

## SOLUTION ARCHITECTURE

Date	31 OCTOBER 2025
Team ID	NM2025TMID04251
Project Name	CRM Application for Jewel Management-(Developer) in Salesforce
Maximum Marks	4 Marks

### Goals of the Architecture:

- Automate jewelry business operations such as customer management, pricing, and billing.
- Maintain data integrity across customer, item, price, and billing modules.
- Provide role-based security to protect sensitive business data.
- Enable scalability, automation, and centralized control through Salesforce CRM.

### Key Components:

- **Customer Object** – Stores customer information including contact details and address.
- **Item Object** – Contains details about jewelry products such as type, purity, and weight.
- **Price Object** – Maintains current gold and silver rates, linked dynamically to billing.
- **Billing Object** – Generates automated invoices based on customer purchases.
- **Record-Triggered Flows** – Automate processes like price updates and billing generation.
- **Roles, Profiles, and Permission Sets** – Manage user access levels for data security.
- **Reports and Dashboards** – Display real-time analytics on sales and performance metrics.

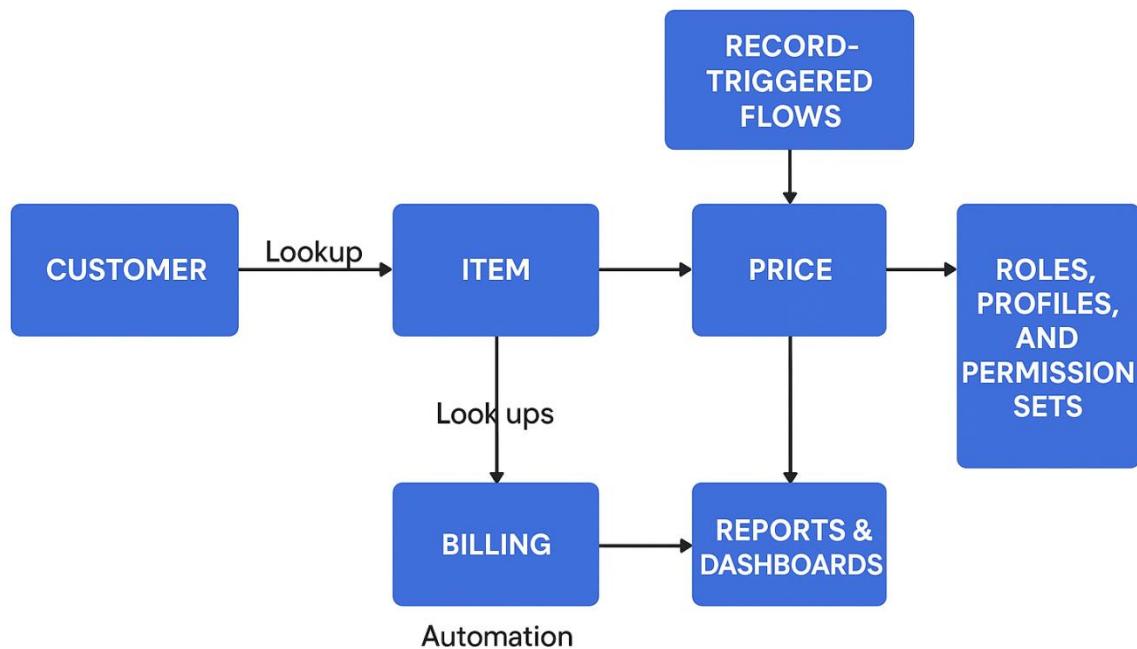
### Development Phases:

1. **Create Custom Objects** (Customer, Item, Price, Billing).
2. **Establish Relationships** between objects using lookup fields.
3. **Implement Automation Flows** for billing and price updates.

4. Configure Security Controls using profiles and permission sets.
5. Develop Reports and Dashboards for data analysis.
6. Perform Testing on data accuracy, performance, and user accessibility.

## Architecture Design:

### Solution Architecture



### Solution Architecture Description

The **solution architecture** of the *CRM Application for Jewel Management* is designed to streamline all jewelry business processes under one unified CRM platform. The architecture leverages **Salesforce Lightning** to create a cloud-based system that ensures automation, security, and efficiency.

Each module (Customer, Item, Price, and Billing) is represented as a **custom object** within Salesforce. The relationships between these objects allow seamless data flow, enabling automatic billing and dynamic price updates. **Record-triggered flows** and **validation rules** maintain consistency and accuracy across all records.

The security model ensures that only authorized users can access or modify data, preserving confidentiality. Reports and dashboards offer insightful visualizations to track sales performance, monitor customer engagement, and identify trends in jewelry demand.

By eliminating manual processes, this architecture not only saves time but also enhances accuracy and transparency in daily operations. The scalable design supports future integration with e-commerce, supplier management, and AI-based recommendation systems.

Overall, the architecture provides a **robust, secure, and automated CRM ecosystem** for efficient jewelry business management.