IT-314 - Project Group-24

Task 2 - User Stories

Sr. No	Front
1.	As a new user, I want to sign up for an account so that I can access the system and use its features.
	Priority: Must have

Back
1. The user should be able to provide name, email, and password to sign up. 2. A confirmation email should be sent to the user after successful registration. 3. After confirmation, the user should be directed to the login page.

Sr. No	Front
2.	As a registered user, I want to log in using my login credentials so that I can access my account and features like forecasting and inventory.
	Priority: Must have

	Back
	1. The user should be able to log in using valid credentials. 2. The system should display an error message for incorrect login credentials. 3. Upon successful login, the user should be redirected to their dashboard.

Sr. No	**Front**
3.	As a registered user, I want to be able to reset my password if I forget it so that I can continue using the system.
	Priority: Must have

	Back
	1. The user should be able to request a password reset link. 2. The system should send a reset link to the user's registered email address. 3. The user should be able to create a new password using the reset link.

Sr. No	Front
4.	As a registered user, I want to see a dashboard with key metrics and information about my account, so that I can quickly get an overview of my usage.
	Priority: Could Have
	Back
	1. The dashboard should display basic information like the user's name, account status, and recent activity. 2. The dashboard should provide a summary of key metrics relevant to the user's role (e.g., number of forecasts, recent feedback).

Sr. No	Front
5.	As a user, I want to update my profile details (name, email, password, and other details) so that my personal and business information stays up to date.
	Priority: Should have
	Back
	1. The user should be able to edit personal details (name, email, password etc). 2. The system should validate changes before saving.

	3. A success message should be displayed after saving the updated details. 4. The user should be able to cancel the changes before saving.

Sr. No	Front
6.	As a user, I want to upload my sales and inventory data so that the system can analyze it and provide accurate forecasts for my business.
	Priority: Must have

Back
1. The user can upload sales data in CSV or Excel format. 2. The system validates the uploaded file for correct format and data completeness (e.g., no missing or incorrect data fields). 3. The user receives feedback if the file is invalid. 4. Upon successful upload, the system stores the sales and inventory data. 5. The user can view a summary of the uploaded data (e.g., total sales, stock levels).

Sr. No	Front
7.	As a user, I want to add, edit and delete products in my inventory so that I can manage the items for which sales are being forecasted.
	Priority: Must Have
	Back
	1. The user should be able to add new products to the inventory. 2. The user should be able to edit product details such as name and category. 3. The user should be able to delete products. 4. The system should display confirmation before deleting a product.

Sr. No	Front
8.	As a registered user, I want to forecast my sales based on past data, so that I can plan my business strategy accordingly.
	Priority: Must Have
	Back
	1. The user can upload sales data for forecasting. 2. The system processes and displays future sales predictions. 3. The user can choose short-term or long-term forecasts.

Sr. No	Front
9.	As a registered user, I want to be able to select parameters (e.g., date range, product type) for my sales forecast, so that I can focus on specific data.
	Priority: Should Have
	Back
	1. The user can select different parameters for the forecast. 2. The system filters data based on the selected parameters. 3. Forecast results are adjusted based on the filtered data.

Sr. No	Front
10.	As a registered user, I want to view my past sales forecasts, so that I can track and compare them with actual sales data.
	Priority: Must Have
	Back
	1. The system displays all past forecasts with relevant details (e.g., date, prediction range). 2. The user can sort and filter historical forecasts by date or other criteria. 3. The user can download forecast history for reference.

Sr. No	Front
11.	As a registered user, I want to compare my forecast history with actual sales data, so that I can evaluate the accuracy of the forecast.
	Priority: Should Have
	Back
	1. The system should take the actual sales data from the inventory. 2. The forecast and actual data are displayed side-by-side. 3. Any discrepancies between forecast and actual data are highlighted. 4. The system should give the accuracy of the forecast in percentage.

Sr. No	Front
12.	As a registered user, I want to provide feedback on the accuracy and usefulness of the forecast, so that I can help improve the system.
	Priority: Must Have
	Back
	1. The system prompts users for feedback after a forecast is generated. 2. Users can rate the forecast on a scale of 1-5. 3. Users can leave optional comments on the forecast. 4. Users can provide feedback on past forecasts as well.

Sr. No	Front
13.	As a user, I want to be able to input my budget, So that I can receive an optimal inventory recommendation to maximize profits.
	Priority: Must Have

Back
1. The system allows the user to input a budget in a predefined currency. 2. After submitting the budget, the system processes historical data, seasonal trends, and other external factors to recommend an optimal inventory. 3. The strategy includes a breakdown of items to stock, quantities, and an estimate of expected profits. 4. The user receives clear and actionable insights, including a dashboard or report, detailing the recommended approach.

Sr. No	Front
14.	As a user, I want to view a dashboard displaying sales forecasts for various products to quickly understand expected sales trends and make informed decisions.
	Priority: Should Have

Back
1. The dashboard should display sales forecasts for different products for different periods (weekly, monthly, quarterly, yearly).

	2. The forecasts should be presented in both numerical and graphical formats (e.g., line charts, bar charts). 3. The dashboard should update in real time as new data becomes available. 4. The user should be able to export the forecast data in CSV and PDF formats.

