

# **MEDICAL INVENTORY**

# **MANAGEMENT**

**COLLEGE NAME: Sri Krishna Adithya College of Arts and Science**

**TEAM ID: NM2025TMID22209**

**Team Leader: NISHAN S**

**E-Mail: 23bsai241nishans@skacas.ac.in**

**Team member: SETHUPATHY C**

**E-Mail: 23bsai253sethupathyc@skacas.ac.in**

**Team member: TAMILVANAN I**

**E-Mail: 23bsai260tamilvanani@skacas.ac.in**

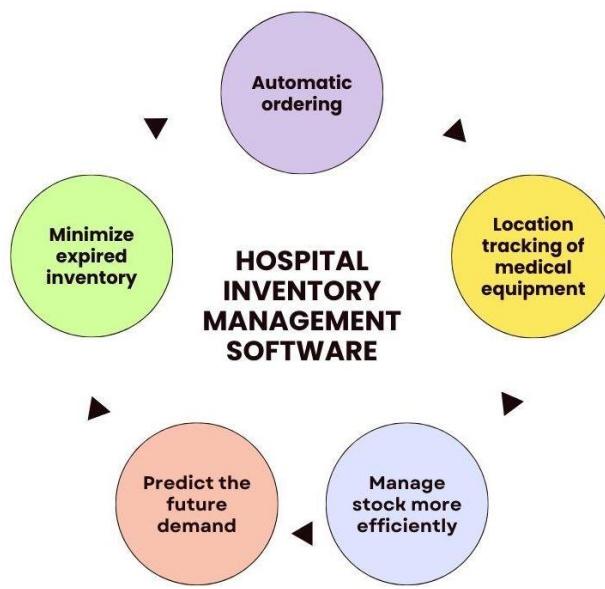
**Team member: YOKESH J**

**E-Mail: 23bsai265yokeshj@skacas.ac.in**

## **1.INTRODUCTION**

### **1.1 Project Overview**

This project is a comprehensive Salesforce application to streamline and manage various operational aspects of medical inventory. The system aims to efficiently maintain supplier details, manage purchase orders, track product details and transactions, and monitor the expiry dates of products. Maintain detailed records of suppliers, including contact information. Catalog product information, including descriptions, stock levels. Monitor and track product expiry dates to avoid using expired items. Comprehensive reports to track supplier performance, and purchase orders.



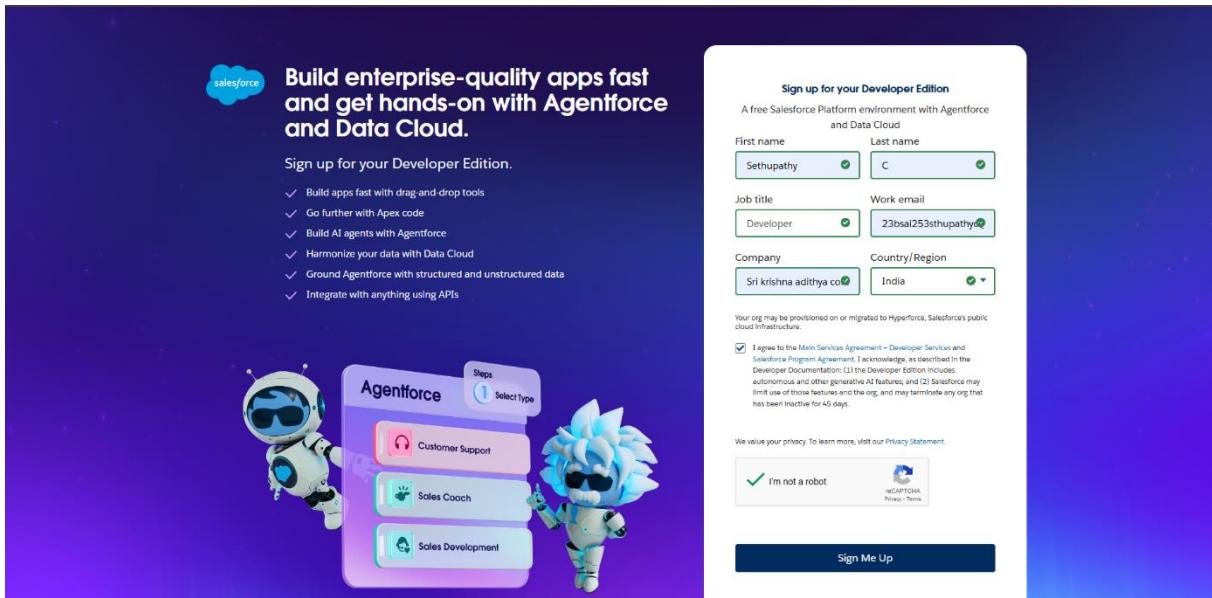
### **1.2 Purpose**

The Medical Inventory Management System is a comprehensive Salesforce application designed to streamline and manage various operational aspects of the medical inventory. It can efficiently maintain supplier details, manage purchase orders, track product details and transactions, and monitor expiry dates of products, thereby improving operational efficiency, data accuracy, and reporting.

## DEVELOPMENT PHASE

Creating Developer Account:

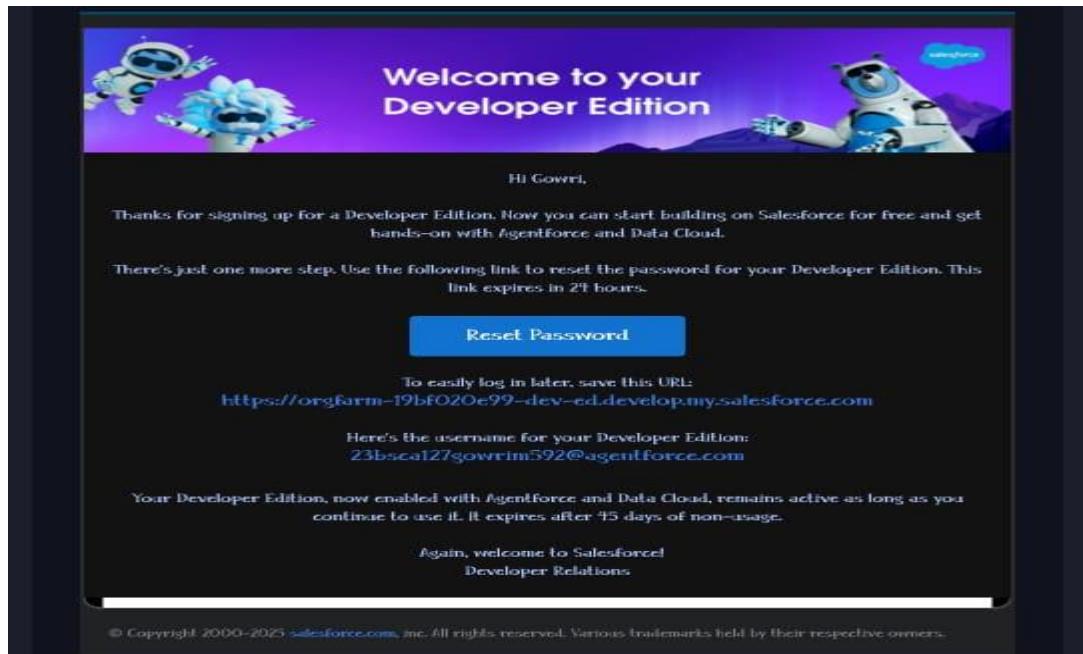
By using this URL - <https://www.salesforce.com/form/developer-signup/?d=pb>



## Created a Product Object

A screenshot of the Salesforce Setup interface, specifically the Object Manager. The URL in the browser bar is "orgfarm-19bf020e99-dev-ed.develop.lightning.force.com/lightning/setup/ObjectManager/01lgK0000026hKf/Details/view". The page shows the "Product" object details. On the left is a sidebar with navigation links like Setup, Home, and Object Manager. The main area has tabs for "Details" and "Fields &amp; Relationships". The "Details" tab is active, showing fields such as API Name (Product\_c), Singular Label (Product), and Plural Label (Products). Other sections visible include "Enable Reports" (checked), "Track Activities", "Track Field History", "Deployment Status" (Deployed), and "Help Settings". At the bottom, there are "Edit" and "Delete" buttons. The status bar at the bottom right shows "21:00", "ENG IN", "Wi-Fi", and the date "13-09-2025".

