#### MICHIGAN STATE UNIVERSITY

# Alpha Presentation Data Consistency and Reconciliation Tool

#### The Capstone Experience

#### Team Ally

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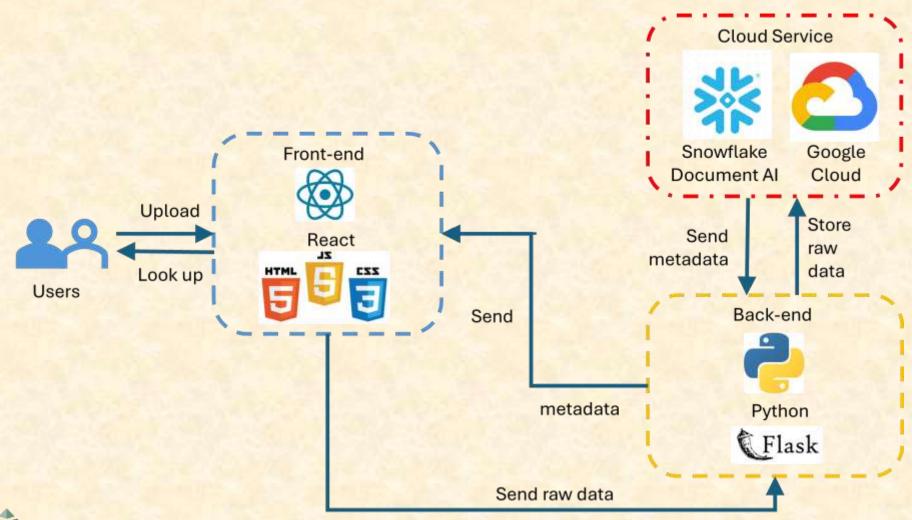
Fall 2025

#### **Project Overview**

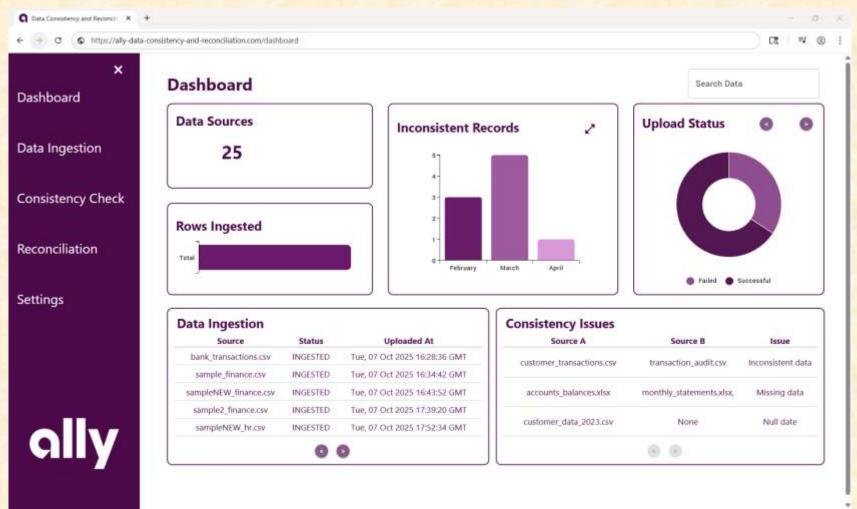
- Countless hours spent on manual data management, analysis, and reconciliation of data
- Web-based tool streamlining this process:
  - Allow users to upload data in multiple formats
  - Run consistency checks using ML tool
  - Provides user the ability to reconcile data
- Ensure consistency and accuracy across sources, improving the confidence in reporting and decision-making



