

Abstract

The need for a real time embedded systems is now increasing. In broad principle of real time embedded systems are already used in many fields, industries, households, and specific purposes such as the field of telemetry systems. Telemetry is a technology that allows the remote measurement and reporting of information to the designer or operator of the system, which is expected to provide benefits in terms of time and cost savings rather than direct observation. Basically telemetry refers to wireless technologies such as using radio communication, but can also use a wire transmission medium (wired).

This system is built on the J2EE. To read the information transmitted by the observation of the fuel sensor on the BTS's generator via a GSM module which will then be stored in a database using Gammu SMS Gateway. J2EE will feature the observations into a chart of volume and the indicator color in order to facilitate the reading of data. The application will also generate a notification form on the computer as a warning alarm if the volume of fuel have crossed the minimum line that previously determined.

Having done the analysis and design, it can be seen that the features in the system is working correctly. Finally, testing has been done so it can be concluded that, overall, this system may well facilitate the observation of the fuel in the generator at BTS.

Keywords: Telemetry, Java Enterprise Edition, SMS Gateway