

Thermal behavior of a tropical island reservoir (Hatillo Reservoir, Dominican Republic)

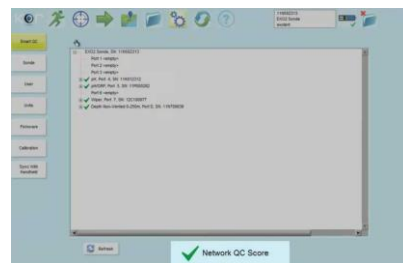
Study area and sampling



Hatillo Reservoir

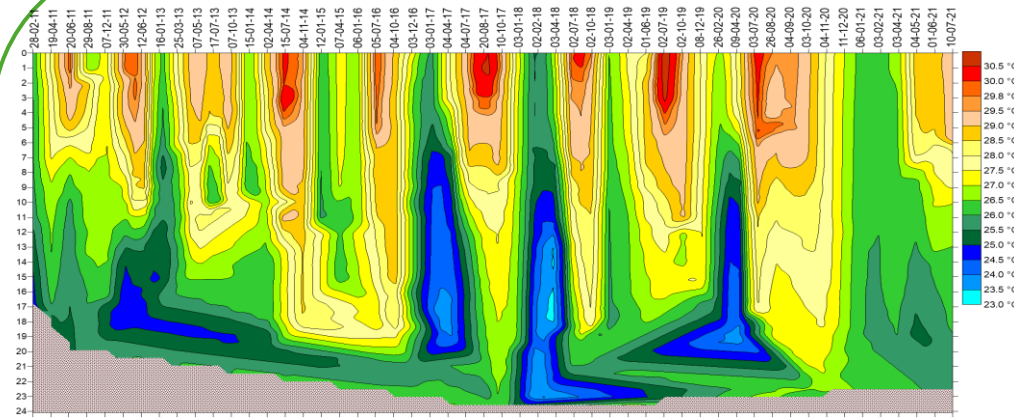


Field measurements

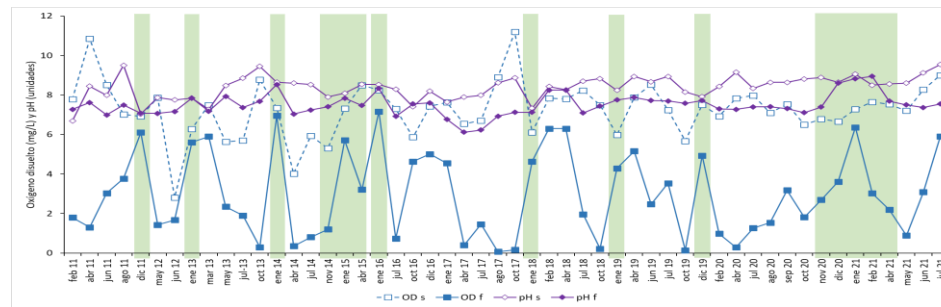


Data processing

Results

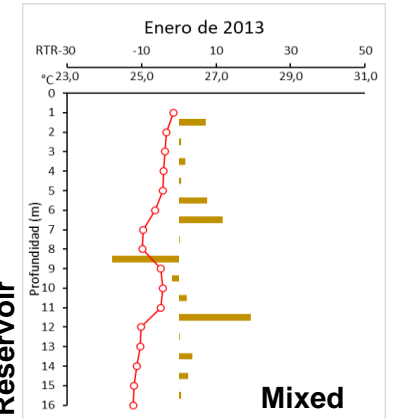


Temperature isolines (°C) over time in Hatillo Reservoir

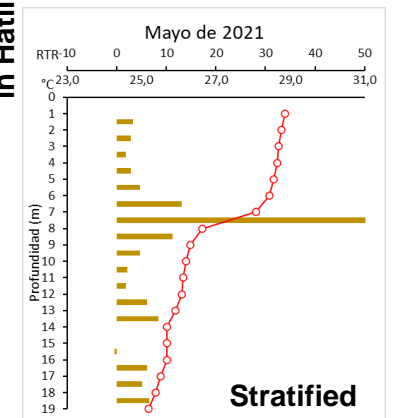


Dissolved oxygen concentration and pH of water at the surface and bottom of Hatillo Reservoir from 2011 to 2021. Mixing months are highlighted

Thermal profiles and Relative Thermal Resistance (RTR) in Hatillo Reservoir



Mixed



Stratified

Conclusion

Ten years of thermal monitoring of the water masses of the Hatillo reservoir has established that they remain thermally stratified for most of the year, with mixing events between December and March, so that the reservoir can be defined as a warm monomictic lake.