

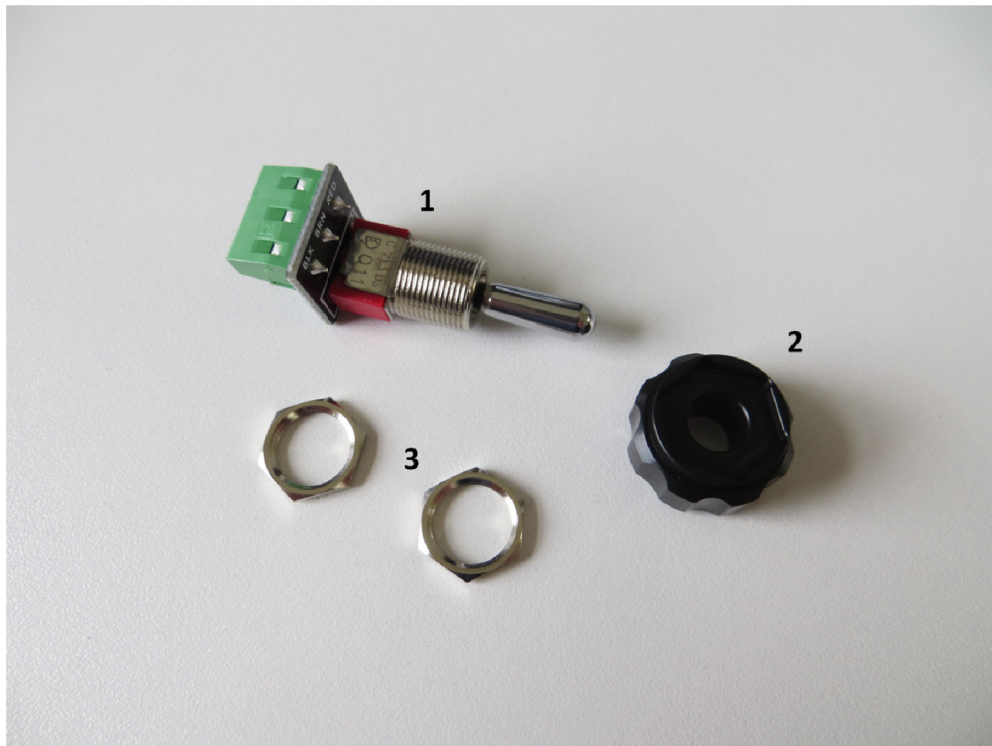
Pinky switch replacement kit for Thrustmaster Warthog Throttle

Installation Instructions

Last updated – July 2020 V1.2

Parts:

You will receive these parts with your kit:



1. Switch unit – replacement switch and screw terminals to attach wires
2. Nut tool – used to remove and install the nut from the throttle grip
3. Spare nuts – used to attach the switch to the throttle, if possible it is recommended to reuse the nuts from the original switch.

Tools required:

