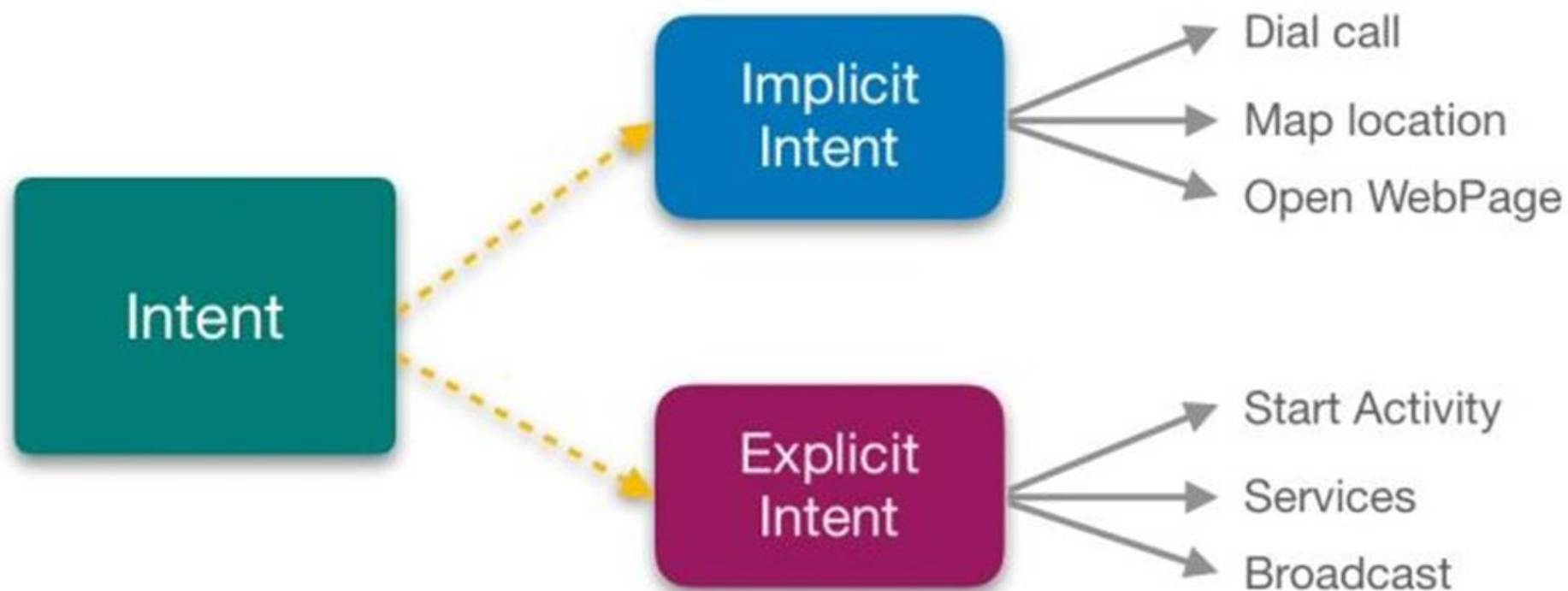


Implicit Intent



There are two types of intents in android: implicit and explicit.

1) Implicit Intent

Implicit Intent doesn't specify the component. In such case, intent provides information of available components provided by the system that is to be invoked. For example, you may write the following code to view the webpage.

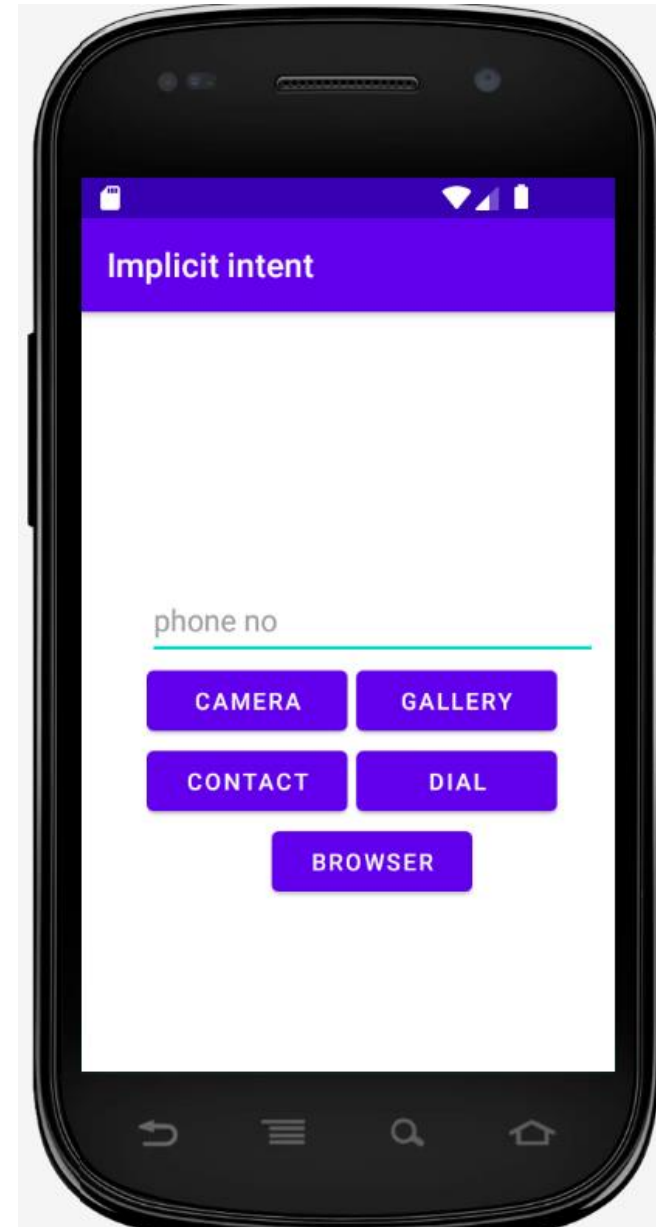
```
1.Intent intent=new Intent(Intent.ACTION_VIEW);  
2.intent.setData\(Uri.parse\("http://www.google.com"\)\);  
3.startActivity(intent);
```

