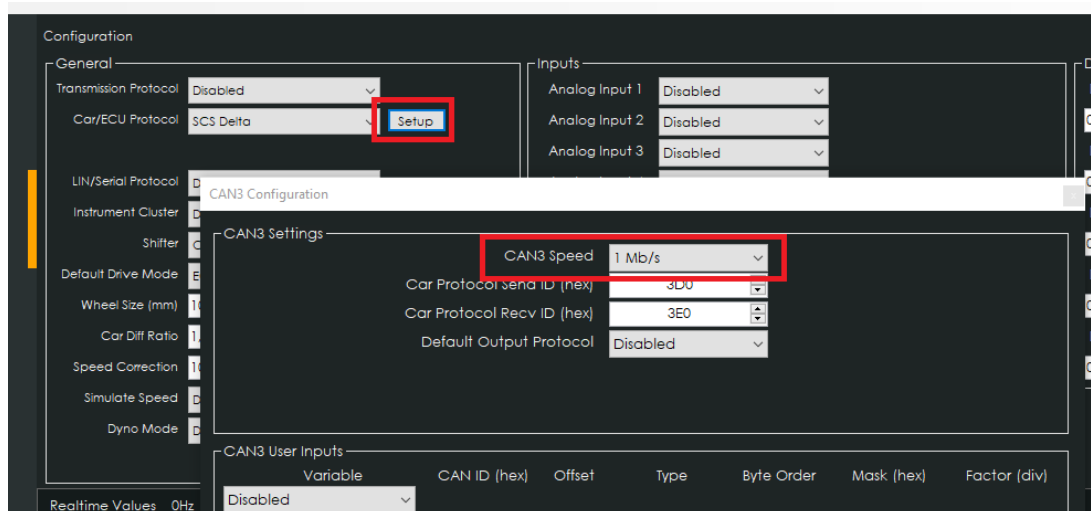
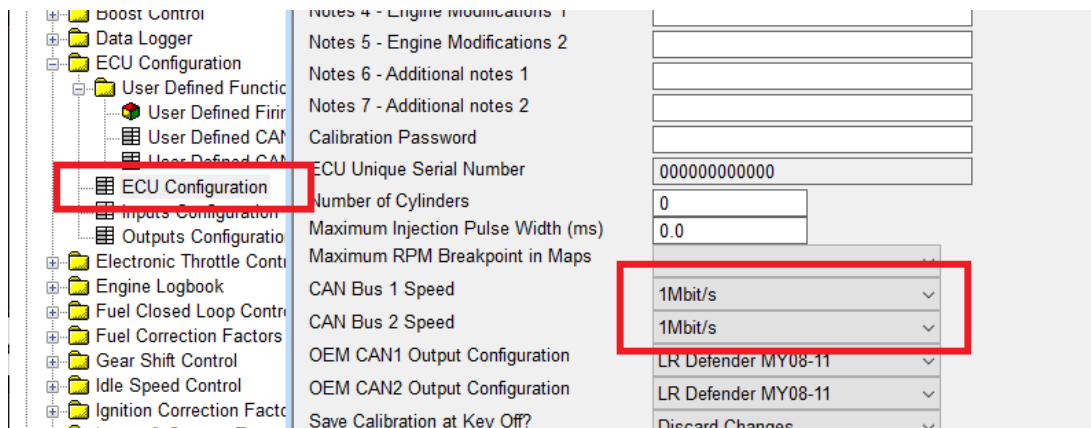


CANTCU – SCS Delta Integration

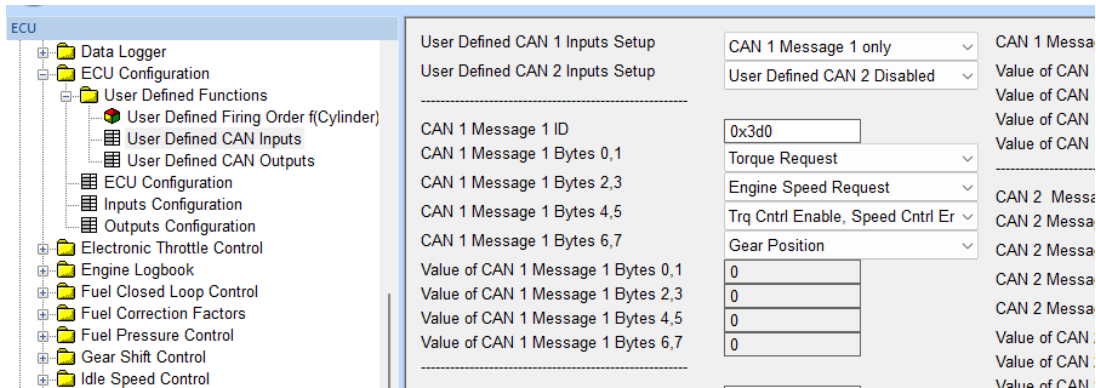
- Delta 700, 880, 900 and GDI6 ECUs with FW 01.06.2023 or newer
- CAN2.0B, Standard 11bit identifiers
- **CAN Speed** is configurable
- **CAN I/O Addressing** is configurable

