



# Assignment Notes

- 30% of total mark.
- TSP with arbitrary number of cities.
- TSP is asymmetric.
- A window-based GUI is optional – can be command line.
- Must read distance matrices from a file.
- Outputs to text file:
  - Performance trace.
  - Best tour found.



# Example Input

Indices are for illustration only.

```
[1] [2] [3] [4] [5]
[1] 0, 10, 12, 5, 6
[2] 10, 0,
[3] 12, , 0
[4] 5, , , 0
[5] 6, , , , 0
```

Note that diagonal is 0.

Number of rows and cols is the same and is equal to the number of cities.

Notice that this example is symmetric.



# Example Output

Worst, average, best tour length  
for the current generation.

120, 80, 75  
120, 79, 74  
123, 79, 70

First lines are the performance trace.

...

...

6, 2, 1, 4, 3, 5

Last line is the optimal tour.



# Accepted Parameters

- Fixed number of generations (e.g. fixed 120 generations).
- Convergence detection (e.g. 10 iterations without change in best).
- Population size.
- Mutation rate.
- Crossover rate.
- ...