

A CRM APPLICATION FOR LAPTOP RENTALS

Project Overview:

This project is centered around the development of a CRM solution using Salesforce for managing laptop rentals. The application aims to streamline the rental process, ensuring accurate inventory tracking, efficient customer management, and timely reporting. By leveraging Salesforce, this solution will enhance operational efficiency, improve data accuracy, and optimize user experience.

Objectives

Business Goals:

- **Increase Efficiency:** Streamline the laptop rental process by reducing manual handling and automating key workflows.
- **Improve Customer Experience:** Provide seamless customer interaction and support, including tracking rentals and maintenance.
- **Data Accuracy and Reporting:** Maintain accurate records of inventory, rentals, and returns, and generate insightful reports for strategic decision-making.

Specific Outcomes:

- **Inventory Management:** Track laptop availability, rental status, and maintenance requirements.
- **Customer Management:** Manage customer data, including rental history, preferences, and support requests.
- **Automated Notifications:** Send reminders for booking and maintenance schedules.
- **Reporting:** Generate real-time reports on booking trends, inventory status, and customer satisfaction metrics.

Salesforce Key Features and Concepts Utilized

- **Salesforce Object Model:** Custom objects for managing total laptops, consumers, laptop Bookings and Billing Process.
- **Automation:** Validation Rules, and Flows to automate notifications and updates.
- **Reports and Dashboards:** Customized reports and dashboards to track KPIs, booking history, and inventory status.
- **Security:** User profiles, users, roles, and hierarchy to ensure data security and compliance.

Detailed Steps to Solution Design:

Task -1: Salesforce Account Creation and activation

The steps involved in salesforce account creation and activation process are as follows:

1. Creating a developer org in salesforce.
2. Go to <https://developer.salesforce.com/signup>

3. On the sign up form, enter the following details :
 - i. First name & Last name
 - ii. Email
 - iii. Role : Developer
 - iv. Company : College Name
 - v. County : India
 - vi. Postal Code : pin code
 - vii. Username:username@organization.com
4. Click on sign me up after filling these.
5. Go to the inbox of the email that you used while signing up. Click on the verify account to activate your account. The email may take 5-10mins
6. Click on Verify Account.
7. Give a password and answer a security question and click on change password.
8. Then you will redirect to your salesforce setup page.

Task-2: Object Creation

Follow the following procedure to create Total Laptops,consumer,Laptop Bookings,Billing process objects.

To create an object:

1. From the setup page >> Click on Object Manager >> Click on Create >> Click on Custom Object.
2. On Custom object defining page:
3. Enter the respective label name, plural label name, record name,datatype and click on Allow reports, Allow search and track field history.
4. Click on Save.

Task-3: Tab Creation

1. Go to setup page >> Type Tabs in Quick Find bar >> click on tabs >> New (under custom object tab)
2. Select Object(Total Laptops) >> Select the tab style >> Next (Add to profiles page) keep it as default >> Next (Add to Custom App) uncheck the include tab .
3. Make sure that the Append tab to users' existing personal customizations is checked.
4. Click save.

Task-4: The Lightning App Creation

To create a lightning app page:

1. Go to setup page >> search “app manager” in quick find >> select “app manager” >> click on New lightning App.
2. Fill the app name in app details as LAPTOP RENTALS >>Next >> (App option page) keep it as default >> Next >> (Utility Items) keep it as default >> Next.
3. Upload a photo that is related to your app.
4. To Add Navigation Items:
5. Select the items (Total Laptops,consumer,Laptop Booking,Billing Process) from the search bar and move it using the arrow button >> Next.
6. To Add User Profiles:Search profiles (System administrator) in the search bar >> click on the arrow button >> save & finish.

Task-5: Fields Creation in Different Objects

5.1: Creating the field in consumer object

5.1.1: To create field in an object:

1. Go to setup >> click on Object Manager >> type object name(consumer) in search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Phone”
4. Click on next
5. Fill them as following:
 - Field Label: Phone number
 - Field Name : gets auto generated
 - Click the required option checkbox.
 - Click on Next >> Next >> Save and new.

5.1.2 :To create another fields in an object:

1. Go to setup >> click on Object Manager >> type object name(consumer) in search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data type as a “Email” and Click on Next
4. Fill them as following:
 - Field Label: Email
 - Field Name :It’s gets auto generated
 - Click on Next >> Next >> Save and new.