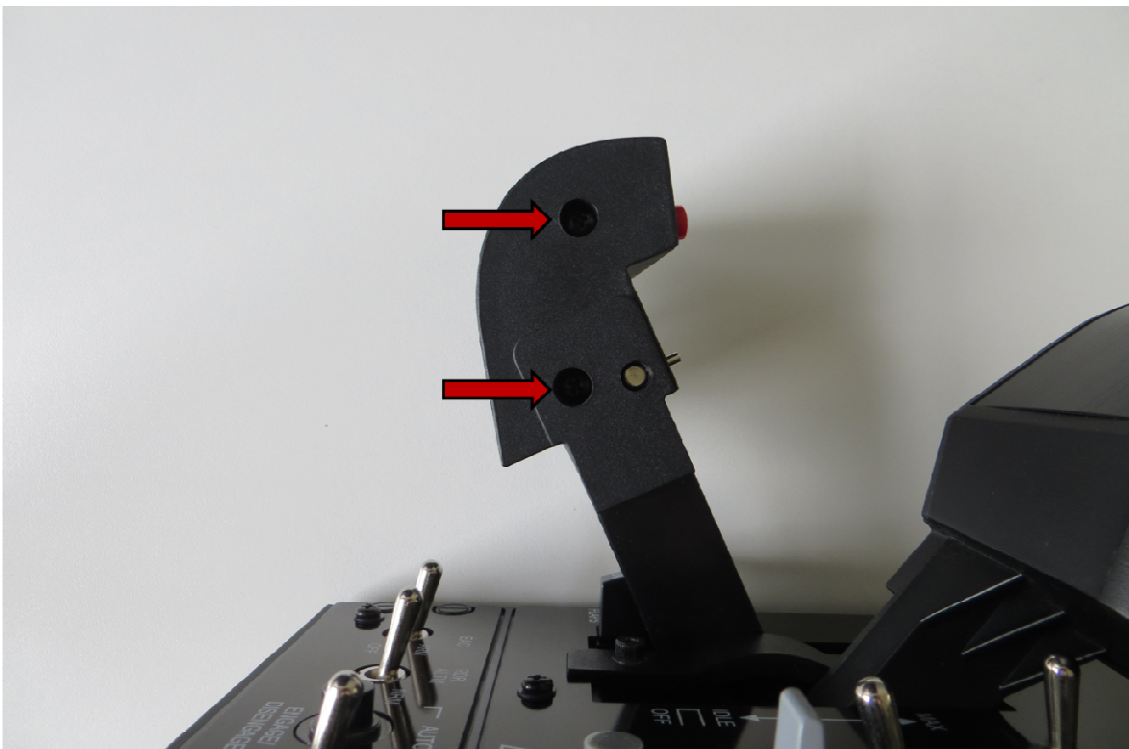
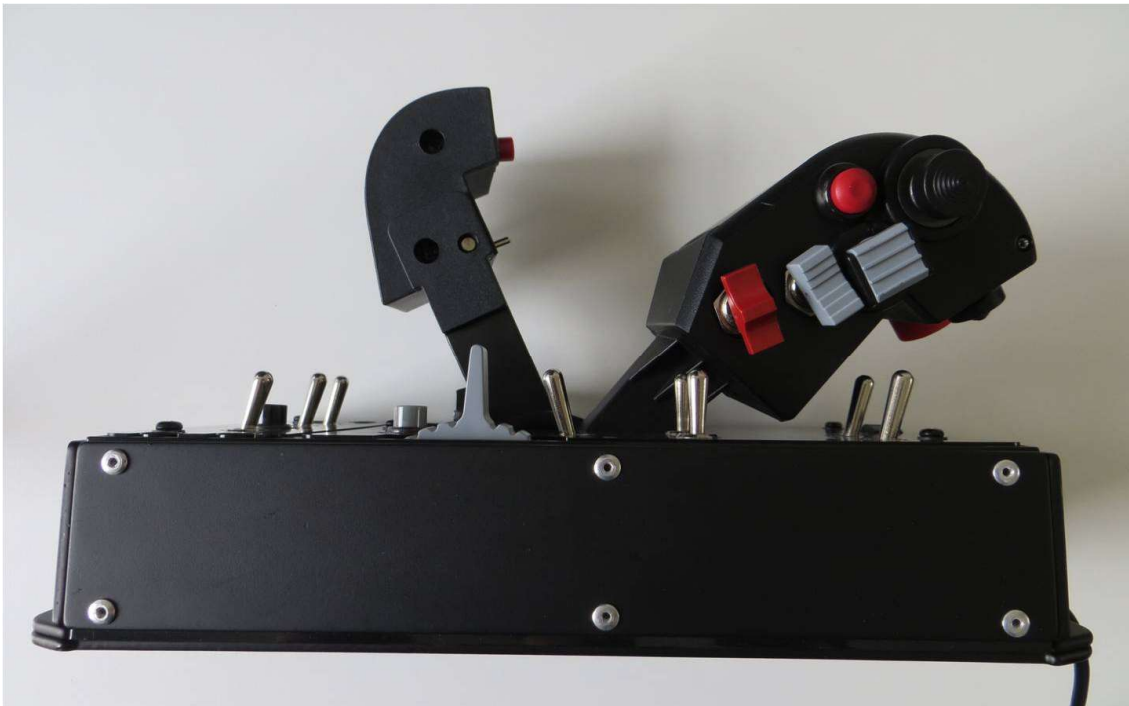


For installation you will need the following tools:

- Wire cutters, or sharp scissors
- Small flat bladed screwdriver (ideally 2.5mm wide blade)
- Phillips screwdriver (PH1 recommended size)

