

HandsMen Threads: Elevating the Art of Sophistication in Men's Fashion

Submitted by:

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BSIT 4-1

Project Overview:

This project focuses on the development of a fully customized Salesforce CRM solution for **HandsMen Threads**, a premium men's fashion and tailoring brand seeking to modernize its internal operations and deliver a seamless, connected customer experience. The CRM was designed to address the brand's challenges in managing customer information, tracking orders, maintaining inventory accuracy, and supporting marketing activities.

The implemented solution features a well-structured data model with five essential custom objects: Customer, Order, Product, Inventory, and Marketing Campaign, providing a structured foundation for handling essential business processes. To improve efficiency and reduce manual effort, multiple automations were implemented, including Record-Triggered Flows, Scheduled Flows, Email Alerts, and Apex automation, enabling streamlined order processing, customer notifications, loyalty updates, and proactive inventory monitoring.

To ensure secure and reliable system usage, the project incorporated validation rules to maintain data quality and a role-based security model tailored to the Sales, Inventory, and Marketing teams. A Scheduled Apex Batch was also developed to automatically monitor low-stock levels and update inventory statuses, ensuring uninterrupted product availability.

Overall, this Salesforce CRM implementation enhances HandsMen Threads' customer engagement through timely and personalized interactions, optimizes internal workflows through automation, and establishes a scalable digital infrastructure capable of supporting the brand's.

Objective:

The primary objective of this project is to implement a customized Salesforce CRM for HandsMen Threads to streamline operations, enhance data accuracy, and improve customer engagement. The system centralizes customer, order, product, inventory, and marketing information into a unified platform.

The project aims to:

- **Enhance customer engagement and tracking** by consolidating customer profiles, interactions, and purchase history.
- **Optimize order and inventory management** through automation and real-time monitoring of stock levels.
- **Improve operational efficiency** by reducing manual tasks and standardizing workflows across Sales, Inventory, and Marketing teams.

- **Strengthen team collaboration** by enabling secure, role-based access and coordinated processes across departments.

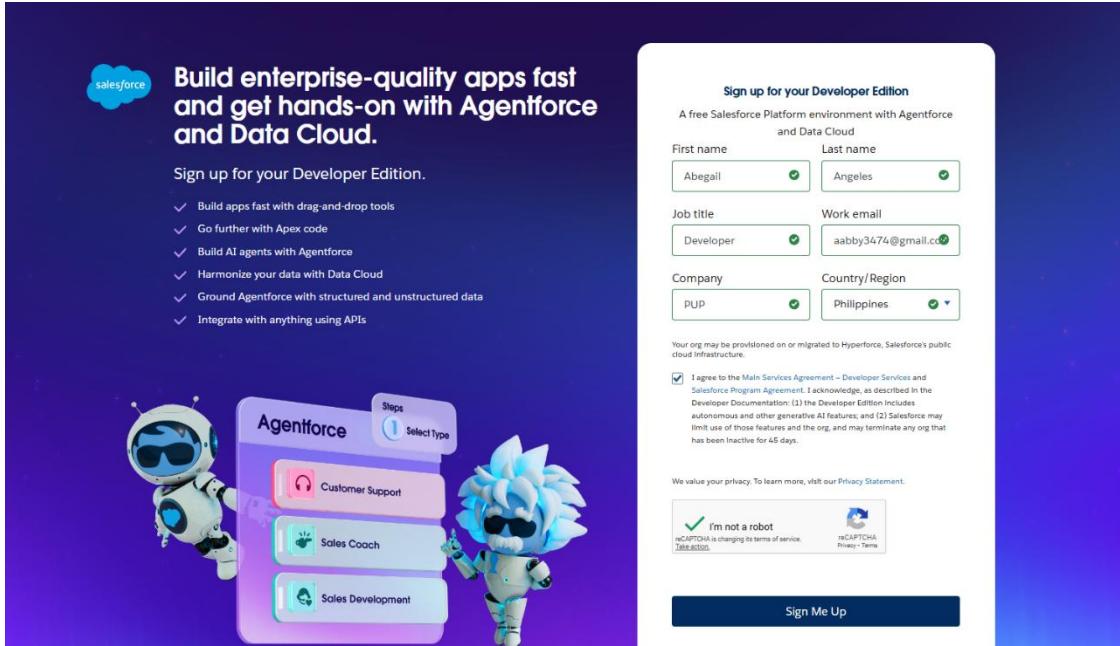
Phase 1: Requirement Analysis & Planning

