

ABSTRACT

Improved customer service is the main concern for any company providing telecommunications services such as PT. Telkom Tbk. The rapid demand for internet services, led to the development of technology used. Internet network from the customer up to the internet service provider via some device that consists of premise equipment located on the side of the operator and customer premise equipment located at the customer. One of the customer interface to the Internet is a DSLAM (Digital Subscriber Line Multiplexer Asymmetrik).

In this final analysis, QoS (delay, throughput and packet loss) for High Broadband Access service on Metro Ethernet network links the Kota 2 – Ancol of PT Telkom Tbk using DSLAM. As a comparison, made a simulation program using Network Simulator 2. There are 3 scenarios in this thesis is the effect of adding the number of users with no background traffic, the effect of adding the number of users with background traffic and the effect of adding the percentage of background traffic.

Results obtained from real data to packet loss is 0.014862%, throughput is 36350.348 Kbps and delay is 40.5 ms. The simulation obtained value is 0.475687% packet loss, throughput is 0.15064 41 404 Kbps and the delay is ms. Although it looks much, but the simulation results that have been conducted on each scenario is still in accordance with existing standards.

Keywords: DSLAM, Metro Ethernet, High Broadband Access.