# UPPSALA UNIVERSITY DEPARTMENT OF INFORMATION TECHNOLOGY 

COMPUTER SYSTEMS/OPERATING SYSTEMS
Fall, 2007

## IN-CLASS EXERCISE 8

Consider the following set of processes:

| Process Name | Arrival Time | Processing Time |
| :---: | :---: | :---: |
| A | 0 | 3 |
| B | 1 | 5 |
| C | 3 | 2 |
| D | 9 | 5 |
| E | 12 | 5 |

Fill in the following table show that it shows which process will be executing during each time interval using the indicated scheduling policies.


Fill in the following table with the indicated measurement statistics for each process under the indicated scheduling policy.

|  | Process | A | B | C | D | E |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Arrival Time | 0 | 1 | 3 | 9 | 12 |  |
|  | Service Time ( $T_{s}$ ) | 3 | 5 | 2 | 5 | 5 | Mean |
| FCFS | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| RR q =1 | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| RR q = 4 | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| SPN | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| SRT | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| HRRN | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| Feedback $\mathrm{q}=1$ | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |
| Feedback$\mathrm{q}=2^{\mathrm{i}}$ | Finish Time |  |  |  |  |  |  |
|  | Turnaround Time ( $T_{r}$ ) |  |  |  |  |  |  |
|  | $T_{r} / T_{s}$ |  |  |  |  |  |  |

