SEHRS Functionalities:

### ****Revised Plan****

| **Module** | **Functionalities** | **Description** |
| --- | --- | --- |
| **Home (User Control)** | Dashboard Overview | Display key statistics (e.g., total patients, available medicines, recent activity logs). |
|  | Notifications Panel | Alerts for low inventory, expired drugs, and urgent patient cases. |
|  | Settings Section | Configure user accounts, access control, backup, and restore options. |
|  | Help & Support | Quick guide and contact information for technical support. |
| **Patient Management** | Add New Patient | Register a new patient with personal details. |
|  | View Patients | Display all patient records with search and filter options  **Patient History function** can be viewed here. |
|  | Edit Patient Info | Modify existing patient details. Handle **Delete Patient** here. |
|  |  |  |
| **Inventory Management** | Add New Drug | Register new medicines and supplies. |
|  | View Inventory | Show all available medicines with stock count. |
|  | Edit Inventory | Update medicine details, expiration dates, and prices. Handle **Delete Drug** here. |
|  | Stock Alerts | Notify when a drug is running low or expired (displayed on the **Home** dashboard). |
| **Analytics & Reports** | Patient Statistics | Show total patients per disease category. |
|  |  |  |
|  | Filter Analytics | Replace "Filter by Diagnosis" and "Age & Gender Analysis" with a single **Filter Analytics** submenu. Allow filtering by diagnosis, **demographics, and time period (health condition trends).** |
|  | Inventory Trend | Check drug consumption trends. |
|  | Export Reports | Generate reports in PDF or Excel for documentation. |
| **Additional Features** | User Role & Access Control | Restrict access based on user type (e.g., admin, doctor, staff). |
|  | Appointment Scheduling | Allow patients to book consultations. |
|  | Billing & Payments | Track medical expenses for patients. |
|  | Backup & Restore Data | Prevent data loss with automated backups. |

### ****Next Steps & Implementation Plan****

| **Feature** | **Implementation Method** |
| --- | --- |
| **Filter Analytics** | Use **LiveCharts2** for visual representation of filtered data (e.g., diagnosis, demographics). |
| **Export Reports** | Use **FlexiSharp** for PDF and **EPPlus** for Excel file generation. |
| **Database Integration** | Ensure MS Access is connected for seamless CRUD operations. |
| **Modern UI** | Apply a modernized WinForms design using **ReaLTaiizor** or similar libraries. |

### ****Implementation Tips****

| **Feature** | **Implementation Method** |
| --- | --- |
| **Home Dashboard** | Use a **DataGridView** or **LiveCharts2** to display key statistics and stock alerts. |
| **Edit Patient (with Delete Functionality)** | Add a **Delete** button in the **Edit Patient** section. Handle deletion logic here. |
| **Filter Analytics** | Use a **ComboBox** to let users select filters (e.g., diagnosis, demographics). |
| **Export Reports** | Use **FlexiSharp** for PDF and **EPPlus** for Excel file generation. |
| **Database Integration** | Ensure MS Access is connected for seamless CRUD operations. |
| **Modern UI** | Apply a modernized WinForms design using **ReaLTaiizor** or similar libraries. |
| **User Role & Access Control** | Restrict access based on user type (e.g., admin, doctor, staff). |
| **Appointment Scheduling** | Allow patients to book consultations. |
| **Billing & Payments** | Track medical expenses for patients. |
| **Backup & Restore Data** | Prevent data loss with automated backups. |