The first phase of the project focused on identifying the core operational needs of HandsMen Threads to ensure the Salesforce CRM would fully support its tailoring and fashion business processes. This involved analyzing how the business manages customer details, processes orders, tracks inventory levels, records products, and handles marketing activities. Based on these needs, the project scope and objectives were clearly defined to ensure the CRM would improve data accuracy, automate workflows, and enhance customer engagement. A detailed data model was then designed to outline how the key custom objects : Customer, Order, Product, Inventory, and Marketing Campaign would connect and support daily operations. Alongside this, a security model was planned to establish role-based access for Sales, Inventory, and Marketing teams, ensuring data protection and proper permission levels. Stakeholders involved in using or maintaining the system were mapped to understand their responsibilities and areas of interaction within the CRM. Finally, an execution roadmap was developed to guide the implementation process, outlining the sequence of configuration, automation, testing, and deployment activities required to successfully deliver the solution.

Phase 2: Salesforce Development - Backend & Configurations

❖ Setup Environment & DevOps Workflow

A Salesforce Developer Org was created using <https://developer.salesforce.com/signup>. Account verification was completed, the password finalized, and access to the Salesforce Setup interface was authorized. This environment served as the main workspace for building and testing all CRM components.



❖ Custom Objects and Fields

The following five custom objects were created to manage the data of HandsMen Threads. These fields ensure accurate tracking of customers, products, orders, inventory, and campaigns for reporting, automation, and operational efficiency.

- **HandsMen Customer** – Stores customer details
 - Name, Email, Phone, Loyalty_Status__c (*Bronze, Silver, Gold*), Total_Purchases__c
- **HandsMen Product** – Stores product information
 - Name, SKU, Price, Stock_Quantity__c
- **HandsMen Order** – Tracks customer orders
 - Order_Number, Status (*Pending, Confirmed, Rejected*), Quantity__c, Total_Amount__c
- **Inventory** – Monitors stock levels
 - Auto Number, Warehouse, Stock_Quantity__c
- **Marketing Campaign** – Manages promotions
 - Campaign_Name, Start_Date, End_Date

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedBy/d	Lookup(User)		
Email	Email_c	Email		
FirstName	FirstName_c	Text(60)		
FullName	FullName_c	Formula (Text)		
HandsMen Customer Name	Name	Text(80)		✓
Last Modified By	LastModifiedBy/d	Lookup(User)		
LastName	LastName_c	Text(60)		
Loyalty Status	Loyalty_Status__c	Picklist		
Owner	OwnerId	Lookup(User,Group)		✓
Phone	Phone_c	Phone		
Total Purchases	Total_Purchases__c	Number(18, 0)		

Example of Custom Object and Fields in Handsmen Customer

❖ Validation Rules

Validation rules were applied to maintain data accuracy:

- **Order Object:** Prevents saving if Total_Amount__c ≤ 0
Error Message: “Please enter a valid amount.”
- **Inventory Object:** Prevents saving if Stock_Quantity__c ≤ 0
Error Message: “Stock quantity cannot be zero or negative.”
- **Customer Object:** Email must contain “@gmail.com”
Error Message: “Please enter a valid Gmail address.”

* = Required Information

Information

* HandsMen Customer Name: Abby

Owner: Abigail Angeles

Email: aabby3474@ab.com

Phone:

Loyalty Status: --None--

FirstName: Abby

LastName: Angeles

Total Purchases:

We hit a snag.

Review the errors on this page.

Please fill Correct Gmail

Cancel Save & New Save

Example : Invalid customer Object

❖ Automation (Flows, Workflow Rules, Approval Processes)

Multiple automations were implemented to reduce manual work:

- **Record-Triggered Flow:** Updates Inventory quantity when an order is created/updated
- **Scheduled Flow:** Checks low-stock items daily and updates inventory status
- **Email Alerts:** Sends order confirmation emails to customers
- **Workflow Rule :** Updates customer loyalty status based on total purchases
- **Approval Process:** Manages approvals for marketing campaign budget.

