DATA FLOW DIAGRAM & USER STORIES

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Team ID	LTVIP2025TMID31579
Project Name	To Supply Leftover Food to Poor
Maximum Marks	

What is a Data Flow Diagram (DFD)?

A Data Flow Diagram shows how data moves throughout the system—from donors submitting leftover food, to volunteers collecting it, to NGOs distributing it to those in need.

PROCESS FLOW

Process 1 – Food Donation Submission

- Input: Food Donation Form (Donor)
- Flow:
 - → FoodItem record created
 - → Validate donation info
 - → Notify nearby volunteer for pickup
 - → Update status to "Pending Pickup"

Process 2 - Volunteer Assignment

- Input: Available Volunteer
- Flow:
 - → Match volunteer to nearby donation
 - → Create DeliveryRecord
 - → Notify volunteer of pickup time and location

Process 3 - Food Pickup & Delivery

- Input: Volunteer logs pickup
- Flow:
 - → Update DeliveryRecord: Pickup confirmed
 - → Volunteer delivers food to NGO
 - → Delivery marked as "Completed"

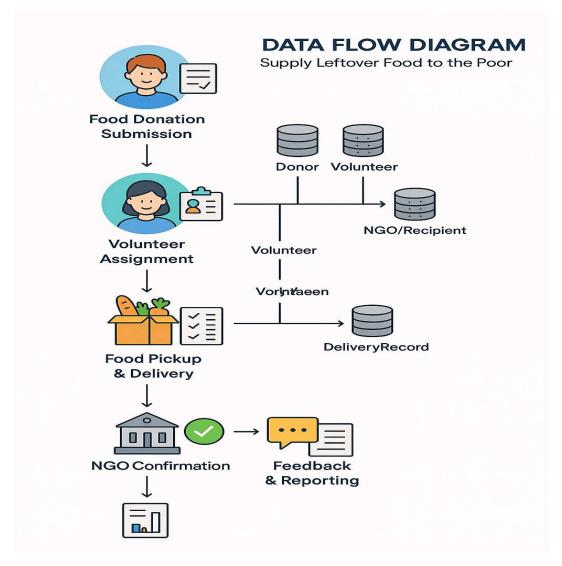
Process 4 – NGO Confirmation

Input: Food received at NGO center

- Flow:
 - → NGO confirms receipt
 - → FoodItem status = Delivered
 - → Generate impact metric (meals served)

Process 5 - Feedback & Reporting

- Input: Optional feedback from volunteers/NGOs
- Flow:
 - → Create Feedback record
 - → Admin dashboard updated
 - → Monthly impact report generated



Data Stores:

- Donor
- FoodItem

- Volunteer
- NGO/Recipient
- DeliveryRecord
- Feedback

USER STORIES

Donor-Facing Stories:

- As a donor, I want to submit leftover food easily via mobile/web, so I can reduce food waste.

 Acceptance Criteria: Submission form saves FoodItem and confirms receipt.
- As a donor, I want to receive confirmation once food is delivered.
 Acceptance Criteria: Notification sent when delivery status is marked "Completed".

Volunteer-Facing Stories:

- **As a volunteer**, I want to get alerts about nearby pickups, so I can help when available. **Acceptance Criteria:** Volunteer receives SMS/app notification with food details.
- **As a volunteer**, I want to log pickup and delivery times to track my tasks. **Acceptance Criteria:** DeliveryRecord updates status and timestamps.

NGO/Recipient-Facing Stories:

As an NGO, I want to receive food on time and log feedback.
 Acceptance Criteria: System stores receipt confirmation and food quality notes.

Admin/System Stories:

- As an admin, I want to monitor food flows and delivery efficiency via dashboard.
 Acceptance Criteria: Real-time delivery status, average time-to-deliver metrics.
- As an admin, I want automated reminders to volunteers for assigned pickups. Acceptance Criteria: Scheduled flow runs and sends notification.