E-Nature's Android & Unity 3D Tutorials (http://www.e-nature.ch/tech)

Easy to understand Android & Unity 3D tutorials

• Some general information (http://www.e-nature.ch/tech/beispiel-seite/)

Android SDK: Add application to the autostart

Samstag, Juni 9, 2012 enatureadmin <u>1 Comment (http://www.e-nature.ch/tech/android-sdk-add-application-to-the-autostart/#comments)</u>

Add your Android application to the autostart

To add an Android application to the device's autostart is actually pretty easy. But if some minor but important settings are wrong the autostart function doesn't work. Here comes a fully functional example which opens your Android application after the device has finished its booting sequence.

- Create a new Android application in Eclipse called "OnBootCompletedExample". The namespace is on.boot.completed.
- Leave the main Activity as is:

OnBootCompletedExampleActivity.java

```
import android.app.Activity;
import android.os.Bundle;

public class OnBootCompletedExampleActivity extends Activity {
    /** Called when the activity is first created. */
    @Override
    public void onCreate(Bundle savedInstanceState) {

        super.onCreate(savedInstanceState);
        setContentView(R.layout.main);
    }
}
```

Create a new class called Autostart.java which extends BroadcastReceiver:

Autostart.java

```
import android.content.BroadcastReceiver;
import android.content.Context;
import android.content.Intent;
import android.util.Log;
public class Autostart extends BroadcastReceiver {
    /**
```

```
* Listens for Android's BOOT_COMPLETED broadcast and then executes
  * the onReceive() method.
  */
  @Override
  public void onReceive(Context context, Intent arg1) {
        Log.i("Autostart", "BOOT_COMPLETED broadcast received. Executing
  following code:");

        Intent intent = new Intent(context, StarterService.class);
        context.startService(intent);
  }
}
```

In the **AndroidManifest.xml** file we are going to add this class as a **receiver.** This class will listen to the broadcast call the Android OS sends after the boot sequence has finished (meaning after the phone started up).

• Create another class called **StarterService.java** which will extend Service:

StarterService.java

```
import android.app.Service;
import android.content.Intent;
import android.os.IBinder;
import android.util.Log;
import android.widget.Toast;
public class StarterService extends Service {
        private static final String TAG = "MyService";
        @Override
        public IBinder onBind(Intent intent) {
                return null;
        }
        @Override
        public void onDestroy() {
                Toast.makeText(this, "My Service stopped", Toast.LENGTH_LONG).show();
                Log.d(TAG, "onDestroy");
        }
         * The started service opens the Activity.
         */
        @Override
        public void onStart(Intent intent, int startid) {
                Intent intents = new Intent(getBaseContext(),
OnBootCompletedExampleActivity.class);
                intents.setFlags(Intent.FLAG_ACTIVITY_NEW_TASK);
                startActivity(intents);
                Toast.makeText(this, "My Service started", Toast.LENGTH_LONG).show();
                Log.d(TAG, "onStart");
        }
}
```

When the class Autostart receives the BOOT_COMPLETED broadcast from Android OS it will start the **StarterService** which then starts the Android Activity "OnBootCompletedExampleActivity".

• And finally we update the **AndroidManifest.xml** with the changes we need to do in order for the application to work how we want:

AndroidManifest.xml

```
<?xml version="1.0" encoding="utf-8"?>
<manifest xmlns:android="http://schemas.android.com/apk/res/android"</pre>
    package="on.boot.completed"
    android:installLocation="internalOnly"
    android:versionCode="1"
    android:versionName="1.0" >
    <uses-sdk
        android:minSdkVersion="7"
        android:targetSdkVersion="7" />
    <uses-permission android:name="android.permission.RECEIVE_BOOT_COMPLETED" />
    <application
        android:icon="@drawable/ic_launcher"
        android:label="@string/app_name" >
        <activity
            android:name="on.boot.completed.OnBootCompletedExampleActivity"
            android:label="@string/app_name"
            android:theme="@android:style/Theme.Black.NoTitleBar.Fullscreen" >
            <intent-filter>
                <action android:name="android.intent.action.MAIN" />
                <category android:name="android.intent.category.LAUNCHER" />
            </intent-filter>
        </activity>
        <receiver android:name="on.boot.completed.Autostart" >
            <intent-filter>
                <action android:name="android.intent.action.QUICKBOOT_POWERON" />
                <action android:name="android.intent.action.BOOT_COMPLETED" />
            </intent-filter>
        </receiver>
        <service
            android:name="on.boot.completed.StarterService"
            android:enabled="true"
            android:exported="true" />
    </application>
</manifest>
```

A few notes about AndroidManifest.xml:

It's very important to add

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

before the <application> tag.