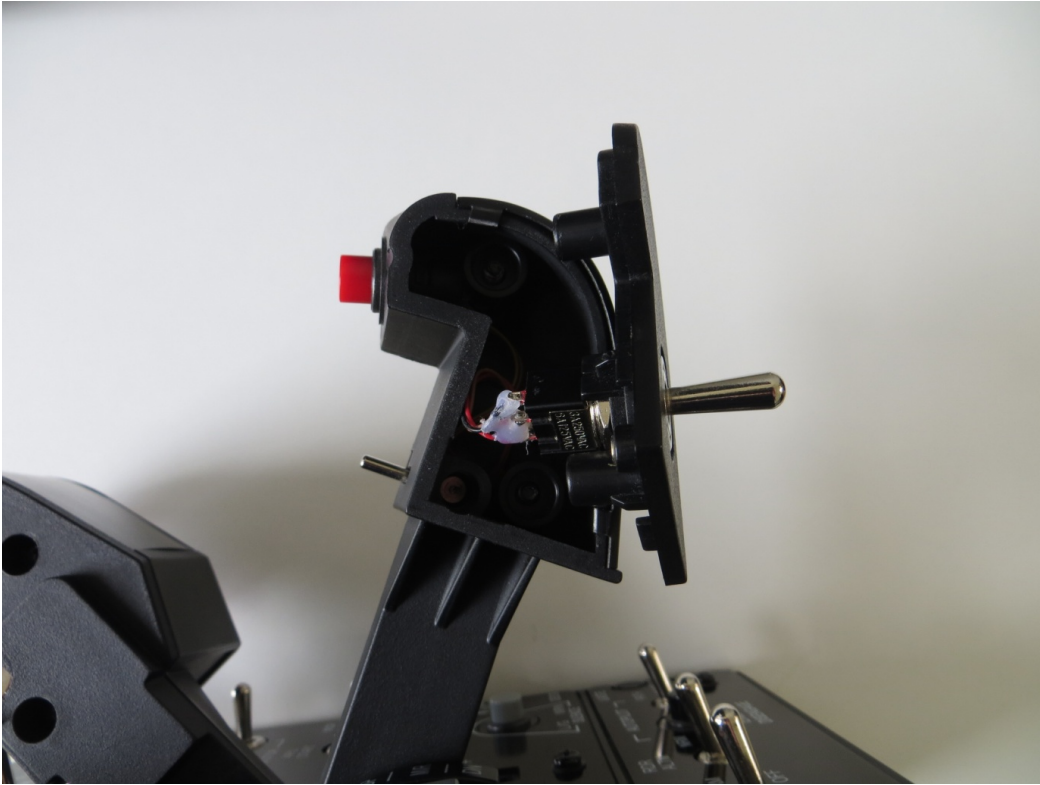
Removing the old switch:

Start the installation by separating the two throttle halves so you have access to the inside screws.



Next unscrew the two screws from the inside of the left hand grip, marked with the arrows.

Carefully pull the side of the grip away, **take care not to pull too far as there are wires connected to the switch.**

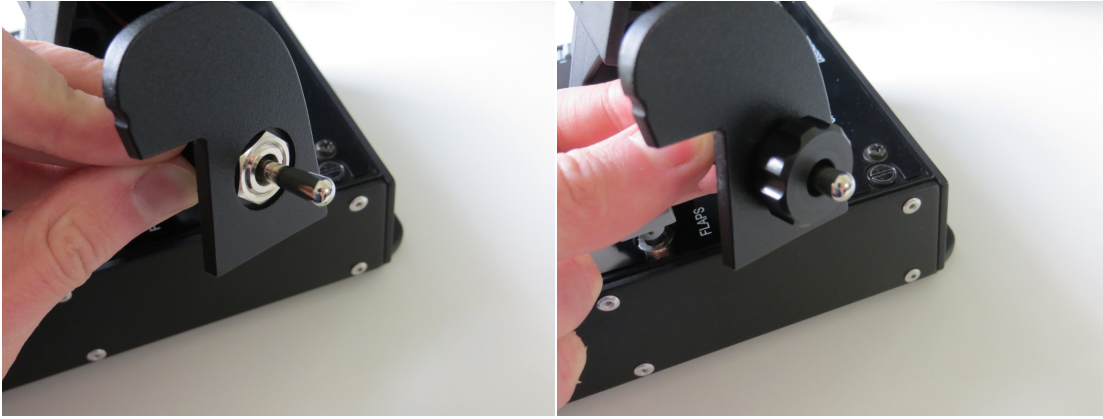


Remove the two screws and plastic pillars from inside the grip, keep these somewhere safe as you need to reinstall them later.

