Maternal Sepsis

Sepsis is a life-threatening condition caused by infection. The body attacks its own organs and tissues, leading to tissue damage, organ failure and sometimes death. Maternal sepsis is sepsis that occurs during pregnancy or in the 42 days following delivery or other obstetric event. It is now the second leading cause of pregnancy-related death in the U.S. Most of these deaths are preventable through early identification and treatment of the underlying infection.

The New York State Department of Health (NYS DOH) has analyzed maternal sepsis data and identified risk factors that increase a woman’s likelihood of developing the condition. These findings are intended to guide public education efforts, assist healthcare providers in identifying patients at increased risk and ultimately improve outcomes for pregnant and postpartum women.

Demographic Risk Factors

- **Women of color** have significantly higher odds of developing maternal sepsis compared to white women:
  - **Hispanic women** have 2.1 times the odds of developing maternal sepsis compared to White women
  - **Black women** have 1.8 times the odds of developing maternal sepsis compared to White women
  - **Asian women** have 1.4 times the odds of developing maternal sepsis compared to White women

- Women **less than 20 years old** at time of birth are twice as likely to develop maternal sepsis compared to women ages 20-35.

- Women with an education level **below a Bachelor’s Degree** experience significantly higher odds of sepsis. This increase is most pronounced among women with less than high school education.

Obstetric Risk Factors and Maternal Morbidities

The vast majority of maternal sepsis cases occur within two weeks of delivery (or other obstetric event) and are associated with complications during childbirth.

- The most common risk factor is Cesarean delivery. Women who deliver via C-section are three times as likely to develop maternal sepsis and those who deliver vaginally.

Other Prevalent Maternal Morbidities/Obstetric Risk Factors identified using NYS DOH data include:

- Induction of labor
- Nulliparity (never having given birth)
- Premature rupture of membranes
- Preterm delivery
- Postpartum hemorrhage
- Blood products transfusion
- Multiple gestation

Comorbidities

The vast majority of comorbidities analyzed in the report were associated with significantly increased risk of maternal sepsis.

A full list of these can be found at Health Data NY

Patients with sepsis may complain of the following symptoms:

- Fever and chills and generally feeling unwell
- Dizziness and confusion
- Back or abdominal pain
- Foul-smelling vaginal discharge
- Feeling like their heart is racing
- Chesty cough
- Pain/burning on passing urine or not passing urine in a day

Sources:


The clinical signs of maternal sepsis can be found as part of ACOG District II Safe Motherhood Initiative: Sepsis In Pregnancy

ENDSEPSIS
The Legacy of Rory Staunton
endsepsis.org