❖ Apex Classes & Triggers (No Asynchronous Apex Developed)

An **Apex Trigger** was developed on the **HandsMen Order** object to implement custom logic that cannot be fully handled by standard automation.

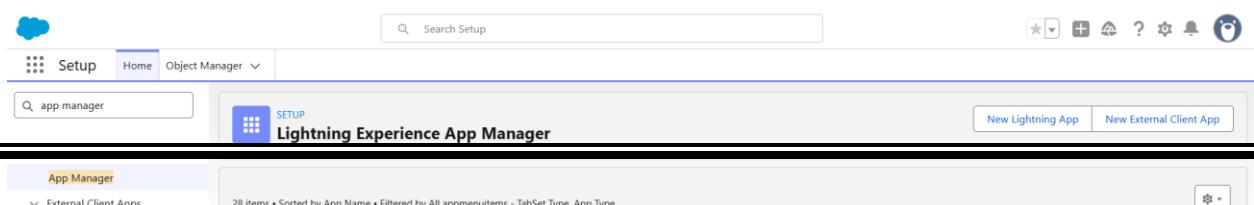
Functionality Implemented:

1. Automatically updates the customer's `Total_Purchases__c` whenever a new order is confirmed.
2. Deducts the ordered quantity from the **Inventory object's Stock_Quantity__c** to maintain accurate stock levels.

Phase 3: UI/UX Development & Customization

❖ Lightning App setup through App Manager

A custom **Lightning App** named *HandsMen Threads* was created using Salesforce App Manager to centralize access to all CRM objects and features. The app details and branding were configured with a meaningful name and description, while default settings were kept for colors and utility items. Navigation items added to the app included **HandsMen Customer**, **HandsMen Order**, **Inventory**, **HandsMen Product**, **Reports**, **Dashboards**, **Account**, **Contact**, and **Marketing Campaign** to provide users quick access to all relevant CRM data. The **System Administrator** profile was assigned to access the app, ensuring the appropriate users could view and use it efficiently. This setup allows for organized navigation and streamlined access to CRM functionality.



Phase 4: Data Migration, Testing & Security

1. Data Loading / Migration

- **Manual record creation** for all key objects:
 - **HandsMen Customer:** Input First Name, Last Name, Email; Output: Customer record saved successfully.
 - **HandsMen Product:** Input Product Name, SKU, Price; Output: Product saved.
 - **Inventory:** Input Product, Stock Quantity, Warehouse; Output: Stock Status updates (Low Stock if <10).
 - **Marketing Campaign:** Input Campaign Name, Start Date, End Date; Output: Campaign saved successfully.

3. Profiles, Roles, Permission Sets, Sharing Rules

- **Custom Profile (Platform 1):** Cloned from Standard User, granted access to HandsMen Product and Inventory.
- **Sales Role:** Added under CEO in the role hierarchy to manage record-level visibility.
- **Permission Sets & Sharing Rules:** Reviewed and applied as needed for correct access.

