

TrueAlert Addressable Notification Appliances

Multi-Candela Visible Only (V/O) Amber Lens Ceiling Mount Strobes for Emergency Communications

Features

Figure 1: Ceiling Mount Addressable Amber Lens V/Os



Individually addressed and controlled multi-candela V/O (visible only) notification appliances provide:

- Amber lens with "ALERT" lettering produces a signal unique from clear lens fire alarm evacuation strobes for use with Emergency Communications Systems
- Multi-candela xenon strobe with synchronized 1 Hz flash rate and with intensity *programmable from the control panel* or jumper selected as 15, 30, 75, or 110 cd
- Advanced addressable notification controlled by IDNAC SLCs from Autocall 4100ES fire alarm control panels with EPS/EPS+ power supplies (and 4009 IDNAC Repeaters) providing *regulated 29 VRMS* allowing strobes to operate with lower current even under battery backup
- Separate device type allows connection on same SLC as clear lens strobes with independent operation; clear strobes for Fire Alarm, amber strobes for Alert (Operation is clear/Fire **OR** amber/Alert, **not both**)
- Wiring supervision to each strobe allowing "T-tapped" connections for Class B circuits to simplify wiring (Class A circuits require in/out wiring)
- *TrueAlert Device Reports* at the control panel detailing appliance point ID, custom label, type, and candela setting
- *Magnet test diagnostics* to assist checkout and testing of appliances and wiring
- Compatibility with ADA requirements
- Compatibility with legacy TrueAlert addressable systems for upgrade and replacement
- UL listed to Standard 1638 (due to non-white lens); verified by UL testing to provide light dispersion patterns of UL Standard 1971 at rated candela (no derating necessary for amber lens)
- ULC listed to Standard S526

LED indicator and magnet test feature

- Appliance LED can be selected to display each polling cycle to indicate appliance supervision
- In diagnostic mode, the magnet test pulses the LED to indicate appliance address *AND pulses to indicate the intensity selection*; a brief output of the strobe is also selectable to confirm operation

Mechanical design features

- Rugged, high impact, flame retardant thermoplastic white housing
- Rear of housing does not extend into box and easily mounts to standard electrical boxes
- Options include box adapters and red wire guards

Description

Convenient installation to standard electrical boxes

Multi-Candela TrueAlert addressable amber lens strobes provide convenient installation to standard electrical boxes. The strobe is individually addressed and individually controlled with power, supervision, and control supplied from a Autocall fire alarm control panel providing IDNAC Signaling Line Circuits (SLCs).

These amber lens multi-candela strobes provide non-fire alarm alert notification for use with Emergency Communications systems where additional response information is provided by audio or textual appliances.

Strobe Application Reference

Amber strobes used as part of an Emergency Communications system are located to provide the same area coverage as required of clear lens fire alarm strobes. Specific Emergency Communications requirements are discussed in detail in document UFC 4-021-01 (USA Department of Defense, United Facilities Criteria) and in NFPA 72, Chapter 24 (2010 and 2013 editions).

Proper strobe coverage criteria is further described in the *National Fire Alarm Code* (NFPA 72), ANSI A117.1; the appropriate model building code: BOCA, ICBO, or SBCCI; and the application guidelines of the Americans with Disabilities Act (ADA).

IDNAC SLC Operation Advantage

Visible notification using a single two-wire circuit

TrueAlert V/O Appliances with Addressable Amber Strobes on IDNAC SLCs provide visible notification using a single two-wire circuit that also confirms connection to the individual notification appliance's electronic circuit. This operation increases circuit supervision integrity by providing supervision that extends beyond the appliance wiring connections.

Reduced current

Reduced current allows efficient IDNAC SLC operation. With IDNAC SLCs, a constant 29 VRMS source voltage is maintained, even during battery standby, allowing strobes to operate at higher voltage with lower current and ensuring a consistent current draw and voltage drop margin under both primary power and secondary battery standby. Efficiencies include wiring distances up to 2 to 3 times farther than with conventional notification, or support for more appliances per IDNAC SLC, or use of smaller gauge wiring, or combinations of these benefits, all providing installation and maintenance savings with high assurance that appliances that operate during normal system testing will operate during worst case alarm conditions.

