AIRBUS X

Volume **7**

Thrust Lever Setup

Version 02-01-XX

RECORD OF REVISIONS

revision n°	Issue date	Description
001	28-Aug-2010	Release

INTRODUCTION

STOP, if you got no problems with the throttles in the Aerosoft Airbus, stop reading and go and fly. This document is really only needed for people whose setup is none standard.

The throttles of the real Airbus A320 series are not mechanical connected to the engines like seen on most other aircraft. Instead electrical signals are send from the thrust levers to the FADEC (Full Authority Digital Engine Control) and this computer will control the thrust the engine provide. Please note the throttles of an Airbus are called thrust levers but we use both terms in this document.

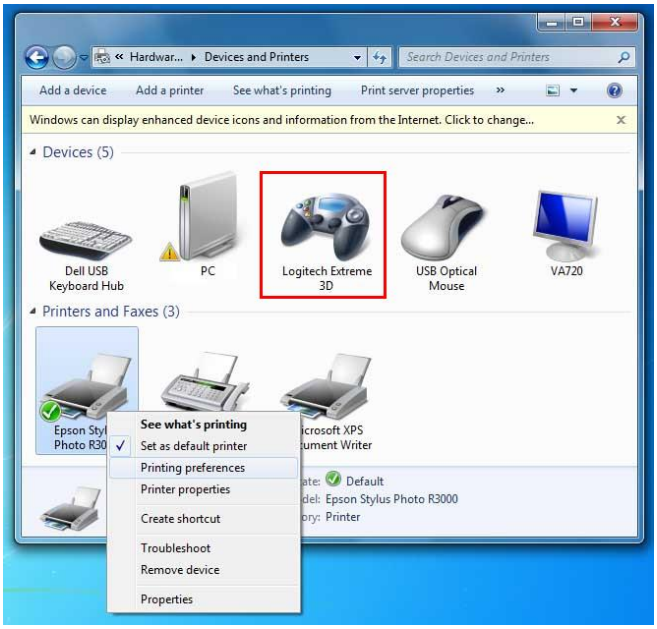
Normally FSX will use your hardware throttles to set thrust directly. Therefore it was necessary to develop a special module that detaches the hardware throttles from the FSX throttles and then control them outside FSX. For this to work it is VERY important that your hardware throttles are setup correctly in both Windows and FSX. Most users will not have to do anything special as it will work fine with a standard FSX.

For the Aerosoft Airbus products you MUST have at least one analog throttle axis available – keys won´t work.

Please follow the sequence below and don´t skip any step, also if you think you are sure that it is correct, often it reveals that it´s not!