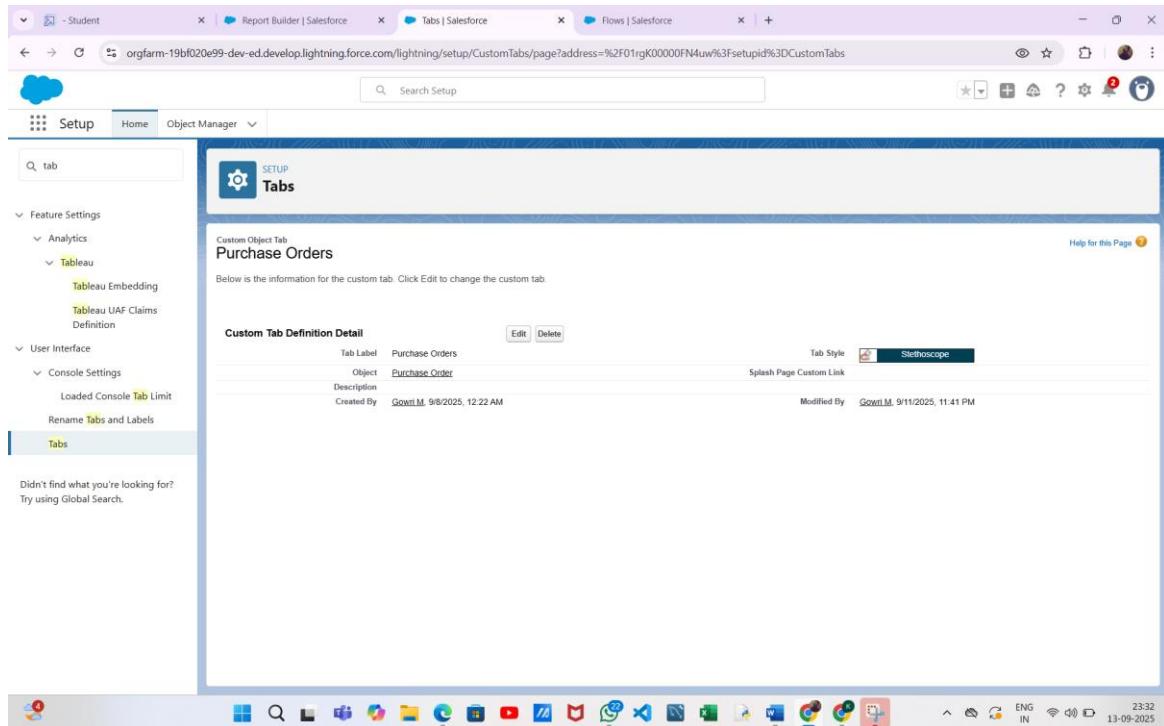
## Account Activation



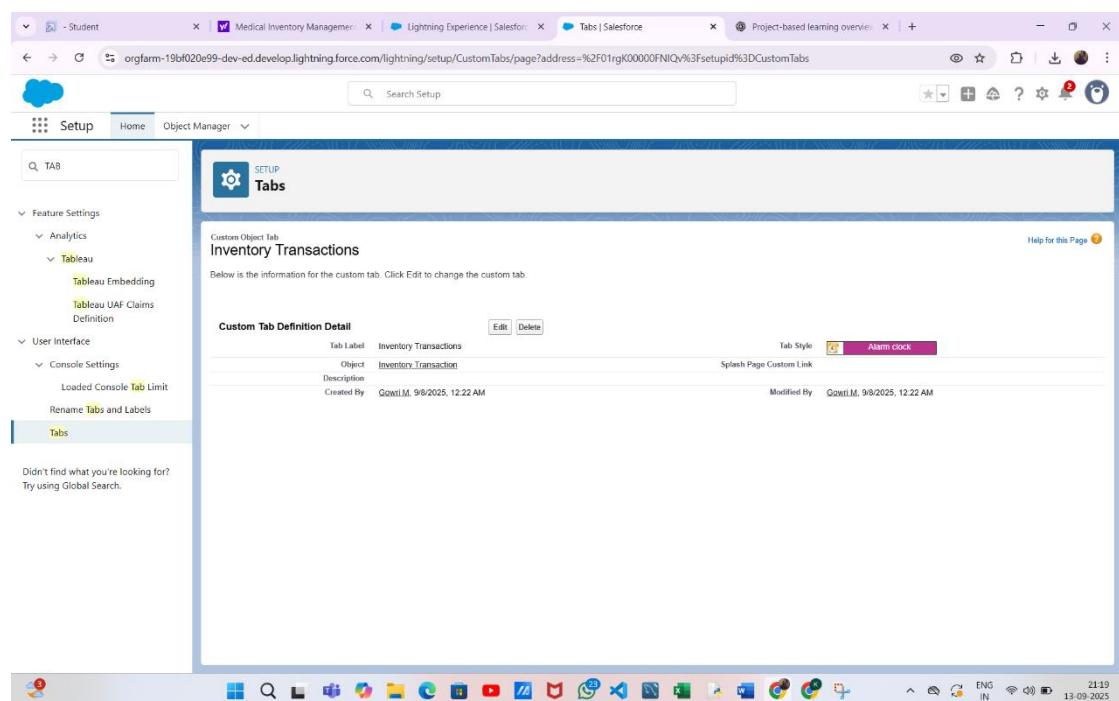
## Created a tab for Product Object

A screenshot of the Salesforce Setup interface. The left sidebar shows sections like Analytics, Tableau, User Interface, and Tabs. The main area is titled "Custom Object Tab Products". It displays a table with one row for the "Products" tab. The table columns are Tab Label (Products), Object (Product), Description, Created By (Govri M. 9/8/2025, 12:21 AM), Modified By (Govri M. 9/11/2025, 11:40 PM), Tab Style (Stethoscope), and Splash Page Custom Link. The status bar at the bottom shows system icons and the date 13-09-2025.

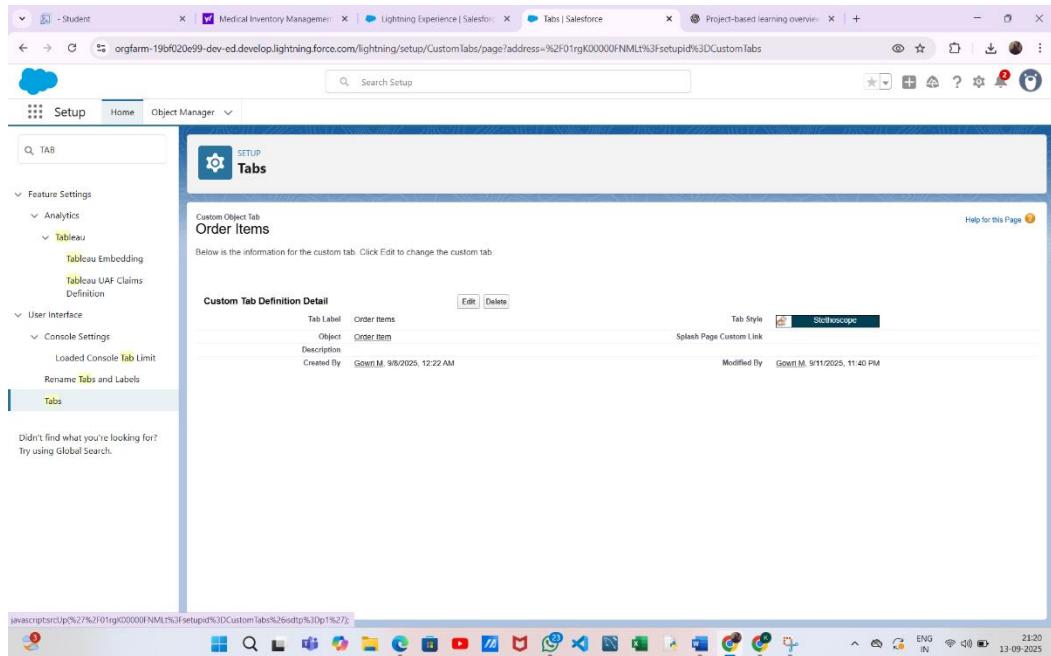
## Created a tab for Purchase Orders



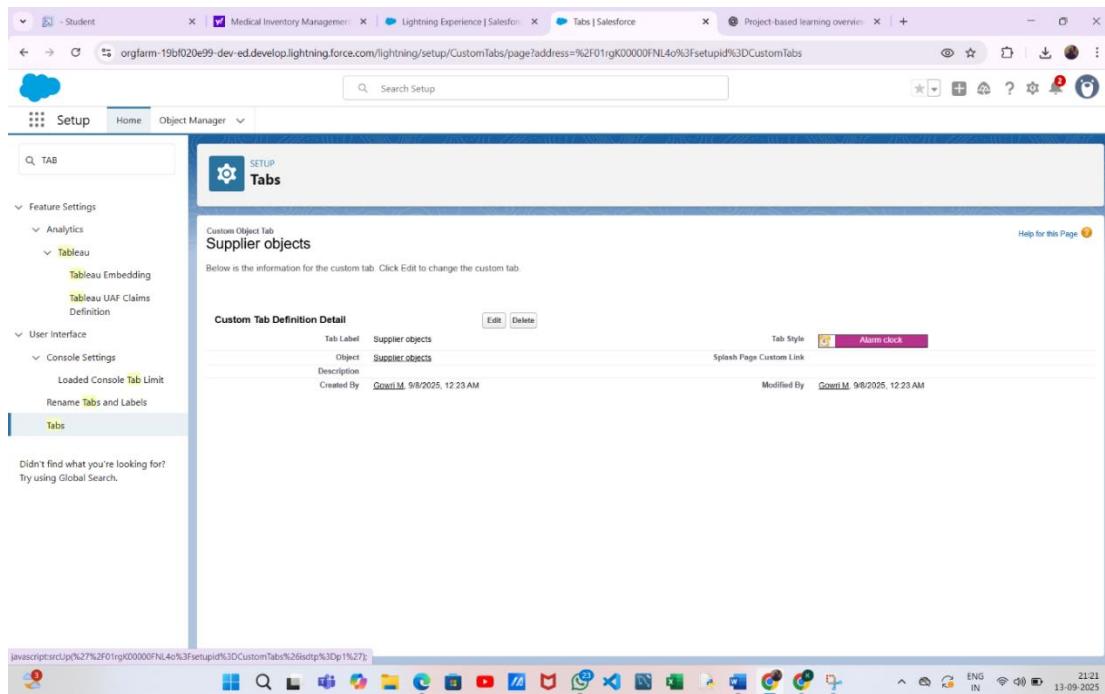
## Created a tab for Inventory Transactions



