



# SALESFORCE PROJECT READY

## Entry Level Training & Professional Development Program

Created By- Tushar Mittal (7417364518)

**Project Title: Online Training Management(Admin/Developer)**

### INDEX:

- Create Your Salesforce Developer Org to Get Started
- Custom Object Creation
- Validation Rules Creation
- Process Automation
- Creating Custom Pages Using Visualforce
- Triggers

## Category:

Salesforce CRM

## Skills Required:

Salesforce Admin/ Developer

## Project Description:

We will be creating an online training management application that will store all the details of the training from courses offered, trainers, students enrolled, Meeting/training information, and many more. In the project, we will be creating objects to store these records and will also create various fields to store the values of these records. We will establish relationships between various objects and create custom pages using visualforce.

Topic: Create your DF Developer account to get Started

Detailed Description: Account Creation from developer.salesforce.com

User

Tushar Mittal

[User Profile Help for this Page](#)

[Permission Set Assignments \(1\)](#) | [Permission Set Assignments: Activation Required \(0\)](#) | [Permission Set Group Assignments \(0\)](#) | [Permission Set License Assignments \(0\)](#) | [Personal Groups \(0\)](#) | [Public Group Membership \(0\)](#) | [Queue Membership \(0\)](#) | [Team \(0\)](#) | [Managers in the Role Hierarchy \(0\)](#) | [OAuth Connected Apps \(0\)](#) | [Third-Party Account Links \(0\)](#) | [Installed Mobile Apps \(0\)](#) | [Authentication Settings for External Systems \(0\)](#) | [Login History \(10+\)](#) | [User Provisioning Accounts \(0\)](#)

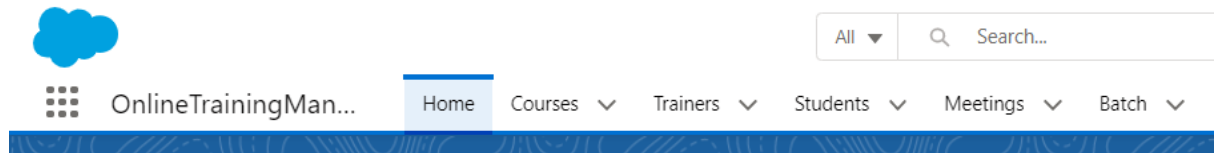
User Detail

[Edit](#) [Sharing](#) [Change Password](#)

Name	Tushar Mittal	Role	
Alias	TMitt	User License	Salesforce
Email	<a href="mailto:tushar.mittal196@gmail.com">tushar.mittal196@gmail.com</a>	Profile	System Administrator
Username	tushar.mittal1196@gmail.com	Active	<input checked="" type="checkbox"/>
Nickname	tushar.mittal1196	Marketing User	<input checked="" type="checkbox"/>
Title		Offline User	<input checked="" type="checkbox"/>
Company	Cappgemini	Knowledge User	<input type="checkbox"/>
Department		Flow User	<input type="checkbox"/>
Division		Service Cloud User	<input checked="" type="checkbox"/>
Address	IN	Site.com Contributor User	<input type="checkbox"/>
Time Zone	(GMT-08:00) Pacific Standard Time (America/Los_Angeles)	Site.com Publisher User	<input type="checkbox"/>
Locale	English (United States)	WDC User	<input type="checkbox"/>
Language	English	Mobile Push Registrations	<a href="#">View</a>

## Custom App/Object Creation:

Creation (Course, Trainer, Batch , Meeting, Student) , **Custom Field**



### Courses-: Offered Courses

#### Fields:

-----

Courses ID - Auto number (C-000001)

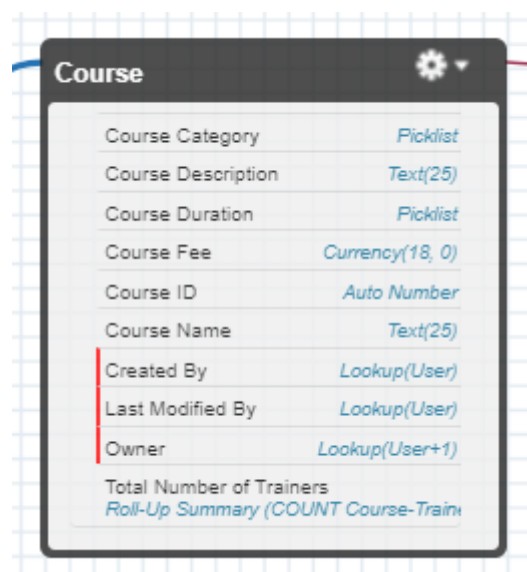
Course Name: Text

Course Duration (In Months) – Picklist (1,2,3,4,5,6)

Course Category: Picklist (Cloud Computing, Data Management, Programming, Web Designing)

Course Fee: Currency

Course Description:



### Trainers: - Associated Trainers

Trainer Id: Auto-number (T-00001)

Full Name: Text

Email: Email - No Duplicate

Phone Number: Phone

WhatsApp Number: Phone

Date Of Birth: Date

Age : Formula

Experience: Picklist

LinkedIn Profile: URL

Expertise : Text (CRM, BI)

Trainer	
Age	Formula (Number)
Created By	Lookup (User)
Date of Birth	Date
Email	Email (Unique)
Experience	Picklist
Expertise	Text (25)
Full Name	Text (25)
Last Modified By	Lookup (User)
LinkedIn Profile	URL (255)
Owner	Lookup (User+1)
Phone Number	Phone
Trainer ID	Auto Number
Whatsapp Number	Phone

