Chapter 7

Conclusion and Future Work

7.1 Conclusion

The contribution of the thesis can be summarized as follows:

1. On the basis of literature review a framework is proposed for IP address configuration and for connectivity with public network. But Framework is evaluated only for merging and partition of the Network.

2. Algorithms for merging and partitioning of the network are proposed which are more efficient than the previous models.

3. Algorithm for secure joining of nodes is given. In which authentication has taken place before assigning the IP address of the node.

4. On the basis of proposed algorithm results are simulated and generated. In case of merging of MANETs results are better than the previous models. And proposed algorithm validated and compared with other algorithms and proves gains in improvement for different parameters in Adhoc environment given in Table 4.4.

5. On the basis of proposed partition algorithm results are simulated, proposed algorithm results are better than the previous models and comparisons of results are given in Table 5.4.

6. The framework for IP address configuration and algorithms also supports mobility in case of merging and partition with mobility. The comparisons of the result are shown in the Table 6.3 and Table 6.5.
7. The framework for IP address configuration and algorithm also supports scalability. We have tested the performance of the proposed algorithm by considering the node densities 20, 25, 30 in case of partition and 15, 21, 27 and 33 in the case of merging.

7.2 Suggestions for the Future Work

Some of important issues are discussed in this dissertation and provided feasible solutions for them. However some suggestions for future work are as follows

1. An algorithm is proposed for IP v4 and IP v6 but validated only for IPv4. We can validate the algorithm for IPv6.

2. The security concern is very little in the proposed algorithm only authentication is given. We can add more security features in the algorithm.

3. We can take more scenarios for further optimization of the algorithms.