

基于两电极体系的水质检测分析平台设计

作者：魏佳莉, 章颖强, 李雅卓, 王晓萍

单位：浙江大学现代光学仪器国家重点实验室

基金项目：

摘要：

为实现对水质的多参数检测，设计了一个基于两电极体系的水质检测分析平台。该检测平台通过最小化极化电流的展参数，设计了基于两电极体系的集成电极和软硬件系统，摒弃了传统三电极体系的参比电极，同时克服了传统三电极站的诸多功能。本研究在该检测平台上开展了水样的电导率（EC）、pH和重金属浓度的检测研究，获得了较好的结

关键词：电化学；多参数水质检测；两电极体系；电导率（EC）；PH；重金属浓度

The design of a inspection and analysis platform of aqueous solution based on two-

Author's Name:

Institution:

Abstract:

A new inspection and analysis platform based on two-electrode system was constructed. The two-electrode system based on realized by maximizing the ratio of the area of working electrode and auxiliary electrode, and hardware & software were desig abandoned, which overcomes the shortcomings of traditional three-electrode system while reproducing the function of elect Conductivity (EC), pH and the concentrations of heavy metal ions of water had been carried out on this platform, and effect ability of multiple water quality parameters inspection. This platform can be used on solution properties analysis in laborator

Keywords: electrochemistry; multiple water quality parameters inspection; two-electrode system; electric Conductivity (EC);

投稿时间：2011-11-28