

스마트폰 프로그래밍

Assign #8

(제목 : GMapCamera)

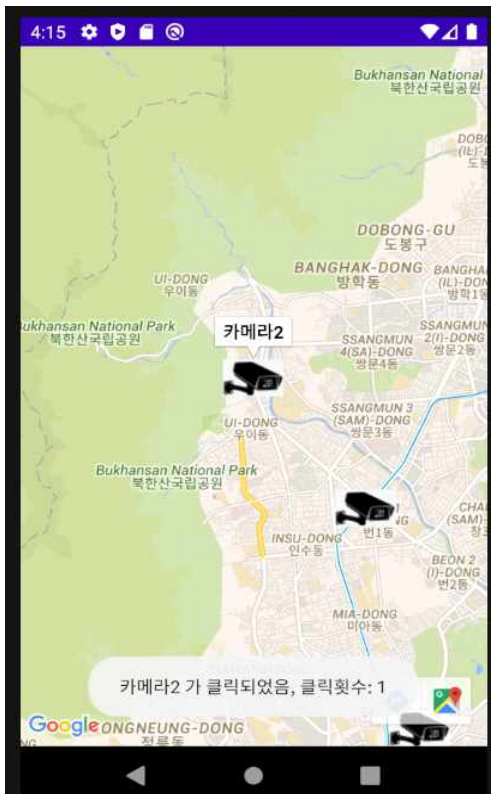
학번 : 2016305078

성명 : 최 영 환

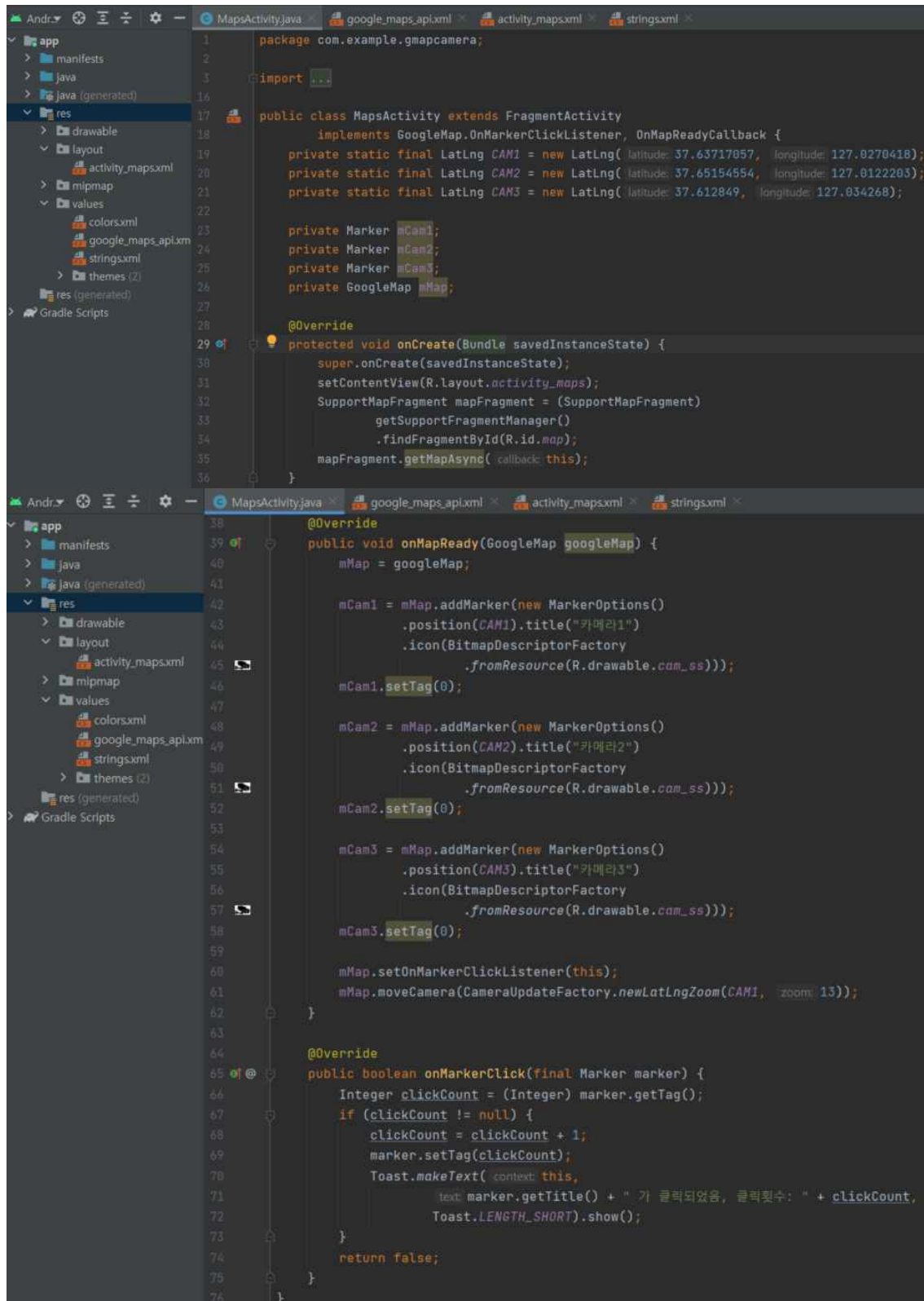
제출일자 : 2021.11.10

본인은 타인이나 다른 매체를 도용하지 않았음을 확인합니다 <본인사인>

<실행화면>



<MapsActivity.java>



```
1 package com.example.gmapcamera;
2
3 import ...
4
5
6
7
8
9
10
11
12
13
14
15
16
17 public class MapsActivity extends FragmentActivity
18     implements GoogleMap.OnMarkerClickListener, OnMapReadyCallback {
19     private static final LatLng CAM1 = new LatLng( latitude: 37.63717057, longitude: 127.0270418);
20     private static final LatLng CAM2 = new LatLng( latitude: 37.65154554, longitude: 127.0122203);
21     private static final LatLng CAM3 = new LatLng( latitude: 37.612849, longitude: 127.034268);
22
23     private Marker mCam1;
24     private Marker mCam2;
25     private Marker mCam3;
26     private GoogleMap mMap;
27
28
29     @Override
30     protected void onCreate(Bundle savedInstanceState) {
31         super.onCreate(savedInstanceState);
32         setContentView(R.layout.activity_maps);
33         SupportMapFragment mapFragment = (SupportMapFragment)
34             getSupportFragmentManager()
35                 .findFragmentById(R.id.map);
36         mapFragment.getMapAsync( callback: this);
37     }
38
39     @Override
40     public void onMapReady(GoogleMap googleMap) {