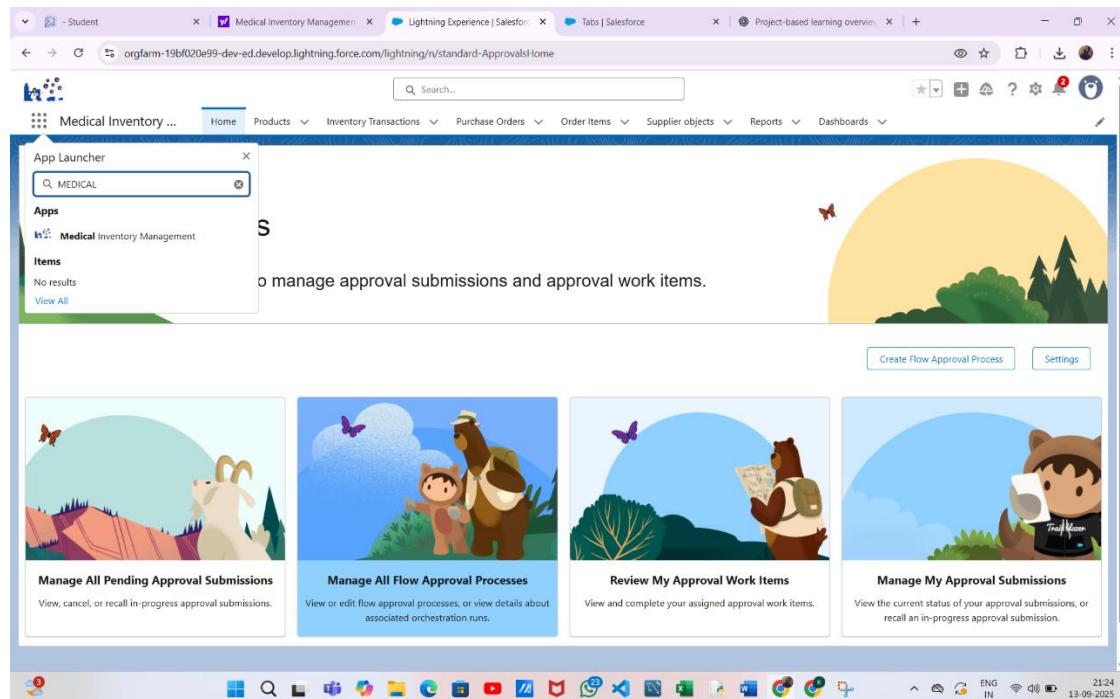
## Created a tab for Order Items



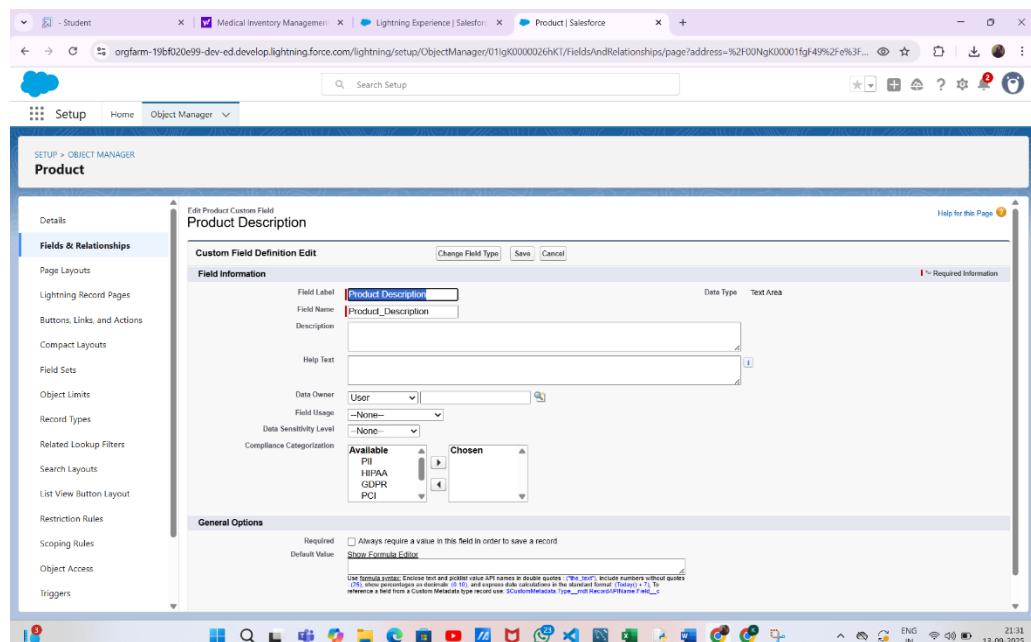
## Created a tab for Supplier objects



## Created a Lightning App for Medical Inventory Management



## Created a Text Area Field in Product Object



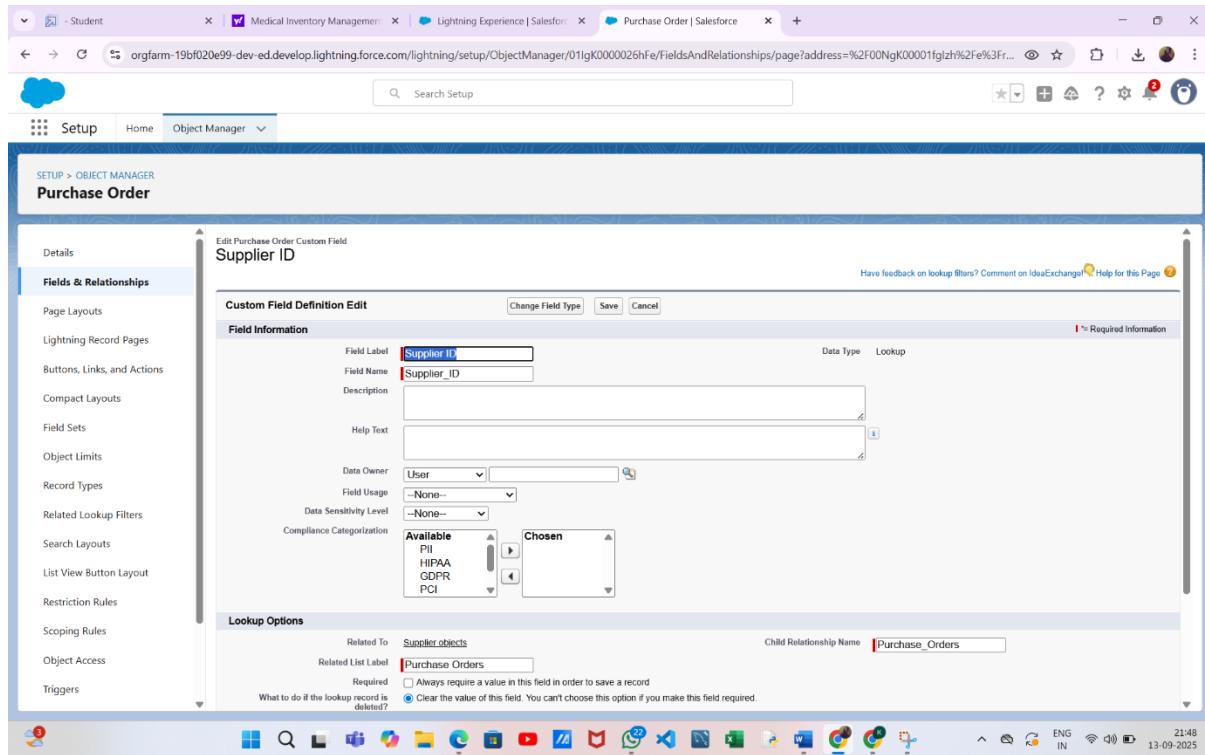
## Created a Number Field in Product object

The screenshot shows the Salesforce Setup interface for creating a custom field. The left sidebar is titled 'Fields & Relationships' under 'Product'. The main area is titled 'Edit Product Custom Field Current Stock Level'. The 'Field Information' section shows the field label 'Current Stock Level' and field name 'Current\_Stock\_Level'. The 'Data Type' is set to 'Number'. The 'General Options' section includes checkboxes for 'Required', 'Unique', and 'Do not allow duplicate values'. The 'Default Value' field is set to 'Show Formula Editor'. The status bar at the bottom indicates it's 21:34 on 13-09-2025.

