Project Title

TO SUPPLY LEFTOVER FOOD TO POOR

1. Project Overview

This project, **Food Connect**, is designed to streamline and enhance the process of coordinating food deliveries to those in need. By leveraging Salesforce, the project establishes a robust platform to manage venues, drop-off points, volunteers, and tasks efficiently. The primary goal is to ensure seamless execution of food delivery operations, fostering community engagement and support while delivering happiness to the beneficiaries.

2. Objectives

Business Goals:

- Optimize operational workflows for food delivery.
- Enhance coordination between venues, drop-off points, volunteers, and tasks.
- Provide clear visibility into execution details via reports and dashboards.

Specific Outcomes:

- Streamlined data management for venues, volunteers, tasks, and drop-off points.
- Real-time monitoring of execution through dashboards and reports.
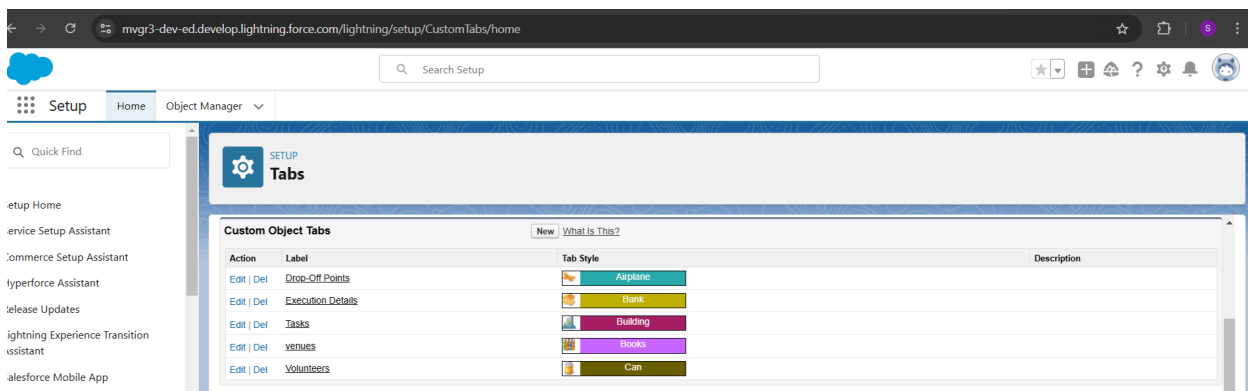- Enhanced collaboration through sharing rules and public groups.

3. Salesforce Key Features and Concepts Utilized

- **Objects and Fields**:
    - Custom Objects: Venue, Drop-Off Point, Task, Volunteer, Execution Details.
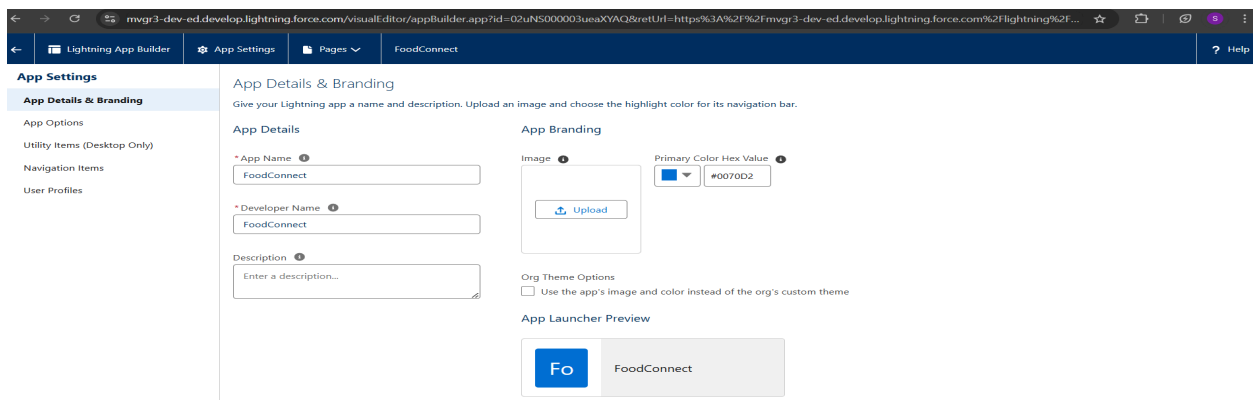   - Fields: Lookup and Master-Detail Relationships between objects.
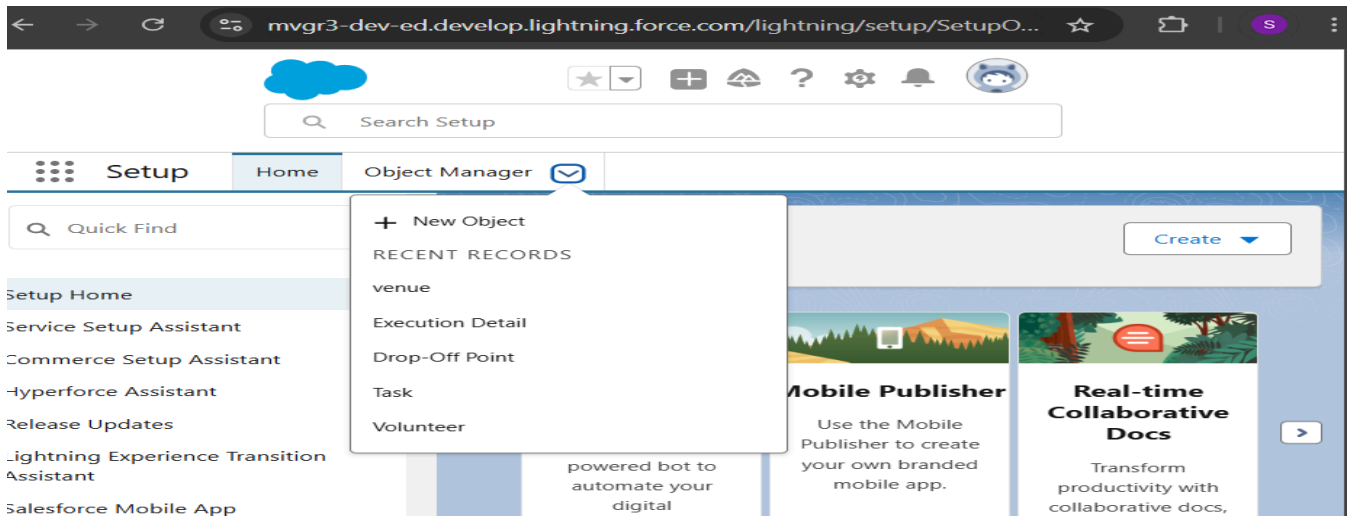
custom objects in object manager