**Students: Enrolled Students:**

Student Id: Autonumber (S-00001)

First Name : Text

Last Name : Text

Email Id : Email

Phone Number : Phone

Date Of Birth: Date

whatsapp number :Phone

Enrollment date: AutoGenerated (Date) (Locked Fields/Read only field)

A screenshot of a form titled "Student" with a settings icon and a dropdown arrow. The form contains the following fields:

Field Name	Field Type
Created By	Lookup(User)
Date of Birth	Date
Email	Email (Unique)
Enrollment Date	Formula (Date)
First Name	Text(25)
Last Modified By	Lookup(User)
Last Name	Text(25)
Owner	Lookup(User+1)
Phone Number	Phone
Student Name	Text(80)
Whatsapp Number	Phone

## Meeting: Meeting Id's

Meeting Id: Autonumber (M-00001)

Valid From: Date

Valid to: Date

Active : Checkbox If checked means Active , if not checked means deactivated

Meeting link: Url

A screenshot of a form titled "Meeting" with a settings icon and a dropdown arrow. The form contains the following fields:

Field Name	Field Type
Active	Checkbox
Created By	Lookup(User)
Last Modified By	Lookup(User)
Meeting ID	Auto Number
Meeting Link	URL(255)
Owner	Lookup(User+1)
Valid From	Date
Valid to	Date

## **Batch:**

Batch id: Auto number (B-00001)

Batch Type : Picklist (Weekday/Weekend)

Start date: date

End date: date

Course Id -Lookup to course object

Meeting id: Lookup to meeting object

Trainer Id: Lookup to trainer object

Status: picklist (Scheduled/ Started/ Completed)

Rollup summary: to display total number of students enrolled

Batch	
Batch ID	Auto Number
Batch Type	Picklist
Course Category	Formula (Text)
Course ID	Lookup(Course)
Course Name	Formula (Text)
Created By	Lookup(User)
End Date	Date
Last Modified By	Lookup(User)
Meeting ID	Lookup(Meeting)
Meeting URL	Formula (Text)
Meeting Valid Till	Formula (Date)
Owner	Lookup(User+1)
Start Date	Date
Status	Picklist
Trainer Email	Email
Trainer ID	Lookup(Trainer)
Trainer Name	Formula (Text)

## Create Validation Rules:

Validation rules verify that the data a user enters in a record meets the standards you specify before the user can save the record. A validation rule can contain a formula or expression that evaluates the data in one or more fields and returns a value of “True” or “False”.

Milestone / Activities: Validation Rule on custom Objects (Course, Trainer, Meeting, Student)

## Create Validation Rules On Course Object:

### Validations:

- 1) Course Fee cannot be in negative and should be less than 3000\$

### Course Validation Rule

[Back to Course](#)

#### Validation Rule Detail

Edit

Clone

Rule Name	Course_Fee	Active	<input checked="" type="checkbox"/>
Error Condition Formula	OR(Course_Fee__c < 0, Course_Fee__c > 3000)		
Error Message	Course Fee cannot be in negative and should be less than 3000\$	Error Location	Course Fee
Description			
Created By	Tushar Mittal, 1/4/2022, 4:18 AM		Modified By Tushar Mittal, 1/4/2022, 4:43 AM

Edit

Clone

## Create Validation Rules On Trainer Object:

### Validation:

- 1) Phone and WhatsApp Number - Minimum 10 Digits, Max 15 Digits
- 2) Full Name -Cannot be blank
- 3) Phone Cannot be blank
- 4) date of birth: cannot be blank
- 5) Experience : cannot be blank
- 6) Trainer age cannot be less than 25 years

Validation Rules				
6 Items, Sorted by Rule Name				
RULE NAME	ERROR LOCATION	ERROR MESSAGE	ACTIVE	MODIFIED BY
DOB	Top of Page	date of birth: cannot be blank	✓	Tushar Mittal, 1/5/2022, 8:23 PM
Full_Name	Top of Page	Full Name -Cannot be blank	✓	Tushar Mittal, 1/5/2022, 8:22 PM
Phone	Top of Page	Phone Cannot be blank		Tushar Mittal, 1/8/2022, 3:19 AM
PhoneNumberMin10digits	Top of Page	Phone and WhatsApp Number - Minimum 10 Digits, Max 15 Digits		Tushar Mittal, 1/8/2022, 3:19 AM
Trainer_age_cannot_be_less_than_25_year	Top of Page	Trainer age cannot be less than 25 years	✓	Tushar Mittal, 1/4/2022, 6:25 AM
WhatsappNumberMin10digits	Top of Page	Phone and WhatsApp Number - Minimum 10 Digits, Max 15 Digits		Tushar Mittal, 1/8/2022, 3:20 AM

1.

### Trainer Validation Rule

[Back to Trainer](#)

Validation Rule Detail

EditClone

Rule Name	DOB	Active	✓
Error Condition Formula	ISBLANK( Date_of_Birth__c )		
Error Message	date of birth: cannot be blank	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/5/2022, 8:23 PM	Modified By	Tushar Mittal, 1/5/2022, 8:23 PM

EditClone



2.

