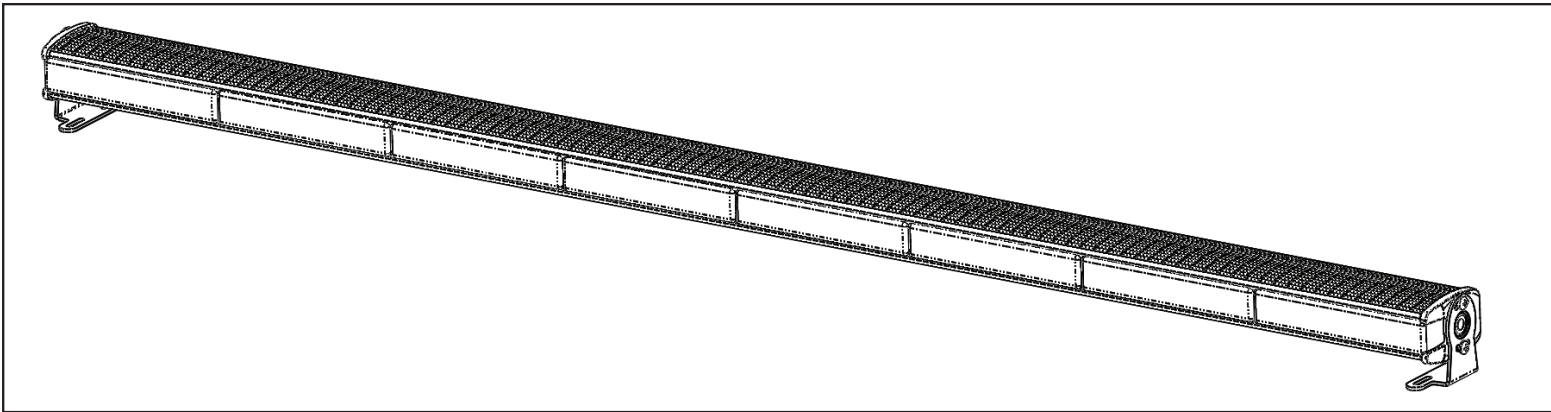


User Manual: COVERT T-Series

4, 6, 8, 10 Lighthouse Traffic Advisor

NOTE: Do not install and/or operate this product unless you have read and understand all the safety information and instructions contained in this manual.

IMPORTANT!
 This manual provides all the necessary information for your SECUR product to be properly and safely installed. Please read all instructions before installation, and make sure you follow them carefully during the installation process. Failure to follow these instructions may result in DAMAGE to the product or vehicle, and/or SERIOUS INJURY to you and your passengers!



Product Code	COVERT T-Series
Voltage	10-30VDC
Working Temperature	-30°C~+70°C
Waterproof	IP67 for Components
LEDs	9 Per Module / 18 for Dual Color
Lens Material	PC
Base	Aluminum

Product Description:
 The COVERT T-Series Warning / Traffic light is designed to pack two functionality into one. Using our TRX optic, the COVERT T-Series provides 180° degree light spread through each of its modules, providing linear visibility with no blind spots. Comes with warning light function, Arrow / Traffic advisor function*

*Only if you have Amber Color Modules

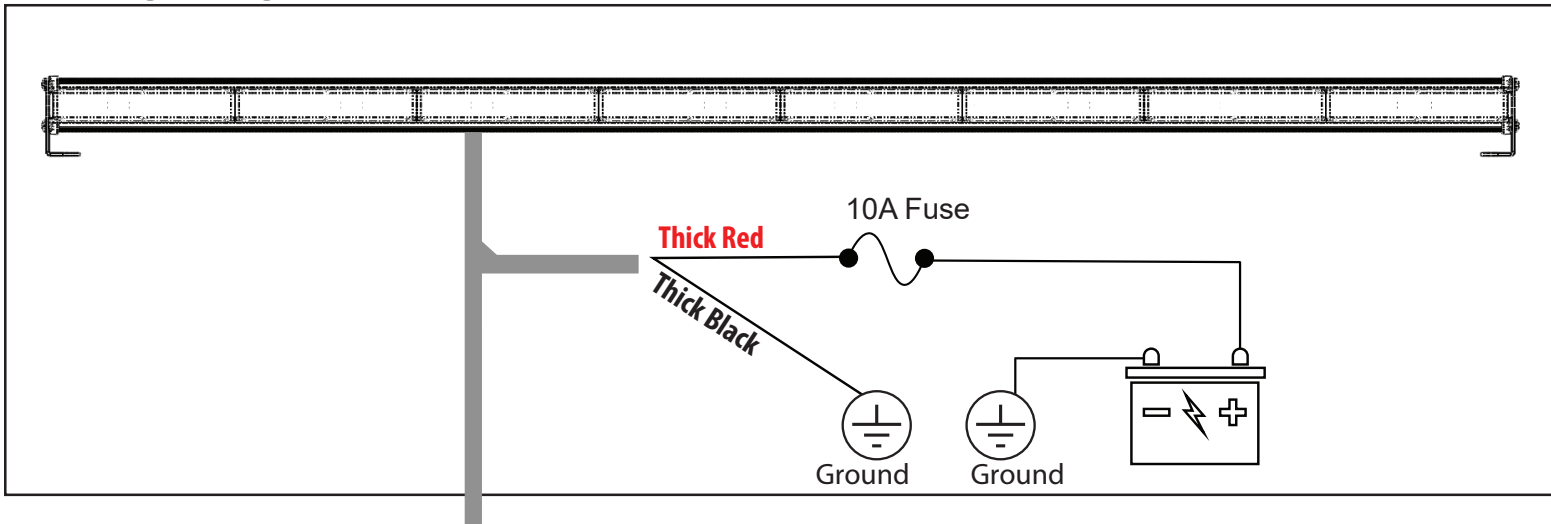
Length	Number of Modules	Fuse Suggestion	
		12V	24V
134.3mm	1	10A	7.5A
268.6mm	2	10A	7.5A
402.9mm	3	10A	7.5A
537.2mm	4	10A	7.5A
671.5mm	5	10A	7.5A
805.8mm	6	10A	7.5A
940.1mm	7	10A	7.5A
1074.4mm	8	10A	7.5A