Sr. No	Front
15.	As a user, I want to be able to input my desired profit amount, So that I can receive the estimated budget and inventory required to achieve that profit.
	Priority: Must Have

Back
1. The system allows the user to input a target profit amount. 2. After submission, the system analyzes historical data, seasonal trends, and other relevant factors to estimate the required budget and inventory. 3. The system provides a detailed breakdown of the inventory (items and quantities) necessary to achieve the target profit.

Sr. No	Front
16.	As a user, I want to be able to enter my marketing budget, So that the system can recommend how much to spend in different regions and which products to advertise.
	Priority: Must Have
	Back
	1. The system allows the user to input a marketing budget. 2. After submission, the system analyzes historical data, regional trends, and product performance to allocate the budget across regions and products. 3. The user receives a detailed breakdown of how much money to spend in each region and which products to prioritize for advertising.

Sr. No	Front
17.	As a user, I want to view the latest retail trends based on product categories (e.g., clothing, electronics), so that I can analyze which category is performing well and plan my inventory accordingly.
	Priority: Could Have
	Back
	1. Display categories with the most recent retail sales trends. 2. Provide filtering options to narrow down the trends by category. 3. Ensure the data is presented in an easy-to-read format, such as charts or graphs.

Sr. No	Front
18.	As a user, I want to view seasonal retail trends, so that I can prepare for high-demand periods based on historical data.
	Priority: Could Have

Back
1. Display the trends for each season (e.g., Winter, Spring) with predictions based on the data. 2. Provide a time-range filter so users can look at trends for specific years. 3. Ensure the user interface is responsive and presents the data in a visually engaging way.

Sr. No	Front
19.	As a user, I want to view retail trends by geographic regions (e.g., city, state, country) to understand the demand in different areas.
	Priority: Could Have

Back
1. Allow users to select and filter data by region. 2. Present the data in both map format and list format. 3. Ensure users can easily switch between regions.

Sr. No	Front
20.	As an admin(UX designer), I want to update the site's layout and design elements based on user feedback and analytics, improving the overall user experience.
	Priority: Should Have

Back
1. The site layout and design elements are updated according to user feedback and analytics. 2. Changes lead to improved user satisfaction and engagement metrics. 3. The update process is smooth, with minimal disruption to site functionality. 4. The new design is tested across different devices and browsers for compatibility.

Sr. No	Front
21.	As a data analyst(admin), I want to monitor the accuracy of sales forecasts over time, so that I can assess the effectiveness of the forecasting model and identify any need for adjustments.
	Priority: Must Have

	Back
	1. The system should display a side-by-side comparison of forecasted sales and actual sales for a chosen time period (e.g., daily, weekly, monthly, quarterly). 2. The system should calculate and display forecast accuracy metrics such as Mean Absolute Percentage Error to quantify the performance of the forecast. 3. Provide a visual representation (e.g., line charts, bar graphs) that clearly depicts the difference between forecasted and actual sales. 4. Ensure that historical forecast and actual sales data are stored and accessible for comparison over extended time periods.

Sr. No	**Front**
22.	As an admin, I want to see the feedback of the users so that I can improve the system accordingly.
	Priority: Must have

Back
1. The system should have a dedicated section in the admin panel where all user feedback is collected and displayed. 2. Feedback should be categorized by type (e.g., suggestions, complaints, feature requests, bugs) to help admins filter and prioritize. 3. Admin should be able to filter feedback by date range, feedback type, or user, and search through feedback using keywords.

	4. Admins should be able to assign statuses to feedback such as "Reviewed," "In Progress," or "Resolved" to track the feedback handling process. 5. Provide summary statistics (e.g., total feedback received, breakdown by category, most frequent issues) to give admins insights into user concerns. 6. Admins should be able to respond to users directly through the system, either to thank them for feedback or to inform them about actions taken

Sr. No	**Front**
23.	As an admin, I want to view feedback provided by users on forecasts, so that I can improve the prediction algorithm.
	Priority:
	Back
	1. Admin can view user feedback on a dashboard. 2. Feedback is categorized by forecast type (short-term, long-term). 3. The system generates reports based on user feedback.

Sr. No	**Front**
24.	As a machine learning engineer (admin), I want the data fed to the model to be updated regularly, so that the model can predict the outputs correctly.
	Priority: Must Have

	Back
	1. The system must automatically ingest new data at predefined intervals (e.g., daily, weekly, monthly) from data sources into the model's training pipeline. 2. If required, the system should allow for real-time or near-real-time data integration, updating the model as soon as new data is available. 3. Ensure that all data sources are validated for accuracy and consistency before they are fed into the model. Any anomalies should trigger alerts or be flagged for review. 4. Implement a system that continuously monitors the quality of the incoming data and notifies the machine learning engineer if data quality falls below acceptable standards (e.g., missing values, corrupted data). 5. Machine learning engineers should receive notifications when data updates are completed successfully or if there are any errors or delays during data ingestion.

Sr. No	Front
25.	As a machine learning engineer (admin), I want to implement version control for the datasets used in the model, so that I can track changes and roll back to previous versions if needed.
	Priority: Should Have
	Back
	1. Each dataset is assigned a unique version identifier, including metadata such as timestamp and author. 2. Engineers can revert to any previous dataset version from the

	version history. 3. Only authorized users can modify or roll back dataset versions. 4. Engineers can view and access all previous versions of the dataset through a user interface.