DESIGN AND IMPLEMENTATION OF SERVER ROOM TEMPERATURE CONTROL AND MANAGEMENT APPLICATION BASED ON WEB SERVICE AND SMS GATEWAY

Name : Alexander Rahardjo
NRP : 5107 100 117
Major : Informatics Engineering, IT Department – ITS
Advisor II : Ary Mazharuddin Shiddiqi, S.Kom, M. Comp. Sc.

Abstract

Client-server application is implemented by almost all companies and institutions. Therefore the servers have a very important role as they hold the entire business process on it. Server room air cooling system is a main aspect that must be maintained because it enables the servers to perform properly. In addition, the air cooling system is different with other factors such as lighting exposure and humidity that have been arranged in the initial plans development when build a server room.

Application which is developed in this final project is able to manage and monitor the entire server room temperatures which can displays the server room temperature and provide automatic warning to the administrator of the server room via SMS Gateway when the temperature exceeds a given limit. Management server room temperature is handled by a web application which works using a communication via web service to the entire server room which would make the management system easy. Administrator server room can manage and control the entire server room temperature through the website and SMS. The application also provides information of the sensors condition on each server room by checking on the validity of the data.

Managing and controlling server room temperature application can help administrator to manage all data which are related to the server
room. Especially server room temperature which is important for servers.

Keyword: Temperature, Server Room, Web service, SMS Gateway.