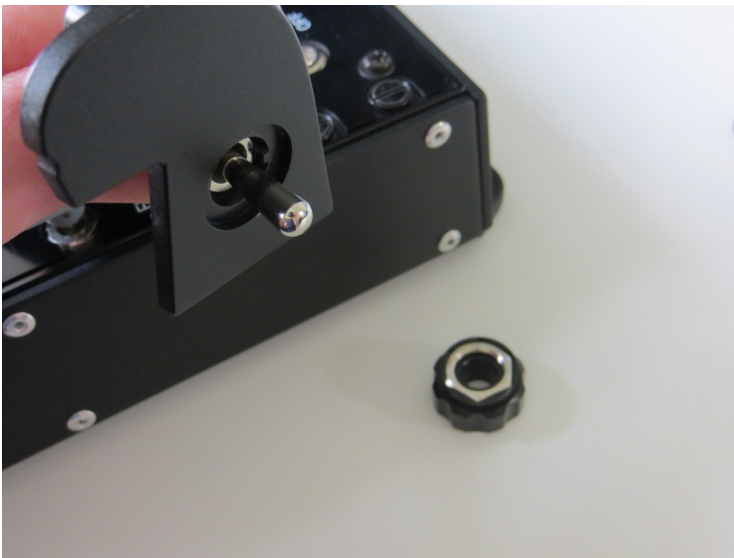


Next use the included nut tool to unscrew the outer nut and release the switch.

Slide the tool hex side first over the switch arm and unscrew by turning anticlockwise

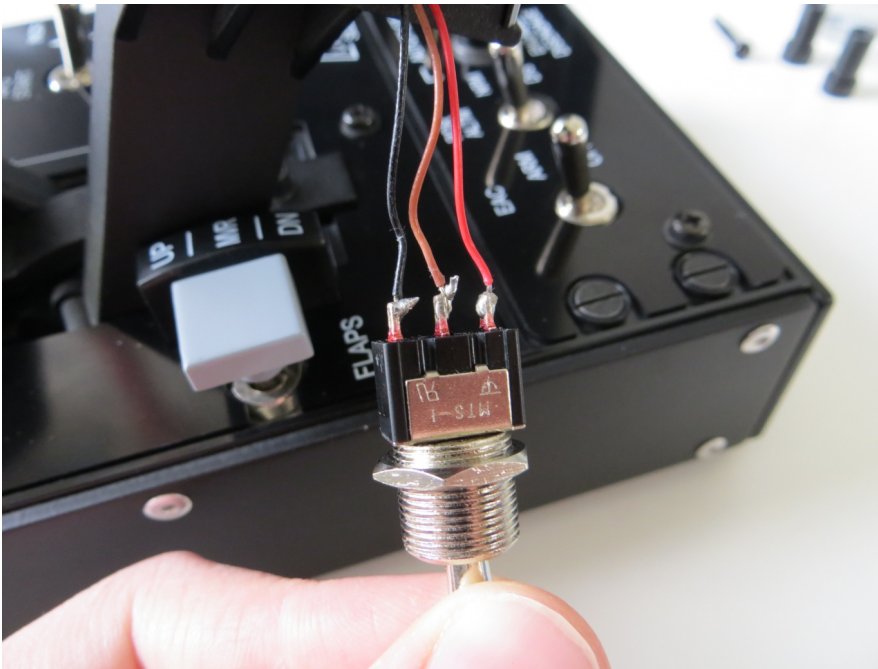
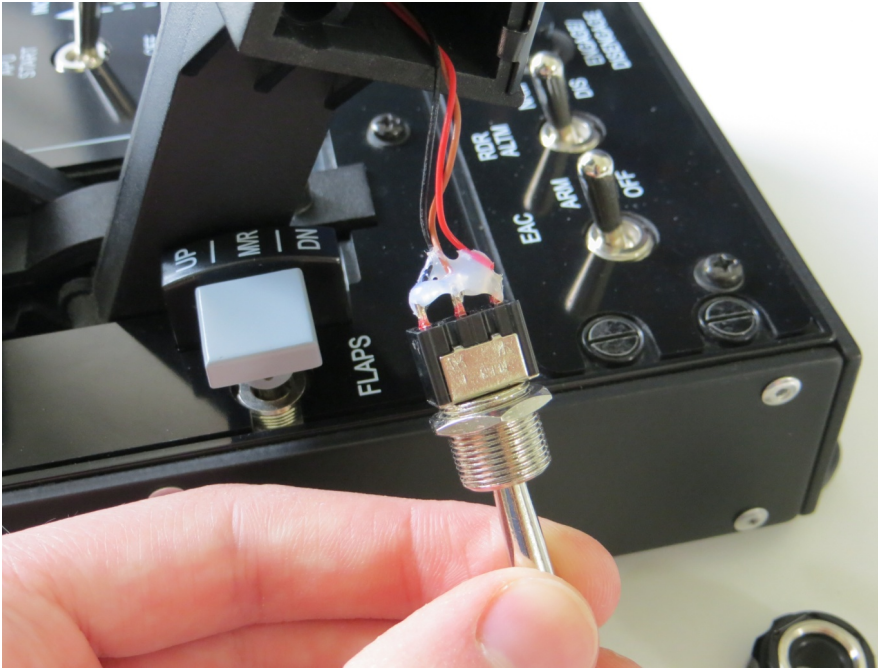


