LIGHTNING ACTIONS

FOR SALESFORCE LIGHTING EXPERIENCE USERS

HELLO LIGHTNING
WELCOME BACK BROWSER SCRIPTS

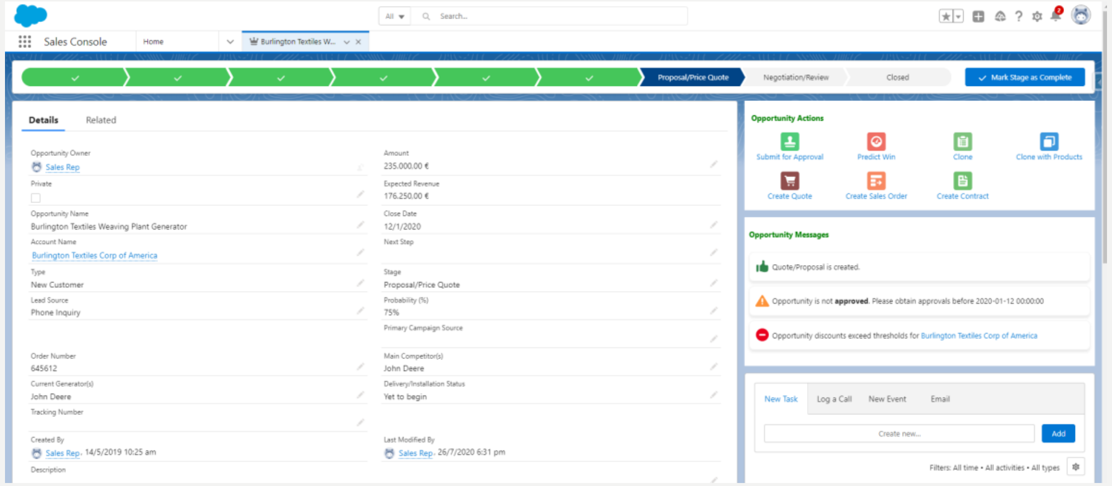
- Salesforce has introduced Lightning Platform, packed with more features, capabilities and powerful functions.
- Lightning Framework enables Dev team to create Apps faster and easier.
- One of great UI Framework from Lightning Platform is, LIGTHNING COMPONENT.
- Lightning Actions from Lightning Component UI Framework, enables team to code Action Buttons and Messages for Users.
- BUT how do we avoid code dependencies and allow Team to CONFIGURE changes.

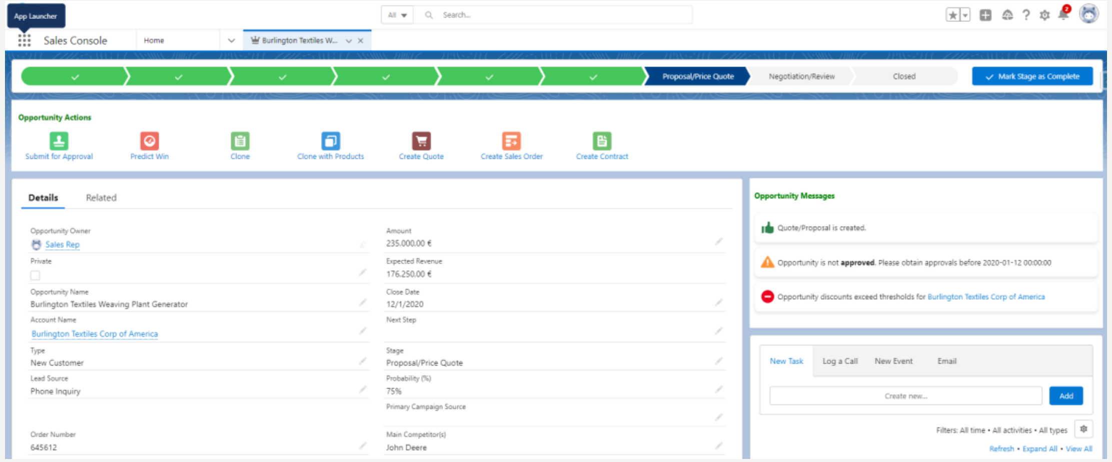
INTRODUCING APP . . .

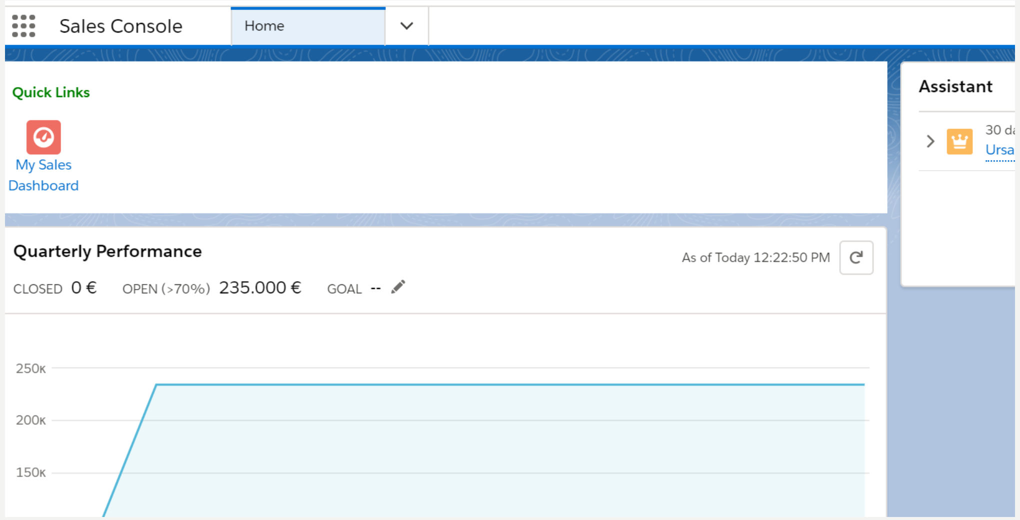
ADVANTAGE

- Configurable Lightning Actions for Lightning Record Page and Application Home Page.
- Absolutely NO-CODE ☺
- Drive visibility of Actions based on Criteria
- Built on Salesforce Design Principles.
- Responsive Design
- Supports any Salesforce Object.

HOW DOES IT LOOK







LET'S INSTALL APP

AFTER INSTALLING THE APP…

Assign	Assign yourself Righteous Lightning Action Administrator permission set. Assign other users Righteous Lightning Action User permission set.
Enable	Go to your profile and enable 2 record types under (Righteous) Lightning Action object. • Quick Action • Page Message

AN EXAMPLE, TO START WITH

SUPPOSE, YOUR SALES TEAM HAS INTRODUCED A NEW PROCESS TO PREDICT OPPORTUNITY WIN USING EINSTEIN ANALYTICS.

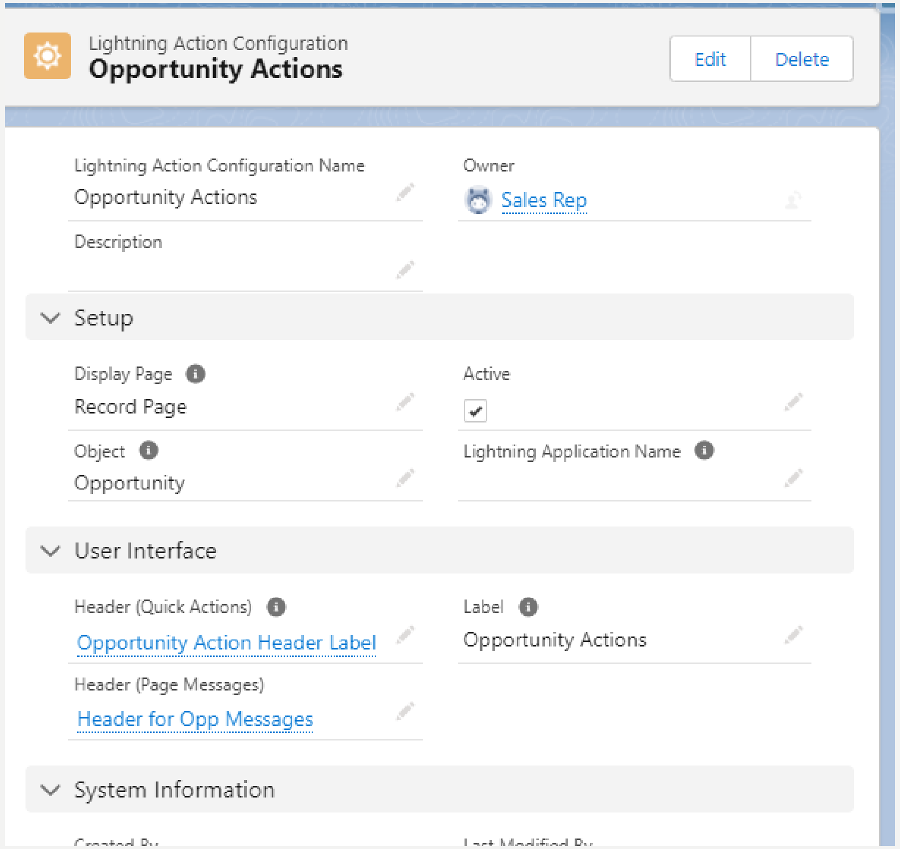
FUNCTIONAL TEAM WANTS TO SHOW AN ACTION BUTTON ON LAYOUT SO SALES REP CAN CHECK THE FUNCTION WHEN AVAILABLE.

I WILL HELP YOU TO CREATE AN ACTION FROM SCRATCH. FOLLOW THE PAGES TO END, TO CREATE ACTIONS WITHOUT ANY CODE.

STEP 1: CREATE CONFIGURATION

Go to 'Lightning Action Configuration' tab and create New

1. Give a logical name to Record Name. It is not used or displayed on UI.
2. Select 'Record Page' for Display Page.
3. Choose 'Opportunity' as Object. This would mean that we're creating Lightning Actions which are going to be displayed on Opportunity Record Page.
4. Header text for LightningAction and LightingMessage components. More details on Lightning Labels in next pages.
5. Let's not select the Activate checkbox
6. Save



- Display Page is of 2 types, Actions can displayed on Record Page or Lightning App Home Page.
- If Actions are created for Home Page, choose Display Page and Lightning Application Name.
- Lightning Labels are User Interface label, and can be translated to any language supported by Salesforce.

