# LED Inset Taxiway Edge Light (LTO)

# Compliance

- FAA: L-852T(L) AC150/5345-46 and EB No 67
- ICAO: Annex 14 Volume I par. 5 3 18 8
- EASA: CS ADR-DSM, Book 1, par M 720 (c) (3)
- IEC: TS 61827
- NATO: STANAG 3316
- CAA: CAP 168
- TCCA: TP312

# **Applications**

Taxiway edge for ICAO, FAA and military taxiways.

#### **Benefits**

- 60,000 hours LED rated life at full intensity, but over 100,000 hours in field operating conditions.
- In new installations, LED lights mean smaller loads, smaller CCRs and transformers, thus lower life cycle costs.
- Light output is variable like a traditional halogen lamp, as indicated by FAA "Engineering Briefing No.67".
- Colors are produced by LEDs: no colored filters ensures no energy losses and no color shifts.
- Fully compatible with existing AFL infrastructure (for monitored fixtures, isolation transformer max size: 200 VA).
- Designed with simplicity allowing longer maintenance intervals and fewer spare parts.
- No use of sealing compound to fix the prisms in the dome.
  Use of gaskets to set the prisms in the dome makes their replacement quick and easy.
- No optical adjustment after LED module or prism replacement.
- Pressure valve for watertightness test after overhaul.
- Compatible with CCRs designed in compliance with IEC or FAA requirements.

#### **Technical Features**

- Rugged electronics built tough for high resistance to shock and vibration.
- Automatic adaptation to the 50 or 60 Hz frequency of the supply current.
- Surge protection device is provided to protect the electronics as required by FAA "Engineering Briefing No.67".
- Continuous internal fault detection.
- 0.25" (6.35 mm) limited protrusion above the pavement reduces vibration to aircraft and to the fixture itself, increasing its life expectancy.
- Smooth outer dome profile makes the light less susceptible to snowplow blades.
- Omnidirectional, 8" or 12" dia.



- Aluminum forged dome and die cast lower cover make the fixture sturdy, but lightweight for easier handling in the field.
- O-ring is provided to avoid dirt deposits between the fixture and base.
- IP67 protection.
- Temperature range:  $-55^{\circ}$ C ( $-67^{\circ}$ F) to  $+55^{\circ}$ C ( $131^{\circ}$ F).

## Installation

- Suitable for 8" or 12" dia. bases.
- Adapter ring for 8" light installation on 12" dia. bases.
- Specific tools available for easy and precise installation.





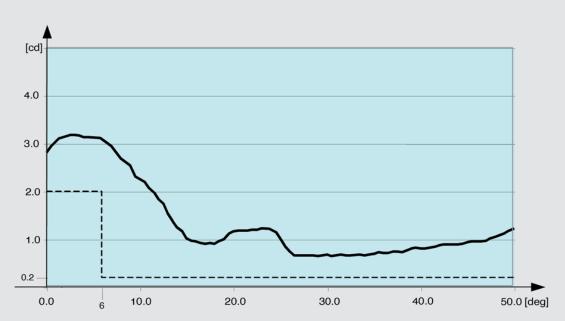


Figure 1 - ICAO par. 5.3.18.8 and FAA L-852T - Blue

# POWER CONSUMPTION (maximum value among all fixture configurations)

Power Factor > 0.98	Primary conductor isolation transformer		Fixture	
w/o Arctic kit	19.1 W	19.2 VA	8.3 W	8.6 VA
with Arctic kit	73.2 W	73.3 VA	62.1 W	62.2 VA



# **TECHNICAL DRAWING** Ø184 Š TYPICAI Figure 2 - Light fixture 8" dia. ø235 ø214 ø203.2 6.35 19 ø165 Figure 3 - Shallow Base 8" dia. ø340 ø320 ø304 6.35 ø252.3 150 Figure 4 - Shallow Base 12" dia. ø303

## PART NUMBER IDENTIFICATION

LTO XX 04 - 0 - M - A

#### Basic P/N:

08\*= Suitable for 8" base

17\*\*= Suitable for 12" L-867B Deep Base

18\*\*= Suitable for 12" Shallow Base and 12" L - 868B Deep Base

# Electrical System: -

0 = No Mounting Assembly

R = Adaptor Ring 8"-12" dia

#### Monitoring:

0 = Without Monitoring

M = With Monitoring

#### Arctic Kit: -

0 = Without Arctic Kit

A = With Arctic Kit

(\*) Supply cable L=22 cm

(\*\*) Supply cable L=46 cm

Figure 5 - L-868 Deep Base 12" dia.



# **RENEWAL PARTS FOR LIGHT UNIT**

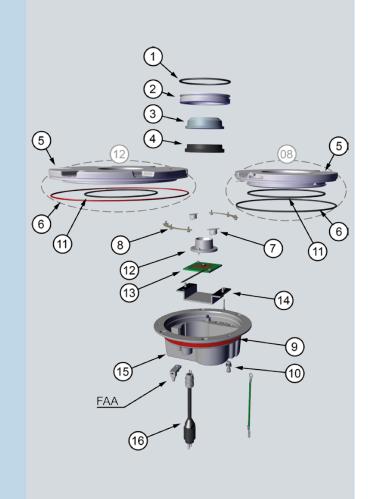
No	. Description Qty
1	O-Ring for aluminum lens holder
2	Aluminum lens holder1
3	Lens1
4	Lens gasket1
5	Dome1
6	O-Ring for dome1
7	Arctic kit thermostat1
8	Arctic kit heater1
9	Lower cover1
10	Valve for watertightness test1
11	O-Ring for lower cover1
12	Reflector with hardware1
13	LED module with accessories1
14	LED module support with hardware1
15	Lower cover gasket1
16	FAA L-823 plug1

Refer to the relevant technical manual for the complete list of the available spare parts.

# **ACCESSORIES**

315.1228	Base L-867, Class IA, size B, 24" Deep			
315.1230	Base L-868 type, class IA, size B, 24" deep*			
315.1420	Flange ring with pavement dam for L-868 base, size B, with O-Ring and bolts			
152.5251	Shallow base, 8" dia., one cable lead, with hardware			
152.8110	Shallow base, 12" dia., one cable lead, with gasket and hardware			
152.6116	Adaptor Ring 8"-12" dia. complete with hardware			
GMMMN0076 Adaptor Ring 8"-12" dia. complete with hardware for FAA versions				
712.1034	Setting material for shallow base, 10 lt			
712.1035	Quartz for shallow base, 25 kg			
332.4301	Positioning jig for 8"-12" dia. shallow base, without optical device			
332.4140	Lifting tool (2 pieces to work properly)			
332.4230	Lifting tool with double hook			
(*) Sectional bases may be required depending upon the paving				

# **EXPLODED VIEW DRAWING**



For information about isolating transformers and connectors, please see the specific catalogue pages.

# **SHIPPING WEIGHTS AND VOLUMES**

		Light unit	Light unit& adaptor ring	Shallow base
Weight [lbs (kg)]	8" 12"	0.0 (0.0)	13.6 (6.15)	7 (3.2) 16 (7.3)
Volume [ft³ (m³)]	8" 12"	0.24 (0.007) 0.78 (0.022)	0.45 (0.013)	0.24 (0.007) 0.78 (0.022)

technique