

MR6F LED Windshield Lights

INSTALLATION INSTRUCTION



MR6F-X/X-WL

TABLE OF CONTENTS:

Models.....	2
Introduction.....	2
General Warnings.....	2
Unpacking & Pre-Installation Check.....	3
Installation.....	4
Wiring Instructions.....	4
Flash Patterns.....	6
Maintenance.....	6
Troubleshooting.....	7
Parts List.....	7
Warranty.....	8

IMPORTANT: Read ALL instructions and warnings before installing and using this system.

Models Referenced

PART	DESCRIPTION
MR6F-A/A-WL	MR6F LED windshield (amber/amber)
MR6F-B/B-WL	MR6F LED windshield (blue/blue)
MR6F-R/B-WL	MR6F LED windshield (red/blue)
MR6F-R/C-WL	MR6F LED windshield (red/clear)
MR6F-R/R-WL	MR6F LED windshield (red/red)

Introduction

The *MR6F LED Windshield Light* is designed to fit as a center mount abutting the windshield above the rear view mirror. With a design that incorporates a single bank of hi-intensity LED lights the windshield light provides high visibility when activated. The low profile, light weight but strong molded plastic cap makes this windshield light extremely discrete and non-intrusive.

General Warning

1. The use of emergency warning devices does not ensure the safety of the operator. The operator is responsible to ensure safe operation of the vehicle regardless of whether the warning device is in operation or not.
2. The effectiveness of this or any warning device is highly dependent on proper installation and maintenance. Read the manufactures instructions before installing and follow all recommendations.
3. When in use the operator must ensure that the warning signal is visible and not obstructed by vehicle components (i.e. open trunk lid), people or other obstructions.
4. This device is intended for use by authorized personnel only. The user responsibility is to ensure that all local, state/provincial and federal laws are being complied with. D&R assumes no liability for any loss resulting from the use of this device.
5. The device must be installed so as not to reduce the output performance of vehicle systems.

General Warning

6. Placement of control switches must be so as to provide convenient reach for the operator without losing eye contact with the road.
7. Emergency warning devices require high electrical voltages and/or currents. Properly connect and ground all circuits. Shorting or improper grounding of this device may cause personal injuries.

Unpacking and Pre-Installation Check

The MR6F LED Windshield Light modules are shipped pre-assembled and factory tested.

All necessary hardware for standard installations is included. Remove the module from the box for pre-installation inspection.

The MR6F LED Windshield light modules are designed to work on 12 volt D.C. negative ground (earth ground) vehicles. If your vehicle is not a 12 volt D.C. negative ground vehicle, ***DO NOT INSTALL*** these units.

Use the following pre-installation check list to verify your unit:

1. Examine unit for damaged in transit (i.e. broken light units, scratched lens, frayed or damaged wires, etc.). Report any damage to the carrier. Keep all shipping material.
2. Test light unit using a 12 Volt DC power source as follows:
 - Connect the red lead wire to a 12 Volt DC power source
 - Connect the black lead wire to a negative (-) ground.
 - Confirm that all LED's in the light bank illuminate.
3. Open the hardware accessories bag and refer to the enclosed packing slip to check that all necessary mounting hardware has been shipped as per your order.

Installation

Warning

1. Any device used inside a vehicle, may cause severe personal injury if not properly mounted and secured. Objects used in the vehicle may become airborne during a collision or other sudden changes in vehicle speed or direction, such as braking, acceleration or turns.
2. Be sure to mount unit through the steel of the vehicle. Avoid mounting through plastic or other non-structural materials.
3. **POINT OF INSTALLATION MUST NOT INTERFERE WITH DEPLOYMENT OF VEHICLE AIR BAGS.**

Note: The MR6F LED Windshield Light modules are designed so that the wiring harness exits the device from the rear driver side when mounted. Wiring instructions assume this configuration.

The MR6F LED Windshield Light module is designed to be self aligning. Oversize holes in the cap allow the unit to be installed without removing the cap from the bracket. To install proceed as follows:

1. Determine the mounting location by aligning the cap such that it fits flush against the windshield, abutting the edge of the roof liner and fits snugly against the roof liner.
2. Using the #10x1" TEK screw self tapping screws (included) and #10 flat washer attach the unit to the roof of the vehicle.

Note: To facilitate wiring do not tighten screws completely. Allow the wiring pigtail to extend from the unit so that it may easily be tucked under the roof liner.

Wiring Instructions

Warning

1. When passing wire through compartment walls use a grommet of appropriate size and sealants.
2. Looms, grommet, cable ties or other installation hardware should be used to anchor and protect wires
3. All wire should conform to the minimum wire size as specified by the manufacturer.
4. Splices should be minimized and made in a fashion so as to protect from corrosion to reduce loss of conductivity.