STEP 2: CREATE A NEW LIGHTNING ACTION

WITH "QUICK ACTION" RECORD TYPE

USER INTERFACE

1. Label Type: Lightning Label (to enable translated values)

   Create a new Lightning Label or provide a static label value.
2. ICON: Name of the icon. Icon name should be referenced from Salesforce Lightning Design System library
3. SEQUENCE: Display order of action on UI.
4. Provide Icon Size, Tooltip text etc.

TARGET

1. TARGET TYPE: Select if User should be redirected to URL or Visual Flow should be invoked.
2. TARGET URL:

   Provide custom URL. You may use Object custom field value to be passed in URL as Parameter.
   Example:
   /apex/PredictOpportunityWin?id={!Id}

   Or use Visual Flow Name to be called.

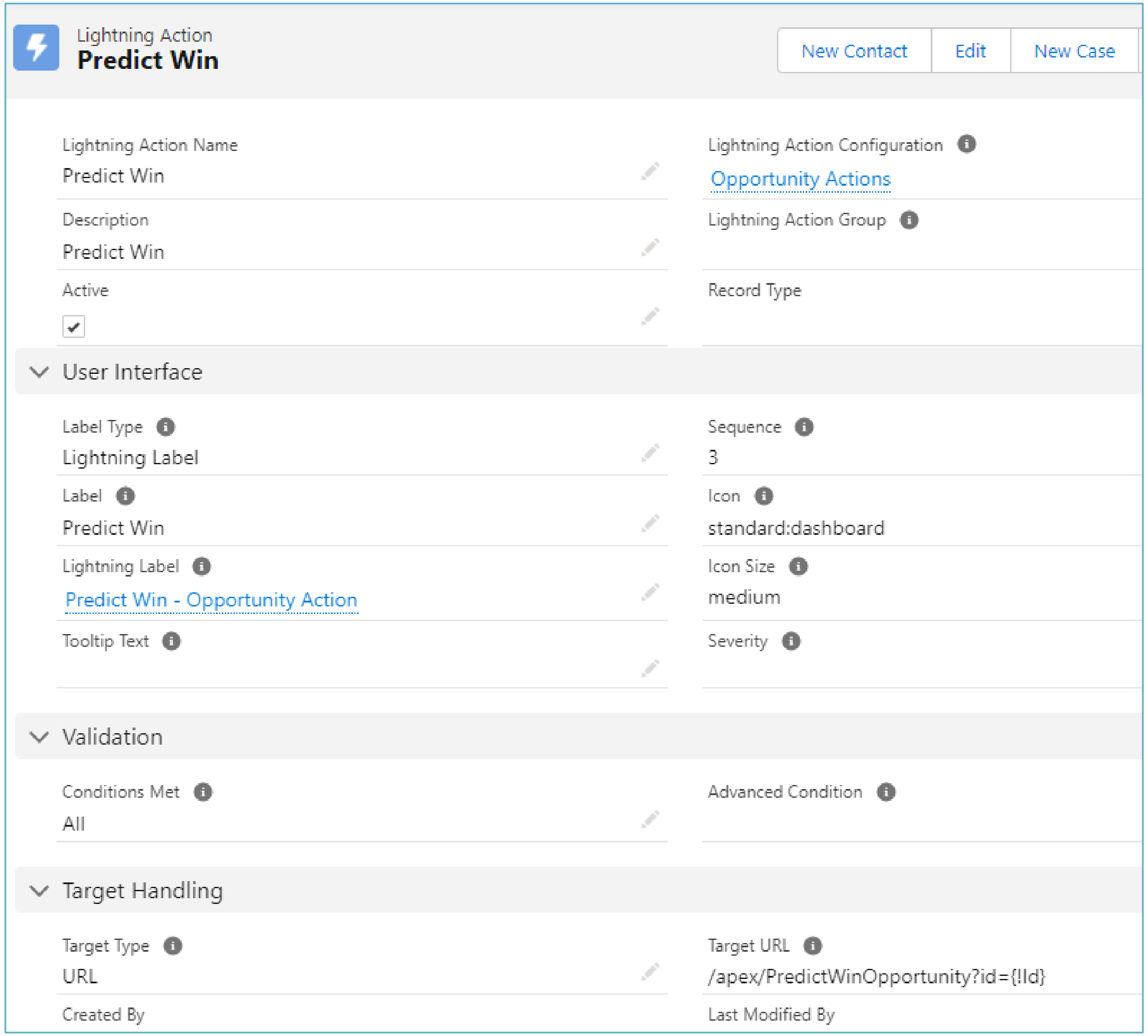
Object field value in URL goes in format of {!<fieldname>}

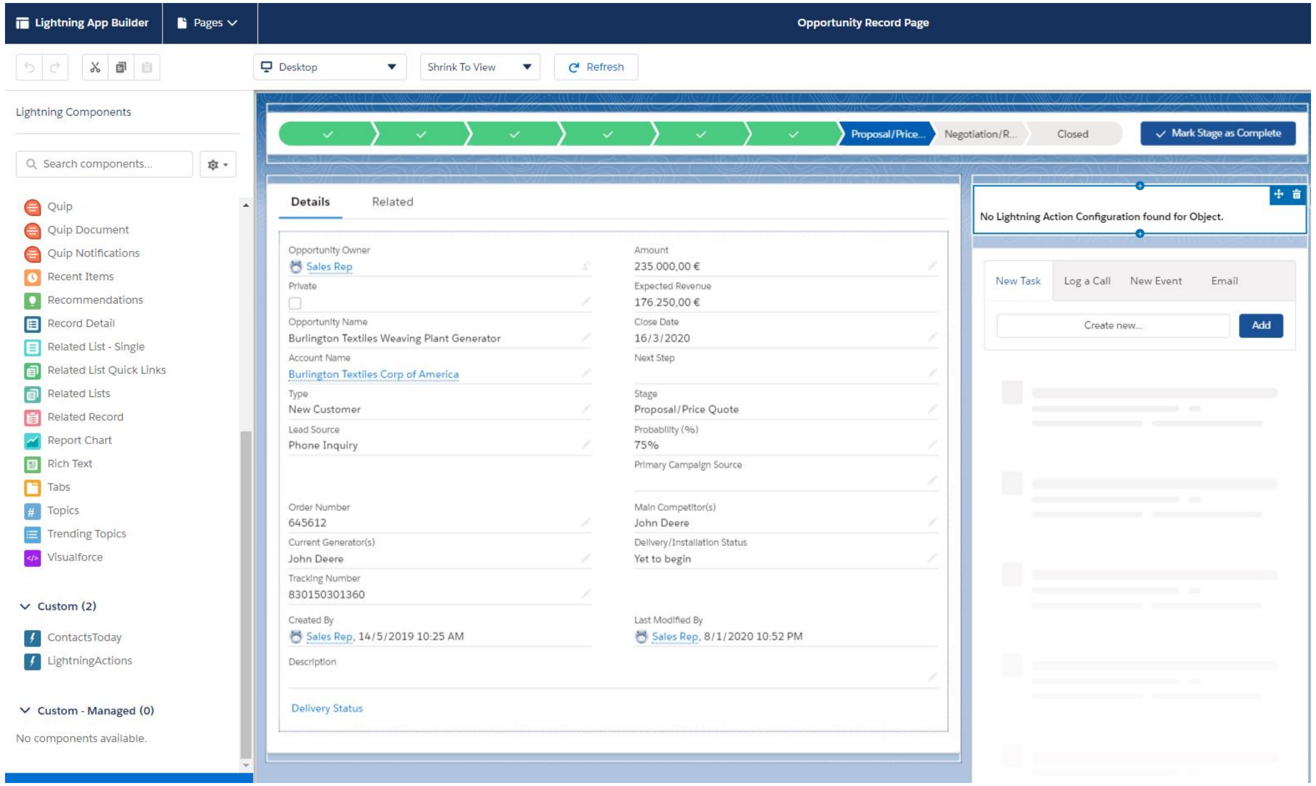
CONDITION

Hold on it for now

LOOKS GOOD ?

LET'S SEE HOW IT LOOKS ON PAGE.





STEP 3: ADD LIGHTNING COMPONENT ON PAGE

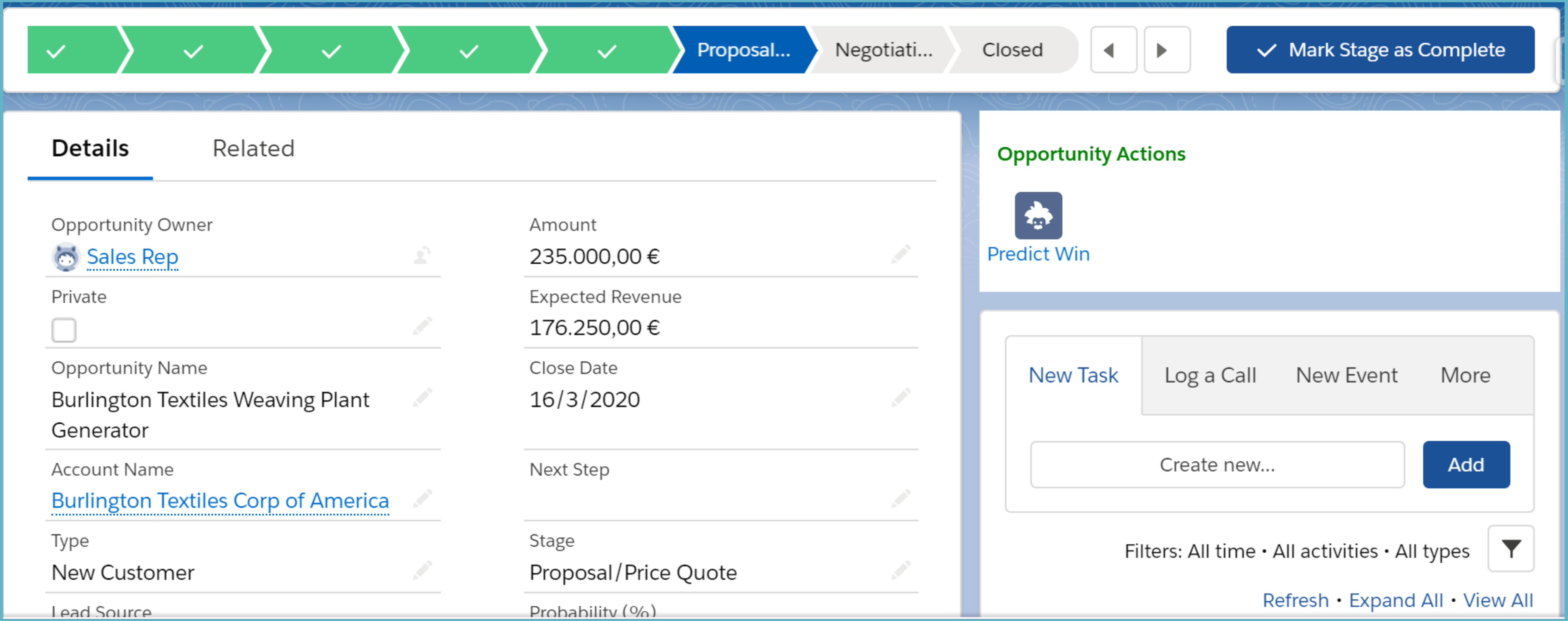
Edit Opportunity Object's Lightning Record Page.

