My Project

Generated by Doxygen 1.8.13

Contents

Chapter 1

Hierarchical Index

1.1 Class Hierarchy

This inheritance list is sorted roughly, but not completely, alphabetically:

Chapter 2

Class Index

2.1 Class List

Here are the classes, structs, unions and interfaces with brief descriptions:

Chapter 3

Class Documentation

3.1 Dijkstra Class Reference

Inheritance diagram for Dijkstra:

3.2 Graph Class Reference

Inheritance diagram for Graph:

Public Member Functions

- virtual void addEdge (node_type i, node_type j)

  Graph initialization. Adding a edge between the vertices i and j.
- virtual void setWeight (node_type i, node_type j, dist_type dist)

  Weight initialization. Setting the weight between the vertices i and j.
- virtual dist_type getWeight (node_type i, node_type j)

  Getting the weight between the vertices i and j.
- vector< node_type > * successors (node_type i)

  Return all the successors of vertice i.
- void **addEdgeWeighted** (node_type i, node_type j, dist_type dist)
- set< node_type > **vertices** ()

3.2.1 Member Function Documentation

3.2.1.1 addEdge()

```
void Graph::addEdge (
            node_type i,
            node_type j )  [virtual]
```

Graph initialization. Adding a edge between the vertices i and j.

The graph class contains the graph It is an interface to implement in the class graph.cpp

The documentation for this class was generated from the following files:

- graph.h
- graph.cpp

3.3 Link Class Reference

Public Member Functions

- double **travel_time** (double flow)

Public Attributes

- double **capacity**
- double **free_flow_time**

The documentation for this class was generated from the following file:

- road_network.h

3.4 NetworkDikjstra Class Reference

Inheritance diagram for NetworkDikjstra:

Collaboration diagram for NetworkDikjstra:

Additional Inherited Members

The documentation for this class was generated from the following file:

- test.cpp

3.5 RoadNetwork Class Reference

Inheritance diagram for RoadNetwork:

Collaboration diagram for RoadNetwork:

Public Member Functions

- void **read_from_csv** (string filename)
- void read_from_tntp (string filename)

Public Attributes

- unordered_map< link_type, Link > links
- unordered_map< link_type, double > * **link_flows**

3.5.1 Member Function Documentation

3.5.1.1 read_from_tntp()

```
void RoadNetwork::read_from_tntp (
            string filename )
```

INPUTS:

Filename in CSV format delimited by tabs ().

OUTPUTS:

Struct containing the titles of each column and the csv as vector<vector<double>>.

3.5.2 Member Data Documentation

3.5.2.1 links

```
unordered_map<link_type, Link> RoadNetwork::links
```

The Road network class contains the road network It is an interface to implement in the class road_network.cpp

The documentation for this class was generated from the following files:

- road_network.h
- road_network.cpp