

Improved handoff call dropping probability (HCDP) in adaptive quality of service (AdQoS) in multimedia wireless networks using hierarchical cellular approach

ABSTRACT

The maintenance of quality of service (QoS) in a wireless environment is a difficult problem. Most researchers already acknowledge adaptive techniques as the appropriate method to deal with the fluctuation of QoS in a wireless cellular network. This paper proposes an improved handoff call dropping probability (HCDP) from an adaptive QoS (AdQoS) to support the QoS guarantee. Besides using an adaptive technique this method utilizes a hierarchical cellular approach with a bandwidth reallocation algorithm to determine the acceptance or rejection of a new call. The approach would improve the HCDP performance of the multimedia application over high-speed wireless cellular networks.

Keyword: Handoff call dropping probability (HCDP); Adaptive QoS (AdQoS); Quality of service (QoS); Hierarchical cellular approach