Select 'LightningActions' from Component Panel from left and drag it to target section.

Save and click on Activation button.

DON'T SEE ACTION ON PAGE?

HMMM.. DID YOU ACTIVATE THE LIGHTNING ACTION CONFIGURATION AND/OR LIGHTNING ACTION YOU CREATED IN STEP -I AND STEP - II.


Proposal...
Negotiati...
Closed
Mark Stage as Complete
Details
Related
Opportunity Owner
Sales Rep
Private
Opportunity Name
Burlington Textiles Weaving Plant Generator
Account Name
Burlington Textiles Corp of America
Type
New Customer
Lead Source
Amount
235.000,00 €
Expected Revenue
176.250,00 €
Close Date
16/3/2020
Next Step
Stage
Proposal/Price Quote
Probability (%)
Opportunity Actions
Predict Win
New Task
Log a Call
New Event
More
Create new...
Add
Filters: All time • All activities • All types
Refresh • Expand All • View All

LOOKS GOOD.

NOW, IT WOULD MAKE SENSE TO HIDE THIS ACTION WHEN OPPORTUNITY IS CLOSED ALREADY.

FINE, LET'S GO BACK TO THE ACTION WE CREATED IN STEP 2.

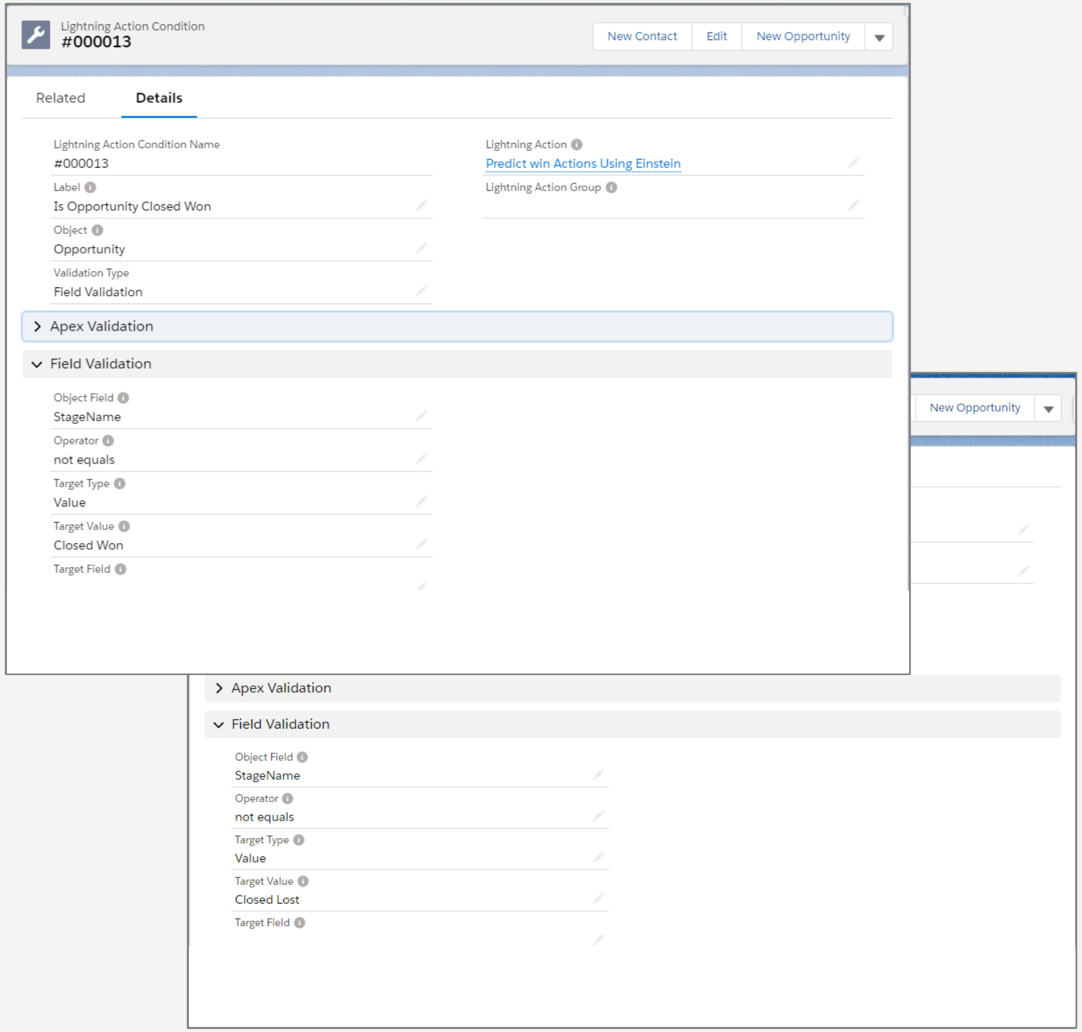
REMEMBER, I TOLD YOU TO HOLD ON CONDITION SECTION ON STEP – 2. NOW IS THE TIME TO GO BACK TO IT.

STEP 4: CREATE ACTION CONDITION

Create Action Condition for Is "Opportunity not Closed Won"

1. Choose Object as Opportunity
2. Choose 'Field Validation' as Validation Type.
3. Provide 'StageName' as Object Field.
4. Select 'not equals' for Operator.
5. Select 'Value' for Target Type.
6. Target Value would 'Closed Won'.

Create another Action Condition for "Is Opportunity not Closed Lost".



VALIDATION

UPDATE THE OPPORTUNITY TO CLOSE WON OR CLOSED LOST.

NOTICE THAT ‘PREDICT WIN’ ACTION IS NO MORE VISIBLE.

STILL NOT COMPLETE?

PERFECT, BUT PREDICT WIN ACTION SHOULD ONLY BE VISIBLE:

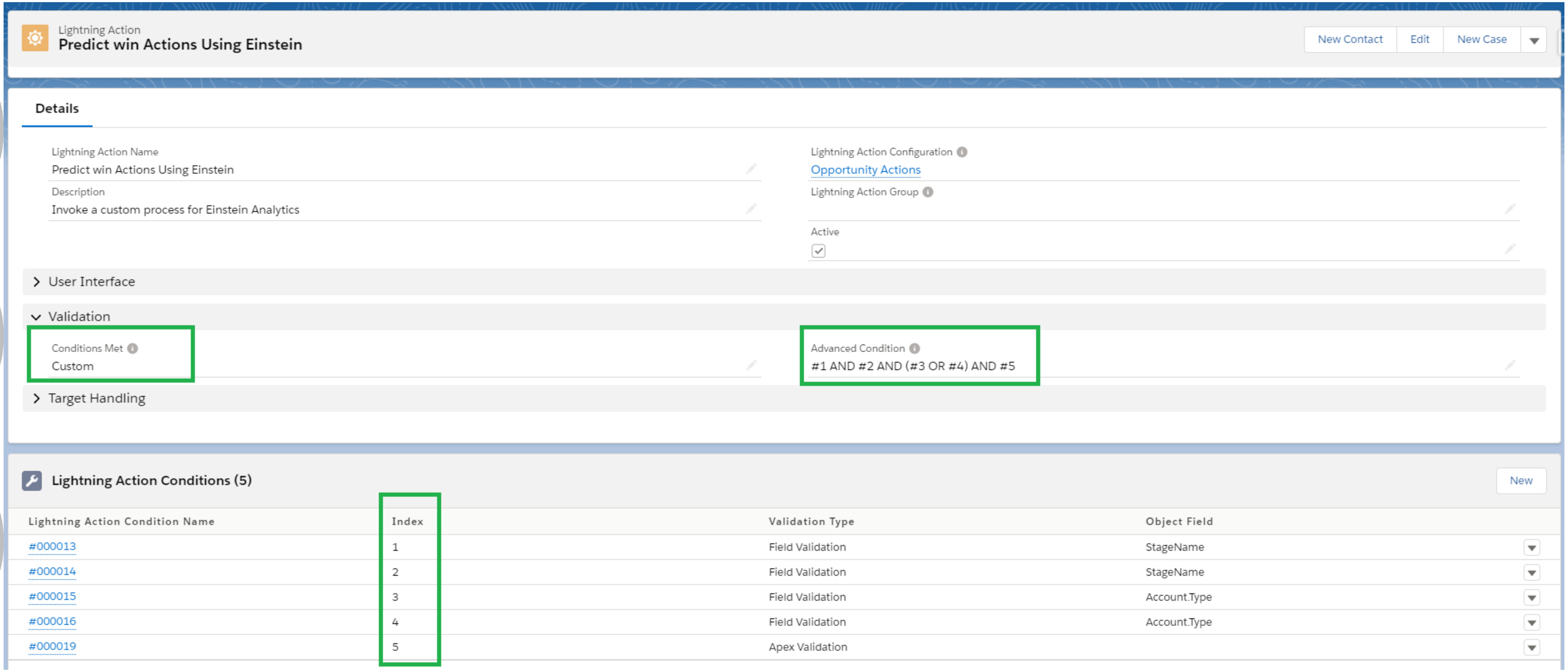
IF OPPORTUNITY ACCOUNT IS OF TYPE “CUSTOMER – DIRECT” OR “CUSTOMER – CHANNEL”.

