Analysing State/UT-wise Number of Schools by Management and Availability of Drinking Water and Functional Drinking Water during 2020-21.

Abstract :

In the backdrop of evolving environmental challenges and the imperative of ensuring safe and adequate drinking water in educational settings, this study delves into the state-wise and union territory-wise distribution of schools based on their management type and the availability of drinking water and functional drinking water facilities during the academic year 2020-21 in India. Leveraging the analytical prowess of the R programming language, alongside statistical techniques such as descriptive analysis and inferential statistics, we aim to unravel insights into the accessibility of clean water in schools across different administrative regions. Through the utilization of sophisticated modelling approaches, including logistic regression and predictive modelling, we endeavour to discern patterns and disparities in water access, shedding light on areas requiring targeted interventions and policy reforms. The findings of this study are poised to inform evidence-based decision-making processes, fostering the development of strategies for enhancing water infrastructure in educational institutions and advocating for equitable access to safe drinking water for all students and staff members.