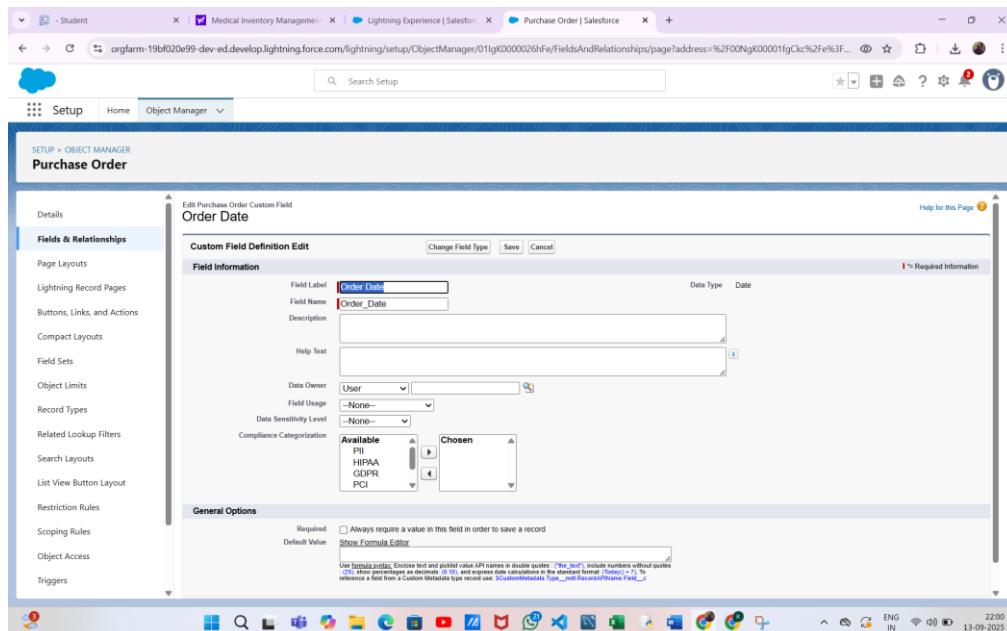
## Created a Currency Field in Product object

The screenshot shows the Salesforce Setup interface for creating a custom field. The left sidebar is titled 'Fields & Relationships' under 'Product'. The main area is titled 'Edit Product Custom Field Unit Price'. The 'Field Information' section shows the field label 'Unit Price' and field name 'Unit\_Price'. The 'Data Type' is set to 'Currency'. The 'General Options' section includes checkboxes for 'Required' and 'Default Value'. A note at the bottom explains formula syntax. The status bar at the bottom indicates it's 21:34 on 13-09-2025.

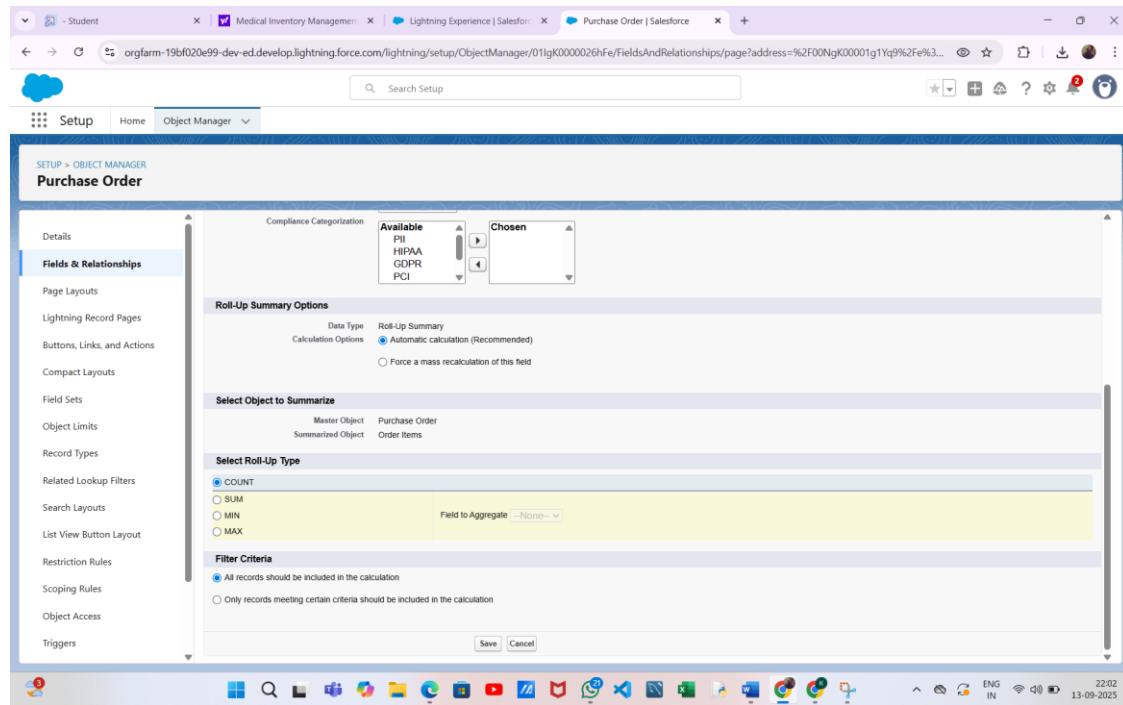
## Created Lookup Relationship in Purchase Order Object



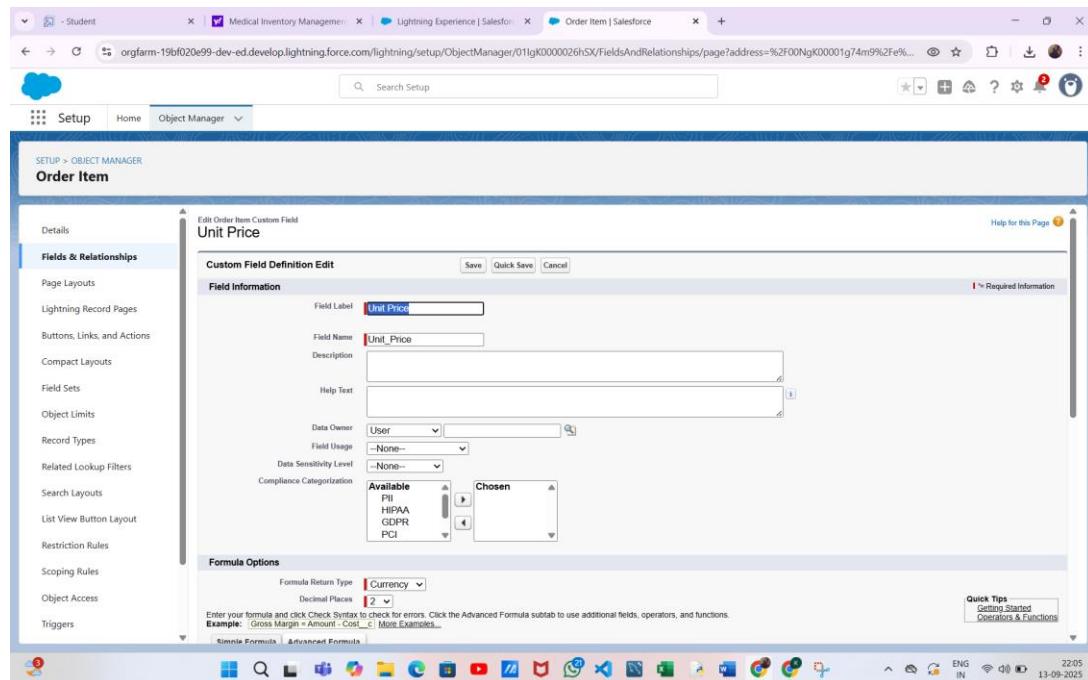
## Created a Date Field in Purchase Order object



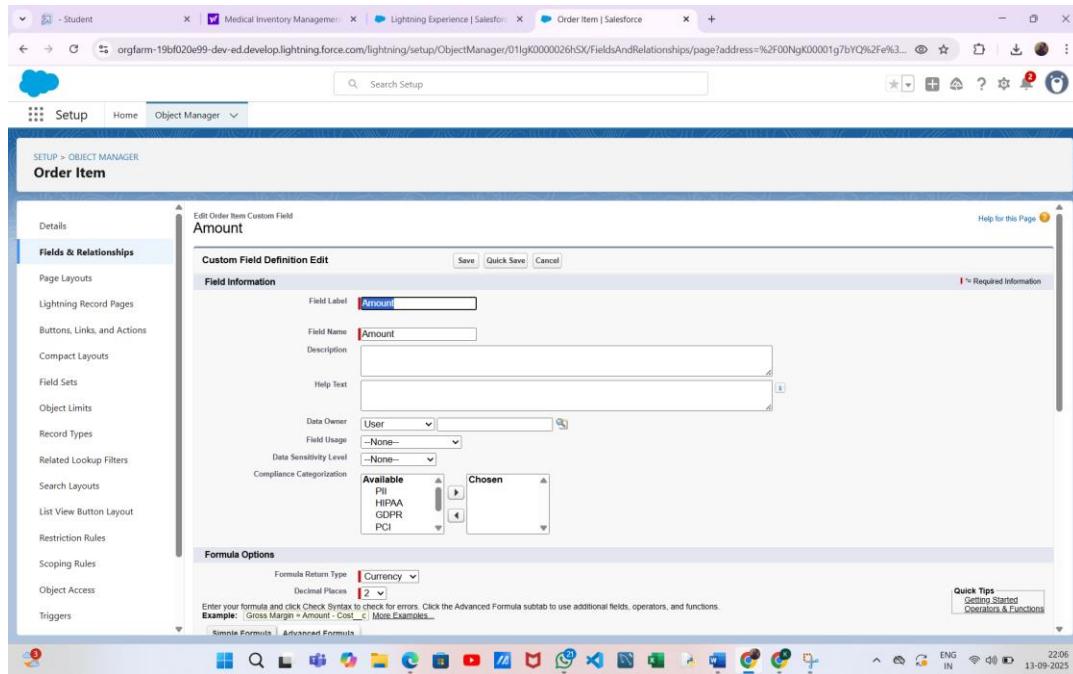
## Created a Roll-Up Summary Field in Purchase Order object



