

ABSTRACT

World of telecommunications and its use is now no longer dominated by the voice communication path, the portions are shared with the data communication lines. Data communication applications such as audio, video streaming, online gaming, image, and also distance learning requires a large bandwidth. There are also a desire that the entire wireless network infrastructure is becoming a very popular means of communication without wires (wireless) increases with the enactment of a new protocol that allows the transfer of data in a large capacity. Utilization of wireless communication technology is increasing, in line with the complexity of human needs. Ranging from messaging, controlling up to monitoring. One of the human needs of controlling up to monitoring the use of CCTV as a security monitoring tool.

At this final project is designed CCTV is able to rotate 360 degrees, with a supported server and client (simulated mobile phone used by the user). It was able to be controlled by the user and integrated with the intranet network where data is transmitted to the server and sent to the client, then the user can see the results of the IP camera image capture through a client who has had an application. These applications are designed using a programming language J2ME (java for user applications).

The results of testing scenarios conducted different throughput values obtained in the afternoon and evening at 12:00 to 13:00 and 16:00 to 17:00 pm carried out during the 30s with IP camera angle positions 0° , 90° , 180° , 270° and 360° , which at the time of the afternoon and evening at position 0° camera IP Throughput value difference that occurred at 0.043 Mbps, while the difference in the throughput at the IP camera positions 90° , 180° , 270° and 360° are 0.006 Mbps, 0.051 Mbps, 0.073 Mbps and 0.096 Mbps . Differences in the throughput due to the large image file of the results capture different light intensity caused by the sun.

Keywords: QoS (quality of service), IP Camera, J2ME and Public Internet Protocol.