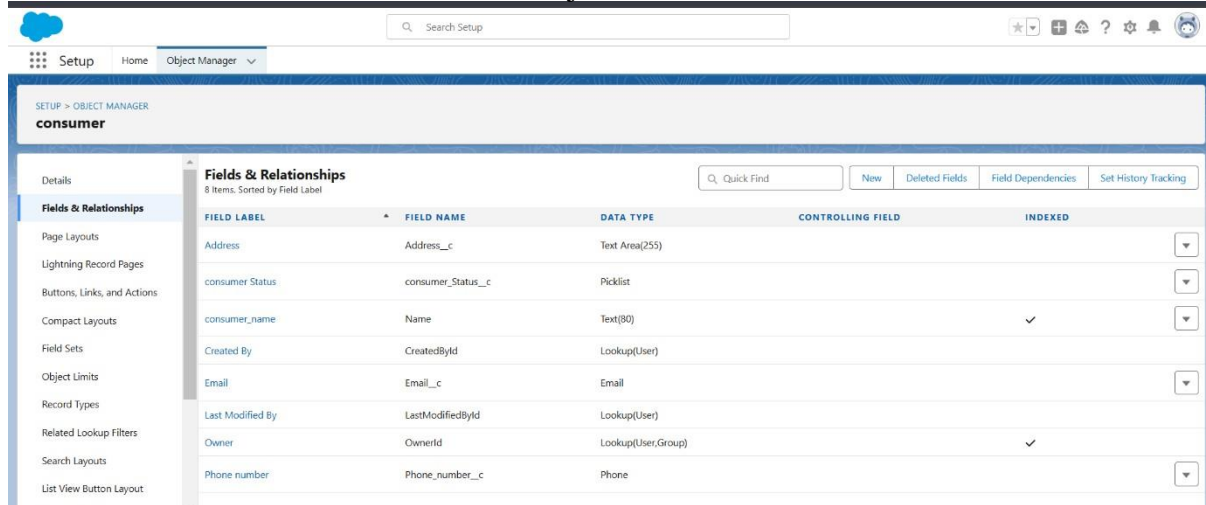
5.1.3 : To create another fields in an object:

1. Go to setup >> click on Object Manager >> type object name(consumer) in search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data type as a “Text Area” and Click on Next
4. Fill the Above as following:
 - Field Label: Address
 - Field Name : It’s gets auto generated
1. Select Required field.
2. Click on Next >> Next >> Save and new.

5.1.4 : To create another fields in an object:

1. Go to setup >> click on Object Manager >> type object name(consumer) in search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data type as a “Picklist” and Click on Next
4. Fill the Above as following:
 - Field Label: consumer Status
 - Value - Select enter values with each value separated by a new line
 - Student
 - Employee
 - Others
5. Select required
6. Field Name :It’s gets auto generated
7. Click on Next >> Next >> Save and new.

These are the fields created in consumer Object:



FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Address	Address__c	Text Area(255)		
consumer Status	consumer_Status__c	Picklist		
consumer_name	Name	Text(80)		✓
Created By	CreatedById	Lookup(User)		
Email	Email__c	Email		
Last Modified By	LastModifiedById	Lookup(User)		
Owner	OwnerId	Lookup(User,Group)		✓
Phone number	Phone_number__c	Phone		

5.2: Creating the field in Laptops Bookings object

5.2.1: To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Picklist”
4. Picklist values are:-1.Dell 2. Acer 3.Hp 4.Mac
5. Select required
6. Click on Next >> Next >> Save and new

5.2.2 : To Create a Fields & Relationship to an Laptop Booking Object

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Picklist”
4. Picklist values are:-1.core i3 2. Core i5 3. Core i7 .
5. Select required
6. Click on Next >> Next >> Save and new

5.2.3 : To create fields & relationship to an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Click field dependency and next
3. Click the include value for dell-core i3,i5,i7 and for acer i3,i4,i5 and for hp i3,i4,i5 and also for mac bionic chip include the values for it.
4. Click save.

5.2.4 : To create fields & relationship to an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Lookup Relationship”
4. Click on Next
5. Click on the Related to drop down and Select the “consumer” object and click on Next
6. Fill them as following:
 - Change the Field Label: Name

- Field Name :It's gets auto generated
7. Click on Next >> Next >> Save and new.

5.2.5 : To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on "Fields & Relationships" >> New
3. Select Data Type as a "Currency"
4. Click on Next
5. Fill them as following:
 - Field Label: Amount
 - Length: (18,0)
 - Field Name :It's gets auto generated
6. Click on Next >> Next >> Save and new

5.2.6 : To Create a Fields & Relationship to an Object

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on "Fields & Relationships" >> New
3. Select Data Type as a "Lookup Relationship"
4. Click on Next
5. Click on the Related to drop down and Select the "Total Laptops" object and click on Next
6. Fill them as following:
 - Change the Field Label: Total No Of Laptops
 - Field Name :It's gets auto generated
1. Click on Next >> Next >> Save and new.

5.2.7 : To Create a Fields & Relationship to an Laptop Booking Object

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on "Fields & Relationships" >> New
3. Select Data Type as a "Email"
4. Click on Next and save it.

NOTE:- fill the records which you have created in consumer and laptop bookings and give relations also. After saving the records go to the laptop bookings object and edit lookup to master the detailed relationship.

5.2.8 : To Create a Rollup Summary Field in “Total Laptops Object”

1. After Creating the Lookup Relationship Than Only you can create the Rollup Summary
2. Go to setup >> click on Object Manager >> type object name(Total Laptops) in the search bar >> click on the object.
3. Now click on “Fields & Relationships” >> New
4. Select Data type as a “Roll-up Summary” and Click on Next
1. Fill the Above as following:
 - Field Label: Laptops delivered
 - Field Name :It’s gets auto generated
6. Click on Next
7. Select the Laptop Bookings in the Summarized Object
8. Select the count Radio button in the select Roll-up Type

