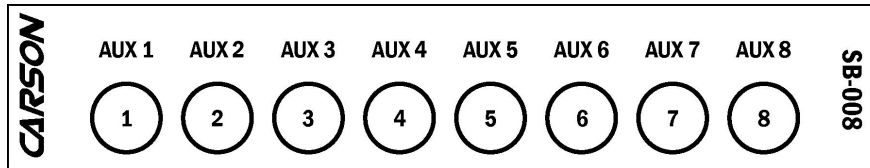


CARSON

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SB-008-10 SWITCH CONTROL BOX INSTALLATION AND OPERATING INSTRUCTIONS



SPECIFICATIONS

Input Voltage	10 - 16 VDC (negative ground)
Input Current	160 AMPS Max. (80 AMPS for Switch 1 – 4; 80 AMPS for switch 5 – 8)
Output Current	20 AMPS each, each output protected with internal fuse. Option to combine Output 1 and 2 for 40 AMP total output on switch 1 or 2.
Operating Temperature	-15° F to +140°F
Controls	(8) ON/OFF push-button switches with backlit changeable legends. Legend changes color when activated. Internal option switch combines switch 1 and 2. When switch 1 or 2 is pressed, both outputs 1 and 2 activate. Internal option switch changes switch 8 to momentary. Output 8 is activated for 10 seconds nominal.
Connections	(2) Positive #6AWG Wire Power Input, (2) Four Position Harness #10AWG Wire Output (1) Positive and Negative Plug #22AWG Wire to power internal electronics and backlight.
Size	6-1/8" Wide, 1-3/8" High, 6-1/2" Deep
Weight	2 –1/2 LBS.

NOTICE

Due to continuous product improvements, we must reserve the right to change any specifications and information, contained in this manual at any time without notice.

Carson Manufacturing Co., Inc. makes no warranty of any kind with regard to this manual, including, but not limited to, the implied warranties of merchantability and fitness for a particular purpose.

Carson Manufacturing Co., Inc. shall not be liable for errors contained herein or for incidental or consequential damages in connection with the furnishing, performance, or use of this manual.

LIMITED WARRANTY

Carson Manufacturing Company, Inc. warrants this new product to be free from defects in material and workmanship, under normal use and service, for a period of five (5) years from the date of delivery to the first user-purchaser.

During this warranty period the obligation of Carson Manufacturing is limited to repairing or replacing, as Carson Manufacturing may elect, any part or parts of such product which after examination by Carson Manufacturing is determined to be defective in material and/or workmanship. This warranty does not cover labor charges for removal or re-installation of the product. Fuses and lamps are not covered under this warranty. This warranty does not extend to any unit that has been subjected to abuse, misuse, improper installation or which has not been adequately maintained, nor to units which have problems related to service or modification at any facility other than the manufacturer.

THERE ARE NO OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING BUT NOT LIMITED TO, ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL CARSON MANUFACTURING COMPANY, INC. BE LIABLE FOR ANY LOSS OF PROFITS OR ANY INDIRECT OR CONSEQUENTIAL DAMAGES ARISING OUT OF ANY SUCH DEFECT IN MATERIALS OR WORKMANSHIP.

RETURN

If you have any questions concerning this or any other Carson product, please contact our **Technical Service Department** at (888) 577-6877. Many issues can be handled over the phone. We can also be reached via e-mail at service@carsonsirens.com

If a product must be returned for any reason, please contact our Technical Service Department to obtain a Returned Merchandise Authorization number (RMA#) before you ship the product to Carson. Please write the RMA# clearly on the package near the mailing label. Be sure to provide a return address, contact and phone number, along with a brief description of the problem.

OPERATION

Each pushbutton switch on the face of the unit controls a corresponding output on the back. The pushbutton switch is push on/push off operation. When pushed on, the legend above the switch will light red and +VDC is supplied to corresponding output. The units backlighting may be connected to vehicles accessory panel. See OPTION SWITCHES below for further operational enhancements.

If the internal fuse ruptures the output will automatically de-activate. If a button is pressed and released but the red light will not stay on then the fuse is blown and must be replaced.

INSTALLATION

Proper installation of the unit is essential for years of safe, reliable operation. Please read all instruction **before** installing the unit. Failure to follow these instructions can cause serious damage to the unit or vehicle and may void warranties.

SAFETY PRECAUTIONS

For the safety of the installer, vehicle operator, passengers and the community please observe the following safety precautions.

Failure to follow all safety precautions and instructions may result in property damage, injury or death.

Qualifications - The installer must have a firm knowledge of basic electricity, vehicle electrical systems, and emergency equipment.

Mounting - Mount the control box for easy access by the vehicle operator. DO NOT mount in air bag deployment area. Assure clearances before drilling in vehicle. To prevent internal damage to the unit, mounting bolts must not enter case more than 1/4".

Wiring - Use wiring capable of handling the current required. Make sure all connections are tight. Route wiring to prevent wear, overheating and interference with air bag deployment. Install and check all wiring before connection to vehicle battery.

Testing - Test all functions after installation to assure proper operation.

UNPACKING

Inspect contents for shipping damage. If found **alert carrier immediately**. Contents should include switch control box, mounting bracket and 2 bolts, two power input cables, two power output cables, backlight and grounding cable, sheet of legends, and these instructions. Contact supplier immediately if any components are missing.

OPTION SWITCHES

Remove cover (single screw on back) to gain access to option switches inside the unit.

Combo option switch (behind switch 1) combines output 1 and 2 to be activated by switch 1 or 2.

Momentary option switch (behind switch 8) sets switch 8 for momentary operation. Output 8 will activate for 10 seconds then de-activate.

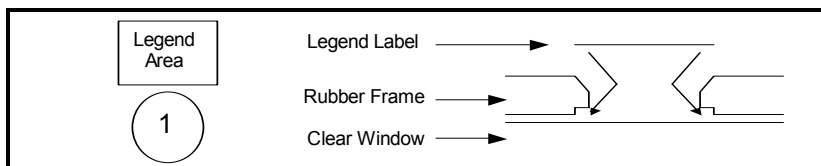
LEGENDS

Multiple legends are supplied on a single sheet. Legends may be selected to match the device controlled.

Select the legend and place centered over the legend area. Press down on the legend to stick over clear window and tuck under rubber framing. Gently lift up on the sides of rubber framing to help cover the edges of the legend.

To remove a legend, use a thin edge to gently push rubber frame aside and pry between legend and clear window. Try not to puncture clear window. The stick-on adhesive is strong.

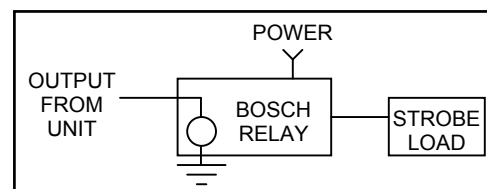
Blank (black) legends are provided for switches with no function. The white background legends may be written on with permanent marker to create custom legends.



LOAD LIMITATION (STROBES)

Loads such as strobes that have a high inrush current require a secondary relay. This is because the high inrush current may exceed the output rating causing the units internal relay contacts to weld together and get stuck on.

A 40A BOSCH SPST relay is recommended for the secondary relay.



WIRING

Refer to the following diagram for electrical hookup.

