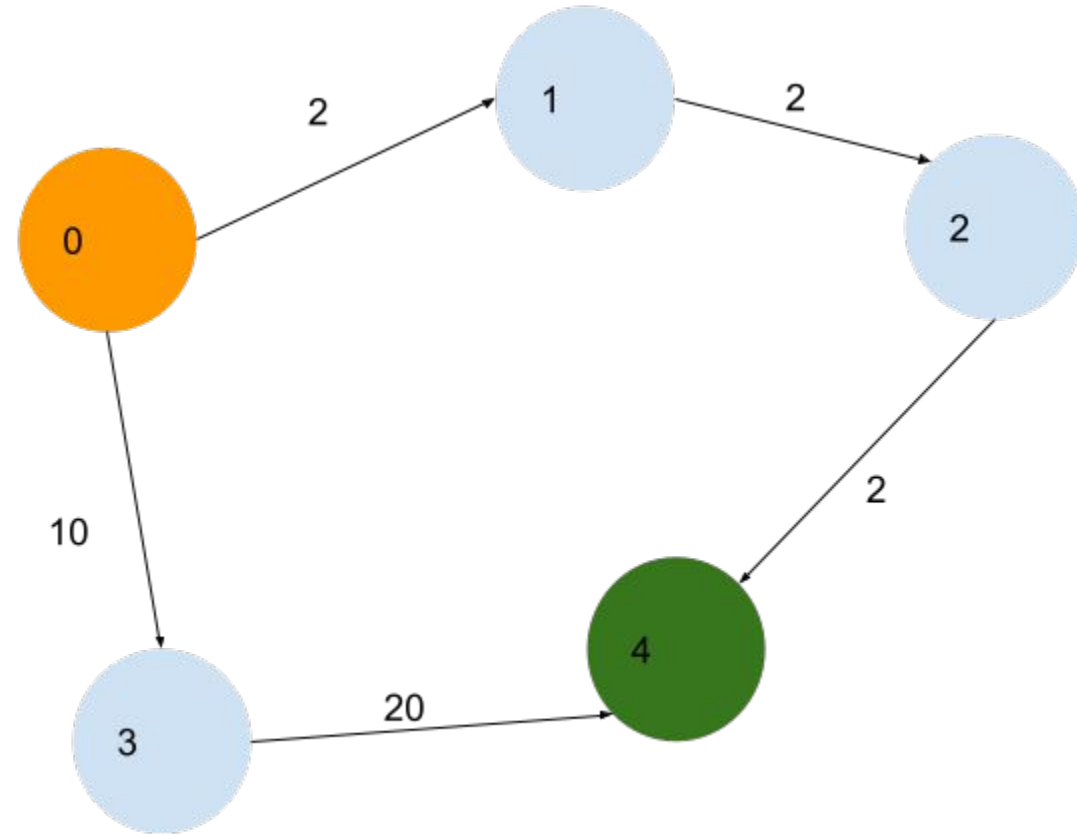


SSSP

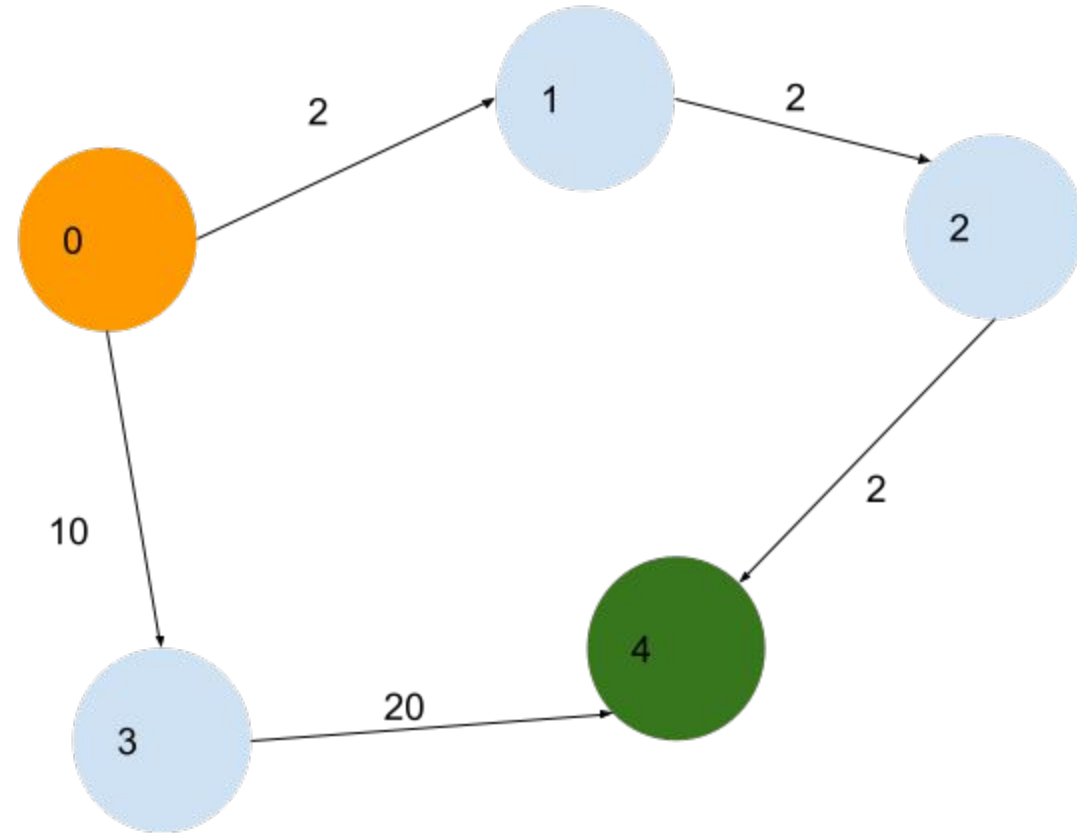
CSCI 335

Dijkstra Algorithm



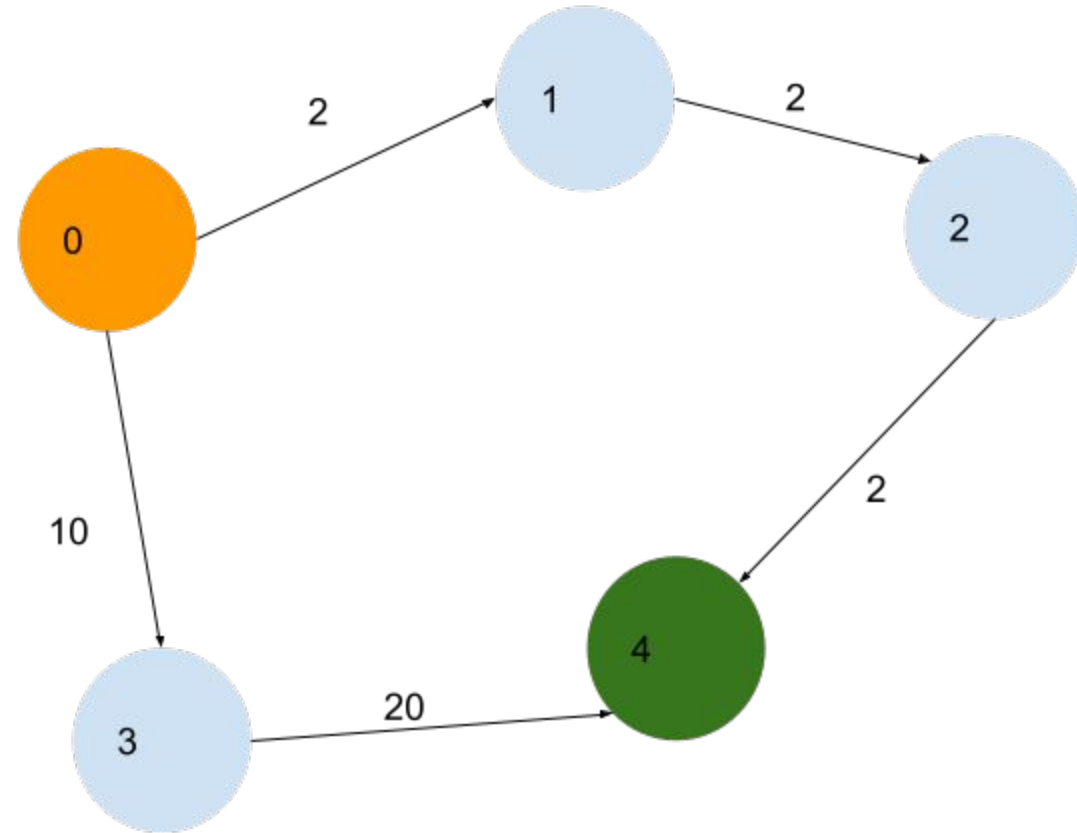
1. **Init:** the distance to every node as INF
2. **Explore** the shortest **UNEXPLORED** node
3. Update the distance if we find a shorter one

Dijkstra Algorithm



1. **Init:** the distance to every node as INF
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Dijkstra Algorithm



1. **Init:** the distance to every node as INF
2. **Explore** the shortest **UNEXPLORED** node
3. Update the distance if we find a shorter one: if not shorter: continue. Else **update**.

Update:

Naive one: update it immediately

Modified one: update it later (soft deletion)