## Trainer Validation Rule

[Back to Trainer](#)

Validation Rule Detail

Edit

Clone

Rule Name	Full_Name	Active	<input checked="" type="checkbox"/>
Error Condition Formula	ISBLANK( Full_Name__c )		
Error Message	Full Name -Cannot be blank	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/5/2022, 8:22 PM	Modified By	Tushar Mittal, 1/5/2022, 8:22 PM

Edit

Clone

3.

## Trainer Validation Rule

[Back to Trainer](#)

Validation Rule Detail

Edit

Clone

Rule Name	Phone	Active	<input type="checkbox"/>
Error Condition Formula	ISBLANK( Phone_Number__c )		
Error Message	Phone Cannot be blank	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/5/2022, 8:23 PM	Modified By	Tushar Mittal, 1/8/2022, 3:19 AM

Edit

Clone

4.

## Trainer Validation Rule

[Back to Trainer](#)

Validation Rule Detail

Edit

Clone

Rule Name	PhoneNumberMin10digits	Active	<input type="checkbox"/>
Error Condition Formula	NOT(REGEX(Phone_Number__c, "[0-9]{10,15}"))		
Error Message	Phone and WhatsApp Number - Minimum 10 Digits, Max 15 Digits	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/5/2022, 8:26 PM	Modified By	Tushar Mittal, 1/8/2022, 3:19 AM

Edit

Clone

5.

## Trainer Validation Rule

[Back to Trainer](#)

Validation Rule Detail

Edit

Clone

Rule Name	Trainer_age_cannot_be_less_than_25_year	Active	<input checked="" type="checkbox"/>
Error Condition Formula	Age__c < 25		
Error Message	Trainer age cannot be less than 25 years	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 6:25 AM	Modified By	Tushar Mittal, 1/4/2022, 6:25 AM

Edit

Clone

6.

## Trainer Validation Rule

[Back to Trainer](#)

### Validation Rule Detail

[Edit](#) [Clone](#)

Rule Name	WhatsappNumberMin10digits	Active	<input type="checkbox"/>
Error Condition Formula	NOT(REGEX( Whatsapp_Number__c , "[0-9]{10,15}"))		
Error Message	Phone and WhatsApp Number - Minimum 10 Digits, Max 15 Digits	Error Location	Top of Page
Description			
Created By	<a href="#">Tushar Mittal</a> , 1/5/2022, 8:27 PM	Modified By	<a href="#">Tushar Mittal</a> , 1/8/2022, 3:20 AM

[Edit](#) [Clone](#)

## Create Validation Rules On Student Object:

### Validation:

- 1.Last Name cannot be blank
2. Phone Number: Min 10 digits
3. WhatsApp number: Min 10 digits
4. min 16 years of age will be required

### Validation Rules

4 Items, Sorted by Rule Name

RULE NAME	▲	ERROR LOCATION	ERROR MESSAGE	ACTIVE	MODIFIED BY
<a href="#">Age</a>		Top of Page	Min 16 years of age will be required	✓	<a href="#">Tushar Mittal</a> , 1/4/2022, 6:40 AM
<a href="#">LastName</a>		Top of Page	Last Name cannot be blank	✓	<a href="#">Tushar Mittal</a> , 1/5/2022, 8:32 PM
<a href="#">PhoneNumber</a>		Top of Page	Phone Number: Min 10 digits	✓	<a href="#">Tushar Mittal</a> , 1/4/2022, 6:37 AM
<a href="#">WhatsappNumber</a>		Top of Page	Whatsapp Number: Min 10 digits	✓	<a href="#">Tushar Mittal</a> , 1/4/2022, 6:37 AM

1.

## Student Validation Rule

[Back to Student](#)

### Validation Rule Detail

[Edit](#) [Clone](#)

Rule Name	Age	Active	<input checked="" type="checkbox"/>
Error Condition Formula	YEAR(TODAY())-YEAR(Date_of_Birth__c)<16		
Error Message	Min 16 years of age will be required	Error Location	Top of Page
Description			
Created By	<a href="#">Tushar Mittal</a> , 1/4/2022, 6:40 AM	Modified By	<a href="#">Tushar Mittal</a> , 1/4/2022, 6:40 AM

[Edit](#) [Clone](#)

2.

## Student Validation Rule

[Back to Student](#)

### Validation Rule Detail

[Edit](#) [Clone](#)

Rule Name	LastName	Active	<input checked="" type="checkbox"/>
Error Condition Formula	ISBLANK( Last_Name__c )		
Error Message	Last Name cannot be blank	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/5/2022, 8:32 PM		Modified By Tushar Mittal, 1/5/2022, 8:32 PM

[Edit](#) [Clone](#)

3.

## Student Validation Rule

[Back to Student](#)

### Validation Rule Detail

[Edit](#) [Clone](#)

Rule Name	PhoneNumber	Active	<input checked="" type="checkbox"/>
Error Condition Formula	LEN( Phone_Number__c ) <10		
Error Message	Phone Number: Min 10 digits	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 6:37 AM		Modified By Tushar Mittal, 1/4/2022, 6:37 AM

[Edit](#) [Clone](#)

4.

