

Low Intensity

OBSTA STI



The **OBSTA STI** is an obstruction light for hazard to low-flying aircraft (chimney, transmission lines, towers) powered through 48 V or 24 VDC.

The **OBSTA STI** based on cold neon discharge principle offers high reliability, robustness in hostile environment (EMC, climatic...), proven long life on all kinds of obstacle like transmission lines, TV towers and exposure in electromagnetic fields and high temperature.

Application

The OBSTA STI falls into the low intensity type A following ICAO definition.

The principle of cold neon discharge offers :

- inherent generation of the «aviation» red,
- a very long lifetime,
- excellent luminous intensity with a vertical beam much larger than ICAO and FAA requirement,
- low power consumption,
- and compared to led light, a constant luminous intensity whatever is ambient temperature and EMC.

The OBSTA STI takes its power from a DC source which means its power supply can be a back-up source (batteries) to ensure continuous beaconing (see Battery cabinet datasheet).

Description

The OBSTA STI is a one piece moulded assembly which includes a constant power converter and the proper discharge lamp (5 turns).

The OBSTA STI includes :

- a clear glass envelope,
- a constant-power converter,
- perfect watertightness,
- no requirement for a ground connection, which avoids any voltage return from the earth (for example due to lightning). The overall is thus considerably improved.

The OBSTA STI also includes :

- protection against transient overvoltage,
- circuitry to monitor the operation of the lamp and, in the event of failure, to trigger an alarm or light up an auxiliary lamp (if active redundancy circuits are used).

The OBSTA STI is easy to install and requires no servicing.

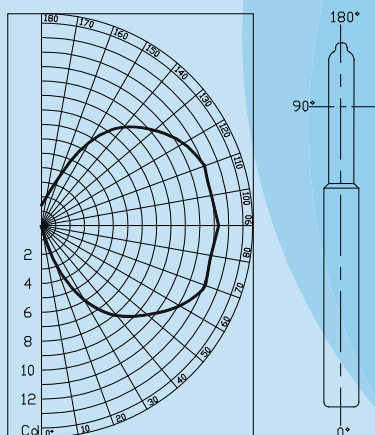
In option, explosionproof OBSTA STI is also available.

Main Characteristics

Obsta part number	Power supply	Luminous intensity	Consumed current	Nominal power	Typical lifetime
STI ref. 13200	48V DC	> 10 Cd	250 mA	12W	100 000 h
STI ref. 13300	24V DC	> 10 Cd	500 mA	12W	100 000 h

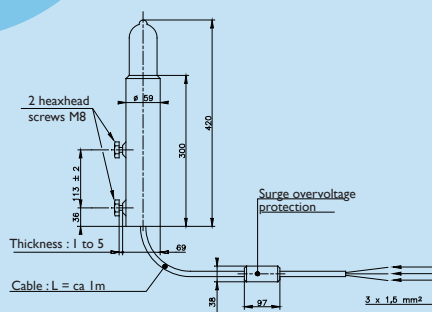
Complementary Characteristics

Light intensity diagram



	STI
IP degree	66
Operating temperature	-20 + 60°C
Supply voltage	24 or 48V (-10 ; + 15%)
Weight	1,5 kg
Attachment	by 2 screws (tightening thickness 1 to 5 mm)
Raccordement	on bare wires (2 power wires, 1 alarm)

Overall dimensions (in mm)



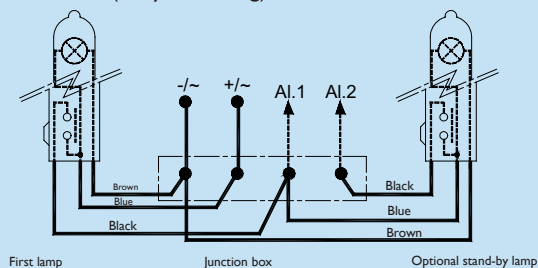
Specific precaution

For chimney installations, secure the lamp beneath the top (1,5 to 3 meters) in accordance with ICAO's recommendations.

For installation with RFI risk, the power supply cable must be shielded.

Complementary functions

- out of order alarm (relay switching),



- automatic emergency lamp configuration enabling automatic control of an emergency lamp and/or an alarm in case of a fault with the main lamp (active redundancy),

- control by crepuscular photoelectric cell,

- EMC specification EN 55011 class B.