SCS Delta CAN Configuration

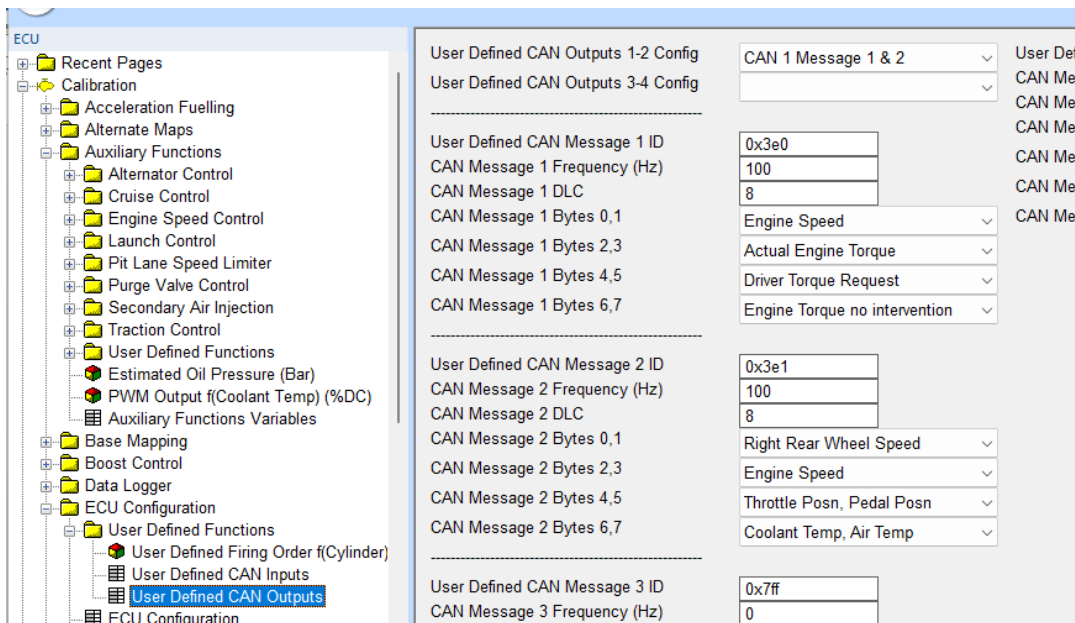
Select a matching CAN speed/frequency in both SXTune and CANTCU Configurator.



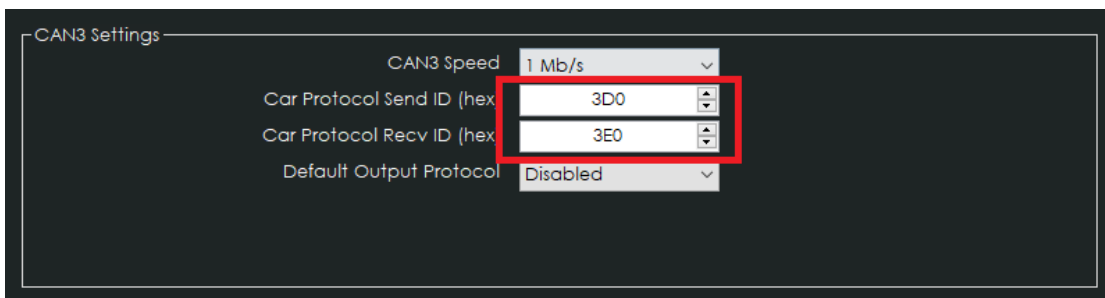
User defined CAN Inputs settings as below. Note that CAN 1 is selected, change to CAN 2 if required depending on which ECU CAN bus the CANTCU is connected to.



