# **Installing OpenTX Comp.**

Note:

Once in a very great while, something goes wrong during the flashing operation. The result is that when you turn on your Taranis, nothing happens. Nyet...nada...nothing. However, don't cue Chopin's Funeral March just yet. Normally the situation can be corrected by re-flashing the firmware. This also illustrates the wisdom of backing up your old firmware before you decide to flash the new version. :>)

## Introduction

Well, you're ready to <u>flash</u> OpenTX 2.x to your Taranis for the first time. Before we do that, we need to consider a few things.

There is currently a lot of confusion out there about this process. Do I have to use Companion in one form or another? (Yes, but only for the first <u>flash</u>.) Why can't I just copy it to the <u>SD card</u> and <u>flash</u> it through <u>Bootloader</u> mode in the <u>TX</u>? (Because until you <u>flash</u> OpenTX, you don't have a user accessible <u>bootloader</u>.) Where do I get OpenTX 2.x? (You don't...you download <u>OpenTX</u> <u>Companion</u>, install it, and let <u>OpenTX Companion</u> find the new version for you, or you use your existing install of Companion9X.) Etc., etc., etc.,....

We'll tackle a few of those questions in this lesson, as well as show you how to <u>flash</u> your <u>TX</u> in two or three different ways. Hopefully, we can take some of the mystery out of it for you.

# **Lesson Goals**

### There are two goals for this lesson:

1. Goal #1: Download and install OpenTX Companion

2. Goal #2: Use OpenTX Companion to flash OpenTX v2.x to your Taranis transmitter

### **Prerequisites**

Here's what you'll need to know to get started:

- 1. You'll need to have a working copy of the DFU-Util installed.
- 2. You'll need to know how to download and save a program on your computer.
- 3. You'll need to know where your computer saves your downloaded programs before they're installed.
- 4. You'll need to know how to install a downloaded program on your computer.

# Background

One real problem is that there are OpenTX users at all stages of this process, from raw newcomer to advanced super users. It would be far beyond the scope of this lesson to try and cover each situation individually. Instead, we're going to assume (and, yes, I know what that means) that you are a brand

new users, totally unfamiliar with the procedure, and without any software directly related to OpenTX installed on your computer other than the DFU-Util that you installed in the Installing Dfu-util lesson. It's vital that you can see that it's installed in the Systen Report. If dfu-util is not installed, you're not going anywhere.

If you're currently using OpenTX (either r2940 or v1.99.x) and have upgraded your <u>firmware</u> before, you can simply tell Companion 9X or <u>OpenTX Companion</u> to get and install the new v2.x <u>firmware</u>. I've been doing that for several months (current date: 06/2014), and it has worked flawlessly. But, then again, if you've done that, you probably wouldn't be here. J

#### NOTE :

Because getting your computer to talk to the Taranis and flashing for the first time are such problem areas, there are, literally, hundreds of forum posts on the process. By far one of the best that I've seen is by Cleon on Scott Page's FrSky Taranis with OpenTX 2.0 and beyond forum, specifically <u>Post #1452 at RCGroups.com</u>. If what we do here doesn't float your boat, check out Cleon's post. In fact, you'd probably be smart to bookmark that <u>forum</u> as well as Wayne's FrSky Taranis - 16 Channels, Full Telemetry, RSSI forum at: <u>RCGroups.com</u> Both are treasure troves of help and should be in every OpenTX and Taranis user's toolbox.">

#### Just to review, here are the givens at the start:

- 1. You have an installed copy of the DFU-Util on your system.
- 2. You are competent in downloading and installing applications from the Web.
- 3. You do not have Open <u>TX</u> Companion installed on your computer. If you have Companion 9X installed, that's fine. OpenTX installs in its own folder, and the two live happily together without conflict. If you're still using Companion 9X, now is probably the time to upgrade to <u>OpenTX Companion</u>. I still have C9X on my machine and use it to upgrade my older Turnigy 9X equipped with a FrSky module and running OpenTX r2490. It works just fine!

OK, we're off!

#### Steps/Checklist

Step #1: Checking the DFU-Util. DO THIS!!

1. Using the steps provided in the previous lesson, **Installing Dfu-util**, verify that you have dfuutil installed, if you haven't already done so.

#### Step #2: Downloading and Installing OpenTX Companion

1. Point your browser to the OpenTX Download Page: <u>Downloads: Improving Your TX</u>. If you haven't already done so, bookmark or add this page to your bookmarks/favorites half a dozen times or so. It's your official source for all things approved for Taranis. Note that there are resources here for working with Taranis audio, images that you can use on your Taranis and other downloads that may or may not interest you at the moment. The point is, don't forget about this page!