CALIBRATE, ALWAYS CALIBRATE

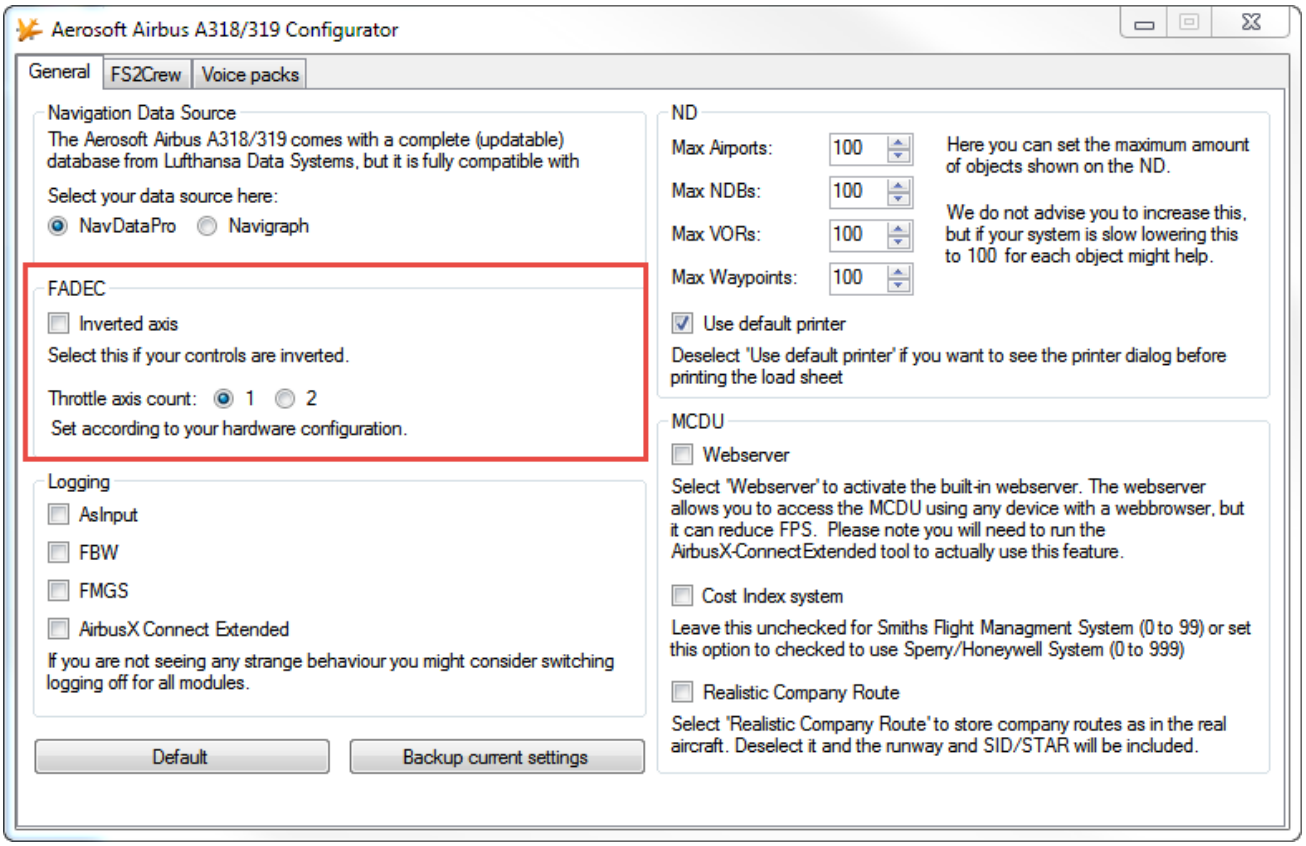
The first thing you should do is to test and calibrate all your controllers in the Windows Control Panel / Hardware and Sound/Devices and Printer menu:



Right click with the mouse on the Gaming device and select "Game Controller Setup" – a new menu box opens, then select the controller you want to calibrate and select "Properties" - yet another menu box opens. On that menu box you will see a "Test" tab at the top as well as a testing area where all the axis' and buttons are shown. You can test but it is better to calibrate. Select Settings/Calibrate and follow the instructions. Take your time, this really is important. If you ever get problems again, always calibrate first before doing anything else!

CHECK THE CONFIGURATION

The next thing we are going to check is the setting in the configuration files of the Aerosoft Airbus. Start the Aerosoft Airbus A318/A319 Configurator (it's in the Windows Startmenu or what Microsoft decided to call that this month). You are looking at the FADEC section here.



