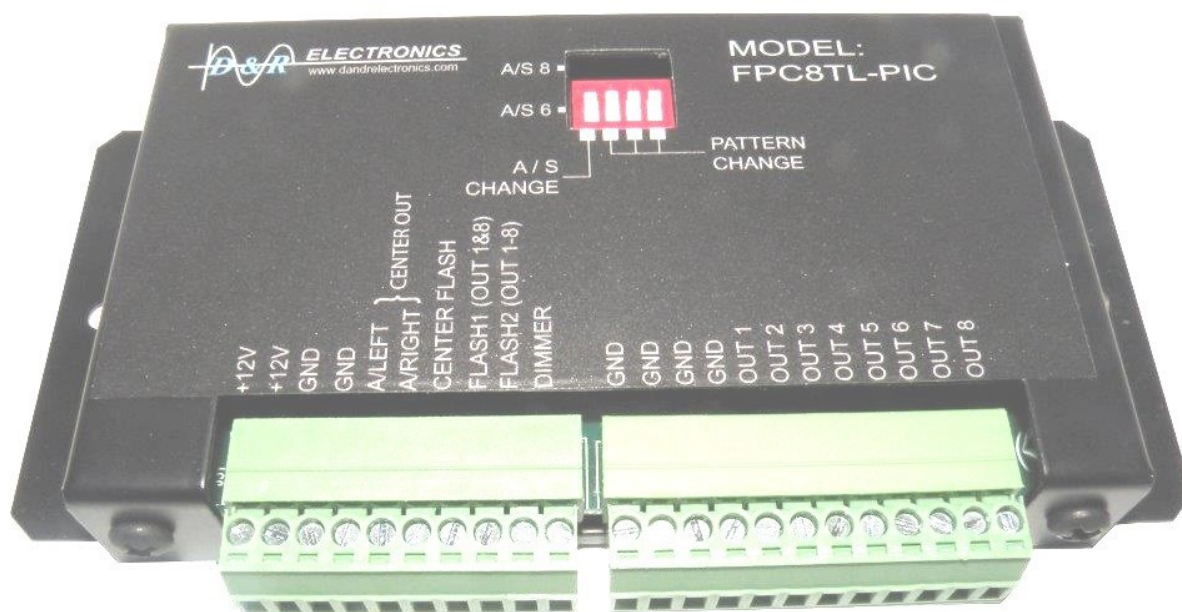


LED FLASHER AND TRAFFIC DIRECTOR POSITIVE CONTROL FPC8TL-PIC

Installation/Operations Manual



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Basic information

The FPC8TL-PIC Flasher is general purpose positive control flasher. It can be use for any low power consumption LED flashing. Generally it is use in Tailgate LED light flashing, mini-tech lightbar, PL22B , SL24. It can be use for single or multiple function depend on application. Important features of this flasher is as follow:

- 6 inputs and 8 outputs
- Inbuilt Traffic Director feature
- 8 different types of flash pattern
- Inbuilt dimmer function

Technical specification

Voltage range: 11-16V

Current draw: 2A per output.

Operating temperature: -30 TO +65. C

Dimension: Width: 2.5 inch

Length: 5.00 inch

Height: 0.80 inch

Flash pattern

Pattern	SW2	SW3	SW4
3 FLASH FAST	OFF	OFF	OFF
2 FLASH FAST	ON	OFF	OFF
5 FLASH OVERLAP	OFF	ON	OFF
4 FLASH OVERLAP	OFF	OFF	ON
3 FLASH	ON	ON	OFF
DOUBLE FLASH	ON	OFF	ON
5 FLASH *	OFF	ON	ON
4 FLASH	ON	ON	ON

NOTE: * Factory default flash pattern

DIP SW1: OFF- 6 Output traffic director using output 2 to 7

ON- 8 Output traffic director using output 1 to 8

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 is responsibility 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
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 caused personal injuring, vehicle damage or both
8. ***All operators should be properly trained in the operation of this device to ensure both their and public safety***

Installation and Mounting

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.**
4. **D&R Electronics recommends this or any of our products be installed by qualified professionals.**

Mounting

Step 1:

Determine an appropriate mounting location.

