

# **Energy Audits and Analysis of Energy Savings Opportunities in Public Hospitals dr. Mohamad Saleh Probolinggo City**

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## ***ABSTRACT***

Government Regulation Number 70-year 2009 of energy conservation to face an energy crisis due to the waste of energy consumption. Part staple energy conservation include the presence of an energy audit i.e. knowing the profile of energy use, identifying energy waste, and devise prevention measures. This research was conducted to analyse the potential of energy saving opportunities in hospital Dr. Mohamad Saleh Probolinggo which has considerable energy usage levels. The most dominant used on electricity for lighting in the form of the lamp and air conditioning systems, and other medical support equipment. The methods used in this study includes several stages, ranging from secondary data collection includes documentation of building engineering drawings of the building construction and implementation of the appropriate calculation of the value of IKE. The collection of primary data include measurements of data directly in the field. And analyze energy saving opportunities.

The value of IKE for electricity of 301.758 kWh/m<sup>2</sup> per year under the target and is very efficient. The percentage of energy consumption at the hospital Dr. Mohamad Saleh Probolinggo i.e., lighting of 3%, the air conditioning by 5%, a 2% medical equipment, and other ancillary equipment in the amount of 90%. The chances of the savings made on lighting and cooling in a year savings amounting to Rp 12,532,038 and Rp 88,688,065.

Keywords : Energy audit, the intensity of energy consumption, energy-saving opportunities