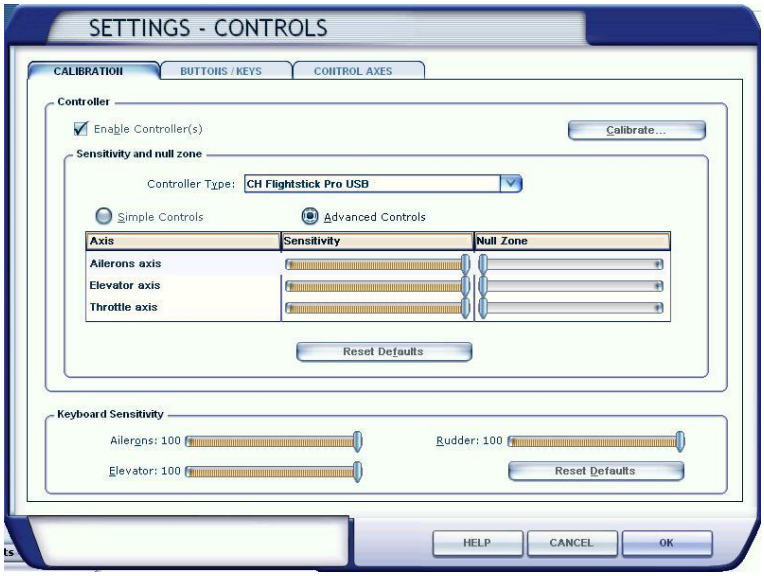
If you found the throttles to work inverted you now know what to click. Make sure you select the right number of Throttle axis, if you got a dual controller make sure 2 is selected. It is not a bad idea to activate logging of AsInput because it can help to debug things. Just close the configurator, the new settings will be stored.

Now let's start FSX.

SETTINGS INSIDE FSX

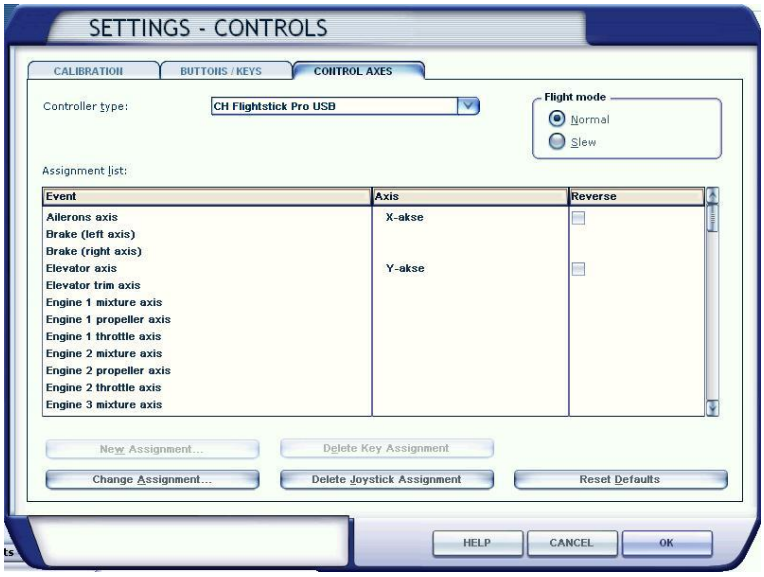
Go slow, make sure you check the images thoroughly so you do not miss any of the settings!

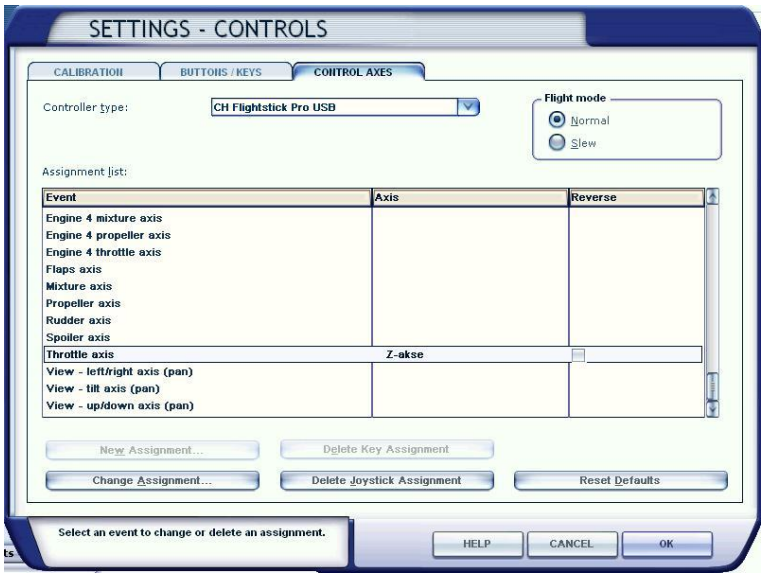
In FSX select "Settings", then "Controls…". We'll look at the CALIBRATION tab first