## Student Validation Rule

[Back to Student](#)

### Validation Rule Detail

[Edit](#) [Clone](#)

Rule Name	WhatsappNumber	Active	<input checked="" type="checkbox"/>
Error Condition Formula	LEN( Whatsapp_Number__c ) <10		
Error Message	Whatsapp Number: Min 10 digits	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 6:37 AM		Modified By Tushar Mittal, 1/4/2022, 6:37 AM

[Edit](#) [Clone](#)

Create Validation Rules On Meeting Object:

- 1.Valid from cannot be less than current date
- 2.Valid to cannot be less than valid from date
- 3.Min 14 days difference between valid from and valid to date

Validation Rules				
3 Items, Sorted by Rule Name				
RULE NAME	ERROR LOCATION	ERROR MESSAGE	ACTIVE	MODIFIED BY
Validdateduration	Top of Page	Min 14 days difference between valid from and valid to date	✓	Tushar Mittal, 1/4/2022, 7:02 AM
Validfrom	Top of Page	Valid from cannot be less than current date	✓	Tushar Mittal, 1/4/2022, 6:52 AM
Validto	Top of Page	Valid to cannot be less than valid from date	✓	Tushar Mittal, 1/4/2022, 6:54 AM

1.

Meeting Validation Rule

[Back to Meeting](#)

Validation Rule Detail

EditClone

Rule Name	Validdateduration	Active	✓
Error Condition Formula	(Valid_to__c - Valid_From__c) <= 14		
Error Message	Min 14 days difference between valid from and valid to date	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 7:01 AM	Modified By	Tushar Mittal, 1/4/2022, 7:02 AM

EditClone

2.

Meeting Validation Rule

[Back to Meeting](#)

Validation Rule Detail

EditClone

Rule Name	Validfrom	Active	✓
Error Condition Formula	TODAY() >= Valid_From__c		
Error Message	Valid from cannot be less than current date	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 6:52 AM	Modified By	Tushar Mittal, 1/4/2022, 6:52 AM

EditClone

3.

## Meeting Validation Rule

[Back to Meeting](#)

### Validation Rule Detail

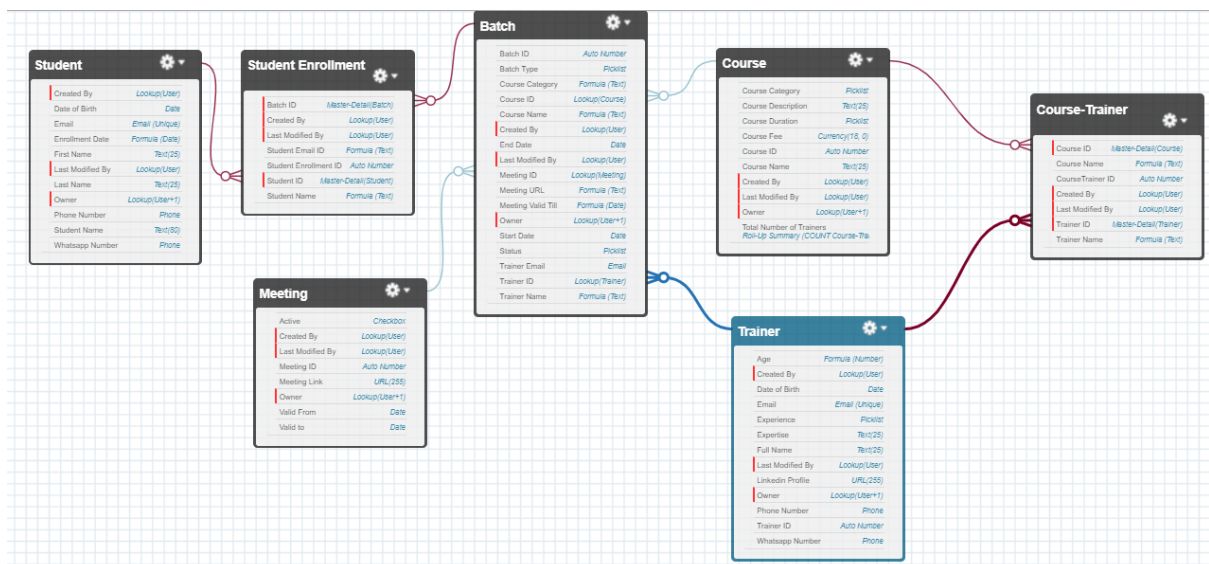
[Edit](#) [Clone](#)

Rule Name	Validto	Active	<input checked="" type="checkbox"/>
Error Condition Formula	Valid_to__c< Valid_From__c		
Error Message	Valid to cannot be less than valid from date	Error Location	Top of Page
Description			
Created By	Tushar Mittal, 1/4/2022, 6:54 AM		
Modified By	Tushar Mittal, 1/4/2022, 6:54 AM		

[Edit](#) [Clone](#)

## Relationships (Master Detail, Look-Up):

Milestone / Activities: Create Relationships among all the object according to requirement and behavior and required to create 2 Junction Objects as per functionality (Student Enrollment, Course Trainer)



