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Practicum Site: Tennessee Department of Health

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Understanding Fetal Death in Tennessee

Introduction: Fetal death is defined as the death of a fetus at a minimum of 20 weeks gestation and/or weighing at least 350g with no signs of life at delivery. Fetal death is devastating, and decreased rates are a Healthy People 2030 goal.

Recommended following a fetal death surveillance evaluation, this practicum was completed at the Tennessee Department of Health (TDH) to develop the first fetal death data report in Tennessee.

Methods: Several state and country dashboards and reports were reviewed to determine indicators for the report. Once the indicators were selected, rough outlines and mock-ups were produced. Emily Lumley in Vital Statistics abstracted data from fetal death certificates (and other sources) and conducted chi-squared tests in SAS to determine statistical significance. I received aggregate data and leveraged Canva and Excel to create visualizations and develop the report and one-page fact sheet. Several TDH and external teams were consulted throughout the report development to ensure a comprehensive and accurate report.

Results: A fetal death data report was developed describing the state of fetal death in Tennessee, associated risk factors, prevention efforts throughout the state, recommendations for the future, and outpatient bereavement support resources for families. A corresponding fact sheet was also produced. While fetal mortality rates have decreased in Tennessee, it is still higher than the Healthy People 2030 target. Further, the causes are often unspecified, there are significant disparities, several risk factors are associated, and many indicators have high missingness.

Conclusions: This practicum provided valuable experience with public health practice work, health communication, and collaboration. The primary challenges were time and data limitations. Next steps focus on continued efforts for understanding and preventing fetal death, including data to action implementation efforts, targeted review for rural areas, and improvements for complete data capture.