41         mMap = googleMap;
42
43         mCam1 = mMap.addMarker(new MarkerOptions()
44             .position(CAM1).title("카메라1")
45             .icon(BitmapDescriptorFactory
46                 .fromResource(R.drawable.cam_ss)));
47         mCam1.setTag(0);
48
49         mCam2 = mMap.addMarker(new MarkerOptions()
50             .position(CAM2).title("카메라2")
51             .icon(BitmapDescriptorFactory
52                 .fromResource(R.drawable.cam_ss)));
53         mCam2.setTag(0);
54
55         mCam3 = mMap.addMarker(new MarkerOptions()
56             .position(CAM3).title("카메라3")
57             .icon(BitmapDescriptorFactory
58                 .fromResource(R.drawable.cam_ss)));
59         mCam3.setTag(0);
60
61         mMap.setOnMarkerClickListener(this);
62         mMap.moveCamera(CameraUpdateFactory.newLatLngZoom(CAM1, zoom: 13));
63     }
64
65     @Override
66     public boolean onMarkerClick(final Marker marker) {
67         Integer clickCount = (Integer) marker.getTag();
68         if (clickCount != null) {
69             clickCount = clickCount + 1;
70             marker.setTag(clickCount);
71             Toast.makeText( context: this,
72                 text: marker.getTitle() + " 가 클릭되었음, 클릭횟수: " + clickCount,
73                 Toast.LENGTH_SHORT).show();
74         }
75         return false;
76     }
77 }
```

