Project Design Phase-II Data Flow Diagram & User Stories

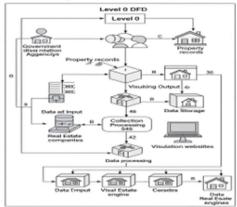
| Date | 30 June 2025 |
|---------------|---|
| Team ID | LTVIP2025TMID49628 |
| Project Name | Visualizing Housing Market Trends An Analysis of Sale Prices and Features using Tableau |
| Maximum Marks | 4 Marks |

Data Flow Diagrams:

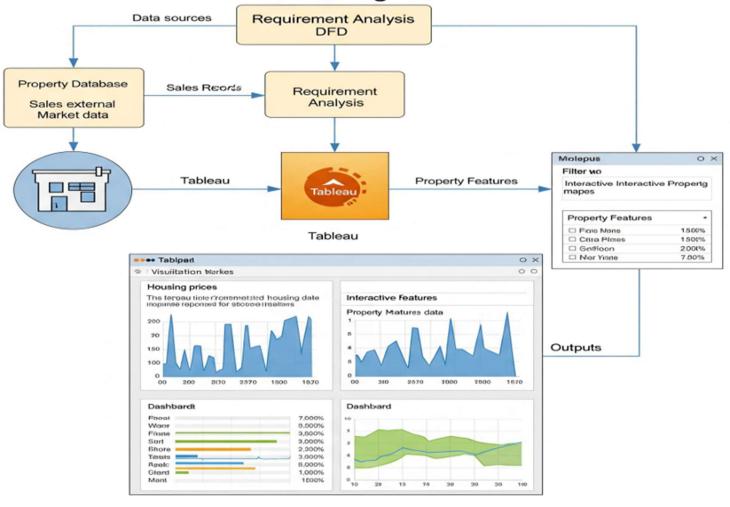
A Data Flow Diagram (DFD) is a traditional visual representation of the information flows within a system. A neat and clear DFD can depict the right amount of the system requirement graphically. It shows how data enters and leaves the system, what changes the information, and where data is stored.

Example: (Simplified)

Housing Visulation system



Visulization of Housing Market trends



User Stories

Use the below template to list all the user stories for the product.

| User Type | Functional Requirement (Epic) | User Story Number | User Story / Task | Acceptance criteria | Priority | Release |
|------------------------|---|----------------------|---|---|----------|----------|
| Real Estate Analyst | View housing trend summary | US-01 | As an analyst, I want to see overall metrics like avg. price and area | Dashboard shows total houses, avg sale price, and total basement area in KPI cards | High | Sprint-1 |
| Real Estate Analyst | Analyze sales by renovation age | US-02 | As an analyst, I want to visualize sales grouped by years since renovation | Histogram displays price distribution by renovation age | High | Sprint-1 |
| Analyst/Manage r | Compare house age by features | US-03 | As a user, I want to compare house age with number of bathrooms, floors, and bedrooms | Grouped bar charts are shown for each feature category against house age | Medium | Sprint-1 |
| Data Engineer | Load and preprocess data | US-04 | As a data engineer, I want to prepare and clean the dataset for Tableau | All null values are handled, calculated fields are created (age, years since renovation) | High | Sprint-1 |
| Analyst | Explore renovated vs. non-renovated homes | US-05 | As a user, I want to view the proportion of renovated homes by age | Pie chart shows segmented age groups with renovation status | Medium | Sprint-1 |
| Business Analyst | Filter and interact with visual data | US-06 | As a user, I want to filter the dashboard by features like age, bedrooms, etc. | Filters are working for bedrooms, bathrooms, age, and renovation status | High | Sprint-1 |