

## **ABSTRACT**

*Electrical energy is the main need in the household. It matters to use electrical, frequently used device electrical with considerable power. For saving use electrical, must doing utilization electrical power source with controlling. An effort which society doing to use electrical more effective, usually with deactivating electronic device which to use manually, but that matter no practical to do. Therefore, there is a necessary system for helping to control and monitoring electrical power sources in the home.*

*In this Final Project, a system has been designed that can monitor electronic devices will be implemented in a smart home. The system uses the Blynk application that can monitor electronic devices by displaying power at the load used, displaying usage time, activating and deactivating electronic devices, and getting notifications via smartphone.*

*Based on the results of the research conducted, smart energy meter devices can be controlled by the Blynk application. Obtained the average value of delay that occurs on the button, power, and time. The average delay value that occurs on button on is 2.604 seconds, while the average value of delay that occurs on button off is 3.464 seconds. The average delay value when sending power to device 1 is 0.443 seconds, device 2 is 0.511 seconds, and device 3 is 0.691 seconds. As for the average value of delay that occurs when sending time on device 1 is 6.7303 seconds, device 2 is 6.797 seconds, and device 3 is 6.659 seconds.*

**Keyword:** *Electrical power, electronic device, smartphone, Blynk application.*