Power Specification	
Input Voltage	10-30 VDC
Power Consumption	Max Consumption @6.4A at 8 Module
Reverse Polarity	Protected
Hardness	14GA for Positive (Thick Red) and Ground (Thick Black), 22GA for Function Wires

Warning!!!
 This product must be properly grounded. Please connect the product's ground wire directly to the NEGATIVE (-) battery post. Inadequate grounding and/or shorting of electrical connections can cause high current arcing, which can result in injury and/or severe damage to your vehicle, including fire

Warning!!!
 All wires connecting to the POSITIVE (+) terminal of the battery must be able to carry at least 125% of the maximum operating current load and fused at the battery. Do not use any circuit breakers for this product.

Wiring Diagram



Wiring Diagram		Functions are available only if you had choiced associated specification.	
+ / - Trigger	Positive Trigger		
Thick Black	Negative		
Thick Red	Positive		
Purple	Activate Color 1		
Yellow	Arrow Function Right to Left**		
Blue	Change Flash Pattern*		18pt
White	Dimming		
Orange	Warning Light All Flashing**		6pt
Green	Arrow Function Left to Right**		3pt
Brown	Activate Color 2***		
Notes	<p>*change pattern via blue wire when light function is activated ** Should you have Right Alley Function, Arrow Function Middle to Outward will be replaced by Right Alley Light. To activate Arrow Function Middle to Outward, please activate Arrow Function Left to Right and Arrow Function Right to Left at the same time. *** only functional if you have dual color options</p>		

Installation

Warning!!!

If you need to drill holes for mounting this product, please be careful not to damage any vehicle components/parts during the process. Please check both sides of the mounting surface before drilling. After drilling, make sure you de-burr any holes and remove any remnants. Grommets are also required to be installed in all wire passage holes. Then, use a sealant as recommended by your vehicle manufacturer to seal any holes so as to make them air and watertight

Power Cable

- Route lightbar power cables close to the vehicles power supply (battery)
- Install suggested fuse to the end of the **Thick Red** wire of the power cable then connect to the power supply (battery)
- Connect the **Thick Black** wire to the vehicle chassis ground right next to the power supply (battery)

Function Cable

- Route Function cables to a suitable control box (User Supplied; Maximum of 20A for Power wire, 2.5A for function wire)
- Connect the required wires to the control box base according to the control box' installation guide
- Apply the appropriate function wire to Power cable (**Red Thick**) to activate function
- Apply the **Blue** wire to the Power cable (**Red Thick**) momentarily to change flash pattern

Flash Patterns: 18 Modes

NO.	Name	FPM	Sequence	ECE R65 Compliant Timing	SAE Compliant Timing	CA Title 13 Compliant Timing
1	Steady On	-	70% brightness			
2	ECE R65 Single Flash	120	simultaneous	Yes		
3	ECE R65 Double Flash	120	simultaneous	Yes		
4	ECE R65 Quad Flash	120	simultaneous	Yes		
5	ECE R65 Single Flash	120	Alternative	Yes		
6	ECE R65 Double Flash	120	Alternative	Yes		
7	ECE R65 Quad Flash	120	Alternative	Yes		
8	SAE Single Flash (sim+Alt)	75	variable		Yes	
9	Speedy Single Flash (sim.)	-	simultaneous			
10	SAE Quad Flash	75	Alternative		Yes	
11	ECE R65 Single Flash	300	Alternative	Yes		
12	ECE R65 Single Flash (Sim+Alt)	300	variable	Yes		
13	Middle Out Rotate	120(RPM)	-			
14	Speedy Single Flash (Alt.)	-	Alternative			
15	SAE QUAD Center-Side Alt	75	Alternative		Yes	
16	Rotate	120(RPM)	-			
17	Single Quad Alternative	-	variable			
18	Single Quad Simultaneous	-	variable			

Connect the function wire to Positive(**Thick Red**) to trigger functions.