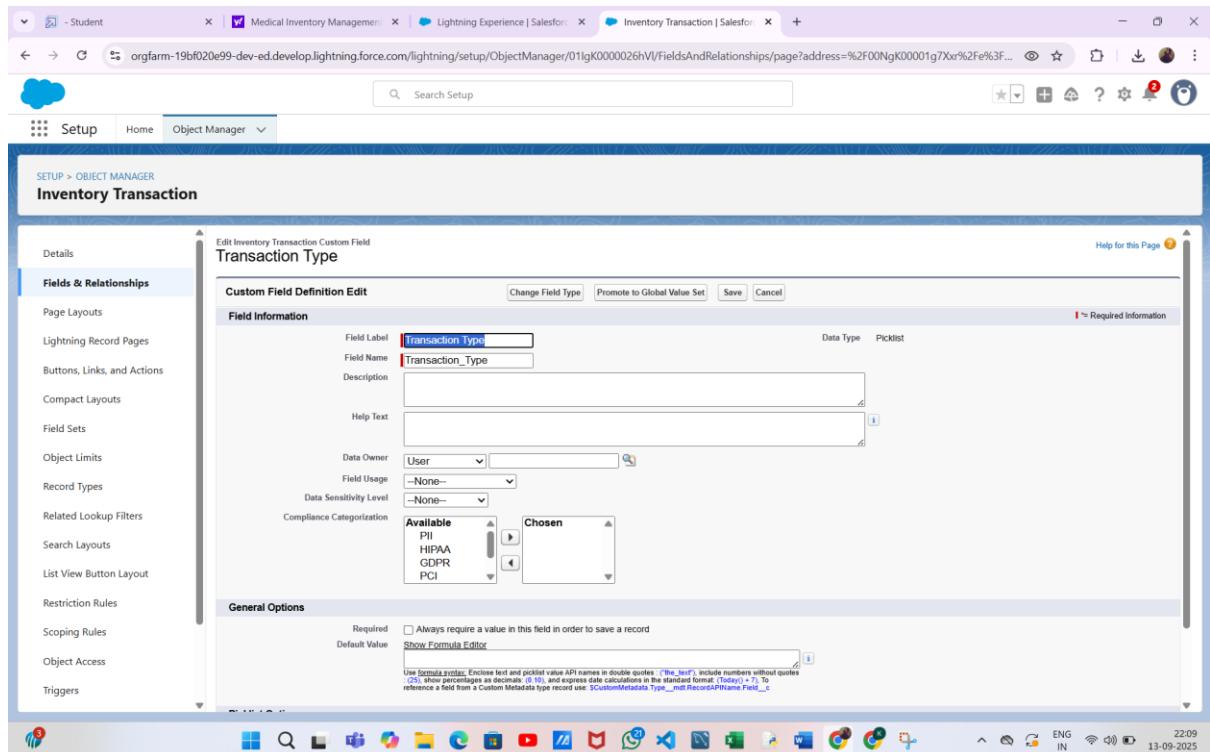
## Created a Unit Price Formula Field in Order Item object



## Created a Amount Formula Field in Order Item object



## Created a Picklist Field in Inventory Transaction Object



## Created a Total Order Cost Formula Field in Inventory Transaction object

The screenshot shows the Salesforce Setup interface with the following details:

- Page Header:** Student, Medical Inventory Management, Lightning Experience | Salesforce, Inventory Transaction | Salesforce.
- Section:** SETUP > OBJECT MANAGER
- Object:** Inventory Transaction
- Form:** Edit Inventory Transaction Custom Field **Total Order Cost**.
- Field Information:**
  - Field Label: Total Order Cost
  - Field Name: Total\_Order\_Cost
  - Description: (empty)
  - Help Text: (empty)
  - Data Owner: User
  - Field Usage: None
  - Data Sensitivity Level: None
  - Compliance Categorization:
    - Available: PII, HIPAA, GDPR, PCI
    - Chosen: None
- Formula Options:**
  - Formula Return Type: Currency
  - Decimal Places: 2
  - Formula Syntax Examples:
    - Gross Margin = Amount - Cost\_c
    - More Examples...
- Buttons:** Save, Quick Save, Cancel.
- Help:** Help for this Page, Quick Tips (Getting Started, Operators & Functions).
- System Status:** ENG IN, 22:11, 13-09-2025.

## Created a Phone Field in Supplier object

The screenshot shows the Salesforce Setup interface with the following details:

- Page Header:** Student, Medical Inventory Management, Lightning Experience | Salesforce, Supplier objects | Salesforce.
- Section:** SETUP > OBJECT MANAGER
- Object:** Supplier objects
- Form:** Edit Supplier objects Custom Field **Phone Number**.
- Field Information:**
  - Field Label: Phone Number
  - Field Name: Phone\_Number
  - Description: (empty)
  - Help Text: (empty)
  - Data Owner: User
  - Field Usage: None
  - Data Sensitivity Level: None
  - Compliance Categorization:
    - Available: PII, HIPAA, GDPR, PCI
    - Chosen: None
- General Options:**
  - Required:  Always require a value in this field in order to save a record
  - Default Value: Show Formula Editor
  - Formula Syntax Examples:
    - Excuse text and picklist value API names in double quotes ("The\_Text"), include numbers without quotes (25), show percentages as decimals (0.15), and express date calculations in the standard format ('Today') + 7. To reference a field from a Custom Metadata type record use: \$CustomMetadataType\_\_RecordName.FieldName\_\_c
- Buttons:** Change Field Type, Save, Cancel.
- Help:** Help for this Page, Quick Tips (Getting Started, Operators & Functions).
- System Status:** ENG IN, 22:11, 13-09-2025.

## Created an Email Field in Supplier object

The screenshot shows the Salesforce Setup interface. The left sidebar is titled 'SUPSET > OBJECT MANAGER' and lists various options under 'Supplier objects'. The main area is titled 'Edit Supplier objects Custom Field Email'. The 'Field Information' section contains the following details:

- Field Label:** Email
- Field Name:** Email
- Description:** (empty)
- Help Text:** (empty)
- Data Owner:** User
- Field Usage:** None
- Data Sensitivity Level:** None
- Compliance Categorization:** Available (PII, HIPAA, GDPR, PCI) and Chosen

The 'General Options' section includes checkboxes for Required, Unique, External ID, and Default Value, along with a formula editor field.

## Edited a Page Layout in Product Object

The screenshot shows the Salesforce Setup interface. The left sidebar is titled 'SUPSET > OBJECT MANAGER' and lists various options under 'Product'. The main area is titled 'Product Layout'. The 'Fields' section displays a list of fields: Buttons, Quick Actions, Mobile & Lightning Actions, Expanded Lookups, Related Lists, Report Charts, Section, Last Modified By, Product Name, Blank Space, Owner, Unit Price, Created By, Product Description, Current Stock Level, and Product ID. The 'Product Sample' section contains a highlights panel, quick actions, and salesforce mobile and lightning experience actions. The 'Product Detail' section shows standard buttons for Edit, Delete, Clone, Change Owner, Change Record Type, Printable View, Sharing, Sharing Hierarchy, Edit Labels, and Custom Buttons.

## Edited a Page Layout in Purchase Order Object

The screenshot shows the Salesforce Setup interface for editing a page layout. The top navigation bar includes tabs for Student, Medical Inventory Management, Lightning Experience, and Purchase Order. The main title is "Purchase Order". The left sidebar has a "Page Layouts" section selected. The central area displays the "Purchase Order Layout" configuration screen. It features a "Fields" section with a table containing fields like Order Date, Supplier ID, Last Modified By, Purchase Order ID, Total Order Cost, and others. Below this is a "Purchase Order Sample" section with panels for "Highlights Panel" and "Quick Actions in the Salesforce Classic Publisher". At the bottom is a "Purchase Order Detail" section with standard buttons like Edit, Delete, Clone, Change Owner, Change Record Type, Printable View, and Edit Labels.

## Edited a Page Layout in Order Item Object

The screenshot shows the Salesforce Setup interface for editing a page layout. The top navigation bar includes tabs for Student, Medical Inventory Management, Lightning Experience, and Order Item. The main title is "Order Item". The left sidebar has a "Page Layouts" section selected. The central area displays the "Order Item Layout" configuration screen. It features a "Fields" section with a table containing fields like Purchase Order, Unit Price, Last Modified By, Order Item ID, Purchase Order ID, Amount, Order Item Name, Quantity Ordered, Created By, Product\_ID, and Quantity Received. Below this is a "Order Item Sample" section with panels for "Highlights Panel" and "Quick Actions in the Salesforce Classic Publisher". At the bottom is an "Order Item Detail" section with standard buttons like Edit, Delete, Clone, Change Owner, Change Record Type, Printable View, and Edit Labels.

## Edited a Page Layout in Inventory Transaction Object

The screenshot shows the Salesforce Setup interface for the 'Inventory Transaction' object. The left sidebar navigation bar includes 'Details', 'Fields & Relationships', 'Page Layouts' (which is selected), 'Lightning Record Pages', 'Buttons, Links, and Actions', 'Compact Layouts', 'Field Sets', 'Object Limits', 'Record Types', 'Related Lookup Filters', 'Search Layouts', 'List View Button Layout', 'Restriction Rules', 'Scoping Rules', 'Object Access', and 'Triggers'. The main content area displays the 'Inventory Transaction Layout' configuration screen. It features a 'Fields' section with a table containing fields like 'Section', 'Blank Space', 'Created By', 'Owner', 'Last Modified By', 'Transaction Date', 'Purchase Order ID', and 'Transaction Type'. Below this is a 'Highlights Panel' and a 'Quick Actions in the Salesforce Classic Publisher' section. At the bottom is a 'Supplier objects Detail' section with standard buttons for Edit, Delete, Clone, Change Owner, Change Record Type, Printable View, Sharing, Sharing Hierarchy, and Edit Labels.

