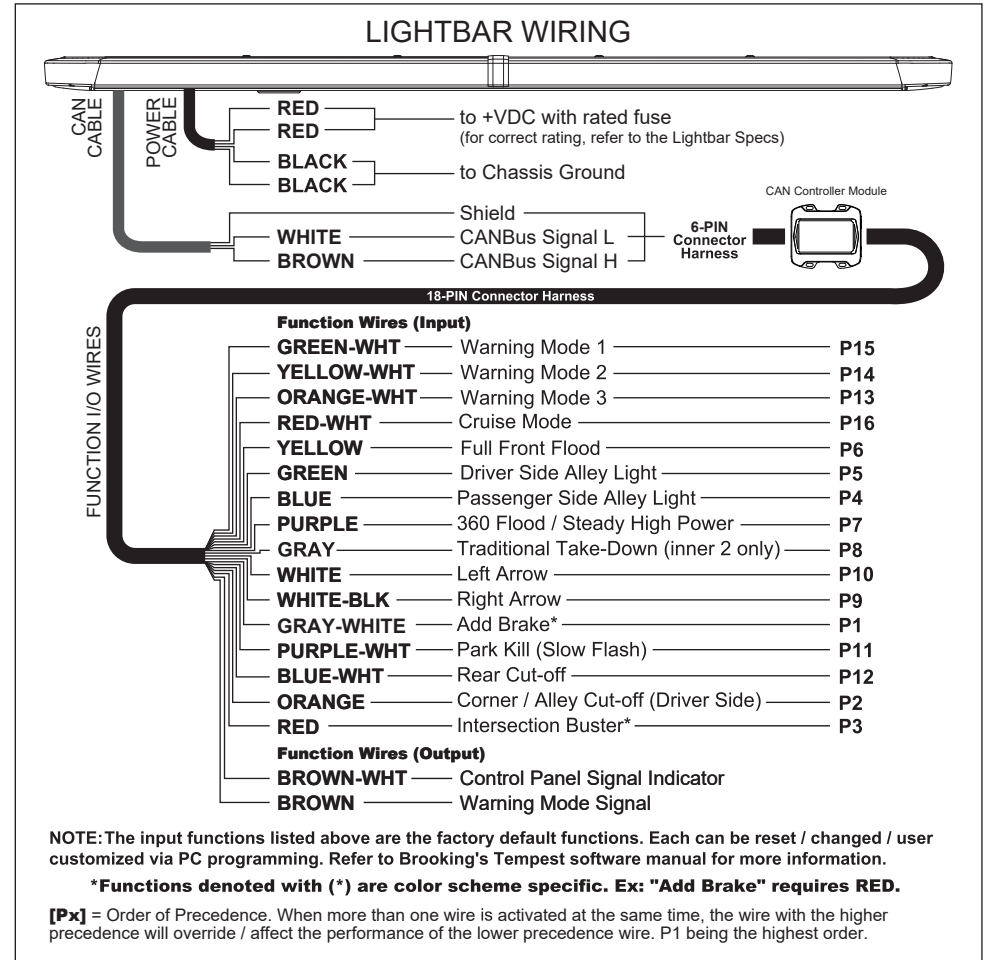


WIRING & FUNCTIONS (CU Single / Dual / Tri Color - SAE)

Proper installation of this product requires the installer to have a good understanding of automotive electronics, systems and procedures. Different applications may require different functions. For optimum efficiency, it is highly recommended to determine, configure and test the required functions prior to installation.



⚠ WARNING

- DO NOT USE THE HEAVY GAUGE POWER WIRE(S) AS THE LIGHTBAR ACTIVATION SWITCH. USE ONLY THE FUNCTION WIRE(S) TO SWITCH AND ACTIVATE. HEAVY GAUGE RED & BLACK ARE TO BE CONNECTED TO VEHICLE BATTERY.
- ENSURE THE POWER WIRE(S) ARE PROPERLY CONNECTED BEFORE ACTIVATING ANY FUNCTION WIRE(S).
- FAULTY CONNECTIONS MAY CAUSE THE LIGHTBAR TO MALFUNCTION AND / OR RESET TO ITS DEFAULT SETTINGS.
- DO NOT USE A HIGH PRESSURE POWER WASHER TO CLEAN YOUR LIGHTBAR; THIS MAY DAMAGE YOUR LIGHTBAR AND VOID ITS WARRANTY.

== POWER CABLE =====

1. Route power cables to the vehicle firewall towards the battery, preferably using a factory pass-through. If drilling a hole is required, please ensure there are no factory components in the area to be drilled.
2. Splice 2 **RED** wires to form a single wire then install a fuse (user-supplied) to the end of the **RED** wire, before connecting it to the battery. (for correct fuse rating, refer to the Lightbar Specs.)
3. Splice 2 **BLACK** wires to form a single wire then connect the **BLACK** wire to the vehicle chassis-ground next to the battery.