### **OpenTX Firmware - Current: 2.0.7**

You use OpenTX Companion to select exactly which options you want to prepared for you by our build server and downloaded to your PC. Open

You can check the release history of OpenTX firmware on this page

For people wanting to upgrade a Taranis from a pre-2.0 version (either C Demonstration" flashing setup (as per FrSky instructions), a copy of Ope

### **OpenTX Companion - Current: 2.0.7**

- OpenTX Companion 2.0.7 (2014-07-16)
- OpenTX Companion 2.0.6 (2014-07-13)
- OpenTX Companion 2.0.5 (2014-06-26)
- OpenTX Companion v1.52 (2014-01-10)
- 2. Choose the latest edition of <u>OpenTX Companion</u> and click it.

3. Select the correct platform for your computer and click it.

# OpenTX Companion 2.0.7 Improving your Tx

OpenTX Companion is now available as version 2.0.7 Download Companion and use it to retrieve and transfer the latest OpenTX firmware to your radio. There is no need to update Companion for using the latest firmware version. The previously available Companion 2.0 versions can be used to download and use OpenTX Firmware 2.0.7.

Please note that the Windows version and the Linux RPM versions are released first. OSX and deb packages may be released later on.

The OpenTX team always encourages upgrading to the latest versions, but no security problems have been found in the earlier 2.0.0 - 2.0.6 versions that make it necessary to update.

Download links:

OpenTX Companion 2.0.7 - Windows Installer OpenTX Companion 2.0.7 - OS X Installer OpenTX Companion 2.0.7 - Linux RPM Package 32-bit OpenTX Companion 2.0.7 - Linux DEB Package 32-bit 64-bit

4. The Mac will ask you what to do with the file. Click: "Save File" to authorize the download. Note that the file name is something similar to: campanion-macosx-2.0.7.dmg. If you can't remember where you saved it, you'll need the file name to search for it.

O O Opening companion-macosx-2.0.7.dmg
You have chosen to open:
companion-macosx-2.0.7.dmg
which is: Document (16.1 MB)
from: http://downloads-20.open-tx.org
What should Firefox do with this file?
Open with DiskImageMounter (default)
⊙Save File
Do this automatically for files like this from now on.
Cancel

- Your download time will vary, depending upon the <u>speed</u> of your Internet connection and your computer. On my machine, it takes between 10-15 seconds, and I'm running a Core I-4, 3.3GHz processor with a relatively slow (by some standards) 15MB DSL line.
- 6.When the download is completed, use Finder to locate it. I can't answer for everyone, but my download utility through Firefox is configured to save downloads in the "Downloads" folder. If you can't find it, type the file name (or just companion-macosx) in the Finder search bar. That should do it.
- 7.Double-click the downloaded file to begin the installation. Your Mac may ask for permission to allow the file to change your computer. Enter your system password to allow the change.
- 8.Once the file is uncompressed you should see a folder like the one below:



9. Drag the OpenTX Companion icon to your Applications folder in the System Tray.



10. If the Applications folder is not in your System Tray, drag the icon to the Applications folder in Finder.



11. You may get a screen like the one below, if so click OK.



12. Open the System Preferences application, and select Security & Privacy.



13. You should see a window like the one below. Where it says "companion" was blocked from opening because it is not from an identified developer. Click the **Open Anyway** button.

14. Click on companion in the Applications folder. The first time you open Companion you may see the screen below. If you do, just click **Open**. Companion will start, and you are on

0	00	Security & Privacy					
	◄ ► Show All		Q				
General FileVault Firewall Privacy							
	A login pas	A login password has been set for this user Change Password					
	🗌 Requ	ire password immediately 💠 after sleep or	r screen saver begins				
	Show a message when the screen is locked Set Lock Message						
	Disa	ble automatic login					
Allow apps downloaded from:							
	<ul> <li>Mac App Store</li> <li>Mac App Store and identified developers</li> </ul>						
Anywhere "companion" was blocked from opening because it is not from an identified developer.							
	Click the lock to make changes. Advanced						
your way.							
"companion" is an application							
	downloaded from the Internet. Are you sure you want to open it? Firefox downloaded this file today at 5:31 PM.						
	?	Cancel	Open				
	$\sim$						

15. Take time to look at the next lesson: Part 3: Flashing OpenTX BEFORE you proceed any farther. There are still things to do, and having an understanding of what they are and how they fit together helps to ensure success.

**CONGRATULATIONS!** You've just installed OpenTX Companion on your computer! Don't you feel proud of yourself?