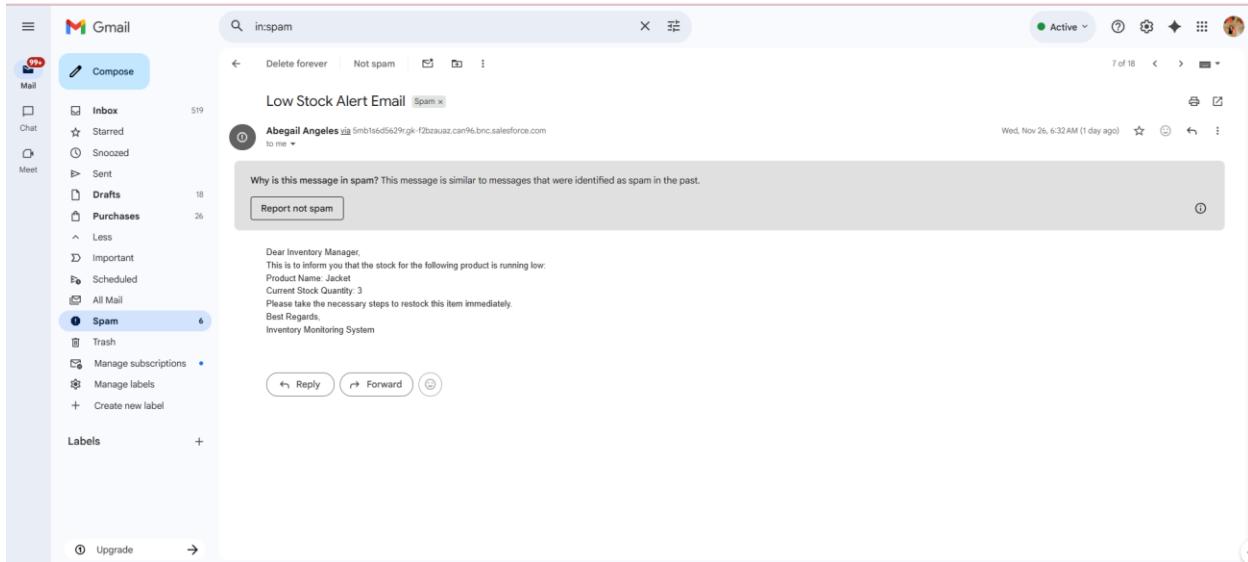
The screenshot shows the Salesforce Setup interface for managing Profiles. The left sidebar navigation includes 'Users' (selected), 'Data', 'Feature Settings', 'Data.com', 'Marketing', 'Sales', and 'Products'. The main content area is titled 'Profiles' and displays 'Custom Object Permissions' for the 'HandsMen Products' object. A red box highlights the 'Basic Access' and 'Data Administration' checkboxes for 'HandsMen Products' under the 'Inventory' row. Other rows include 'HandsMen Customers', 'HandsMen Orders', and 'Marketing Campaigns'. Below this, sections for 'Session Settings' and 'Password Policies' are visible.

Profiles

4. Test Cases / Apex Classes

- **Order Trigger Test Class:** Validates automatic Total Amount calculation and Inventory stock deduction.
- **Order Creation & Automation:**
 - Input: Create HandsMen Order (customer, product, quantity, status).
 - Output: Total Amount calculated, Inventory stock updated automatically.
- **Flows Automation:**
 - **Order Confirmation Flow:** Automatic email sent when order status is Confirmed.

- **Low Stock Flow:** Stock Status updates to “Low Stock” and email sent when inventory falls below threshold.
- **Loyalty Status Flow:** Updates customer loyalty status (Bronze/Silver/Gold) based on Total Purchases, scheduled at 12 AM; email sent automatically.



Phase 5: Deployment & Maintenance

For deployment, the completed HandsMen Threads CRM— including custom objects, flows, validation rules, email alerts, reports, dashboards, and Apex triggers will be migrated from the sandbox environment to production using **Change Sets**. This method ensures all metadata such as objects, fields, page layouts, flows (Order Confirmation, Low Stock, Loyalty Status), and the Apex trigger for order calculation and stock deduction are securely packaged and deployed together. Before deployment, the system components undergo final testing to ensure that all automations, formulas, and email alerts function exactly as expected in the target environment.

Maintenance involves continuously monitoring the system to ensure smooth daily operations. Key activities include reviewing **Flow Error Logs**, **Debug Logs**, and **Email Logs** to identify issues like failed automation runs or incorrect data updates. Admins must also periodically check inventory calculations, loyalty status updates (scheduled at 12 AM), and stock deduction accuracy to avoid data inconsistencies. Any errors found during order processing, email alerts, or validation checks are troubleshooted using Salesforce setup tools such as the Flow Debugger and Object Manager auditing. The documentation created in earlier phases supports quick diagnosis, ensuring that the CRM remains stable, accurate, and ready for future enhancements as business needs grow.

Conclusion

The HandsMen Threads Salesforce CRM project successfully delivered a fully customized system that centralizes customer, product, order, inventory, and marketing data while automating essential business processes. With structured data, robust validation rules, and intelligent automations—such as order confirmation emails, scheduled loyalty updates, and proactive low-stock alerts—the CRM ensures accuracy, consistency, and reliability across daily operations. Apex triggers and flows work together to calculate order totals, adjust inventory, and update customer statuses, guaranteeing timely communication and seamless workflow execution.