## Edited a Page Layout in Supplier Object

The screenshot shows the Salesforce Setup interface for the 'Supplier objects' object. The left sidebar navigation bar includes 'Details', 'Fields & Relationships', 'Page Layouts' (which is selected), 'Lightning Record Pages', 'Buttons, Links, and Actions', 'Compact Layouts', 'Field Sets', 'Object Limits', 'Record Types', 'Related Lookup Filters', 'Search Layouts', 'List View Button Layout', 'Restriction Rules', 'Scoping Rules', 'Object Access', and 'Triggers'. The main content area displays the 'Supplier objects Layout' configuration screen. It features a 'Fields' section with a table containing fields like 'Section', 'Blank Space', 'Address', 'Contact Person', 'Created By', 'Email', 'Last Modified By', 'Phone Number', 'Supplier ID', 'Supplier Name', and 'Supplier objects ...'. Below this is a 'Highlights Panel' and a 'Quick Actions in the Salesforce Classic Publisher' section. At the bottom is a 'Supplier objects Detail' section with standard buttons for Edit, Delete, Clone, Change Owner, Change Record Type, Printable View, Sharing, Sharing Hierarchy, and Edit Labels.

## Created a Compact Layout to a Product Object

The screenshot shows the Salesforce Setup interface for creating a compact layout for the Product object. The left sidebar lists various setup categories, and the main area displays the 'Edit Product Compact Layout' page. The 'Label' field is set to 'Product Compact Layout' and the 'Name' field is set to 'Product\_Compact\_Layout'. The 'Select Compact Layout Fields' section shows fields being moved from the 'Available Fields' list to the 'Selected Fields' list. The 'Available Fields' list includes: Created By, Last Modified By, Owner, Product ID, Current Stock Level, Product Name, and Unit Price. The 'Selected Fields' list currently contains: Current Stock Level, Product Name, and Unit Price. Navigation icons at the bottom indicate the page is on step 1 of 1.

## Created a Compact Layout to a Purchase Order Object

The screenshot shows the Salesforce Setup interface for creating a compact layout for the Purchase Order object. The left sidebar lists various setup categories, and the main area displays the 'Edit Purchase Order Compact Layout' page. The 'Label' field is set to 'Purchase Order Compact L' and the 'Name' field is set to 'Purchase\_Order\_Compact\_L'. The 'Select Compact Layout Fields' section shows fields being moved from the 'Available Fields' list to the 'Selected Fields' list. The 'Available Fields' list includes: Actual Delivery Date, Created By, Expected Delivery Date, Last Modified By, Order Count, Order Counts, Purchase Order ID, and Purchase Order Name. The 'Selected Fields' list currently contains: Purchases Order ID, Order Date, Total Order Cost, and Supplier ID. Navigation icons at the bottom indicate the page is on step 1 of 1.

## Created an Expected Delivery Date Validation rule to an Employee Object

The screenshot shows the Salesforce Setup interface for the Purchase Order object. On the left, a sidebar lists various configuration options like Details, Fields & Relationships, Page Layouts, and Triggers. The main area is titled "Purchase Order Validation Rule" and contains a "Validation Rule Edit" form. The "Role Name" field is set to "Expected\_Delivery\_Date\_Validation". The "Active" checkbox is checked. The "Error Condition Formula" field contains the formula "(Expected\_Delivery\_Date\_\_c - Order\_Date\_\_c) > 7". A dropdown menu for functions is open, showing options like ABS, ACOS, ADDMONTHS, AND, ASCII, ASIN, etc. The status bar at the bottom right shows the date as 13-09-2025 and the time as 22:24.

## Created an Inventory Manager Profile

The screenshot shows the Salesforce Setup interface for Profiles. The left sidebar includes sections for Hyperforce Assistant, Users (with "Profiles" selected), Data, Feature Settings, Marketing, Sales, and Products. The main area is titled "Inventory Manager" and displays "Profile Detail" for the "Inventory Manager" profile. The profile has "Name" set to "Inventory Manager", "User License" as "Salesforce", and was created by "Govt.M" on "9/10/2025, 10:26 PM". It was modified by "Govt.M" on "9/12/2025, 1:59 AM". The "Page Layouts" section shows assignments for various standard object layouts like Global, Email Application, Home Page Layout, Account, Alternative Payment Method, Appointment Invitation, Asset, and Asset Action. The status bar at the bottom right shows the date as 13-09-2025 and the time as 22:30.

## Created a Purchase Manager Profile

The screenshot shows the Salesforce Setup interface for managing Profiles. On the left, a sidebar lists various categories like Users, Feature Settings, and Sales. The main content area is titled 'Purchase Manager' under the 'Profiles' section. It displays the profile's name, 'Purchase Manager', and its user license, 'Salesforce'. The 'Profile Detail' section includes fields for Description and Created By (Gowri M.). Below this, the 'Page Layouts' section shows how the Purchase Manager profile is assigned to various standard object layouts across different objects like Global, Email Application, Home Page Layout, Account, Alternative Payment Method, Appointment Invitation, Asset, and Asset Action. The status bar at the bottom indicates the date as 13-09-2025 and the time as 22:31.

## Created a Purchasing Manager Role

The screenshot shows the Salesforce Setup interface for managing Roles. The sidebar on the left shows categories like Users, Feature Settings, and Service. The main content area is titled 'Purchasing Manager' under the 'Roles' section. It lists the users assigned to this role, including 'Gowri M.' and 'SVP\_Sales & Marketing'. The 'Role Detail' section provides information about the role, such as its label ('Purchasing Manager'), reporting to 'SVP\_Sales & Marketing', and being modified by 'Gowri M.' on 9/10/2025. It also specifies 'Opportunity Access' and 'Case Access' for users in this role. The status bar at the bottom indicates the date as 13-09-2025 and the time as 22:35.

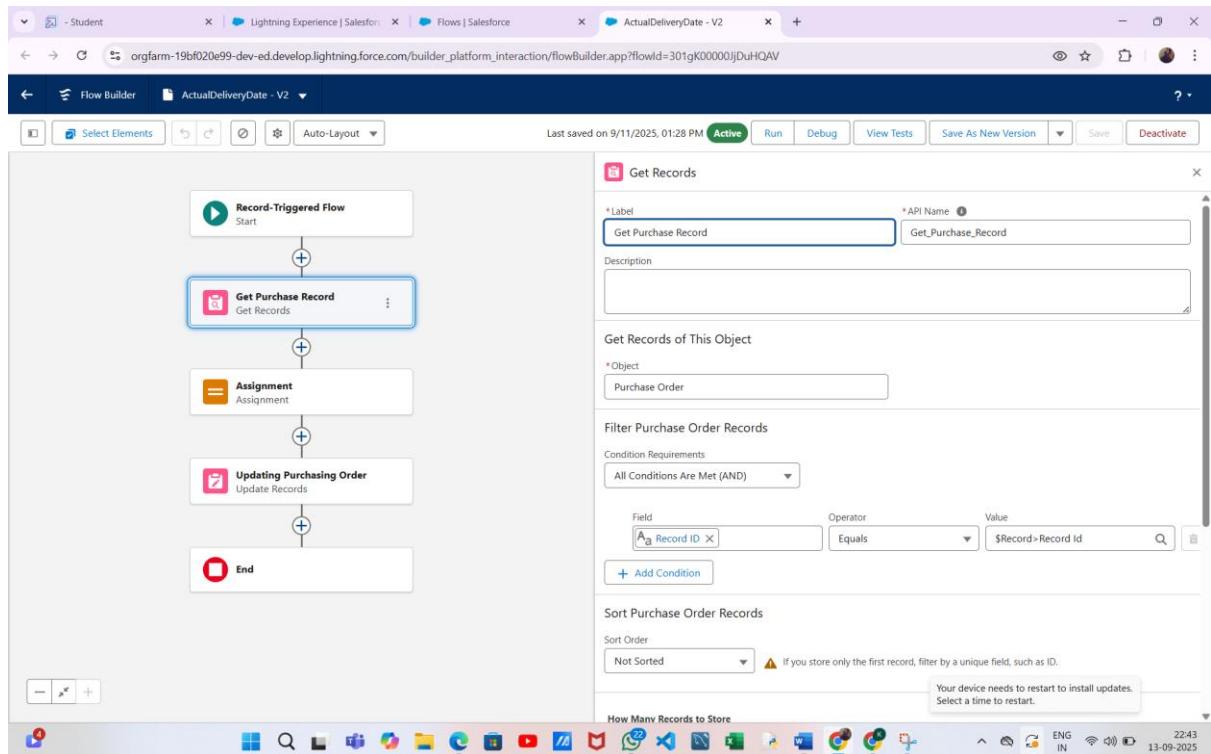
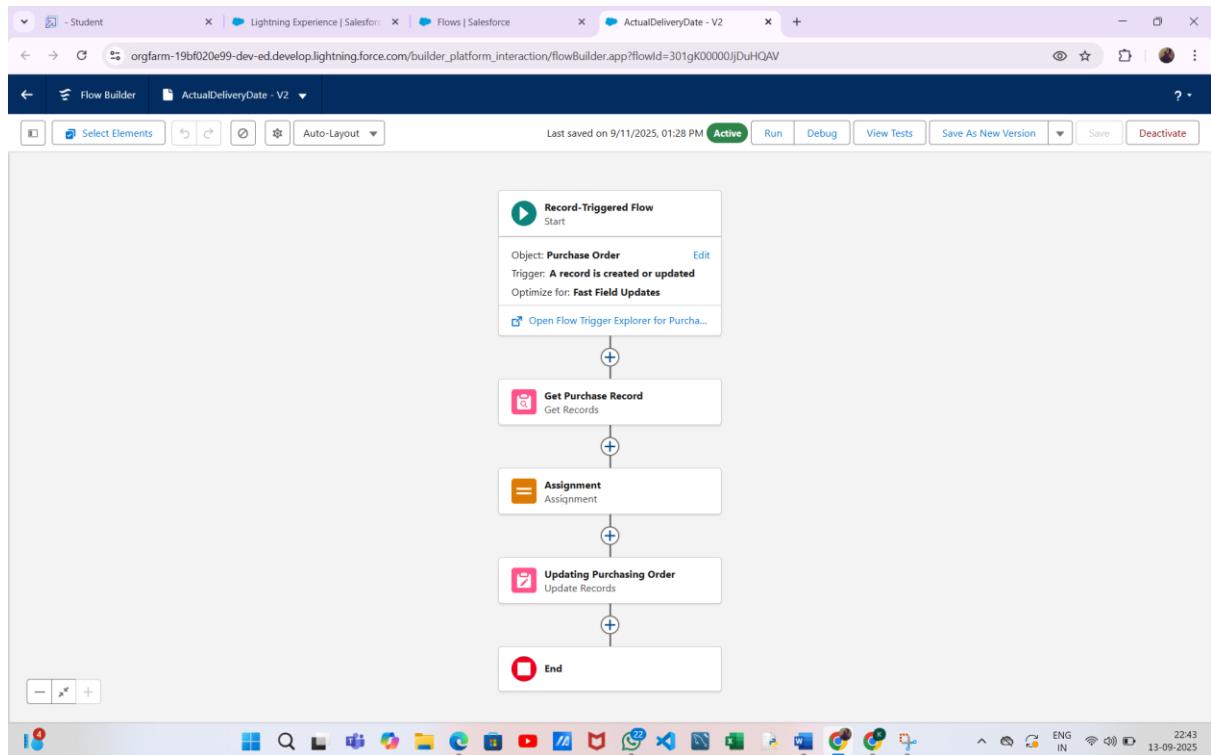
## Created an Inventory Manager Role

