-2015. The GBD 2015 Maternal

Mortality Collaborators estimated that the number of maternal deaths in the United States rose from 674 in 1990 to 1063 in 2015. The GBD 2015 Maternal Mortality Collaborators also reported that the maternal mortality ratio (average number of pregnancy-related deaths) per 100,000 live births increased in the United States from 16.9 in 1990 to 26.4 in 2015 with an annual percentage rate of change in maternal mortality of 1.8 per year from 1990 to 2015. While these numbers alone continue to paint a very perplexing image of the increasing severity of the maternal morbidity and mortality crisis in the United States, the most shocking evidence does not rest solely on these statistics.

Mehra et al. (2020) assert that none of the social determinants of health completely explain the existence of this health disparity as they all fail to address the pervasive and authoritative nature of medical racism (Mehra et al., 2020). For context, according to Healthy People 2030, the five social determinants of health are economic stability, education access and quality, health care access and quality, neighborhood and built environment, and social and community context (Healthy People 2030, n.d.). These determinants are significant because together they explain the environmental conditions of where people are born, live, work, play, learn, and how the aging process affects a wide range of quality-of-life outcomes, health, and health risks (Healthy People 2030, n.d.). Moreover, Rosenthal and Lobel (2011) found that Black women are not only subjected to a uniquely stressful experience in the United States derived from the intersecting stigmatized and marginalized identities of being Black and a woman, but also the unacceptable reality where these identities correlate to increases in Black women's risk of poor birth outcomes (Rosenthal and Lobel, 2011). Ultimately, medical racism has impacted the physical health of non-Hispanic Black women so disproportionately that this population's instances of maternal morbidity and mortality vastly differ from that of

non-Hispanic white women. This occurrence is not acceptable in American society. This truth further emphasizes the incredibly disheartening plight that Black women hoping to experience pregnancy and motherhood are confronted with.

Disparity Reduction in Maternal Medicine

Further supporting the case made by Mehra et al. (2020), Howell (2018) makes an evidence-based argument proving that non-Hispanic Black women experience incredibly high rates of severe maternal morbidity and mortality when compared to white women. Not only does Howell (2018) claim that race and ethnicity are major factors in these adverse events, but also "nearly half of severe maternal morbidity events and maternal deaths are preventable making quality of healthcare a critical lever to address" (Howell, 2018, p. 2). After analysis of disparities in each aspect of perinatal and peripartum care, Howell (2018) asserts that there are four critical areas in which to reduce disparities: improving delivery and hospital care through quality initiatives, education and communication about disparities, new models of antenatal care, and reinforcing preconception and postpartum care (Howell, 2018).

Howell (2018) offers alarming statistics revealing how severely this crisis impacts Black women. Not only do women of racial and ethnic minorities collectively have higher rates of severe maternal morbidity events, but according to the Centers for Disease Control and Prevention's pregnancy monitoring system that estimates incidences of severe maternal morbidity, "non-Hispanic Black women have the highest rates for 22 of 25 severe morbidity indicators" (Howell, 2018, p. 2). Most shocking is that the "risk of a pregnancy-related death for black women in some regions of the United States is similar to the risk for women in some developing countries" (Howell, 2018, p. 2). Interestingly, Howell (2018) also emphasizes the importance of acknowledging that while socioeconomic status is a contributing factor to health

disparities, it is not a leading cause of the maternal health crisis. Instead, inequity and inaccessibility to quality preconceptual, prenatal, antenatal, and postpartum care combined with racial bias and discrimination continually and specifically harm Black women.

Historical Occurrences in Reproductive Healthcare

Prather et al. (2018) illustrate the connection between historical racism and sexual/reproductive health outcomes and disparities in their article, "Racism, African American Women, and Their Sexual and Reproductive Health: A review of Historical and Contemporary Evidence and Implications for Health Equity." Prather et al. (2018) work to effectively confront the role that society plays in perpetuating racist stereotypes and beliefs that continue to negatively impact women of color, specifically Black women in the United States. It should be of no surprise that "racism is a fundamental determinant of health status because it contributes to social inequities (e.g. poverty) that shape health behaviors, access to healthcare, and interactions with medical professionals" (Prather et. al., 2018, p. 250). However, the effect of this reality is often not considered during provider-patient care experiences. The ideological foundation of the United States rests on principles of racism, discrimination, and oppression. These principles have allowed for the effects of racism and unconscious bias to be difficult for Black women to avoid (Prather et al., 2018). Racism and unconscious bias have also been found to increase the risks of adverse sexual and reproductive health outcomes for Black women. (Prather et al., 2018). Prather et al. (2018) urge maternal health care providers and public health researchers to familiarize themselves with the long and complex history of medical violence against Black women as it is imperative to understanding the needs and concerns of their patients/populations of interest. Historical occurrences such as non-consensual trials of gynecological and reproductive surgeries on enslaved Black women, rape of Black women as a means of control and degradation,

installation of eugenics to forcibly control Black population size, and more all have present day ramifications that manifest in a plethora of ways; including distrust of medical providers and institutions as well as exacerbation of an already complex relationship that Black women have with healthcare (Prather et al., 2018). Furthermore, the recommendation to educate maternal medicine providers would better equip this population to contextualize the historical depth of racism and discriminatory practice as it pertains to Black women and the sanctity of their reproductive health.

