Abstract

Wireless Sensor Network is a Research issue in which construction of Virtual Backbone schemes over multi-hop wireless sensor networks. This paper investigates the problem of connectivity for random placement of nodes by minimizing active sensor nodes. Several backbone construction techniques have been reported in recent years regarding the routing problem of the ad hoc wireless sensor networks. As the network size is growing in the physical world, redundancy in nodes also increased because of this the redundancy it affects the WSN performance. Hence the classification of all these backbone construction techniques is done, which are based on the connected dominating set (CDS) and other techniques. A generalized scheme to be more robust, having lesser number of Backbone nodes with higher mobility is proposed.

References

Scheduling for Data Collection and Aggregation”, IEEE TRANSACTIONS ON PARALLEL AND DISTRIBUTED SYSTEMS, vol. 21, no. 2, pp 275-287.
Introducing Energy Efficient Strategies of Virtual Backbone Nodes in Wireless Sensor Network


Index Terms

Computer Science

Wireless

Keywords

Wireless Sensor Network, Sensor Network, Backbone Construction using Cluster Head in Spanned Forest (BC2HF), Maximum Degree Spanned Forest (MDSF)