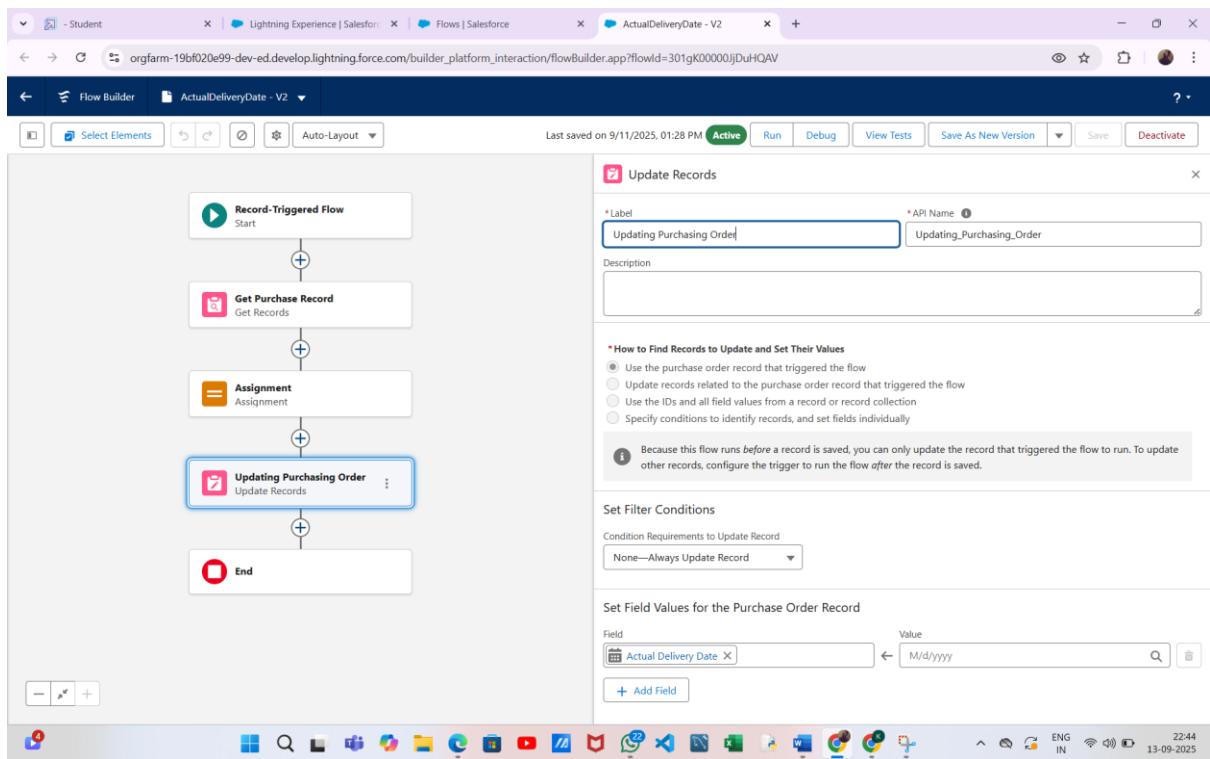
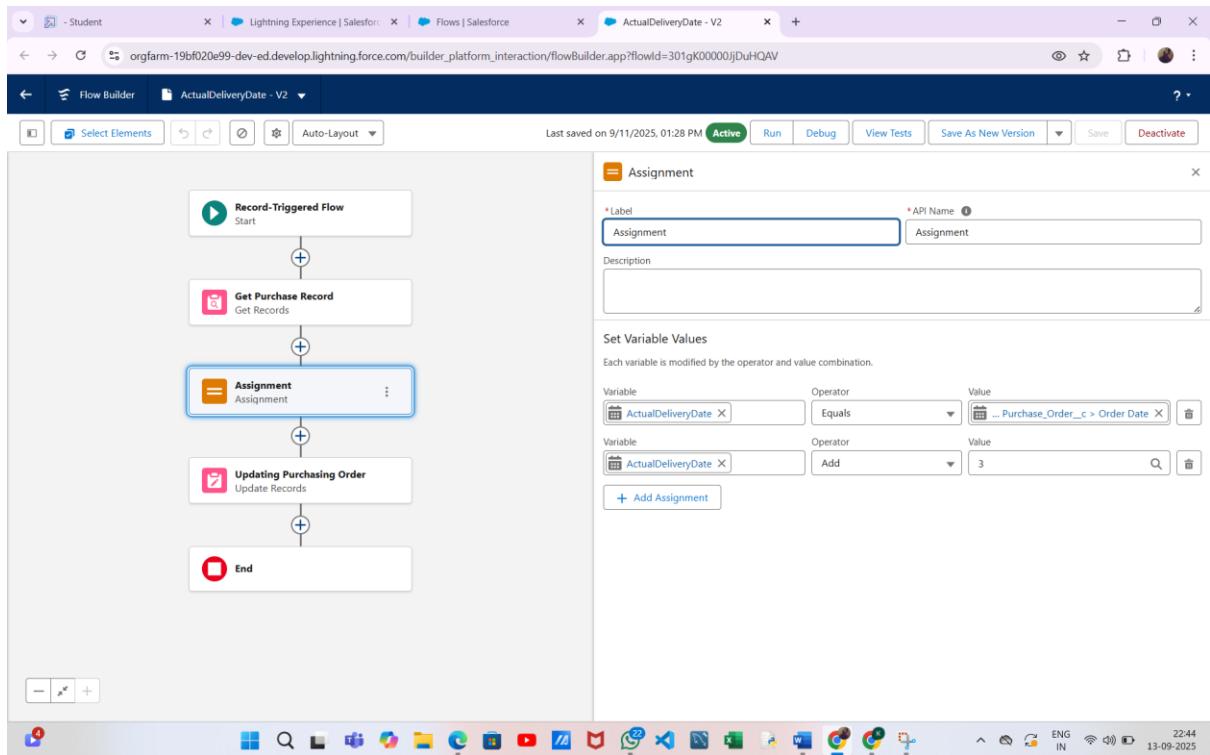
The screenshot shows the Salesforce Setup interface for creating a new role. The left sidebar navigation includes 'Users' (selected), 'Feature Settings', 'Service', 'Case Teams', and 'Contact Roles'. The main content area is titled 'Role' and 'Inventory Manager'. It displays the role's hierarchy (SKACAS > CEO > SVP\_Sales & Marketing > Inventory Manager) and its siblings (VP\_North American Sales, VP\_Marketing, VP\_International Sales, Purchasing Manager). The 'Role Detail' section shows the label 'Inventory Manager', which reports to 'SVP\_Sales & Marketing'. The 'Role Name' is 'Inventory\_Manager'. The 'Sharing Groups' field is set to 'Role, Role and Internal Subordinates'. The 'Role Detail' table also lists 'Opportunity Access' and 'Case Access' permissions. Below this is a section titled 'Users in Inventory Manager Role' with a note 'No records to display'. The bottom status bar shows system information like battery level, network, and date/time.

