IJARSCT
International Journal of Advanced Research in Science, Communication and Technology
International Open-Access, Double-Blind, Peer-Reviewed, Refereed, Multidisciplinary Online Journal
ISSN: 2581-9429
Volume 5, Issue 8, March 2025
Impact Factor: 7.67

AquaPura

Dr Brinthakumari, Aniket Patil, Vipul Bailkar, Aditya Patil
Department of Computer Engineering
New Horizon Institute of Technology and Management, Thane, India
brinthakumaris@nhitm.ac.in, aniketpatil212@nhitm.ac.in
vipulbailkar212@nhitm.ac.in, adityapatil212@nhitm.ac.in

Abstract: *Water is the most crucial resource of life and it is necessary for the survival of all living creatures including human beings. The survival of business and agriculture depends on freshwater. An essential step in managing freshwater assets is the evaluation of the quality of the water. Before using water for anything, including drinking, chemical spraying (pesticides, etc.), or animal hydration, it is crucial to assess its purity. The ecosystem and the general public's health are directly impacted by water quality. Therefore, analyzing and predicting water quality is necessary for both environmental and human protection. Machine learning can be used to analyze and predict the water quality based on the parameters like PH value, turbidity, hardness, conductivity, dissolved solids in water and other parameters. In this work, the water quality is predicted by giving the concentration of various parameters as input to machine learning algorithms and the water is classified as safe or unsafe for the usage of domestic purposes.*

Keywords: Conductivity, Hardness, Machine Learning, PH, Turbidity, Water Quality

ISSN 2581-9429 IJARSCT
DOI: 10.48175/IJARSCT-24523