- **Tabs and App Creation**:
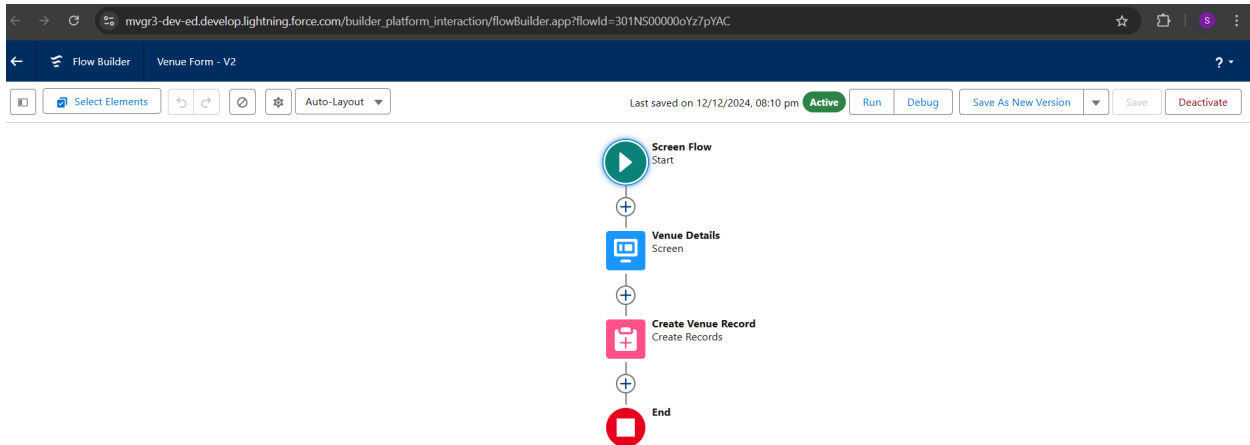 - Custom Tabs for each object.

  - Lightning App: FoodConnect with Standard Navigation and relevant tabs.

- **Flows**:
  - Screen Flow for creating Venue records with user input validation.

