



SCS 1310 - Object Oriented Programming

Tutorial 12

Upload your answers in a Pdf file renamed with your index.

Use the “draw.io” tool to draw the following diagrams.

1. Draw use case diagrams for the following scenario

In order to utilize the LMS, students must be registered with the system. Thereafter, students can enroll with courses up to the maximum of 6 in each year, as they wish. However, prior to the course enrollment each student must complete the online student's survey in the LMS.

2. Draw activity diagrams for the following scenarios

Scenario A:

- The purchasing department handles purchase requests from other departments in the company.
- People in the company who initiate the original purchase request are the "customers" of the purchasing department.
- A case worker within the purchasing department receives that request and monitors it until it is ordered and received.
- Case workers process the requests for purchasing products under \$1,500, write a purchase order, and then send it to the approved vendor.
- Purchase requests over \$1,500 must first be sent out for a bid from the vendor that supplies the Product.
- When the bids return, the case worker selects one bid.
- Then, the case worker writes a purchase order and sends it to the approved vendor.

Scenario B

- An applicant wants to enroll in the university.
- The applicant hands a filled out University Application Form to the registrar.

- The registrar inspects the forms.
- The registrar determines that the forms have been filled out properly.
- The registrar informs students to attend a university overview presentation.
- The registrar helps the student to enroll in seminars
- The registrar asks the student to pay the initial

3. Draw class diagrams for the following scenario

Course management system:

- The registration manager/registrar sets up the curriculum for a semester using a scheduling algorithm.
- One course may have multiple course offerings
- Each course offering has a number, location, and a time
- Students select four primary courses and two alternative courses by submitting a registration form
- Students may use the course management system to add or drop courses for a period of time after registration
- Professors use the system to receive their course offering rosters
- Users of the registration system are assigned passwords which are used for login validation