```
2
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    */
 3
 4 #include <bits/stdc++.h>
 5 using namespace std;
 6 #define pb push back
 7 #define mp make_pair
 8 #define fi first
 9 #define se second
10 typedef long long II;
11 typedef pair<II,II> pii;
12 const II maxn = 10010;
13 const II INF = 2147483647;
14 II n, m, s, t, tot = 1, head[maxn], nxt[maxn], now[maxn], x, y, v;
15 II dis[maxn], res;
16 struct e{
17
       Il to, val;
18
   }edge[maxn];
19
    void add_edge(Il x, Il y, Il val){
       nxt[++tot] = head[x];
21
       edge[tot].to = y;
       edge[tot].val = val;
       head[x] = tot;
24 }
    bool bfs(){
26
       for(int i = 1; i <= n; i++) dis[i] = INF;
27
       queue <ll> q;
28
       dis[s] = 0;
29
       now[s] = head[s];
       q.push(s);
31
       while(!q.empty()){
          II tem = q.front();
33
         //cout << tem << endl;
34
          q.pop();
          for(int i = head[tem]; i; i = nxt[i]){
36
            if(dis[edge[i].to] == INF && edge[i].val){
37
               //cout << edge[i].to << endl;
               dis[edge[i].to] = dis[tem] + 1;
               now[edge[i].to] = head[edge[i].to];
40
               q.push(edge[i].to);
41
               if(edge[i].to == t) return true;
42
            }
43
         }
44
       }
45
       return false;
   }
46
47
    II dfs(II x, II sum){
48
       if(x == t) return sum;
49
       II ans = 0;
       for(int i = now[x]; i && sum; i = nxt[i]){
```

```
51
         now[x] = i;
52
         if(dis[edge[i].to] == dis[x] + 1 && edge[i].val){}
53
            II k = dfs(edge[i].to, min(sum, edge[i].val));
54
            if(k == 0) dis[edge[i].to] = INF;
55
            edge[i].val -= k;
            edge[i ^1].val += k;
56
57
            ans += k;
58
            sum -= k;
59
         }
60
       }
61
       return ans;
62 }
    int main()
63
64
   {
65
       ios::sync_with_stdio(false);
66
       cin >> n >> m >> s >> t;
67
       for(int i = 1; i <= m; i++){
68
         cin >> x >> y >> v;
69
         add_edge(x, y, v);
70
         add_edge(y, x, 0);
71
      }
72
      while(bfs()){
         res += dfs(s, INF);
73
74
       }
75
       cout << res << endl;
76
       return 0;
77 }
```