Obstetric Racism

Dána-Ain Davis (2020) argues that obstetric racism is at the core of maternal medicine. Centering the voices and stories of Black women who have suffered at the hands of racist practices, Davis (2020) analyzes obstetric racism, described as "the mechanisms of subordination to which reproduction in Black women are subjected that track along histories of anti-Black racism," and provider complacency and perpetuation of this occurrence (Davis, 2020, pp. 57-58). At the intersection of obstetric and medical racism lie the experiences of Black women and their all too similar accounts of violent and abusive behaviors by both medical institutions and professionals from conception to postpartum care. Drawing upon the relationship between reproductive abuse and obstetric racism, Davis (2018) argues that examples of reproductive abuse include but are not limited to the exploitation and manipulation of enslaved Black women for the advancement of gynecology, the unauthorized and nonconsensual use of the carcinogenic Depo Provera contraceptive shot on thousands of young Black women, and the denigration and deliberate discrediting of Black midwives during the nineteenth and twentieth centuries to further justify the shift toward obstetrician led parturition (Davis, 2018). Davis (2018) argues that Black women have and continue to experience obstetric

racism, once again including but not limited to "critical lapses in diagnosis; [providers] being neglectful, dismissive, or disrespectful; causing pain; and engaging in medical abuse through coercion to perform procedures or performing procedures without consent" (p. 562). Furthermore, the spotlight is uniquely shined on the power play between reproductive health rights and the dominance that the largely white provider pool exert on their patients, specifically Black women. Expanding upon the existing understanding of obstetric racism, Davis (2020) highlights that the specialty's relationship with power and violence is evidenced by the extent to which women are victims of abuse and violence by medical professionals.

Structural Racism in Maternal Health

Extensive discussion of the effect that structural racism has played in maternal health is evident in Taylor's (2020) article, "Structural Racism and Maternal Health Among Black Women." Structural racism is "a system where public policies, institutional practices and cultural representations work to reinforce and perpetuate racial inequity" (Taylor, 2020, p. 506). Taylor (2020) asserts that the continual adaptation of privileges associated with whiteness and the perverse disadvantages associated with being a person of color in the United States have allowed for them to remain a constant throughout American history. Arguably, one of Taylor's (2020) most significant assertions is "that structural racism has been a mainstay of the social, economic and political systems in which we all take part.... [and are vital in the consideration of] how this has shaped maternal health in U.S. health care" (p. 506). Furthermore, Taylor's (2020) article is centered around three points. First, Taylor (2020) presents a historical overview of the ways in which reproductive racism has been propagated by racist structures in American society. Areas of emphasis included public policies such as the legalization of children born to enslaved women as property of the slavemaster which thereby increased the profitability of reproductive control,

institutional policies such as the legalization of involuntary sterilization that disproportionately affected Black women during the eugenics movement, and cultural stereotypes, representations and images that reinforce race-based inequalities such as rhetoric demonizing the sexual activity and reproduction by Black women because of it being "symbolic of all that was wrong in society" (Taylor, 2020, p. 509). Second, Taylor (2020) analyzes how the long history of oppression has perpetuated racial inequalities that continue to contribute to incredibly inadequate maternal healthcare for Black women, with particular emphasis placed on the vast racial disparities between white and Black women. Further emphasizing the importance and appropriateness of this thesis, the final assertion recommends addressing structural racism in maternal healthcare through policy change, institutional practice, and education. Taylor (2020) argues that maternal medicine providers must participate in substantive, evidence-based, and continual antiracism and bias training that work to reveal how bias and racist policies fuel the unequal treatment of patients of color. Taylor (2020) goes on to argue that the education of maternal medicine providers must also address the ways in which power imbalances between providers and patients directly correlate to patient reports of feeling ignored and dismissed by their providers, a sentiment discussed in greater detail later in this paper.

Black Lives Do Matter

Eichelberger et al. (2016) confront the harsh reality that racism is heavily intertwined into American reproductive healthcare. Interestingly, Eichelberger et al. (2016) draw attention to the Black Lives Matter Movement that was propelled into the social media spotlight following the acquittal of George Zimmerman, a neighborhood security watchman who murdered 17-year-old Trayvon Martin. In doing so, they note that while discussions and analysis of how racism, discrimination, and oppression of Black Americans have become increasingly more prevalent in

academia, medical literature is still largely deficient in this acknowledgement and further research. While Eichelberger et al. (2016) note that there are three articles within the medical discipline that use the phrase “Black Lives Matter,” they also emphasize and call into question the lack of evidence-based outrage in medicine regarding the persistent and unacceptable health disparities that continue to disparage the Black community (Eichelberger et al., 2016).

To start, Eichelberger et al. (2016) acknowledge the long history of forced sterilizations and eugenics that disproportionately affected Black women and how this represents “one of the most abhorrent [occurrences of family planning] in medicine” (Eichelberger et al., 2016, p. 1171). Similar to Mehra et al. (2020), Eichelberger et al. (2016) highlight the widening racial gaps in infant and maternal mortality rates; rates where Black women and babies lead in comparison to other racial groups. When compared to white women, Black women have a higher preterm birth rate (Mathews & MacDorman, 2013), are less likely to understand that genetic testing is not required (Bryant et al., 2015), less likely to receive the influenza vaccine during pregnancy (Ahluwalia et al., 2014), experience significantly higher rates of primary or first time cesarean section deliveries (Min et al., 2015), and are more likely to experience infection in the peripartum period and postpartum hemorrhage (Grobman et al., 2015). Most powerful is Eichelberger et al.’s (2016) finding that nearly all of these differences “are not explained by either site of delivery or patient-level risk factors” (Eichelberger et al., 2016, p. 1171). Shifting towards their commentary and analysis of reproductive endocrinology and infertility, according to data collected from the Society of Assisted Reproductive Technology’s national database, Black women only accounted for 4.6% of in vitro fertilization (IVF) cycles in comparison to white women who accounted for 85.4% of IVF cycles. Though one could argue that the percentage differences could be attributed to lack of access for Black women, “even

