

ABSTRAK

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Judul : Pengukuran *Quality of Service* Pada Layanan IPTV Berbasis *Open IMS*

Internet Protocol Television (IPTV) merupakan suatu layanan multimedia seperti TV, video, audio, text, grafik, dan data yang dikirim melalui jaringan berbasis *Internet Protocol (IP)* yang membutuhkan suatu level *quality of service (QoS)*. *Internet Protocol Multimedia Subsystem* yang dikenal dengan IMS adalah suatu teknologi dimana layanan komunikasi multimedia multi akses pada jaringan IP dengan memberikan suatu Jaminan QoS. Dengan layanan IPTV melalui IMS diharapkan layanan IPTV dapat diakses dari jaringan akses yang berbeda. Dari hasil testbed IPTV melalui IMS, pelanggan yang melakukan *roaming* di *visited network* pada jaringan wireless ketika putus dari jaringan dan mendapatkan sinyal kembali tidak perlu melakukan register ulang. Dan dari hasil pengukuran semakin tinggi *video bit rate* dari server IPTV, *throughput* semakin tinggi sedangkan *delay* dan *jitter* semakin menurun. Nilai dari delay lebih kecil dari 32 ms dan jitter lebih kecil dari 20 ms, masih dalam range spesifikasi standard ITU-T Y.1541.

Kata Kunci : IMS, IPTV, *roaming*.

ABSTRACT

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Internet Protocol Television (IPTV) is multimedia services such as TV, video, audio, text, graphics, and data that sent through the network based Internet Protocol (IP), which requires a level of quality of service (QoS). Internet Protocol Multimedia Subsystem known as IMS is a technology where multi-access multimedia communication services on IP networks by providing a QoS guarantee. With IMS based IPTV service is expected to be accessible from different access networks. From the results of testbed IMS based IPTV, user who is roaming in the visited network on wireless networks when disconnected from the network and get the signal back do not need to register again. And from the result of measurement the higher video bit rate of the server IPTV, the higher throughput while the lower delay and jitter. The value of delay is below 32 ms and jitter is below 20ms, still in range specification standard ITU-T Y.1541.

Keyword : IMS, IPTV, Roaming