Beyond process automation, the system strengthens operational efficiency through strong security controls, role-based access, and real-time monitoring of data changes. Inventory levels, customer loyalty, and order transactions are maintained with precision, minimizing manual work and enabling faster decision-making. Overall, the CRM enhances efficiency, customer engagement, and scalability, providing HandsMen Threads with a solid technological foundation to support ongoing growth and deliver an improved customer experience.

Screenshots

In the Handsmen Thread App

The screenshot displays the HandsMen Threads Salesforce CRM interface. At the top, there is a navigation bar with links for HandsMen Customers, HandsMen Orders, HandsMen Products, Inventory, Marketing Campaigns, Reports, Dashboards, Accounts, and Contacts. Below the navigation bar, a header bar includes a search bar, a 'Recently Viewed' dropdown, and various action buttons like New, Import, Change Owner, and Assign Label. A secondary search bar labeled 'Search this list...' is also present. The main content area shows a list titled 'HandsMen Customers' with three items: Abby, Yuen, and Lily. Each item has a checkbox next to it. The entire interface is styled with a clean, modern look, characteristic of the Salesforce platform.

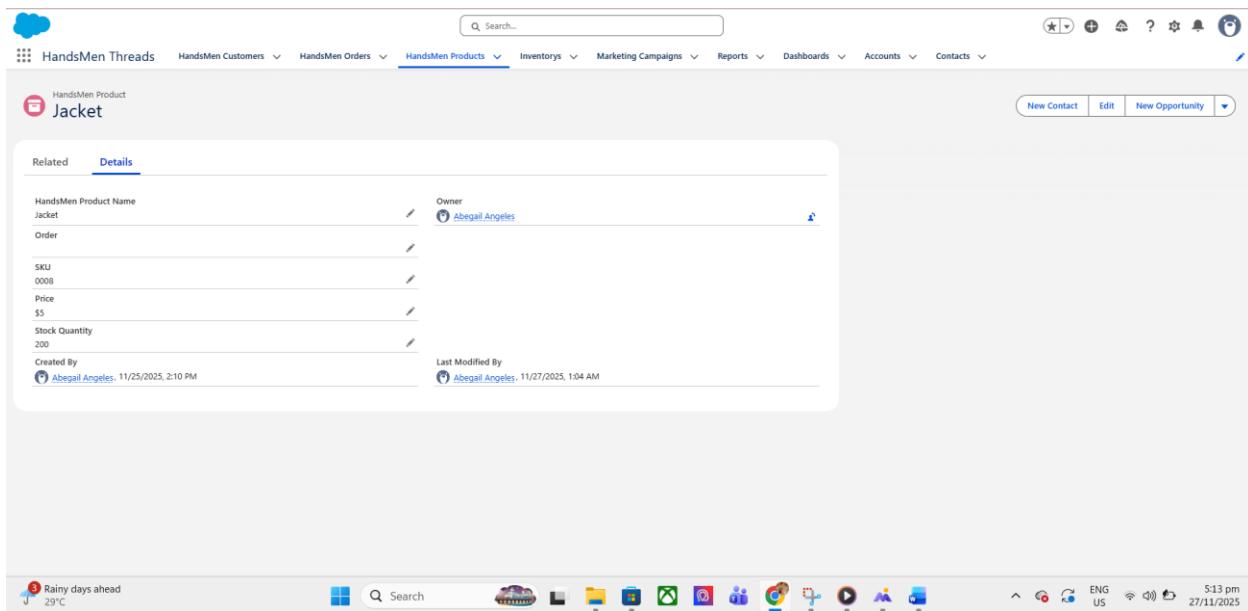
Creating Handsmen Customer

The screenshot shows the HandsMen Threads CRM interface. The top navigation bar includes links for HandsMen Threads, HandsMen Customers, HandsMen Orders, HandsMen Products, Inventory, Marketing Campaigns, Reports, Dashboards, Accounts, and Contacts. A search bar and various system icons are also present. The main content area displays a 'HandsMen Customer' record for 'Abby'. The 'Details' tab is selected, showing fields such as Customer Name (Abby), Email (abby3474@gmail.com), Loyalty Status (FirstName Abby, LastName Angeles, FullName Abby Angeles), Total Purchases (500), and Creation Date (11/25/2025, 2:09 PM). The record is owned by Abigail Angeles. The bottom status bar shows a news notification about a top cop re..., a taskbar with various application icons, and system status information like ENG US, 5:12 pm, and 27/11/2025.