If the app is installed on the SD Card the autostart will not work! That's why it's important that we
 add

```
android:installLocation="internalOnly"
```

after package="on.boot.completed"

Also add

```
<action android:name="android.intent.action.QUICKBOOT_POWERON" />
```

in addition to

```
<action android:name="android.intent.action.BOOT_COMPLETED" />
```

to the receiver. Some HTC devices won't catch the BOOT_COMPLETED broadcast.

That's all. Now build and run your app. After it has been started turn off your phone and turn it back on and the app should start automatically after the device has booted up.

Here you can download the working Android project:

OnBootCompletedExample (http://www.e-nature.ch/tech/wp-content/uploads/2012/06/OnBootCompletedExample.zip)

Posted in: Android SDK (http://www.e-nature.ch/tech/category/android-sdk/) Tags: android auto start (http://www.e-nature.ch/tech/tag/android-auto-start/), android autostart (http://www.e-nature.ch/tech/tag/android-autostart/), android sdk (http://www.e-nature.ch/tech/tag/android-sdk-2/), autostart application (http://www.e-nature.ch/tech/tag/android-sdk-2/), autostart application (http://www.e-nature.ch/tech/tag/android-sdk-2/), autostart application (http://www.e-nature.ch/tech/tag/boot_completed/), QUICKBOOT_POWERON (http://www.e-nature.ch/tech/tag/quickboot_poweron/), RECEIVE_BOOT_COMPLETED (http://www.e-nature.ch/tech/tag/receive_boot_completed/), service auto start (http://www.e-nature.ch/tech/tag/service-auto-start/)

One Response to Android SDK: Add application to the autostart

1. Pavi sagt:

2012/07/07 um 17:14 Uhr (http://www.e-nature.ch/tech/android-sdk-add-application-to-the-autostart/#comment-138)

Awesome website. Thanks for your code. it mean lot to u.

<u>Zum Antworten anmelden (http://www.e-nature.ch/tech/wp-login.php?redirect_to=http%3A%2F%2Fwww.e-nature.ch%2Ftech%2Fandroid-sdk-add-application-to-the-autostart%2F)</u>

Schreibe einen Kommentar

Du musst <u>angemeldet (http://www.e-nature.ch/tech/wp-login.php?redirect_to=http%3A%2F%2Fwww.e-nature.ch/2Ftech%2Fandroid-sdk-add-application-to-the-autostart%2F)</u> sein, um einen Kommentar abzugeben.

Search Site

Suchen

Last Articles

- Open external Android app from within Android app (http://www.e-nature.ch/tech/open-external-android-app-from-within-android-app/)
- Wrapping a MGWT Webapp with PhoneGap into a Native Android App (http://www.e-nature.ch/tech/wrapping-mgwt-webapp-with-phonegap-into-a-native-android-app/)
- Android SDK: Add a repeating AlarmManager to the autostart (displaying messages in the
 Notification Bar) (http://www.e-nature.ch/tech/android-sdk-add-a-repeating-alarmmanager-to-the-autostart-displaying-messages-in-the-notification-bar/)
- Android SDK: Add application to the autostart (http://www.e-nature.ch/tech/android-sdk-add-application-to-the-autostart/)

Keywords

Android (http://www.e-

nature.ch/tech/tag/android/) android-support-v4 (http://www.e-

nature.ch/tech/tag/android-support-v4/) android-support-v13 (http://www.e-

nature.ch/tech/tag/android-support-v13/) android autostart (http://www.e-

nature.ch/tech/tag/android-autostart/) Android Debug Bridge (http://www.e-nature.ch/tech/tag/android-debug-

bridge/) android plugin (http://www.e-nature.ch/tech/tag/android-plugin/)

