**Project Name: Online Library Management System**

**Overview:**

Build an online library management system. This web-based application will allow users to browse available books, reserve a book, and manage their book reservations. As an admin, one can add, update or delete books and manage users.

**Features:**

1. **User Registration and Login:** Users can register and login to the system. You'll use ASP.NET Identity for user management, role-based authentication, and secure password handling.
2. **Book Catalog:** Users can view available books. This will be your basic CRUD (Create, Read, Update, Delete) application which will use the Entity Framework to interact with the database.
3. **Reserve a Book:** Users can reserve available books. Once a book is reserved, it should be marked as such and not be available for other users to reserve.
4. **My Reservations:** Users can view their current book reservations and history.
5. **Admin Panel:** Admins can add, update, or delete books from the catalog. They can also manage users (e.g. ban a user, change user role).
6. **Search Functionality:** Users should be able to search for books by title, author, or genre.
7. **API:** Build a RESTful API that exposes the library catalog, reservation, and user management functionalities.

**Technology:**

* **Frontend:** Use Blazor for building the UI of the web application. This will let you write C# code instead of JavaScript for building the UI.
* **Backend:** .NET 6 Core for server-side logic.
* **Database:** Use any SQL based DB with Entity Framework for ORM.
* **API:** ASP.NET Core Web API for building the RESTful APIs.