when Black women attain equal access to IVF, disparities in odds of achieving pregnancy persist" with white women having significantly higher chances of live births and significantly lower rates of miscarriages (Eichelberger et al., 2016, p. 1172). By concluding that these findings are not only statistically significant but also morally unjust, Eichelberger et al.'s (2016) noted frustration with the lack of outrage reinforces their question of when will the enormity of evidence proving the severity of the issue coupled with the repeated loss of life be enough to warrant a deliberate and solutions-oriented commitment to ending the disparities. Essentially Eichelberger et al. (2016) are begging the question, when will Black lives matter? In their concluding statement, Eichelberger et al. (2016) challenge maternal medicine providers to consider how:

> accepting that Black women do worse in your research study, worse in your quality improvement project, or are absent from your clinical trial as the status quo directly reinforces the lesser value our society has assigned to Black women's lives. (p. 1772)

A Call to Action from the American College of Obstetrics and Gynecology

In partnership with 24 medical organizations, the American College of Obstetrics and Gynecology (ACOG) (2020) released a joint statement drawing national attention to the ways that racism directly impacts maternal medicine. ACOG reports that there is a strong emphasis on "recognizing that race is a social construct, not biologically based" and the importance in "understanding that racism, not race impacts health care, health, and health outcomes" (ACOG et al., 2020, p. 1). Furthermore and arguably more important, the statement moves on to spotlight the multitude of injustices that women of color, specifically Black women, have been forced to endure for the sake of medical advancement. Though not in detail, ACOG (2020) note "it is beyond the scope of this document to describe all the injustices inextricably linked to the fields

of obstetrics and gynecology" or even more so "recognize all the contributions made both willingly and unwillingly by oppressed and marginalized persons" (ACOG et al., 2020, p. 1). This admission aids in setting the tone for the seven principles that are listed as avenues towards improvement in this area: collaboration, education, recognition, scholarship, research, publication, guidance, inclusive excellence, caring for patients and communities, and policy and advocacy (ACOG et al., 2020).

One of the most compelling aspects of ACOG's (2020) proposed solution serves as the foundational element necessitating this research: their desire to draw upon "the expertise of scholars, advocates, and activists… [to develop a curriculum that will become] available to medical and health professional students, residents, faculty, practicing obstetricians, gynecologists, and all health care professionals" (ACOG et al., 2020, p. 2). Lastly, while the creation of a curriculum that directly addresses the ways in which racism informs the care that patients of color are receiving and the greater maternal morbidity and mortality crisis affecting the United States is both urgent and necessary, no further mention of its creation has been offered by ACOG presumably as its content is still being researched and developed.

Implicit Bias Training in the Field of Medicine

In "Reducing Implicit Bias Through Curricular Interventions," Boscardin (2015) argues that in efforts to decrease implicit bias in healthcare, interventions must be targeted towards both the individual and the institution. More specifically, interventions are needed to address problems at "the individual student level by increasing self-awareness" while also challenging reforms "at the institutional level by changing the cultural environment" (Boscardin, 2015, p. 1726). Using a solutions-based approach to this issue, the first proposed intervention is to increase self-awareness among healthcare providers. Interestingly, a link between

stress-inducing environments, pressures of completing tasks within a condensed period of time, and cognitive overload were all found as "catalysts for the activation of implicit bias" (Boscardin, 2015, p. 1726). Moreover, Boscardin (2015) asserts that self-reflection exercises such as implicit bias assessments across the medical school curriculum, from entry through continuing medical education licensure credit(s), may enhance providers' ability to dually recognize the impact of their implicit biases and confront the manner in which they may pervade patient care (Boscardin, 2015).

Boscardin (2015) recommends the creation of an inclusive learning environment which is especially necessary when discussing topics of implicit bias and cultural competency. Understanding that learning is not a linear process but rather an amalgamation of shared experiences, individual bias, and knowledge that all uniquely mesh together, highlights the importance of creating an environment that fosters inclusivity of thought, ideas, and unique experience (Boscardin, 2015). Furthermore, a growing body of research has shown that implementing cultural competency training alongside interactive discussion-based activities in a perceived inclusive learning environment has proved beneficial in increasing the willingness of faculty to facilitate potentially challenging discussions about race, diversity, and social injustices with their medical students (Boscardin, 2015). The final recommendation is two-fold. Research from Schumann et al. (2014) found when empathy is understood as a quality that can be developed and improved upon over time as opposed to a fixed trait, empathy towards people of different races that one's self can increase (Schumann et al., 2014). With Schumann et al.'s (2014) research as the foundation, Boscardin (2015) asserts empathy skills development training for current and future health care providers and medical school students is imperative to reducing the effect of implicit bias and improving patient care. Overall, Boscardin's (2015)

recommendations build upon the rationale for why implicit bias training has been deliberately included in the creation of this introductory seminar outline.