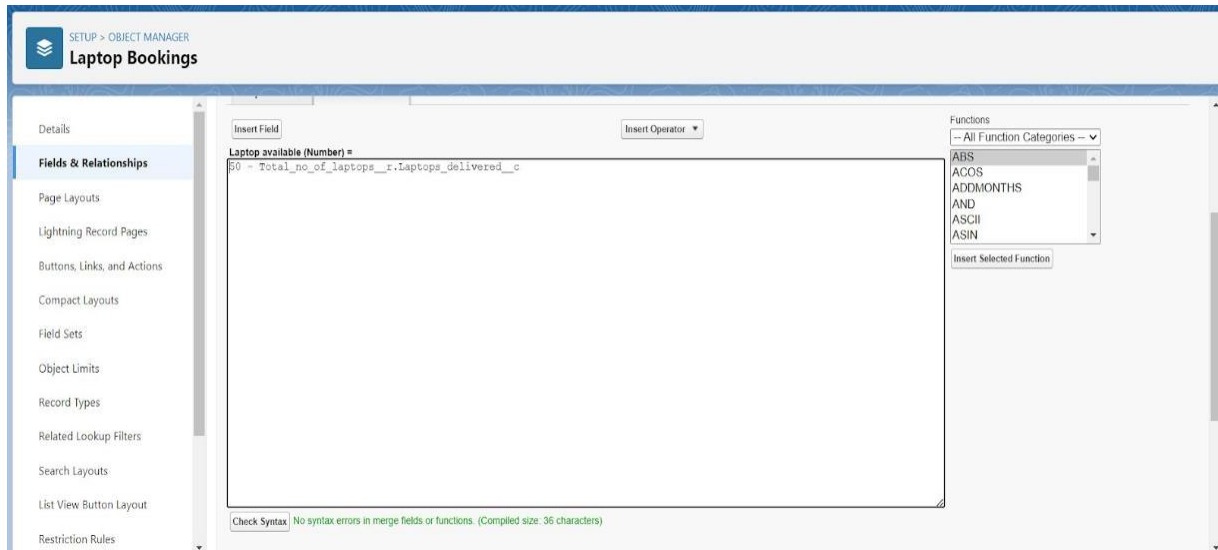
The screenshot shows the 'New Custom Field' wizard for the 'Total laptops' object, specifically Step 3: Define the summary calculation. The wizard is titled 'Total laptops' and 'New Custom Field'. The left sidebar shows the navigation menu with 'Fields & Relationships' selected. The main content area has a progress bar at the top indicating 'Step 3 of 5'. Below the progress bar, there are three sections: 'Select Object to Summarize', 'Select Roll-Up Type', and 'Filter Criteria'. In the 'Select Object to Summarize' section, the 'Master Object' is 'Total laptops' and the 'Summarized Object' is 'Laptop Bookings'. In the 'Select Roll-Up Type' section, the 'COUNT' radio button is selected. In the 'Filter Criteria' section, the 'All records should be included in the calculation' radio button is selected. The 'Field to Aggregate' dropdown is set to 'None'. The wizard includes 'Previous', 'Next', and 'Cancel' buttons at the bottom right.

2. Click Next>Save it.

5.2.9 : To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data type as a “Formula” and Click on Next
4. Fill the Above as following:
 - Field Label: Laptops Available
 - Field Name : It’s gets auto generated
1. Select the Formula Return Type as “Number”

6. Select the Decimal places as “0” and Click on Next
2. Click on the Advanced Formula and Enter the value in formula box “ 50 - ” and Click on insert field than you will find a pop window under the Laptop Booking select the Total No Of Laptops in the second Column and select the Laptops delivered in the third column and click on insert
8. “ 50 - Total_no_of_laptops_r.Laptops_delivered__c ” and Check Syntax



3. Click on Next >> Next >> Save and new

5.2.10 : To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Laptop Booking) in the 2.search bar >> click on the object.
2. Now click on “Fields & Relationships” >>New
3. Select Data Type as a “picklist”
4. Picklist values are 1.2.3.4.5
5. Click and save it.

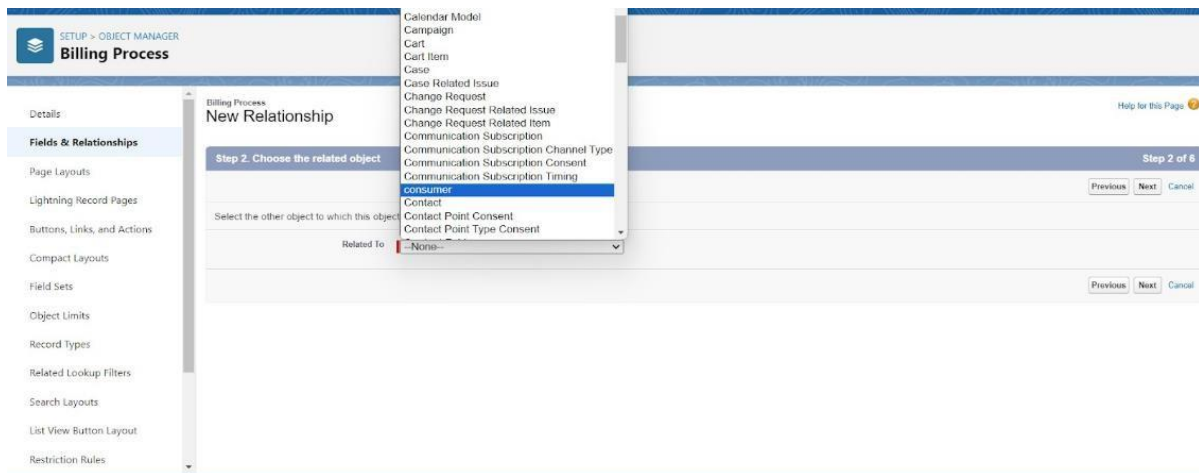
These are the fields created in Laptop Bookings Object:

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Amount	Amount__c	Currency(18, 0)		
consumer	consumer__c	Lookup(consumer)		
core type	core_type__c	Picklist	Laptop names	
Created By	CreatedById	Lookup(User)		
Email	Email__c	Email		
how many months	how_many_months__c	Picklist		
Laptop Bookings	Name	Text(80)		
Laptop names	Laptop_names__c	Picklist		
Laptops Available	Laptops_Available__c	Formula (Number)		
Last Modified By	LastModifiedById	Lookup(User)		
Name	Name__c	Master-Detail(consumer)		
Total No Of Laptops	Total_No_Of_Laptops__c	Master-Detail(Total Laptops)		

5.3: Creation of Fields & Relationship for Billing Process Object

5.3.1. To create fields & relationship to an object:

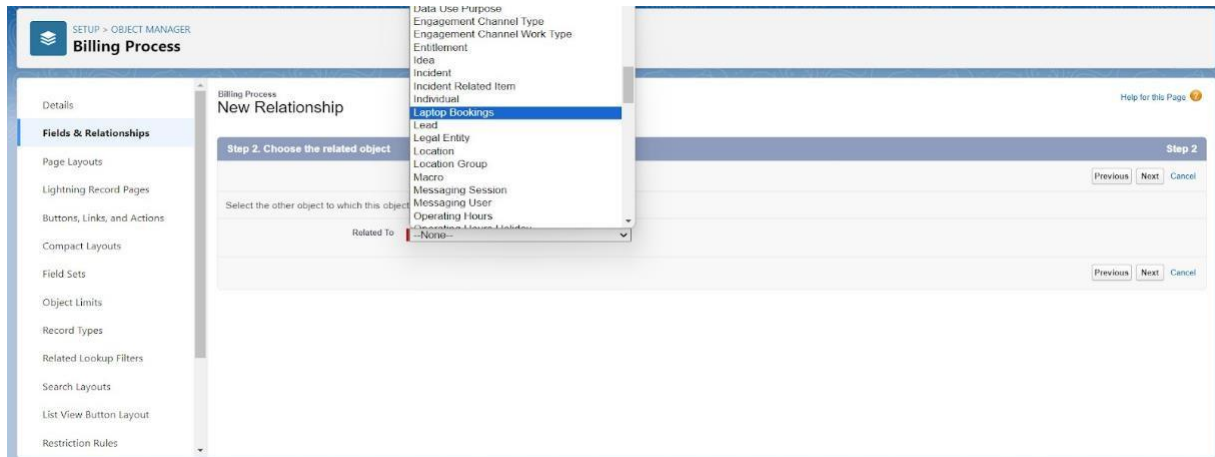
1. Go to setup >> click on Object Manager >> type object name(Billing Process) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Master-detail Relationship”
4. Click on Next
5. Click on the Related to drop down and Select the consumer object and click on Next



6. Fill the Above as following:
 - Change the Field Label: Name
 - Field Name :It's gets auto generated
7. Click on Next >> Next >> Save and new.

5.3.2 : To create another fields & relationship to an object:

1. Go to setup >> click on Object Manager >> type object name(Billing Process) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Lookup Relationship”
4. Click on Next
5. Click on the Related to drop down and Select the Laptop Booking object and click on Next



6. Fill the Above as following:

- Change the Field Label: Laptop Booking
- Field Name :It's gets auto generated

1. Click on Next >> Next >> Save and new.

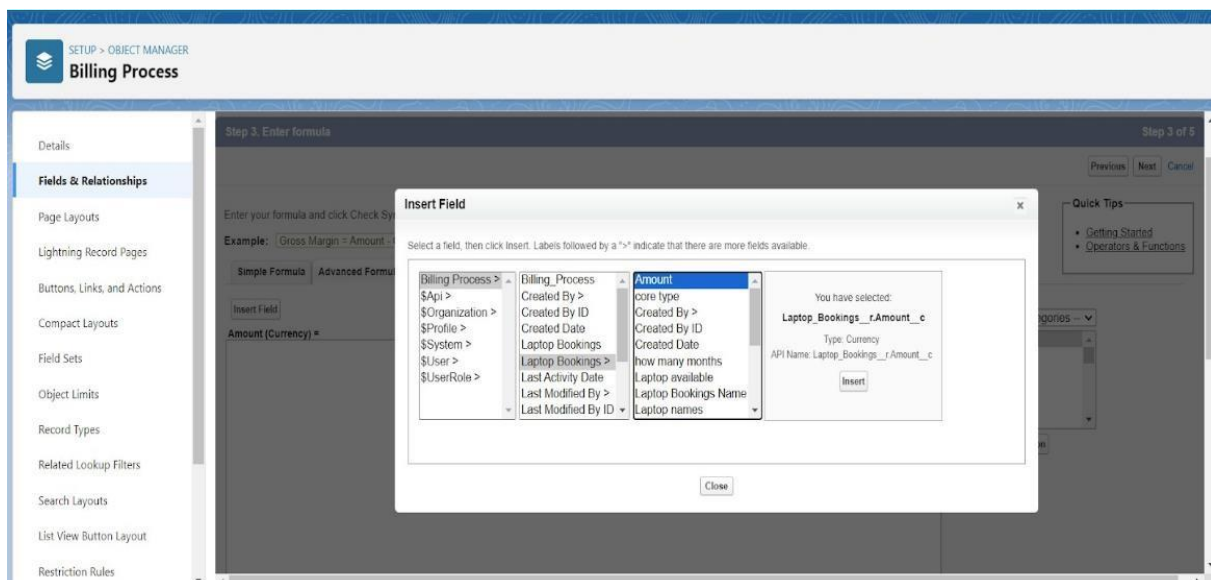
5.3.3 : Creation of another fields for the billing process object

To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Billing Process) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Picklist”
4. Fill the Above as following:
 - Field Label: Payment Mode
 - Value >> Select enter values with each value separated by a new line
1. Cash
2. Check
3. Credit card
4. Debit card
5. UPI
6. Phonepe
7. Gpay
8. Paytm
1. Select required
6. Click on Next >> Next >> Save and new.

