

User model development experience in RTDS with the example of Park's synchronous generator model.

Gerasimov D. A., Zelenin A. S.

In this paper issues related to modeling electrical equipment in the RTDS real-time simulator are discussed. A synchronous generator acts as a modeled object. This paper provides the mathematical underlying of the model as well as a description of the model creation process and verification routine. The results of the study are oscillograms obtained from the verification results. The article describes the prospects for improving the obtained model and gives an overview of further research.

Keywords: RTDS simulator, synchronous generator, mathematical modeling, real-time simulation, park's equations, model verification.