ADD MORE CONDITIONS TO 'PREDICT WIN'

Create Action Condition for "Is Opportunity Account Customer – Direct"

1. Choose Object as Opportunity
2. Choose 'Field Validation' as Validation Type.
3. Provide 'Account.Type' as Object Field.
4. Select 'equals' for Operator.
5. Select 'Value' for Target Type.
6. Target Value would 'Customer - Direct'.

Create another Action Condition for "Opportunity Account Customer – Channel".


Lightning Action
Predict win Actions Using Einstein
New Contact
Edit
New Case
Details
Lightning Action Name
Predict win Actions Using Einstein
Description
Invoke a custom process for Einstein Analytics
Lightning Action Configuration
Opportunity Actions
Lightning Action Group
Active
User Interface
Validation
Conditions Met
Custom
Advanced Condition
#1 AND #2 AND (#3 OR #4) AND #5
Target Handling
Lightning Action Conditions (5)
New
Lightning Action Condition Name
Index
Validation Type
Object Field
#000013
1
Field Validation
StageName
#000014
2
Field Validation
StageName
#000015
3
Field Validation
Account.Type
#000016
4
Field Validation
Account.Type
#000019
5
Apex Validation

CAN WE RESTRICT ACCESS FURTHER?

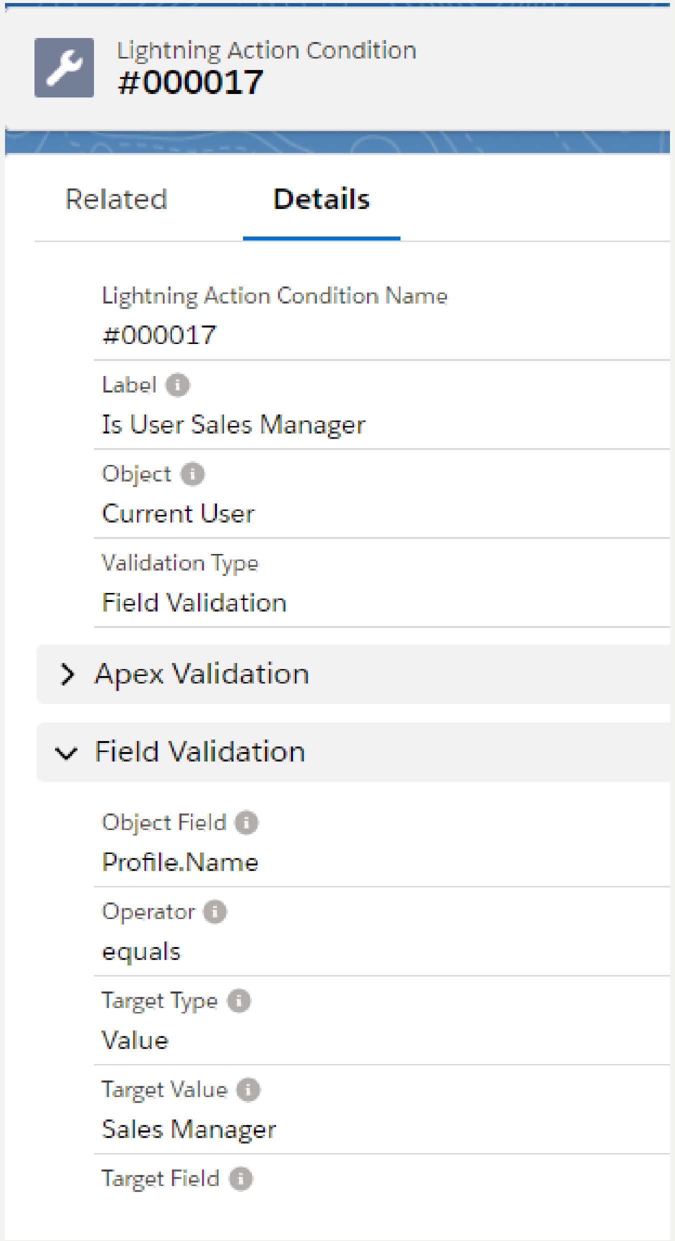
WORKS WELL, NOW ACTION SHOULD ONLY BE VISIBLE TO “SALES MANAGER” USERS.

VALIDATE LOGGED IN USER

Create an Action Condition for and name it as “Is User Sales Manager”.

1. Choose Object as User
2. Choose ‘Field Validation’ as Validation Type.
3. Provide ‘Profile.Name’ as Object Field.
4. Select ‘equals’ for Operator.
5. Select ‘Value’ for Target Type.
6. Target Value would ‘Solution Manager’.

Don‘t forget to add Condition back to your Advanced Condition expression ☺



Object Field follows convention of SOQL. You may use any field which is part of valid SOQL.
e.g., **Account.CreatedBy.Profile.Name** for Opportunity Object field.

YOU KNOW WHAT, SCRATCH THAT.

WELL, I WAS DEMONSTRATING THIS PREDICT WIN TO OTHER TEAM MEMBERS. THEY ARE IMPRESSED AND WANT TO USE IT.

BUT THEY ARE NOT SALES MANAGER, SOME USERS HAVE DIFFERENT PROFILE AND ROLE ASSIGNED.

HOW DO WE CONFIGURE ACTIONS IN THIS CASE. I REALLY DON'T WANT TO CREATE TOO MANY CONDITIONS AND LONG EXPRESSION.

I THINK, IT'S TIME TO CALL CODEY.

Hey Codey

Hi, How's going?

Great, Thanks ☺
I need your quick help.

Shoot ☺

Remember, I was using that App for managing Actions in Lightning Component.

I need to extend Predict Win to other users as well, who are other than just Sales Manager.

How do we control the visibility and access of the action.

Hmm.. Let's create a Custom Permission to handle that.

I will create "Einstein Opportunity Predict Win User" custom permission set.

In the App, we can use Apex Validators as well. So we will write small Apex class to check
if logged in user has this custom permission.

Okay, that's great. I will connect with you shortly to discuss more on this.
Thanks for quick help though. Have a good day !

APEX BASED VALIDATION…

Related | **Details**

Lightning Action Condition Name
#000019

Lightning Action
Predict win Actions Using Einstein

Label
Current User Custom Permission Set check

Lightning Action Group

Object
Current User

Validation Type
Apex Validation

Apex Validation

Apex Class Name
OpportunityLightningActionValidations.CustomPermissionSetValidator

Apex Query Fields
Name, Email, Profile.Name

```
global class OpportunityLightningActionValidations {

    private static final String PREDICT_WIN_CUSTOM_PERMISSIONSET = 'OpportunityPredictWinUser';

    global class CustomPermissionSetValidator implements Righteous.ILightningActionConditionValidator {

        global boolean validateCondition(SObject recordSO,
                                         Map<String, Righteous.SObjectFieldValueWrapper> recordFieldValueMap) {

            User userSO = (User) recordSO;

            System.debug('Validating if logged in User has Custom Permissioset');
            System.debug('Current User Info: Name = '+userSO.Name);
            System.debug('Current User Info: Email = '+userSO.Email);

            return FeatureManagement.checkPermission(PREDICT_WIN_CUSTOM_PERMISSIONSET);
        }
    }
}
```

- Apex Validator Class must implement ILightningActionConditionValidator interface.
- Developers do not need to write SOQL in Apex callback method. Specify Object Field API names in Apex Query Fields to use values in callback method.
- In Callback, Developer may use either SObject instance or Map of Field-Value pair of record.

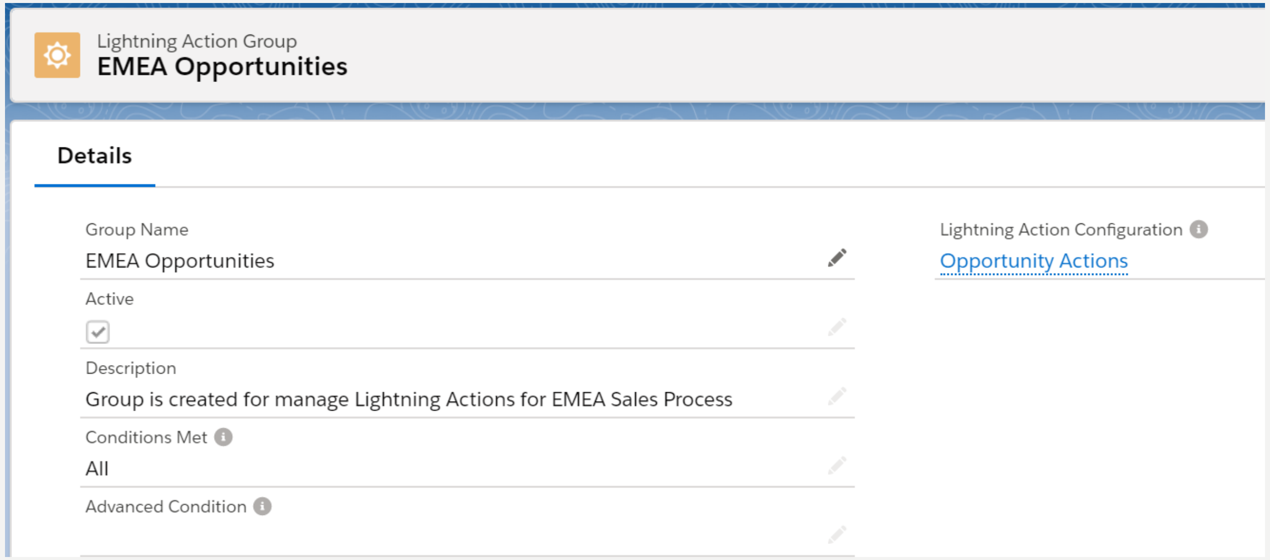
IT'S GETTING POPULAR.

- Our global sales team is also interested and excited to managed their sales click paths using lightning actions app.
- I have already discussed their sales process setup with respective sales ops team.
- We do have an issue here, our sales process is so diverse based on geographical region, and there is no chance they can use our config.
- So let's create a Lightning Action Group for them, and divide actions into groups. As we're using record type for logical distribution of Opportunities, we will use the same for grouping actions.

STEP 6: GO BACK TO LIGHTING ACTION CONFIGURATION

Go to 'Opportunity Actions' Lightning Action Configuration record created in Step – 1.

