Ex. No.: 6a)
Date: 20/2/25

FIRST COME FIRST SERVE

Aim:

To implement First-come First- serve (FCFS) scheduling technique

Algorithm:

1. Get the number of processes from the user.
2. Read the process name and burst time.
3. Calculate the total process time.
4. Calculate the total waiting time and total turnaround time for each process 5.
Display the process name & burst time for each process. 6. Display the total
waiting time, average waiting time, turnaround time

Program Code:

```
#include <stdio.h>
int main (){
int n,i;
Printf ("enter the number");
Scanf ("%d",&n);
int bt[n], wt[n], tat[n], ct[n], at=0;
Print ("enter burst time for each process \n");
for [int i=0; i<n; i++){
Scanf ("%d", &bt[i]);
}
ct[0] = bt[0];
for (int i=1; i<n; i++){
ct[i]=ct[i-1] + bt[i];
}
```

```
for (int i=0 ; i<n ; i++){
  tat[i]: ct[i]- at;
}
for (int i=0 ; i<n ; i++){
  wt[i] = tat[i]- bt[i];
}

int avg_tat =0 , avg_wt =0;
for (int i=0; i<n ; i++){
  avg_tat = avg_tat + tat[i];
  avg_wt = avg_wt + wt[i];
}

avg_tat = avg_tat /n;
avg_wt = avg_wt /n;

Printf (" n Process \t Burst time \t waiting time \t tat\n")
for (int i=0 ; i<n ; i++){
  Printf (" %d \t %d \t %d \t %d \n, i, bt[i], wt[i],
                                    tat[i]);
}
Printf (" Avg tat time : %d \n", avg_tat);
Printf (" Avg wt time : %d \n", avg_wt);
}
```

Sample Output:
Enter the number of process:
3
Enter the burst time of the processes:
24 3 3

Process	Burst Time	Waiting Time	Turn Around Time
0	24	0	24
1	3	24	27
2	3	27	30

Average waiting time is: 17.0
Average Turn around Time is: 19.0

OUTPUT:

enter the no. of Process: 3
enter the burst time for each process
6
2
8

Process	Burst time	Waiting time	Tat
0	6	0	6
1	2	6	8
2	8	8	16

Avg tat time: 10
Avg wt time: 4

Result:

Hence the above code executed Successfully