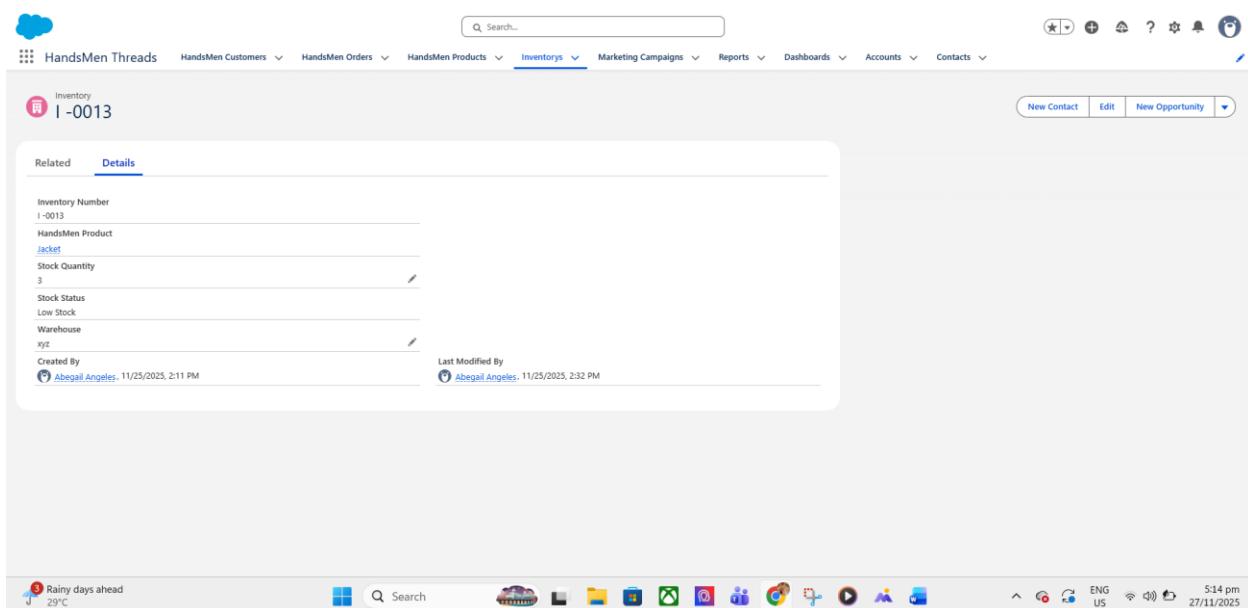
In the Handsmen Order

The screenshot shows the HandsMen Threads CRM interface. The top navigation bar includes links for HandsMen Threads, HandsMen Customers, HandsMen Orders, HandsMen Products, Inventory, Marketing Campaigns, Reports, Dashboards, Accounts, and Contacts. A search bar and various system icons are also present. The main content area displays a 'HandsMen Order' record for 'O-0012'. The 'Details' tab is selected, showing fields such as Order Number (O-0012), Customer (Abby), Status (Pending), Quantity (20), Total Amount (100), Product (Jacket), and Customer Email (abby3474@gmail.com). The record is owned by Abigail Angeles. The bottom status bar shows a news notification about a top cop re..., a taskbar with various application icons, and system status information like ENG US, 5:12 pm, and 27/11/2025.

