# LTRE22

Type

Date

# 2' × 2' Transition® Enclosed LED Deep Architectural Center Lens



create**change** 

### **FEATURES**

- Enclosed high efficiency lens features linear prism acrylic and provides visual comfort and high performance without pixelation
- Appropriate for schools, medical facilities, dining areas, locker rooms, and public spaces
- Enclosed lens protects against intrusion of contaminants
- High performance matte white paint standard
- Optional Antimicrobial® paint (AM option) resists bacterial growth on exposed painted surfaces.
- Lens gasket option and wet location listing available
- 60,000 hour LEDs at L80 for reduced life cycle maintenance costs
- Four LED color choices with excellent color consistency and 82 CRI
- Controls compatible for code compliance and energy savings
- Low W/ft2 ratio typically meets most restrictive lighting power density codes
- Fixed output, step dimming, or 0-10V dimming drivers
- Electrical components accessible from below the ceiling with modular replaceability
- Five year warranty

# **PROJECT INFORMATION**

**Project Name** 

Catalog No.

### **CEILING COMPATIBILITY**

Luminaire fits recessed exposed Grid ceilings (G); four integral NEC compliant T-bar clips are standard. Can be placed in Slot Grid (SG) style ceiling with regress 3/8" above ceiling plane. A Flange Kit (FK) accessory is available for recessed hard ceiling applications. Surface Mount (SM) option allows placement below ceiling plane. Cable Mount (CM) option allows suspension below ceiling plane.

### **CERTIFICATION**

All luminaires are built to UL 1598 and 2108 standards, and bear appropriate CSA labels. IC Label standard. Damp location label standard. Wet location listing available on grid lay-in ceiling type. Emergency-equipped fixtures are Dry Location unless specified. CSA certified to UL 924 standards with battery pack or DTS (Dimming Bypass Module) options. Adheres to LM79, LM80, and TM21 industry standards. The DTS, Dimming Bypass Module, is for emergency circuit control loads including sensors and wireless systems CSA certified to UL 924. See page 4 for wiring diagram.

### WARRANTY

Five year warranty (Terms and Conditions apply).

**CONSTRUCTION** 

Luminaire housing and end caps are die formed code gauge cold rolled steel. Reflector is stiffened with linear forms, profiled to a precision curve. High transmission extruded acrylic enclosed lens features linear prisms custom frost for high efficacy without pixelation.

### **SHIELDING**

Thermoplastic light seals snap into the housing at both ends of the lens to prevent light leaks. Lens hinges down for easy access to LED module and electrical components. Optional gasketing available to surround the lamp cavity (standard when Wet Location option is ordered; see footnotes).

### **FINISH**

All reflective surfaces are finished after fabrication with unique formula high reflectivity matte white paint for soft, uniform indirect illumination. Optional Antimicrobial® paint (AM option) resists bacterial growth on exposed painted surfaces.

## INSTALLATION

An access plate is furnished with each luminaire for fast wiring access without the necessity to open the fixture

# **ORDERING INFORMATION**

# **EXAMPLE LTRE22-35HLG-RFA-ESDU**

Lumens3,

GLR Fast Blow Fuse

C388 3-Wire Flex

C488 4-Wire Flex

C588 5-Wire Flex

**GTD** Generator Transfer Device<sup>5</sup>

DTS Dimming Bypass Module<sup>6</sup>

AM Antimicrobial® Paint7

row mounting.)

CP Chicago Plenum

**G1** Lens Gasketing WL Wet Location4

**OPTIONS** 

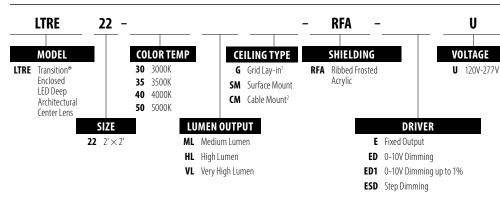
**ELL14** Emergency Battery Pack Installed, 1400

EOR End of Row (SM and CM only. Provides

end wiring access for continuous row

ends with wiring access for continuous

INT Intermediate (SM and CM only, Provides



# **ACCESSORIES** (ORDER SEPARATELY)

 $2' \times 2'$  Single Flange Kit (Shipped separately)

CM48Y2SC3F-KIT 48" Cable Mount Kit for 2' wide

Cable Mount fixtures, 3 Wire

<sup>3</sup> For compatibility with Dual-Lite LiteGear® inverters in lieu of installed battery pack, contact representative.

