Instructions:

- It is an individual assignment.
- Assignment division will be according to the following formula:
  Assignment Number = (k mod 4) + 1; where k = last three digits of your roll number.
- You need to submit the code by 7th Oct 2008 11:59pm.
- Make sure you comment your code properly and proper indentation is maintained.
- Academic honesty policy applies well here, and anyone found guilty of cheating will receive an F grade.

The assignment is to implement scheduling algorithms in osp2 toolkit for threads. Read the osp2 4th chapter on threads. We are giving you the complete thread functionality. The do_dispatch function in thread class needs to be modified according to the scheduling algorithm. You may also need to create your own functions in the thread class.

Currently threads are scheduled using a specific version of FCFS.

Assignment1: Round Robin Scheduling

Take quantum(q)=100;

Define the variable quantum in the thread class so that it can be varied.

Assignment2: Priority Scheduling

Schedule the thread with highest priority first.

Assignment3: Shortest Remaining Time Next

You need to calculate the remaining processing time for the thread and schedule accordingly.

The function getExpectedProcessingTime() returns the total processing time for the thread.

Assignment4: Highest Response Ratio Next

Use the formula given in the book.

The function getExpectedProcessingTime() returns the total processing time for the thread.

The jar file OSP.jar contains the necessary class files for other modules except the thread.

To compile and run your assignment type make gui in the osp2 dir.