System Implementation Project: Library Management System

Andie Leonhard

Library Management System

- Product is used to manage users, inventory, and activity for a library. The goal is to make library processes simple while accurately managing the associated data in real time.
- Onsite librarians use an app to process check outs, searching inventory, returning items, and placing holds
- Users can remotely access their checkouts and holds, as well as search the catalogue remotely using a web application
- A relational database allows access to all inventory, user, and activity data when appropriate in real time for users both onsite and on their own devices

Use Cases

- Traditional App (functions occurring onsite, staff operations)
 - Check Out Item
 - Return Item
 - Place Hold
 - Check Item Availability
 - Remove Hold
 - Look Up User
 - Search Inventory
 - View employee information/update password
 - Sign Up new user

Demo will cover searching for a specific item, finding that it is unavailable, adding the user to the waitlist, and showing the user's waitlist status.

Then, the item will be returned and successfully checked out by the next person on the waitlist.

This shows how the system automatically updates the database, including moving users up the waitlist, and that data is immediately available in the app.

Use Cases

- Web Applications (remote functions)
 - Log In/Log Out
 - Sign Up (for an online account user already needs a library card)
 - View User Information (current checkouts/holds, checkout history)
 - Edit User Information (name, contact information, change password)
 - Search Catalogue

These are simple operations that users might want to perform when not onsite at the library, making this a better experience for library users.

Demo will cover user log in and updating their information and password, as well as showing how this is automatically updated in the database.

Then we will show the user's history in order to show that the holds and checkouts just performed in the app are reflected here too.