

# CMPS 350 Web Development - Assignment 3

## Deadline Sunday March 24 @ 11:59 PM

In this assignment, you will create **LibraryLocus** app that allows users to manage their favorite books. You will use the Client JS, Local Storage, and an [external API](#) to build this app. The app should have the following features. To understand more about the functionality of the app, watch this [Video](#).

1. **List Books** : When the app first loads, it should make a request the following [external API](#) to fetch an initial list of books, displaying these books in a grid format. Each book's presentation should include its cover image, title, authors, and a brief description, as illustrated in Figure 1. Additionally, this list of books should be stored in Local Storage to facilitate offline access for the user. On subsequent app launches, the app should first check Local Storage for the presence of the books list. If the list is already stored, the app should use this local copy instead of making another API call, thereby optimizing performance and enhancing user experience by leveraging locally available data.

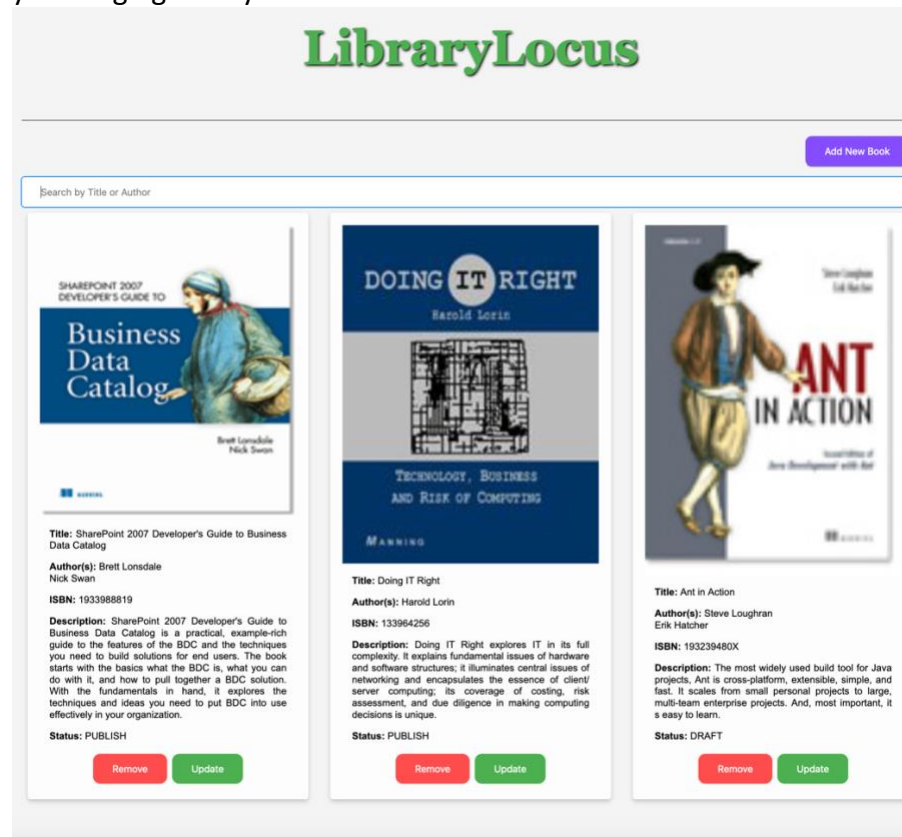
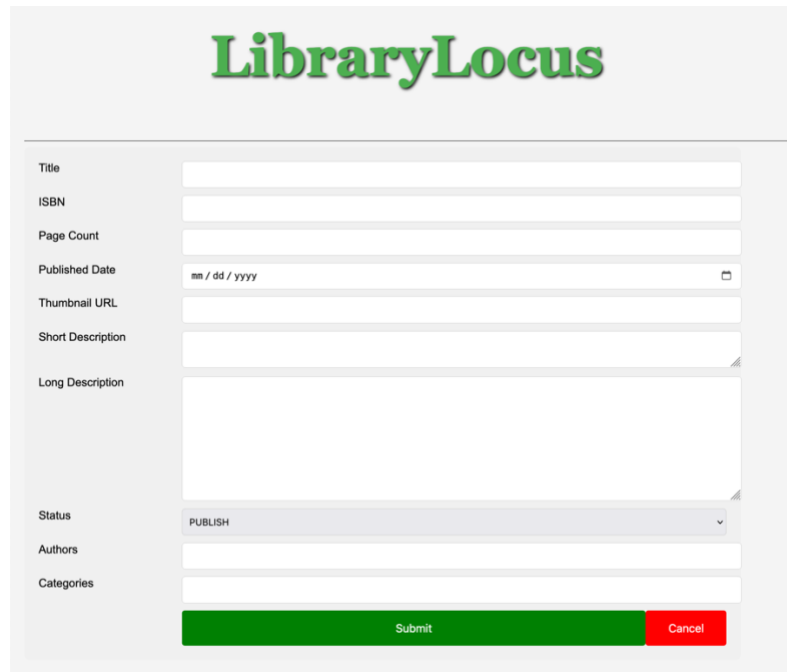


