

## GASTRIC CANCER MORTALITY IN MACROREGIONS OF PARÁ: TEMPORAL TRENDS AND TERRITORIAL INEQUALITIES FROM 2019 TO 2023

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**Introduction:** Gastric cancer is one of the main causes of cancer-related mortality globally, particularly in developing countries. In Brazil, the highest incidence rates are observed in the North and Northeast regions, especially in the state of Pará. Analyzing temporal trends and territorial disparities is essential to guide public health planning. **Objectives:** To analyze the temporal trend of mortality from stomach cancer in the state of Pará between the years 2019 and 2023. **Methods:** This is a descriptive and retrospective ecological study based on secondary data. Mortality trends from gastric cancer were examined in Macro-regions I (Belém) and II (Ananindeua) of the state of Pará from 2019 to 2023. Data were obtained from the Mortality Information System (SIM), classified according to ICD-10. Mortality rates were standardized per 100,000 inhabitants based on population estimates. Only records with confirmed regional information were included; incomplete records were excluded. Statistical analysis was conducted using R software, applying linear regression models to assess temporal trends. The variables analyzed included year of death and region of residence. No adjustments for confounding factors were made. **Results:** From 2019 to 2023, a total of 1,782 deaths from stomach cancer were recorded in macro-regions I and II in the state of Pará. Macro-region I, corresponding to the city of Belém, registered 1,235 deaths (69.3%), while macro-region II, representing the municipality of Ananindeua, recorded 547 deaths (30.7%). Considering the estimated population of these regions (8,121,025 inhabitants in macro-region I and 478,778 in macro-region II), a significant inequality in mortality rates is observed. Macro-region I had a mortality rate of 15.52 deaths per 100,000 inhabitants, whereas macro-region II presented a considerably higher rate of 114.3 deaths per 100,000 inhabitants. These discrepancies highlight possible territorial inequalities regarding access to early diagnosis, treatment, and cancer care, indicating a concerning scenario from the perspective of equitable healthcare. In terms of temporal trends, the data reveal stability in the annual number of deaths over the assessed period. In 2019, there were 357 deaths; in 2020, this number increased to 363; in 2021, it decreased to 346; in 2022, it rose again to 358; and in 2023, it remained stable at the same figure as the previous year. The numbers indicate that there was no significant decline in mortality over the five years, suggesting limitations in prevention efforts, early detection, and oncology care at the state level. **Conclusion:** This study aimed to evaluate temporal trends and regional disparities in gastric cancer mortality in the state of Pará. Findings revealed persistently high mortality rates and pronounced inequalities between macro-regions, highlighting gaps in early diagnosis and access to care. The stability of mortality over time suggests limited progress in cancer prevention and control, reinforcing the need for more equitable and effective public health interventions.

**Keywords:** Stomach Neoplasms; Mortality; Epidemiology.