Full Paper _____ *Thematic Section:* Physicochemical Research.
Registration Code of Publication: 14-38-5-78 *Subsection:* Physical Chemistry.
Publication is available for discussion in the framework of the on-line Internet conference "*Butlerov readings*".
http://butlerov.com/readings/
Contributed: August 05, 2014.

Electrosurface properties of silicon oxide(IV) in aqueous solutions of azoles

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Keywords: silicon oxide(IV), azoles, electrosuperficial properties.

Abstract

The paper is devoted to the study of electrosuperficial properties of quartz (silicon oxide(IV)) in aqueous solutions of simple azoles. To determine the electrokinetic properties of silicon oxide (SiO_2) we used the method of micro-electrophoresis. Study of electrokinetic properties of SiO_2 surface was held over the function of pH and contact time with the phases of quartz test solutions. It has been found that in solutions of the isoelectric point value of imidazole (pH_{IET}) of quartz shift to alkaline region. In solutions of *n*-tetrazole the value pH_{IET} of quartz shifts in acidic region. This paper describes a model of adsorption of cationic and anionic forms of azoles on the surface of SiO_2.