## System Architecture

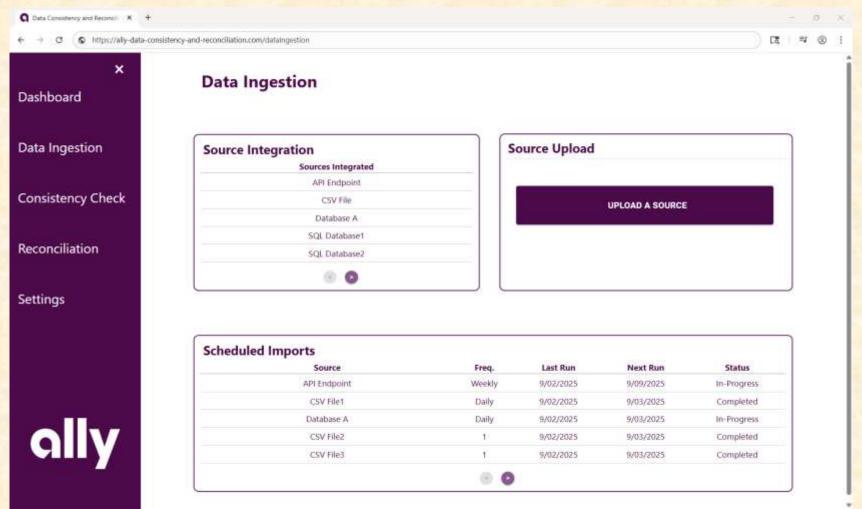


# Screen Mockup: Dashboard



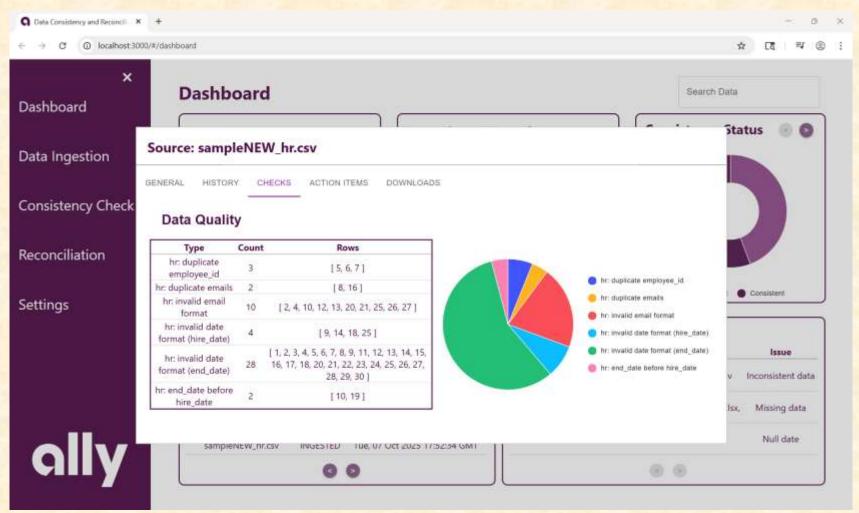


# Screen Mockup: Data Ingestion



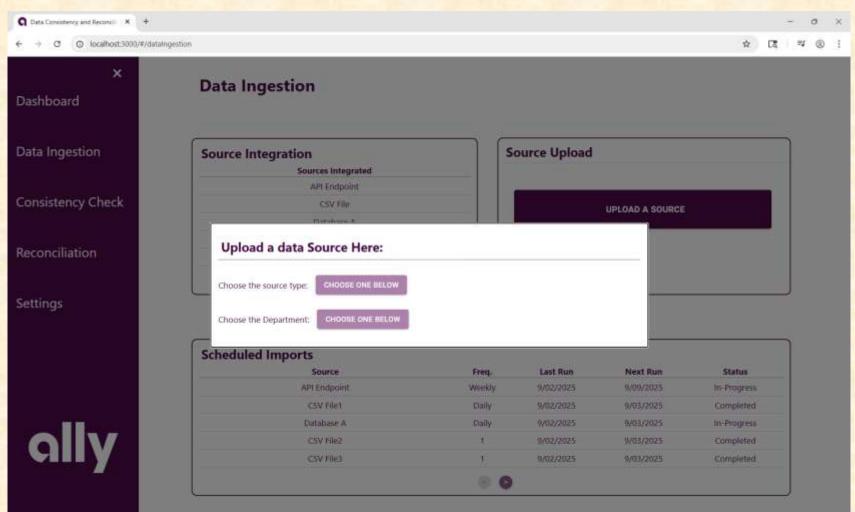


## Screen Mockup: Source Popup



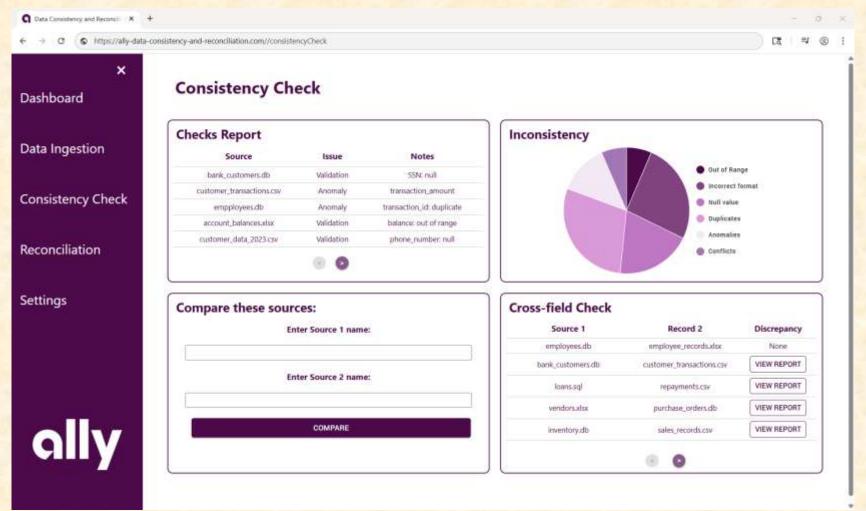


#### Screen Mockup: Data Ingestion Popup



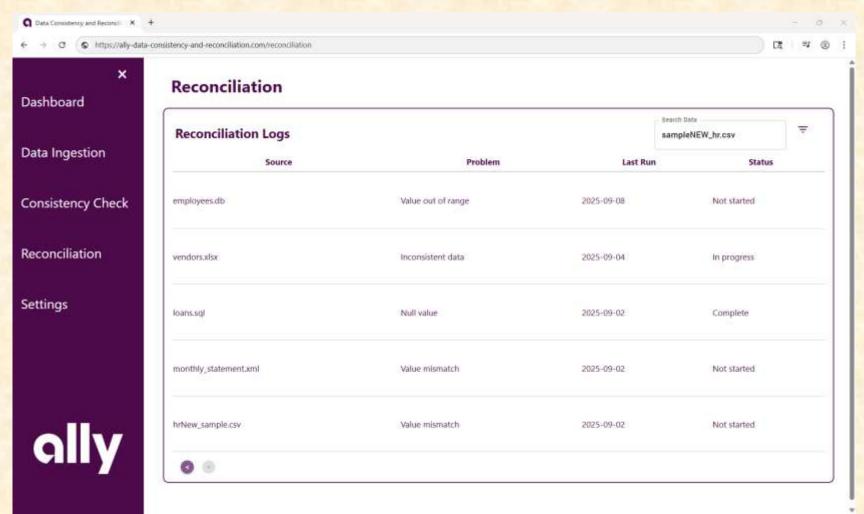


# Screen Mockup: Consistency Check





#### Screen Mockup: Data Reconciliation





#### What's left to do?

- Ensure the whole process is consistent for all types of sources
- Establish more rules, checks for other department types and file content
- Establish checks between multiple files and resolve data conflicts
- Determine solution for reconciliation
- Generation of reports



### Questions?