Discussing Race as a Social Construct in Medical Education

Sharma and Kuper (2017) address the complex problem with discussing race as a purely biological marker instead of as a social construct perpetuating power differences and access inequality. Interestingly, Sharma and Kuper (2017) make a very compelling argument noting that "relying on a 'common-sense' understanding of race as biological truth and valid unit for comparison or analysis" perpetuates the flawed biological logic deeming whiteness the standard that individuals of non-white races are always compared to (Sharma & Kuper, 2017, p. 762). In fact, continuing to discuss race as a biological truth rejects the 1950 United Nations Educational Scientific and Cultural Organization (UNESCO) ruling of race as a social myth that has caused an enormous amount of human suffering (UNESCO, 1950). Sharma and Kuper (2017) go on to assert understanding "race and racism as fractured, multilayered, and actively occurring processes by which socially constructed 'racial' and ethnic categories are ordered" may help medical educators, healthcare providers, and students differentiate between health-based and race-based medical decision making (Sharma and Kuper, 2017, p. 762). Sharma and Kuper (2017) also discuss the necessity for healthcare providers to become increasingly more race conscious and challenge the ugly existence of 'everyday racism,' most commonly evidenced through occurrences such as microaggressions. This means that discussions about race must address how racism, an action, has targeted and led to detrimental effects that disproportionately harm people of color. Sharma and Kuper (2017) defy the more digestible solution of accepting the long-held belief that race is a biological truth. Instead, Sharma and Kuper (2017) challenge the healthcare community to conceptualize race as a social construct in efforts to tackle the

racialization of health disparities as well as actively commit to ousting racism in healthcare, medical research and education, and the greater medical community.

Curriculum Modalities

DallaPiazza et al. (2018) offer a very detailed summary and comprehensive overview of one medical school's explorative racism and health education session. Offered as part of a more overarching curriculum on health equity, social justice, and the effect that racism plays on health outcomes, this session was conducted for first-year medical students and reported the educational objectives:

> define race and racism…, describe historical examples of institutional racism in science and medicine…, differentiate the levels of racism and how they can affect health…, [and] utilize tools to address and cope with racial bias in the health care setting (DallaPiazza et al., 2018, p. 1).

Upon reflection of the methods, implementation, and discussion, one of the biggest takeaways from DallaPiazza et al. (2018) is the importance of catering to the learning styles and needs of the students. The physicians who conducted the study used a blended classroom approach after finding this method to be the most successful; an approach that implemented a "didactic lecture prior to engaging in a small-group discussion in order to demonstrate that the legacy of racism influences the unconscious bias in everyone" (DallaPiazza et al., 2018, p. 9). The lecture included information regarding ways in which racial bias infiltrates and affects several aspects of health. Moreover, discussion about how racial bias "permeates the physician-patient relationship proved to be eye-opening for many students and was important for framing the small-group discussions that followed" (DallaPiazza et al., 2018, p. 9). The importance of understanding and referencing examples of successful race based medical school

teachings, bolsters confidence in the idea that effective education incites greater awareness and understanding.

Narrowed to the importance of disparity reduction training in maternal medicine, Jain and Moroz (2017) assert the need for a comprehensive education program for patients and providers. One of Jain and Moroz's (2017) central points is the critical recognition of the broad spectrum of learning styles that maternal medicine providers possess, with particular attention paid to the emerging cohort of millennial providers whose presence has increased over time. Contemporary learning strategies reflect the use of online and electronic media which have created more interactive learning opportunities (Smith & Foley, 2016). Millennial providers have become increasingly accustomed to learning via interactive and didactic learning styles because these styles were initially employed upon this age group with the introduction of electronic media into primary and secondary education (Smith & Foley, 2016). Furthermore, as this age group increasingly emerges into healthcare, the incorporation of these styles will be important in disparity reduction training that is developed for maternal medicine providers (Jain & Moroz, 2017). The need to implement innovative educational strategies with content focused on disparities in healthcare and health outcomes was a topic additionally discussed at the 2017 Society for Maternal-Fetal Medicine Annual Scientific Meeting. Interestingly, while Jain and Moroz (2017) claim that assessing provider awareness of health inequity, disparities in health outcomes, disparities in care, and "the identification of new and effective modalities for disparities education among providers" is of utmost importance, they do not describe what elements should be included in this education program and why (Jain & Moroz, 2017, p. 327). Despite its recommendation to use contemporary and interactive learning styles to captivate a

younger generation of healthcare professionals, the ultimate question of what this education should look like remains, further necessitating the goal of this research.

Discussion

For far too long, maternal medicine healthcare providers, as a collective, have been able to absolve themselves of responsibility, shifting the gut-wrenching reality of patient morbidity or mortality onto circumstances outside of themselves. Maternal medicine doctors, nurses, and other healthcare providers must recognize that just as life experiences shape the health and well-being of their patients, their own experiences can and do shape the care they provide to those same patients. Recognizing that maternal medicine providers are a critical piece of not only the problem, but more importantly the solution, reinforces the necessity for providers to be educated on the abhorrent truth that medical racism has disproportionately allowed for this crisis to overwhelmingly fall onto the shoulders of women of color, especially Black women.

