

Software Requirements Specification

for

Page By Page

Version 1.0 approved

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November 20th, 2019

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Revision History

Name	Date	Reason For Changes	Version

1. Introduction

1.1. Purpose

Our product is PageByPage, a catalog that stores books and their respective information, including title, author, ISBN, author, comments, and ratings. We also provide an option to leave comments and ratings so that users can make informed decisions about their book choices.

1.2. Document Conventions

This document follows MLA Format. Bold-faced text has been used to emphasize section and subsection headings. Highlighting is used to indicate words that are listed in the glossary.

1.3. Intended Audience and Reading Suggestions

This document is to be read by the development team, project manager, testers, and document writers. Our customer may review the document to learn about the project and understand the requirements. The developers and project managers need to become intimately familiar with the SRS. Others involved need to review the document as such:

Overall Description– All team members need to be accustomed to the product specifications.

System features– Testers need an understanding of the system features to develop meaningful test cases and give useful feedback to the developers.

Nonfunctional and Functional Requirements– The developers.

1.4. Product Scope

PageByPage has features that enable users to share their feelings on whatever books they'd like and provides opportunities for new book discovery.

1.5. References

A use case diagram, a sequence diagram, a state chart diagram, and a class diagram have been attached.

2. Overall Description

2.1. Product Perspective

This product is a new, self-contained product.

2.2. Product Functions

This software is comprised of several major functions including: viewing book details and information, reviewing book requests, searching for books by categories, and obtaining/using an account.

2.3. User Classes and Characteristics

Unregistered Users - The Users will use the product in different frequencies depending on the Users. The User will be able to view books, as well as use the search and log-in function.

Logged In Users - Users will use the product in different frequencies depending on the Users. The User will gain access to leave ratings, comments, and requesting a book upload when the user is logged in.

Admins - Admins will frequently use the use the product. Special security privileges will be given to the admin. The admin will be able to access book requests, as well as the functionality that is given to logged in users.

2.4. Operating Environment

There are currently no operating requirements.

2.5. Design and Implementation Constraints

To access the SQLBookShelf, users must be on the Miami University Wifi, or direct internet connection.

Upload Request may not allow users to have descriptions longer than 100 characters.

Upload Request will not allow users to have quotations in Strings.

These are the responsibility of the User to be within these constraints

2.6. User Documentation

Users can find FAQs and answers on how the software functions via the "FAQs" button on the user interface. Users can also refer to the User Documentation file included with the software files.

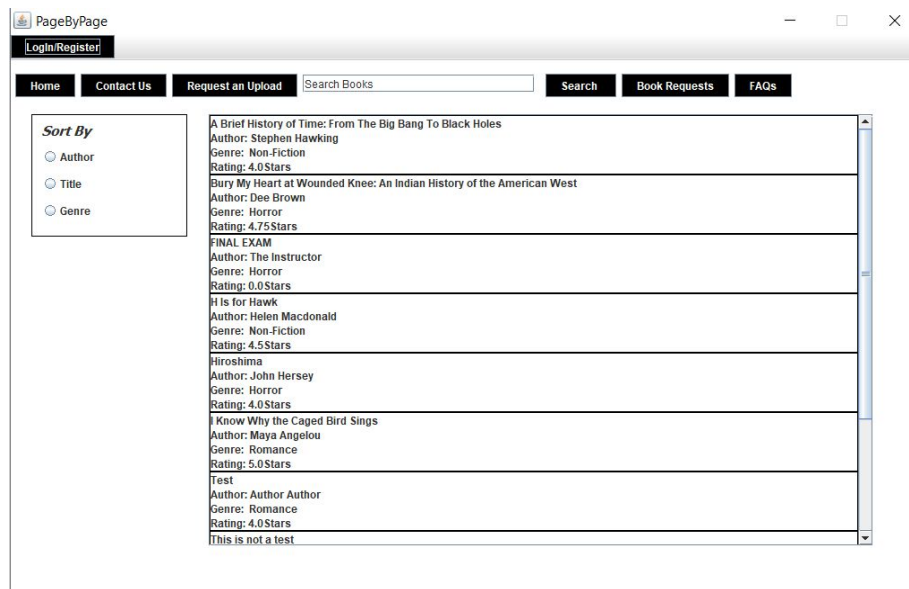
2.7. Assumptions and Dependencies

There are no assumptions or dependencies.

