



# Aplicación de la espectrometría en la determinación de la concentración de cloro residual en el agua potable utilizada para consumo humano [

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text (article)

Analítica

The quality of the water supplied for human consumption must be known to the entire population, since there are rules that must be met so that the water reaches users in optimal conditions. The design of an instrument is presented in this article to measure the concentration of residual chlorine in drinking water, based on spectroscopic processes, by reacting orthotolidine the content of residual chlorine or its derivatives in drinking water, since there is an absorption spectrum in the range of 350 to 700 nm associated with this phenomenon. It has been used as a radiation source a laser diode, a photoresistor and a registration system that uses the digital analog converter microcontroller for decoding and subsequent presentation of reading in numeric displays LCD type (liquid crystal display). The proposed instrument was calibrated with reagent amounts of 1 ml to 10 ml of water and residual chlorine concentrations ranging from 0.8 to 1.5 ppm, obtained directly. This design is an alternative user-friendly and easy handling with the application of standards

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