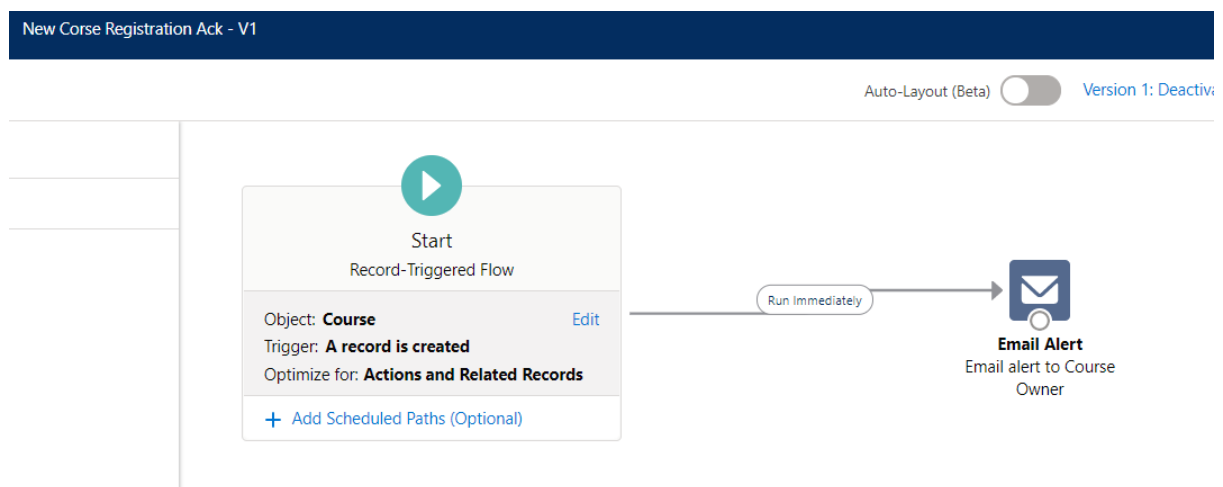
## Process Automation:

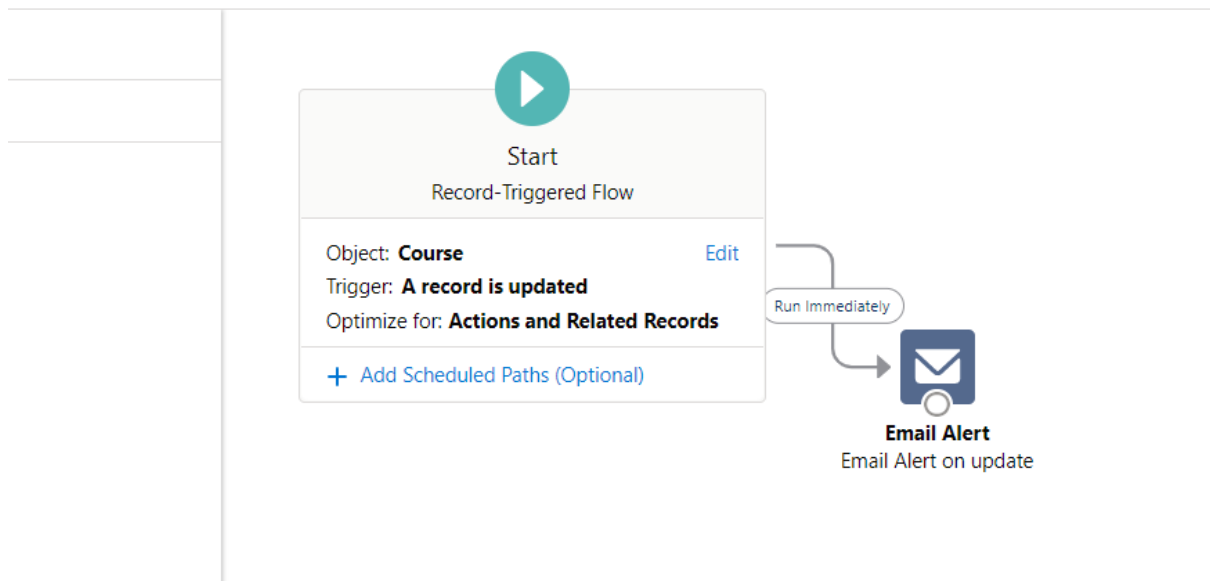
There are four automation tools in salesforce:

1. Approval Process
2. Process builder
3. Flows
4. Workflows

### Topic: Automation on Custom Objects

Milestone / Activities: Automation Rule on Custom Object (Course,Meeting,Batch)



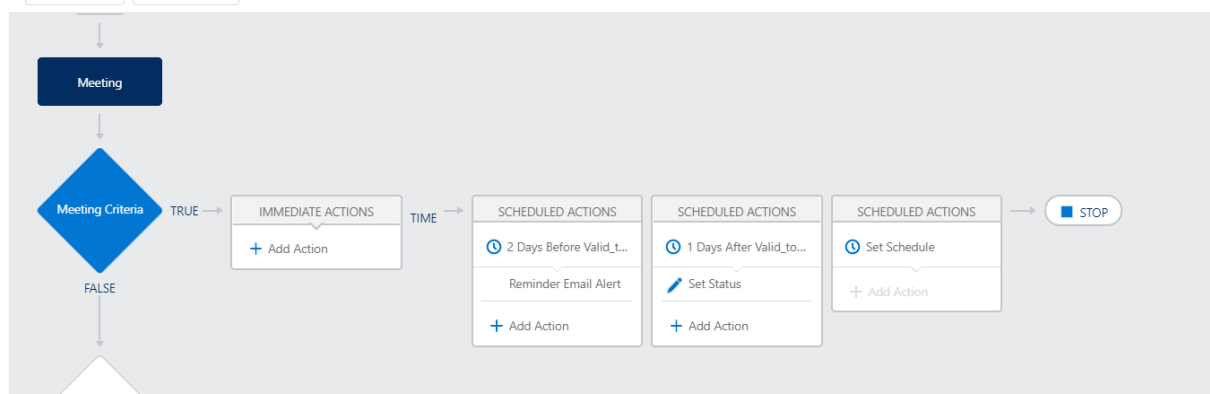



Setup Home Object Manager

Process Builder - Meeting ID Reminder

Expand All

Collapse All





Search Setup

SetupHomeObject Manager

Process Builder - Populate Trainer Email on Batch

Expand AllCollapse AllView All ProcessesCloneView PropertiesDeactivateRead Only

START

Batch

NO

TRUE

IMMEDIATE ACTIONS

Trainer Email Field Update

STOP

FALSE

+ Add Criteria

TRUE

IMMEDIATE ACTIONS

+ Add Action

STOP

FALSE

Update Records

Action Name \*  
Trainer Email Field Update

Record \*  
[Batch\_\_c]