Although there are a multitude of problems worthy of acknowledgement and remedy in regards to the relationship between medical racism and the maternal morbidity and mortality crisis, this introductory seminar outline will highlight four key areas to enhance provider awareness both of themselves and of the issue at hand: addressing implicit bias, centering the voices of Black mothers through experiences of trauma, brief history of obstetric injustice against Black women in the field of maternal medicine, and understanding race as a social construct. The decision to create an introductory seminar outline is rooted in the idea that by exposing the participants to enough information to understand why each element was deemed important for them to learn, the audience will recognize the necessity for and appropriateness of subsequent sessions; one specific to each of the four elements that would go into much greater depth about the topic, utilize an amalgamation of interactive resources, and rely upon discussion

based learning techniques to enhance understanding and engagement with the content. Lastly, reflecting upon the curriculum modalities section of the literature review, the importance of creating a space conducive to a positive flow of thoughts and ideas is imperative to a healthy learning environment. Though delivery methods of the introductory seminar will not be discussed, this research is still pertinent as it better informs successful learning practices and techniques that could be used in further research.

The Necessity of Addressing Implicit Bias

Founded in 1998 by Dr. Tony Greenwald of the University of Washington, Dr. Mahzarin Banaji of Harvard University, and Dr. Brian Nosek of The University of Virginia, Project Implicit was officially launched in 2011. Through the creation of the Implicit Association Test, or the IAT, as it is more commonly known, the essential mission of Project Implicit is "to educate the public about bias and provide a "virtual laboratory" for collecting data on the internet" (Project Implicit, 2011). As defined by the National Center for Cultural Competence (NCCC) at Georgetown University, implicit or unconscious biases are attitudes and beliefs that operate "outside of the person's awareness and can be in direct contradiction to a person's espoused beliefs and values" (NCCC, n.d.). Although no person is immune from the plight of implicit bias nor do healthcare providers enter the field devoid of altruistic sentiment, the impact of bias and prejudice in healthcare can have extreme consequences and is thus deserving of acknowledgement. The Implicit Association Test (IAT) is a comprehensive exam broken down into fifteen key sub-categories with a variety of topics; however, only one will be identified given its appropriateness to maternal medicine healthcare providers and the maternal morbidity and mortality crisis as it pertains to Black women in the United States.

Understanding one's own unconscious ideas of race will further inform their awareness of how these perceptions may influence patient care. As described by Project Implicit, the *Race* ('Black - white' IAT) "requires the ability to distinguish faces of European and African Origin" and indicates that "most Americans have an automatic preference for white over black" (Project Implicit, 2011). Having already laid the foundation connecting the influences of medical racism and its impact on Black women, it is the responsibility of the maternal medicine provider to at the very least be aware of how their experiences can and do shape their perceptions as it pertains to white versus Black bodies. Given that most Americans have an unconscious preference for white people both generally and in comparison to Black people, the idea that healthcare providers do not share that same preference would be ignorant and irresponsible; thus, emphasizing the importance of this population to continually be aware of the ways in which their habitual engagement in unintentionally harmful behaviors have negative impacts on their medical decision-making.

Supporting the case for maternal medicine providers to confront their implicit racial bias using the white-Black IAT, Green et al. (2007) found after exposing emergency room and internal medicine resident physicians to their implicit bias through the white-Black IAT the residents acknowledged a greater vulnerability to the impact of unconscious bias, acknowledged that unconscious bias can affect their clinical decisions, learning more about the impact of their bias could improve their patient care, and the experience of completing the IAT heightened their awareness of implicit bias (Green et al., 2007). Moreover, Chapman et al.'s (2013) discovery that the relationship between implicit bias and health care disparities could decrease if providers acknowledged their vulnerability to implicit bias underscores the value of addressing implicit bias in disparity reduction (Chapman et al., 2013). Ultimately, exposing maternal medicine

providers to their implicit bias is necessary to combat the interconnectedness of medical racism and the maternal morbidity and mortality crisis.

Centering the Voices of Black Women Through Their Narratives of Trauma

Heartbreaking stories of Black women sharing the ways in which they feel wronged, silenced, and/or ignored by their maternal medicine providers are unfortunately, but unsurprisingly, all too commonplace in the United States. While their stories, like any personal narrative, are subjective in nature, one powerful and all too familiar theme proves to be a constant: overt and/or covert racism. Though the ways in which the violent and destructive nature of racism have changed over time, its immensely harmful impact on Black women persists. One of the many perplexing facets of racism is its pervasiveness across all levels of education, socioeconomic status, ages, and gender identities. While the following narratives of trauma may or may not have been rooted in racism, they are however representative of the reality that Black women can be and are actively ignored in medical spaces.

Superstar professional tennis player and winner of twenty-three Grand Slams, Serena Williams, shared her harrowing story of postpartum complications that nearly took her life in a 2018 interview with *Vogue* magazine and again in a self-written piece published in the April 2022 issue of *Elle* magazine. Having already endured a life-threatening pulmonary embolism years prior, Williams was no stranger to the severity of this adverse health occurrence. The day after delivering her daughter, Olympia, via emergency cesarean section in 2017, she began to experience a sudden onset of shortness of breath and because of her past experience, gasping for breath, she quickly sought the attention of a nurse insisting that something was wrong and "that she needed a CT scan with contrast and IV heparin (a blood thinner) right away" (Haskell, 2018, para 11). Instead of taking a still short-of-breath Williams at her word, the nurse she spoke with

suggested that the pain medication she was taking might have been making her confused. Again, a very persistent Williams insisted “No, I’m telling you what I need: I need the scan immediately. And I need it to be done with dye…I’m telling you, this is what I need.” (Williams, 2022, para 18). Eventually, a physician conducted an ultrasound, which unsurprisingly revealed nothing, followed by a CT scan, per Williams original request, which revealed several small blood clots in her lungs and a heparin drip was promptly started (Haskell, 2018). However, her bout of complications did not end there. Ultimately, as a result of frequent and severe coughing, Williams’ surgical incision burst and because of the blood thinner she was administered she began to hemorrhage at the incision site (Williams, 2022). After several surgeries to repair extensive damage caused by the blood clots, Williams’ condition stabilized and she was sent home a week later, confined to bed rest for an additional six weeks (Haskell, 2018). Thankfully, the cause of Williams' complication was identified, despite being initially dismissed by the nurse; however, not all Black women who experience postpartum complications share the same fate. Mirroring the often preventable nature of maternal morbidity and mortality, Williams (2022) asserted:

> Many of these deaths are considered by experts to be preventable. Being heard and appropriately treated was the difference between life or death for me; I know those statistics would be different if the medical establishment listened to every Black woman’s experience (Williams, 2022, para. 23).