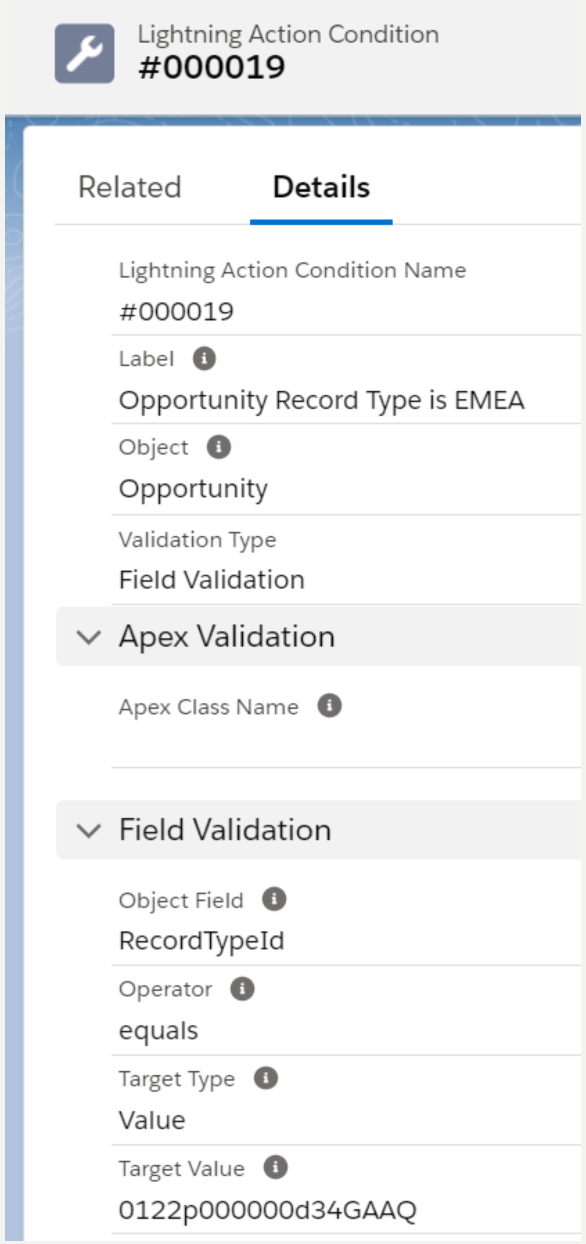
1. Create New Lightning Action Group for EMEA.
2. Mark 'Active' checkbox.
3. Set 'All' for Condition Met.
4. Save.



STEP 7: CREATE CONDITIONS FOR GROUP

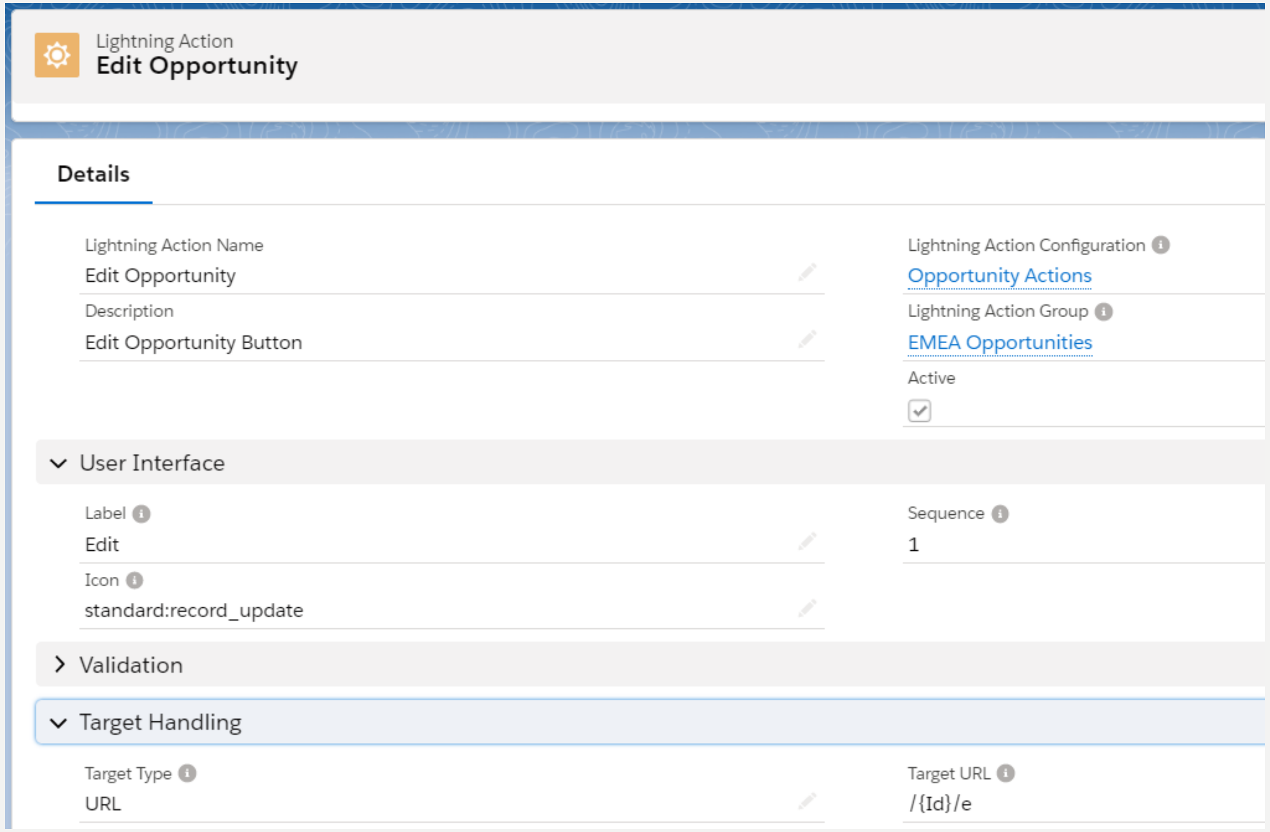
Go to 'EMEA Opportunities' Lightning Action Group record created in Step – 6.

Create a New Lightning Action Group Condition of Field Validation Type, and check if Opportunity Record Type is EMEA.



STEP 8: CREATE LIGHTNING ACTION FOR EMEA

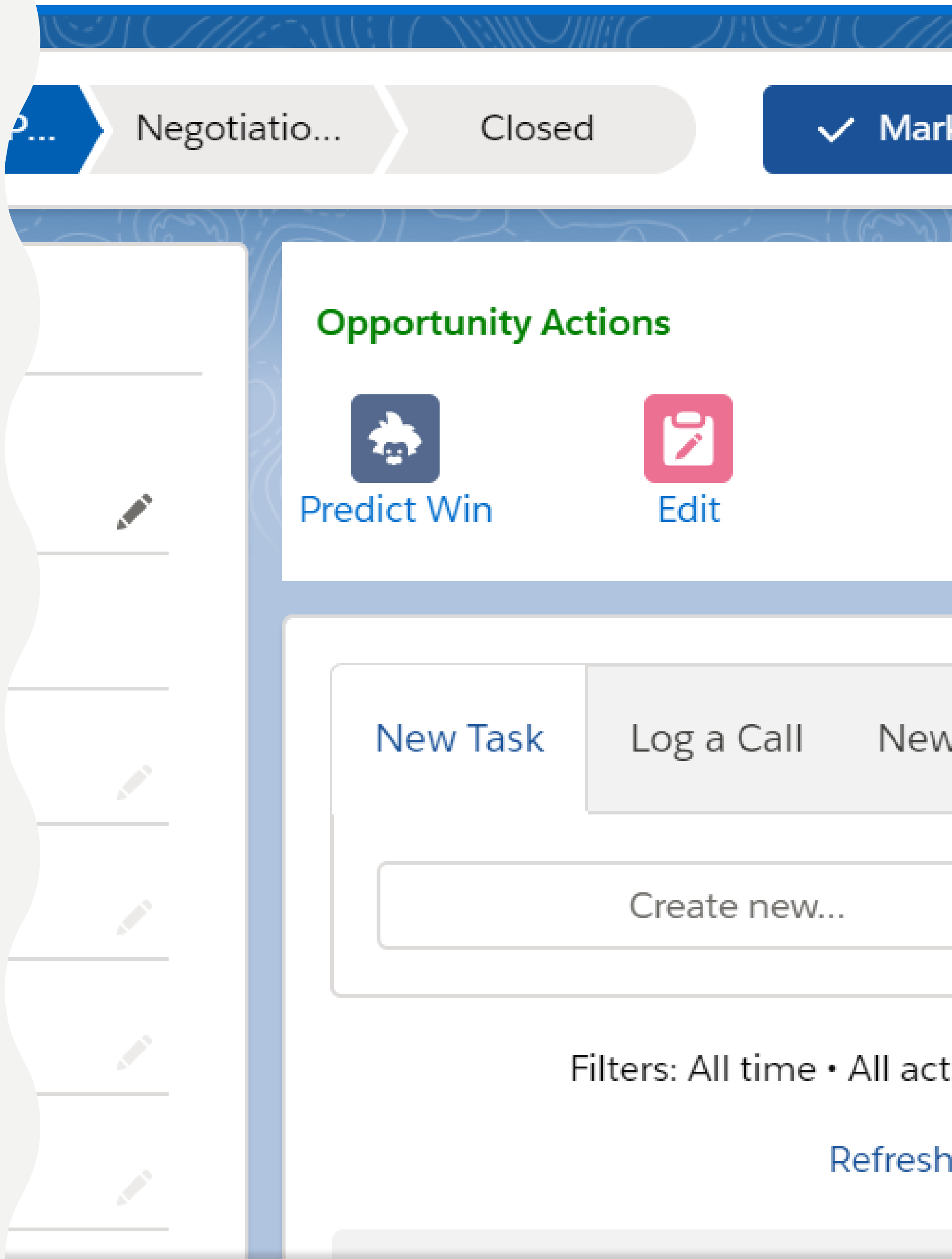
- Create New Action ‘Edit Opportunity’ for EMEA Sales Process.
- Associate Lightning Action with Parent Lightning Action Configuration for Opportunity.
- Associate curent Lightning Action with Lightning Action Group for EMEA
- Setup UI and Target URL attribtes.
- Activate.
- Save



- Important to note here, Lightning Action record is linked to Lightning Action Group for EMEA.
- Lightning Action Group Conditions will be evaluated first, and if Group Conditions are met, then only Lightning Action records’ conditions will be evaluated.