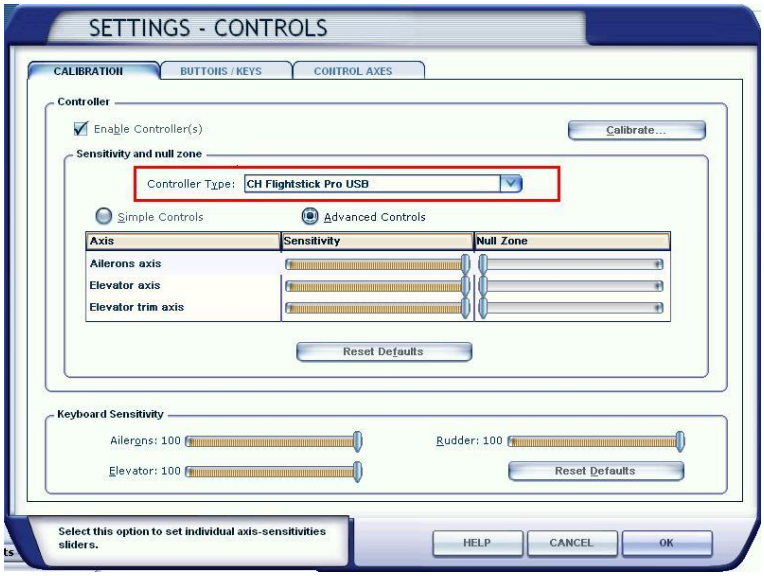
Note that preferably the **Null Zones** should be set to minimum and **Sensitivity** set to Maximum.

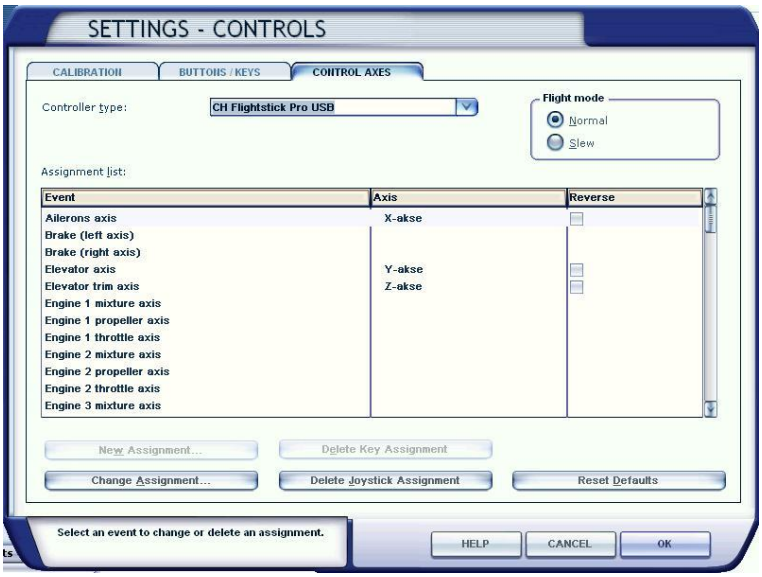
Now click the CONTROL AXES tab. If you only have a single joystick with one throttle axis, the FSX controller menus should look like this:

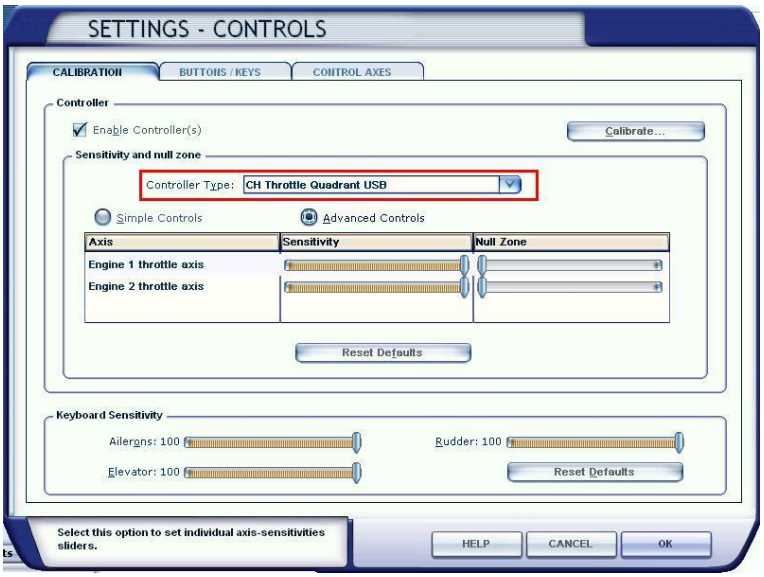


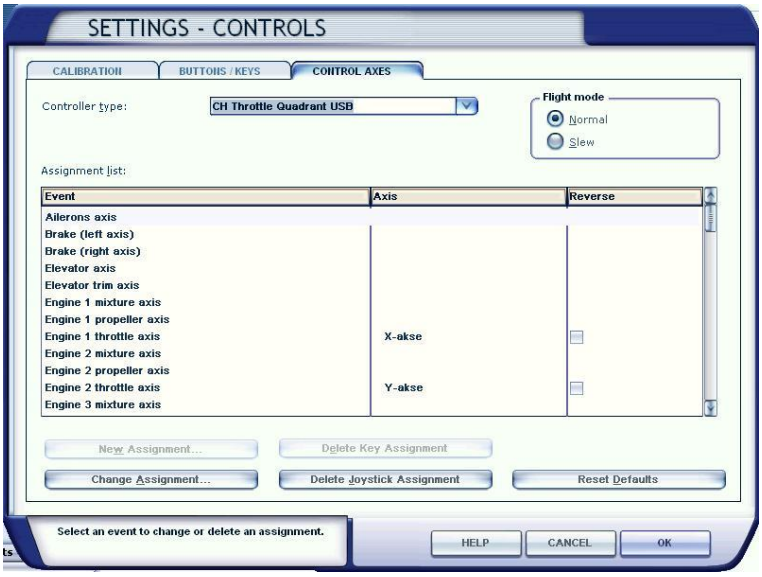


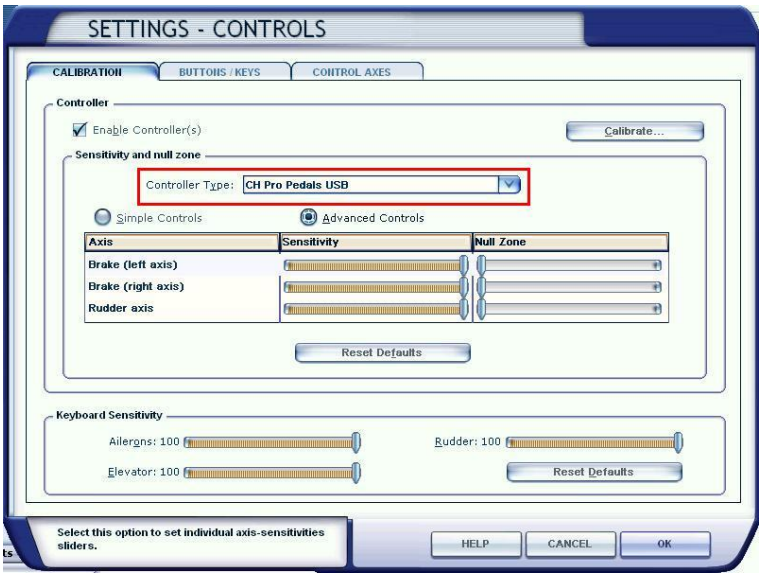
If you got an advanced setup with joystick/yoke, throttle quadrant and pedals, then it could look like this:

