

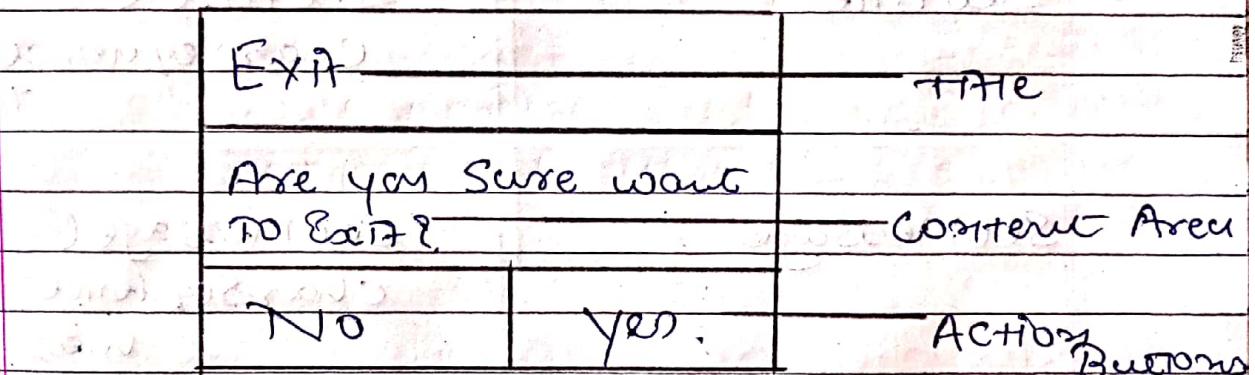
# MCAD Assignment: 5.

Q-1 How to implement Dialog Box in Android?

→ Android Alert Dialog can be used to display the dialog message with buttons.

4) It can be used to display alert message & ask the user about their choice.

4) Android Alert Dialog is the subclass of Dialog class.



→ A Simple Alert dialog box has the following components.

(1) → Title → This component is optional. It is used to display title in the alert dialog box.

(2) → Content area → This component can contain a message, a list or custom layout.

(3) Action Buttons: This component contains buttons to collect user response such as OK, Cancel etc. It contains maximum three action buttons.

- ↳ Action Buttons can be any one of the below three types:
  - (1) → positive action button
  - (2) → negative action button,
  - (3) → Neutral action button.

Method Name  
SetTitle

Syntax:  
SetTitle(  
CharSequence  
title)

SetMessage

SetMessage(  
CharSequence  
message)

SetIcon

SetIcon(  
int  
resId)

SetPositiveButton

SetPositiveButton  
(CharSequence text,  
DialogInterface  
OnClickListener  
onClickListener)

## Q-2 How to implement Rating Bar in Android.

→ Android RatingBar can be used to get the rating from user. The Rating returns a floating-point number. It may be 2.0, 3.5, 4.0 etc...

7. Android RatingBar displays the Rating in start. Android RatingBar is the Subclass of AbsSeekBar Class.

→ The `getRating()` method of android RatingBar class returns the Rating Number.

Example: activity\_main.xml

```
XML Version = "1.0" Encoding = "utf-8" ?>
com.android.support.constraint.ConstraintLayout
    Layout xmlns:android = "https://schemas.android.com/apk/res/android"
```

```
        xmlns:app = "http://schemas.android.com/tools"
```

```
        xmlns:tools = "http://schemas.android.com/tools"
```

```
        android:layout_width = "match-parent"
```

```
        android:layout_height = "match-parent"
```

```
        tools:context = "example.ratingbar.MainActivity"
```

Activity

## <Button>

```
    android:layout_width="wrap_content"  
    android:layout_height="wrap_content"  
    android:text="Submit"  
    android:id="@+id/button"  
    App:layout_constraintBottom_toBottomOf="parent"  
    App:layout_constraintVertical_bias="0.615"/>
```

## <RatingBar>

```
    android:id="@+id/ratingBar"  
    android:layout_width="wrap_content"  
    android:layout_height="wrap_content"  
    android:layout_marginLeft="72dp"  
    android:layout_marginTop="60dp"/>
```

↳ android.support.constraint.ConstraintLayout

## \*MainActivity.java

```
package com.example.ratingbar;com  
import android.support.v7.app.AppCompatActivity;  
import android.os.Bundle;  
import android.view.View;  
import android.widget.Button;  
import android.widget.RatingBar;
```

import android.widget.Toast;

public class MainActivity extends

AppCompatActivity

RatingBar ratingBar;