Step2:

Confirm there is adequate access and clearance for the wiring and its connections.

Step3:

Secure the FPC8 TL with 2 self tapping mounting screws (not supplied).

NOTE: The FPC8 TL may be mounted anywhere inside the vehicle, inside the warning device or any convenient location that is determined by proper planning and installation techniques.

Wiring and Setup Instructions

Warning

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

Note: This product is designed to control LED based light bars and warning beacons connecting this to regular or halogen lamp loads could compromise the safety and reliability of this product.

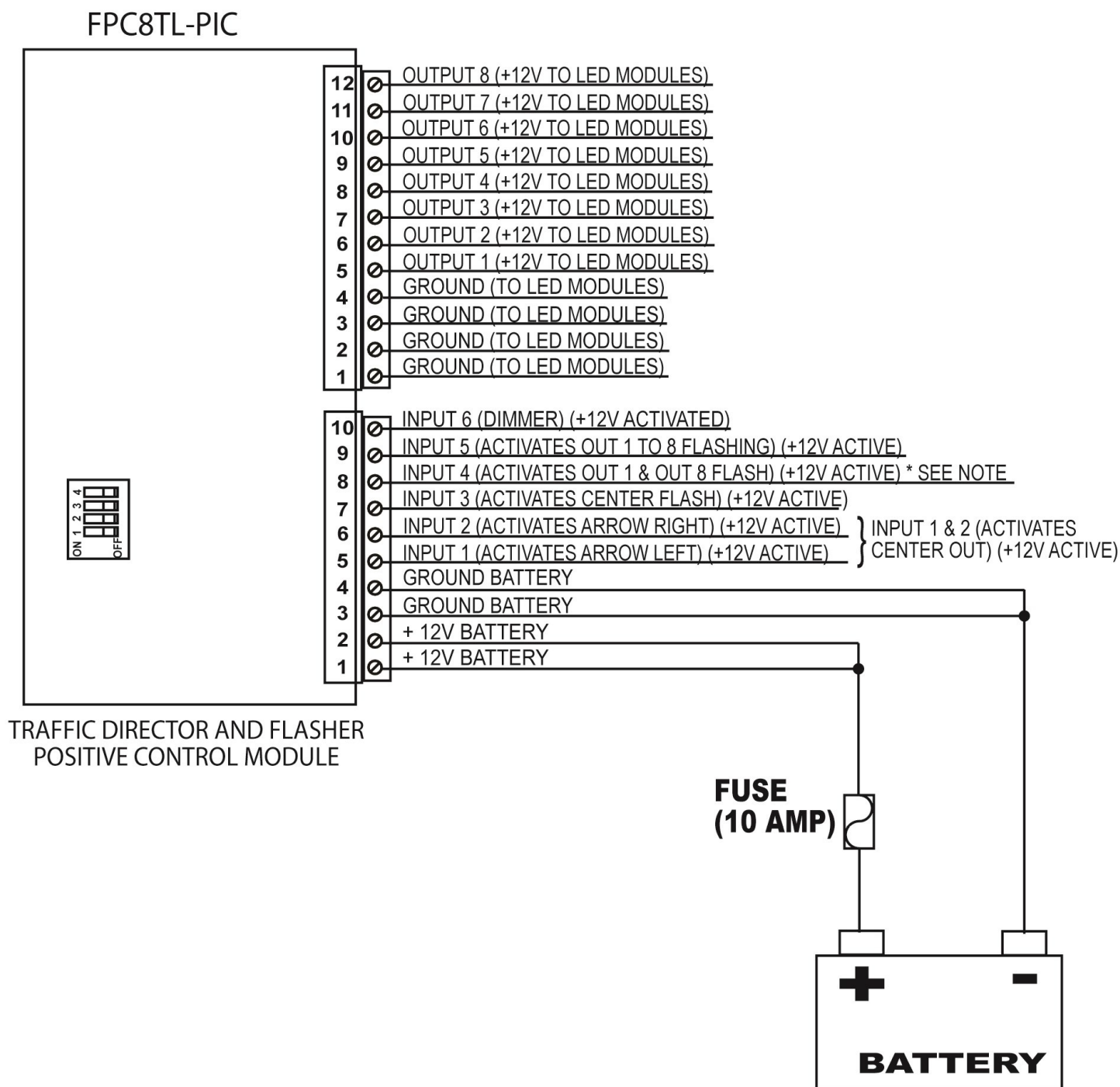


Figure 1
Wiring diagram of the FPC8TL showing the location of the Input/output pins

Wiring information:

Connector 1:

- 1 +12 V BATTERY
- 2 +12 V BATTERY
- 3 GROUND BATTERY
- 4 GROUND BATTERY
- 5 INPUT 1 (ACTIVATE LEFT AROW) +12V ACTIVATE
- 6 INPUT 2 (ACTIVATE RIGHT ARROW) +12V ACTIVATE
- 7 INPUT 3 (ACTIVATE CENTER FLASH) +12V ACTIVATE
- 8 INPUT 4 (ACTIVATE OUT1 & 8 FLASH) +12V ACTIVATE
- 9 INPUT 5 (ACTIVATE OUT1 TO 8 FLASHING) +12V ACTIVATE
- 10 INPUT 6 (DIMMER) +12V ACTIVATE

Connector 2:

- 1. GROUND (LED MODULE)
- 2. GROUND (LED MODULE)
- 3. GROUND (LED MODULE)
- 4. GROUND (LED MODULE)
- 5. OUTPUT 1(+12V TO LED MODULES)
- 6. OUTPUT 2(+12V TO LED MODULES)
- 7. OUTPUT 3(+12V TO LED MODULES)
- 8. OUTPUT 4(+12V TO LED MODULES)
- 9. OUTPUT 5(+12V TO LED MODULES)
- 10.OUTPUT 6(+12V TO LED MODULES)
- 11.OUTPUT 7(+12V TO LED MODULES)
- 12.OUTPUT 8(+12V TO LED MODULES)

Connector 1:

Port 1 and port 2 - Connect to +12V battery