PERFECT…!

- Edit Actions is now only getting displayed for EMEA Opportunities.
- We can ask EMEA Functional Team to manage their Actions under 'EMEA' Lightning Action Group.



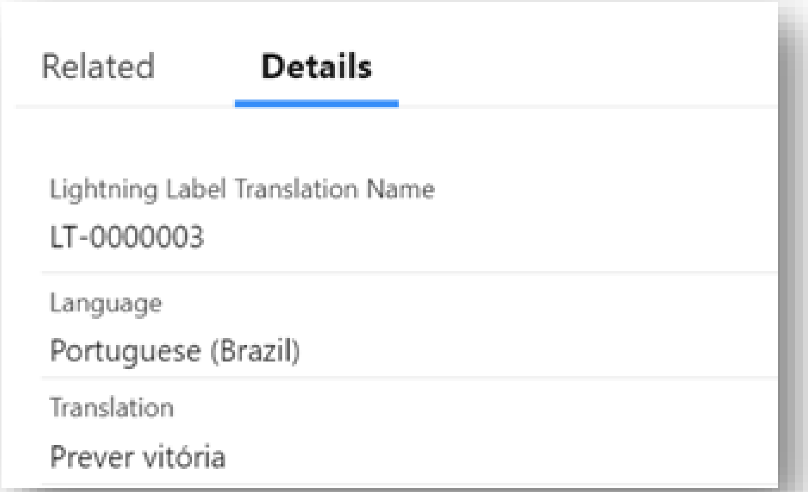
ENABLE TRANSLATED USER EXPERIENCE

Global team from Europe and APAC region wants to use the system. The users are using non-English. We must translate the UI Texts in logged in user's native language.

Please execute below steps to translate.

Go to any Lightning Label we created in earlier steps.

- Click on New Lightning Label Translation.
- Select the target Language and provide Translation.

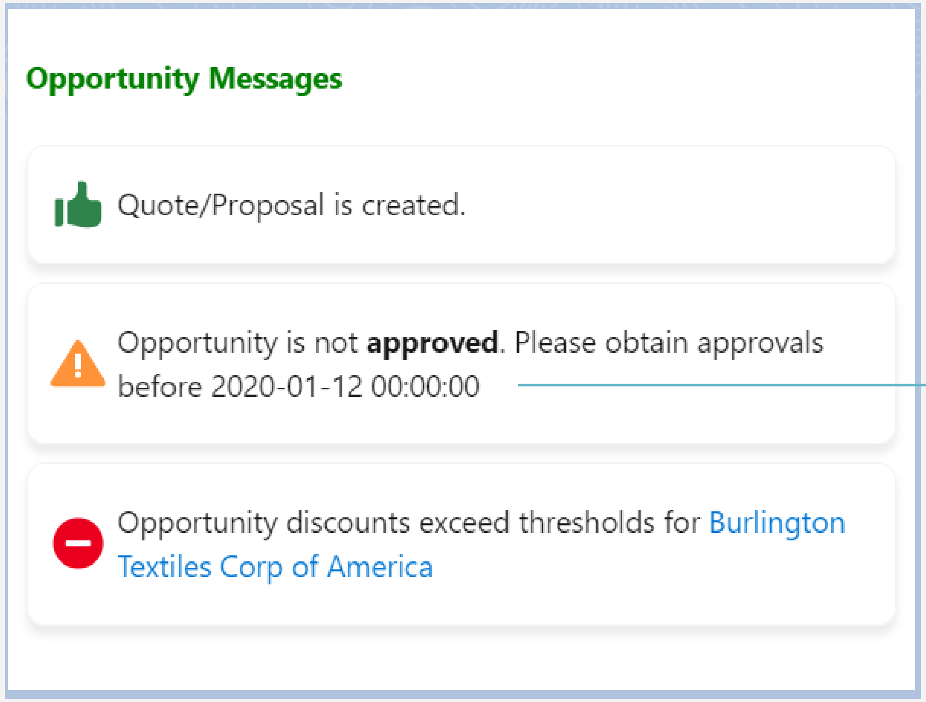


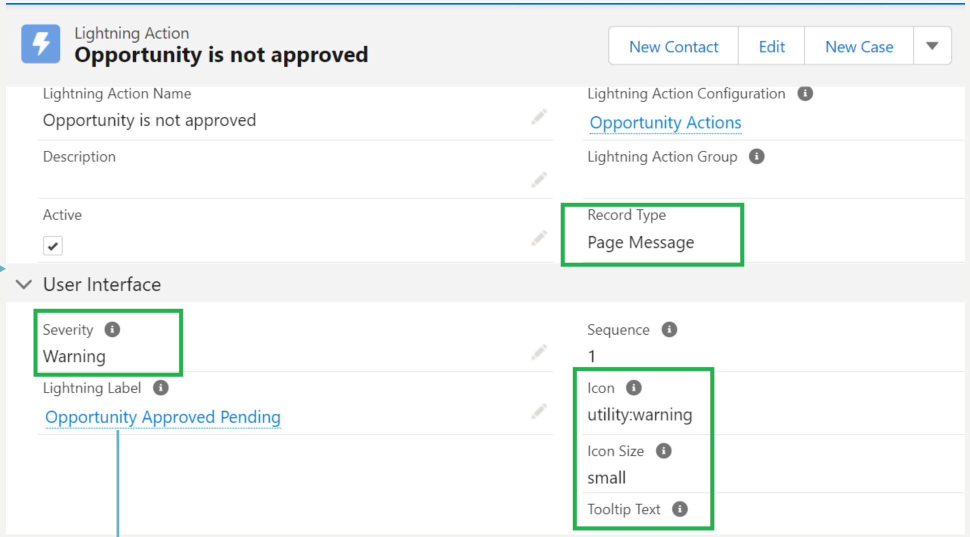
When any user with Portuguese language log in, they would view Translated Lightning Action. Lightning Actions 100% translatable.

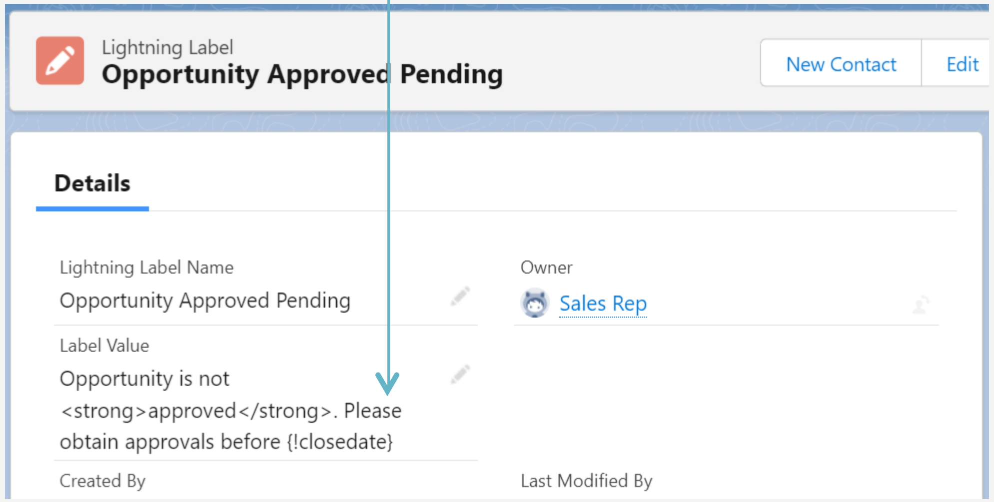
CAN WE ADD CONDITIONAL MESSAGES TO GUIDE SALES TEAM?

- We need to configure criteria-based Lightning Messages. Just like clickable actions we created, we can also create Page Messages.
- You might have noticed "Page Message" record type while creating Lightning Actions.
- Create any Lightning Actions of type "Page Message" and activate it. Page Messages only support Lightning Label based texts. We can also have merge fields in Lightning Labels. Examples are in following pages.
- Edit Opportunity Lightning Record Page and add "LightningMessages" aura component.