The MR6F LED Windshield Light units are configured with two MR6F LED modules, one master, one slave. Each unit is a self contained module consisting of two six (6) MR6F LED light banks. The wiring harness exits the MR6F LED Windshield Light units at the rear and consists of a three wire ponytail.

To wire MR6F LED Windshield Light module proceed as follows:

1. Route an appropriate gauge (18-20 AWG) three (3) conduit cable through the vehicle from the control unit or switch to the MR6F LED Windshield Light module installation point.
2. Connect the wires in the cable to the module pigtail (see Table1), with appropriate connectors (not supplied)

Note: D&R recommends all wire connections be soldered

3. Connect the red wire extension to the appropriate post of the controller or switch box.
4. Connect the black wire to a negative (earth) ground.
5. Test functionality by activating the trigger switch.
6. Test change pattern feature by connecting momentary the green wire to +12V.

MR6 LED wiring

<i>WIRE</i>	<i>OPTIONAL</i>	<i>CONNECT TO</i>
Red	No	Trigger/Power +12V
Black	No	Ground
Green	Yes	+12V Momentary

Warning

LED lights are high intensity light sources, to prevent eye damage avoid prolonged exposure to the light source and never look directly into the light source.

Warning

The MR6F LED Windshield Light modules are designed to be replaced as units. There are no repairable parts. Do not attempt to open or repair the LED units. If a malfunction occurs return complete unit to D&R Electronics or an authorized dealer for replacement of repair.

Flash Patterns

The *MR6F LED Windshield Light* module has available the following standard flashing patterns:

1. Double flash
2. Triple flash
3. Quad flash
4. Quint flash
5. Strobe 1 flash
6. Strobe 2 flash
7. Single 60/40 flash
8. Multi flash
9. OFF

To select a specific flash pattern proceed as follows:

1. Locate the green wire extending from the unit
2. Touch the wire to +12V to sequence to the next available flash pattern.
3. When the desired pattern is activated seal the end of the wire with tape to prevent accidental setting to a different pattern. Conceal wire inside the unit cap.

Maintenance

The *MR6F LED Windshield Light* unit is designed to be virtually maintenance free. Units require only occasional washing of the lens with plain water and a soft cloth to maintain maximum intensity.

The lens are plastic and can scratch so wash only when necessary.

Troubleshooting

PROBLEM	POSSIBLE CAUSE	PROBABLE SOLUTION
LED module does not function when turned ON	Loose connection to trigger control or switch. Faulty ground connection. Faulty power connection. Controller or switch is damaged.	Inspect connection and tighten. Verify ground connection. Verify +12VDC connections. Return controller or switch for repair or replacement.
LED lamp bank does not light	Faulty circuit board	Replace LED module
Some LEDs do not light	Individual LED lamp failed	Replace LED module
Flash pattern changes	Exposed flash control wire.	Inspect and verify that control (green) wire is not touching a +12V source
Module does not flash	Faulty circuit board	Replace LED module

Parts List

PART NUMBER	QTY	DESCRIPTION
MR6F -X/X-WL	1	MR6F LED Windshield Light
401-0014	2	#10 x 1" TEK Screw Self Tapping Zinc
403-0007	2	#10 Flat Washer Zinc
212-0041-F	1	Installation Manual

WARRANTY

D&R Electronics warrants its new products to be free from defects in material and workmanship, under normal use and service, for a period of one year on parts replacement.

This warranty applies only to original purchasers acquiring the product directly from D&R Electronics, or its authorized dealers. Warranty will not be recognized without proof of purchase or bill of sale. This warranty is not transferable.

The warranty begins on the date of delivery to the first user/purchaser.

This warranty shall not apply to product which must be repaired due to normal wear and tear, negligence, improper installation, abuse, misuse, or which have been altered or modified at a facility other than D&R Electronics, or its authorized depot center.

Units proved to be defective within the warranty period, based on an examination by D&R Electronics, will be replaced or repaired at D&R Electronics' option.

This warranty is in lieu of all other express warranties. D&R Electronics makes no other warranties, expressed or implied, than the express warranties contained herein.

PRODUCT RETURN POLICY

In order to provide you with faster service, product returns for repair or replacement, must have a **Return Goods Authorization Number (RGA number)**. Please contact our company to obtain a RGA number before you return the product to D&R Electronics. Write the RGA number clearly on the package. Be sure you use sufficient packing materials to avoid damage to the product being returned while in transit.

D&R Electronics assumes no responsibility or liability for expenses incurred for the removal and/or the installation of products requiring service and/or repair. Repairing or replacing product is at the discretion of D&R Electronics.

D&R ELECTRONICS Co. LTD.

CANADA

8820 George Bolton Pkwy.
Bolton, Ontario L7E 2Y4

Tel.: (905)951-9997

Fax: (905)951-0019

USA

2321 Kenmore Ave.
Buffalo, NY 14207

Toll Free 1-800-538-7338

www.dandrelectronics.com