

# Increased risk of complications, death during delivery for women with epilepsy

6 July 2015

A small fraction of pregnancies occur in women with epilepsy but a new study suggests those women may be at higher risk for complications and death during delivery, according to an article published online by *JAMA Neurology*.

Between 0.3 percent and 0.5 percent of all pregnancies occur in [women](#) with [epilepsy](#). However, there is inadequate data on obstetrical outcomes so the risk of [adverse outcomes](#) and death in this population of women remains largely unquantified.

Sarah C. MacDonald, B.Sc., of the Harvard T.H. Chan School of Public Health, Boston, and coauthors looked at obstetrical outcomes including [maternal death](#), cesarean delivery, length of stay, preeclampsia, preterm labor and stillbirth in a retrospective study of [pregnant women](#) identified through hospitalization records from 2007 to 2011. A total of nearly 4.2 million delivery-related discharges were included in the study group and of these 14,151 were women with epilepsy. Nationwide, this represented 69,385 women with epilepsy and about 20.4 million women without epilepsy in more than 20.5 million total discharges.

The authors found that women with epilepsy had a risk of death during delivery hospitalization of 80 deaths per 100,000 pregnancies, which is higher than the 6 deaths per 100,000 pregnancies found among women without epilepsy. The authors acknowledged several caveats including that their data lacked the ultimate causes of death during delivery among women with epilepsy. They also noted that while the risk of death is higher, the death of a mother during delivery is still very rare even among women with epilepsy.

"Regardless of the specific cause, the point that women recorded as having epilepsy have an [increased risk](#) of mortality remains a clinically relevant message suggesting that increased attention should be paid. Future research is

needed to determine the specific causes of mortality and how interventions might improve outcomes," the authors write.

The study also suggests women with epilepsy were at increased risk for other adverse outcomes, including preeclampsia, preterm labor and stillbirth. The women also had increased health care utilization, including an increased risk of cesarean delivery and prolonged hospital stay, regardless of [delivery](#) method, the study concludes.

In a related editorial, Jacqueline A. French, M.D., of the Langone School of Medicine at New York University, and Kimford Meador, M.D., of the Stanford University School of Medicine, Palo Alto, Calif., write: "The MacDonald et al study provides important new information and demonstrates several risks associated with pregnancy in WWE [women with epilepsy]. However, it raises far more questions than it answers. Most WWE have uncomplicated pregnancies. We need to understand the mechanisms underlying these risks, including [death](#), so that we can identify the specific population at risk and devise interventions to reduce these risks. Future studies need to confirm and build on the present findings to improve the care of WWE during pregnancy."

**More information:** *JAMA Neurol.* Published online July 6, 2015. [DOI: 10.1001/jamaneurol.2015.1017](#)

*JAMA Neurol.* Published online July 6, 2015. [DOI: 10.1001/jamaneurol.2015.1356](#)

Provided by The JAMA Network Journals

APA citation: Increased risk of complications, death during delivery for women with epilepsy (2015, July 6) retrieved 26 November 2022 from <https://medicalxpress.com/news/2015-07-complications-death-delivery-women-epilepsy.html>

*This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.*