11/11/1 .. 2010

електромеханіка і системи управління

A Device for Successive Injection Analysis

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In practice of liquid environments parameters control of chemicaltechnological processes and quality of technological water a wide use is found measuring in the running analysis methods.

In the process of development of the informatively-measuring checking of quality of technological water systems the task of device planning was distinguished for realization of injection analysis directly for the ecological monitoring of environment and automation of control and management chemical-technological processes.

We are work out a device (request u 2014 10223) allowing to conduct measuring in the stream of technological water that enters measuring channel of running crack detector. Before measuring sample-preparing and filtration of sample that gets in the channel of knot of correlation of charges is additionally producible in a detector.

A device is plugged in itself by one angle cock, knot of correlation of charges, reactionary mixer, running crack detector, pump. The worked out device is built on a block-module type. If necessary instead of two-thread faucet it is possible to use crack valves or electromagnetic metering devices. As detectors it is possible to use different combinations of solid-state ion-selective electrodes on the method of concentration element that and to combine the ionometric method of analysis with the coulometric generating of the determined components.

As a knot of correlation of charges it is possible to use a crack running device with different correlation of solutions of test and base-line electrolyte. Correlation can be regulated long, in high and breadthways, or by the form of cross-sectional of mudstone channel.

A device is approved on express-analysis of natural water and technological solutions and allowed to decrease the error of analysis for an account application of injection analysis.

For measuring of iodine-iodide systems redoxs we used a coulometric crack generator with iodide-selective measuring and comparison electrodes.