İzmir University of Economics
2018-2019 Spring
SE311 Project

Document Management System
DEADLINE: 15 May 2019 17:00 PM (No late submissions)

1. You decided to design a Document Management System. A document management system is used to track and store electronic documents. These documents usually belong to a workorder. A workorder is created by the users of the system.
2. A workorder can contain sub workorders. Every document belongs to some workorder. For instance a Purchase work order has two sub workorders: Shipment and Payment. Shipment may have two documents in it: a bill of lading and packaging slip, while Payment may have an invoice document. When time comes you must perform a check that all the documents in the workorder have been signed.
3. These documents can be in various formats. The document may be a word document or a fillable pdf document.
4. Document Management System has a workflow engine built in it. The documents within a workorder flow from one department into another within the organization. For instance when the invoice is sent to accounts-payable department the following steps are followed: Verify if all the fields are completed, Verify if the invoice is signed, Send the document to the department manager for signing and Send a notification to the workorder owner**.**
5. Word and PDF documents are signed and resulting signatures are stored differently.
6. When the document owner gets a notification, he or she can check the status of the document.

Notes:

1. Use at least <u>5 design patterns</u> to solve this problem.
2. <u>Remember you will not be creating a Document management System</u>. You are just modeling it. However, your programs must run and give some output
3. We may have not covered some of the patterns that you will be using in your project. So either you can wait for the lecture or you can proactively study the pattern and use it.
4. The whole design must be a coherent one. Do not just simply copy and paste things from your lecture examples. Adapt the examples.
5. If you encounter any vagueness in the project description, feel free to make any assumption you want provided that you state them very clearly.
6. Please be creative. Choose meaningful names for your methods and classes.
7. You will be graded proportional to the elegance of the solution.

Project Submission Guidelines

You will be providing a report that contains

  a) A detailed account (in writing) of your thought process i.e. what made you choose a particular pattern,
  b) UML diagram of the solution. You must use a software
  c) An explanation in English of what each class does. Explanation is also needed for key methods in the classes.
  d) Java implementation in **hard copy.**

1. Members of the group are all expected to know all aspects of the solution intimately. I may schedule a meeting with a group member and ask questions.
2. I must receive running programs. So include a screen dump of your program.
3. **I will be paying attention to good programming style, i.e. indentation, comments, meaningful variable names etc.**
4. Minimize your use of paper. Try to condense your print out by making **it single spaced.** Print it **double sided** if possible. Please pay attention to this.
5. Send a zipped file DO NOT use jar as it may get flagged as malicious software and be rejected.
6. Format of the submitted file:
   <lastname1-lastname2-lastname3>PROJECT<number>.zip

   (Example: demir-kutay-özdilek-PROJECT1.zip)

7. Do not send project meta files. Your zip file must contain only java files.
      No such file likes Project*2(1).java, PROJETC1.txt, PROJECT.java, main.java* etc.

8. You must send the project as an attachment. If you want to explain your code, do it in the source code as comments. Do not write anything in the body of the e-mail.
9. Write the names of the group members on the first page of the source code listing in the comments.
10. Make the Subject: **SE311 2019 PROJECT<Project-Number> (i.e. SE311 2019 PROJECT1)**
11. Submit only once. Do not send two versions of the Project.
12. Save your project both on your hard disk and in your outbox folder.