

```
1: #include<iostream>
2: #include<vector>
3:
4: #define ll long long int
5: #define rep(n) for(int i=0;i<n;i++)
6: //(1)
7: class BIT
8: {
9:     public:
10:         //(2)
11:         std::vector<ll> node;
12:         ll n_;
13:         BIT(ll n)
14:         {
15:             n_=n;
16:             node.resize(n+1,0);
17:         }
18:
19:         //(3)
20:         void add(ll i,ll x)
21:         {
22:             while(i<=n_)
23:             {
24:                 node[i]+=x;
25:                 i+=i&-i;
26:             }
27:         }
28:
29:         //(4)
30:         ll sum(ll i)
31:         {
32:             ll s=0;
33:             while(i>0)
34:             {
35:                 s+=node[i];
36:                 i-=i&-i;
37:             }
38:             return s;
39:         }
40: };
41:
42: int main()
43: {
44:     ll n;
45:     std::cin>>n;
46:     std::vector<ll> v(n);
47:     std::vector<ll> p(n);
48:     BIT *bit_v=new BIT(n);
49:     BIT *bit_p=new BIT(n);
50:     ll cnt_v=0;
51:     ll cnt_p=0;
52:     //(5)
53:     rep(n)
54:     {
55:         int v;
56:         std::cin>>v;
57:         cnt_v+=i-bit_v->sum(v);
58:         bit_v->add(v,1);
59:     }
60:     //(6)
61:     rep(n)
62:     {
63:         int p;
64:         std::cin>>p;
65:         cnt_p+=i-bit_p->sum(p);
66:         bit_p->add(p,1);
67:     }
68:     std::cout<<cnt_v-cnt_p<<std::endl;
69:     return 0;
70: }
```