PRODUCT AVAILABILITY					
SIZE	LUMEN PACKAGE	NOMINAL LUMENS	NOMINAL WATTS	LUMENS PER WATT	
22	ML	2975-3100	30	100-104	
22	HL	3625-3875	36	101-108	
22	VL	4275-4925	44	98-112	

Nominal lumen range represents 3000K through 5000K. Lumens will vary according to color temperatures and other factors. See specific photometric tests(s)

<sup>2</sup> Order hanger accessories separately.

Current @

<sup>1</sup> For drywall order FK22 accessories separately.

<sup>&</sup>lt;sup>5</sup>GTD available for E (fixed output) driver option only

<sup>&</sup>lt;sup>6</sup>For emergency circuit control loads including sensors and wireless systems CSA certified to UL 924. Only available with 0-10V drivers. See page 4 for wiring diagram

<sup>&</sup>lt;sup>7</sup> Optional Antimicrobial® paint (AM option) resists bacterial growth on exposed painted surfaces

<sup>&</sup>lt;sup>4</sup> Not available on Surface Mount or Cable Mount ceiling types



# PHOTOMETRIC DATA

### **LUMINAIRE DATA**

Luminaire	LTRE22-35MLG-RFA-EDU
	LTRE Transition® Enclosed LED Deep Architectural Center Lens
	2 x 2 led with frosted linear prismed lens
Ballast	VD EVERLINE D10CC55UNVT-C
Ballast Factor	1.00
Lamp	LED
Fixture Lumens	2988
Watts	29.23
Mounting	Recessed
Shielding Angle	0° = 90 90° = 90
Spacing Criterion	0° = 1.17 90° = 1.30
Luminous Opening	Length: 1.93
in Feet	Width: 1.93
	Height: 0.00

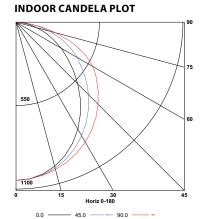
### **ZONAL LUMEN SUMMARY**

Zone	Lumens	% Lamp	% Fixt.
0-30	803	26.9	26.9
0-40	1308	43.8	43.8
0-60	2307	77.2	77.2
0-90	2988	100.0	100.0
0-180	2988	100.0	100.0

# **ENERGY DATA**

Total Luminaire Efficiency	100.0%
Total Lumens per Watt	102
IESNA RP-1-1993 Compliance	Non-Compliant
Comparative Yearly Lighting Energy Cost per 1000 Lumens	\$2.33 based on 3000 hrs. and \$0.08 per KWH

Test L091401901 Test Date 9/15/2014



### Test L081406001 Test Date 8/21/2014

# **LUMINAIRE DATA**

Luminaire	LTRE22-35HLG-RFA-EDU	
	LTRE Transition® Enclosed LED Deep Architectural Center Lens	
	2 x 2 led with frosted linear prismed lens	
Ballast	EVERLINE D15CC55UNVT-C	
Ballast Factor	1.00	
Lamp	LED	
Fixture Lumens	3640	
Watts	36.17	
Mounting	Recessed	
Shielding Angle	0° = 90 90° = 90	
Spacing Criterion	0° = 1.16 90° = 1.29	
Luminous Opening	Length: 1.93	
in Feet	Width: 1.93	
	Height: 0.00	

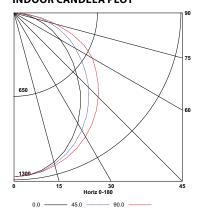
# **ZONAL LUMEN SUMMARY**

Zone	Lumens	% Lamp	% Fixt.
0-30	982	27.0	27.0
0-40	1597	43.9	43.9
0-60	2805	77.1	77.1
0-90	3640	100.0	100.0
0-180	3640	100.0	100.0

# **ENERGY DATA**

Total Luminaire Efficiency	100.0%
Total Lumens per Watt	101
IESNA RP-1-1993 Compliance	Non-Compliant
Comparative Yearly Lighting Energy Cost per 1000 Lumens	\$2.38 based on 3000 hrs. and \$0.08 per KWH