Button button;

@Override

protected void onCreate(Bundle savedInstanceState)

2

super.onCreate(savedInstanceState);

setContentView(R.layout.activity\_main);

addListenerOnButtonClick();

3

public void addListenerOnButtonClick()

3

ratingBar = (RatingBar) findViewById(R.id.ratingBar);

button = (Button) findViewById(R.id.button);

button.setOnClickListener(new View.OnClickListener() {

2

@Override

public void onClick(View v) {

3

String rating = String.valueOf(ratingBar.

getRating());

Toast.makeText(getApplicationContext(),

rating, Toast.LENGTH\_LONG).show();

333;

3

### Q-3 What is Toast? Explain in brief

→ In Android, Toast class can be used to display message for specific period of time.

↳ Generally it is used to display a quick message that disappears after sometime.

\* Constructor of Toast class.

↳ There are only 2 constructors of Toast class which are given below.

Constructor	Description
→ LENGTH_LONG	: It will display message for the long duration of time.
→ LENGTH_SHORT	: It will display message for short duration of time.

\* Methods of Toast class.

↳ The widely used methods of Toast class are given below.

method  
→ makeText

Description  
It is used to set context, resur & duration for toast

Syntax:

↳ public static  
Toast.makeText  
(context context,  
CharSequence text,  
int duration)

→ Show

↳ It is used to display toast.

↳ Public void show();

→ Box:

```
Toast toast = Toast.makeText(  
getApplicationContext(),  
"Hello Swift", Toast.LENGTH  
SHORT);  
  
toast.show();
```

Q-4 Explain different ways of implementing DialogBox in Android.

- ↳ A Dialog is small window that prompts the user to a decision or enter additional information.
- ↳ Sometimes in your application, if you wanted to ask the user about taking a decision between yes or no in response of any particular action taken by the user, by remaining in the same activity & without changing the screen, you can use alert Dialog.

→ In order to make an alert Dialog, you need to make an object of AlertDialogBuilder which is an inner class of AlertDialog. & syntax is given below:

→ AlertDialog.Builder alertDialogBuilder  
= new AlertDialog.Builder(this);

#### #Methods

- 1 → SetIcon(Drawable icon)
- 2 → SetCancelabel(boolean cancelable)
- 3 → SetMessage(CharSequence message)

4 → Second Canceller (Drug Interface).  
oncancelListmer (oncancelListmer)

5 → SetTime (charsequence TIME).

# Types

4 Drug Fragment

4 ListDrug

4 Single Choice | List Drug

# Ex. of List Drug.

→ It has used to show list of items in a drug box. For Ex. Suppose, user need to Select ex list of items or Else need to Click a item from multiple list of items, At that time situation we can use List Drug.

public Drug oncreateDrug (Bundle  
SavedInstanceState)

S

AheartDrug.Builder builder = new

AheartDrug.Builder (getActivity  
(1),

builder . SetTime (pick or color),

• Set Items (R.array.colors - array, new

DrugInterface.oncancelListmer()

S

public void oncancel (DrugInterface, Drug,  
int which,

S S

return; builder.create();

3.

Q-5 Explain SQLite Database & its different operations.

- SQLite is an open source database which is embedded into Android.
- SQLite supports standard relational database like SQL Syntax, Transactions & prepared statements.
- SQLite database req. limited memory at runtime which is approximately 250 kbyte.
- SQLite supports the datatypes TEXT, INTEGER, & REAL. All other types must be converted into one of these fields before getting saved in the database.
- It does not req. any database setup or administration.
- It needs to define the SQL statement for creating & deleting the database. Afterwards the database is automatically managed for you by the android platform.
- It is by default saved in the directory DATA/dbs/APPNAME.

→ Basic operations of SQLite DB.

- (1) → execSQL.
- (2) → insert.
- (3) → delete.
- (4) → update.
- (5) → query.
- (6) → rawQuery.

Explain ExecSQL:

↳ It is used to execute a SQL Statement that does not return any data.

→ Syntax:

```
Void execSQL(String SQL)
```

Here, SQL refers to the SQL Statement that you want to execute.

→ Ex:

```
db.execSQL("INSERT INTO Student-  
master(Name,Address) Values ('Sunil',  
'A'bad')");
```