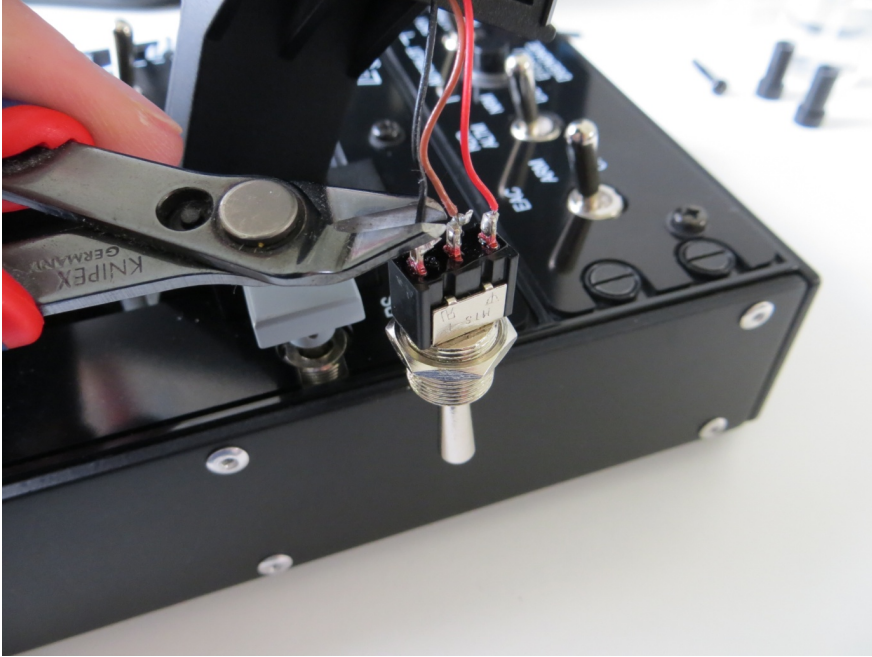
Remove the nuts and switch, keep the nut safe as you will need to reinstall it later.



To install the replacement switch you need to detach wires from the old switch. From the factory there will be hot glue covering the ends of the switch wires. Carefully peel this off to expose the metal contacts.

If you accidentally damage the end of a wire or pull a wire off the switch it shouldn't matter, but the more length of wire you can keep the easier the next steps will be.





Using a pair of wire cutters or sharp scissors, cut the wires off the old switch. **Do this as close to the switch as you can so you have lots of wire to work with.**



Unscrew the remaining nut from the old switch. You should now have the old switch and two original nuts from the throttle. **Keep the nuts safe as we will reuse these in the next step.**