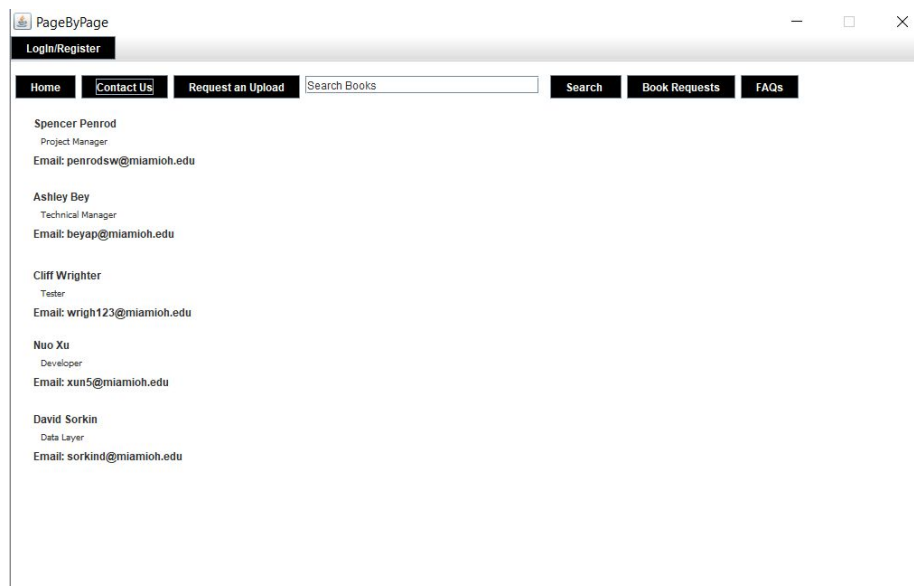
3. External Interface Requirements

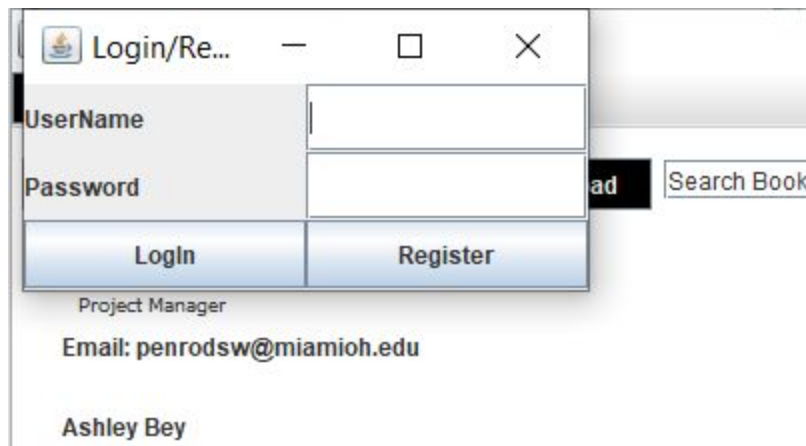
3.1. User Interfaces

Home Page

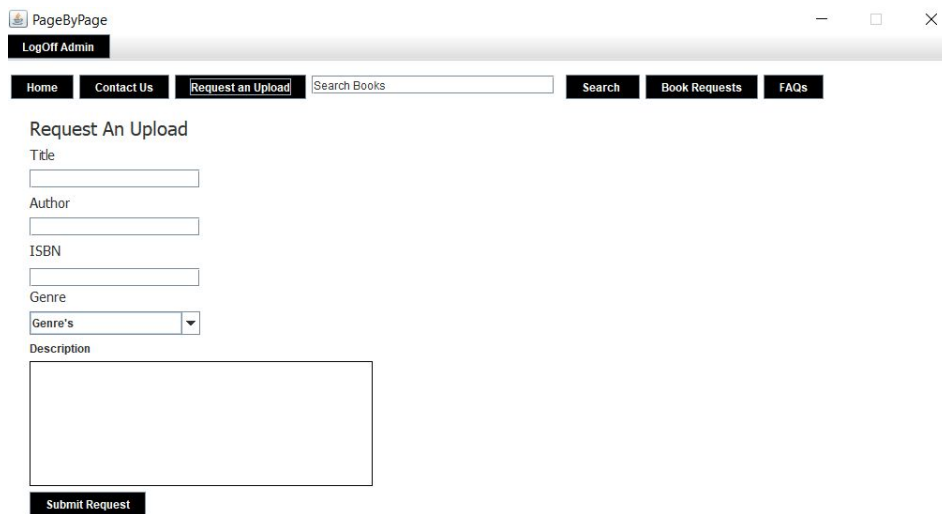


Contact Us Page



Log In Window

A screenshot of a web application window titled "Login/Re...". The window contains a login form with two input fields: "UserName" and "Password". Below these fields are two buttons: "Login" and "Register". To the right of the password field, there is a "Search Book" button. Below the login form, the text "Project Manager" is displayed, followed by the email address "Email: penrodsw@miamioh.edu". At the bottom, the name "Ashley Bey" is shown.