5.3.4 : Create a Cross object formula Field in billing process Object

1. Go to setup >> click on Object Manager >> type object name(Billing Process) in the search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data Type as a “Formula”
4. Click on Next
5. Enter the Field label: Amount, the Field name gets auto generated and click on Next.(Formula return type Number).
6. In the Advanced Formula Click on the Insert field in the popup Screen Select the Billing Process and in the second drop down select the Laptop Booking and in the three drop down select the Amount field and click on Insert
7. “ Laptop_Booking__r.Amount__c ”
8. Click on the Check syntax: No syntax errors in merge fields



9. Click on Next >> Next >> Save and new.

These are the fields created in Billing Process Object:

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Amount	Amount__c	Formula (Number)		
Billing ProcessName	Name	Text(80)		✓
Created By	CreatedById	Lookup(User)		
Laptop Booking	Laptop_Booking__c	Lookup(Laptop Bookings)		✓
Last Modified By	LastModifiedById	Lookup(User)		
Name	Name__c	Master-Detail(consumer)		✓
Payment Mode	Payment_Mode__c	Picklist		

5.4: Creating the field in Total Laptops object

5.4.1. To create fields in an object:

1. Go to setup >> click on Object Manager >> type object name(Total Laptops) in search bar >> click on the object.
2. Now click on “Fields & Relationships” >> New
3. Select Data type as a “Formula” and Click on Next
4. Fill the Above as following:
5. Field Label: Laptops Available
6. Field Name : It’s gets auto generated
7. Select the Formula Return Type as “Number”

SETUP > OBJECT MANAGER
Total laptops

Details
Fields & Relationships
Page Layouts
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

Field Label: Field Name:

Auto add to custom report type: ☒ Add this field to existing custom report types that contain this entity

Formula Return Type

☐ None Selected Select one of the data types below:

☐ Checkbox Calculate a boolean value.
Example: `{TODAY()} > CloseDate`

☐ Currency Calculate a dollar or other currency amount and automatically format the field as a currency amount.
Example: `{GrossMargin} * Amount_c`

☐ Date Calculate a date, for example, by adding or subtracting days to other dates.
Example: `{ReminderDate} - CloseDate - 7`

☐ Date/Time Calculate a date/time, for example, by adding a number of hours or days to another date/time.
Example: `{Next} - NOW() + 1`

☒ Number Calculate a numeric value.
Example: `{Fahrenheit} * 1.8 * Celsius_c + 32`

☐ Percent Calculate a percent and automatically add the percent sign to the number.
Example: `{Discount} = (Amount - Discounted_Amount_c) / Amount`

☐ Text Create a text string, for example, by concatenating other text fields.
Example: `{FullName} = LastName & ", " & FirstName`

☐ Time Calculate a time, for example, by adding a number of hours to another time.
Example: `{Next} - TIMEVALUE(NOW()) + 1`

Options
Decimal Places: Example: 999

8. Select the Decimal places as “0” and Click on Next
9. Click on the Advanced
10. Formula “ 50 - Laptops_delivered_c ” and Check Syntax
11. Click on Next >>Next >>Save and new.

These are the fields created in Total Laptops Object:

SETUP > OBJECT MANAGER
Total Laptops

Details
Fields & Relationships
Page Layouts
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Compact Layouts
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Search Layouts
List View Button Layout

