Name - Khushi Negi

Student ID - 20052109

University Roll no 2023062

Q2

```c
#include<stdio.h>
int main()
{
    int queue [20],n,head, i, j, seek =0, max, diff, temp, queue1[20],
    queue 2[20],
    temp1 =0, temp 2=0;
    float avg;
    printf ("Enter the max range of disk \n");
    scanf ("% d", &max);
    printf ("Enter the initial head position\n");
    scanf ("%d ", &head);
    printf ("Enter the size of queue request\n");
    scanf ("% d",&n);
    printf ("Enter the queue of disk position to be read\n");
    for (i=1; i<=n; i++)
    {
        scanf (" % d ", &temp);
        if (temp >= head)
        {
            queue 1[ temp 1] = temp;
            temp 1++;
        }
        else
```

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```
queue2[temp2] = temp;
temp2++;
  }
 }
for (i=0; i< temp1-1; ++)
 {
  for (j = i+1; j < temp1; j++)
   {
    if (queue1[i] > queue1[j])
     {
      temp = queue1[i];
      queue1[i] = queue1[j];
      queue1[j] = temp;
     }
   }
 }
for (i=0; i< temp2-1; i++ )
 {
  for (j = i+1; j < temp2; j++)
   {
    if (queue2[i] > queue2[j])
     {
      temp = queue2[i];
      queue2[i] = queue2[j];
      queue2[j] = temp;
     }
   }
```

Khushi Negi

```c
for (i=1, j=0; j < temp 1; i++, j++)
   queue[i] = queue1[j];
   queue[i] = max;
   queue[i+1] = 0;
for (i = temp 1+3, j=0; < temp 2; i++, j++)
   queue[i] = queue2[j];
   queue[0] = head;
   for (j=0; j <= n+1; j++)
   {
      diff = abs(queue[j+1] - queue[j]);
      seek + =diff;
      printf("Disk head moves from %d to %d with seek
           %d\n", queue[j], queue[j+1], diff;
```

Khushi Nogi