**AIM:**

**Study of Android Development Environment-Android Studio, its features, and demonstration of activity lifecycle methods**

**JAVA CODE:**

package com.example.practical2;

import androidx.appcompat.app.AppCompatActivity; import android.os.Bundle;

import android.widget.Button;

import android.view.View;

import android.widget.Toast;

import android.widget.RadioButton;

import android.widget.RadioGroup;

import android.widget.EditText;

public class MainActivity extends AppCompatActivity implements View.OnClickListener {

RadioGroup radioGroup;

EditText votingId;

EditText name;

RadioButton rb1;

RadioButton rb2;

RadioButton rb3;

@Override

protected void onCreate(Bundle savedInstanceState) { super.onCreate(savedInstanceState);

setContentView(R.layout.activity\_main);

Button submitBtn = findViewById(R.id.submit);

submitBtn.setEnabled(false);

radioGroup = (RadioGroup) findViewById(R.id.rdbg1); votingId = (EditText) findViewById(R.id.votingid);

name = (EditText) findViewById(R.id.name);

rb1 = (RadioButton) findViewById(R.id.rdb1);

rb2 = (RadioButton) findViewById(R.id.rdb2);

rb3 = (RadioButton) findViewById(R.id.rdb3);

submitBtn.setOnClickListener(this);

radioGroup.setOnCheckedChangeListener(new

RadioGroup.OnCheckedChangeListener() {

public void onCheckedChanged(RadioGroup group, int checkedId) { enableButton(submitBtn);

}

});

}

private void enableButton(Button button) {

button.setEnabled((!(votingId.getText().toString().equals(&quot;&quot;)) &amp;&amp; !(name.getText().toString().equals(&quot;&quot;)) &amp;&amp; (rb1.isChecked() || rb2.isChecked() || rb3.isChecked()))); }

public void onClick(View v) {

Toast.makeText(getApplicationContext(),

&quot;Your vote has been registered.&quot;,

Toast.LENGTH\_SHORT).show();

}

}

**XML CODE :**

&lt;?xml version=&quot;1.0&quot; encoding=&quot;utf-8&quot;?&gt; &lt;RelativeLayout

xmlns:android=&quot;http://schemas.android.com/apk/res/android&quot; android:layout\_width=&quot;match\_parent&quot;

android:layout\_height=&quot;match\_parent&quot;

android:gravity=&quot;bottom|center&quot;

android:paddingLeft=&quot;16dp&quot;

android:paddingRight=&quot;16dp&quot;&gt;

&lt;TextView

android:id=&quot;@+id/t1&quot;

android:layout\_width=&quot;match\_parent&quot;

android:layout\_height=&quot;wrap\_content&quot;

android:layout\_alignParentTop=&quot;true&quot;

android:layout\_centerHorizontal=&quot;true&quot;

android:layout\_marginTop=&quot;39dp&quot;

android:gravity=&quot;center\_horizontal|top&quot; android:text=&quot;E-Voting Application&quot; android:textAlignment=&quot;center&quot; android:textSize=&quot;40sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t2&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t1&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Enter Your Voting ID: &quot; android:textSize=&quot;25sp&quot; /&gt;

&lt;EditText

android:id=&quot;@+id/votingid&quot; android:layout\_width=&quot;170dp&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t1&quot; android:layout\_toRightOf=&quot;@id/t2&quot; android:paddingTop=&quot;19dp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t4&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t2&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Enter Your Name: &quot; android:textSize=&quot;25sp&quot; /&gt; &lt;EditText

android:id=&quot;@+id/name&quot;

android:layout\_width=&quot;170dp&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/votingid&quot; android:layout\_toRightOf=&quot;@id/t4&quot; android:paddingTop=&quot;19dp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t6&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t4&quot;

android:paddingTop=&quot;19dp&quot; android:text=&quot;Party Name&quot; android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t7&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/name&quot; android:layout\_toRightOf=&quot;@id/t6&quot; android:paddingLeft=&quot;20sp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Candidate Name&quot;

android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t8&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/name&quot; android:layout\_toRightOf=&quot;@id/t7&quot; android:paddingLeft=&quot;25sp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Vote&quot;

android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t9&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t6&quot; android:paddingLeft=&quot;19dp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;ABC&quot;

android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t10&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t9&quot; android:paddingLeft=&quot;19dp&quot; android:paddingTop=&quot;19dp&quot;

android:text=&quot;BCD&quot;

android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t11&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t10&quot; android:paddingLeft=&quot;19dp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;DEF&quot;

android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t12&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t7&quot; android:layout\_toRightOf=&quot;@id/t9&quot; android:paddingLeft=&quot;75dp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Mr. C. Martin&quot; android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t13&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t12&quot; android:layout\_toRightOf=&quot;@id/t9&quot; android:paddingLeft=&quot;75dp&quot; android:paddingTop=&quot;19dp&quot; android:text=&quot;Mrs. A. Johnson&quot; android:textSize=&quot;20sp&quot; /&gt; &lt;TextView

android:id=&quot;@+id/t14&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t13&quot; android:layout\_centerVertical=&quot;true&quot; android:layout\_marginLeft=&quot;4dp&quot; android:layout\_marginTop=&quot;2dp&quot;

android:layout\_toRightOf=&quot;@id/t9&quot; android:paddingLeft=&quot;75dp&quot;

android:paddingTop=&quot;19dp&quot;

android:text=&quot;Mr. K. Wales&quot;

android:textSize=&quot;20sp&quot; /&gt;

&lt;RadioGroup

android:id=&quot;@+id/rdbg1&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; android:layout\_below=&quot;@id/t8&quot; android:layout\_toRightOf=&quot;@id/t12&quot; android:paddingLeft=&quot;61dp&quot;&gt; &lt;RadioButton

android:id=&quot;@+id/rdb1&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; /&gt; &lt;RadioButton

android:id=&quot;@+id/rdb2&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; /&gt; &lt;RadioButton

android:id=&quot;@+id/rdb3&quot;

android:layout\_width=&quot;wrap\_content&quot; android:layout\_height=&quot;wrap\_content&quot; /&gt; &lt;/RadioGroup&gt;

&lt;Button

android:id=&quot;@+id/submit&quot;

android:layout\_width=&quot;179dp&quot; android:layout\_height=&quot;87dp&quot;

android:layout\_below=&quot;@id/t11&quot; android:layout\_marginLeft=&quot;-16dp&quot; android:layout\_marginTop=&quot;254dp&quot; android:layout\_toRightOf=&quot;@id/t6&quot; android:text=&quot;Submit&quot;

android:textSize=&quot;21dp&quot; /&gt;

&lt;/RelativeLayout&gt;

