AiM User Guide

Solo 2/Solo 2 DL, EVO4S and ECULog kit for Kawasaki ZX-10R Stock/Racing kit MY2011/2016/2021

Release 1.04

1
Models and years

This manual explains how to connect Solo 2 DL, EVO4S and ECULog to the bike engine control unit (ECU).

Compatible models are:
* Kawasaki Ninja ZX-10R MY2011   2011-2015
* Kawasaki Ninja ZX-10R MY2011 Racing kit   2011-2015
* Kawasaki Ninja ZX-10R MY2016   2016-2020
* Kawasaki Ninja ZX-10R MY2016 Racing kit   2016-2020
* Kawasaki Ninja ZX-10R MY2021   from 2021
* Kawasaki Ninja ZX-10R MY2021 Racing kit   from 2021

Warning: for these models/years AiM recommends not to remove the stock dash. Doing so will disable some of the bike functions or safety controls. AiM Tech srl will not be held
responsible for any consequence that may result from the replacement of the original instrumentation cluster.

2
Kit content and part numbers

AiM developed a specific installation bracket for Solo 2/Solo 2 DL and a connection cable to the ECU for Solo 2 DL, EVO4S and ECULog.

2.1
Bracket for Solo 2/Solo 2 DL

Part number of **Solo 2/Solo 2 DL** installation bracket for **Kawasaki Ninja ZX-10R 2011-2020 only** – shown below – is: **X47KPFSOLO2KN.**

Installation kit contains:
* 1 bracket **(1)**
* 2 toothed washers **(2)**
* 2 Allen screws with flat head M6x12mm (**3**)
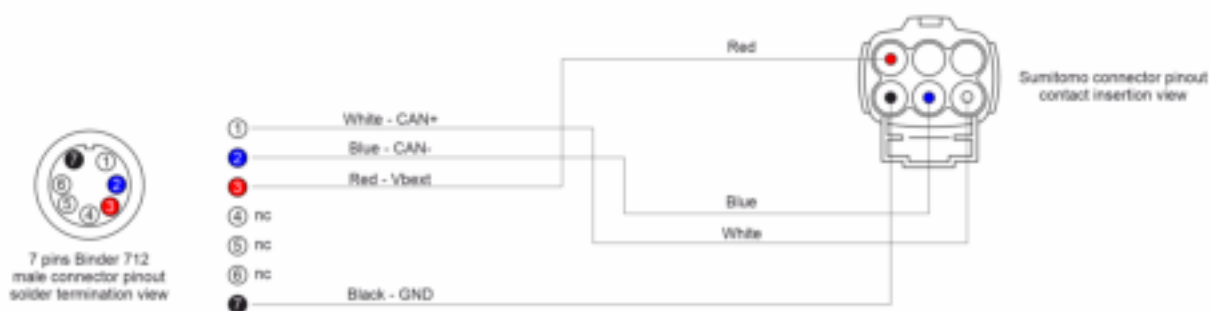* 2 Allen screws with flat head M4x10mm (**4**)

2.2
AiM cable for Solo 2 DL, EVO4S and ECULog

Part number of connection cable for Solo 2 DL, EVO4S and ECULog – shown below – is: **V02569220.**

The following image shows the cable constructive scheme.

2.3
Solo 2 DL kit (AiM cable + bracket)

Installation bracket and connection cable for Solo 2 DL for Kawasaki Ninja can be also bought together with part number: **V0256922CS.**

3
Solo 2 DL, EVO4S and ECULog connection

To connect Solo 2 DL, EVO4S and ECULog to the bike ECU, use the diagnostic connector placed under the bike seat and shown here on the right.

AiM connection cable length is 140cm.

To connect Solo 2 DL, EVO4S and ECULog to the ECU of **Kawasaki** bikes **with Racing Kit** or **latest 2018 bike models**, use the CAN OUTPUT connector placed under the bike windshield, right side and shown here on the right.