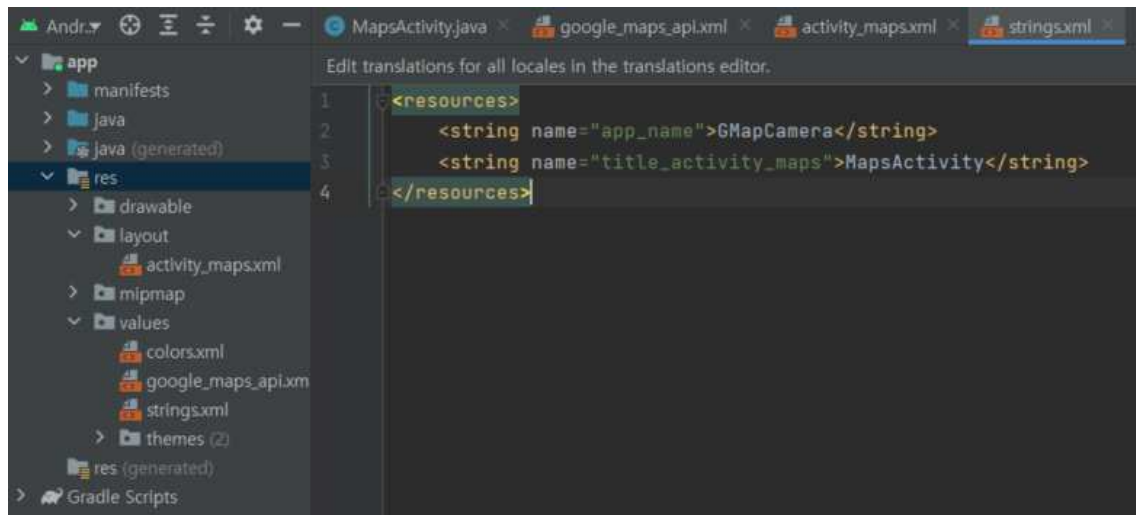
```

package com.example.gmapcamera;
import androidx.fragment.app.FragmentActivity;
import android.os.Bundle;
import android.widget.Toast;
import com.google.android.gms.maps.CameraUpdateFactory;
import com.google.android.gms.maps.GoogleMap;
import com.google.android.gms.maps.OnMapReadyCallback;
import com.google.android.gms.maps.SupportMapFragment;
import com.google.android.gms.maps.model.BitmapDescriptorFactory;
import com.google.android.gms.maps.model.LatLng;
import com.google.android.gms.maps.model.Marker;
import com.google.android.gms.maps.model.MarkerOptions;
public class MapsActivity extends FragmentActivity
    implements GoogleMap.OnMarkerClickListener, OnMapReadyCallback {
    private static final LatLng CAM1 =new LatLng(37.63717057, 127.0270418);
    private static final LatLng CAM2 =new LatLng(37.65154554, 127.0122203);
    private static final LatLng CAM3 =new LatLng(37.612849, 127.034268);
    private Marker mCam1;
    private Marker mCam2;
    private Marker mCam3;
    private GoogleMap mMap;
    @Override
    protected void onCreate(Bundle savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity_maps);
        SupportMapFragment mapFragment = (SupportMapFragment)
            getSupportFragmentManager()
                .findFragmentById(R.id.map);
        mapFragment.getMapAsync(this);
    }
    @Override
    public void onMapReady(GoogleMap googleMap) {
        mMap = googleMap;
        mCam1 = mMap.addMarker(new MarkerOptions()
            .position(CAM1).title("카메라1")
            .icon(BitmapDescriptorFactory
                .fromResource(R.drawable.cam_ss)));
        mCam1.setTag(0);
        mCam2 = mMap.addMarker(new MarkerOptions()
            .position(CAM2).title("카메라2")
            .icon(BitmapDescriptorFactory
                .fromResource(R.drawable.cam_ss)));
        mCam2.setTag(0);
        mCam3 = mMap.addMarker(new MarkerOptions()
            .position(CAM3).title("카메라3")
            .icon(BitmapDescriptorFactory
                .fromResource(R.drawable.cam_ss)));
        mCam3.setTag(0);
        mMap.setOnMarkerClickListener(this);
        mMap.moveCamera(CameraUpdateFactory.newLatLngZoom(CAM1, 13));
    }
    @Override
    public boolean onMarkerClick(final Marker marker) {
        Integer clickCount = (Integer) marker.getTag();
    }

