



AEROLEDs™

Installation Instructions Certified SunBeacon II Series



AeroLEDs, LLC
8475 W. Elisa St.
Boise, ID, 83709
208-850-3294

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Check	Nate Calvin		
Quality	Mark McCormack		
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REVISION RECORD

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D	Update Logo, information, tables, drawings	6/22/2022	J. Blanchfield
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1 System Description

The SunBeacon II light is FAA TSO approved to meet TSO C-96a standards and operates on aircraft DC power. The light is powered and controlled via three wires, power, ground, and sync. The SunBeacon II is a direct replacement for legacy beacons and is available for 12V or 24V installations in red or white.

2 Model Numbers

Model	Part Number	Description	Voltage (V)	Strobe		Power (W)	Weight (oz)
				AVG	Peak		
SunBeacon II	11-2200-A-12	Red Navigation, Anti-collision	14	1.2	4.4	17	3.5
	11-2200-B-12	White Navigation, Anti-collision					
	11-2200-A-24	Red Navigation, Anti-collision	28	0.6	2.3		
	11-2200-B-24	White Navigation, Anti-collision					

Table 1

3 Airworthiness Limitations

The Airworthiness Limitations section is FAA approved and specifies maintenance required under **14 CFR, §43.16** and **14 CFR, §91.403** of the Federal Aviation Regulations unless an alternative program has been FAA approved. There are no additional airworthiness limitations.

3.1 Instructions for Continued Airworthiness

SunBeacon II LED light assembly contains no user serviceable items. Should any LED fail, unit must be replaced.

Interval	Inspection	Remedy	Notes
Pre-Flight	<ul style="list-style-type: none"> Perform a functional check and observe that all LEDs are illuminated 	<ul style="list-style-type: none"> If all LEDs are not illuminated replace light as soon as is practicable 	<ul style="list-style-type: none"> Lights are not use serviceable. Lights are very bright and to reduce eye strain during inspection use an optical filter such as dark glasses or welding goggles.
Annually, unless the OEM specifies a shorter interval	<ul style="list-style-type: none"> Perform a functional check and observe that all LEDs are illuminated Check mounting, connections, and wire integrity 	<ul style="list-style-type: none"> If all LEDs are not illuminated, the light must be replaced Adjust or replace wiring, and connectors as required 	

Table 2

4 Installation

Consult **14CFR, §43.13-1B** for guidance on acceptable methods, techniques, and practices. Light mounts into existing holes on aircraft(see mounting diagrams). For retrofit installation, existing circuit breaker may be used. Procedures contained herein are not intended to conflict with procedures set forth by aircraft OEM, nor do they supersede FAA approved manuals and FAA regulations.

4.1 Installation Procedures

1. Disconnect aircraft power or disable applicable circuit breakers
2. Ensure all switches are in the OFF position
3. Reference OEM manual
 - a. Remove existing light assembly (retain hardware)
 - b. Bypass or remove existing high voltage power supply (if applicable)

NOTE: Connecting light to high voltage power supply will result in permanent damage and will void warranty

4. Install suitable connectors and/or splices to connect light assemblies in accordance with wiring diagram(s)
5. Using the appropriate hardware install SunBeacon II as per section **5.2 Mounting Options**
6. Re-connect aircraft power or enable applicable circuit breakers
7. Verify proper operation of LED light(s)
8. Record installation with logbook entry

Note: Shielded cable is recommended although not required for installation.

It is recommended that ground connections for all lights be made at a single location on aircraft central ground bus. This “single point ground” scheme helps to eliminate ground loops and ground bounce that can occur when using airframe as a ground.

4.2 Troubleshooting

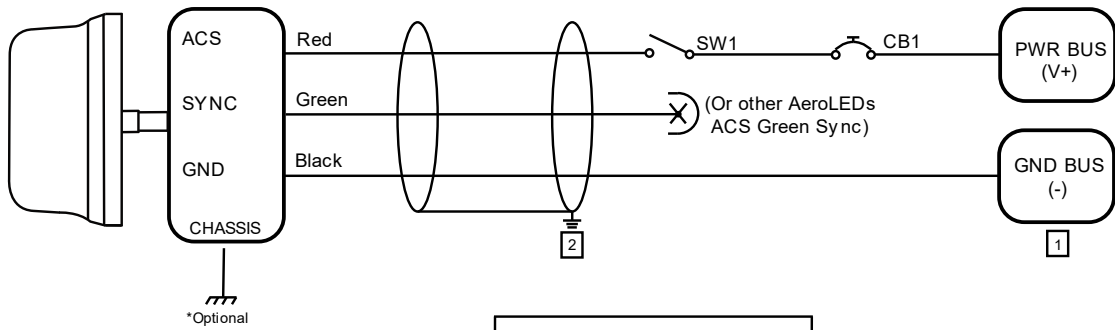
If light is not functioning properly, not fully powering up, or not staying powered on, try the following steps to correct problem:

- a. Check for proper voltage at power input wire to light
- b. Ensure light is adequately grounded
- c. Check for continuity in wiring and connections
- d. If wiring is verified, remove light and bench-check with appropriately sized power supply

If above actions do not correct problem, contact AeroLEDs tech support at 1-208-850-3294 for a resolution.