4
Configuration with RaceStudio 3

Before connecting AiM devices to the bike ECU, set all functions up using AiM RaceStudio 3 software. The parameters to set in the device configuration ("ECU Stream" tab) are:

- ECU Manufacturer: "Kawasaki"
- ECU Model:
  - ○ "KIT RACING" for Kawasaki ZX-10R and ZX-10R Racing kit 2011-2015 (**RaceStudio 3 only**)
  - ○ "ZX10R_2016" for Kawasaki ZX-10R and ZX-10R Racing kit 2016-2021 (**RaceStudio 3 only**)

After this first selection, enable "Silent on CAN Bus" checkbox as follows:
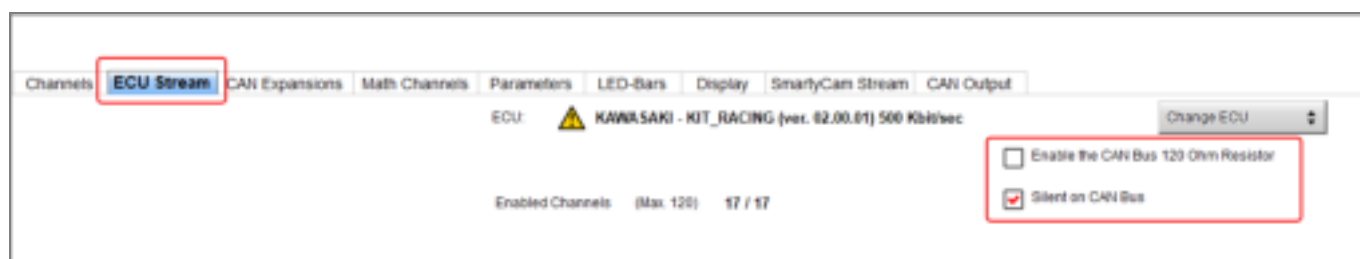
5
Kawasaki protocols

Channels received by AiM devices configured with Kawasaki protocols change according to selected protocol.

5.1
"Kawasaki – KIT_RACING" protocol

Received channels by AiM devices configured with "Kawasaki – KIT_RACING" protocol are:

CHANNEL NAME	FUNCTION
ZX RPM	RPM
ZX TPS	Throttle position sensor
ZX ECT	Water temperature
ZX IAT	Intake air temperature
ZX GEAR	Active gear
ZX CLUTCH	Clutch switch
ZX POW MODE	Engine map selection
ZX TC MODE	Traction control mode
ZX TC SELECT	Traction control level selection
ZX SPEED F	Front wheel speed
ZX SPEED R	Rear wheel speed
ZX SHIFTER	Shifter
ZX PIT ROAD	Pit lane limiter
ZX DIAG CODE 1	Diagnostic code 1
ZX DIAG CODE 2	Diagnostic code 2

| ZX DIAG CODE 3 | Diagnostic code 3 |
| ZX V BATT | Battery voltage |

Technical note: not all data channels outlined in the ECU template are validated for each manufacturer model or variant; some of the outlined channels are model and year specific, and therefore may not be applicable.

5.2
"Kawasaki – ZX10R_2016" protocol

Channels received by AiM devices configured with "Kawasaki ZX10R_2016" protocol are:

CHANNEL NAME	FUNCTION
RPM	RPM
REAR DIST	Rear wheel driven distance
ECT	Water temperature
IAT	Intake air temperature
GEAR	Active gear
CLUTCH	Clutch switch
S KRTC MOD	Traction control mode
KEBC MOD	Engine brake mode
KLCM ACT	Launch control activation
KQS UP ACT	Quick shift activation (upshift phase)
KQS DW ACT	Quick shift activation (downshift phase)
POW MODE	Power mode selection
KLCM MOD	Launch control mode
SPEED F	Front wheel speed
SPEED R	Rear wheel speed
KQS UP WK	Quick shift working level (upshift phase)
KQS DW WK	Quick shift working level (downshift phase)
S KRTC	Traction control
WHLIE CTRL L	Wheelie control level

V BATT	Battery voltage
GRIP POS	Handgrip throttle position
TPS	Throttle position sensor
SHIFTER	Shifter button
LEAN ANG	Lean angle
WHLIE ANG	Wheelie angle
S KRTC ACT	Traction control activation
S KRTC SL	Traction control level
WHLIE CTR ACT	Wheelie control activation
WHLIE CTR SL	Wheelie control level
KEBC SL	Engine brake level setting

Technical note: not all data channels outlined in the ECU template are validated for each manufacturer model or variant; some of the outlined channels are model and year specific, and therefore may not be applicable.