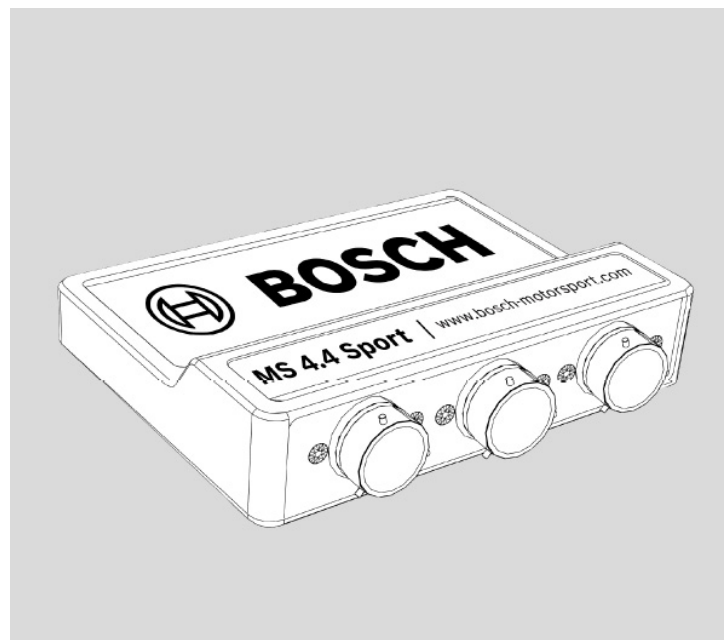AiM Infotech

Bosch MS 4.4 Sport CSTX20 ECU

Release 1.01

ECU

AiM

This tutorial explains how to connect AiM devices to Bosch MS 4.4 Sport CSTX20 ECU.

1
Wiring connection

Bosch MS 4.4 a data transmission buses based on CAN on one of the three Deutsch connectors placed on its front.

With reference to Bosch MS4.4 CSTX20 user manual, here below you see connection table.

Pin number	Pin function	AiM cable
C36	CAN2 high	CAN+
C51	CAN2 Low	CAN-

2
AiM device configuration

Before connecting the ECU to AiM device set this up using AiM Race Studio Software. The parameters to select in the device configuration are:

- ECU manufacturer: "Bosch"
- ECU Model: "MS4_SP_T_44CSTX20";

3
Available channels

Channels received by AiM loggers connected to "Bosch" " MS4_SP_T_44CSTX20" protocol are:

ID	CHANNEL NAME	FUNCTION
ECU_1	MS44_RPM	RPM
ECU_2	MS44_SPEED	Vehicle speed
ECU_3	MS44_WH_ABS_FL	Front left wheel ABS
ECU_4	MS44_WH_ABS_FR	Front right wheek ABS
ECU_5	MS44_WH_ABS_RL	Rear left wheel ABS
ECU_6	MS44_WH_ABS_RR	Rear right wheel ABS
ECU_7	MS44_ATH	Throttle position percentage
ECU_8	MS44_ETB	Electronic throttle current position
ECU_9	MS44_APS	Accelerator pedal position
ECU_10	MS44_GEAR	Engaged gear
ECU_11	MS44_GEAR_RATIO	Gear ratio
ECU_12	MS44_GEAR_CUT	Gear cut
ECU_13	MS44_ACCX	X acceleration
ECU_14	MS44_ACCY	Y acceleration
ECU_15	MS44_ACCZ	Z acceleration
ECU_16	MS44_P1	Pressure sensor 1
ECU_17	MS44_PCRANK	Pressure crank
ECU_18	MS44_POIL	Oil pressure
ECU_19	MS44_PWAT	Water pressure
ECU_20	MS44_PAMB	Ambient pressure
ECU_21	MS44_PFUEL	Fuel pressure
ECU_22	MS44_MAPPOS	Manifold air pressure position
ECU_23	MS44_FUEL_LIT	Fuel litres
ECU_24	MS44_TAIR	Intake air temperature
ECU_25	MS44_TFUEL	Fuel temperature

ECU_26	MS44_TOIL	Oil temperature
ECU_27	MS44_TLA1	Lambda 1 temperature
ECU_28	MS44_TLA2	Lambda 2 temperature
ECU_29	MS44_TMOT	Engine temperature
ECU_30	MS44_TEX1	Exhaust gas temperature 1
ECU_31	MS44_TEX2	Exhaust gas temperature 2
ECU_32	MS44_ABS_SW_ST	ABS switch status
ECU_33	MS44_BRK_PR	Brake pressure
ECU_34	MS44_BRAKE_SW	Brake switch
ECU_35	MS44_P22_M	Average pressure after throttle plate
ECU_36	MS44_P22_2M	Intake Manifold air pressure after throttle 2
ECU_37	MS44_P22_SP	Boost pressure-controller reference value out of maps
ECU_38	MS44_WGDC	Wastegate output duty cycle
ECU_39	MS44_WGD2	Wastegate output duty cycle 2
ECU_40	MS44_TC_ACT	Traction control activation
ECU_41	MS44_OIL_LAMP	Oil pressure lamp on
ECU_42	MS44_MIL	Malfunctioning indication led
ECU_44	MS44_LAMBDA1	Lambda value 1
ECU_45	MS44_LAMBDA2	Lambda value 2
ECU_46	MS44_TC_SW_POS	Traction control switch position
ECU_47	MS44_CAMSHPOS	Camshaft position
ECU_48	MS44_BATT	Battery supply
ECU_49	MS44_DATH	Throttle angle gradient
ECU_50	MS44_IGN_BASE	Ignition base
ECU_51	MS44_IGN_MAP	Ignition MAP
ECU_52	MS44_TDWELL	Ignition circuit dwell time
ECU_53	MS44_TIBASE	Injection duration from map and after corrections
ECU_54	MS44_TIMAP	Injection duration from map
ECU_55	MS44_IGN_ANG	Ignition angle