Process Documentation

1) Project framing and problem selection

We started with broad app ideas, then narrowed the scope to a campus dining information problem because it showed clear, repeated friction in everyday student routines. The core problem we defined was that students often cannot quickly find reliable, mobile-friendly, real-time dining information across all options (especially food trucks).

2) Early assumptions and hypotheses

We hypothesized that dining choices on campus are mostly time-sensitive, and that students would benefit most from information that reduces "wasted trips", like crowd level, wait time, seating, and accurate menus with visuals. We also assumed different student groups (meal plan vs. no meal plan, on-campus vs. off-campus) would have different needs and patterns.

3) Research plan and study design

We designed a formative research plan combining:

- **Survey** to capture patterns, priorities, and feature ranking at scale.
- **Semi-structured interviews** to understand decision-making, pain points, and workarounds.
- **Observation** (including indirect or naturalistic observation) to validate real behaviors around lines, seating, and menu visibility.
  Recruitment focused on capturing variation by living situation and meal plan status, and expanding to vendors when possible.

4) Key research findings synthesized

Across survey, interviews, and observation, we consolidated several consistent findings:

- Dining behavior differs strongly by living situation and meal plan status.
- Decisions are driven mainly by proximity, time pressure, and uncertainty about lines and seating.
- Real-time indicators (crowd, wait, seating) would meaningfully change behavior and reduce stress.
- Visual and descriptive menu info (photos, ingredients, dietary labels) increases confidence and speeds up choices.
- Plans are dynamic and socially influenced, so users need quick alternatives when conditions change.

5) Solution exploration and direction

We compared three solution directions:

- **Yelp-like native app** with posts, photos, and reviews tied to dining locations. Strong for community updates, but higher development cost.
- **Redesigned dining website**. Lower build cost and searchable, but weaker for real-time updates and on-the-go use.
- **Map-based "Google reviews" style experience** emphasizing location and time, potentially supporting "busy/not busy" visualizations. Fit for proximity-driven decisions, but challenges include food-truck location and comparison across venues.

6) Current deliverables and next steps

- Consolidated problem statement and prioritized user needs.
- Research instruments drafted and iterated based on feedback (including vendor interview scope, incentives, and consent considerations).
- Storyboard drafted to illustrate the time-crunched decision journey.
  Next steps focus on prototyping (starting with paper prototypes), validating feasibility of real-time signals, and tightening the feature set to avoid scope creep.