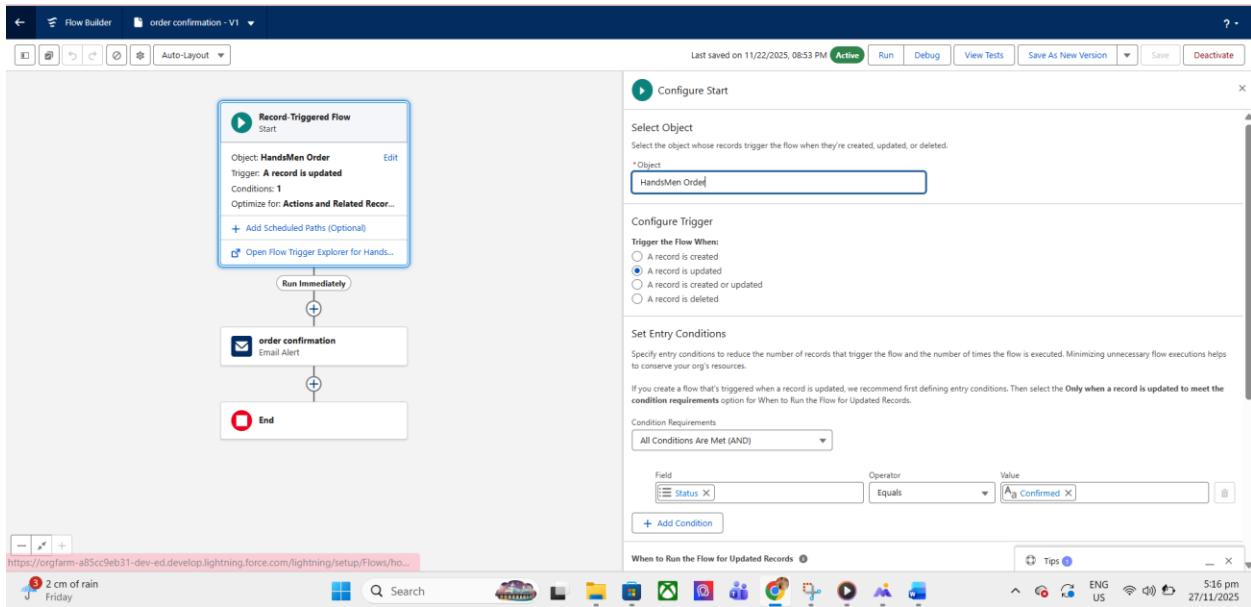
In the Handsmen Product



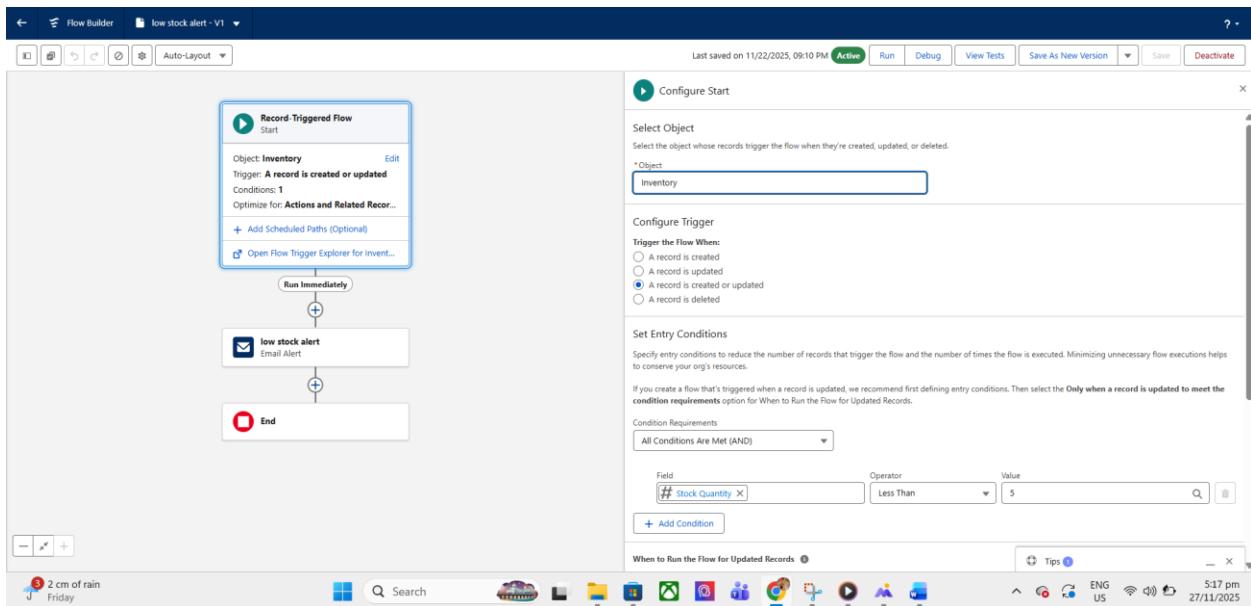
In the Inventory



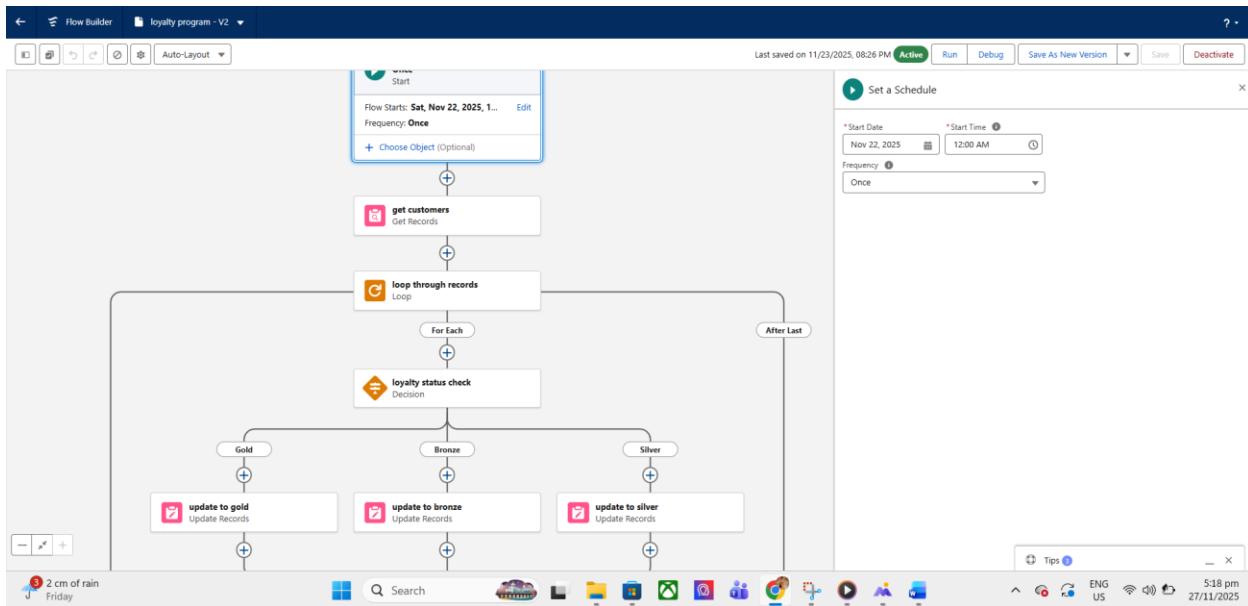
Order Confirmation Flow



Low stock flow



Loyalty Program Flow



Apex

Order Total

```
trigger OrderTotalTrigger on HandsMen_Orders__c (before insert, before update) {
    Set<Id> productIds = new Set<Id>();
    for (HandsMen_Orders__c order : Trigger.new) {
        if (order.HandsMen_Product__c != null) {
            productIds.add(order.HandsMen_Product__c);
        }
    }
    Map<Id, HandsMen_Product__c> productMap = new Map<Id, HandsMen_Product__c>(
        [SELECT Id, Price__c FROM HandsMen_Product__c WHERE Id IN :productIds]
    );
    for (HandsMen_Orders__c order : Trigger.new) {
        if (order.HandsMen_Product__c != null && productMap.containsKey(order.HandsMen_Product__c)) {
            HandsMen_Product__c product = productMap.get(order.HandsMen_Product__c);
            if (order.Quantity__c != null) {
                order.Total_Amount__c = order.Quantity__c * product.Price__c;
            }
        }
    }
}
```

Stock Deduction

The screenshot shows a software development interface with the following components:

- Code Editor:** Displays a Java-like code snippet for a trigger named "StockDeductionTrigger". The code handles insertions and updates on the "HandsMen_Orders_c" object. It identifies orders with status "Confirmed" and non-null product IDs, adds these IDs to a set, and then queries the "Inventory_c" object to find related inventories based on these product IDs. It then iterates over these inventories to update their stock quantities.
- Logs:** A tab labeled "Logs" is visible at the bottom of the editor area.
- Toolbar:** Includes standard menu items like File, Edit, Debug, Test, Workspace, Help, and a toolbar with icons for Save, Undo, Redo, Cut, Copy, Paste, Find, and Select All.
- System Tray:** Located at the bottom right, it shows the date (27/11/2025), time (5:19 pm), battery level (ENG US), and a weather icon indicating 29°C with "Lightning nearby".