Port 3 and port 4 - Connect to ground battery

Port 5 - Input1: Triggering switch (+12V to activate Left Arrow)

Port 6 - Input 2: Triggering switch (+12V to activate Right Arrow)

Port 5 and 6 - Activating both port together (+12V to activate Center Out)

Port 7 - Input 3: Triggering switch (+12V to activate Center arrow)

Port 8 - Input 4: Triggering switch (+12V to activate flash for output 1 and output 8)

Port 9 - Input 5: Triggering switch (+12V to activate flashing for output 1 to output 8)

Port 10 - Input 6: Triggering switch (+12V to activate dimmer function)

Connector 2:

Port 1 to port 4 - Connect grounds of LED modules.

Port 5 to port 12 - Output 1 to Output 8: Connect to LED modules respective to with wiring diagram.

Note:

1. Input 5 activates the output as follow:
GROUP 1 - OUT 1, OUT 2, OUT 3, OUT 4 together
GROUP 2 - OUT 5, OUT 6, OUT 7, OUT 8 together

2. Input 4 work only in 6 out arrow mode.

Maintenance

The *FPC8TL* does not require user maintenance, this is a factory sealed unit and can not be repaired.

There are no user maintained parts. Do not attempt to open or repair. Contact your local distributor or D&R Electronics for repair

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, and one year on labour. 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 products 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 does not cover travel expenses or labour charges for removal or installation. Lamps, flash tubes, batteries or other items considered consumables are not covered under warranty. 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.

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