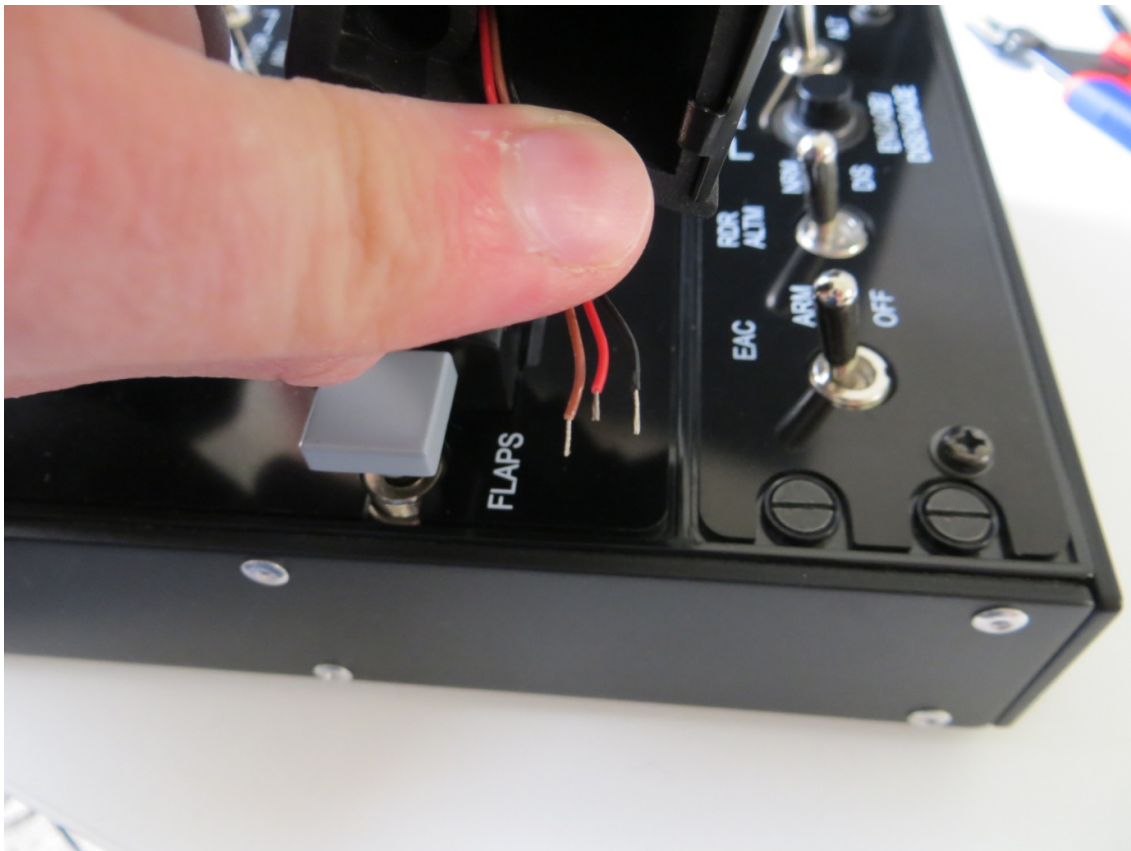
New switch installation:

The first step to install the sensor is to strip a small amount of insulation from the 3 wires. To do this you can use wire strippers if you have them, or very carefully use a pair of scissors or wire cutters. Be very careful to only cut and remove the insulation from the wires and not to accidentally cut all the way through the wire.

You should aim to remove less than approximately 5mm or ¼ inch of insulation from all 3 wires, as shown below.

Once the insulation is removed give the metal strands a slight twist between two fingers, this will help to keep the strands together for the next step.

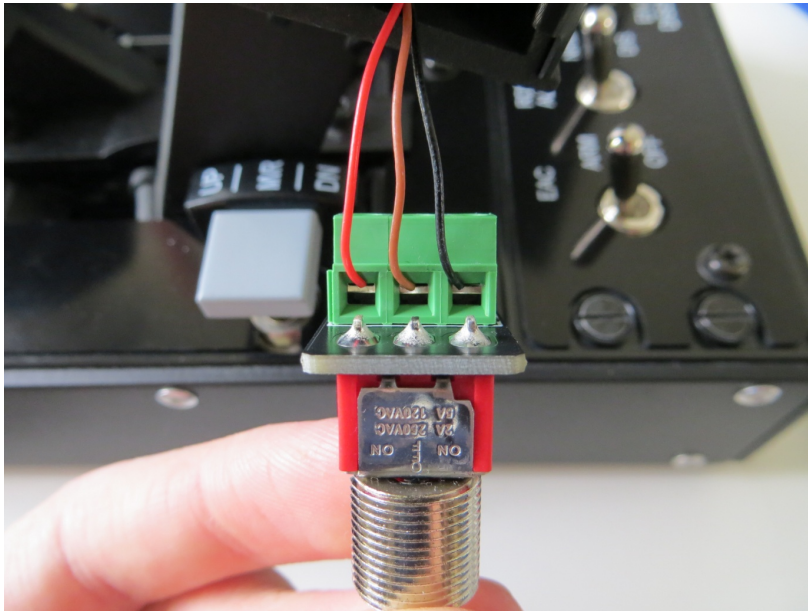
For most people this will be the trickiest step, so if you aren't confident take your time and be patient.