5 Diagrams

5.1 Wiring



SYMBOLS	
	GND
	CHASSIS GND

Notes
 1) Single point connection to aircraft central ground bus
 2) Use of shielded cable is optional

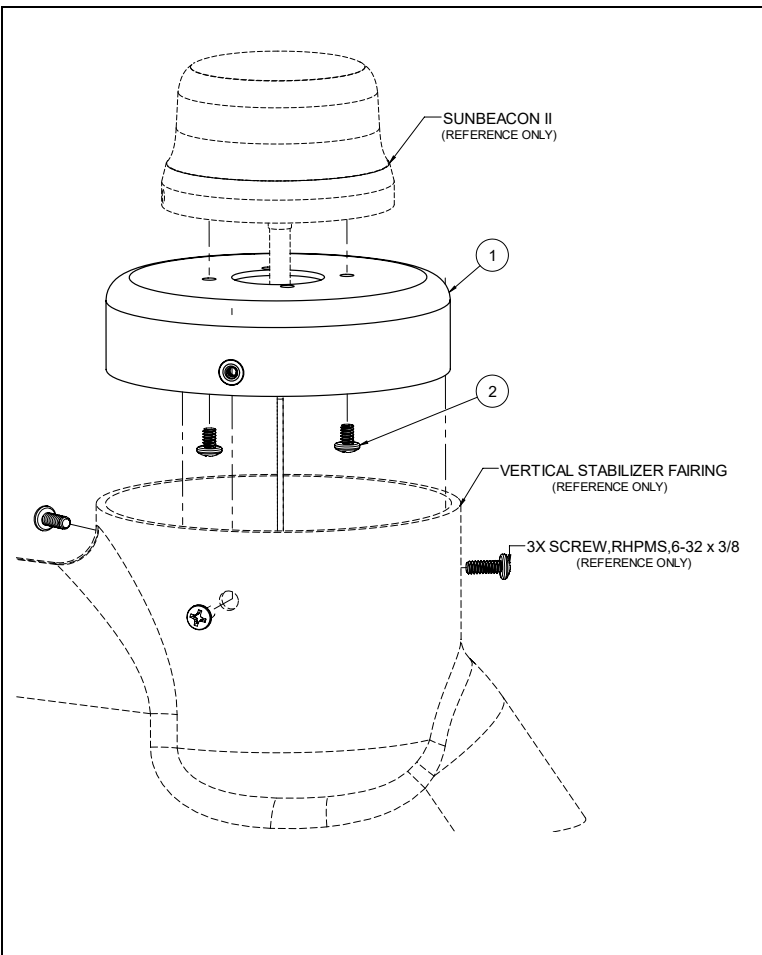
Figure 5-1

5.2 Mounting Options

ITEM NO.	APN	DESCRIPTION	MATERIAL	QTY.
1	01-2220-A	MOUNT, ASSY	AL6061-T6	1
2	00-8869	SCREW, FHPMS 6-32 x 1/4, 100, Patch	SS18-8	4

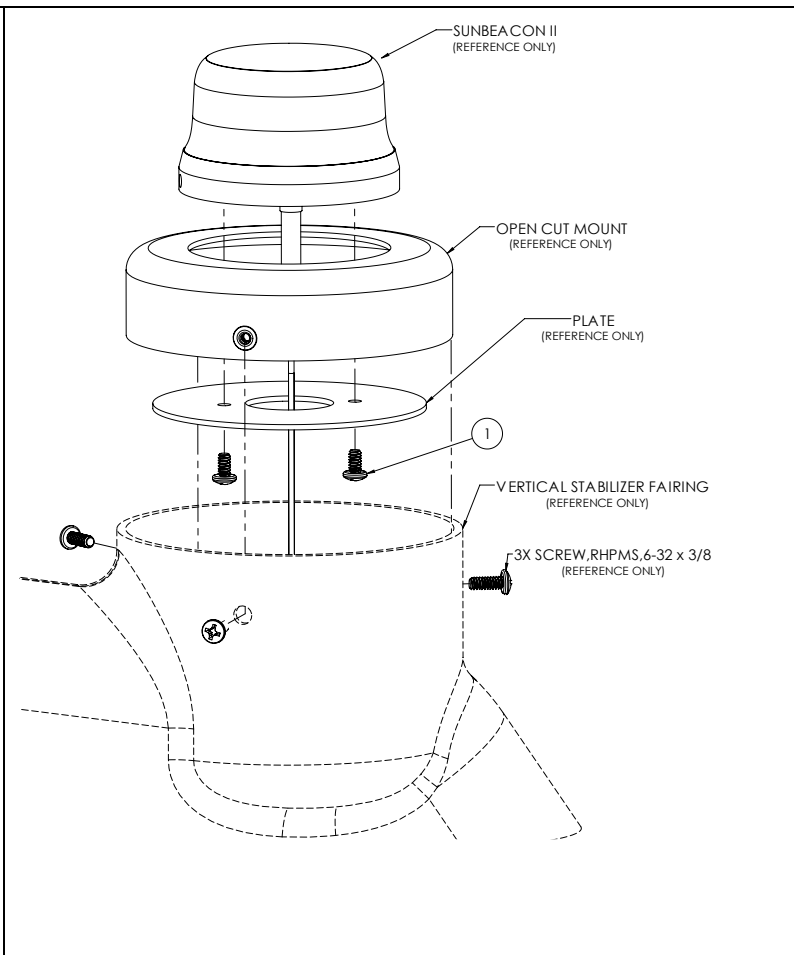
Config A: Direct Mount

Config B: Twist Mount (KIT-01-1096)



ITEM NO.	APN	DESCRIPTION	MATERIAL	QTY.
1	01-2220-C	MOUNT,ASSY,CUP	AL 3003-0	1
2	00-8816	SCREW,RHPMS 6-32 x 1/4,Patch	SS18-8	2

Config C: Cup Mount Adapter (KIT-0049)



ITEM NO.	APN	DESCRIPTION	MATERIAL	QTY.
1	00-8816	SCREW,RHPMS 6-32 x 1/4,Patch	SS18-8	2

Config D: Plate Mount