

# WHELEN<sup>®</sup>

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## Installation Guide: Inner Edge<sup>®</sup> Idaho Rear Deck Interior Lightbar (2006-2010 Dodge Charger)

### Safety First

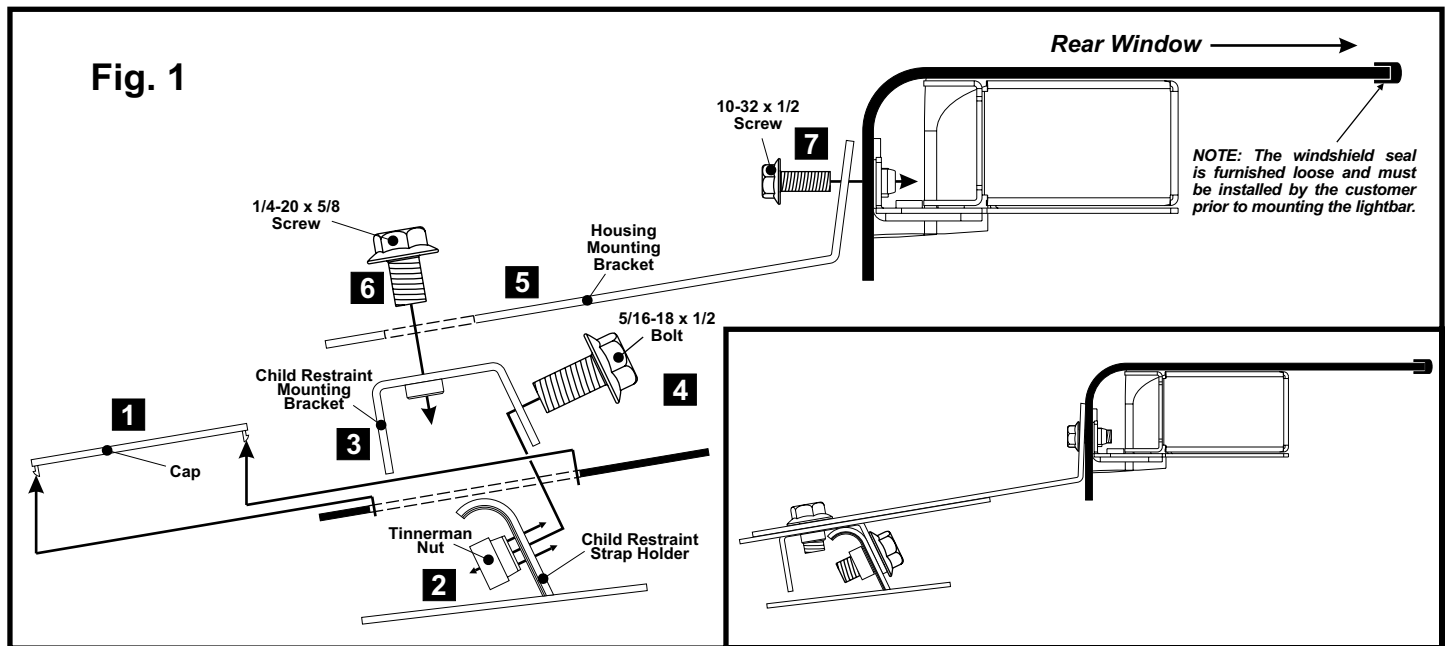
This document provides all the necessary information to allow your Whelen product to be properly and safely installed. Before beginning the installation and/or operation of your new product, the installation technician and operator must read this manual completely. Important information is contained herein that could prevent serious injury or damage.

