Implementing Severe Maternal Morbidity Review in Illinois: Challenges and Solutions

Katie Garland, MPH; Stacie Geller, PhD
Center for Research on Women and Gender, University of Illinois at Chicago | Chicago, Illinois

Background

- More than 60,000 American women experience a severe maternal morbidity each year¹
- The rate of SMM doubled between 1998 and 2010¹
- SMM occurs at 50-100 times the rate of maternal mortality²
- CDC and ACOG recommend facility level multidisciplinary review of SMM³⁴
- In 2016, Illinois implemented SMM review in all obstetric facilities
- Illinois is the first state to launch statewide SMM review

Implementing SMM Review

- 120 obstetric hospitals in 10 Regionalized Perinatal Networks
- SMM form adapted from Council on Patient Safety in Women's Health Care⁶ and piloted at Perinatal Networks
- Existing mortality review committees review SMM cases
- Illinois’ perinatal data collection system adapted for SMM data

Defining SMM

Any Type of ICU/CCU Admission and/or ≥ 4 Units PRBCs Transfused

Unplanned or Planned Subsequent Acute Event

From conception to 42 days postpartum

Preventability of SMM

- Any action or inaction on the part of the health care provider, system, patient or combination of these factors that may have caused of contributed to the progression to more severe morbidity⁷
  - Did the women have to get as sick as she did?
  - Identification of provider, patient or system factors amenable to clinical, system and/or public health intervention

Challenges

1. Participation and buy in
   a. Participation varies widely across networks
   i. Administrator buy in strongly influences network engagement
   b. Confidentiality concerns
   c. Abstraction and review process is time intensive cases

2. Preventability of SMM
   a. Very few cases determined potentially preventable
   i. Previous research suggests 30-40% of SMM cases are potentially preventable⁸⁹
   b. Cases that found improvement opportunities but were determined not preventable, no improvement
   c. High amount of other cause and missing morbidity

3. Quality of SMM data
   a. Frequency of missing data
   b. Partially uploaded cases
   c. Different procedures for reviewing/uploading cases across networks

Solutions

1. Site visits to networks
   a. 6/10 site visits completed
   b. Presentation includes:
      i. Goals and expectations
      ii. Report back on network and state data

2. Training for review committees
   a. Webinar for committee members
   b. Topics include:
      i. Using the preventability model for morbidity vs mortality
      ii. Determining sequence and primary cause of morbidity
   c. Site visits to observe meetings

3. Ongoing quality improvement activities
   a. Monthly data reports to networks
   b. Monthly data corrections
   c. Biannual reports to IDPH

Conclusion

- Engaging administrators and hospital staff is critical
  - Increase in quality of cases after site visit
  - More responsive to correction requests
- Ongoing Training needs
  - Reviewing SMM cases for preventability is different from reviewing mortality cases
- Continuous quality improvement necessary to maintain data quality

For more information on Illinois’ SMM Review Project, see our recent publication in the Journal of Public Health Management and Practice:

References


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