Figure 1 List Books

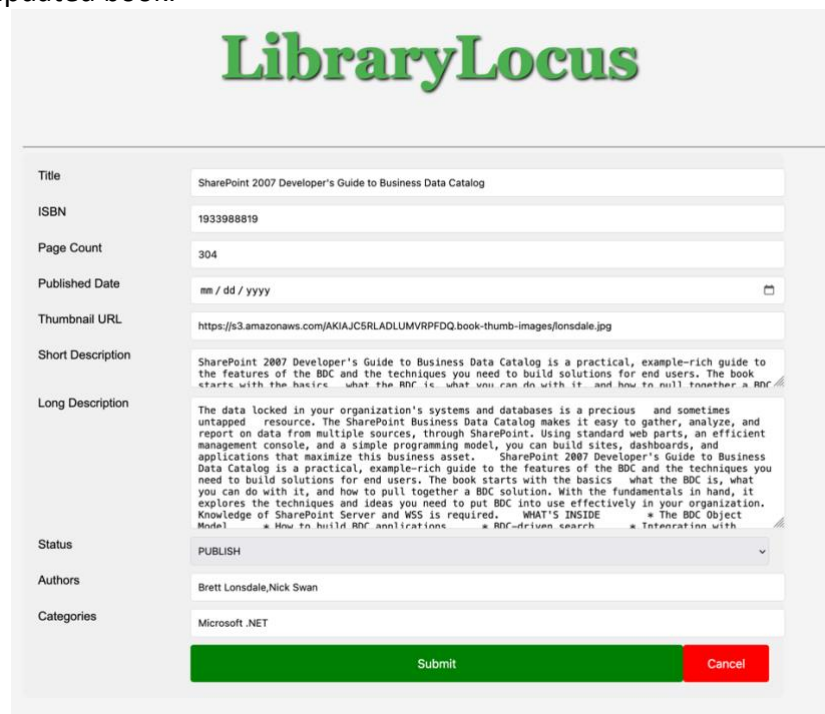
2. **Add Book**: When the user clicks on the add new book button, the app should show the *Add Book Form* that allows the user to add a new book as shown in figure 2. Once they click on the Add button, the book should be saved to the Local Storage, and the app should hide the form from the page and show the user the newly added book.



The image shows a web form titled "LibraryLocus" for adding a new book. The form has a light gray background with a white border. It contains several input fields and a dropdown menu. The fields are labeled on the left: Title, ISBN, Page Count, Published Date, Thumbnail URL, Short Description, Long Description, Status, Authors, and Categories. The Status dropdown is currently set to "PUBLISH". At the bottom right, there are two buttons: a green "Submit" button and a red "Cancel" button.

**Figure 2 Add Book**

- Update Book:** If the user clicks on the update button, the app should open the *Update Book Form* and load the details of the selected book into the form to allow the user to edit the book details (see Figure 3). Once they click on the submit button, the book should be updated in the Local Storage, and the app should show the user the book page where they can see the updated book.



The image shows a web form titled "LibraryLocus" for updating an existing book. The form is pre-filled with data for a book titled "SharePoint 2007 Developer's Guide to Business Data Catalog". The fields are labeled on the left: Title, ISBN, Page Count, Published Date, Thumbnail URL, Short Description, Long Description, Status, Authors, and Categories. The Status dropdown is currently set to "PUBLISH". At the bottom right, there are two buttons: a green "Submit" button and a red "Cancel" button.