Request an Upload Page

A screenshot of a web application window titled "PageByPage". The window has a navigation bar with buttons: "Home", "Contact Us", "Request an Upload", "Search Books", "Search", "Book Requests", and "FAQs". The "Request an Upload" button is highlighted. Below the navigation bar, the page title "Request An Upload" is displayed. The form contains the following fields: "Title" (text input), "Author" (text input), "ISBN" (text input), "Genre" (dropdown menu with "Genre's" selected), and "Description" (text area). A "Submit Request" button is located at the bottom of the form.

FAQs Page

The screenshot shows a web browser window titled "PageByPage". The navigation bar includes a "LogOff Admin" button and a menu with "Home", "Contact Us", "Request an Upload", a "Search Books" input field, and buttons for "Search", "Book Requests", and "FAQs". The main content area lists several user actions:

- Login**: Users who already have an account may sign in to rate and comment on books.
- Register**: Users may Register an account by typing in their requested username, and password and selecting the "Register" button.
- Leave A Comment (User Must Be Logged In)**: Users may select a book, in which a comments section is displayed. Users may Type a comment into the textbox and select "Submit Comment". The comment is then displayed in the comments section.
- Leave A Rating (User Must Be Logged In)**: Users may select a book, in which a rating is displayed. Users may select a rating from the rating combo box, and click submit to submit a comment.
- Request An Upload (User Must Be Logged In)**: Users can select the Request An Upload Button. All the textfields must be completed for a book to be requested. User then presses "Submit Request" button and the Book is uploaded to be reviewed for approval by an admin.

Book Description Page

The screenshot shows a web browser window titled "PageByPage". The navigation bar is identical to the previous page. The main content area displays the details for the book "A Brief History of Time: From The Big Bang To Black Holes" by Stephen Hawking, with a 4.0 Star rating. Below the description, there is a "Rating" dropdown menu, a "Submit Rating" button, a text input field labeled "Add a Comment", and a "Submit Comment" button.

3.2. Hardware Interfaces

There are no hardware interfaces within this product.

3.3. Software Interfaces

Google Cloud Platform: this product needs an Internet connection to get access to the MySQL 5.7.14 server deployed on the Google Cloud Platform.

3.4. Communications Interfaces

The network communications must be done in the Miami University Area. The user can not communicate with the server unless on a Miami University Network in Oxford, Ohio. It runs on Port 3306 using TCP protocol to send packages in the form of SQL query to the Google Cloud Platform and receiving a data streaming from the server.

4. System Features

4.1. Log In / Register an Account

4.1.1 Description and Priority

*Users who already have an account may sign in to allow rating/comment functionality. Users without an account may register.
This functionality is high priority.*

4.1.2 Stimulus/Response Sequences

*Users may select the "LogIn/Register" button located at the top left of the window. Users who already have an account may type in their information and select "LogIn".
If a user would like to register for an account, they may type in their requested username and password and select "Register".*

4.1.3 Functional Requirements

*If a user already has an account associated with a specific username and attempts to register under the account name, they will be prompted with an error message that the username is taken.
If a user attempts to register under an account name that is already taken, they will be prompted with an error message that the username is taken.
If a user attempts to log in with an incorrect password or username, they will be prompted with an error message saying the information is invalid.*

4.2. View / Leave a Comment

4.2.1. Description and Priority

*Users can select a book to view comments by anonymous users and leave an anonymous comment.
This functionality is low priority.*

4.2.2. Stimulus/Response Sequences

Users may select a book from the catalog. Under the book description, there is a list of anonymous comments for a user to view.

Users may type a comment into the textbox and select the "Submit Comment" button to the right of the text box. The comment will automatically be added to the list of anonymous comments.

4.2.3. Functional Requirements

If a user is not logged in and clicks "Submit Comment", they will be prompted with the LogIn/Register window on the top-left of the screen. Users without an account will need to register and log in before this functionality becomes available.

If a user attempts to submit an empty comment, no comment will be added.

