

**MATERNAL, FETAL AND CHILD
MORTALITY AND THE ROLE OF
DEATH SURVEILLANCE IN THE
CONTEXT OF THE COVID-19
PANDEMIC**

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EDITORIAL

Maternal, fetal and infant mortality has been an object of global concern, as they express restrictions in guaranteeing inalienable rights to life (GRAHAM et al., 2016; HUFF et al., 2019; RENO; HYDER, 2018)

Over the decades, different governments and international organizations have engaged in implementing policies and programs aimed at improving maternal and child health; the improvement and programmatic expansion of health actions and services and the development of social policies, thus bringing together a set of actions that would impact the mitigation of socioeconomic inequalities, the improvement of access and assistance to health and, consequently, the reduction of preventable deaths (WHO, 2023).

Over the last 20 years, a reduction in these deaths has been observed in different regions around the world. However, since 2016, the global maternal mortality rate has stagnated at around 223 per 100,000 live births (LB) and only one region in Southeast Asia has recorded a decline, while the others have maintained or increased rates. In 2021, almost half of deaths of children under 5 years of age occurred in the neonatal period and the global stillbirth rate stood at 13.9 stillbirths per 1,000 total births (WHO, 2023).

The persistence of maternal, fetal and child deaths at higher rates in places of lower socioeconomic development reveals profound inequities that are reflected in difficulties in obtaining adequate and timely access and health care (GRAHAM et al., 2016).

In view of this, situations of greater social vulnerability in which women and children are exposed determine not only the risks of illness, but also the form of access to health actions and services (GRAHAM et al., 2016; RENO; HYDER, 2018).

In 2020, with the course of the Covid-19 pandemic, social structural problems were exacerbated and the impact on the Health Systems of several countries was reported, particularly in the poorest and middle-income countries (WHO, 2020)

This scenario contributed to an increase in the risk of maternal morbidity and mortality, not only due to the susceptibility to the development of serious viral infections due to the physiological adaptations that occur during pregnancy, but also to difficulties in accessing intensive care (MAZA-ARNEDO et al., 2022).

The investigation of maternal deaths associated with Covid-19, registered in the Latin American multinational collaborative database, revealed that premature birth and low birth weight were the most common perinatal complications (MAZA-ARNEDO et al., 2022). These findings are important, as they reinforce that effective measures to reduce maternal deaths stand in the way of actions to reduce fetal and neonatal mortality (PATTINSON et al., 2011).

Given the relevance of these deaths, different countries and regions have implemented epidemiological surveillance of these deaths, in order to qualify information from vital records; identify the magnitude, causes, related problems, preventability and recommend appropriate and timely intervention measures (OLIVEIRA et al., 2016; CARVALHO et al., 2023)

Surveillance of maternal, fetal and infant deaths has proven to be a fundamental strategy in increasing the visibility of these deaths, with a focus on making actions accountable for better health results as it incorporates qualitative and quantitative, multidisciplinary information and supports decision-making based on evidence by management (VANDERLEI; FRIAS, 2017; BANDALI et al., 2016)

Understanding the scope of action of death surveillance that expands the possibility of improving access to health programmatic and intersectoral actions; the importance of the magnitude of preventable deaths and the pandemic context caused by Covid-19, the dissemination of information to society, professionals and managers through scientific journals of an interdisciplinary nature, within the scope of social sciences, is necessary and relevant.

Motivated by this context, the editors of *Cadernos de Estudos Sociais* dedicated a special edition to the theme “Maternal, fetal and infant mortality and the role of death

surveillance in the context of the Covid-19 pandemic”, which is part of the research project “ Analysis of maternal, fetal and infant mortality due to COVID-19 in the state of Pernambuco” (Process no.: APQ-0389-4.06/20) of PPSUS-PE 2020, from the Foundation for the Support of Science and Technology of the State of Pernambuco (FACEPE) and the Joaquim Nabuco Foundation. This Dossier that reaches the reading public is composed of two interviews with experts in the field: Sandra Valongueiro (member of the Pernambuco State Maternal Mortality Committee – CEEMM-PE and professor of the Postgraduate Program in Public Health) and Célia Landmann Swarcwald (Researcher at the Institute of Scientific and Technological Communication and Information in Health, Oswaldo Cruz Foundation). In addition to nine articles, which present debates, discussions, reflections and analyzes by health professionals, teachers and researchers in public health who have maternal and child health as their object of study.

