

## Merck for Mothers in the United States

When a woman is healthy and experiences safe, high-quality, and respectful maternity care, we set the foundation for her, her family, and her community to thrive for generations to come. This leads to more newborns surviving, children staying in school, women making valuable contributions to their society, and stronger health systems. We call this the "Mom Effect".

#### **About Merck for Mothers**

Merck for Mothers is our company's global initiative to help create a world where no woman has to die while giving life. Our grantees and collaborators have reached more than 20 million women in over 60 countries around the world with programs to support healthy pregnancies and safe childbirths, contributing to the global effort to help end maternal mortality and morbidity. Applying Merck's business and scientific resources, we work across sectors to improve the health and well-being of women during pregnancy, childbirth and the months after.



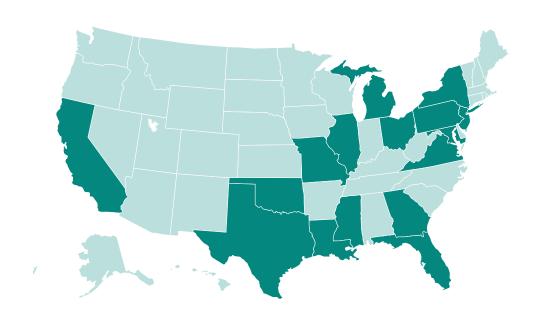
#### **Our Approach in the United States**

The United States (U.S.) is the only high-income country where maternal mortality is on the rise. Mental health conditions, including substance use disorders, cardiac and coronary conditions, and hemorrhage are increasing as leading underlying causes of maternal deaths.<sup>1,2,3</sup> More than 80% of maternal deaths in the U.S. are preventable.<sup>4</sup>



Black women and American Indian and Alaskan Native women are two to three times more likely to die from a pregnancy or childbirth-related complication than white women.<sup>5</sup> Increasingly, experts agree that systemic racism is contributing to why women are dying from complications of pregnancy and childbirth.<sup>6</sup>

Through Merck for Mothers, we take a comprehensive approach to tackle the maternal health crisis in the U.S. **The programs, research and coalitions we support address both the clinical and social factors that can lead to poor maternal health.** We work with a diverse group of collaborators, including community-based organizations, quality improvement leaders, maternal health advocates, researchers, city, state and national public health leaders, and others with the shared goal of ending preventable maternal mortality in the U.S.



- States currently participating in Safer Childbirth Cities: California, District of Columbia, Florida, Georgia, Illinois, Louisiana, Maryland, Michigan, Mississippi, Missouri, New Jersey, New York, Ohio, Oklahoma, Pennsylvania, Texas, Virginia
- Additional states reached by Merck for Mothers supported work: all remaining states

## Programs, grantees & collaborators

#### Gathering actionable data to power change

For many years, the U.S. lacked adequate data on maternal mortality to understand why women were dying — critical information to prevent future tragedies. Until recently, most states did not have functioning Maternal Mortality Review Committees, multidisciplinary teams that reviews these deaths. Today, we have a better understanding of the number of maternal deaths and why these women died, thanks to efforts by the Centers for Disease Control and Prevention (CDC) and others.

Supported by independent grants from Merck for Mothers to the CDC Foundation, the CDC has helped nearly every state across the country standardize how it reviews maternal deaths, reports findings and recommends changes in policy and practice to improve maternal health. In 2022, the CDC published its most recent multi-state report on trends in maternal mortality.8

Among several findings, the report noted that more than half (53%) of maternal deaths occurred one week to one year after childbirth — valuable insights that are informing our ongoing efforts to enhance care during the postpartum period.<sup>9</sup>

The Preventing Maternal Deaths Act of 2018 mandates federal funding to support state Maternal Mortality Review Committees and local surveillance of maternal mortality, helping expand and sustain this important work.<sup>10</sup>

**Collaborators:** CDC Foundation in collaboration with the CDC, Association of Maternal and Child Health Programs



#### Standardizing hospital care with input from communities

Inconsistent, poor quality obstetric care has been a major contributor to negative maternal health outcomes. To improve the quality of maternity care, Merck for Mothers supported maternal health professional associations and quality improvement organizations to develop and test evidence-based tools and practices ("safety bundles") for preventing and treating three of the leading causes of maternal death in the U.S. — hemorrhage, hypertension and embolism.

