ABSTRACT

IP Multimedia Subsystem (IMS) is telecommunication network architecture

based on IP (internet protocol). IMS is one of telecommunication architecture that grow

up with connects between wireless and wireline technology. IMS offers

multimedia services such as voice, video, iptv, video conference and etc. The Principle of

IMS is manage each service session. IPTV (internet protocol television) is broadcast

digital televison system based on multycast IP method on IP network infrastructure.

This final examination was stake and analys the IPTV service on IMS network

with ADSL and HSDPA access network. This implementation wiil analys the QoS of

access network such as delay, packet loss, jitter, throughput. The QoS value is hoped can

give the information about standart requirement for IPTV on IMS.

From the test, we obtain that the highest traffic on the HSDPA network is at

22.00-24.00, and the lowest traffic occurred at 04.00. In the ADSL network, the highest

traffic occurred at 10.00-12.00 and the lowest traffic occurred at 04.00. From

measurements of the performance of ADSL can be concluded that the delay value is still

below ITU-T standard and Jiitter ADSL is still considered good by the Thipon standards.

ADSL packet loss value is said good at 04.00 and said medium at 10.00 and 22.00.

HSDPA measurement results show that the delay is still under ITU-T standard at 04.00

and Delay value at 10.00 and 22.00 are out of ITU-T standart. Value of jitter and packet

loss are all still considered good by the Thipon standards.

Keyword: IMS, Internet Protocol Television, ADSL, HSDPA and QoS.