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Algorithm for enhancing the QoS of video traffic over wireless mesh networks (Article)

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Abstract

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One of the major issues in a wireless mesh networks (WMNs) which needs to be solved is the lack of a viable protocol for medium access control (MAC). In fact, the main concern is to expand the application of limited wireless resources while simultaneously retaining the quality of service (QoS) of all types of traffic . In particular, the video service for real-time variable bit rate (rt-VBR). As such, this study attempts to enhance QoS with regard to packet loss, average delay, and throughput by controlling the transmitted video packets. The packet loss and average delay of QoS for video traffic can be controlled. Results of simulation show that Optimum Dynamic Reservation-Time Division Multiplexing Access (ODR-TDMA) has achieved excellent utilization of resource that improvised the QoS meant for video packets. This study has also proven the adequacy of the proposed algorithm to minimize packet delay and packet loss, in addition to enhancing throughput in comparison to those reported in previous studies. © 2018 The Science and Information (SAI) Organization Limited.

SciVal Topic Prominence

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