Practical No.: 19

Aim: Shared Preference to store Value in name-value pair

Activity_main.xml

```xml
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout xmlns:android="http://schemas.android.com/apk/res/android"
    xmlns:app="http://schemas.android.com/apk/res-auto"
    xmlns:tools="http://schemas.android.com/tools"
    android:layout_width="match_parent"
    android:layout_height="match_parent"
    tools:context=".MainActivity"
    android:orientation="vertical">

    <TextView
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:gravity="center"
        android:text="@string/login"
        android:textSize="40sp"/>

    <EditText
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:layout_marginTop="20dp"
        android:hint="@string/username"
        android:id="@+id/username"/>


    <EditText
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:layout_marginTop="10dp"
        android:hint="@string/password"
        android:id="@+id/password"/>

    <Button
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:text="@string/login"
        android:textSize="20sp"
        android:layout_marginTop="10dp"
        android:id="@+id/button"/>

</LinearLayout>
```

Strings.xml

```xml
<resources>
    <string name="app_name">Practical_No_19</string>
    <string name="login">Login</string>
    <string name="username">Enter Username</string>
    <string name="password">Enter Password</string>
    <string name="home">Home</string>
```

```xml
    <string name="welcome">-- Welcome --</string>
    <string name="logout">Logout</string>
</resources>
```
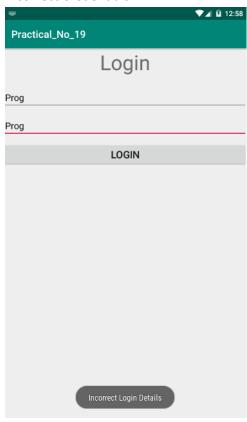
MainActivity.java

```java
package com.example.practical_no_19;

import androidx.appcompat.app.AppCompatActivity;
import android.content.Intent;
import android.content.SharedPreferences;
import android.os.Bundle;
import android.view.View;
import android.widget.Button;
import android.widget.EditText;
import android.widget.Toast;

public class MainActivity extends AppCompatActivity {

    EditText username, password;
    Button button;
    SharedPreferences sharedPreferences;

    @Override
    protected void onCreate(Bundle savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity_main);

        username=findViewById(R.id.username);
        password=findViewById(R.id.password);
        button=findViewById(R.id.button);
        sharedPreferences=getSharedPreferences("login",MODE_PRIVATE);

        //if SharedPerferences have username and password

        if(sharedPreferences.contains("username") &&
    sharedPreferences.contains("passworrd"))
        {
            Intent intent=new Intent(MainActivity.this,Home.class);
            startActivity(intent);
            finish();
        }

        button.setOnClickListener(
            new View.OnClickListener() {
                @Override
                public void onClick(View v) {
                    loginCheck();
                }
            }
        );
    }

    private void loginCheck()
```

```java
    {
        //check username and password
        if(username.getText().toString().equals("Programmer") &&
password.getText().toString().equals("Programmer"))
        {
            SharedPreferences.Editor edit=sharedPreferences.edit();
            edit.putString("username","Programmer");
            edit.putString("password","Programmer");
            edit.commit();
            Toast.makeText(this, "Login Successful", Toast.LENGTH_SHORT).show();
            startActivity(new Intent(MainActivity.this,Home.class));
            finish();
        }
        else
        {
            Toast.makeText(this, "Incorrect Login Details", Toast.LENGTH_SHORT).show();
        }
    }
}
```

Right click on package name → New → Activity → Empty Activity → Name **Home**

Activity_home.xml

```xml
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout xmlns:android="http://schemas.android.com/apk/res/android"
    xmlns:app="http://schemas.android.com/apk/res-auto"
    xmlns:tools="http://schemas.android.com/tools"
    android:layout_width="match_parent"
    android:layout_height="match_parent"
    tools:context=".Home"
    android:orientation="vertical">

    <TextView
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:gravity="center"
        android:text="@string/home"
        android:textSize="40sp"/>

    <TextView
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:gravity="center"
        android:text="@string/welcome"
        android:textSize="30sp"
        android:layout_marginTop="10dp"/>

    <Button
        android:layout_width="match_parent"
        android:layout_height="wrap_content"
        android:textSize="20sp"
        android:text="@string/logout"
        android:layout_marginTop="20dp"
```

```
        android:id="@+id/logout"/>

</LinearLayout>
```

Home.java

```java
package com.example.practical_no_19;

import androidx.appcompat.app.AppCompatActivity;

import android.content.Intent;
import android.content.SharedPreferences;
import android.os.Bundle;
import android.view.View;
import android.widget.Button;

public class Home extends AppCompatActivity {

    Button logout;

    @Override
    protected void onCreate(Bundle savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity_home);

        logout=findViewById(R.id.logout);
        logout.setOnClickListener(
            new View.OnClickListener() {
                @Override
                public void onClick(View v) {
                    SharedPreferences
sharedPreferences=getSharedPreferences("login",MODE_PRIVATE);
                    SharedPreferences.Editor e=sharedPreferences.edit();
                    e.clear();
                    e.commit();

                    startActivity(new Intent(Home.this,MainActivity.class));
                    finish();
                }
            }
        );
    }
}
```

Output:

Incorrect Credentials

Correct Credentials