1 Second	: to select next pattern	4 Second	: back to default pattern (PA1)
2-3 Second	: to select previous pattern	5 Second	: to turn OFF

Rear Warning Light: 6 Modes

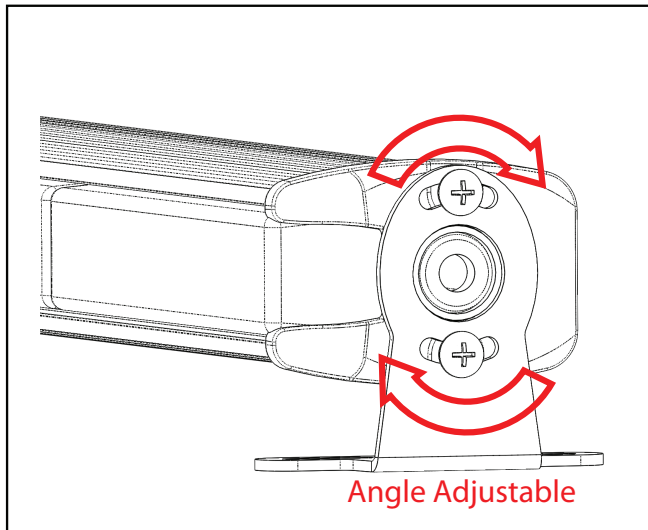
NO.	Name	FPM	Sequence	ECE R65 Compliant Timing	SAE Compliant Timing	CA Title 13 Compliant Timing
1	ECE R65 Single Flash	120	simultaneous	Yes		
2	ECE R65 Double Flash	120	simultaneous	Yes		
3	ECE R65 Quad Flash	120	simultaneous	Yes		
4	ECE R65 Single Flash	120	Alternative	Yes		
5	ECE R65 Double Flash	120	Alternative	Yes		
6	ECE R65 Quad Flash	120	Alternative	Yes		

Traffic Advisor (Arrow Group) Pattern

NO.	Name	Delay Timing	Sequence	ECE R65 Compliant Timing	SAE Compliant Timing	CA Title 13 Compliant Timing
1	Single Slow	250ms				
2	Single Fast	150ms				
3	Fill diminished	250ms				
4	Fill diminished	200ms				
5	Fill diminished	150ms				
6	Chase Fast	250ms				
7	Chase Fast	200ms				
8	Chase Fast	150ms				
9	Arrow Warner	250ms				
10	Arrow Warner	200ms				
11	Arrow Warner	150ms				

*by changing pattern for one function, it will change flash pattern for the whole group

Secure the Lightbar



1. Place the side angle adjustable bracket to your desired position.
2. Should you choose to secure the lightbar onto the roof of the vehicle, follow the drill hole on the bracket and drill a 2mm wide hole into the roof of the vehicle.
3. Using a suitable bolt to secure the bracket onto the roof of the vehicle via the drill hole.
DO NOT OVERTIGHTEN.

Warning!!!

This product is intended for use by authorized personnel only. The user is responsible for understanding and obeying all laws pertaining to warning signal devices. Therefore, he/she should identify all laws and regulations regulating the use of such devices and conform to them. The manufacturer assumes no liability for any loss resulting from the use of this product.

Warning!!!

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 as it may cause temporary blindness or even result in eye damage.

Warning!!!

Proper placement and installation of this product are vital for it to operate at its optimum efficiency. It is your responsibility to determine a suitable mounting location for the product so as to ensure the safety of all passengers onboard. Do not install this product or route any wires within the airbag deployment area of your vehicle as it may damage or reduce the effectiveness of the air bag. In worst-case scenario, it may even become a projectile that could cause serious injury or death. Before installation, please refer to the manual of your vehicle and avoid installing it within the airbag deployment area.

Warning!!!

Please use only soap and water to clean the outer lens. Do not use other chemicals as it may result in premature lens cracking (crazing) and discoloration that could reduce lens effectiveness in which you should replace the lens immediately. Also, please do not use a pressure washer to clean this product

Manufacturer Limited Warranty Policy: Manufacturer warrants that on the date of purchase this product. This Limited Warranty extends for Thirty Six (36) months from the date of purchase.

DAMAGE TO PARTS OR PRODUCTS RESULTING FROM TAMPERING, ACCIDENT, ABUSE, MISUSE, NEGLIGENCE, UNAPPROVED MODIFICATIONS, FIRE OR OTHER HAZARD; IMPROPER INSTALLATION OR OPERATION; OR NOT BEING MAINTAINED IN ACCORDANCE WITH THE MAINTENANCE PROCEDURES SET FORTH IN MANUFACTURER'S INSTALLATION AND OPERATING INSTRUCTIONS VOIDS THIS LIMITED WARRANTY.