

# Local Food AI: Retro Planning

Document compiled in accordance with BTS-AI DOPRO Guidelines on Backward/Reverse Planning.

## 1. Concept of Retro Planning

As defined in the course material, Retro Planning (Backward Planning) is constructed in reverse chronological order from a fixed deadline. This ensures that the D-Day (Capstone Submission) is immutably fixed, and all prior sprints and tasks are mathematically bound to ensure the feasibility of the project.

Our delivery date is set for **May 15th, 2026**.

## 2. Reverse Chronological Timeline (Gantt Structure)

```
gantt
  title Local Food AI - Capstone Reverse Plan
  dateFormat YYYY-MM-DD
  axisFormat %m-%d

  section Delivery & Sign-off
  Final Capstone Submission      :milestone, m1, 2026-05-15, 0d
  Disaster Recovery & PoC Test :done, 2026-05-13, 2d
  Documentation Finalization   :done, 2026-05-11, 2d

  section Feature Freeze
  Web Search (SearXNG) Integration :done, 2026-05-12, 1d
  Medical Constraints & PDF Export :done, 2026-05-09, 3d
  AI Meal Planner (Ollama 1B)      :done, 2026-05-05, 4d

  section Core Architecture
  Plate Builder & Macros           :done, 2026-05-01, 4d
  Clinical Explorer Search        :done, 2026-04-28, 3d
  Zabbix Telemetry & SNMP         :done, 2026-04-26, 2d

  section Foundation
  OpenFoodFacts Ingestion (3GB)   :done, 2026-04-20, 6d
  Docker Multi-Container Setup    :done, 2026-04-18, 2d
  Taiga/Git Agile Integration     :done, 2026-04-15, 3d
```

## 3. Resource & Buffer Analysis

- **Milestone Buffers:** By utilizing a reverse plan, we identified that the massive 3GB OpenFoodFacts dataset required a 6-day window for background ingestion without blocking the frontend development.
- **Leeway Analysis:** The final 2 days (May 13 - 15) are strictly reserved for Disaster Recovery (DR) drills and Multi-VM Proof of Concept (PoC) validation, ensuring the presentation runs flawlessly regardless of infrastructure hiccups.