Missing Number

```cpp
class Solution {
public:
    int missingNumber(vector<int>& nums) {
        long int x;
        sort(nums.begin(),nums.end());

        for(long int i=0;i<nums.size();i++){
            if(i!=nums[i]){
                x = i;
                break;
            }
            else{
                x=nums.size();

            }
        }
        return x;

    }
};
```

Best Time to Buy and Sell Stock

```cpp
class Solution {
public:
    int maxProfit(vector<int>& prices) {
        int n=prices.size(), mini=prices[0], maxp=0, currp;
        for(int i=1;i<n;i++){
            currp=prices[i]-mini;
            maxp=max(currp, maxp);
            mini=min(mini, prices[i]);
        }
        return maxp;
    }
};
```