# **INDOOR CANDELA PLOT**



### Test L071409403R01 Test Date 8/11/2014

# **LUMINAIRE DATA**

Luminaire	LTRE22-35VLG-RFA-EDU LTRE Transition® Enclosed LED Deep Architectural Center Lens 2 x 2 led with frosted linear prismed lens
Ballast	D15CC55UNVT-C
Ballast Factor	1.00
Lamp	LED
Fixture Lumens	4278
Watts	43.80
Mounting	Recessed
Shielding Angle	0° = 90 90° = 90
Spacing Criterion	0° = 1.16 90° = 1.30
Luminous Opening in Feet	Length: 1.93 Width: 1.93 Height: 0.00

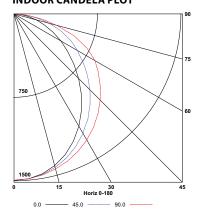
# **ZONAL LUMEN SUMMARY**

Zone	Lumens	% Lamp	% Fixt.
0-30	1152	26.9	26.9
0-40	1875	43.8	43.8
0-60	3300	77.1	77.1
0-90	4278	100.0	100.0
0-180	4278	100.0	100.0

### **ENERGY DATA**

Total Luminaire Efficiency	100.0%
Total Lumens per Watt	98
IESNA RP-1-1993 Compliance	Non-Compliant
Comparative Yearly Lighting Energy Cost per 1000 Lumens	\$2.47 based on 3000 hrs. and \$0.08 per KWH

# INDOOR CANDELA PLOT

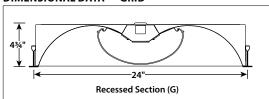


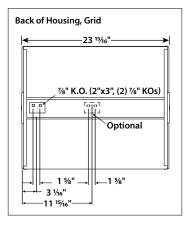




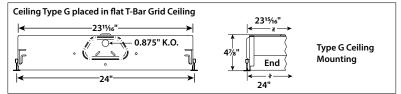


### **DIMENSIONAL DATA — GRID**

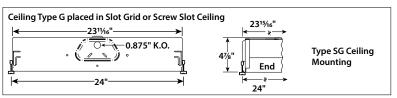




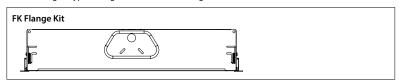
### **CEILING COMPATIBILITY**



For lay-in installation in exposed grid ceilings. Maximum tee widths of 1" and maximum heights of



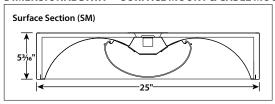
For %6" slot grid type ceilings. Luminaire will be regressed 3/8" above horizontal surface of the tee.

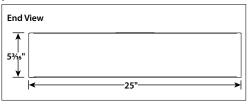


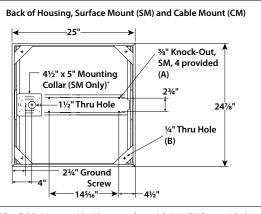
For hard ceiling applications, fixtures must be ordered with a flange kit that wires directly into the concealed ceiling opening for a clean finished appearance. For row configurations contact your local Columbia Representative.

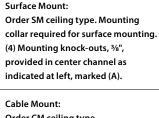
Flange kit cut out dimension for single FK22: 24 3/8" x 24 3/8"

## **DIMENSIONAL DATA — SURFACE MOUNT & CABLE MOUNT**









Order CM ceiling type. Use CM48Y2SC3F-KIT 48" Cable Mount Kit for 2' wide CM fixtures. Mounting holes are provided in diagonal straps shown at left, marked (B).

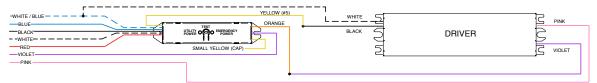
NOTE: All dimensions are in inches; dimensions and specifications are subject to change without notice. Please consult factory or check sample for verification.

<sup>\*</sup> For Cable Mount a 2" x 3" access plate with (4) 7/8" KOs provided in place of Mounting Collar shown.

LTRE22



# DTS WIRING DIAGRAM (0-10V DIMMING DRIVER SHOWN)



WHITE/BLUE	Emergency Neutral
BLUE Emergency Line	
BLACK Utility Line (Unswitched Hot	
WHITE	Utility Neutral
RED	Switched Hot
VIOLET	Dimming
PINK	Dimming