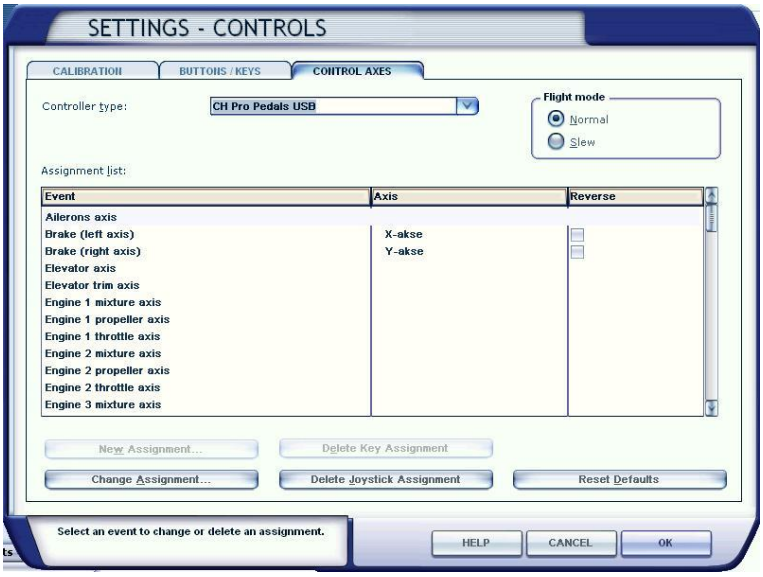


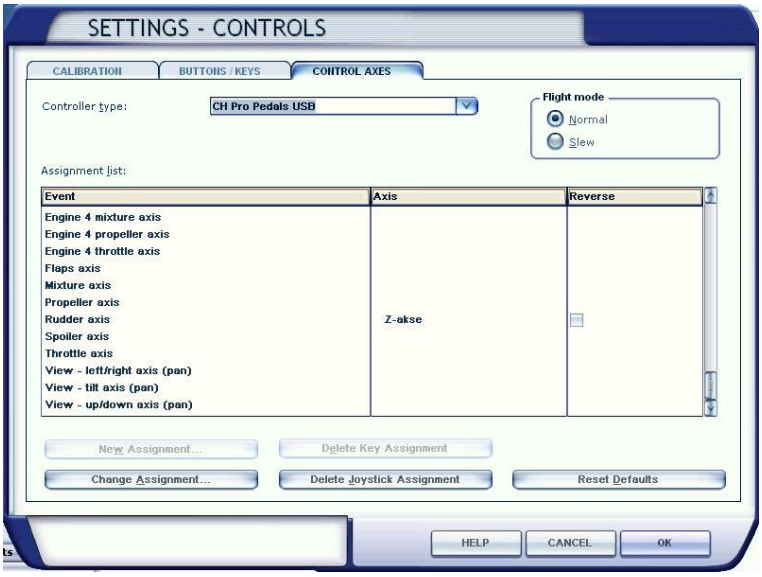

SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller type:
CH Flightstick Pro USB
Flight mode
Normal
Slew
Assignment list:
Event
Axis
Reverse
Ailerons axis
X-akse
Brake (left axis)
Brake (right axis)
Elevator axis
Y-akse
Elevator trim axis
Z-akse
Engine 1 mixture axis
Engine 1 propeller axis
Engine 1 throttle axis
Engine 2 mixture axis
Engine 2 propeller axis
Engine 2 throttle axis
Engine 3 mixture axis
New Assignment...
Delete Key Assignment
Change Assignment...
Delete Joystick Assignment
Reset Defaults
Select an event to change or delete an assignment.
HELP
CANCEL
OK


SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller
Enable Controller(s)
Calibrate...
Sensitivity and null zone
Controller Type:
CH Throttle Quadrant USB
Simple Controls
Advanced Controls
Axis
Sensitivity
Null Zone
Engine 1 throttle axis
Engine 2 throttle axis
Reset Defaults
Keyboard Sensitivity
Ailerons: 100
Rudder: 100
Elevator: 100
Reset Defaults
Select this option to set individual axis-sensitivities sliders.
HELP
CANCEL
OK


SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller type:
CH Throttle Quadrant USB
Flight mode
Normal
Slew
Assignment list:
Event
Axis
Reverse
Ailerons axis
Brake (left axis)
Brake (right axis)
Elevator axis
Elevator trim axis
Engine 1 mixture axis
Engine 1 propeller axis
Engine 1 throttle axis
X-akse
Engine 2 mixture axis
Engine 2 propeller axis
Engine 2 throttle axis
Y-akse
Engine 3 mixture axis
New Assignment...
Delete Key Assignment
Change Assignment...
Delete Joystick Assignment
Reset Defaults
Select an event to change or delete an assignment.
HELP
CANCEL
OK


SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller
Enable Controller(s)
Calibrate...
Sensitivity and null zone
Controller Type:
CH Pro Pedals USB
Simple Controls
Advanced Controls
Axis
Sensitivity
Null Zone
Brake (left axis)
Brake (right axis)
Rudder axis
Reset Defaults
Keyboard Sensitivity
Ailerons: 100
Rudder: 100
Elevator: 100
Reset Defaults
Select this option to set individual axis-sensitivities sliders.
HELP
CANCEL
OK


SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller type:
CH Pro Pedals USB
Flight mode
Normal
Slew
Assignment list:
Event
Axis
Reverse
Ailerons axis
Brake (left axis)
X-akse
Brake (right axis)
Y-akse
Elevator axis
Elevator trim axis
Engine 1 mixture axis
Engine 1 propeller axis
Engine 1 throttle axis
Engine 2 mixture axis
Engine 2 propeller axis
Engine 2 throttle axis
Engine 3 mixture axis
New Assignment...
Delete Key Assignment
Change Assignment...
Delete Joystick Assignment
Reset Defaults
Select an event to change or delete an assignment.
HELP
CANCEL
OK


SETTINGS - CONTROLS
CALIBRATION
BUTTONS / KEYS
CONTROL AXES
Controller type:
CH Pro Pedals USB
Flight mode
Normal
Slew
Assignment list:
Event
Axis
Reverse
Engine 4 mixture axis
Engine 4 propeller axis
Engine 4 throttle axis
Flaps axis
Mixture axis
Propeller axis
Rudder axis
Z-akse
Spoiler axis
Throttle axis
View - left/right axis (pan)
View - tilt axis (pan)
View - up/down axis (pan)
New Assignment...
Delete Key Assignment
Change Assignment...
Delete Joystick Assignment
Reset Defaults
HELP
CANCEL
OK

Please go through each and every controller you have attached to your system in the FSX controller menu and verify that all axes for the various controllers are setup correctly, and more important, that there are **no double assignments**, like "ENGINE 1 THROTTLE SET" assigned to both Your Throttle quadrant and Pedals.

If more than one hardware axis is setup for the same engine in FSX, the throttle(s) will simply **NOT** work with the Airbus. We have seen quite a few customers where this had happened.

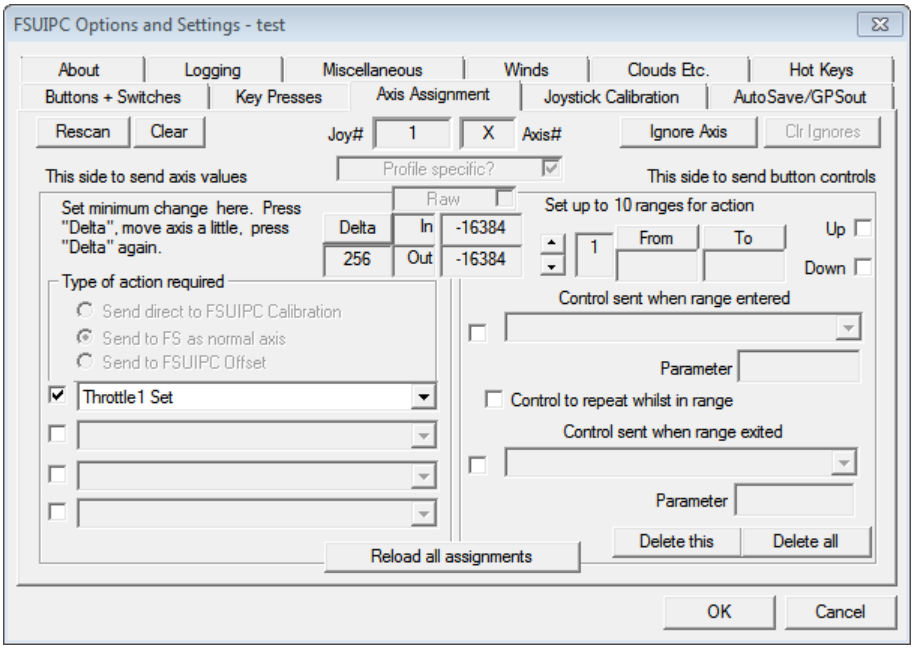
After assigning the various controllers and their axes, you should close down FSX and restart it, otherwise the new settings might not be saved correctly.