2) Explicit Intent

Explicit Intent specifies the component. In such case, intent provides the external class to be invoked.

```
1.Intent i = new Intent(getApplicationContext(),ActivityTwo.class);  
2.startActivity(i);
```

- Create an application to implement implicit intent with following functionality.



Activity_main.xml

```
<?xml version="1.0" encoding="utf-8"?>
<GridLayout 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"
    android:columnCount="2"
    android:layout_marginTop="150dp"
    android:layout_marginLeft="30dp"
    android:padding="10dp"
    tools:context=".MainActivity">

    <EditText
        android:id="@+id/edtphone"
        android:layout_width="match_parent"
        android:layout_columnSpan="2"
        android:hint="phone no"
        android:minHeight="48dp"></EditText>

    <Button
        android:id="@+id/buttonCamera"
        android:layout_width="120dp"
        android:layout_height="wrap_content"
        android:text="Camera"
        android:layout_marginRight="5dp"/>

    <Button
        android:id="@+id/buttonGallery"
        android:layout_width="120dp"
        android:layout_height="wrap_content"
        android:text="Gallery" />

    <Button
        android:id="@+id/buttonContact"
        android:layout_width="120dp"
        android:layout_height="wrap_content"
        android:text="Contact" />

    <Button
        android:id="@+id/buttonDial"
        android:layout_width="120dp"
        android:layout_height="wrap_content"
        android:text="Dial" />

    <Button
        android:id="@+id/buttonBrowser"
        android:layout_width="120dp"
        android:layout_height="wrap_content"
        android:layout_columnSpan="2"
        android:layout_gravity="center_horizontal"
        android:text="Browser" />

</GridLayout>
```

MainActivity.java

```
package com.example.implicitintent;

import androidx.appcompat.app.AppCompatActivity;
import android.annotation.SuppressLint;
import android.content.Intent;
import android.net.Uri;
import android.os.Bundle;
import android.provider.MediaStore;
import android.view.View;
import android.widget.EditText;

public class MainActivity extends AppCompatActivity {

    @SuppressLint("MissingInflatedId")
    @Override
    protected void onCreate(Bundle savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity_main);
        findViewById(R.id.buttonCamera).setOnClickListener(new View.OnClickListener() {
            @Override
            public void onClick(View view) {
                Intent i=new Intent(MediaStore.ACTION_IMAGE_CAPTURE);
                startActivity(i);
            }
        });
    }
}
```

MainActivity.java contd..

```
findViewById(R.id.buttonGallery).setOnClickListener(new View.OnClickListener() {  
    @Override  
    public void onClick(View view) {  
        Intent i=new Intent(Intent.ACTION_VIEW);  
        //i.setAction(Intent.ACTION_VIEW);  
        i.setData(Uri.parse("content://media/external/images/media/"));  
        startActivity(i);  
    }  
});  
findViewById(R.id.buttonContact).setOnClickListener(new View.OnClickListener() {  
    @Override  
    public void onClick(View view) {  
        Intent i=new Intent(Intent.ACTION_VIEW);  
        i.setData(Uri.parse("content://contacts/people/"));  
        startActivity(i);  
    }  
});
```

MainActivity.java contd..

```
findViewById(R.id.buttonBrowser).setOnClickListener(new View.OnClickListener() {  
    @Override  
    public void onClick(View view) {  
        Intent i=new Intent(Intent.ACTION_VIEW,Uri.parse("http://www.google.com/"));  
        startActivity(i);  
    }  
});  
EditText phone=findViewById(R.id.edtphone);  
findViewById(R.id.buttonDial).setOnClickListener(new View.OnClickListener() {  
    @Override  
    public void onClick(View view) {  
        Intent i=new Intent(Intent.ACTION_DIAL,Uri.parse("tel:"+phone.getText()));  
        startActivity(i);  
    }  
});  
}
```


AndroidManifest.xml

Add permission before <application> in manifest file

```
<uses-permission android:name="android.permission.CALL_PHONE"></uses-permission>
```

```
activity_main.xml x MainActivity.java x AndroidManifest.xml x
<?xml version="1.0" encoding="utf-8"?>
<manifest xmlns:android="http://schemas.android.com/apk/res/android"
    package="com.example.implicitintent">
    <uses-permission android:name="android.permission.CALL_PHONE"></uses-permission>
    <application
        android:allowBackup="true"
        android:icon="@mipmap/ic_launcher"
        android:label="Implicit Intent"
        android:roundIcon="@mipmap/ic_launcher_round"
        android:supportsRtl="true"
        android:theme="@style/Theme.ImplicitIntent">
        <activity
            android:name=".MainActivity3"
            android:exported="true" />
        <activity
            android:name=".MainActivity"
            android:exported="true">
            <intent-filter>
                <action android:name="android.intent.action.MAIN" />

                <category android:name="android.intent.category.LAUNCHER" />
            </intent-filter>
        </activity>
    </application>
</manifest>
```