## Created a Permission Set

The screenshot shows the Salesforce Setup interface for creating a new permission set. The left sidebar navigation includes 'Users' (selected), 'Permission Set Groups', 'Custom Code', and 'Custom Permissions'. The main content area is titled 'Permission Sets' and shows a permission set named 'Purchase Manager'. The 'Permission Set Overview' section provides details such as API Name ('Purchase\_Manager'), Namespace Prefix (''), Created By ('Gowri M.'), and Last Modified By ('Gowri M.'). The 'Apps' section contains several configuration sections: 'Assigned Apps', 'Assigned Connected Apps', 'Object Settings', 'App Permissions', 'Apex Class Access', 'Visualforce Page Access', 'External Data Source Access', 'Flow Access', and 'Named Credential Access'. The bottom status bar shows system information like battery level, network, and date/time.

## Created Flow to update the Actual Delivery Date





## Created a Trigger to Calculate total amount on Order Item

The screenshot shows the Salesforce Developer Console interface. At the top, the URL is orgfarm-19bf020e99-dev-ed.develop.my.salesforce.com/\_ui/common/apex/debug/ApexCSIPage. The menu bar includes File, Edit, Debug, Test, Workspace, Help, and a back/forward button.

In the center, there is an "Open" dialog box titled "Entity Type". It lists various entity types: Classes, Triggers, Pages, Page Components, Objects, Static Resources, and Packages. Under "Triggers", the "CalculateTotalAmountTrigger" is selected. To the right of the dialog, a "Related" section shows relationships between the trigger and the "Order\_Item\_\_c" object, specifically "Order Item..." and "CalculateTotalAmountHandler". Below the dialog are buttons for "Open", "Filter", "Refresh", and checkboxes for "Hide Managed Packages".

Below the dialog is a toolbar with tabs: Logs, Tests, Checkpoints, Query Editor, View State, Progress, and Problems. The "Logs" tab is active. The logs table has columns for User, Application, Operation, Time, Status, Read, and Size. There are no entries in the log table.

At the bottom of the screen is a taskbar with icons for various Windows applications like File Explorer, Task Manager, and Control Panel. The system tray shows the date and time as 13-09-2025 and 22:51.

The screenshot shows the Apex code editor with the file "CalculateTotalAmountTrigger.apex" open. The code is as follows:

```
1 trigger CalculateTotalAmountTrigger on Order_Item__c (after insert, after update, after delete, after undelete) {
2     // Call the handler class to handle the logic
3     CalculateTotalAmountHandler.calculateTotal(Trigger.new, Trigger.old, Trigger.isInsert, Trigger.isUpdate, Trigger.isDelete, Trigger.isUndelete)
4 }
5
6
7
8
9
10
11 Step 4:
12 i) In the Developer Console window, go to the top menu and click on "File".
13
14
15
16 ii)Select New: From the dropdown menu under "File", select "New".
17
18
19
20 iii)Choose Apex Class: Name it as CalculateTotalAmountHandler
21
22
23
24
```

The code editor has a toolbar with tabs: Logs, Tests, Checkpoints, Query Editor, View State, Progress, and Problems. The "Logs" tab is active. The logs table has columns for User, Application, Operation, Time, Status, Read, and Size. There are no entries in the log table.

At the bottom of the screen is a taskbar with icons for various Windows applications like File Explorer, Task Manager, and Control Panel. The system tray shows the date and time as 13-09-2025 and 22:52.

## Created a Purchase Orders based on Suppliers (Summary) Report

The screenshot shows a report titled "Purchase Orders based on Suppliers". The top navigation bar includes "Medical Inventory ...", "Products", "Purchase Orders", "Order Items", "Inventory Transactions", "Suppliers", "Reports", and "Dashboards". The report interface has a search bar and various toolbar icons. The main content area displays a summary table with columns: Supplier ID, Purchase Order ID, Order Count, and Total Order Cost. The table shows data for two suppliers: Supplier 001 (4) and Supplier 002 (1), with a total of 14 orders and a total cost of \$26,325.00.

Supplier ID	Purchase Order ID	Order Count	Total Order Cost
Supplier 001 (4)	Purchase-0001 (1)	3	\$2,075.00
	Purchase-0002 (1)	2	\$5,250.00
	Purchase-0003 (1)	3	\$7,500.00
	Purchase-0004 (1)	4	\$9,500.00
Supplier 002 (1)	Purchase-0005 (1)	2	\$4,500.00
<b>Total (1)</b>		<b>14</b>	<b>\$26,325.00</b>

## Created a Complete Purchase Details Report

The screenshot shows a report titled "Complete Purchase Details Report". The top navigation bar includes "Medical Inventory ...", "Products", "Purchase Orders", "Order Items", "Inventory Transactions", "Suppliers", "Reports", and "Dashboards". The report interface features a sidebar for "Filters" and "Columns". The main content area displays a detailed grid of purchase items. The grid includes columns for Supplier ID, Actual Delivery Date, Purchase Order ID, Product ID, Product Name, Quantity Received, and Amount. The data is grouped by Supplier ID and Actual Delivery Date, with subtotals for each group. A red box highlights the "Update Preview Automatically" checkbox in the top right corner of the grid area.

## Created Dashboard

Add Widget

Title: Purchase Orders based on Suppliers

Subtitle:

Footer:

Legend Position: Right

Widget Theme: Dark (selected)

Preview:

Purchase Orders based on Suppliers

Sum of Total Order Cost

₹26k

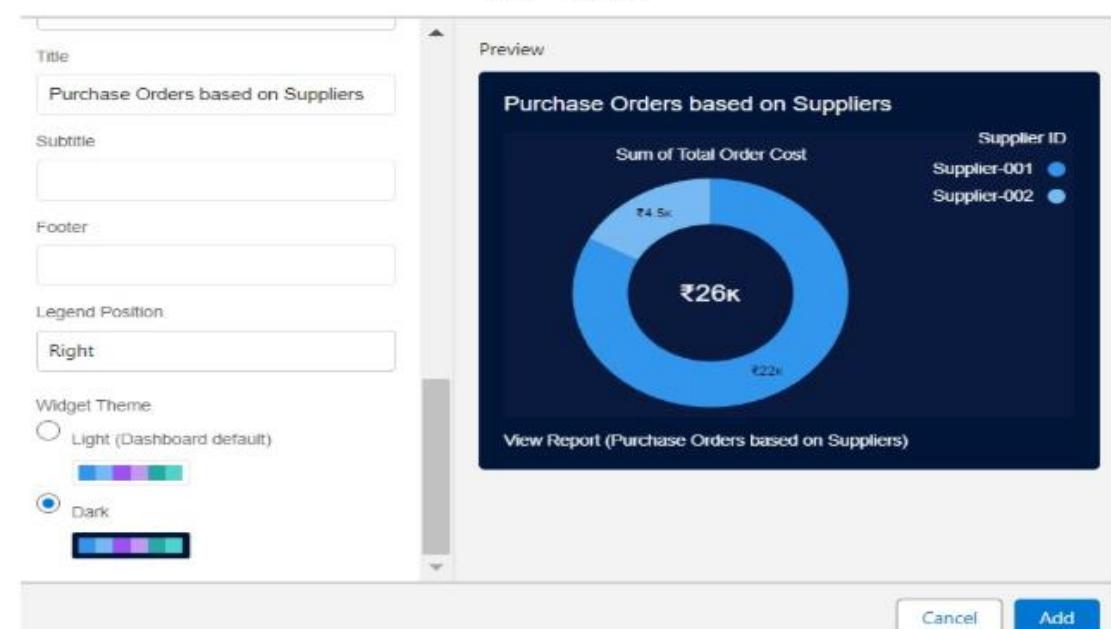
Supplier ID

Supplier-001

Supplier-002

View Report (Purchase Orders based on Suppliers)

Cancel Add



## View Dashboard

Medical Inventory ... Products Purchase Orders Order Items Inventory Transactions Suppliers Reports Dashboards

Dashboard MEDICAL INVENTORY DASHBOARD As of 08-04-2024, 12:10 pm (Viewed by Anupama Gururaj)

Purchase Orders based on Suppliers

Sum of Total Order Cost

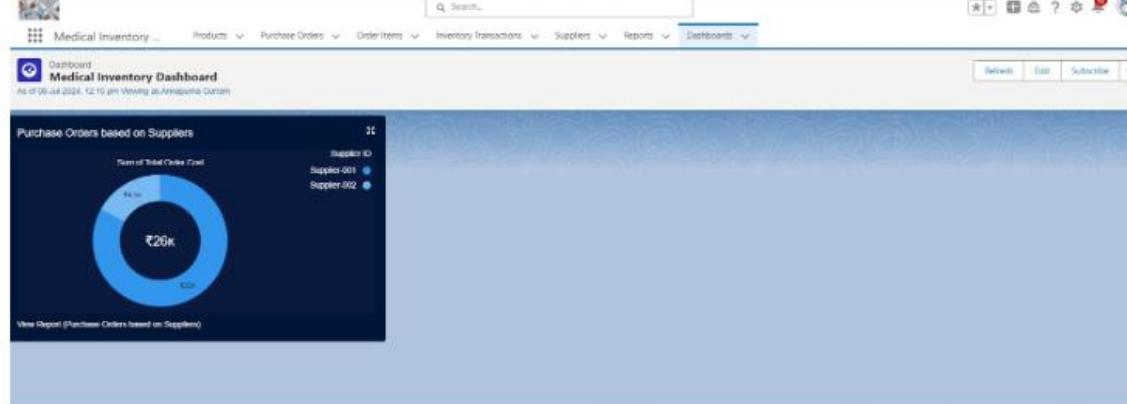
₹26k

Supplier ID

Supplier-001

Supplier-002

View Report (Purchase Orders based on Suppliers)



**THANK YOU**