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Revista Cadernos de Estudos Sociais

References

- BANDALI, S.; THOMAS, C.; HUKIN, E.; MATTHEWS, Z.; MATHAI, M.; DILIP, T.R., et al. **Maternal Death Surveillance and Response Systems in driving accountability and influencing change.** *Int J Gynecol Obstet* 2016; 135(3): 365-371. <https://doi.org/10.1016/j.ijgo.2016.10.002>
- CARVALHO, P.I.; VIDAL, S.A.; FIGUEIRÔA, B.Q.; VANDERLEI, L.C.M.; OLIVEIRA, C.M.; PEREIRA, C.C.B.; et al. **Comitê de mortalidade materna e a vigilância do óbito em Recife no aprimoramento das informações: avaliação ex-ante e ex-post.** *Rev Bras Saúde Mater Infant* 2023; 23: e20220254. <https://doi.org/10.1590/1806-9304202300000254>
- GRAHAM, W.; WOODD, S.; BYASS, P.; FILIPPI, V.; GON, G.; VIRGO, S., et al. **Diversity and divergence: the dynamic burden of poor maternal health.** *Lancet* 2016; 388:2164-2175. [https://doi.org/10.1016/S0140-6736\(16\)31533-1](https://doi.org/10.1016/S0140-6736(16)31533-1)
- HUFF K, ROSE RS, ENGLE WA. Late preterm infants: morbidities, mortality, and management recommendations. *Pediatr Clin North Am* 2019; 66(2), 387-402. <https://doi.org/10.1016/j.pcl.2018.12.008>
- MAZA-ARNEDO, F.; PATERNINA-CAICEDO, A.; SOSA, C;G.; MUCIO, B.; ROJAS-SUAREZ, J.; SAY, L.; et al. **Maternal mortality linked to COVID-19 in Latin America: results from a multi-country collaborative database of 447 deaths.** *Lancet Reg Health Am* 2022; 12100269. <https://doi.org/10.1016/j.lana.2022.100269>
- OLIVEIRA, C.M.; BONFIM, C.V.; GUIMARÃES, M.J.B.; FRIAS, P.G.; MEDEIROS, Z.M.; **Mortalidade infantil: tendência temporal e contribuição da vigilância do óbito.** *Acta Paul Enferm* 2016; 29(3):282-290. <https://doi.org/10.1590/1982-0194201600040>
- PATTINSON, R.; KERBE, R.; BUCHMANN, E.; FRIBERG, I.K.; BELIZAN, M.; LANSKY, S. et al. **Stillbirths: how can health systems deliver for mothers and babies?** *Lancet* 2011; 377(9777), 1610-23. [https://doi.org/10.1016/S0140-6736\(10\)62306-9](https://doi.org/10.1016/S0140-6736(10)62306-9)
- RENO, R.; HYDER, A. **The evidence base for social determinants of health as risk factors for infant mortality: a systematic scoping review.** *J Health Care Poor Underserved* 2018; 29(4), 1188-1208. <https://doi.org/10.1353/hpu.2018.0091>
- VANDERLEI, L.C.M.; FRIAS, P.G. **A vigilância do óbito como instrumento para reduzir a invisibilidade da exclusão social e assistencial de mulheres e crianças.** [Editorial] *Rev Bras Saúde Matern Infant.* 2017; 17 (4): 635-6. <https://doi.org/10.1590/1806-93042017000400001>
- WHO. **World Health Organization. Global Strategy for Women’s, Children’s and Adolescents’ Health (2016–2030).** Report to the World Health Assembly by the Director-General. Executive summary [publicação on line]. Geneva: 2023 [acesso em 29 jul 2023]. Disponível em: https://apps.who.int/gb/ebwha/pdf_files/WHA76/A76_5-en.pdf
- WHO. **World Health Organization. Pulse survey on continuity of essential health services during the COVID-19 pandemic. Interim report [publicação on line].** Geneva: 2020 [acesso em 26 ago 2023]. Disponível em: https://www.who.int/publications/i/item/WHO-2019-nCoV-EHS_continuity-survey-2020.1