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Increase in Dengue Cases in Rio Grande do Sul in 2024 and Its Relation to Floods

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INTRODUCTION & AIM

Dengue is a public health challenge in Brazil, characterized by its mosquito-borne nature and potential for severe clinical outcomes. The distribution and dynamics of this disease can be influenced by various factors, including environmental, social, and economic changes. During periods of heavy rainfall and subsequent flooding, like those experienced in Rio Grande do Sul in May of 2024, there is often an increase in reports of Dengue cases. Understanding the epidemiological trends of Dengue is essential for guiding prevention and control efforts.

METHOD

A cross-sectional, descriptive, retrospective, and quantitative study was conducted on cases of dengue in the Brazilian state of Rio Grande do Sul during 2023 and 2024.The data were obtained from the Department of Informatics of the Unified Health System (DATASUS).

RESULTS & DISCUSSION

In May and June 2024, following the flooding in Rio Grande do Sul, a total of 57,899 dengue cases were reported (47,733 in May and 10,166 in June). In comparison, during the same period in 2023, 18,195 cases were recorded (13,494 in May and 4,701 in June), representing a 218% increase in total cases between the two years. This surge was particularly significant in May, which saw more than triple the number of cases compared to the previous year.

CONCLUSION

The significant increase in Dengue cases in Rio Grande do Sul in 2024, particularly following the severe flooding in May, underscores the influence of environmental factors on disease transmission. The 218% surge in cases compared to 2023 highlights the vulnerability of affected regions to vector proliferation during and after extreme weather events. These findings emphasize the urgent need for integrated public health strategies, including enhanced surveillance, community education, and rapid response measures, to mitigate the impact of environmental changes on Dengue outbreaks.

FUTURE WORK / REFERENCES

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