**Project Design Phase-II**

**Solution Requirements (Functional & Non-functional)**

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| --- | --- |
| Date | 18 March 2025 |
| Team ID | SWTID1743689974 |
| Project Name | Book Store |
| Maximum Marks | 4 Marks |

**Functional Requirements:**

Following are the functional requirements of the proposed solution.

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| --- | --- | --- |
| **FR No.** | **Functional Requirement (Epic)** | **Sub Requirement (Story / Sub-Task)** |
| FR-1 | User Registration | Registration through Form Registration through Gmail Role selection (Admin, Seller, Buyer) |
| FR-2 | User Confirmation | Confirmation via Email  Confirmation via OTP |
| FR-3 | |  | | --- | | Role-Based Dashboard Access | | Admin: Manage Users, Books Seller: Upload & Track Books Buyer: Browse, Wishlist, Orders |
| FR-4 | Book Discovery & Browsing | Genre-based sorting Top Seller Page Search by title/author |
| FR-5 | Wishlist & Cart Management | Add to Wishlist Add to Cart Remove from Wishlist/Cart |
| FR-6 | Personalized Experience | Recommended Books Section News Section Updates Top Trending Books |

**Non-functional Requirements:**

Following are the non-functional requirements of the proposed solution.

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| --- | --- | --- |
| **FR No.** | **Non-Functional Requirement** | **Description** |
| NFR-1 | **Usability** | Intuitive UI with clear role-based navigation and mobile responsiveness |
| NFR-2 | **Security** | Firebase Auth for secure login, HTTPS communication, JWT protection |
| NFR-3 | **Reliability** | MongoDB Atlas ensures data durability and availability |
| NFR-4 | **Performance** | Fast API response via Node.js and efficient queries with Mongoose |
| NFR-5 | **Availability** | |  | | --- | |  |  |  | | --- | | Hosted on scalable cloud (e.g., Render, Vercel, or Firebase Hosting) | |
| NFR-6 | **Scalability** | Easily extendable with microservices or more collections for large-scale users and books |