First Come First Serve

- Jobs are executed on first come, first served basis.
- It is a non-preemptive scheduling algorithm.
- Easy to understand and implement.
- Its implementation is based on FIFO queue.
- Poor in performance, as average wait time is high.

Here I am going to use some short forms .

PID = Process ID
AT = Arrival Time
BT = Burst Time
CT = Completion Time
TAT = Turn Around Time
WT = Waiting Time

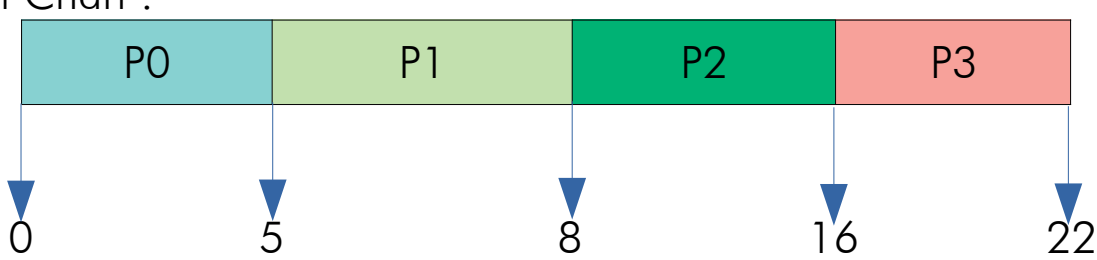
Example : Find Average Waiting Time & Average Turn Around Time

PID	AT	BT
P0	0	5
P1	1	3
P2	2	8
P3	3	6

Solution :

Process Number = N = 4

Gantt Chart :



PID	AT	BT	CT	TAT	WT
P0	0	5	5	5	0
P1	1	3	8	7	4
P2	2	8	16	14	6
P3	3	6	22	19	13

We have gotten CT from Gantt chart.

TAT = CT – AT

WT = TAT – BT

Average Turn Around Time (TAT) = Sum of TAT/N

= (5+7+14+19)/4 = 45/4 = 11.25

Average Waiting Time (WT) = Sum of WT/N

= (0+4+6+13)/4 = 23/4 = 5.57

If there is no Arrival time then Arrival time = 0 for all processes.

One Exercise for You :

Find the average Waiting time and average Turn Around Time.

PID	AT	BT
P0	0	4
P1	1	3
P2	2	1
P3	3	2
P4	4	5