With our support, the American College of Obstetricians and Gynecologists District II (representing New York and Bermuda), the Association of Women's Health, Obstetric and Neonatal Nurses, and the California Maternal Quality Care Collaborative, implemented safety bundles in more than 300 hospitals across five states, including in nearly every maternity hospital in New York. This effort — which required collaboration among members of multidisciplinary maternity care teams — helped build a culture of safety in these facilities, sustaining ongoing quality improvement in obstetric care.

Merck for Mothers awarded a grant to the Institute for Healthcare Improvement (IHI) to help scale these obstetric safety bundles more broadly across the country. In collaboration with the Alliance for Innovation on Maternal Health, IHI aimed to reduce postpartum hemorrhage and medically unnecessary cesarean sections, recognizing the importance of addressing these issues to reduce racial disparities in maternal health outcomes.<sup>12</sup>

Additionally, IHI partnered with communities in four cities (Atlanta, Detroit, New Orleans, and Washington, DC) to implement locally-driven, co-designed efforts to improve postpartum outcomes for Black women and birthing people. These collaborations produced guiding principles to ensure that Black women receive quality maternity care and that racial disparities are eliminated. IHI also convened a Learning Community of five hospitals that have pledged to use evidence-based practices and quality improvement tools to improve postpartum care and support for Black birthing people.<sup>13</sup>

**Collaborators:** American College of Obstetricians and Gynecologists (District II), Association of Women's Health, Obstetric and Neonatal Nurses, California Maternal Quality Care Collaborative, Institute for Healthcare Improvement

#### Mobilizing people with lived experience and valuing their expertise

Although awareness of maternal deaths has increased in recent years, people with lived experience remain underrepresented in policy discussions and quality improvement efforts. Merck for Mothers supported the creation of MoMMA's (Maternal Mortality and Morbidity Advocates) Voices, the first-ever maternal health patient advocacy coalition. MoMMA's Voices unites women who have experienced severe pregnancy and childbirth complications and family members who have lost a loved one and trains them to become advocates. The coalition is collaborating with more than 20 states as well as with the Indian Health Service, to integrate lived experiences into quality improvement efforts, making them more responsive to women's needs and preferences.

Collaborators: Preeclampsia Foundation



### Addressing persistent disparities through community-led solutions

Geography is another important social determinant of health that affects disparities in maternal health outcomes. Where a woman lives and works influences her ability to access the care and essential services needed for a healthy pregnancy and safe childbirth.<sup>14</sup> The Safer Childbirth Cities initiative is a collaboration to reduce the racial disparities in maternal health outcomes by addressing both the health and social factors that affect the maternal health journey.

The initiative is supporting local solutions to strengthen health systems so that cities become safer — and more equitable — places to give birth. Together with co-funders, Merck for Mothers has supported 20 city-based coalitions across the country to implement strategies tailored to the needs of pregnant women in their city. Safer Childbirth Cities are exploring diverse approaches that bridge the community-clinic divide, including integrated models of care, doula support, stronger surveillance systems, and training for maternity care providers.

These community-led coalitions are connected through a Community of Practice, enabling them to learn from one another and strengthen organizational capacity in areas such as coalition building, stakeholder engagement, program evaluation and sustainability.

Grantees: Atlanta (Black Mamas Matter Alliance), Austin (The Maternal Health Equity Collaborative), Baltimore (Baltimore Healthy Start), Brooklyn (Black Women's Blueprint), Camden (Camden Coalition of Healthcare Providers), Chicago (AllianceChicago and EverThrive Illinois), Columbus (ROOTT), Detroit (Voices for life and Michigan Public Health Institute), Jackson (Mississippi Public Health Institute), Newark (Greater Newark Healthcare Coalition), New Orleans (Institute of Women and Ethnic Studies), Norfolk (Urban Baby Beginnings),

Philadelphia (Health Federation of Philadelphia), Pittsburgh (Jewish Healthcare Foundation), San Francisco (SisterWeb), St. Louis (Jamaa Birth Village and Commonsense Childbirth), Tampa (REACHUP, Inc.), Trenton (Trenton Health Team), Tulsa (Tulsa Birth Equity Initiative), Washington, D.C. (Mamatoto Village), Association of Maternal and Child Health Programs

**Co-funders:** The Burke Foundation, The Community Health Acceleration Partnership, Fondation CHANEL, George Kaiser Family Foundation, Rhia Ventures, Skyline Foundation (formerly known as Yellow Chair Foundation), The W. K. Kellogg Foundation, and others

# Supporting women and providers to recognize pregnancy and postpartum complications and standardize post-birth education

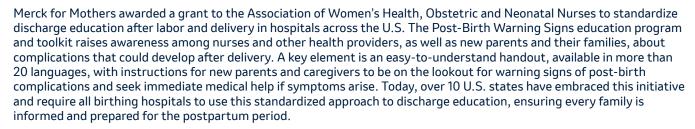
Many women — as well as their health care providers and social support networks — do not have the information they need to identify, communicate and respond to serious health risks during and after pregnancy.