A sentiment heard, felt, and expressed by Black women across the United States, maternal medicine providers must no longer be allowed to continue this unethical practice of ignoring and/or placing little to no value in the words spoken by Black women. Black lives matter and are undoubtedly deserving of protection. Listening to the traumatic stories of Black

women is imperative to understanding that the maternal morbidity and mortality crisis is not an abstract issue, it causes real harm and devastation to real people and families.

Not all Black women who share the traumatic experience of being ignored and dismissed are lucky enough to eventually receive the life-saving treatment they are crying for, a heartbreaking reality that the Irving family is undeservingly familiar with. Amy Roeder (2019) describes the story of Shalon Irving, an epidemiologist at the United States Centers for Disease Control and Prevention, who lost her life in 2017 after being repeatedly ignored by her providers following the birth of her daughter. For three weeks after the successful cesarean section of her daughter, Soleil, Irving made several visits to her primary care providers; "first for a painful hematoma (blood trapped under layers of healing skin) at her incision, then for spiking blood pressure, headaches and blurred vision, swelling legs, and rapid weight gain" (Roeder, 2019, para. 6). In an interview with ProPublica, Irving's mother, Wanda, highlights at her late daughter's appointments, providers repeatedly told her that the symptoms she was experiencing were normal and that she just needed to wait them out. According to Roeder (2019), hours after her last appointment, "Irving took a newly prescribed blood pressure medication, collapsed, and died soon at the hospital when her family removed her from life support" (Roeder, 2019, para. 6). Central to both Williams' and Irving's stories is the refusal of medical professionals to take them seriously, although in Williams' case garnering a much less devastating result. Black women being dismissed and ignored in medical spaces is an unacceptable problem that requires an immediate solution.

Survey data collected by Mehra et al (2020) of twenty-four Black female participants revealed an overarching theme. Not only did the women feel as though neither their existence as Black women or their pregnancies were valued by society, but these women also reported that

the immense judgments and negative assumptions associated with these identities were a major source of stress during their pregnancy and shaped their relationships with health care providers (Mehra et.al., 2020). More specifically, a woman referred to as Participant 11, succinctly captured the reality of this experience stating,

> I do think pregnancy is harder for Black, African-American women, I really do. We get the most judgment. I notice that there be a lot more Black women stressed during their pregnancy, that I have witnessed (Mehra et al., 2020, p. 487).

Participant 11 also shared an experience she had with a healthcare provider who, without proper cause, recommended she undergo a tubal ligation; noting that the rationale for the recommendation was that she was pregnant with her third child and that was enough. Mehra et al.'s (2020) analysis of this interaction, particularly the midwife's implication that having three children was more than enough coupled with the suggestion "that the participant should use a permanent form of contraception to control her fertility devalues Black pregnancies and Black infants and denies Black women reproductive autonomy" an occurrence not only inappropriate, but arguably one that may not have happened if she were white (Mehra et al., 2020, p. 488). Juxtaposed against this ill-suited affair is the experience of Participant 4, who shared how being under the care of maternal medicine providers who made her feel both comfortable and heard, aided in her willingness to be forthcoming with her questions and details about her pregnancy, stating

> They're [her providers] nonjudgmental and it helps me pursue a stronger relationship with them…Like, the questions that they ask me that I was concerned about, I was comfortable with telling the truth without feeling ashamed (Mehra et al., 2020, p. 488).

Ultimately, Participant 4's experience should be an expectation for all women, regardless of any identifying characteristic; however, this expectation is often an exception for many Black women in the United States. It is the responsibility of maternal medicine providers to listen to their patients when they speak and respond to their needs appropriately. According to Participant 11, unsubstantiated and inappropriate medical advice based on personal ideologies, and arguably racist stereotyping of Black women as hyperfertile and/or hypersexual, have no place in medicine and are incredibly harmful to the health and safety of Black women (Mehra et al., 2020). Understanding the ways in which Black women feel repeatedly ignored and disenfranchised by maternal medicine providers may provoke greater awareness and attention to the impact of their words and actions. At the very least, by educating maternal medicine providers on the importance of listening to understand the concerns of Black women as opposed to ignoring or dismissing them entirely, the goal is to create better provider-patient relationships, such as mentioned by Participant 4. Centering the traumatic narratives of Black women in discussions about the interconnectedness of medical racism and the maternal morbidity and mortality crisis should also help in the timely identification of potentially life-threatening and preventable health outcomes entirely.

History of Obstetric Injustice Against Black Women in the Field of Maternal Medicine

Poisoned by a long history of medical abuse and unethical experimentation, the medical specialty of obstetrics and gynecology is rife with occurrences detailing the manipulation and exploitation of Black female bodies. Although there are myriad examples highlighting the history of mass injustices the predominately white maternal medicine provider pool has inflicted upon Black women, only one will be discussed in detail: Dr. James Marion Sims' nonconsensual surgical experimentation on enslaved Black women.

