

AODV AND DSR MANET ROUTING PROTOCOLS: A COMPARISON OF PERFORMANCE

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ABSTRACT

A Mobile Ad hoc NET work (MANET) is a self-configuring network formed by independent nodes connected to each other through wireless links. Of late, MANETs have been a vital area of interest for investigation and research due to the boom in the communication industry. An important issue related to the MANETs is their routing protocols. A number of routing protocols are in use and one of the critical factors for the comparison amongst these protocols is their performance. In this paper, authors have made an attempt to compare the performance of two of the most famous routing protocols in MANETs: Ad hoc On demand Distance Vector (AODV) routing and Dynamic Source Routing (DSR) protocols. For this purpose, the performance of both these routing protocols has been compared through simulation using Network Simulator using the parameters: number of packets delivered, communication time and Time-To-Live (TTL) of a packet. It has been established that performance of AODV based on these parameters is better than that of DSR.

KEYWORDS: AODV, DSR, Mobile Ad hoc Network, Network Simulator, Protocol, Time-To-Live