

PROJECT 1: INVESTIGATING MATERNAL MORTALITY and MORBIDITY

PROGRESS REPORT 2/14
GROUP 7

Project Topic: Maternal Mortality and Morbidity Across Race

QUESTION: Do black women in the united states (u.s.) disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups?

ALTERNATE HYPOTHESIS: Yes. There is a correlation between the rate of incidence of maternal mortality or morbidity and race. Black women in the united states (u.s.) disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups

NULL HYPOTHESIS: No. There is no correlation between the rate of incidence of maternal mortality or morbidity and race. Black women in the united states (u.s.) experience adverse pregnancy outcomes, including maternal mortality, proportionately to women of other racial and ethnic groups

RESEARCH QUESTIONS:

(ALL/CHRIS)

(MAIN_Q1): Do black women in the united states (u.s.) disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups?

ANSWER: yes. Black women in the united states (u.s.) disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups. Our results suggest a strong correlation between rate of incidence of maternal mortality and race (the racial and ethnic groups comprised of minority identities (non-white) experienced higher rates of maternal mortality and morbidity consistently over the past half century)

(ALL/MIA/CHRIS)

(MAIN_Q1.1) If black women in the united states (u.s.) disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups, what might be considered factors of influence?

ANSWER: genetic susceptibility, implicit biases, and social determinates of health including income, employment status, geographic location, and education, have an impact on / a relationship with the rate of incidence of maternal mortality and morbidity.

(ALL/CHRIS)

(MAIN_Q1.2): Has the rate of incidence of maternal mortality and morbidity decreased over time (past half century) adjacent to the advancement of medicine and technology?

ANSWER: No. Despite the relatively progressive advancements in technology and medicine, maternal mortality and morbidity rates of women in the U.S. have, on average, increased over time with a moderately strong relationship between the two variables (rate of incidence of mm and mm and time)

(ALL/MIA)

(MAIN_Q2): **If** black women in the united states (u.s.) **do** disproportionately experience adverse pregnancy outcomes, including maternal mortality, compared to women of other racial and ethnic groups, what might be considered factors of influence?

ANSWER: Genetic susceptibility, implicit biases, and social determinants of health including income, employment status, geographic location, and education, have an impact on and/or a relationship with the rate of incidence of maternal mortality and morbidity.

MIA:

(IMPLICIT_BIAS_Q1): Do implicit biases have an impact on maternal morbidity and/or mortality in the U.S.?

ANSWER: Implicit racial bias has been reported in the health care system and can affect patient-provider interactions, treatment decisions, patient adherence to recommendations, and patient health outcomes

MIA:

GENETIC_SUSCEPTIBILITY_Q1): Does genetic susceptibility have an impact on maternal morbidity and/or mortality in the U.S.?

ANSWER: genetic susceptibility can contribute to disparities in disease incidence, prevalence, and severity between different racial and ethnic groups

CHRIS:

(LOCATION_Q1): Does geographic location impact maternal mortality and morbidity within the united states?

ANSWER: Yes. More than half of pregnancy-related deaths happened in large metropolitan areas (76.3% - urban v. 23.7% - rural).

CHRIS:

(LOCATION_Q1.2) What relationship does the influential factor of geographic location have on different ethnic/racial groups?

ANSWER: While more than half of pregnancy-related deaths happened in large metropolitan areas (76.3% - urban v. 23.7% - rural), the risk of dying from pregnancy-related causes is higher in rural areas. These disparities were found across urban and rural communities, and also varied across race/ethnicity. Thus, it is important to note that some other factor(s) is affecting the rate of incidence of maternal mortality and morbidity experienced amongst racial groups in the US.

MILES:

(EDUCATION_Q1): Does level of education attained impact maternal mortality and morbidity within the united states?

ANSWER: the patterns observed in education levels across different racial groups can give us insights into potential disparities in maternal health outcomes. Higher education levels within each racial group may indicate better overall health and potentially lower rates of maternal mortality and morbidity.

(EDUCATION_Q1.2) What relationship does the influential factor of geographic location have on different ethnic/racial groups?

ANSWER: undetermined

kHADIJA:

(INCOME_Q1): Does income impact maternal mortality and morbidity within the united states?

ANSWER: YES. State income inequality is linked to increased pregnancy racial mortality across the United States.

(INCOMER_Q1.2) What relationship does the influential factor of income have on different ethnic/racial groups?

ANSWER: YES. State income inequality is linked to increased pregnancy racial mortality across the United States.