**Figure 3 Update Book**

4. **Search and Filter:** Develop a feature that enables users to search the book collection by either title or author. As users enter their search query into the search bar, the system should dynamically filter and display books that match the query in the author's name or book title.

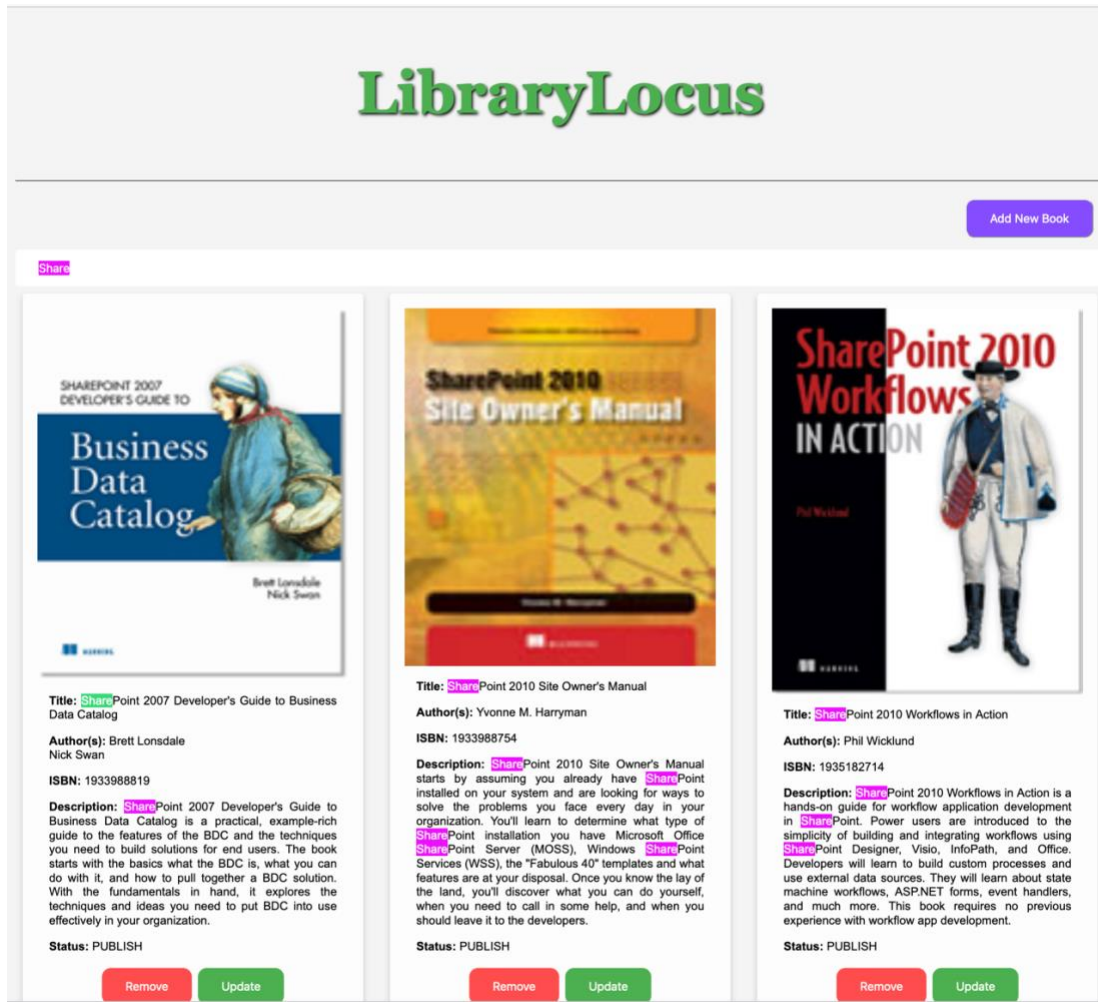


Figure 4 Search and Filter

5. **Delete Book:** If the user clicks on the delete button, you should delete the selected book from the Local Storage and from the books page (i.e., the user should not be able to see the deleted book in the book grid view anymore).

After you complete the Assignment, fill in the **TestingDoc-Grading-Sheet.docx** and save it inside the **assignment3** folder. Push your work to your GitHub repository.