Reverse-delete algorithm. Develop an implementation that computes the MST as follows: Start with a graph containing all of the edges. Then repeatedly go through the edges in decreasing order of weight. For each edge, check if deleting that edge will disconnect the graph; if not, delete it. Prove that this algorithm computes the MST.

Input:

First Line indicates the number of the Vertices (V). Second Line indicates the number of the Edges (E). Next E lines contains 3 integers which are separated by space.

Output:

Print edges in ascending order of their weights.

Sample Input:

4

5

0 1 10

026

035

1 3 15

234

Sample Output:

2-3 4

0-3 5

0-1 10