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About the Bernoulli's Probability Formula Application for Analyzing the Results of the Unified State Examination

Abstract. The paper looks at implementing the probability theory and mathematical statistics while analyzing the outcomes of the unified state examination (USE). The research is aimed at investigating the impact of closed questions that make the greater part of USE, on test results. The methodology is based on so called Bernoulli's trial. The research findings demonstrate the higher probability of incidental right answers to the closed questions compared with the open ones. The author makes a conclusion that the considerable number of closed questions in the test can misrepresent the final result which tends to improve.

The proposed method of statistic analysis can provide the explanation for the USE results anomalies, evaluate the quality of examination materials and scoring system, and give the quantified assessment of social implications.

Keywords: unified state examination, analysis of unified state examination results.

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