



Maternal Morbidity and its Intersection with Changes in the Environment during Gestation

Wenzhan Yuan *

Department of Gynecology, University of Fribourg, Fribourg, Switzerland

DESCRIPTION

Maternal morbidity is defined as any health condition or complication that occurs during pregnancy, childbirth, or the postpartum period, and that has a negative impact on the woman's well-being, functioning, or quality of life. Maternal morbidity can range from mild to severe, and can be acute or chronic. Some examples of maternal morbidity are hypertensive disorders, hemorrhage, infection, anemia, depression, and diabetes. Maternal morbidity can be influenced by various factors, such as the woman's age, parity, pre-existing conditions, access to health care, and socioeconomic status. However, one factor that is often overlooked is the environment. The environment can affect maternal health through multiple pathways, such as exposure to air pollution, extreme heat, natural disasters, and infectious diseases.

Air pollution is a major environmental hazard that can affect maternal health in several ways. Fine and ultrafine particulate matter (PM 2.5 and PM 0.1) can penetrate deep into the lungs and bloodstream, causing oxidative stress and inflammation in the maternal and fetal tissues. This can lead to adverse outcomes such as low birth weight, preterm birth, intrauterine growth restriction, congenital anomalies, and stillbirth. Moreover, air pollution can also increase the risk of developing chronic diseases such as asthma, cardiovascular disease, and diabetes in the mother and the child later in life. Extreme heat is another environmental stressor that can harm maternal health. Heat stress can cause dehydration, electrolyte imbalance, heat exhaustion, and heat stroke in pregnant women. These conditions can impair the placental function and blood flow, resulting in fetal hypoxia, acidosis, and distress. Extreme heat can also increase the risk of preterm labor, premature rupture of membranes, and neonatal morbidity and mortality.

Natural disasters, such as floods, droughts, storms, and earthquakes, can also affect maternal health by disrupting the availability and quality of health care services, water, sanitation, food, and shelter. These disruptions can increase the exposure to infectious diseases, malnutrition, mental stress, and violence,

which can adversely affect the maternal and fetal health. Natural disasters can also exacerbate the existing inequalities and vulnerabilities of pregnant women, especially those who live in low-resource settings. Infectious diseases, such as malaria, dengue, Zika, and COVID-19, can also pose a threat to maternal health, especially in regions where the climate change and environmental degradation facilitate the transmission of these diseases. Infectious diseases can cause maternal morbidity and mortality by inducing fever, sepsis, organ failure, and coagulopathy. They can also affect the fetal health by causing intrauterine infection, congenital anomalies, miscarriage, and stillbirth. One should aim to identify the sources, levels, and mechanisms of environmental exposures, and to evaluate the effectiveness and cost-effectiveness of interventions to reduce maternal morbidity and mortality. Policy should aim to establish and enforce standards and regulations to limit and monitor environmental pollutants, and to promote and support the adoption of clean and renewable energy sources. Action should aim to raise awareness and empower women and communities to take preventive measures and seek timely and quality health care services. Furthermore, there is a need for more collaboration and coordination among different sectors, stakeholders, and disciplines, to ensure a comprehensive and integrated approach to improve maternal health and the environment. In addition to the environmental factors mentioned above, there are other factors that can interact with the environment and affect maternal morbidity. For example, the woman's nutritional status, genetic susceptibility, and epigenetic modifications can modulate the response to environmental stressors and influence the health outcomes of the mother and the child.

CONCLUSION

Maternal morbidity and its intersection with changes in the environment during gestation is a complex and important topic that requires more attention and action from the global health community. Climate change and environmental degradation can exacerbate the existing and emerging threats to maternal health, and can have long-term consequences for the health and well-

Correspondence to: Wenzhan Yuan, Department of Gynecology, University of Fribourg, Fribourg, Switzerland, E-mail: yuan@friub.com

Received: 30-Jan-2024, Manuscript No. CMCH-24-25038; **Editor assigned:** 01-Feb-2024, Pre QC No. CMCH-24-25038 (PQ); **Reviewed:** 15-Feb-2024, QC No. CMCH-24-25038; **Revised:** 22-Feb-2024, Manuscript No. CMCH-24-25038 (R); **Published:** 29-Feb-2024, DOI: 10.35248/2090-7214.24.S22.004

Citation: Yuan W (2024) Maternal Morbidity and its Intersection with Changes in the Environment during Gestation. Clinics Mother Child Health. S22:004.

Copyright: © 2024 Yuan W. This is an open-access article distributed under the terms of the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited.

being of the mother and the child. Therefore, it is essential to implement policies and interventions that can reduce the exposure to environmental hazards, improve the access and quality of maternal health care, and enhance the resilience and adaptation of pregnant women and their families. They can also

affect the fetal health by causing intrauterine infection, congenital anomalies, miscarriage, and stillbirth. One should aim to identify the sources, levels, and mechanisms of environmental exposures, and to evaluate the effectiveness and cost-effectiveness of interventions to reduce maternal morbidity and mortality.