Known as the 'father of modern gynecology,' Dr. James Marion Sims unethically used the bodies of several enslaved Black women in the name of medical advancement. One of many historical injustices chronicled in Deirdre Cooper Owens' (2017) nonfiction book, *Medical Bondage: Race, Gender, and the Origins of American Gynecology*, regards Dr. Sims' exclusive experimentation on enslaved Black women to identify a cure for the vesicovaginal fistula. Defined by the Cleveland Clinic, a vesicovaginal fistula is "an opening that develops between the bladder and the wall of the vagina… [resulting in] urine [that] leaks out of the vagina" a common occurrence for women who experienced prolonged vaginal labor (Cleveland Clinic, n.d.). Furthermore, Owens (2017) discusses seventeen-year-old Anarcha, Sims' first enslaved patient he leased from her slave master, Mr. Wescott, in 1844 specifically for the purpose of experimentation. During the period when Sims was experimenting on Anarcha, he was also similarly experimenting on two other enslaved women, Betsy and Lucy. Not only were these women forced to grapple with the immense pain of repeated surgeries over an extended length of time, but Cooper Owens (2017) also highlights that after the departure of Sims' medical apprentices, due to loss of support, the women he was experimenting on "would be trained as skilled medical workers, yet they would still have to labor as domestic and agricultural slave workers" (Cooper Owens, 2017, p. 38). Forcing Anarcha, Betsey, and Lucy into these roles proves contradictory to Sims' original claim for leasing them as experimental objects being that their condition made them unfit to carry out the responsibilities of slaves (Cooper Owens, 2017). Over five years, having conducted thirteen surgeries on Anarcha in total, Sims "successfully repaired her fistula, closing it permanently with silver sutures" (Cooper Owens, 2017, p. 38). During Sims' fourth year of experimentation in 1848, he was elected and served as the recording secretary of the Medical Association of Alabama. Eventually, as a result of his prominence and

discovery of techniques advancing the field of gynecology, he was elected and served as president of the American Medical Association and the American Gynecologic Society. More importantly, though Sims did successfully discover a cure to the fistula and was praised for his efforts, there is a much greater lesson to be learned. Scholars familiar with Sims' work often acknowledge that he unethically experimented on enslaved Black women without the use of anesthesia. While this is true, at the time anesthesia had just been invented and was not a mainstay of surgical medicine as it is today. However, the reprehensibility of his actions lie in the fact that his experimentation was forced upon the most vulnerable members of society, enslaved Black women. Not only were these young Black women forcibly subjected to gross mutilation and a total loss of autonomy, but the beneficiaries of this experimentation were wealthy white women (Cooper Owens, 2017). Heroizing Sims while relegating the women he experimented on to arguably nothing more than medical test subjects, reinforces the idea that the manipulation and abuse of Black women is an acceptable price to pay for the sake of medical advancement. This idea also parallels the problem with Black women being perpetually ignored by maternal medicine providers as it underscores their own invisibility. The repeated shared experience of Black female voices going unheard in medical spaces, unnoticed when advocating for their own health, and untold in historical narratives censoring their horrific exploitation contribute to the unacceptable erasure and invisibility of Black women.

Though nothing will reverse or make up for the unimaginable horrors that these women and others had to go through, in efforts to recognize and educate maternal medicine physicians about the experiences of Anarcha, Betsy, and Lucy, in particular, the American College of Obstetrics and Gynecology (ACOG) (2021) have asserted that the horrific stories of these women "have helped raise awareness about racism in medicine and the abuses endured by people

of color that have often been overlooked in medical history" (ACOG, 2021, para 2). The report also reinforces their commitment to not only taking accountability for the ways in which the field of obstetrics and gynecology has perpetrated violence against people of color, but also their organizational dedication to intentionally working to dismantle systemic and institutionalized racism that pervade and negatively impacts people of color and other marginalized groups (ACOG, 2021). Slavery, racism, and maternal medicine are all inextricably linked together. Educating maternal medicine providers that slavery allowed for the rapid development of maternal medicine and especially the progression of gynecological surgery, is important to establishing a trend where Black women have been wronged by maternal medicine (Cooper Owens, 2017). The painful contributions made by Anarcha, Betsy, Lucy, and others have largely been forgotten by the field of obstetrics and gynecology and catalyzed practices that maternal medicine providers benefit from today. Furthermore, discussion and analysis of how Dr. Sims' actions contributed to the loss of bodily autonomy endured by Black women is necessary for maternal medicine providers to learn. By educating maternal medicine providers of this horrific history, they will be better equipped to understand the generational trauma inflicted upon Black bodies and potentially account for the ways in which this reality actively harms their patients and may cause distrust of medical professionals. Exposing the truth is not only necessary to encourage greater awareness, but also serves to continue the process of dismantling the centuries-old historical ramifications of medical racism, a proven driver of the maternal morbidity and mortality crisis and its disproportionate effect on Black women.

Race as a Social Construct

To better understand race as a social construct, one must understand what race is. Defined by the Smithsonian's National Museum of African American History and Culture, race

> while not a valid biological concept… is a human-invented, shorthand term used to describe and categorize people into various social groups based on characteristics like skin color, physical features, and genetic heredity (Smithsonian Institute, n.d.).

