CS3330: Lab 10

Due 48 hours after your lab ends

Purpose:

- Becoming familiar with a UML diagramming tool
- Practice designing a Use Case, Activity, and Sequence diagrams
- Learn Object Oriented Design

Directions:

You are to use either the Violet UML or draw by hand the UML diagrams to complete this assignment. Please reference Lab 10 slides or the internet for diagram notation. When completed, you will need to save your UML in png format and create a zip file containing all the images or print the diagrams out separately.

Submission:

`cs_submit CS3330_LAB-<section> LAB10 <pawprint>.cs3330.lab10.zip`
OR
Turn the printed out UML diagrams stapled together in the TAs mailbox in EBW 201.

Part 1: Create a Use Case Diagram

Implement a Use Case for a train conductor that includes **5 uses cases**, and **one actor**.

Part 2: Create an Activity Diagram

Create an order system that includes the following as activities: Send order by the customer, Receipt of the order, Confirm order, and Dispatch order. The system will need to handle incorrect orders, if the order is incorrect then terminate the ordering process. In addition to incorrect orders, the system needs to handle normal orders and special orders. A special order is not a normal order, thus a conditional is needed. If a special order, then that moves to a Confirm order. Lastly, terminate after Dispatch order or not a special order.

Part 3: Create a Sequence Diagram

Model a student enrolling for a class, similar to how MyZou does enrollment. You must have at least 2 objects; one called Student and the other Enroll, at least 4 messages passed between each of them, 2 call and 2 return. Validation is important in sequence diagrams.

Grading: 30 points

No late submissions accepted.
Missing header information on any submissions will be a zero.
If you need help with putting header information on your UML class diagram, email your TA.
No excuses allowed.

Rubric:
10 points: Correctly designed Use Case diagram
10 points: Correctly designed Activity Diagram
10 points: Correctly designed Sequence Diagram

Bonus: Given in Lab