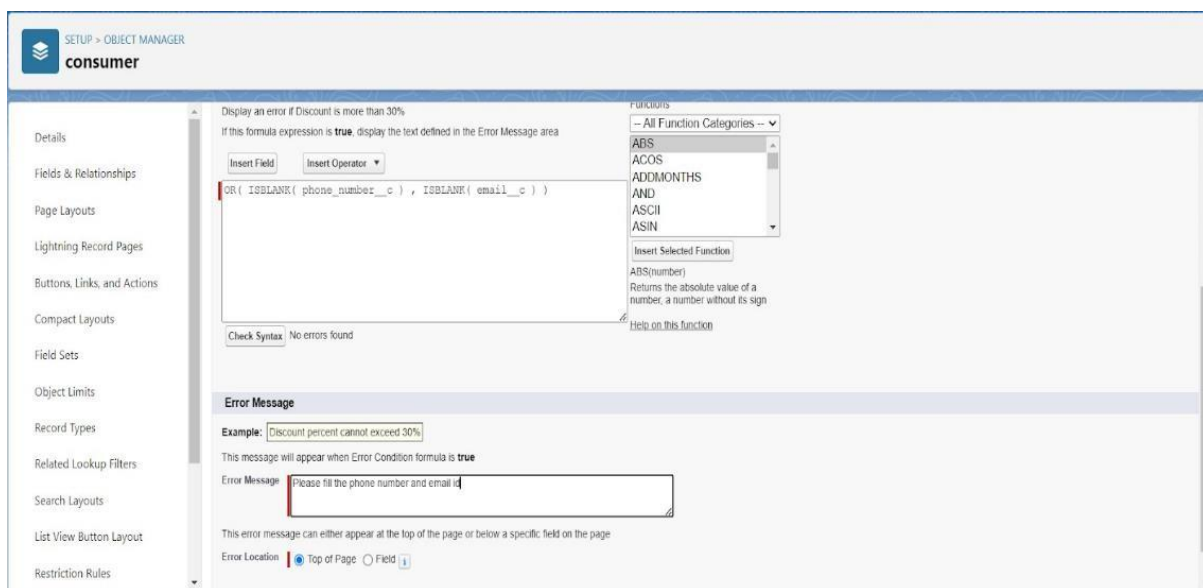
6 Items. Sorted by Field Label

FIELD LABEL	FIELD NAME	DATA TYPE	CONTROLLING FIELD	INDEXED
Created By	CreatedById	Lookup(User)		
Laptops Available	Laptops_Available_c	Formula (Number)		
Laptops delivered	Laptops_delivered_c	Roll-Up Summary (COUNT Laptop Bookings)		
Last Modified By	LastModifiedById	Lookup(User)		
Owner	OwnerId	Lookup(User,Group)		✓
Total Laptops	Name	Text(80)		✓

Task-6: Validation Rule

Creating the validation rule for phone number field in consumer object

1. Go to the setup page >> click on object manager >> From drop down click edit for consumer object.
2. Click on the validation rule >> click New.
3. Enter the Rule name as “Phonenumberoremailblankrule”.
4. Enter the description as “phone number and email number should not be blank”.
5. Enter the formula as “OR(ISBLANK(phone_number__c) , ISBLANK(email__c))” and check the syntax.



6. Save the validation rule.

Task-7: Profiles

7.1: Owner Profile

To create a new profile:

1. Go to setup >> type profiles in quick find box >> click on profiles >> clone the desired profile (Standard User) >> enter profile name (owner) >> Save.
2. Scroll down to Custom Object Permissions and Give access permissions for Total Laptops, consumers , Laptop Booking and Billing Process objects as mentioned in the below diagram.
3. Give Access and Save it.

7.2: Agent Profile

1. Go to setup >> type profiles in quick find box >> click on profiles >> clone the desired profile (Standard Platform User) >> enter profile name (Agent) >> Save.
2. While still on the profile page, then click Edit.

3. Scroll down to Custom Object Permissions and Give access permissions for Total Laptops, consumer , Laptop Bookings and Billing Process objects as mentioned in the below diagram.

The screenshot shows the 'Profiles' setup page with the following sections:

- Contact Point Consents:** Includes checkboxes for 'Contact Point Emails' and 'User External Credentials'.
- Custom Object Permissions:** Contains two tables for permissions.

	Basic Access				Data Administration	
	Read	Create	Edit	Delete	View All	Modify All
Billing Process	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
consumers	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

	Basic Access				Data Administration	
	Read	Create	Edit	Delete	View All	Modify All
Laptop Bookings	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Total Laptops	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
- Session Settings:** Includes 'Session Times Out After' (2 hours of inactivity) and 'Session Security Level Required at Login' (None).
- Password Policies:** Includes settings for 'User passwords expire in' (90 days), 'Enforce password history' (3 passwords remembered), 'Minimum password length' (8), 'Password complexity requirement' (Must include alpha and numeric characters), 'Password question requirement' (Cannot contain password), 'Maximum invalid login attempts' (10), and 'Lockout effective period' (15 minutes).

4. Give access and save it.

Task-8: Roles and hierarchy

8.1: Creating owner Role:

1. Go to quick find >> Search for Roles >> click on set up roles.
2. Click on Expand All and click on add role under whom this role works.
3. Give Label as “owner” and Role name gets auto populated. Then click on Save.

The screenshot shows the 'Roles' setup page with the 'New Role' form. The form has the following fields:

- Label:** owner
- Role Name:** owner
- This role reports to:** CEO
- Role Name as displayed on reports:** (empty field)

Buttons at the bottom: Save, Save & New, Cancel.

4. Click and save it.

8.2: Creating Agent roles

Creating another two roles under manager

1. Go to quick find - Search for Roles - click on set up roles.
2. Click plus on CEO role, and click add role under owner.

3. Give Label as “Agent” and Role name gets auto populated. Then click on Save.

Task-9: Users

9.1: Create User

1. Go to setup - type users in quick find box - select users -click New user.
2. Fill in the fields
 - a. First Name : vicky
 - b. Last Name : y
 - c. Alias : Give a Alias Name
 - d. Email id : Give your Personal Email id
 - e. Username : Username should be in this form: text@text.text
 - f. Nick Name : Give a Nickname
 - g. Role : owner
 - h. User license : Salesforce
 - i. Profiles : Standard User
2. Save it.

9.2: Creating another users

1. Go to setup -type users in quick find box - select users -click New user.
2. Fill in the fields
 - First Name : ram
 - Last Name : ram
 - Alias : Give a Alias Name
 - Email id : Give your Personal Email id
 - Username : Username should be in this form: text@text.text
 - Nick Name : Give a Nickname
 - Role : Agent
 - User license : Salesforce platform
 - Profiles : standard platform user.
1. Save it.