User defined CAN output settings as below. Note that CAN 1 is selected, change to CAN 2 if required depending on which ECU CAN bus the CANTCU is connected to.



Match the CANTCU **Send ID** and **Recv ID** to IDs used in SXTune.



Torque Management Settings

NOTE!

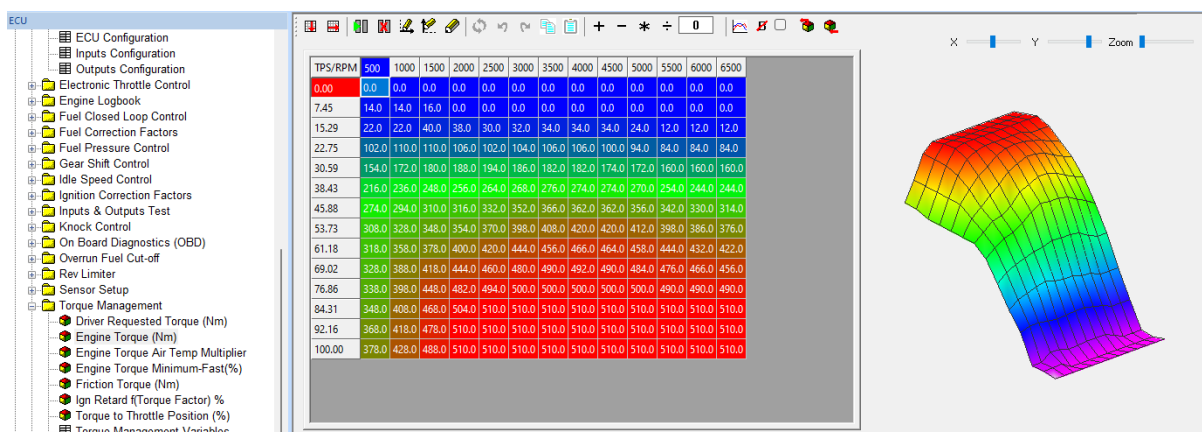
All tuning should always be done by a professional in a safe environment (track/dyno)

RPM Targeting (blips) on downshifts needs to be carefully tuned to avoid undesired behavior (overshoot/undershoot) of the blip. Especially on DCT transmissions, the RPM request sent from CANTCU to SCS Delta is heavily dependent on a correctly calibrated diff ratio/wheelspeed.

In Torque Management, set variables as below:

Parameter	Value
Requested Gear	0
Actual Gear	0
Torque Error (rpm)	0
Proportional Term	0
Integral Term	0
Derivative Term	0
Torque Calculation Method	Internal - Engine ECU
Torque Control Method	Retard & Fuel Cut
Throttle Torque Control Proportional Gain	200
Throttle Torque Control Integral Gain	100
Throttle Torque Control Derivative Gain	50
Throttle Torque Integral Saturation	5000
Torque Control Time Out (ms)	3000
Throttle Control Delay (ms)	600
Throttle Control Filter Coefficient	0.2
Spark offset ramp out rate (°/10ms)	10

Example Engine Torque map. This map should be calibrated on a dyno or rolling road, and it can be estimated from a full load power curve. If transmission slip is experienced on low/medium load, increase the values in corresponding part of the map.



Ignition Retard f(Torque Factor) %. If torque reduction on upshifts feel too aggressive/excessive, decrease the values in this map.

Torque Factor	Ign Retard f(Torque Factor) %
60.0	30.00
64.7	28.00
69.8	25.50
72.9	24.00
75.7	22.25
80.0	19.75
82.7	18.00
85.9	16.00
88.6	14.00
91.8	11.50
93.7	10.00
96.9	7.00
97.6	6.00
98.8	4.00
99.6	2.00
100.0	0.00

Engine Torque Minimum-Fast(%)

RPM	Engine Torque Minimum-Fast(%)
500	0.00
6000	60.00

Engine Torque Air Temp Multiplier

Air Temp	Engine Torque Air Temp Multiplier
-30	1.10
-20	1.10
-10	1.09
0	1.06
10	1.04
20	1.02
30	0.99
40	0.96
50	0.92
60	0.88
70	0.84
80	0.80
90	0.77
100	0.71
110	0.65
118	0.59

Friction Torque example map