Reducing installation and testing time

With separate controls on the same two-wire SLC, installation time and expense for both retrofit and new construction can be significantly reduced. When Class B wiring is used, wiring can be "T" tapped, allowing more savings in distance, wire, conduit (size and utilization), and overall installation efficiency. Use of the magnet test feature improves installation efficiency. TrueAlert device reports conveniently identify information about each connected appliance.

* This product has been approved by the California State Fire Marshal (CSFM) pursuant to Section 13144.1 of the California Health and Safety Code. See CSFM Listings 7300-2269:0556 and 7300-2269:0553 for allowable values and/or conditions concerning material presented in this document. Additional listings may be applicable; contact your local product supplier for the latest status.

TrueAlert Addressable Diagnostics

Test Features

Controllers can be selected to pulse each appliance's LED when it receives a supervision poll. When the controller is selected for diagnostic mode, the appliance magnet test feature provides a response at the individual appliance being tested.

Silent Appliance Magnet Test

In this test mode, in response to the magnet test, the appliance LED pulses sequentially to conveniently indicate the appliance's address.

Operational Appliance Testing

In this test mode, after the address is indicated by pulsing the appliance LED, the strobe will briefly flash to indicate proper operation.

TrueStart Instrument Two (TSIT)

The 2nd generation of the Autocall TrueStart Test Instrument adds testing of IDNAC SLC wiring and TrueAlert (and TrueAlert ES) appliances to its ability to test IDCs, NACs, and IDNet communications before connection to the control panel. Please contact your local Autocall representative for additional information.

TrueAlert Addressable Wiring Isolator

Isolator Model A4905-9929 is available for remote mounting on TrueAlert addressable circuits to isolate short circuited wiring from functioning wiring. Refer to data sheet *AC4905-0001* for additional information.

Product Selection

Table 1: Multi-Candela Addressable Strobe with Amber Lens

SKU	Description	Dimensions
A4906-9207	Multi-Candela Addressable Ceiling Mount Strobe, white with red "ALERT" lettering with amber lens; intensity selectable as: 15, 30, 75, or 110 candela	4 ¾" x 2 ⅝" x 2 ⅝" D (121 mm x 75 mm x 67 mm)

