

GIpro DS-SERIES

Installation and Operation Manual

Model GPDS-HA1

For use with the following HARLEY Davidson motorcycles:

ALL models from 2002 to 2010 equipped with Delphi ignition module, excluding the VRSC family (e.g. V-Rod)

Foreword

Congratulations on your purchase of a GIpro-DS gear position indicator. The GIpro from HealTech Electronics Ltd. is the most advanced gear position indicator on the market today.

This product will fit all Harley motorcycles equipped with Delphi ignition module and on-board diagnostic (OBD) connector. This connector is referred as "Data Link" connector in the Harley manuals.

Unlike other gear indicators available for your bike, this product connects to the diagnostic connector. It makes the installation very simple. The unit reads data directly from the ECM, offering faster and more reliable readings than competitive products.

The display is auto learning, there are no buttons and no "programming wire".

Known limitation: H-D motorcycles are not equipped with Gear Position Sensor, therefore determining the gear in use is only possible when the engine is running and the clutch is released. At other times, when the clutch is pulled in or the bike is stopped, a "-" sign is shown.

Installation

Find the **GRAY, 4-pole** diagnostic connector (Data Link), usually near the ECM box. Often it has a removable rubber cap. The bike may have another similar connector for Accessories. Make sure to use the Data Link connector.

Remove the cap and connect the GIpro plug.

Route the cable to the mounting location.

Peel off the green plastic from the back of the unit, and mount the display.

Secure the cable with the cable ties supplied.

Setup

You need to set up the module after installation. It is recommended to perform the setup procedure with WARM engine.

- Raise the rear wheel off the ground by using a stand. *(If you do not have a stand, or your speedometer is driven off the front wheel, set up the unit while riding. Find a long, straight road with light traffic. The unit does not learn the same gear twice, this makes it easy to set up on the road. You can even shift down and stop during the setup if needed. Do not steer the display, watch the road and ride with extreme care as always!)*
- Turn the ignition On. The display counts backwards (“6 to 1”) indicating that the memory is clear. *(If the display counts upwards when ignition is turned on, the memory is not clear. Perform the Reset procedure if you wish to set it up again.)*
- The display flashes “L” (Learning) slowly. Start the engine in Neutral, and let it idle. The display flashes faster for a few seconds while the RPM signal is being received correctly.
- The display flashes “1” slowly. At this point, wait until the RPM drops to the normal idle speed. Select 1st gear, release the clutch and keep the engine at approx. 2-4 times of your idle speed (usually 2000-4000 RPM). The display flashes faster while the SPEED signal is being received correctly. The unit is now learning the gear position. Depending on the bike model, the learning may take from a few seconds up to a minute.
- The display shows “n” (next) for a second, then “2” flashes slowly. Select 2nd gear, release the clutch and raise RPM. Again, the display flashes faster while learning the gear position. Repeat this process until all gears have been programmed (5 or 6).
- In top gear, wait until “o” (over) is indicated and the display stops flashing. *(If your bike has 6 gears, you will need to select 6th gear when prompted, otherwise the unit will exit from programming mode in 5 seconds and you will need to repeat the setup procedure.)*

The unit is now programmed and should indicate all gears correctly.

Now, when ignition is turned on, the display counts forward (“1 to 5” or “1 to 6”) indicating that it is programmed and fully functional.

Note 1: If you have a **SpeedoHealer** (or other speedometer calibrator) and you change the calibration factor, probably you will have to reset the Gipro and perform the setup procedure again.

Note 2: The unit stores all settings in Flash memory, there is no need to set it up again if you disconnect or remove the battery.

Reset

If some gears are not indicated correctly, reset the unit and set it up again.

- Have the engine stop switch in OFF position.
- Turn the ignition key ON and immediately turn it off while the GIpro display is counting up and is showing “3, 4 or 5”. Repeat this step 5 more times.
- On the next power up, the display will count backwards (“6 to 1”). The memory is now cleared and you can perform the Setup procedure.

Troubleshooting

Make sure you connected the GIpro plug to the Data Link connector. If you are not sure, try both connectors.

Disconnect the plug and check whether the pins are broken, bent or pushed out of position. Spray some WD40 into the connectors. Reconnect the plug, and make sure that all connections are good and the connector is fully seated.

If you can not execute the Setup procedure, your battery might be weak. Charge the battery or connect another battery using a jumper cable.

If some gears are not indicated properly when the engine is running and clutch is released, reset the unit and setup again.

If the problem persists, your clutch might be slipping.

Warranty

The unit is completely sealed and epoxy encapsulated, which gives extreme protection for the internal parts from shocks, vibrations and water.

To ensure trouble-free operation from the start, all units have been extensively tested prior to shipment.

Our dealers are offering a 30-day money-back guarantee on HealTech products, thus you will get your money back if the product does not fulfill your expectations. *(All parts must be returned in original condition for full refund.)*

Furthermore the product is covered by our 2-year replacement warranty from the date of purchase.

Web: [**www.gi-pro.net**](http://www.gi-pro.net)

Email: support@healtech-electronics.com