- **Proper installation of this product requires the installer to have a good understanding of automotive electronics, systems and procedures.**
- **If mounting this product requires drilling holes, the installer MUST be sure that no vehicle components or other vital parts could be damaged by the drilling process. Check both sides of the mounting surface before drilling begins. Also de-burr any holes and remove any metal shards or remnants. Install grommets into all wire passage holes.**
- **If this manual states that this product may be mounted with suction cups, magnets, tape or Velcro<sup>®</sup>, clean the mounting surface with a 50/50 mix of isopropyl alcohol and water and dry thoroughly.**
- **Do not install this product or route any wires in the deployment area of your air bag. Equipment mounted or located in the air bag deployment area will damage or reduce the effectiveness of the air bag, or become a projectile that could cause serious personal injury or death. Refer to your vehicle owner's manual for the air bag deployment area. The User/Installer assumes full responsibility to determine proper mounting location, based on providing ultimate safety to all passengers inside the vehicle.**
- **For this product to operate at optimum efficiency, a good electrical connection to chassis ground must be made. The recommended procedure requires the product ground wire to be connected directly to the NEGATIVE (-) battery post.**
- **If this product uses a remote device to activate or control this product, make sure that this control is located in an area that allows both the vehicle and the control to be operated safely in any driving condition.**
- **Do not attempt to activate or control this device in a hazardous driving situation.**
- **This product contains either strobe light(s), halogen light(s), high-intensity LEDs or a combination of these lights. Do not stare directly into these lights. Momentary blindness and/or eye damage could result.**
- **Use only soap and water to clean the outer lens. Use of other chemicals could result in premature lens cracking (crazing) and discoloration. Lens in this condition have significantly reduced effectiveness and should be replaced immediately. Inspect and operate this product regularly to confirm its proper operation and mounting condition. Do not use a pressure washer to clean this product.**
- **It is recommended that these instructions be stored in a safe place and referred to when performing maintenance and/or reinstallation of this product.**
- **FAILURE TO FOLLOW THESE SAFETY PRECAUTIONS AND INSTRUCTIONS COULD RESULT IN DAMAGE TO THE PRODUCT OR VEHICLE AND/OR SERIOUS INJURY TO YOU AND YOUR PASSENGERS!**

**For warranty information regarding this product, visit [www.whelen.com/warranty](http://www.whelen.com/warranty)**

**IMPORTANT!** It is the responsibility of the installation technician to make sure that the installation and operation of this product will not interfere with or compromise the operation or efficiency of any vehicle equipment!

**IMPORTANT AIR BAG WARNING!** Do not install this product or route any wires in the air bag deployment zone of your vehicle. Equipment mounted or located in air bag deployment zones will damage or reduce the effectiveness of the air bag, or become a projectile that could cause serious personal injury or death. Refer to your vehicle owners manual to learn the air bag deployment zones for the vehicle. The User/Installer assumes full responsibility to determine proper mounting location, based on providing ultimate safety to all passengers inside the vehicle.



**Installation:**

**IMPORTANT! The lightbar should be located a minimum of 16" from any radio antennas!**

1. On the rear deck, locate the driver-side outboard cap covering the child restraint strap holder. Remove this cover to access the tether strap holder (Fig. 1).
2. Insert the Tinnerman nut into the strap holder as shown in Fig. 1. Note that pliers may be needed to squeeze the Tinnerman nut mounting flange, allowing it to pass through the opening in the strap holder.
3. Locate one of the two child restraint mounting brackets included with the mounting kit.
4. Secure one child restraint mounting bracket onto the strap holder using the hardware shown. Tighten the hardware firmly.
5. Position the housing mounting bracket onto the child restraint bracket so that the adjustment slot is aligned with the Tinnerman nut on the top of the child restraint mounting bracket.
6. Using the hardware included, secure the housing mounting bracket to the child restraint mounting bracket. Do not tighten this hardware yet. *Repeat steps 1 thru 6 with the Passenger-side Child Restraint holder.*
7. Position the lightbar onto the rear deck and secure it to the mounting brackets using the hardware shown. Do not tighten this hardware yet.

Make sure that the rubber windshield seal on the lightbar housing fully engages the rear windshield by holding the lightbar housing firmly against the glass while tightening the hardware, securing the lightbar to the mounting bracket.

While still maintaining pressure on the lightbar, tighten the hardware used to secure lightbar mounting bracket to the child restraint mounting bracket.

The lightbar should maintain the seal against the windshield when the pressure is released. If not, loosen the appropriate hardware and repeat this tightening procedure until properly mounted.