Task-10: Creating Flows for dell,hp,mac,acer

1. Go to setup >>type Flow in quick find box >> Click on the Flow and Select the New Flow.
2. Select the Record-triggered flow and Click on Create.

3. Select the Object as a Laptop Booking in the Drop down list.
4. Select the Trigger Flow when: “A record is Created or Updated”.
5. Select the Optimize the flow for: “Actions and Related Records” and Click on Done.
6. Under the Record-triggered Flow Click on “+” Symbol and In the Drop down List select the “Decision Element”.
7. Enter the Details Label: Field should be Update, API name: Gets Automatically Generated.
8. Enter the Outcome Details Label: dell , Outcome API name: Gets Automatically Generated.
 - Resource: Select Record.Laptop booking__c.
 - Operator: Select Equals.
 - Value: Select dell
9. Add the same outcome order to acer , hp,mac.
10. Go to flow page
11. Below dell there is a symbol ‘+’ click on that.
12. Again select decision.
13. Enter the Details Label: Field should Update(any one u want), API name: Gets Automatically Generated.
14. Select the Outcome Details Label: dell core i3 , Outcome API name: Gets Automatically Generated.
 - Resource: Select Record.core type.
 - Operator: Select Equals.
 - Value: Select core i3.
15. Then again click the symbol ‘+’ outcome details.
16. Repeat this for dell core i5,i7

Edit Decision

* Label: field_updated * API Name: field_updated

Description:

Outcomes For each path the flow can take, create an outcome. For each outcome, specify the conditions that must be met for the flow to take that path.

OUTCOME ORDER +

- dell core i3
- dell core i5
- dell core i7

Default Outcome

OUTCOME DETAILS Delete Outcome

* Label: dell core i3 * Outcome API Name: dellcore_i3

Condition Requirements to Execute Outcome: All Conditions Are Met (AND)

Resource: \$Record > core type X Operator: Equals Value: core i3

Cancel Done

17. So go to the flow page select '+' after core i3 then again select the decision.
18. Enter the Details Label: months selected , API name: Gets Automatically Generated.
19. Enter the Outcome Details Label: dell 1(i3) , Outcome API name: Gets Automatically Generated.
 - Resource: Select Record.how many months.
 - Operator: Select Equals.
 - Value: 1.
20. Similarly by selecting '+' add dell 2(i3),dell 3(i3),dell 4(i3),dell 5(i3) with respective values 2,3,4,5 respectively
21. After dell 1(i3) there is '+' symbol (similar for dell 2(i3),dell 3(i3),dell 4(i3),dell 5(i3)).
22. Click on '+' then select update records
23. Enter the Details Label: one month of dell i3 rate , API name: Gets Automatically Generated.
24. Field:- Amount__c , value:- for dell 1(i3)-1000, dell 2(i3)-2000, dell 3(i3)-3000, dell 4(i3)-4000, dell 5(i3)-5000. Follow for all these.
25. Finally, Click done.
26. So go to the flow page select '+' after core i3 then again select the decision.
27. So go to the flow page select '+' after core i3 then again select the decision.
28. Enter the Details Label: months selected for dell i7, API name: Gets Automatically Generated.
29. Enter the Outcome Details Label: dell 1(i7) , Outcome API name: Gets Automatically Generated.

- Resource: Select Record.how many months.
 - Operator: Select Equals.
 - Value: 1.
30. Similarly by selecting '+' (beside outcome) add dell 2(i7),dell 3(i7),dell 4(i7),dell 5(i7) with respective values 2,3,4,5 respectively
 31. After dell 1(i7) there is a '+' symbol(similar for dell 2(i7),dell 3(i7),dell 4(i7),dell 5(i7)).
 32. Click on '+' then select update records
 33. Enter the Details Label: one month of dell i5 rate , API name: Gets Automatically Generated.
 34. Field:- Amount__c , value:- for dell 1(i7)-2000, dell 2(i7)-4000, dell 3(i7)-6000, dell 4(i7)-8000, dell 5(i7)-10000. Follow for all these.
 35. Finally ,Click done.
 36. Similarly do for acer core i5,mac bionic chip,hp core i7.

Task-11: APEX

Trigger code:

```
trigger LaptopBooking on Laptop_Bookings__c (After insert,after update) {
    if(trigger.isAfter && ( trigger.isInsert || trigger.isupdate))
    {
        LaptopBookingHandler.sendEmailNotification(trigger.new);
    }
}
```

Class code(EventHandler Class) :

```
public class LaptopBookingHandler {

    public static void sendEmailNotification(List<Laptop_Bookings__c> lapList) {
        for (Laptop_Bookings__c lap : lapList) {
            Messaging.SingleEmailMessage email = new Messaging.SingleEmailMessage();
            email.setToAddresses(new List<String>{lap.Send_Email_Notification__c});
            email.setSubject('Welcome to our company');
            String body = 'Dear ' + lap.Name + ', \n';
            body += 'Welcome to Laptop Rentals! You have been seen as a valuable customer to us.\n';
            body += 'Please continue your journey with us, while we try to provide you with good quality resources. \n';
            body += 'Laptop Amount = ' + lap.Amount__c + ' \n';
            body += 'Core type = ' + lap.core_Type__c + ' \n';
        }
    }
}
```

```

        body += 'Laptop type = ' + lap.Laptop_names__c;
        email.setPlainTextBody(body);
        Messaging.sendEmail(new List<Messaging.SingleEmailMessage>{email});
    }
}
}