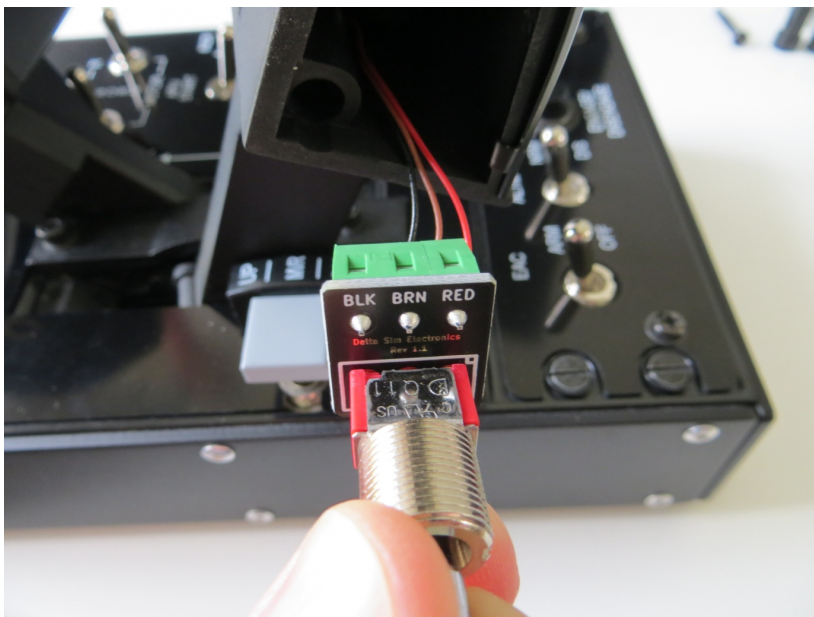
Now it's time to install the new switch!

The screw terminals on the new switch will come fully open. To attach a wire put the metal strands into the hole on the screw terminal, and then use a flat blade screwdriver to tighten the terminals. The metal block will rise up to clamp the wire in, as shown in the picture below.

Make sure the terminal block is clamping on only the metal wire strands and not on the plastic insulation.



The new switch PCB has the wire colours marked onto it, although you might find it easier to use these two pictures to help you. **Make sure the correct wire goes to the correct terminals.**

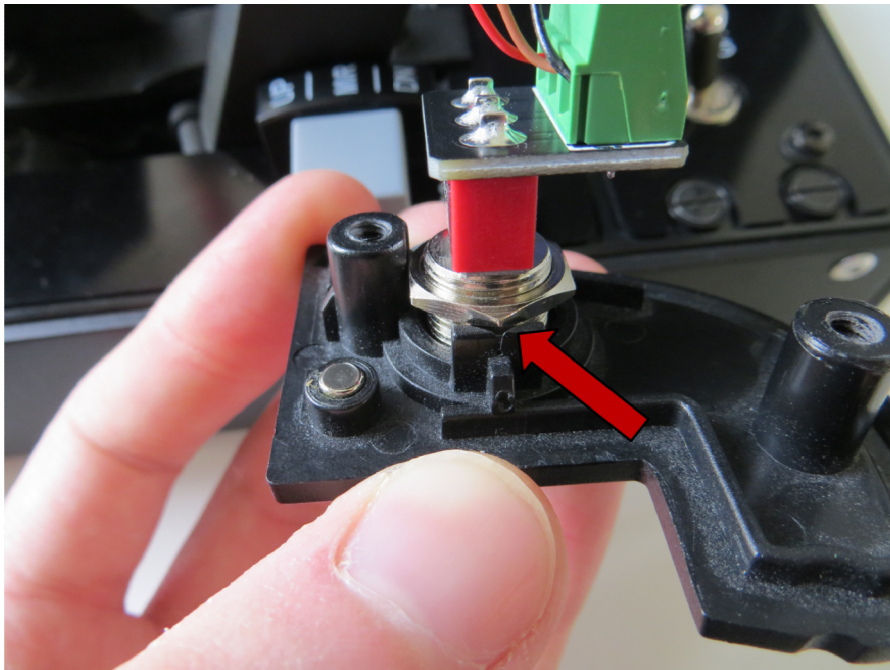


Next take a nut and screw it onto the new sensor. I recommend using a nut that was removed from the throttle if possible, two spare nuts are provided in case the old ones are lost or damaged.

The nut should not be screwed on all the way, a few threads should still be visible as shown below.



Next install the switch into the throttle side plate, the switch is keyed to the plate so it will only go in one way. **The back nut needs to be rotated so it lines up with the slots in the back of the plate, as shown below.** Once everything is in the right position it should drop into place.