Merck for Mothers, through an independent grant to the CDC Foundation, supported the CDC in creating the Hear Her campaign. Featuring women's stories about complications they experienced after giving birth, this national campaign provides women, health providers, families and communities with information about urgent maternal warning signs.

The CDC Foundation has also developed and disseminated educational resources for American

Indian and Alaska Native communities and has scaled these resources to the broader clinical community, including those working in obstetrics, pediatrics and other fields such as emergency medicine and primary care.





**Collaborators:** Association of Women's Health. Obstetric and Neonatal Nurses



Review to Action (2018). <u>Building U.S. Capacity to Review and Prevent Maternal Deaths - Report from nine maternal mortality review committees</u>. <u>Maternal Mortality Review</u>.

These programs are funded by Merck for Mothers, Merck's initiative to help create a world where no woman has to die giving life. Merck for Mothers is an initiative of Merck & Co., Inc., Rahway, NJ, USA.

<sup>3.</sup> Trost, S., Beauregard, J., Chandra, G., Njie, F., Berry, J., Harvey, A., & Goodman, D. A. (2022). <u>Pregnancy-Related Deaths: Data from Maternal Mortality Review Committees in 36 US States</u>, 2017–2019. CDC.

<sup>4.</sup> Trost, S., Beauregard, J., Chandra, G., Njie, F., Berry, J., Harvey, A., & Goodman, D. A. (2022). Pregnancy-Related Deaths: Data from Maternal Mortality Review Committees in 36 US States, 2017–2019. CDC.

<sup>5.</sup> Hill, L., Artiga, S. and Ranji, U. (2022). Racial Disparities in Maternal and Infant Health: Current Status and Efforts to Address Them, Kaiser Family Foundation.

<sup>6.</sup> Howell EA. (2018). Reducing disparities in severe maternal morbidity and mortality. Clin Obstet Gynecol. 2018;61(2):387.

<sup>7.</sup> Chinn, J.J., Eisenberg, E., Artis Dickerson, S., King, R.B., Chakhtoura, N., Lim, I.A.L., Grantz, K.L., Lamar, C. and Bianchi, D.W. (2020). Maternal mortality in the United States: research gaps, opportunities, and priorities. American Journal of Obstetrics and Gynecology, 223(4), pp.486-492.e6.

<sup>8.</sup> Petersen EE, Davis NL, Goodman D, et al. (2019). Vital Signs: Pregnancy-Related Deaths, United States, 2011–2015, and Strategies for Prevention, 13 States, 2013–2017. MMWR Morb Mortal Wkly Rep 2019;68:423–429.

<sup>9.</sup> Trost, S., Beauregard, J., Chandra, G., Njie, F., Berry, J., Harvey, A., & Goodman, D. A. (2022). <u>Pregnancy-Related Deaths: Data from Maternal Mortality Review Committees in 36 US States</u>, 2017–2019. CDC.

<sup>10.</sup> Beutler, J. (2018). H.R. 1318 - Preventing Maternal Deaths Act of 2018. Congress.Gov.

<sup>11.</sup> Trost, S., Beauregard, J., Chandra, G., Njie, F., Berry, J., Harvey, A., & Goodman, D. A. (2022). <u>Pregnancy-Related Deaths: Data from Maternal Mortality Review Committees in 36 US States</u>, 2017–2019. CDC.

<sup>12.</sup> Institute for Healthcare Improvement. (2021). Better Maternal Outcomes Quality Improvement Workbooks. IHI.

<sup>13.</sup> Institute for Healthcare Improvement (2023). Reducing Inequities in Postpartum Maternal Morbidity and Mortality. IHI.

<sup>14.</sup> Maternal Mortality Review. (2018). Report From Nine Maternal Mortality Review Committees. Review to Action.