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**Author:** Zhiwei Yang  
**Title:** Meta-heuristics for vehicle routing and inventory routing problems  
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1. On standard problem encodings, there are typically large infeasible parts in the search space of the dynamic vehicle routing problem with time windows. Moreover, if an algorithm tries to obtain the global optimum, it may be required to cross through infeasible subspaces. This thesis, Chapter 2.

2. The communication mechanism of a swarm gives otherwise ‘dumb’ individuals intelligence to cooperate together on solving complex problems. This thesis, Chapter 3.

3. For the dynamic vehicle routing problem with time windows, the multiple ant colony system finds the solution that can, with good accuracy, minimize the traveling distance without violating any time constraints and capacity constraints. This thesis, Chapter 4.

4. More haste, less speed. Serving high priority level customers first as an intuitive idea may result in significantly more total penalty of the delay time for the entire procedure. This thesis, Chapter 5.

5. When applying the theoretical algorithm in real-world problems, it takes several iterations of real world experiments to adjust the algorithm in order to deal with new situations in practice. This thesis, Chapter 6.

6. It is difficult to figure out the real requirements of users prior to real world testing. An efficient communication mechanism should be built in order to integrate the users into the process of the implementation. This thesis, Chapter 6.

7. Next to inventory cost and routing cost, expected stockout cost can be viewed as a third objective function in inventory routing problems. This thesis, Chapter 7.

8. The multi-objective optimization cooperative particle swarms (MOCOPS) algorithm is able to produce a good approximation of the Pareto front for tri-objective problems. This thesis, Chapter 7.

9. Doing a PhD is like running a marathon. The last kilometer is always the most difficult part of the journey.