

Undirected Weighted Graph

Minimum Spanning Trees

Requirements

Create file in python with a **comment** containing the academic honesty pledge as shown below. Add another, separate comment to the file containing your name

- Write a python program that creates a graph using a textarea and the formatting described in a later slide
- Your code will print out the MST of the graph described in later slides.
- Your code should generate both the form (with a textbox) and the output.

```
# I honor Parkland's core values by affirming that I have  
# followed all academic integrity guidelines for this work.  
  
# your name
```

Input format: This is a **undirected** & weighted graph

```
vertex1  
vertex2  
vertex3  
...  
vertexn  
#end
```

the names of the vertices, one per line. NO EMBEDDED SPACES!!!

Ignore duplicates

There are no negative edge weights.

Keyword that shows the end of the vertices

```
vertex1, vertex2, 5.6  
vertex1, vertex3, 8.9  
...
```

the edges in the graph. Format is:

vertex [comma] [space] vertex [comma] [space] weight [newline]

When you're out of data, there are no more edges. Ignore invalid edges. Weights can be decimal numbers. Consider the edges undirected.

Minimum Spanning Tree - Prim-Jarnik

Construct a MST using the Prim-Jarnik method. Print the following:

- The edges in the tree, with their weights.
- The total weight of the entire tree.

Minimum Spanning Tree - Kruskal

Construct a MST using the Kruskal method. Print the following:

- The edges in the tree, with their weights.
- The total weight of the entire tree.

Turn in

The code you wrote or modified.

A link to the webpage.