

## Project Design Phase-II

### Data Flow Diagram & User Stories

Date	02 NOV 2025
Team ID	NM2025TMID01562
Project Name	Calculating Family Expenses Using ServiceNow
Maximum Marks	4 Marks

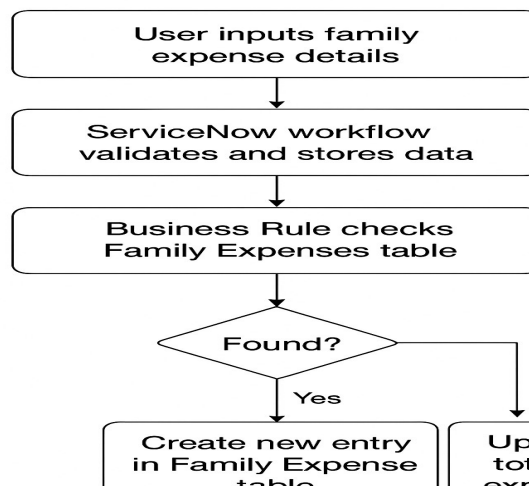
#### Data Flow Diagrams:

A Data Flow Diagram (DFD) illustrates the flow of data through the system and how the system processes information. In the project 'Calculating Family Expenses Using ServiceNow', the DFD visualizes the process of entering, categorizing, validating, and summarizing expense data.

The system accepts expense inputs from users, validates them using workflows and business rules, stores them in ServiceNow tables, and displays analytical reports on dashboards. The DFD ensures that the data movement and system operations are clear and optimized.

#### Example Flow:

1. User enters family expense details into the system.
2. The ServiceNow workflow validates and stores the entered data.
3. The Business Rule checks if an existing record already exists in the "Family Expenses" table.
4. If a record is found, the total expense amount is updated.
5. If no record exists, a new entry is created in the table.
6. The system processes the data and displays categorized expenses on the dashboard.



## User Stories:

User stories describe the functionality of the system from the perspective of end users and the system itself. Each story includes an acceptance criterion and priority level to ensure that development aligns with business goals.

User Type	Functional Requirement (Epic)	User Story Number	User Story / Task	Acceptance Criteria	Priority	Release
Family Member	Expense Entry	USN-1	As a user, I want to record my daily expenses so that I can track my spending.	The system should allow users to enter daily expenses with category, date, and amount.	High	Sprint-1
System	Expense Validation	USN-2	As a system, I must validate that each expense entry has all required details.	Expense entry is saved only if category, amount, and date fields are filled.	High	Sprint-1
Family Member	Budget Tracking	USN-3	As a user, I want to see if my total monthly expenses exceed my set budget.	The system should display an alert when the total exceeds the monthly budget limit.	Medium	Sprint-2
Family Member	Report Generation	USN-4	As a user, I want to generate monthly reports of my expenses.	The system should allow exporting expense summaries into a clear report format.	Medium	Sprint-3
System	Dashboard Visualization	USN-5	As a system, I should provide dashboards showing spending patterns.	Dashboards should visualize expenses by category, time period, and user.	Medium	Sprint-3