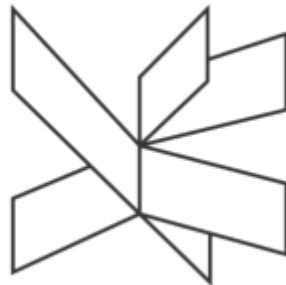


SEP1 Semester Project

Project Description

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Software Technology Engineering
1st Semester
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Background Description

FairytaleLib is a newly established library in Ping Pong Mesa, founded by Fairytale Village University College. It currently stocks a range of books and articles, but later plans to expand with CDs and DVDs. All of these are able to be loaned and reserved, the reservations can be also made by multiple people for the same item. Currently this is managed by two librarians using a spreadsheet.

However, due to the generic nature of spreadsheets the daily workflow of the librarians is severely affected due to their limitations, regarding complex data structures.

Problem Statement

The current solution is too cumbersome to efficiently manage the library inventory as well as each item's reservations and loans.

- How to efficiently manage reservations and loans?
- How to show the relevant information in an easy-to-understand way?
- How to notify the user when relevant?

Definition of Purpose

The purpose is to improve the workflow of the librarians' when they are managing the library's inventory as well as customer reservations and loans.

Delimitation

- We do not include multiple user systems.
- We do not use an existing software system.

Methodology

We will make use of the waterfall model, in which you linearly go down a hierarchy of phases, namely Analysis, Design, Implementation, Validation, Maintenance.

In the analysis phase the project's requirements are recorded as user stories following the SMART principle, that are then ordered after priority. The requirements are grouped into use cases, of which are described using use case descriptions, and action diagrams. A Domain model of the project's data structure is developed using the use cases as a foundation.

The design phase sees the construction of Class diagrams detailing the structure of the system, and sequence diagrams for more complex interactions.

The implementation phase has the documentation developed in the design phase implemented.

The Validation phase handles Testing of the implementation.

The Maintenance phase is the after deployment when the system is to be kept running smooth for the client.

Time schedule

Analysis Phase Done 11th July

Design Phase Done 18th July

Implementation Phase Done 1st August

Report + Documentation Done 11th August

Project deadline 12th August - 1 pm

Risk assessment

Risk	Likelihood	Severity	Product	Risk mitigation	Identifiers	Responsible
Data Loss	1	3	3	Keep local copies	Lose access to cloud storage	Ömer Duman
Loss of hardware	1	5	5	Use library computer	Group member unable to access computer, etc.	Every group member
Communication method fails	1	4	4	Adopt other communication method	Unable to contact other group members	Mikkel Bjørn Hansen

Source

Project Description Support Document-VIA Software Technology Engineering - Software Technology Engineering [2019]

VIA Engineering Guidelines-Project Description Guideline i APPENDIX 1 Project Description VIA ENGINEERING GUIDELINES

Appendices

Group Contract