## EVALUATION OF LOAD CURRENT BALANCING ON OVERLOAD PROTECTION AND ELECTRICAL INSTALLATION ON NEW LOAD ADDITIONS FLOOR 4 AND 5 OF INDONESIA SEHAT HOUSE BUILDING (RIS HOSPITAL) BSD TANGERANG SELATAN

## Aditya Mercury Dewantoro Hadi

Electrical Engineering Study Program, Faculty of Science & Technology
University of Technology Yogyakarta
Jl. Ringroad Utara Jombor Sleman Yogyakarta
E-mail: adityamercury12@gmail.com

## **ABSTRACT**

In the electric power system, protection is very important in the electrical system. Electricity is proven to be needed by hampering human daily activities when electricity is not available. If electricity is not available or unbalanced, humans will feel a negative impact, namely by disrupting their daily activities. This research is used as an evaluation of the repair of the electrical system installed in the Rumah Indonesia Sehat building, Hospital BSD, South Tangerang. The data that the author will present in this research report are the results of the new plan from the evaluation of the old plan which are analyzed for reliability to economy and efficiency and simulated using the help of the ETAP application. From the results of this study obtained power recalculation to get the load balance. And from the evaluation of the electrical installation, 2 recommendations were obtained, namely increasing the old power and adding new power with an analysis from an economic, efficiency and reliability point of view of the electrical system.

**Key words**: load current balance, electrical installation, electric power