- **Triggers**:
  - Trigger for Drop-Off Point to auto-calculate and update distance.


```
1   trigger DropOffTrigger on Drop_Off_point__c (before insert) {
2
3       for(Drop_Off_point__c Drop : Trigger.new){
4
5           Drop.Distance__c = Drop.distance_calculation__c;
6
7       }
8
9   }
10
```
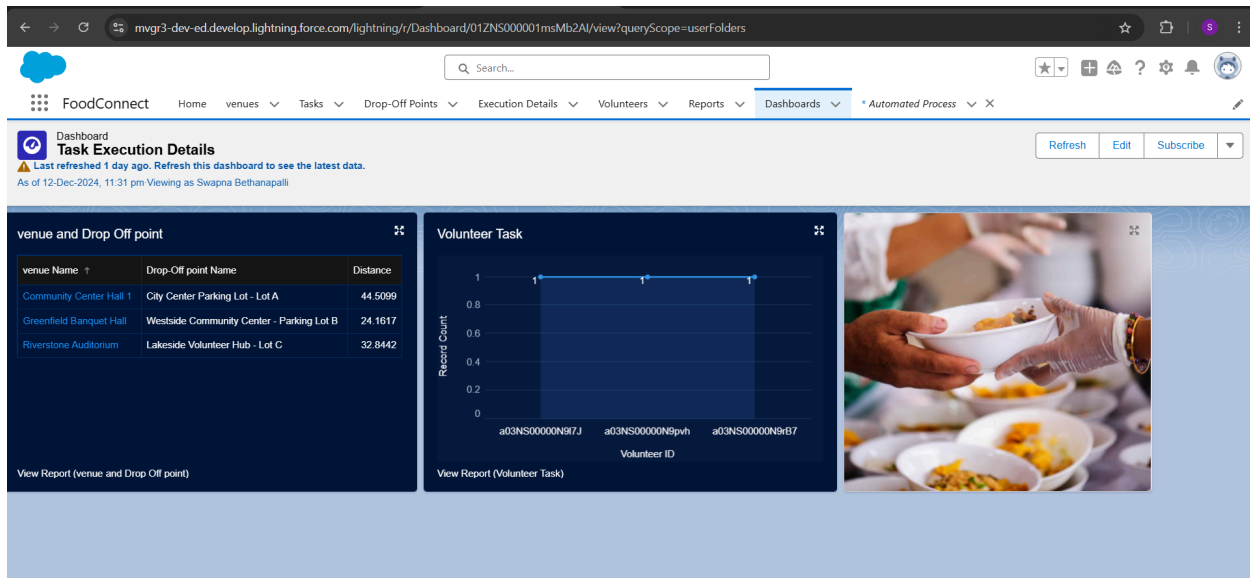
- **Reports and Dashboards**:
  - Custom report types for data insights.

■ Dashboards with reports on venues, drop-off points, and volunteer tasks.

● **Sharing Rules**:
■ Criteria-based sharing rules for drop-off points.

● **Public Groups**:
■ Groups to manage user permissions and access.
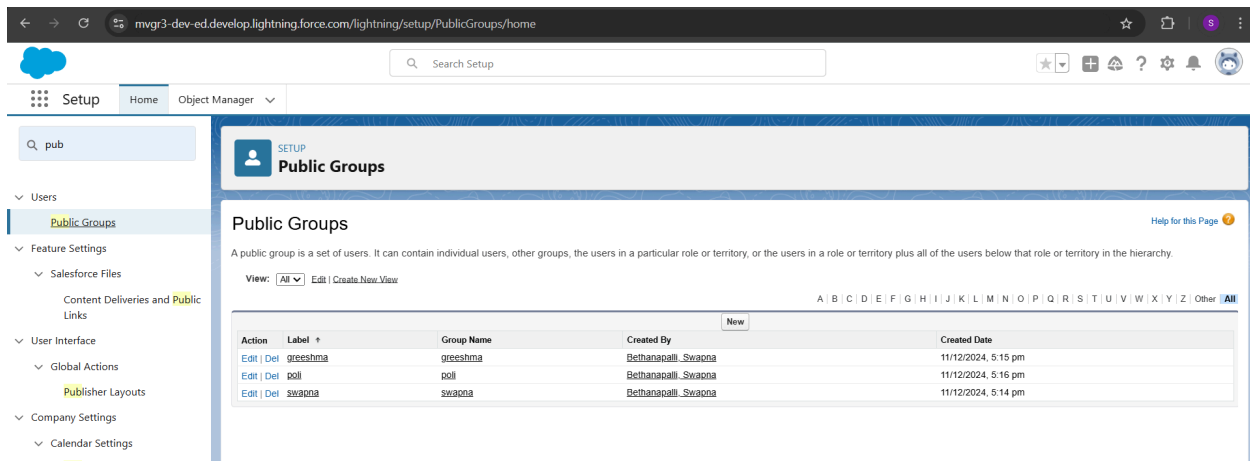
- **Home Page**:
  - Designed to display a consolidated view of operations, including quick access to reports, key metrics, and execution updates for efficient monitoring and decision-making.
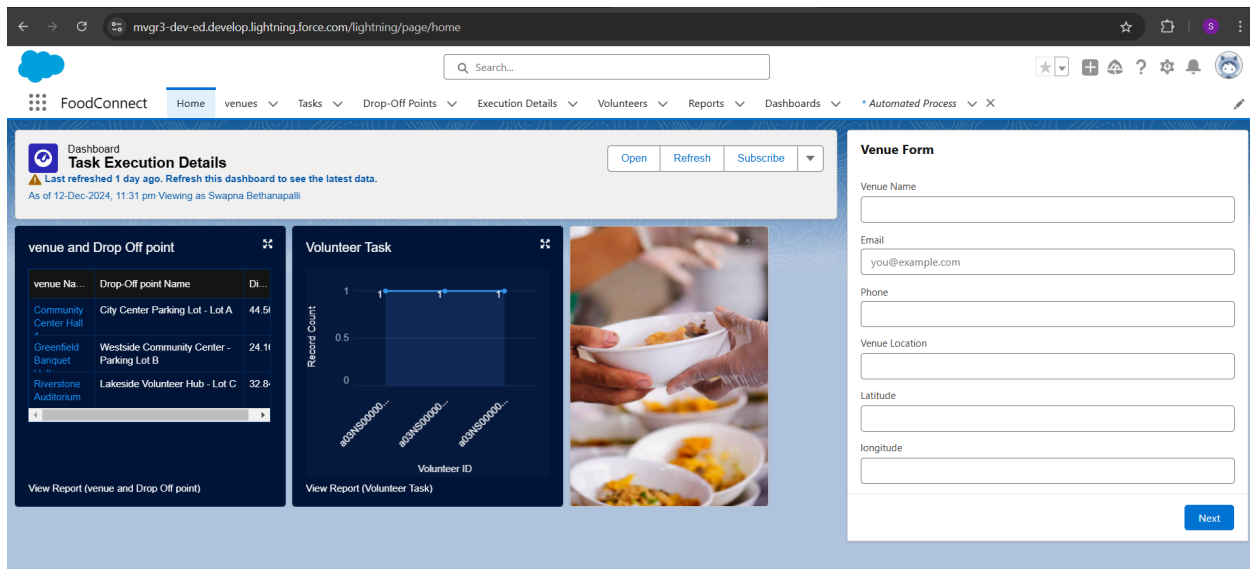
4. Detailed Steps to Solution Design