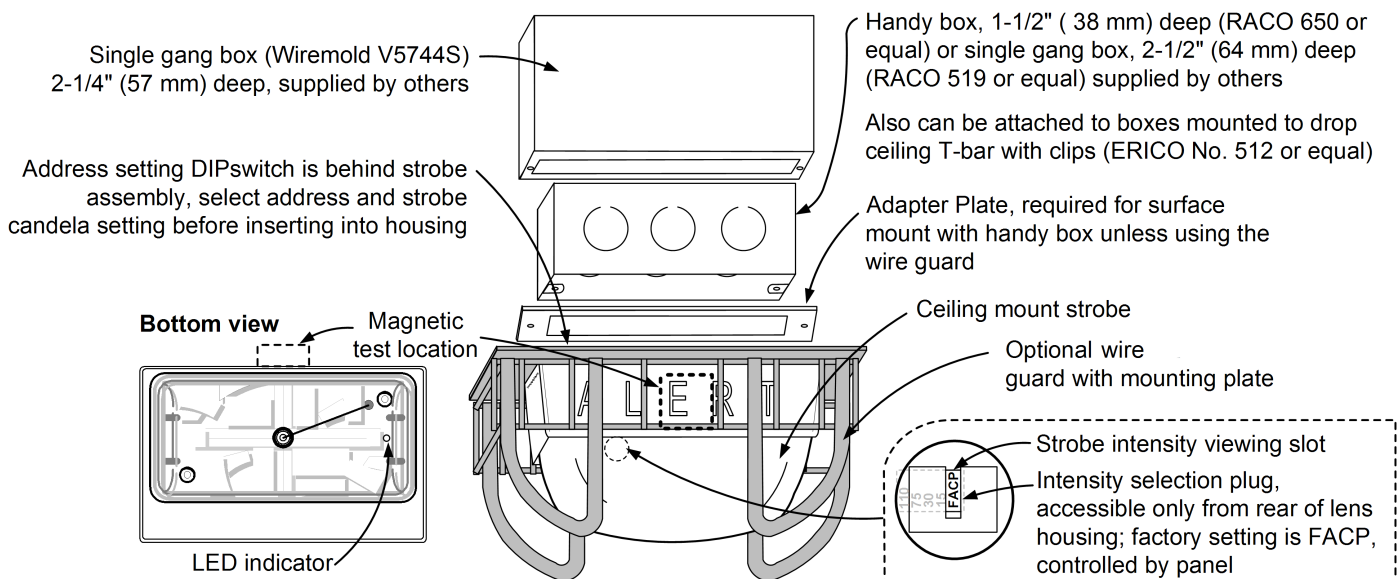
Table 2: V/O Adapter and Wire Guard

SKU	Description	Dimensions
4905-9910	Surface Mount Adapter Plate, zinc plated; required for ceiling surface mount boxes	4 ⅞" x 3 ⅛" (124 mm x 79 mm)
4905-9926*	Ceiling Mount red wire guard with mounting plate, compatible with semi-flush or surface mounted boxes	6 ⅞" x 4 ⅜" x 2 ⅞" (156 mm x 111 mm x 73 mm)

Note: * UL listed by Space Age Electronics Inc.

Ceiling Mount V/O and Guard Installation Reference

Figure 2: Ceiling Mount V/O and Guard Installation Reference



Note: Figure 2 shows the 4905-9910 Adapter plate used for surface mounting with the handy box. The optional 4905-9926 wire guard is also shown.

TrueAlert Amber Strobe and IDNAC SLC Controller Compatibility Reference

Table 3: TrueAlert Amber Strobe and IDNAC SLC Controller Compatibility Reference

Compatible Controller	Data Sheet Reference	Controller Output	IDNAC SLC Output Voltage	Appliance Voltage Design Reference
4100ES with EPS+ or EPS Power Supply	AC4100-0100	IDNAC SLC	29 VRMS (regulated)	23 VRMS (with 6 VRMS drop)
4009 IDNAC Repeater	AC4009-0004			

Specifications

Table 4: Common Specifications

Specification	Rating
Environmental	32° to 122° F (0° to 50° C); 10% to 93%, non-condensing at 100° F (38° C)
Connections	Terminal blocks for 18 AWG to 12 AWG (0.82 mm ² to 3.31 mm ²); two wires per terminal for in/out wiring
Installation Instructions	579-828AC

Table 5: Strobe Specifications

Specification	Rating				
Typical Operating Voltage Range	23 VRMS to 31 VRMS, Special Application (see below for 17 VRMS rating)				
Flash Rate and Synchronized SLC Loading	1 Hz; with up to 46 synchronized strobes maximum per NAC; maximum 30 Ω resistance between appliances				
23 VRMS Current Ratings, for connection to IDNAC Addressable SLCs	Candela Setting	15 cd	30 cd	75 cd	110 cd
		60 mA	95 mA	212 mA	277 mA

TrueAlert Strobe LEGACY Compatibility Reference

Table 6: TrueAlert Strobe LEGACY Compatibility Reference

Compatible Controller	Data Sheet Reference	Controller Output	Available Strobe Intensity	Appliance Voltage Minimum
4100ES or 4100U with TrueAlert Power Supply	AC4100-0031	TrueAlert Addressable SLC	15, 30, 75, and 110 cd	17 VRMS
4009 TPS, Remote TrueAlert Power Supply	AC4100-0037			
TrueAlert Addressable Controller (4009T)	AC4009-0003			

Table 7: Electrical Ratings Difference for Retrofit Applications

Voltage Range	Rating			
17 VRMS Current Ratings, use when connected to TrueAlert Addressable SLCs per above	17 VRMS to 31 VRMS, Special Application			
	Candela Setting	15 cd	30 cd	75 cd
	79 mA	128 mA	282 mA	390 mA