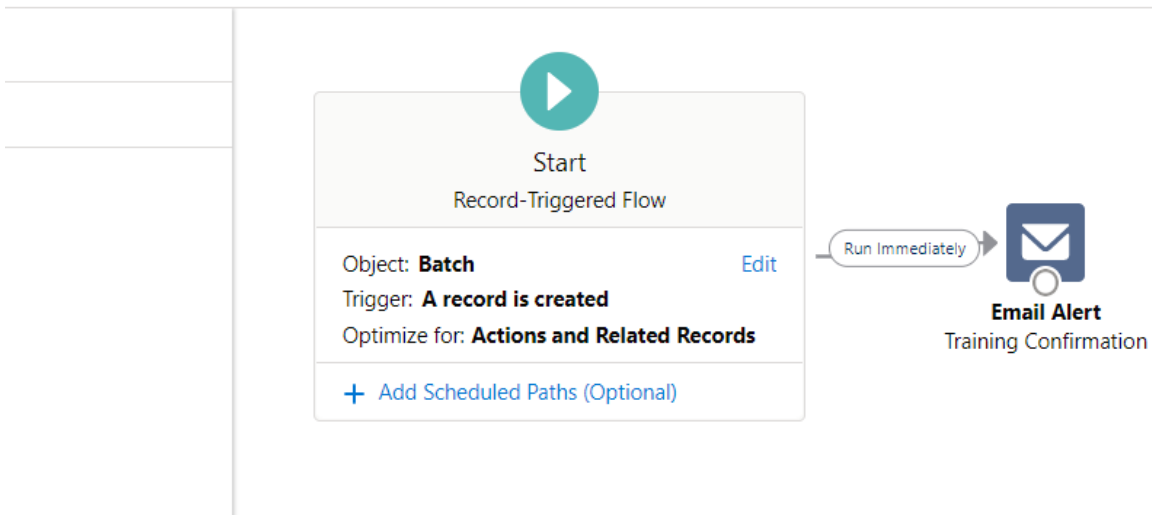
Criteria for Updating Records \*  
☐ Updated records meet all conditions  
☐ No criteria—just update the records!

Set new field values for the records you update

Field *	Type *	Value *
Trainer Email	Field Reference	[Batch__c].Trainer_ID__r.Em...Q

Training Confirmation - V1

Auto-L





## Creating Custom Pages Using Visualforce:

Visualforce is a framework that allows developers to build sophisticated, custom user interfaces that can be hosted natively on the Lightning platform. The Visualforce framework includes a tag-based markup language, similar to HTML, and a set of server-side “standard controllers” that make basic database operations, such as queries and saves, very simple to perform.)

Milestone / Activities: VF Pages (Custom Pages)- Standard Controller , Custom Controller, Extend Controller

Detailed Description: Custom Pages of Course, Trainer, Batch , Meeting, Student Object

### Custom Visualforce Page of Course

The screenshot displays a custom Visualforce page titled "New Course" within the "Online Training Dev..." environment. The page features a navigation bar with tabs for "Courses", "Meetings", "Students", "Trainers", "Batch", "CourseNew", "BatchVF", "MeetingVF", "StudentVF", and "TrainerNew". The "CourseNew" tab is active. Below the navigation bar, the page is divided into two main sections: "Information" and "Course Description".

The "Information" section contains four input fields: "Course Name" (text), "Course Fee" (text), "Course Category" (dropdown menu), and "Course Duration" (dropdown menu). The "Course Description" section contains a single text area for "Course Description". A "Save Record" button is located at the bottom right of the form.

Below the form, the Visualforce markup code is displayed in a code editor. The code defines the page structure using Apex tags, including `<apex:page>`, `<apex:form>`, `<apex:sectionHeader>`, `<apex:pageBlock>`, `<apex:pageBlockSection>`, `<apex:inputField>`, `<apex:pageBlockSectionItem>`, `<center>`, and `<apex:commandButton>`. The code uses the `CourseObj` standard controller and applies a light cyan background color to the input fields.

```
1 <apex:page controller="CourseApex" lightningStylesheets="true" >
2 <apex:form >
3   <apex:sectionHeader title="New Course" />
4   <!-- <apex:pageMessages ></apex:pageMessages> -->
5   <apex:pageBlock >
6     <apex:pageBlockSection title="Information">
7       <apex:inputField value="{!courseObj.Course_Name__c}" required="false" style="background-color:Lightcyan;"/>
8       <apex:inputField value="{!courseObj.Course_Fee__c}" style="background-color:Lightcyan;"/>
9       <apex:inputField value="{!courseObj.Course_Category__c}" style="background-color:Lightcyan;"/>
10      <apex:inputField value="{!courseObj.Course_Duration__c}" style="background-color:Lightcyan;"/>
11    </apex:pageBlockSection>
12
13    <apex:pageBlockSection columns="1" title="Course Description">
14      Course Description
15      <apex:pageBlockSectionItem >
16        <apex:inputField value="{!courseObj.Course_Description__c}" />
17      </apex:pageBlockSectionItem>
18    </apex:pageBlockSection>
19
20    <center>
21      <apex:commandButton value="Save Record" action="{!saveRecord}"/>
22    </center>
23  </apex:pageBlock>
24 </apex:form>
```

```

CourseApex CourseApex
1 public with sharing class CourseApex
2 {
3     public Course__c courseObj{get;set;}
4
5     public CourseApex()
6     {
7         courseObj=new Course__c();
8     }
9     public PageReference saveRecord()
10    {
11        if(courseObj.Course_Name__c==' ' ||courseObj.Course_Name__c==null)
12        {
13            //ApexPages.addMessage(new ApexPages.message(ApexPages.Severity.Error,'Course can't be left blank'));
14            courseObj.Course_Name__c.addError('course blank');
15            return null;
16        }
17        else
18        {
19            insert courseObj;
20            PageReference pr=new PageReference('/apex/coursethankspage');
21            //ApexPages.addMessage(new ApexPages.message(ApexPages.Severity.Confirm,'Record Inserted Successfully'));
22            return pr;
23        }
24    }