NOTE: Ensure that all wires of the power cable are firmly connected to the power source.

== CAN CABLE =====

1. Route CAN Cable towards the CAN Controller Module.
2. Connect 2 CANBus signal and Shield wires to respective counterparts on the 6-pin connector harness of the CAN Controller Module. (Refer to CAN Controller Module Installation and Operation Manual)

== FUNCTION WIRES (Input) =====

Connect each individual function wire to the preferred controller input.

WARNING MODE 3 (Code 3 / Pursuit Mode)

Activate *Warning Mode 3* by applying +VDC to **ORANGE-WHT** wire.

NOTE: If lightbar is equipped with dual / tri-color lighthoods, both alley lights, along with all front facing inboards & corners, will alternate between the primary warning color(s) and secondary color (white in most cases).

WARNING MODE 2 (Medium Priority)

Activate *Warning Mode 2* by applying +VDC to **YELLOW-WHT** wire.

WARNING MODE 1 (Low Priority)

Activate *Warning Mode 3* by applying +VDC to **GREEN-WHT** wire.

CRUISE MODE

Activate *Cruise Mode* by applying +VDC to **RED-WHT** wire.

FULL FRONT FLOOD

Activate *Full Front Flood* by applying +VDC to the **YELLOW** wire. All front facing inboards, passenger side front corner & alley light will illuminate in high-power steady burn.

NOTE: If the lightbar is equipped with dual or tri-color warning lighthoods, color 2 or color 3 will be displayed respectively.

360 DEGREE FLOOD

Activate by applying +VDC to **PURPLE** wire. All lighthoods, inboards and corners will illuminate in high-power steady-burn.

ALLEY LIGHTS

Activate steady-burn *Alley Lights* by applying +VDC to:

- **GREEN:** Driver Side
- **BLUE:** Passenger Side

TRADITIONAL TAKE-DOWN

Activate by applying +VDC to **GRAY** wire. Inner most driver side and passenger side lighthoods will illuminate in color 2 or color 3 depending on color scheme.

REAR CUT-OFF

Deactivate rear facing warning lighthoods in each respective area by applying:

- +VDC to **BLUE-WHT** wire for *Rear Cut-off*.

TRAFFIC ARROW

Activate rear *Traffic Arrow* function by applying +VDC to:

- **WHITE** wire for *Left Arrow*
- **WHITE-BLK** wire for *Right Arrow*
- Above 2 wires together for *Center-Out*

INTERSECTION BUSTER (HORN RING ACTIVATED)

Activate by applying +VDC to **RED** wire. When activated, the entire lightbar will flash rapidly in color 2 or color 3 respectively, breaking the monotony of typical flashing warning colors.

PARK KILL (SLOW FLASH)

Activate by applying +VDC to **PURPLE-WHITE** wire. Splice wire with park / neutral circuit. Once vehicle is put in park, lightbar reverts to slow single flash (rear only)

DRIVER SIDE CORNER / ALLEY CUT-OFF

Activate by applying +VDC to **ORANGE** wire. When driver's side door is opened, driver's side front facing corner and alley light will be disabled.

ADD BRAKE

Activate *Add Brake* by applying +VDC to **GRAY-WHITE** wire. Two rear facing inboards will illuminate in RED when vehicle brakes are in use. (some color schemes will not perform this function in red)

NOTE: Consult vehicle user manual before cutting / splicing into any factory wires. Ideally the vehicle is equipped with an installer friendly, factory upfitter harness.

== FUNCTION WIRES (Output) =====

Connect each individual function wire to the preferred controller input.

CONTROL PANEL SIGNAL INDICATOR (REAR LIGHTHEADS)

Connect **BROWN-WHT** wire to the display signal input of a compatible Control Panel to display current rear lighthood activity.

WARNING MODE SIGNAL

Connect **BROWN** wire to any auxiliary equipment that turns on with a warning mode. (e.g. Activating Dash Cam); A 250mA signal is output whenever **GREEN-WHT**, **YELLOW-WHT** and / or **ORANGE-WHT** wire is activated.

== AUTO-DIMMING LIGHT SENSOR =====

If the lightbar is equipped with an Auto-Dimming Light Sensor, *Low Power Operation* will automatically activate when the ambient brightness is below the set-value (e.g. night time) and deactivate once prior condition changes / reverts back. The Auto-Dimming Light Sensor takes precedence over all other function wires.

== PC PROGRAMMING =====

All function wires can be customized and re-programmed to user's preference via PC programming.

- Light Sensor dimming values
- Full Lightbar Patterns
- Lighthood / Lightbar flash rates
- Lighthood flash groups / phases
- Lighthood flash patterns
- Lighthood color settings
- Low power %
- Traffic arrow patterns
- Output signal
- Wire precedence (priority)
- etc.

For more information about PC programming and Software, please refer to Software Manual or contact your sales representative.