

GS-5.0KIT 12/24V Installation Instructions

- (1) Housing Assembly GS-HSG5.0
- (1) Display Kit GS-DSPLYKIT
- (1) Wiring Conn Kit GS-CONNKIT
- (1) ShockerEDGE Controller GS-CNTRL-1.0 or 2.0
- (2) Silicone Hose HS-5.0X3.0L
- (4) Hose Clamp CLP-082
- (1) Sensor Verification Spray GS-SVS



1.844.304.7277 www.headwindsolutions.ca

Sensor Housing Location

- Single Air Cleaner
 - Choose a location as close as possible to the air cleaner housing discharge nipple
- Dual Air Cleaners
 - Choose a location after the WYE pipe, as far away from the turbo inlet as possible
- Multiple air cleaners
 - Follow the steps for a single air cleaner

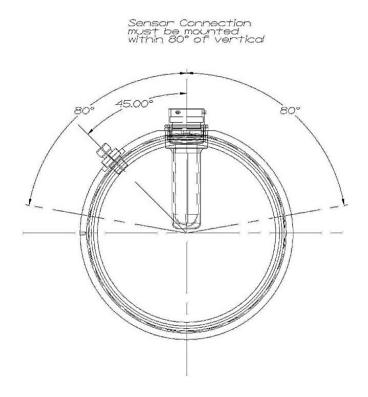
Air Filter Type

- Paper or washable media permissible
- Oil bath Not permissible
- Oiled media Not permissible

Sensor Housing Installation

- Pipe/tube
 - Cut 3.5" from O.E.M. pipe/tube to accommodate the ShockerEdge sensor housing. Ensure there is a minimum of 1.25" straight pipe/tube on either side of the cut for proper clamping.
 - Install ShockerEdge sensor housing with the supplied hoses and clamps. Tighten clamps to torque spec (see chart).
 - Ensure the arrow on the sensor housing is pointed in the direction with air flow.
- Rubber Hose
 - Cut 1.25" from the O.E.M. hose, while ensuring you have 1.25" of straight hose on either side of the cut to allow for proper clamping
 - Install the sensor housing with the provided clamps and tighten to torque spec (see chart).
 - Ensure the arrow on the sensor housing is pointed in the direction with air flow.

The ShockerEdge housing must be installed within 80 degrees of vertical, 0-45 degrees is optimal orientation (see diagram).

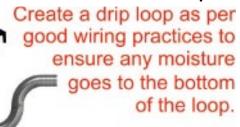


Crankcase ventilation lines (or EGR line) must be located downstream of the sensor housing. <u>AS FAR AWAY AS POSSIBLE</u>

Mounting the ShockerEdge Controller

Mount the Control Unit on the firewall of the engine compartment away from moving parts and heat sources so that it is accessible for testing. Do not tighten the screws until installation is complete.

ATTENTION
Always mount box in upright position as pictured.



- The controller can be mounted inside the engine bay or operator compartment. Extension cables are available from Headwind Solutions.
- Secure the controller in an upright position with provided mounting slots. Do not leave loose or zip tied to other wiring or components.

We recommend mounting your ShockerEDGE controller in the engine compartment, and the ShockerEDGE provided display on the left-hand side of the dash, so it is easily accessible/visible from both the operator's seat and the ground.

Edge Wiring Procedure

With all components mounted, begin the wiring process as follows.

- 1. DISSCONNECT BATTERIES
- 2. Route wiring harness in a safe path to all components leaving the 12 pin Molex connector disconnected from the controller.
- 3. Connect Molex 12 pin connector on harness to the ShockerEDGE controller.
- 4. Connect yellow 5 pin cable to the yellow GS-CON-90 sensor cable on the sensor housing.
- 5. Connect the 3-pin male yellow cable from the main ShockerEDGE harness to the female connector on the ShockerEDGE display.
- 6. Connect the 3 pin GS-CBL-2M-3W-F female cable to the male connector on the ShockerEDGE display. Route this cable to the equipment/truck fuse panel and cut off the excess.
- 7. Using the add-a-circuit fuse tap supplied, connect the brown wire in the 3-wire yellow cable using the supplied red heat

