



Routing based on maximizing Output in underwater sensor networks

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Original Article:

Received 10 Jan. 2017 Accepted 10 April 2017 Published 20 May. 2017

ABSTRACT

In this study we want to optimize routing in underwater sensor networks through considering the spatial distribution of network's sensor nodes and their energy consumption limitation such that the overload of layer routing protocol (including the number of message passing specified to routing operation and waiting time for upper layers) on network output will be decrease, The main feature of this study is simultaneously considering the model of underwater channel, geometric distribution of network and transaction of network layer and MAC sub layer is solving routing problem. In this study we present a routing mathematical model with the capacity of sink movement in wireless sensor networks. We introduce an algorithm to compute the DS in certain modeled networks as a graph. Through simulation, presented design will be evaluated and investigated ,Our presented design is Depth and Energy Aware Dominating Set based Algorithm (DEADS) (an algorithm based on depth and energy) . In this study we applied MATLAB software for simulation. Finally we conclude that the durability and the trend of active nodes in each period of our presented design is better suggesting that the applicability and capacity of our plan was improved, Also the energy consumption of our design is as a result of more transfer number. Also, head-to-head delay is lower and partially it is followed from the same paradigm.

Keyword:

Routing; Output, Sensor network, Node

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Peer review under responsibility of **UCT Journal of Research in Science, Engineering and Technology**