Week 7

Q1)

```
[] G & Share
main.c
                                                              Run
                                                                         Output
 1 // Online C compiler to run C program online
                                                                       /tmp/hMuD5SVo9d.o
   #include <stdio.h>
                                                                       Enter a number: 2
                                                                       Enter a number: 3
 3
 4 - int main() {
                                                                       Enter a number: 4
                                                                       Enter a number: 5
   int numbers[9];
                                                                       Enter a number: 6
    int sum=0;
                                                                       Enter a number: 7
                                                                       Enter a number: 8
 9 * for (int i=0; i<9; i++) {
                                                                       Enter a number: 9
10
        printf("Enter a number: ");
                                                                       Enter a number: 10
11
       scanf("%d", &numbers[i]);
                                                                       54
12
        sum += numbers[i];
13 }
                                                                       === Code Execution Successful ===
14
        printf("%d", sum);
15
       return 0;
16 }
```

Q2)

```
main.c
                                    Run
                                                                        Output
 1 // Online C compiler to run C program online
                                                                      /tmp/DeWEYn1dh4.o
 2 #include <stdio.h>
                                                                      Enter a number: 2
                                                                      Enter a number: 3
 3
 4 r int main() {
                                                                      Enter a number: 4
                                                                      Enter a number: 5
 6 int numbers[9];
                                                                      Enter a number: 6
                                                                      Enter a number: 7
 7 int abc:
                                                                      Enter a number: 8
9 * for (int i=0; i<9; i++) {
                                                                      Enter a number: 9
       printf("Enter a number: ");
                                                                      Enter a number: 10
10
11
       scanf("%d", &numbers[i]);
                                                                      10 9 8 7 6 5 4 3 2
12 }
13
                                                                      === Code Execution Successful ===
14 \neq \text{for (int } i=8; i>=0; i--)  {
       abc = numbers[i];
15
16
       printf("%d ", abc);
17 }
                                                                                                             Activate
18
       return 0;
19 }
```

Q3)

```
∝ Share
 main.c
                                                                 Run
                                                                            Output
                                                                        ^/tmp/JdGWaJ7LTc.o
 3 = int main() {
                                                                          Enter a number: 2
   int startnum:
                                                                          Enter a number: 56
    int numbers[8];
                                                                          Enter a number: 78
    int sum=0;
                                                                          Enter a number: 43
    printf("Enter a number: ");
                                                                          Enter a number: 1
   scanf("%d", &startnum);
                                                                          Enter a number: 49
   int min = startnum;
                                                                          Enter a number: 90
10 int max = startnum;
                                                                          Enter a number: 97
11 \neq \text{for (int } i=0; i<8; i++)  {
                                                                          Enter a number: 28
        printf("Enter a number: ");
12
13
        scanf("%d", &numbers[i]);
                                                                         Minimum Number = 1
14 -
        if (numbers[i]<min) {</pre>
                                                                          Maximum Number = 97
15
         min=numbers[i];
16
                                                                          === Code Execution Successful ===
17 -
        if (numbers[i]>max) {
18
        max=numbers[i];
19
20 }
        printf("\nMinimum Number = %d", min);
21
22
        printf("\nMaximum Number = %d", max);
```

Q4)

```
main.c
                                                                       Output
                                                             Run
                                                                    /tmp/PS5bUFHnBE.o
 4 - int main() {
                                                                     Enter how many inputs you need: 6
        int i, input;
                                                                     Number 1: 2
        int found = 0;
                                                                     Number 2: 3
        printf("Enter how many inputs you need: ");
                                                                     Number 3: 2
                                                                     Number 4: 5
        scanf("%d", &input);
 9
                                                                     Number 5: 4
10
11
        int num[input];
                                                                     Number 6: 3
                                                                     Numbers occurring more than once: 2 3
12
13 -
        for (i = 0; i < input; i++){
14
           printf("Number %d: ", i + 1);
                                                                     === Code Execution Successful ===
15
           scanf("%d", &num[i]);
16
       }
17
18
        int max = num[0];
19
        for (i = 1; i < input; i++){
20 -
21 -
           if (num[i] > max) {
22
               max = num[i];
23
           }
```

```
27
       for (i = 0; i \le max; i++){
28 -
29
            countarr[i] = 0;
30
        }
31
32 -
       for (i = 0; i < input; i++){
33
            countarr[num[i]] += 1;
34
        }
35
36
        int numfound[max+1];
37
        printf("Numbers occurring more than once: ");
38
39 -
        for (i = 0; i \le max; i++){
40 -
           if (countarr[i] > 1) {
41
               printf("%d ", i);
42
           found = 1;
43
44
       }
45
```

26

int countarr[max + 1];