```c
#include <stdio.h>
int main() {
    int i, NOP, sum = 0, count = 0, y, quant, wt = 0, tat = 0;
    int at[10], bt[10], temp[10];
    float avg_wt, avg_tat;
    printf("Total number of processes in the system: ");
    scanf("%d", &NOP);
    y = NOP;
    for (i = 0; i < NOP; i++) {
        printf("\nEnter the Arrival and Burst time of Process[%d]\n", i + 1);
        printf("Arrival Time: ");
        scanf("%d", &at[i]);
        printf("Burst Time: ");
        scanf("%d", &bt[i]);
        temp[i] = bt[i];
    }
    printf("Enter the Time Quantum: ");
    scanf("%d", &quant);
    printf("\nProcess\tBurst Time\tTAT\t\tWaiting Time");
    for (sum = 0, i = 0; y != 0;) {
        if (temp[i] <= quant && temp[i] > 0) {
            sum += temp[i];
            temp[i] = 0;
            count = 1;
        } else if (temp[i] > 0) {
            temp[i] -= quant;
            sum += quant;
        }
```

```
        if (temp[i] == 0 && count == 1) {
            y--;
            printf("\nP[%d]\t%d\t\t%d\t\t%d",
                   i + 1, bt[i], sum - at[i], sum - at[i] - bt[i]);
            wt += sum - at[i] - bt[i];
            tat += sum - at[i];
            count = 0;
        }
        if (i == NOP - 1) {
            i = 0;
        } else if (at[i + 1] <= sum) {
            i++;
        } else {
            i = 0;
        }
    }
    avg_wt = (float)wt / NOP;
    avg_tat = (float)tat / NOP;
    printf("\n\nAverage Waiting Time    : %.2f", avg_wt);
    printf("\nAverage Turnaround Time: %.2f\n", avg_tat);
    return 0;
}
```

```
Total number of processes in the system: 3

Enter the Arrival and Burst time of Process[1]
Arrival Time: 1
Burst Time: 3

Enter the Arrival and Burst time of Process[2]
Arrival Time: 2
Burst Time: 5

Enter the Arrival and Burst time of Process[3]
Arrival Time: 4
Burst Time: 6
Enter the Time Quantum: 2

Process Burst Time      TAT             Waiting Time
P[1]    3               6               3
P[2]    5               10              5
P[3]    6               10              4

Average Waiting Time   : 4.00
Average Turnaround Time: 8.67
```