

AiM InfoTech

HARLEY-DAVIDSON HD MotoAmerica

Release 1.00



ECU



1 Models and years

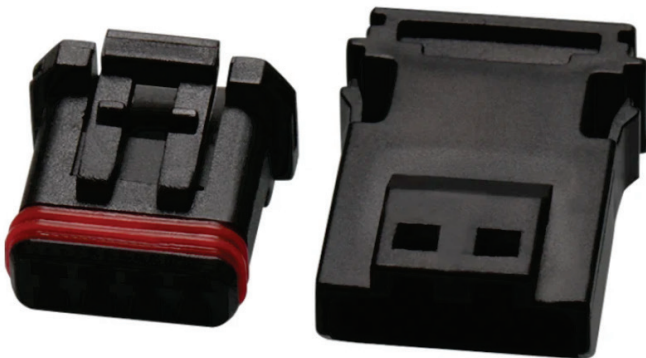
This document explains how to connect AiM devices to the vehicle Engine Control Unit (ECU) data stream.

Supported models and years are:

- Harley Davidson Road Glide Special (King of the Baggers) from 2023

2 Wiring connection

The ECU driver developed to communicate with this vehicle, is based on CANbus which is accessible through a 4ways JAE connector (MX19004P52) and the mating part is MX19004S52:



JAE Pin	Pin function	AiM cable
1	+Vb 12V	+Vb
2	GND Logger	GND
3	CAN High	CAN +
4	CAN Low	CAN -

It is strongly recommended to refer to a skilled technician to perform this kind of installation.

Before connecting the power supply, make sure with the bike manufacturer about the supported ampere the power line can deliver.

3 Race Studio configuration



Before connecting the AiM device to the CAN bus, set all functions using AiM software Race Studio. The parameters to set in the device configuration are:

- ECU manufacturer: **HARLEY-DAVIDSON**
- ECU Model: **HD MotoAmerica** (Only RS3)

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“HARLEY-DAVIDSON – HD MotoAmerica” Protocol

Channels received by AiM devices configured with "HARLEY-DAVIDSON – HD MotoAmerica" protocol are:

CHANNEL NAME	FUNCTION
Engine RPM	RPM
Gear Position	Engaged gear
Coolant Temp	Coolant temperature
Engine Temp	Engine temperature
Throttle Pos	Throttle pedal position

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