4.3. View / Leave a Rating

4.3.1 Description and Priority

Users can select a book to view ratings by anonymous users and leave an anonymous rating.

This functionality is low priority.

4.3.2 Stimulus/Response Sequences

Users may select a book from the catalog. Within the book description, there is an overall rating out of 5 stars.

Users may leave a rating by selecting a rating from the "Rating" drop-down on the bottom left and clicking the "Submit Rating" button.

4.3.3 Functional Requirements

If a user is not logged in and clicks "Submit Rating", they will be prompted with the "LogIn/Register" window on the top-left of the screen. Users without an account will need to register and log in before this functionality becomes available.

If a user does not select a rating before selecting the "Submit Rating", no rating is submitted and there is no change to the overall book rating.

4.4. View an Admin Page (Book Requests)

4.4.1 Description and Priority

Users with admin access can log in and have access to book requests.

This functionality is high priority.

4.4.2 Stimulus/Response Sequences

Users with admin access may select the "Book Requests" button to view a list of pending book requests.

4.4.3 Functional Requirements

If a user is not logged in, selecting the "Book Requests" button will prompt the user to log in or register via the "LogIn/Register" window.

If a user does not have admin access, the “Book Requests” button will have no functionality and the user may not access the pending book requests list.

4.5. Requesting An Upload

4.5.1 Description and Priority

Users may select the “Request an Upload” button to request a book to be added to the catalog.

This functionality is medium priority.

4.5.2 Stimulus/Response Sequences

Users can select the “Request an Upload” button to request an addition to the catalog with a book of their choice.

Users will be asked to enter details about the book including: Title, Author, ISBN, Genre, and Description. The user can then select the “Submit Request” button to be added to the pending list of book requests.

After requesting an upload, all text fields will be emptied.

4.5.3 Functional Requirements

If a user is not logged in, selecting the “Request an Upload” button will prompt the user to log in or register via the “LogIn/Register” window.

If a user does not complete all search fields in the book request, the empty search fields will display “Invalid entry, enter again”.

4.6. Search / Sort Books

4.5.1 Description and Priority

Users can search for books via the search bar and “Search” button. Users may also sort their search by Author, Title, or Genre.

This functionality is medium priority.

4.5.2 Stimulus/Response Sequences

Users can type in a search keyword into the search bar and select the “Search” button.

Users may sort search results by selecting a sorting option via the “Sort By” option list on the left of the book list.

If there is no keyword entered in the search bar, the book list remains unchanged/sorted.

4.5.3 Functional Requirements

There are no functional requirements.

4.7. View Book Details

4.7.1 Description and Priority

Users can select a book to view more details about the book including comments and a book description.

This functionality is high priority.

4.7.2 Stimulus/Response Sequences

Users can select a book from the home page to view more details.

4.7.3 Functional Requirements

There are no functional requirements.

4.8. Approve / Deny Book Upload Requests

4.8.1 Description and Priority

Users with admin access can view a list of pending book requests for uploading. These requests can be approved or denied.

This functionality is high priority.

4.8.2 Stimulus/Response Sequences

Users with admin access can select the “Book Requests” button on the right of the navigation buttons to view pending book requests.

Admin users may approve or deny an upload via the buttons below each request. Approved books will be added to the catalog and removed from the request list. Denied books will be removed from the pending request list and will not be added to the catalog. An empty list means there is no pending requests.

4.8.3 Functional Requirements

Admins must be logged in to access the book upload requests.

4.9. Contacting the Developers

4.5.1 Description and Priority

Users may view developer names and contact information.

This functionality is low priority.

4.5.2 Stimulus/Response Sequences

Users may select the “Contact Us” button to view developer details.

4.5.3 Functional Requirements

There are no functional requirements.

4.10. FAQs

4.5.1 Description and Priority

Users may view a list of FAQs and answers to common questions about operating this software.

This functionality is low priority.

4.5.2 Stimulus/Response Sequences

Users may select the “FAQs” button to view frequently asked questions and answers.

4.5.3 Functional Requirements

There are no functional requirements.

5. Other Nonfunctional Requirements

5.1. Performance Requirements

There are no performance requirements for individuals when using this software. Timing relationships involve the server and application, but should be negligible due to the communication speed.

5.2. Safety Requirements

There are no safety requirements when using this software.

5.3. Security Requirements

There are no security requirements when using this software.

5.4. Software Quality Attributes

Book details and upload information must be entirely accurate as to avoid misleading users with incorrect information/details about the book.