```

Class code(EventHandlerTest Class) :

@isTest

```
public class LaptopBookingHandlerTest {
```

```
    @isTest
```

```
    static void testLaptopBookingTrigger() {
```

```
        Laptop_Bookings__c testBooking = new Laptop_Bookings__c(
```

```
        Name = 'SnapDeal',
```

```
        Send_Email_Notification__c = 'test@example.com',
```

```
        Laptop_names__c = 'Dell',
```

```
        Total_No_Of_Laptops__c = '10',
```

```
        Name__c = 'Test User',
```

```
        how_many_months__c = '3'
```

```
    );
```

```
    Test.startTest();
```

```
    insert testBooking;
```

```
    testBooking.how_many_months__c = '4';
```

```
    update testBooking;
```

```
    Test.stopTest();
```

```
    System.assertEquals(2, Limits.getEmailInvocations(), 'Two emails should be sent (one on insert and one on update)');
```

```
}
```

```
}
```

Note: Before creating reports just fill the 10-12 records in the Laptop Bookings object.

Create records for each one you have to create at least 2 different records i.e dell(i3), dell(i7),acer(i3),hp(i5),mac(bionic chip)

Task-12: Reports

12.1: Create Report

1. Go to the app -click on the reports tab
2. Click New Report.
3. Select report type from category or from report type panel or from search panel
“consumer with Laptop Bookings and total laptops” >> click on start report.
4. Customize your report
5. Add fields from left pane as shown below
6. Click the column drop down and select bucket list.

Edit Bucket Column

* Field

Amount

×

* Bucket Name

types of versions


	Range		Bucket	
<div>Add ▶</div>	<=	900	basic	×
<div>Add ▶</div>	> 900 to	1500	intermediate	×
<div>Add ▶</div>	> 1,500 to	10000	high	×
	>	10,000	very high	×

☒ Treat empty Amount values in the report as zeros.

Cancel

Apply


1. Click apply it.
2. Then save and run it.

- 

LAPTOP RENTALS

Total Laptops ▾ consumer ▾ Laptop Bookings ▾ Billing Process ▾ *Laptop_Renting_Report ▾ X *Analytics ▾ X *data analytics of laptops ▾ X

★ ▾
+ ▾
🔄
?
⚙️


Report: consumer with Laptop Bookings and Total Laptops
Laptop_Renting_Report

[Enable Field Editing](#)

[Edit](#)

Email ↑ ▾	core Type ↑ ▾	consumer: consumer_name ▾	Laptop Bookings: Laptop Bookings ▾	Total No Of Laptops: Total Laptops ▾
<input checked="" type="checkbox"/> jaysurya1@gvpce.ac.in (1)	Bionic chip (1)	JaySurya	Amazon	30
	Subtotal			
Subtotal				
<input type="checkbox"/> ramu1@gvpce.ac.in (1)	core i3 (1)	Ramu	Smart Lappy	12
	Subtotal			
Subtotal				
<input type="checkbox"/> sarayu1@gvpce.ac.in (1)	core i3 (1)	Sarayu	Flipkart	20
	Subtotal			
Subtotal				
<input type="checkbox"/> soniya1@gvpce.ac.in (1)	core i5 (1)	Soniya	Sono LapVison	20
	Subtotal			
Subtotal				
<input type="checkbox"/> venkatesh1@gvpce.ac.in (1)	core i7 (1)	Venkatesh	SnapDeal	41
	Subtotal			
Subtotal				
Total (5)				

Row Counts ☒ Detail Rows ☒ Subtotals ☒ Grand Total ☒

2. Give a Name and select the folder that was created, and click on create.

New Dashboard

* Name

data analytics of laptops

Description

total amount of data in dashboards

Folder


total rents amount

Select Folder

Cancel

Create

3. Select add component.
4. Select a Report and click on select.
1. Select the dark component and add to the dashboards.
2. Save it.
3. Click done.



Search...


LAPTOP RENTALS

Total Laptops ▼

consumer ▼

Laptop Bookings ▼

Billing Process ▼

 Dashboard

data analytics of laptops

total amount of data in dashboards

As of 29-Oct-2024, 5:19 pm · Viewing as Balaji Palle

Laptop_Renting_Report

Record Count

5

Email

jaysurya1@gvpce.ac.in

ramu1@gvpce.ac.in

sarayu1@gvpce.ac.in

soniya1@gvpce.ac.in

venkatesh1@gvpce.ac.in

View Report (Laptop Renting Report)

Testing and Validation

Unit Testing:

- **Apex Classes and Triggers:** Test cases for each automation, ensuring accurate fee calculations, reminders, and status updates.

Key Scenarios Addressed by Salesforce in the Implementation Project:

- **Rental Booking:** User can book a laptop rental, view available inventory, and receive booking confirmation.
- **Customer Support:** Integrated customer support for managing rental inquiries and resolving issues.

Conclusion:

- Successfully implemented a CRM solution to manage laptop rentals using Salesforce.
- Enabled efficient tracking and management of inventory and customer information.
- Enhanced the customer experience through automated reminders and support

Salesforce URL:

<https://gayatrividyaaparishadcol-17c-dev-ed.develop.lightning.force.com/lightning/r/User/005dM000008tOQ6QAM/view>