```

Position: Ln 25, Ch 2      Total: Ln 25, Ch 765

## Standard Visualforce Page of Batch

Online Training Dev... Courses Meetings Students Trainers Batch CourseNew **BatchVF** MeetingVF StudentVF TrainerNew

**New Batch**

Batch Type: --None--

End Date: 2/22/2022 [ 1/8/2022 ]

Meeting ID:

Status: --None--

Start Date: 1/8/2022 [ 1/8/2022 ]

Course ID:

Trainer ID:

```

Batch
1 <apex:page lightningStylesheets="true" standardController="Batch__c">
2     <apex:form >
3         <apex:sectionHeader title="New Batch"/>
4         <apex:pageBlock >
5             <apex:pageBlockSection >
6                 <apex:inputField value="{!Batch__c.Batch_Type__c}"/>
7                 <apex:inputField value="{!Batch__c.Start_Date__c}"/>
8                 <apex:inputField value="{!Batch__c.End_Date__c}"/>
9                 <apex:inputField value="{!Batch__c.Course_ID__c}"/>
10                <apex:inputField value="{!Batch__c.Meeting_ID__c}"/>
11                <apex:inputField value="{!Batch__c.Trainer_ID__c}"/>
12                <apex:inputField value="{!Batch__c.Status__c}"/>
13            </apex:pageBlockSection>
14            <center><apex:commandButton value="Save" action="{!save}"/></center>
15        </apex:pageBlock>
16    </apex:form>
17</apex:page>

```

Position: Ln 17, Ch 10      Total: Ln 17, Ch 765

## Standard Visualforce Page of Meeting

Online Training Dev... Courses Meetings Students Trainers Batch CourseNew BatchVF MeetingVF StudentVF TrainerNew

### New Meeting

Information

Valid From  [ 1/8/2022 ] Valid to  [ 1/8/2022 ]

Meeting Link

Active ☐

Save

```
1 <apex:page standardController="Meeting__c" lightningStylesheets="true">
2 <apex:form >
3 <center>
4 <apex:sectionHeader title="New Meeting"/>
5 </center>
6
7 <apex:pageBlock >
8 <apex:pageBlockSection title="Information" collapsible="false">
9 <apex:inputField value="{!Meeting__c.Valid_From__c}"/>
10 <apex:inputField value="{!Meeting__c.Valid_to__c}"/>
11 <apex:inputField value="{!Meeting__c.Meeting_Link__c}"/>
12 <apex:inputField value="{!Meeting__c.Active__c}"/>
13
14 </apex:pageBlockSection>
15 <center>
16 <apex:commandButton value="Save" action="{!save}" />
17 </center>
18 </apex:pageBlock>
19 </apex:form>
```

## Standard Visualforce Page of Student

Online Training Dev... Courses Meetings Students Trainers Batch CourseNew BatchVF MeetingVF StudentVF TrainerNew

### New Student

Information

Student Name

Last Name

Email

Whatsapp Number

First Name

Phone Number

Date of Birth  [ 1/8/2022 ]

Save

```

1 <apex:page standardController="Student__c" lightningStyleSheets="true">
2 <apex:form >
3 <center><apex:sectionHeader title="New Student"/></center>
4 <apex:pageBlock >
5 <apex:pageBlockSection title="Information" >
6 <apex:inputField value="{!Student__c.Name}"/>
7 <apex:inputField value="{!Student__c.First_Name__c}"/>
8 <apex:inputField value="{!Student__c.Last_Name__c}"/>
9 <apex:inputField value="{!Student__c.Phone_Number__c}"/>
10 <apex:inputField value="{!Student__c.Email__c}"/>
11 <apex:inputField value="{!Student__c.Date_of_Birth__c}"/>
12 <apex:inputField value="{!Student__c.Whatsapp_Number__c}"/>
13 </apex:pageBlockSection>
14 <center>
15 <apex:commandButton value="Save" action="{!save}"/>
16 </center>
17 </apex:pageBlock>
18 </apex:form>
19 </apex:page>

