View metadata, citation and similar papers at core.ac.uk

brought to you by CORE

provided by Kazan Federal University Digital Repository

Russian Chemical Reviews 1992 vol.61 N8, pages 816-829

Chemically modified electrodes as amperometric sensors in electroanalysis

Budnikov G., Labuda J.

Kazan Federal University, 420008, Kremlevskaya 18, Kazan, Russia

Abstract

The state and prospects in the development of new fields of electroanalytical chemistry, namely amperometric sensors based on chemically modified electrodes, are examined. The methods for the construction of these electrodes, the types of modifying agents, and the mechanisms of their response to substrates are discussed. The analytical possibilities of chemically modified electrodes, including amperometric biosensors based on them, in the solution of problems associated with ecology, medicine, and pharmacology are demonstrated. © 1992 IOP Publishing Ltd.

http://dx.doi.org/10.1070/RC1992v061n08ABEH001000