19CSE213 OS Periodical Lab Test

CSE-E

Max marks: 25 Duration: 2 Hrs (2 Pm to 4pm)

Rubrics for evaluation

Modeling the Solution: 5 Marks

Application Logic design: 5 Marks

Correct usage of system calls: 10 Marks

Output: 5 Marks

Naming your submission:

Name your file as 19xxxLab 1.pdf, where xxx denote your roll number.

Roll No 19001: would save as 19001Lab_1.pdf.

Please note that late submissions are not possible.

Solutions send as email attachment will not be evaluated.

<u>Instructions</u>

You are requested to create a pdf file with the following contents and upload in the appropriate link.

- 1. Code for all programs
- 2. If multiple programs are required for IPC, source code for all programs need to be submitted.
- 3. The source code must have comments explaining the role of each program
- 4. Screenshot for compilation of all codes
- 5. Output screen shot –for IPC, all terminals involved must be there.

Question:

Consider a system with 2 types of processes. The billing process keeps track of product details such as product-id, name, quantity, and unit price. Billing process starts up by initializing stock and other parameters. Customer process submits the item and quantity to the billing process. Billing process computes the total amount including 18% GST for the items.

The customer processes use message queue to communicate to the billing process.