Data Models:

1. **Venue Object**:
   - Fields: Name, Contact Email, Contact Phone, Location, Latitude, Longitude.
   - Lookup Relationship with Drop-Off Point.

2. **Drop-Off Point Object**:
   - Fields: Name, Distance, Distance Calculation.
   - Lookup Relationship with Venue.
3. **Task Object**:
   - Fields: Sponsored By (Venue), Drop-Off Point.
   - Lookup Relationships with Venue and Drop-Off Point.
4. **Volunteer Object**:
   - Fields: Name, Assigned Drop-Off Point.
   - Master-Detail Relationship with Drop-Off Point.
5. **Execution Details Object**:
   - Fields: Volunteer, Task.
   - Master-Detail Relationships with Volunteer and Task.

User Interface:

- **Tabs**:
  - Created for all custom objects with default profiles.

- **Lightning App**:
  - FoodConnect App with navigation items for objects, reports, and dashboards.

Business Logic:

- **Flows**:
  - Screen Flow for Venue creation with components for Name, Email, Phone, Location, Latitude, and Longitude.
- **Triggers**:
  - DropOffTrigger to auto-calculate distance values during record creation.

5. Testing and Validation

Unit Testing:

- Apex Trigger for Drop-Off Point with test cases ensuring:
  - Correct calculation of distance.
  - Proper insertion of records.

User Interface Testing:

- Validation of Screen Flows for Venue creation.
- Verification of record display in Lightning App.
- Cross-checking sharing rules for accurate data visibility.

6. Key Scenarios Addressed by Salesforce in the Implementation Project

- **Volunteer Coordination**:
    - Assigning volunteers to specific drop-off points and tasks.
- **Task Management**:
    - Monitoring tasks associated with venues and drop-off points.
- **Execution Insights**:
    - Dashboards summarizing the status of volunteers, tasks, and drop-off points.
- **Data Security**:
    - Sharing rules for restricted access based on criteria like distance.

- **User Collaboration**:
    - Public groups for managing access and permissions efficiently.

7. Conclusion

Summary of Achievements:

The **Food Connect** project successfully leverages Salesforce to enhance operational efficiency in coordinating food delivery. With custom objects, advanced relationships, automated flows, and insightful dashboards, this implementation ensures:
- Seamless volunteer and task management.
- Real-time data visibility and reporting.
- Secure and efficient collaboration among users.

Through these efforts, **Food Connect** has laid a foundation for delivering happiness and fostering community support effectively.