BOOT COMPLETED (http://www.e-nature.ch/tech/tag/boot_completed/) corona

(http://www.e-nature.ch/tech/tag/corona/) corona sdk (http://www.e-

<u>nature.ch/tech/tag/corona-sdk-2/)</u> <u>debug (http://www.e-nature.ch/tech/tag/debug/)</u>

<u>debugging (http://www.e-nature.ch/tech/tag/debugging/)</u> <u>dll (http://www.e-nature.ch/tech/tag/dll/)</u> <u>external storage (http://www.e-nature.ch/tech/tag/fragment/)</u>

<u>nature.ch/tech/tag/external-storage/)</u> <u>Fragment (http://www.e-nature.ch/tech/tag/fragment/)</u>

FragmentActivity (http://www.e-nature.ch/tech/tag/fragmentactivity/)

FragmentManager (http://www.e-nature.ch/tech/tag/fragmentmanager/)

FragmentPagerAdapter (http://www.e-nature.ch/tech/tag/fragmentpageradapter/) game

development (http://www.e-nature.ch/tech/tag/game-development/) GUIText (http://www.e-nature.ch/tech/tag/guitext/) horizontal

center (http://www.e-nature.ch/tech/tag/horizontal-center/) Horizontal Slider (http://www.e-

nature.ch/tech/tag/horizontal-slider/) http get (http://www.e-nature.ch/tech/tag/http-get/) http post (http://www.e-nature.ch/tech/tag/http-get/) http post (http://www.e-nature.ch/tech/tag/http-get/)

nature.ch/tech/tag/http-post/) install location (http://www.e-nature.ch/tech/tag/install-location/) internal storage (http://www.e-nature.ch/tech/tag/install-location/)

nature.ch/tech/tag/internal-storage/) java (http://www.e-nature.ch/tech/tag/java/) javascript access (http://www.e-

nature.ch/tech/tag/javascript-access/) json (http://www.e-nature.ch/tech/tag/json/) logfile (http://www.e-nature.ch/tech/tag/logfile/)

managed dll (http://www.e-nature.ch/tech/tag/managed-dll/) parse json (http://www.e-nature.ch/tech/tag/parse-json/)

QUICKBOOT_POWERON (http://www.e-nature.ch/tech/tag/quickboot_poweron/) saving

(http://www.e-nature.ch/tech/tag/saving/) saving bitmaps (http://www.e-nature.ch/tech/tag/saving-bitmaps/) saving files to

storage (http://www.e-nature.ch/tech/tag/saving-files-to-storage/) SD Card (http://www.e-

nature.ch/tech/tag/sd-card/) storage (http://www.e-nature.ch/tech/tag/storage/) text (http://www.e-

nature.ch/tech/tag/text/) unity (http://www.e-

nature.ch/tech/tag/unity/) unity 3d (http://www.e-

nature.ch/tech/tag/unity-3d-2/) unity android plugin

(http://www.e-nature.ch/tech/tag/unity-android-plugin/) unity logfile (http://www.e-nature.ch/tech/tag/unity-logfile/) unity plugin (http://www.e-nature.ch/tech/tag/unity-plugin/)

using java code in unity (http://www.e-nature.ch/tech/tag/using-java-code-in-unity/) View Slider (http://www.e-nature.ch/tech/tag/view-slider/)

Links

- Cheat-Database (http://www.cheat-database.com)
- Cheat-Database Android App (https://play.google.com/store/apps/details?
 id=com.cheatdatabase.android)
- E-Nature Trance (http://www.e-nature.ch)
- One Fun Fact A Day Android App (https://play.google.com/store/apps/details?id=one.fun.fact)
- Ukon No Chikara Shop (http://www.ukon.ch/?lang=en)

© 2017 E-Nature's Android & Unity 3D Tutorials (http://www.e-nature.ch/tech/). All Rights Reserved.

Powered by <u>WordPress (http://wordpress.org/)</u> | Designed by: <u>crystal meth addiction</u>
(http://www.escapemeth.com/meth-addiction.html) | Thanks to <u>seo services (http://seo-services.us)</u>, <u>seo st louis (http://www.timmermanngroup.com)</u> and <u>massage bed (http://www.skincareetc.com/Facial-Beds-Massage-Beds_c_27.html)</u>