OPPORTUNITY APPROVAL WARNING

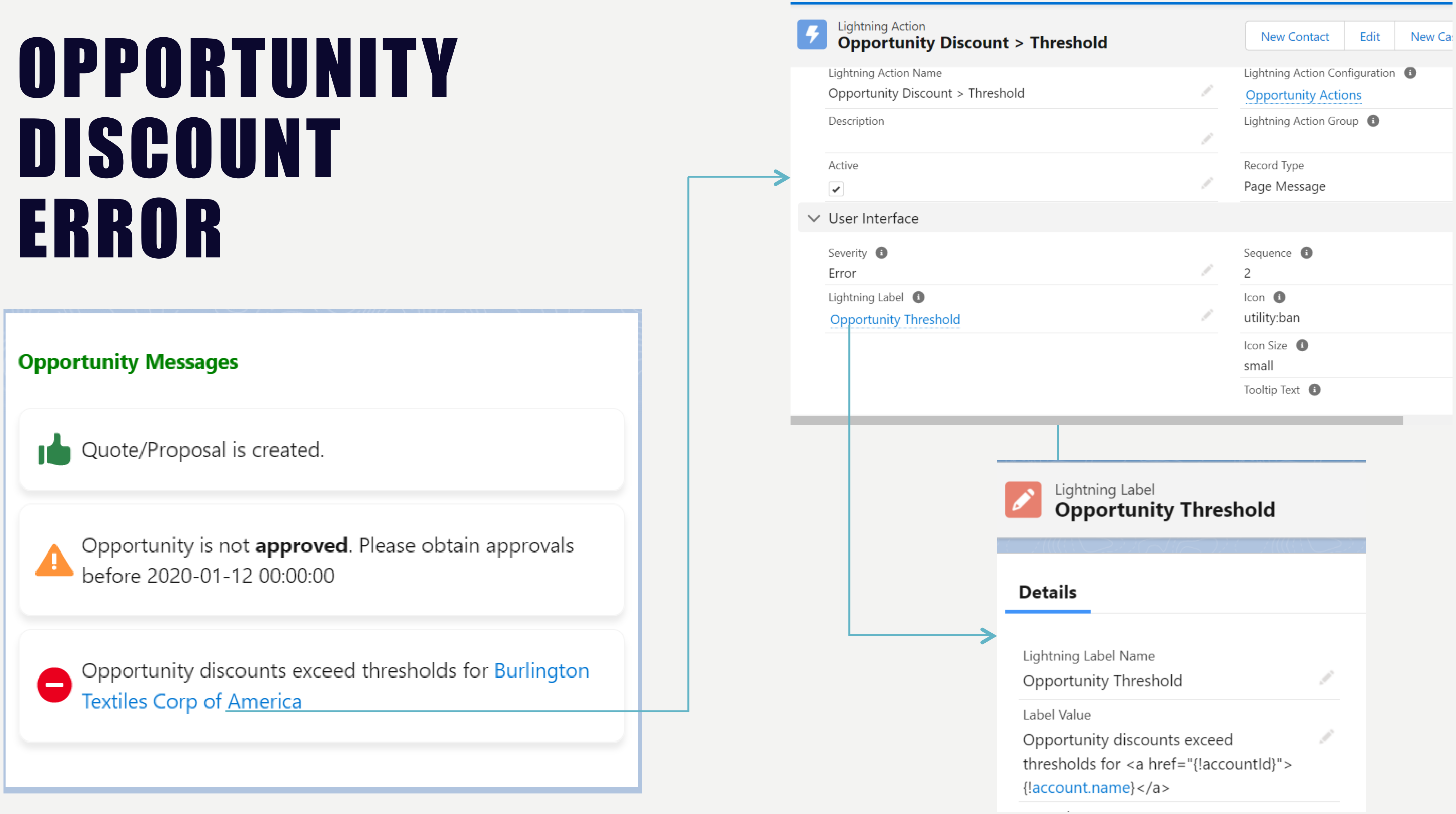






Page Messages can be dynamic and formatted. It supports native html format tags and merge fields

OPPORTUNITY DISCOUNT ERROR

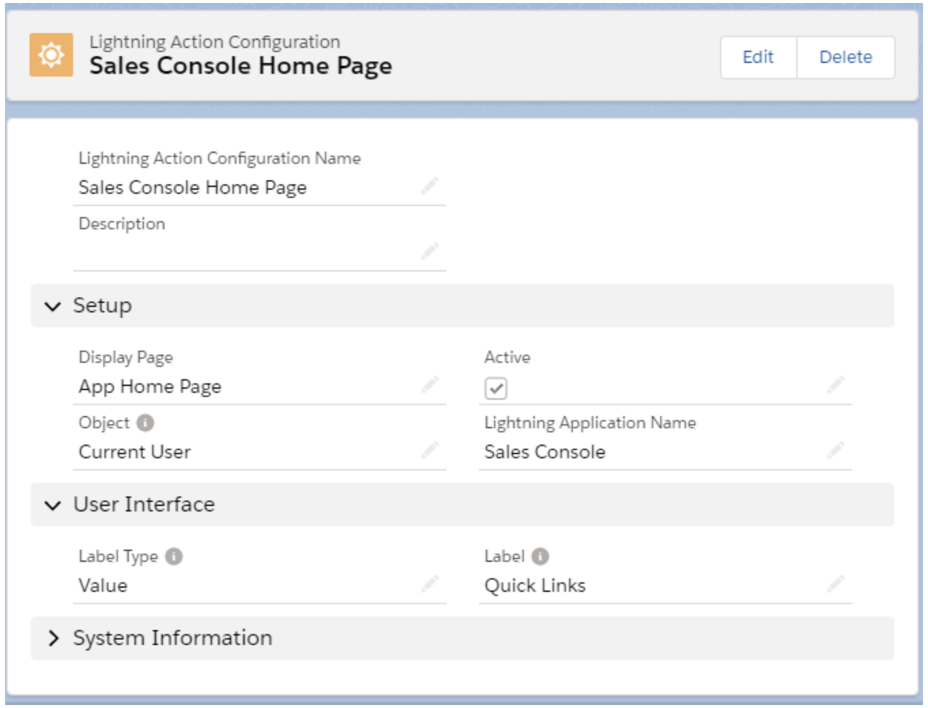


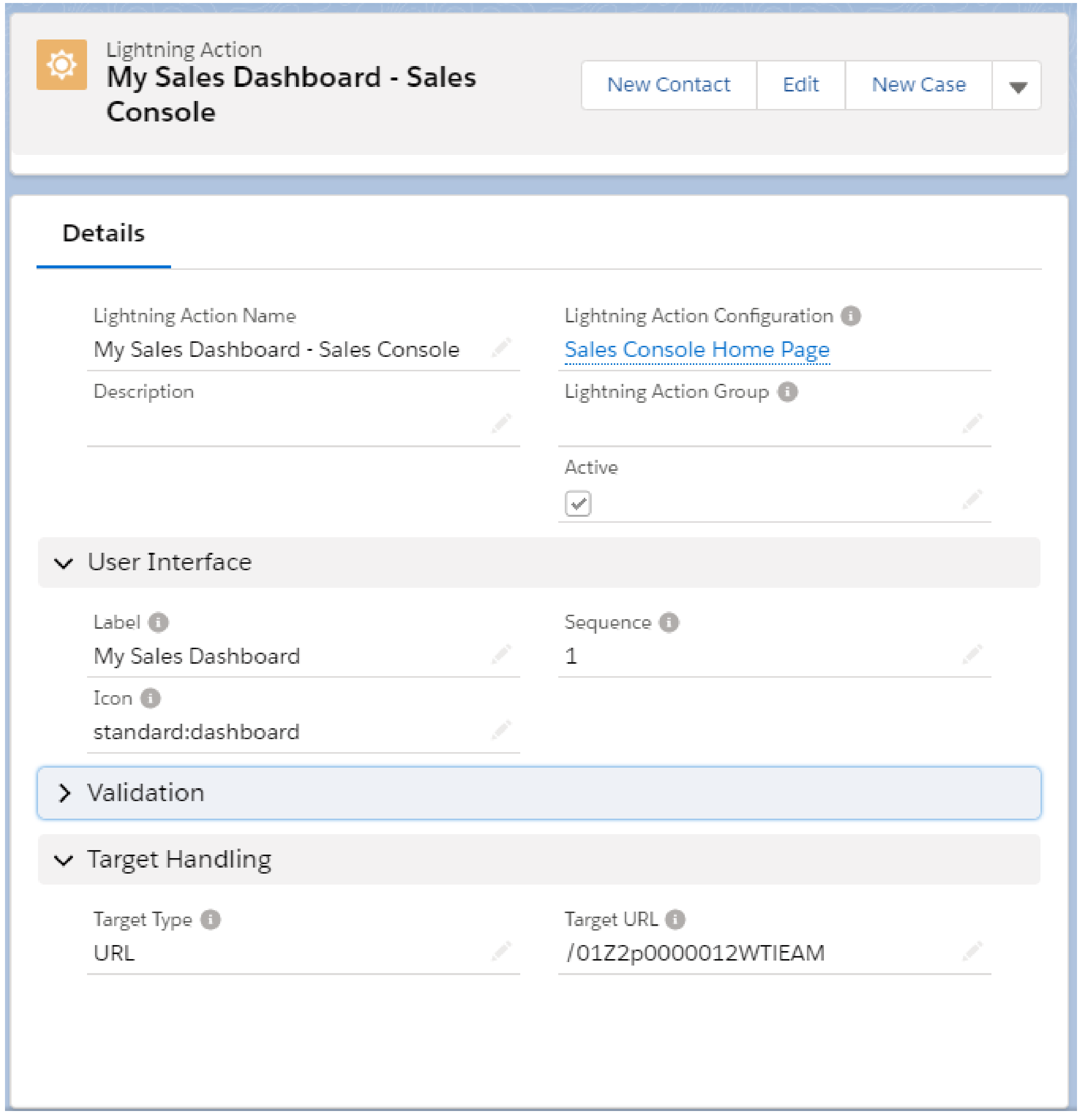
HOW ABOUT ADDING ACTIONS ON HOME PAGE?

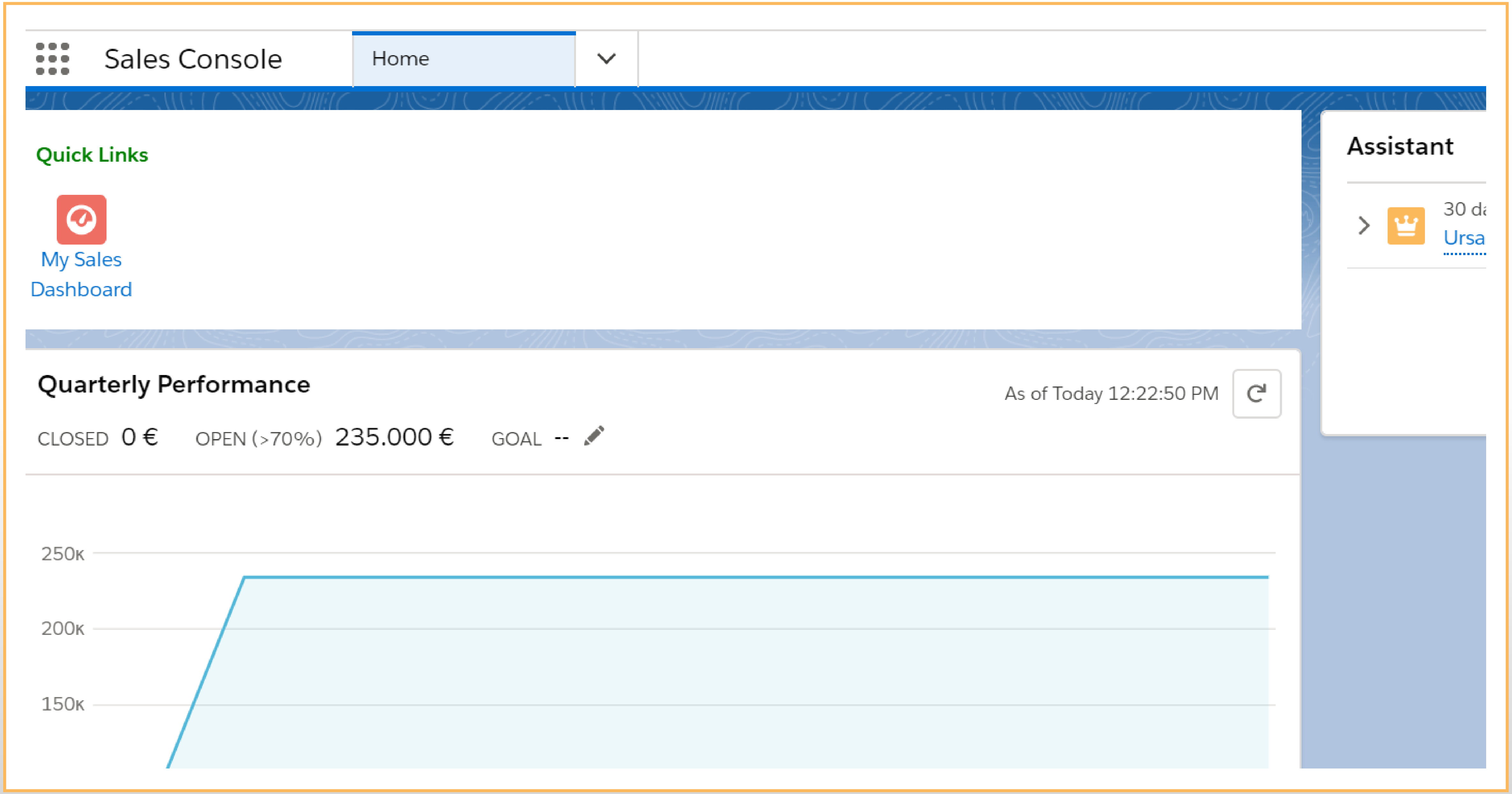
- I will let you configure Actions which are going to be displayed on 'Sales Console' App Home Page.
- Create one Action which should redirect user to 'MySalesPerformance' dashboard.