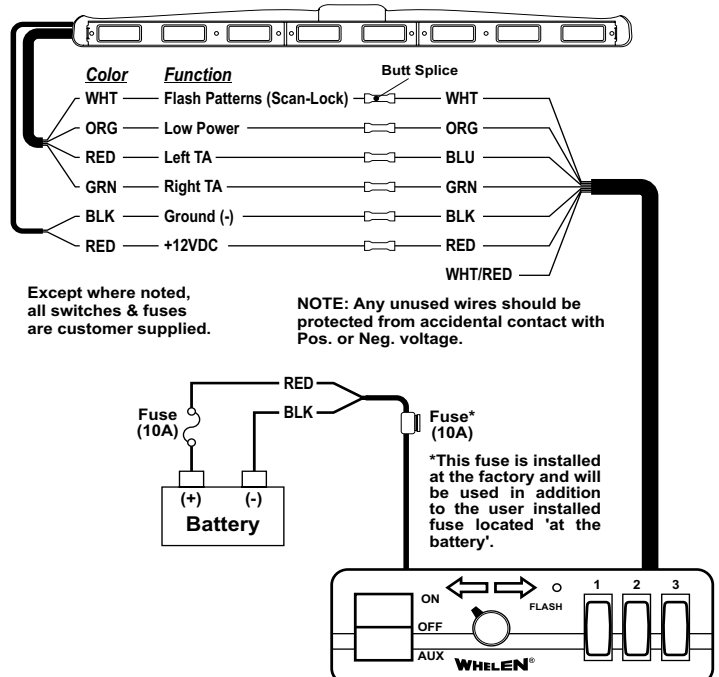
8. Route the input cable to your control head (refer to the installation manual included with your control head for mounting and wiring information).

**IMPORTANT!** When routing the lightbar cable, it is left to the installation technician's discretion to select a path for these cables that will both protect the cables from possible damage and not interfere with the operation of any other vehicle components or equipment. Refer to the instructions included with your switches for switch wiring information.

**Wiring:**

**WARNING! All customer supplied wires that connect to the positive terminal of the battery must be sized to supply at least 125% of the maximum operating current and FUSED at the battery to carry that load. DO NOT USE CIRCUIT BREAKERS WITH THIS PRODUCT!**

**Wiring Diagram**



**Operation:**

**Power Cable:**

**RED (Activates lightbar in Flash Mode)** - This wire will activate the lightbar with *all lights flashing*.

**Control Cable:**

**RED** - With Flash mode activated (RED wire) this wire will cause the lightbar to *Sweep Left* for 4 cycles then switch to *All Lights Flashing* for 2 cycles then returns to *Sweep Left*.

**GREEN** - With Flash mode activated (RED wire) this wire will cause the lightbar to *Sweep Right* for 4 cycles then switch to *All Lights Flashing* for 2 cycles then returns to *Sweep Right*.

**ORANGE (Low Power)** - The type of switch used is dependant on how the operator wishes the Hi/Low feature to function:

**Option 1: Latching Mode:** By applying +voltage to the ORANGE wire for less than 1 sec., the power supply is "latched" into low power operation. The unit must be turned off and then back on to restore normal, Hi power operation. A momentary switch is best for this method.

**Option 2: Level Mode:** Applying +voltage to the ORANGE wire for more than 1 sec. holds the power supply in low power mode until that voltage is removed. A toggle switch is best for this method

**WHITE (Scan-Lock™)** - To use Scan-Lock you must first Activate the function you wish to change.

**TO CYCLE THROUGH ALL PATTERNS:** To cycle forward apply +12 volts to the WHITE wire for less than 1 second and release. To cycle backward apply +12 volts to the WHITE wire for more than 1 second and release.

**TO SET A PATTERN AS DEFAULT:** When the desired pattern is displayed, allow it to run for more than 5 seconds. The lightbar will now display this pattern when active.

**TO RESET TO THE FACTORY DEFAULT PATTERN:** Turn off power, apply +12 volts to the WHITE wire, then turn power on.

A Normally Open Momentary Switch is best suited for this circuit.

