Minimizing End-to-End Delay using Multipath Routing in Wireless Sensor Networks

Abstract

Some sensitive applications such as volcanic monitoring, fire detection data should be transmitted within a specified delay to the base station. Multipath-GT (Multipath - Generalized Topology) model uses an on-demand approach to estimate a delay based on processing time, packet loss rate between two neighbouring nodes. In existing work, if a node or link failure
occurs multipath routing didn’t spread traffic over alternate paths. This paper take a view that, when certain nodes and links become over-utilized and cause congestion, proposed work can spread traffic over alternate paths to balance the load over those paths and increase the degree of fault tolerance. The simulation results show that reduces the probability of communication disruption and data loss during link failures.

Reference

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**Index Terms**

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**Key words**

Wireless Sensor Networks (WSN) Routing

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Alternate Path

Fault Tolerance