```

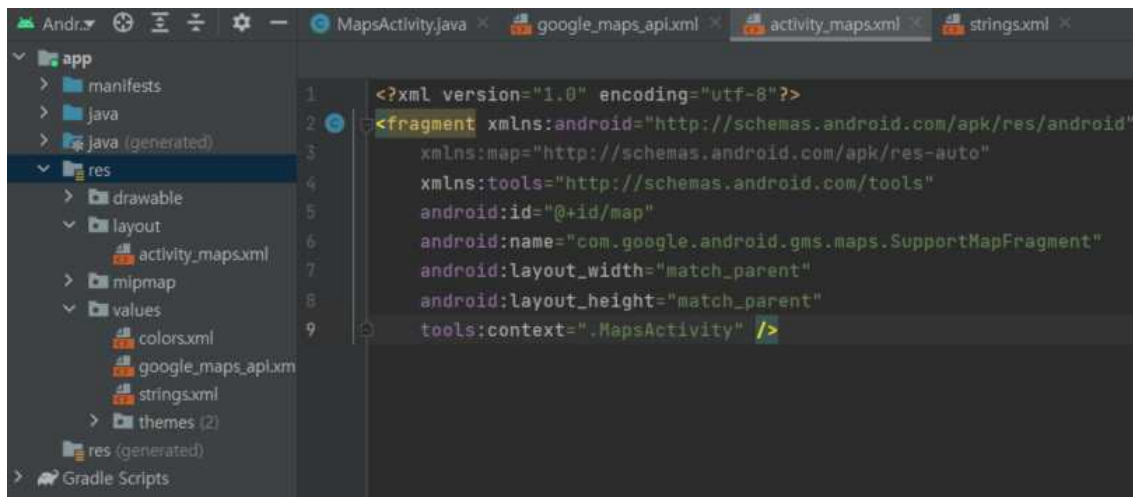
```
    if (clickCount !=null) {  
        clickCount = clickCount +1;  
        marker.setTag(clickCount);  
        Toast.makeText(this,  
            marker.getTitle() +" 가 클릭되었음, 클릭횟수: "+ clickCount,  
            Toast.LENGTH_SHORT).show();  
    }  
    return false;  
}  
}
```

<string.xml>



```
<resources >
  <string name="app_name">GMapCamera </string >
  <string name="title_activity_maps">MapsActivity </string >
</resources >
```

<activity_maps.xml>



```
<?xml version="1.0" encoding="utf-8"?>
<fragment xmlns:android="http://schemas.android.com/apk/res/android"
xmlns:map="http://schemas.android.com/apk/res-auto"
xmlns:tools="http://schemas.android.com/tools"
android:id="@+id/map"
android:name="com.google.android.gms.maps.SupportMapFragment"
android:layout_width="match_parent"
android:layout_height="match_parent"
tools:context=".MapsActivity"/>
```