USING FSUIPC WITH AXES NOT ASSIGNED IN FSXCONTROLLER MENU

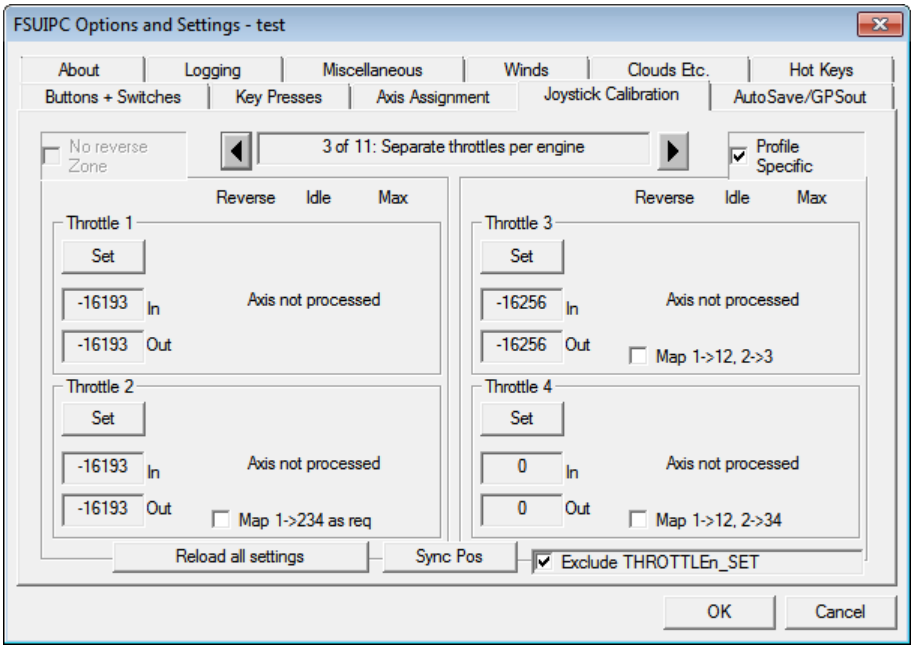
We have seen a lot of users who define the axes not via the standard FSX routines but via FSUIPC. Often this is simply not needed!

You do NOT need FSUIPC for the Aerosoft Airbus models, you will only need FSX.

If using you are using FSUIPC assignment, make sure that the throttles are not assigned in the FSX controller menu.
Open the FSUIPC menu and go to Axis assignment and set a checkmark in Aircraft specific? Checkbox.
Setup **each** throttle axis to read like this:



Then select the Joystick calibration tab and check it look like this:



You will need to repeat this for each of the Airbus models you fly.

With the above setup you won´t have reverse thrust with your hardware levers, but will need to use F2 to engage revers thrust.

Another solution can be found here:

http://forum.aerosoft.com/index.php?/topic/60794-ch-throttle-quadrant-idle-thrust-woes/#entry432569

If you followed this instruction, the throttles should work correctly for the Aerosoft Airbus aircraft!