

ABSTRACT

The development of the Internet is so rapidly become something that can not be separated from the life of society at this time, that development also gave birth to the concept of the Internet of Things (IoT). Internet of Things (IoT) is a network that connects each physical object with the internet, so it can communicate with each other and exchange information. This concept becomes an interesting thing to be implemented as a learning material on labworks activities in D3 Telecommunication Engineering, Telkom University, especially in internet of things labworks, so it takes a database or IoT web server to develop IoT concept in D3 Telecommunication Engineering, Telkom University.

In this final project have been created a database in implementing IoT web server using Oracle as a learning media on the internet of things labworks. This database is used to receive or store data sent by sensors that have been integrated into the internet or local network, then the data represented in the form of numerical data or graph data by the web interface.

Based on the test results indicate that the database has been able to store data from sensors sent through nodeMCU with intervals of 3.938 seconds. Database has also been integrated into the web interface and mobile applications, data in the database can be displayed in the form of numeric or in the form of graphics on the web interface and mobile applications. From the results of qualitative tests (questionnaires) obtained an average value of 4 (good).

Keywords: IoT, Web Server, Database, Oracle.