One of the most obvious examples of this phenomenon is the categorization of people as 'white' or 'Black' when these terms are highly subjective. The idea of whiteness and blackness do not have defined global boundaries and are not permanent transnational fixtures. For example, someone who is categorized and further recognized as Black in the United States may not be categorized identically in Latin or South American countries because this idea is based entirely on socially accepted perceptions. Yet another example presents itself in the history of the ever-evolving American ideal of whiteness. Initially, the racial categorization of 'white' belonged only to Anglo-Saxon people however, because of immigration that occurred over time this racial identity grew to include those of a plethora of ethnicities specifically to enjoy the consequences of not being 'Black.' Quoted in the National Museum of African American History and Culture's article titled "Talking about Race," activist Paul Kivel is noted saying "whiteness is a constantly shifting boundary separating those who are entitled to have certain privileges from those whose exploitation and vulnerability to violence is justified by their not being white" (Kivel, 2002, p.15). Moreover, the deliberate racialization of whiteness as more intelligent, more human, and of greater capability than non-white people, specifically Black people, was a form of rhetoric used to justify horrific acts of racism (Smithsonian Institute, n.d.). Not only was whiteness used to justify centuries of kidnapping, torture, and slavery, but the vestiges of this nonsensical ideology have transcended the lengths of time and are relentless in their pursuit of the degradation of Black individuals both in the United States and around the world (Smithsonian Institute, n.d.).

In efforts to advance anti-racist and evidence-based concepts, two policies that concretely identify race as a social construct were adopted at the American Medical Association's (AMA) Special Meeting of its House of Delegates (HOD) in 2020. The two new policies were adopted to evoke a greater understanding of "race as a socially constructed category different from ethnicity, genetic ancestry, or biology, and aim to end the misinterpretation of race as a biological category defined by genetic traits or biological differences" (AMA, 2020, para 2). The AMA noted that continuing the practice of racial essentialism or accepting race as a biological construct, contributes to the exacerbation of health disparities that disproportionately affect marginalized minority communities and results in detrimental and devastating health outcomes (AMA, 2020). Organizational level legislation such as this proves to be a positive step in the direction towards prioritizing the health and safety of all patients.

Specific to maternal medicine, understanding that race is a social construct is vital to conceptualizing the gravity of the maternal morbidity and mortality crisis in the United States. Given the fact that this crisis impacts significantly more Black women than any other racial group in the United States, compounded by the racist history of the profession, the necessity for healthcare providers in the field to shift their mindset and understand the abhorrent truth of racism and its origins in the deliberate creation of race is urgent. The sanctity and preservation of Black female bodies and Black children depend on the arduous fight to dismantle the ways that medical racism perpetuate this crisis. By educating maternal medicine providers about this truthhood and its direct correlation to the sustenance of health disparities, one of which being how markedly the maternal morbidity and mortality crisis affects Black women, the goal is to evoke greater awareness about how their care may have aligned with this ideology but more importantly how to defy any acceptance of race and by extension racism as biological truth.

Limitations and Further Research

Due to time constraints, a limitation of this thesis is the lack of discussion regarding how each element of the introductory seminar outline would be delivered to maternal medicine providers. Further research of this thesis would necessitate a multifaceted approach. Research and discussion of how the introductory seminar's content would be delivered to the target audience is crucial to ensuring evidence-based learning strategies would be used. Analyzed in the literature review section of this thesis, particular attention to the incorporation of innovative learning styles is imperative when creating educational training programs. Further research of this thesis would also create a comprehensive set of seminars, trainings, or modules that would extensively educate maternal medicine providers on how medical racism perpetuates the disproportionate effect of the maternal morbidity and mortality crisis on Black women.

Conclusion

When will Black lives matter? This question encapsulates one of the quintessential aspects of the maternal morbidity and mortality crisis, a crisis that disproportionately affects Black women. Not only are nearly half of these events preventable, but medical racism is a key driver perpetuating the enormity and severity of this crisis, a fixture that deserves no place in medicine or the greater American society. The time is now for a concerted and steadfast commitment to adequately address and combat medical racism and maternal medicine providers' implicit bias. An effort must be made to ensure that Black women are guaranteed access to safe and equitable reproductive health care without worry of how the evil nature of racism will harm them.

Through a literature review, this research paints an in-depth picture of the severity of the maternal morbidity and mortality crisis in the United States and a comprehensive analysis of its

alarming effect on Black women. Having laid that foundation, understanding how medical racism and implicit bias continue to fuel the existence of this crisis was imperative to the decision to create an anti-racist introductory seminar. Second, an introductory seminar outline was created which offers insight into four key areas: addressing implicit bias, centering the voices of Black women through their narratives of trauma, history of injustice in maternal medicine at the cost of Black female bodies, and understanding race as a social construct. Without question, maternal medicine providers must be able to recognize the ways in which medical racism has and still does lead to the loss of Black lives while also acknowledging their own complicity in the matter. By providing maternal medicine providers an opportunity to not only look inward, but to also better understand the vast and far-reaching complexities of this crisis, through an introductory seminar outline this group will be better equipped to provide more culturally competent care thus improving clinical decision making and maternal healthcare for Black women in the United States.

Ultimately, Black women deserve to be protected in reproductive and maternal health spaces. Black women deserve to have their voices heard by the providers whose responsibility is to care for them. Black women deserve a pregnancy journey where the color of their skin is not a sentence to a poor health outcome. Above all, Black women deserve a commitment to the creation of a more equitable maternal and reproductive healthcare system, a task this thesis aims to fight for.

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