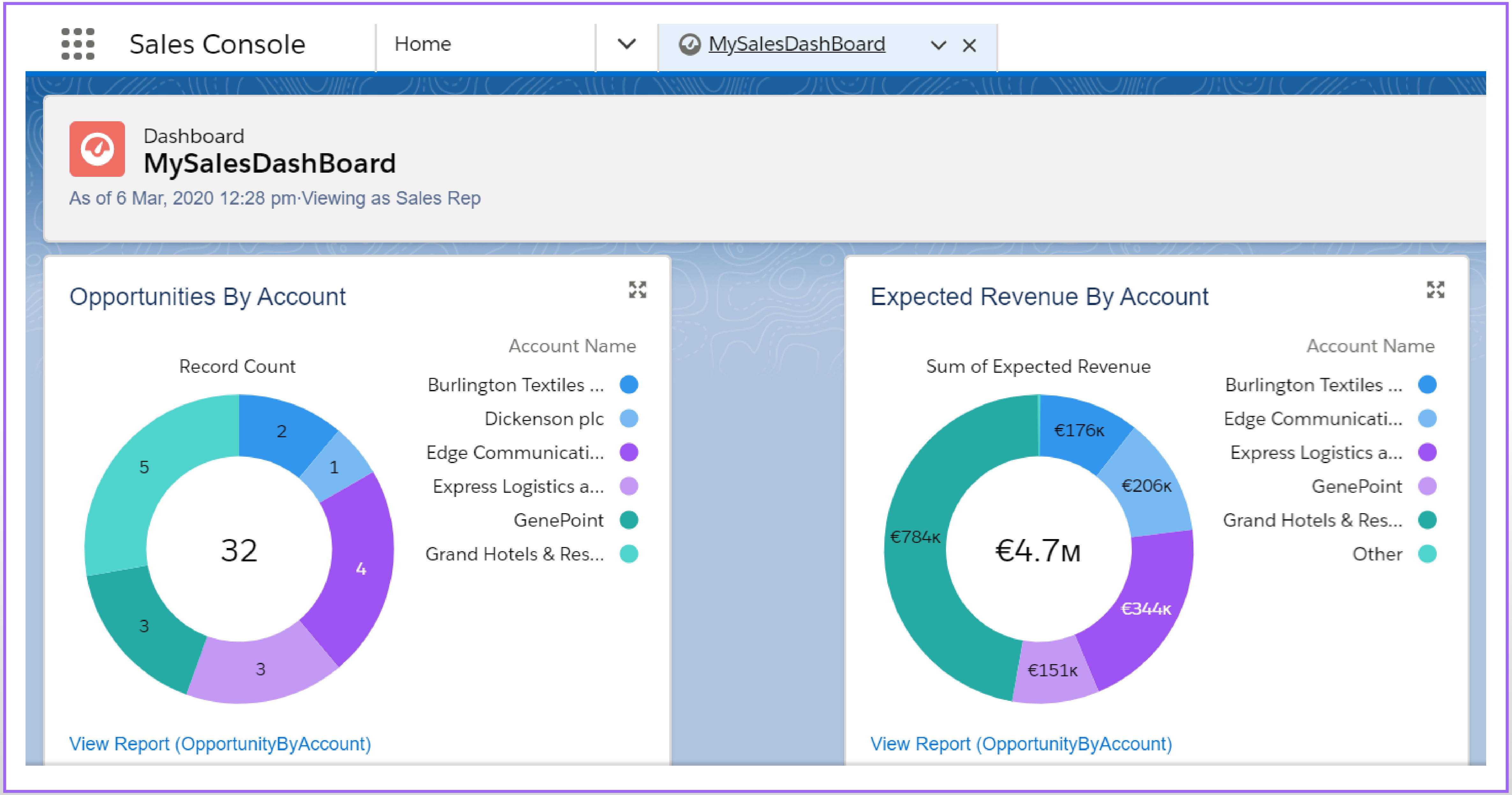
- Hint: Create a new Lightning Action Configuration records and choose field value as:
  - Display Page → App Home Page
  - Object → Current User
  - Lightning Application Name → Sales Console

- Add Lightning Component Sales Console App page.
- Let me show you snapshots of what my colleague has configured.


Lightning Action Configuration
Sales Console Home Page
Edit
Delete
Lightning Action Configuration Name
Sales Console Home Page
Description
Setup
Display Page
App Home Page
Active
Object
Current User
Lightning Application Name
Sales Console
User Interface
Label Type
Value
Label
Quick Links
System Information


Lightning Action
My Sales Dashboard - Sales Console
New Contact
Edit
New Case
Details
Lightning Action Name
My Sales Dashboard - Sales Console
Lightning Action Configuration
Sales Console Home Page
Description
Lightning Action Group
Active
User Interface
Label
My Sales Dashboard
Sequence
1
Icon
standard:dashboard
Validation
Target Handling
Target Type
URL
Target URL
/01Z2p0000012WTIEAM


Sales Console
Home
Quick Links
My Sales Dashboard
Assistant
30 d
Ursa
Quarterly Performance
As of Today 12:22:50 PM
CLOSED 0 €
OPEN (>70%) 235.000 €
GOAL --
250K
200K
150K


Sales Console
Home
MySalesDashBoard
Dashboard
MySalesDashBoard
As of 6 Mar, 2020 12:28 pm·Viewing as Sales Rep
Opportunities By Account
Record Count
Account Name
Burlington Textiles ...
Dickenson plc
Edge Communicati...
Express Logistics a...
GenePoint
Grand Hotels & Res...
2
1
4
3
3
5
32
View Report (OpportunityByAccount)
Expected Revenue By Account
Sum of Expected Revenue
Account Name
Burlington Textiles ...
Edge Communicati...
Express Logistics a...
GenePoint
Grand Hotels & Res...
Other
€176K
€206K
€344K
€151K
€784K
€4.7M
View Report (OpportunityByAccount)

THAT'S IT, BUT STILL HAS MORE TO IT…

- Good Stuff, I hope you were able to configure and validate the changes along.
- You know what, there is no harm in playing with data. Create buttons, add conditions, remove conditions, add groups, etc.
- Try to recall any use case you had come across in past and try to configure here.
- Create config for any of your Custom Object's record page. You just need to add Object API Name to 'Object' Picklist and you're good to go.

USEFUL TIPS FOR ADMINS

- If any Lightning Action admins configured is not getting rendered and they want to debug, check the browser console (F12) to see if any condition is throwing the error.
- Righteous Lightning Action application executes following all security principles. So please make sure if any field used in condition, the corresponding FLS is given to running user.
- In case severe failure, The App displays the standard error messages. You can always override the error messages by doing Custom Label Translation Override.
- The running user must have access to Lightning Action Configuration, Lightning Action, Lightning Action Condition, Lightning Action Group, Lightning Label and Lightning Label Translation access. It is recommended to assign *Righteous Lightning Action User* permission set to running users.
- Admins can design the Sharing model on Lightning Action Configuration and Lightning Action objects, to manage different Action Configurations for different team members.
- Any Lightning Action Configuration can also be evaluated by calling Managed Package class. If admin prefer to build the custom UI, they can still configure the action and criterias using code:

SAMPLE CODE FOR CUSTOM LIGHTNING ACTION CONTROLLER

```
public class CustomLightningActionController{


    public List<righteous__LightningAction__c> getValidConditions(Id opportunityId) {
        /** method signature:
         *
         * righteous.LightningActionAPI.validateActions(String displayType, String objectAPIName, Id recordId)
         *
         * displayType : Record Page
         * objectAPIName: API name of the custom/standard object
         * recordId: Id of the record of object type.
         *
         * */
        righteous.LightningActionResponseWrapper validActionResultWrapper =
                righteous.LightningActionAPI.validateActions('Record Page', 'Opportunity',opportunityId);

        System.debug(validActionResultWrapper);
        return validActionResultWrapper.lightningActionList;


    }
}
```

CUSTOM LABELS USED IN APPLICATION

Name	Value
LightningAction_API_MissingParam	Input parameter not found:
LightningAction_Configuration_NF	No Lightning Action Configuration found for Object.
LightningAction_FieldAPIName_NA	Field is not accessible or Field is encrypted
LightningAction_ObjectAPIName_NA	Object is not accessible
LightningAction_ObjectAPIName_NF	Object API name not found in URL Param.
LightningAction_ObjectAPIName_NV	Object API Name is not found in Salesforce org.
LightningAction_RecordID_NF	Record Id not found in URL Parameter.
LightningMessage_NF	No Page Message available.

WE GOTTA GO...

BUT WE WILL BE AROUND...

THANK YOU SO MUCH FOR SCROLLING THROUGH...

WE TAKE OUR FEEDBACKS SERIOUSLY SO PLEASE SHARE...

hello@righteous.co.in