

Experiment – I

Aim: Write a program to implement CPU scheduling for first come first serve.

Software Used: Code::Blocks

Code:

```
#include <iostream>

using namespace std;

int main() {
    int size;

    float sum = 0, test = 0;

    cout << "Enter number of processes"<<endl;

    cin >> size;

    int* arr = new int[size];

    cout << "Enter elements"<<endl;

    for(int i = 0; i < size; i++){
        cin >> arr[i];
    }

    cout << "Processes\tBurst Time\tWait Time" << endl;

    for(int i = 0; i < size; i++){
        if(i!=0){
            test+=arr[i - 1];
        }

        cout << i + 1 << "\t\t" << arr[i] << "\t\t" << test << endl;

        sum+=test;
    }

    cout << "Total Waiting Time: "<<sum<<endl;

    cout << "Average Waiting Time: "<<sum/size;

    return 0;
}
```

Result: Successfully implemented CPU scheduling for first come first serve.

OUTPUT

```
C:\Users\hp\Desktop\fcfs.exe
Enter number of processes
3
Enter elements
10 2 5
Processes      Burst Time      Wait Time
1              10              0
2              2              10
3              5              12
Total Waiting Time: 22
Average Waiting Time: 7.33333
Process returned 0 (0x0)   execution time : 3.284 s
Press any key to continue.
```

```
C:\Users\hp\Desktop\fcfs.exe
Enter number of processes
4
Enter elements
10 2 5 3
Processes      Burst Time      Wait Time
1              10              0
2              2              10
3              5              12
4              3              17
Total Waiting Time: 39
Average Waiting Time: 9.75
Process returned 0 (0x0)   execution time : 3.313 s
Press any key to continue.
```