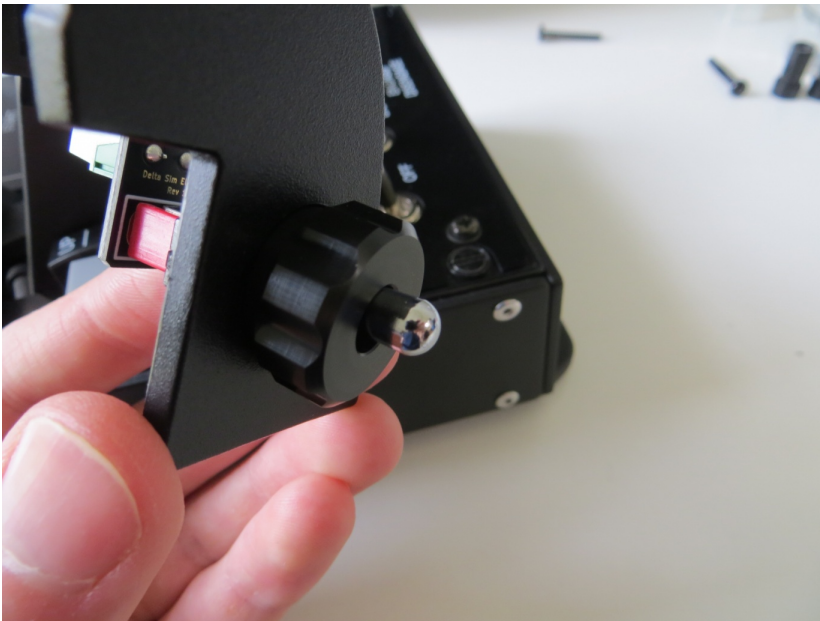
Check the other side of the plate to make sure the switch is in the right position. **Only a few threads should come through so the front of the threaded section is roughly in line with the flat surface of the plate.**

If it's not in a good position you can remove the switch and adjust the back nut up or down, until you're happy with it.



Next use the nut tool again to screw on the outer nut, again if possible try to use the original nut.

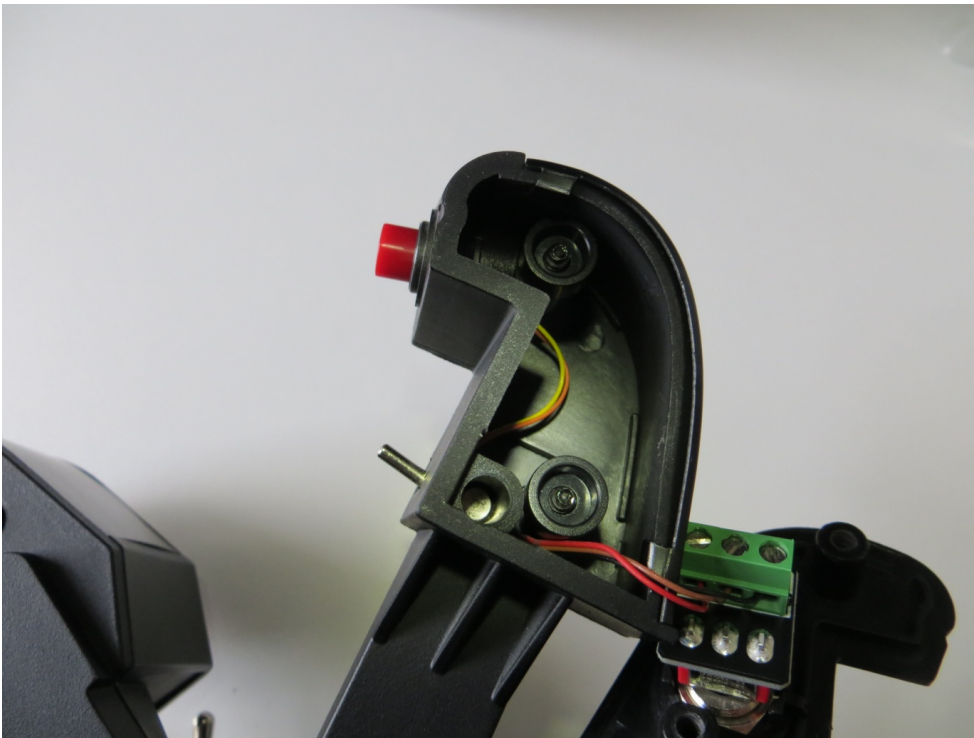
Do not over tighten the nut, just do it up snug using the tool and your fingers



Install the two screws we removed earlier into the two holes on in the throttle.



And then install the two plastic pillars over the screws. **The larger cup end MUST be at the top, as shown below.** You may need to stop the screws falling out of the back with one hand while putting the pillars on with the other. It's much easier to install the screw and pillars now, rather than trying to get everything to line up later.



Next put the side plate with the new switch back on, **be mindful of where the wire are going inside so you don't crush and damage them when everything is tightened down.**



Finally tighten the two screws into the throttle grip to hold everything together.



You are now done with the installation!

It's best to now do a test by going to:

Set up USB game controller >> Throttle HOTAS Warthog >> Test

Make sure everything is working properly. The Pinky Switch should operate buttons 13 and 14 in the test window.

