

## ABSTRACT

«Physicochemical properties of electrochemically obtained anode films on a titanium electrode»

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In the dissertation the electrochemical properties of anode films on a titanium electrode by a method of removal of voltammetric curves are investigated. The synthesis of anode films on a titanium electrode in solutions of sodium hydroxide, sulfuric acid, sodium sulfate and boric acid was performed. The influence of electrolyte composition and anodizing voltage on the properties of the obtained films is determined. A study of the electrochemical behavior of the obtained films by the method of removing polarization curves. The technological process of anodizing overlays for mobile phones is proposed and the necessary technological calculations are performed. The scheme of automation of the developed technological process is offered and measures on safety and labor protection are provided. A startup project to obtain an oxide coating on the titanium body of mobile phones has been developed.

Key words: oxide films, titanium, titanium oxides, voltammetric curve, potential.

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