

Modifying the multicast tree in AMTree protocol using random core selection

ABSTRACT

One of two approaches used to construct the tree in multicast protocols, either shortest path tree approach, or core based tree approach. In AMTree protocol, the shortest path tree approach is used with incorporation of the idea of core from core based tree approach. In this paper we propose a new technique for constructing the multicast tree using pre-selected nodes to act as cores. The idea of the proposed technique is to reduce the optimization time and the number of nodes invoking for optimization. The experiments show that the number of nodes asking for optimization process is minimized and the optimization time is reduced too. Furthermore, tree efficiency for AMTree using the proposed technique is better than that of AMTree without it.