Abstract

In the classical version of Traveling salesman problem, the targets which have to be visited are stationary but in real life there are large numbers of instances where the targets are in motion. In this paper, Moving target TSP with resupply is being studied and new algorithm is designed for moving target TSP with resupply when all targets are moving away from the origin with
positive constant velocity and the goal is to minimize the total intercepting time taken by the salesman. An algorithm is also designed when all targets are moving towards the origin with the positive constant velocity in a straight line and a single salesman (moving with the constant velocity) has to intercept these targets in a particular way with the constraint that after intercepting every target, salesman must come back to the origin for resupply and the goal is to minimize the total intercepting time taken by the salesman.

Reference

- G. Tel, "Introduction to Distributed Algorithms" Cambridge Univ. Press 1995.

Index Terms

Computer Science \hspace{0.5cm} Integrated Circuits

Key words

Algorithm \hspace{0.5cm} Traveling salesman problem
Moving target traveling salesman problem with resupply