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THE HOSPITAL MORBIDITY FROM MALIGNANT ENCEPHALIC NEOPLASMS IN THE STATE OF PARÁ: AN EPIDEMIOLOGICAL ANALYSIS OF PEDIATRIC CASES BETWEEN 2020 AND 2025

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Introduction: Malignant encephalic neoplasms are cancerous growths affecting the central nervous system (CNS) and cause significant impairment to patients' quality of life due to direct damage to neural structures. In this context, monitoring reported cases in the state of Pará is essential to enable earlier interventions, improve prognosis and guide therapeutic decisions, particularly in pediatric patients, who present specific clinical and social needs. Public health authorities must therefore adopt more proactive strategies to promote early diagnosis and determine which patients may benefit from chemotherapy or palliative care. **Objectives:** To analyze the epidemiological profile of morbidity and mortality due to malignant encephalic neoplasms in pediatric patients aged 0–19 years in the state of Pará between 2020 and 2025. **Methods:** This quantitative epidemiological study used secondary data obtained from the DATASUS platform, based on records from the hospital morbidity system related to hospitalizations and deaths due to malignant encephalic neoplasms (ICD-10: C71) in the state of Pará from 2020 to 2025. The analysis included reported cases in individuals aged 0–19 years, considering municipality of residence, sex and race. **Results:** A total of 683 hospitalizations due to malignant encephalic neoplasms were recorded among pediatric patients during the study period, with 53 deaths and an overall mortality rate of 7.76%. The capital city, Belém, was the most affected municipality, accounting for 618 hospitalizations and 44 deaths, with a mortality rate of 7.12%. Hospitalizations were more frequent among males (433 cases and 34 deaths) and among children aged 5–9 years (250 cases and 17 deaths, including both sexes). Racial analysis indicated that mixed-race (pardo) individuals accounted for the majority of hospitalizations, with 561 cases and 39 deaths. **Conclusion:** The findings demonstrate that between 2020 and 2025, Belém concentrated the highest hospital morbidity related to malignant encephalic neoplasms among pediatric patients aged 0–19 years, reinforcing its role as the main referral center for the treatment of these tumors in Pará. This concentration suggests limitations in early diagnosis, case reporting and access to specialized care in other regions of the state. The predominance of cases among males and in the 5–9-year age group may reflect increased vulnerability in this

population and potential delays in diagnosis or treatment. Additionally, the higher burden observed among mixed-race individuals highlights possible disparities in access to health care associated with social vulnerability. Strengthening the health care infrastructure in inland regions of the state is therefore essential to reduce the overload of referral hospitals in the capital.

Keywords: Hospital morbidity; Encephalic neoplasms; Hospitalizations.