Initial Waterfall Plan for Grocery Guru

# Phase1: Requirements Analysis and Planning

1. Analyze the product backlog and requirements.
2. Define project scope, objectives, and deliverables.

# Phase 2: System and Software Design

1. Setup Models if needed and activate

* Design and define the models required for the application.
* Activate and migrate models in Django.

1. Define Pages, Routes and Endpoints

# Phase 3: Implementation

1. Create Django Restful API

* Set up the Django framework.
* Implement the necessary API endpoints to handle CRUD operations.
* Configure URLs and routes in the Django backend.

1. Create React Feature and Webpages

* Create a Base Home Page with Title, Divs, and other general elements
* Develop the basic home page structure with necessary HTML elements.
* Setup selection criteria at the top of the Home page
* Implement selection criteria components (e.g., dropdowns, checkboxes) on the home page.
* Setup Content for input at the bottom of the page (to include single input and list upload)
* Create input forms for single item input and list uploads at the bottom of the home page.
* Create a List Page with Title, Divs, and elements, with applied logic to display each store
* Develop a list page to display the stores and grocery items dynamically.
* Implement a popup window for filtering the displayed grocery items.

1. Implement Data Collection

* Develop a web scraper to fetch data from a selected national store.
* Integrate an external API to fetch grocery data from a selected national store.

# Phase 4: Integration and Testing

1. Connect React to Django Backend

* Set up the React front end and connect it to the Django backend using the API endpoints.

1. Setup URLs and Routes on React

* Define and configure the React routes to handle navigation within the application.

1. Integration Testing

* Test the entire application to ensure all components work together seamlessly.
* Debug and fix any issues found during testing.

# Phase 5: Deployment and Maintenance

1. Deploy the Application

* Deploy the Django and React applications to a production environment.

1. Monitor and Maintain

* Continuously monitor the application for any issues.
* Perform regular maintenance and updates as needed.