```

## Custom Visualforce Page of Trainer

**New Trainer**

**Details**

Full Name  Email

Date of Birth  [1/8/2022] Age

**Additional Info**

Experience  Expertise

Whatsapp Number  LinkedIn Profile

```

1 public with sharing class Trainerapex
2 {
3
4
5     public Trainer__c Trainerobj{get;set;}
6     public Trainerapex()
7     {
8         Trainerobj=new Trainer__c();
9     }
10    public PageReference saveRecord()
11    {
12        //PageReference pr=new PageReference();
13        insert Trainerobj;
14        ApexPages.addMessage(new ApexPages.message(ApexPages.Severity.Confirm,'Record Inserted Successfully'));
15        return null;
16    }
17
18 }

```

```

1 <apex:page Controller="Trainerapex" lightningStylesheets="true">
2 <apex:form >
3
4 <apex:sectionHeader title="New Trainer" />
5 <apex:pageBlock >
6 <apex:pageBlockSection title="Details" >
7 <apex:inputField value="{!Trainerobj.Full_Name__c}"/>
8 <apex:inputField value="{!Trainerobj.Email__c}"/>
9 <apex:inputField value="{!Trainerobj.Date_of_Birth__c}"/>
10 <apex:inputField value="{!Trainerobj.Age__c}"/>
11 </apex:pageBlockSection>
12
13 <apex:pageBlockSection title="Additional Info" >
14 <apex:inputField value="{!Trainerobj.Experience__c}"/>
15 <apex:inputField value="{!Trainerobj.Expertise__c}"/>
16 <apex:inputField value="{!Trainerobj.Phone_Number__c}"/>
17 <apex:inputField value="{!Trainerobj.Whatsapp_Number__c}"/>
18 <apex:inputField value="{!Trainerobj.Linkedin_Profile__c}"/>
19 </apex:pageBlockSection>
20
21 <center>
22 <apex:commandButton value="Save Record" action="{!saveRecord}" />
23 </center>
24

```

## Triggers

A trigger is an Apex script that executes before or after data manipulation language (DML) events occur. Apex triggers enable you to perform custom actions before or after events to record in Salesforce, such as insertions, updates, or deletions. Just like database systems support triggers, Apex provides trigger support for managing records.

### Trigger On Trainer Object

```

1 trigger ValidateDeleteOnTrainer on Trainer__c (before delete)
2 {
3     Trainer__c Trainerobj = Trigger.New[0];
4     //if the trainer have active batch it wont be able to delete
5     List<Batch__c> listbatch=[select Name,Status__c
6                               from Batch__c
7                               where Trainer_ID__c=:Trainerobj.Id];
8
9     Integer flag=0;
10    for(Batch__c b:listbatch)
11    {
12        if(b.Status__c!='Completed')
13        {
14            flag=1;
15            break;
16        }
17    }

```

## Trigger On Student Object

```
File Edit Debug Test Workspace Help < >
NewTrainerComponent.cmp NewTrainerComponentController.js NewTrainerApp NewTrainerApp.app NewTrainerApp.css StudentPhoneValidation.apxt StudentPhoneValidation.apxc
Code Coverage: None API Version: 53
1 public class StudentPhoneValidation
2 {
3     public static void phonevalidate(Student__c studobj)|
4     {
5         if(studobj.Phone_Number__c==' ' || studobj.Phone_Number__c==Null)
6         {
7             System.debug('Phone cannot be blank');
8         }
9         else
10        {
11            studobj.Whatsapp_Number__c=studobj.Phone_Number__c;
12        }
13    }
14 }
```

```
NewTrainerComponent.cmp NewTrainerComponentController.js NewTrainerApp NewTrainerApp.app NewTrainerApp.css StudentPhoneValidation.apxt StudentPhoneValid
Code Coverage: None API Version: 53
1 trigger StudentPhoneValidation on Student__c (before insert,before update)
2 {
3
4     // studobj -object to store one record at a time so we use Trigger.New[0] , Else Trigger.New returns list.
5     Student__c studobj1=Trigger.New[0];|
6     StudentPhoneValidation.phonevalidate(studobj1); //call apex class and its method
7 }
```

## Trigger On Meeting Object

```
NewTrainerComponent.cmp NewTrainerComponentController.js NewTrainerApp NewTrainerApp.app NewTrainerApp.css StudentPhoneValidation.apxt StudentPhoneValidation.apxc ValidateDeleteOnTrainer.apxt DatecheckonMeeting.ap
Code Coverage: None API Version: 53
1 trigger DatecheckonMeeting on Meeting__c (before insert)
2 {
3     for(Meeting__c mt :trigger.new)
4     {
5         if(mt.Valid_From__c<Date.today() )
6         {
7             mt.Valid_From__c.adderror('Valid From Date Should Be Greater Than Today');
8         }
9         if(mt.Valid_To__c < mt.Valid_From__c)
10        {
11            mt.Valid_To__c.adderror('Valid To Date shouldbe greater than valid from date');
12        }
13
14        Integer noOfDays = (mt.Valid_From__c). daysBetween(mt.Valid_To__c);
15        if(noOfDays < 14)
16        {
17            mt.Valid_From__c.adderror('Minimum 14 days difference should be present between one meeting');
18        }
19    }
20 }
```

## Conclusion:

In this project, I've brushed up many of my concepts like creation of object, applying validation rules, relationships, automations, Triggers and learnt how to create custom pages using visual. While doing all these, I found many errors but all were solved by other colleague or by Trainer. Our Trainer(mentor) supported me a lot to get hands on such a great project. I would look forward to join these kinds of short training in future for further more knowledge and brush up my skills. At present confident enough to work in any development project.

-----Thanks-----