Business Modeling: Project 2

Assignment

In this assignment, you will start with the Protos solution for Project 1. Your task is to modify the Protos model to capture the elements of the modified cross-organizational business scenario.

- You have already completed the pre-project survey.
- Post-project survey will be emailed after the project completion.
- It is critical that you complete project worklog, a short form, every time you work on the project.
- Surveys and worklog will be graded based on completeness and timeliness. Note that there are no right or wrong answers in the surveys, and the contents of the survey will not in any way affect the grade.

Other than the surveys, there are two deliverables in this assignment.

1. Modify the given Protos model to capture the modified scenario.
2. Modify the given operational model (UML 2.0 sequence diagrams) to capture the modified scenario.

Submit a report with the modified Protos and operational models. You may use a tool such as Visio, or hand draw Protos model and the sequence diagrams. Please ensure that the diagrams are legible.

Grading

This assignment is part of a research study being conducted by the Service Oriented Computing Lab at NCSU. An integral part of the assignment is the completion of pre and post project surveys as well as keeping a record of your progress throughout the assignment.

Pre-project survey	5%
Post-project survey	10%
Project worklog	25%
Deliverable 1	30%
Deliverable 2	30%

Modified Scenario

MedEq, a large company, is in the business of selling medical equipment. MedEq designs the equipment in-house, but it outsources manufacturing to two contract manufacturers: FlexMan and SoleMan. For shipping the equipment to the customer's site, MedEq employs two shippers: FedUp and UpFed. MedRes is a value added reseller of MedEq's medical equipment. In addition to selling the medical equipment, MedRes installs the equipment and provides support service on it.

To purchase the equipment and the support service, a customer submits its requirements to MedRes. MedRes analyzes the requirements, and creates a proposal containing the equipment and service details, and

a quoted price. The customer may accept the proposal or request MedRes for a better price. There can be up to two iterations between MedRes and the customer before they either agree upon the price, or they abort the transaction.

If MedRes and a customer reach an agreement on the quote, the customer may proceed to placing an order for the equipment. The order contains details on the equipment, shipping address, contact information, and payment information. Upon receiving the order, MedRes validates the order. In case the order is found to be valid, MedRes accepts the order. Otherwise, MedRes rejects the order. After accepting a valid order from a customer, MedRes sends an order for the equipment to MedEq.

MedEq has warehouses of its own in which it stocks the equipment. In case the equipment necessary to fulfill an order is in stock, MedEq requests a shipper to ship the equipment to the customer. MedEq pays the shipping fees to the shipper.

If the equipment necessary to fulfill an order is not in stock, MedEq places a stock replenishment order with a contract manufacturer. The contract manufacturer employs a shipper to ship the equipment to MedEq's warehouse. MedEq pays the contract manufacturer for the equipment. Once the equipment is in stock, MedEq fulfills customer's order.

MedRes installs the equipment at the customer site, after the customer receives the equipment. In future, when the equipment breaks down, the customer requests service from MedRes. MedRes provides the support service of repairing the equipment.

Customer pays MedRes for the equipment and the support service after MedRes installs the equipment. MedRes pays MedEq for the equipment after MedEq ships the equipment to the customer.