**Flash Patterns:**

- |                         |                          |                     |
|-------------------------|--------------------------|---------------------|
| 1. SignalAlert™ PH-1    | 19. SingleFlash 90 PH-1  | 38. FlimFlam PH-2   |
| 2. SignalAlert™ PH-2    | 20. SingleFlash 90 PH-2  | 39. FlimFlam PH-3   |
| 3. SignalAlert™ PH-3    | 21. SingleFlash 90 PH-3  | 40. ModuFlash™ PH-1 |
| 4. CometFlash® PH-1     | 22. SingleFlash 120 PH-1 | 41. ModuFlash™ PH-2 |
| 5. CometFlash® PH-2     | 23. SingleFlash 120 PH-2 | 42. ModuFlash™ PH-3 |
| 6. CometFlash® PH-3     | 24. SingleFlash 120 PH-3 |                     |
| 7. DoubleFlash 75 PH-1  | 25. SingleFlash 240 PH-1 |                     |
| 8. DoubleFlash 75 PH-2  | 26. SingleFlash 240 PH-2 |                     |
| 9. DoubleFlash 75 PH-3  | 27. SingleFlash 240 PH-3 |                     |
| 10. SingleFlash 75 PH-1 | 28. MicroBurst™ PH-1     |                     |
| 11. SingleFlash 75 PH-2 | 29. MicroBurst™ PH-2     |                     |
| 12. SingleFlash 75 PH-3 | 30. MicroBurst™ PH-3     |                     |
| 13. LongBurst™ PH-1     | 31. ActionFlash™ PH-1    |                     |
| 14. LongBurst™ PH-2     | 32. ActionFlash™ PH-2    |                     |
| 15. LongBurst™ PH-3     | 33. ActionFlash™ PH-3    |                     |
| 16. SingleFlash 60 PH-1 | 34. PingPong™ PH-1       |                     |
| 17. SingleFlash 60 PH-2 | 35. PingPong™ PH-2       |                     |
| 18. SingleFlash 60 PH-3 | 36. PingPong™ PH-3       |                     |
|                         | 37. FlimFlam PH-1        |                     |