- shrink/crimp butt connector to the add-a-circuit fuse tap lead. (blue wire is not used, cap off with heat shrink tubing) Locate a 5 to 20 amp key on/off circuit*, remove the OEM fuse, and install the OEM fuse in the bottom slot (closest to the pins) on the fuse tap. Install the supplied 5-amp fuse in the top slot of the fuse tap. Install the fuse tap into the OEM fuse panel slot.
- 8. Using the supplied Fused circuit disconnect adaptor, connect the #7 wire (red/wht) to the fused lead of the adaptor & the non-fused lead to the #1 wire (bk/wht) using the supplied blue heat shrink/crimp butt connectors.
- 9. Locate the ECM main power or fuel shutoff solenoid circuit fuse in the panel. * Remove the fuse from the panel, install that fuse into the slot into the adaptor, install the adaptor into the slot in the OEM fuse panel.
- 10. Connect the 12 awg red wire using the supplied fuse holder with 5-amp fuse and the supplied blue heat shrink/crimp butt connectors, to the positive battery post using the supplied yellow heat shrink/crimp ring connector.
- 11. Connect the 12 awg black #12 wire from the yellow cable in step 6 to the negative post of the battery using the supplied yellow heat shrink/crimp connector.
- 12. Optional- Connect white wire #5 to the terminal on a ShockerPASS internally switched Positive Air Shutoff valve. Can also be used to drive a warning light/strobe or a horn. When using this circuit with a ShockerPASS valve, change the main fuse (step #10) to a 10-amp fuse on a 24-volt valve and 10 amp fuse on a 12 volt valve.
- 13. Reconnect the Battery.

- 14. Option 1.0 Controller- Connect green wire #11 to the ground activation terminal of a ShockerPASS RPM controlled Positive Air Shutoff system. This is a ground activation circuit and can be used in conjunction with a relay to activate a positive circuit.

 *Refer to the OEM owners/service manual for circuit/fuse location.
- 15.Option 2.0 Controller-Pull the green wire to ground for remote activation. IE) ESD/Slam button
- 16.Connect the 12 pin Molex connector to the ShockerEDGE controller and watch LED sequencing. See owner's manual for proper operation. WARNING: EDGE SYSTEM STARTUP IS APPROXIMATELY 2-3 MINUTES

After installation is complete, be sure to complete an EDGE controller test and SVT text to ensure the system is working properly.

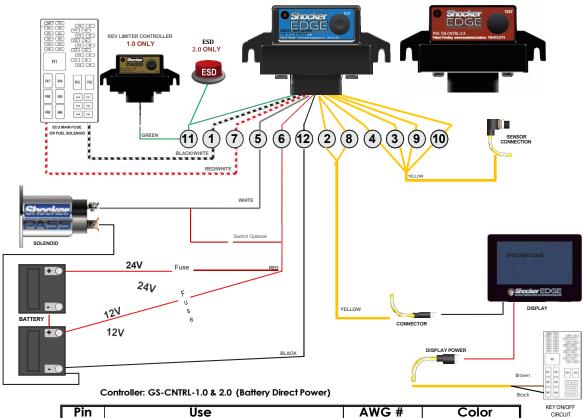


- TEST CONTROLLER WEEKLY
- SVT COMPLETED A MINIMUM ONCE EVERY 90 DAYS
- INSPECT HOSES & WIRES
- CHECK CLAMP TIGHTENESS

(Torque clamps to: 9Nm - 6.6 ft./lbs. - 79.6 in./lbs.)

Go to www.headwindsolutions.ca for Owners Manual instructions

Wiring Diagram G5-CNTRL-1.0(blue label) or 2.0(copper label)



Pin	Use	AWG #	Color
1	Engine Shutdown NC (common)	12	Black/White
2	Display CAT Cable		Yellow
3	Rx Sensor CAT Cable		Yellow
4	Tx Sensor CAT Cable		Yellow
5	Hold Output	12	White
6	Battery Positive	12	Red
7	Engine Shutdown NC	12	Red/White
8	Display CAT Cable		Yellow
9	Sensor Ground CAT Cable		Yellow
10	Sensor Power CAT Cable		Yellow
11	Optional 1.0 & 2.0 Controller	16	Green
12	Battery Negative	12	Black

Display: GS-DSPLY (Key On/Off Power

Power	Brown
Ground	Black
Not Used	Blue

IMPROPER GROUNDING OR REMOVAL OF CONNECTORS CAN CAUSE DAMAGE TO COMPONENTS, VOIDING WARRANTY

Headwind Solutions warrants the components of this device for a period of one (1) year from the date of purchase. The customer is responsible for the correct installation, setup and testing of the product, including: a) the location of all components; b) correct wiring connections and wire gauge; c) correct setup and testing of the installed product. This warranty is void if the product is incorrectly installed, set up or tested.

THANK YOU FOR CHOOSING



Manufactured in North America.

Check our website for

troubleshooting videos and tips.

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