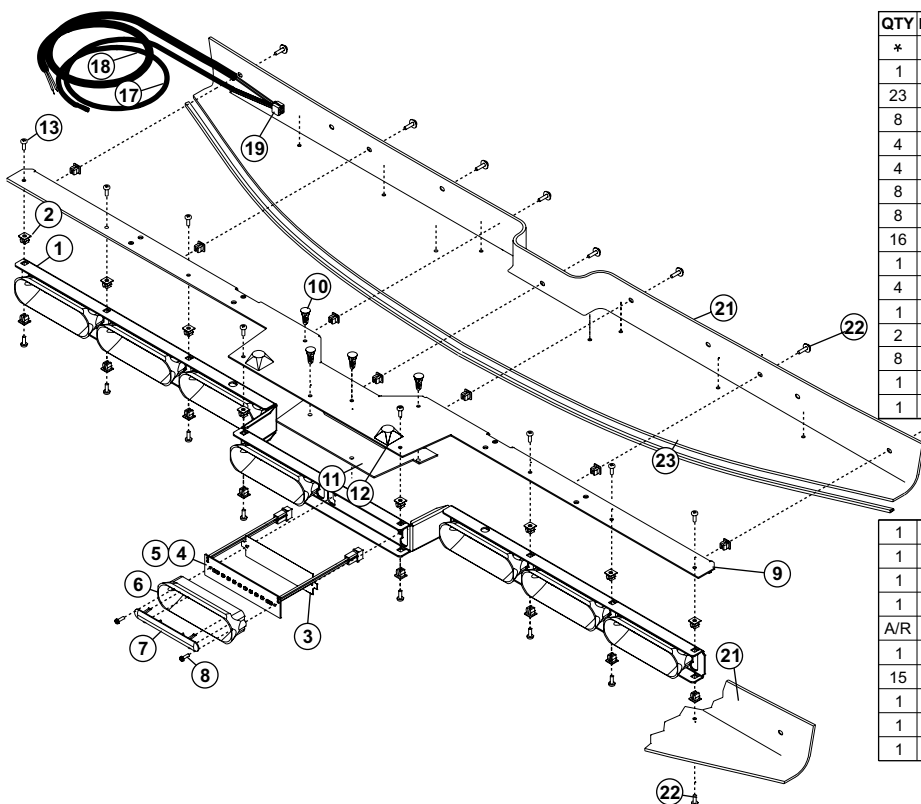
**TA Patterns:**

- Sequence to Solid
- Seq. On - Seq. Off
- 3 Light TripleFlash
- 2 Light TripleFlash
- 1 Light TripleFlash

**PH1** = Left and Right flash simultaneously  
**PH2** = In and Out  
**PH3** = Checkerboard Pattern

**IMPORTANT WARNING!**  
**CAUTION! DO NOT LOOK DIRECTLY AT THESE LED'S WHILE THEY ARE ON. MOMENTARY BLINDNESS AND/OR EYE DAMAGE COULD RESULT!**

**IMPORTANT!** Before returning the vehicle to active service, visually confirm the proper operation of this product, as well as all vehicle components/equipment.



QTY	ITEM	PART NUMBER	DESCRIPTION
*		01-0686800-00	CHARGER REAR DECK LIGHT, IDAHO
1	1	07-286761-023	BRCKT, JUSTICE INNER-EDGE CHARGER BLK
23	2	13-062C40-16J	SCREW GROMMET, #6/#8 FASTEX
8	3	56-043457-000	THRML PAD, CO-THRM ECON 3 LED PCB JUST. SER.
4	4	02-016C793-A2	JUSTICE LIN6/6 PCA/BLU REBEL
4	5	02-016C793-A5	JUSTICE LIN6/6 PCA/RED REBEL
8	6	68-5984872-01	REFLECTOR, LIN-6 LED CREE JUST. SERIES MTLZD
8	7	68-1943522-30	LENS, CLR OPTIC COLLMATR LIN-6 CREE JUSTICE
16	8	14-040285-063	SCREW, 4-40 X 3/8 TORX PH TRLBULR 410 SS, BLK
1	9	07-784399-023	PLATE, MTG 8 LINEAR LED T/A BLK INNER-EDGE
4	10	20-0017569-00	SPACER, 188"L X .250"D NYLNL SUPPRT POST, BLK
1	11	02-016C910-00	FLASHER, CHARGER REAR DECK, IDAHO
2	12	08-0616092-00	RUBBER BUMPER .52 X .81
8	13	15-06521B-060	SCREW, 6 X 3/8 PPH PLASTI-LOK SS BLACK OXIDE
1	14	46-076C986-00	HARNESS, INNER EDGE DUO TA, IDAHO, "J1"
1	15	46-076C986-01	HARNESS, INNER EDGE DUO TA, IDAHO, "J2"

1	16	46-076C986-02	HARNESS, INNER EDGE DUO TA, IDAHO, "J5"
1	17	46-0744089-20	POWER CABLE, CHARGER REAR DECK, IDAHO
1	18	46-0744091-20	CONTROL CABLE, CHARGER REAR DECK, IDAHO
1	19	39-0406323-04	HOUSNG, 6 POS PIN MOTOR MT COMM MATE-N-LOK
A/R	20	26-0215001-03	TY WRAP, 3" BLACK
1	21	11-484482-000	HOUSING, LOWR RR INNER-EDGE '06 CHARGER
15	22	15-M23B1C-120	SCREW, M4.2 X 12mm PHIL TRUSS TAP, STEEL, BLK
1	23	38-0543284-45	SEAL, EXTRUD. HSG/WNDSHLD IN.-EDGE SER. 45.00"
1	24	10-0523680-00	LABEL, CHARGER REAR DECK LIGHT, IDAHO
1	25	01-0484503-00	KIT, MTG '06 CHARGER REAR DECK INNER-EDGE