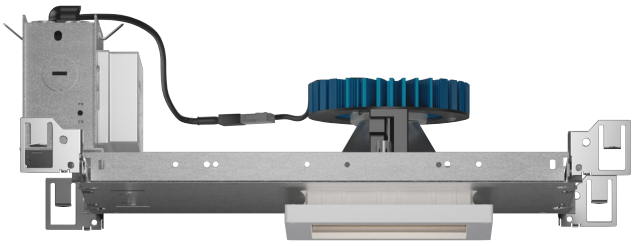
alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

NU4

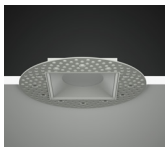
4" Square Downlight
Tamper Resistant Standard White

NSF · AT airtight · DF dead-front · PR plenum rated · wet rated · IK10





Trim



Trimless



Trimless Millwork

60° - 80° BEAM (Note: Specifications are subject to change without notice)		
14mm COB PERFORMANCE DATA		
LED LIGHT ENGINE	**NOMINAL DELIVERED LUMENS**	**SYSTEM WATTAGE**
10LM	840LM @30K/80CRI	9W
15LM	1200LM @30K/80CRI	14W
20LM	1680LM @30K/80CRI	16W
25LM	2000LM @30K/80CRI	20W
30LM	2520LM @30K/80CRI	24W
35LM	2940LM @30K/80CRI	28W
40LM	3360LM @30K/80CRI	32W
10LM	710LM @30K/90CRI	9W
15LM	1020LM @30K/90CRI	14W
20LM	1420LM @30K/90CRI	16W
25LM	1700LM @30K/90CRI	20W
30LM	2100LM @30K/90CRI	24W
35LM	2500LM @30K/90CRI	28W
40LM	2850LM @30K/90CRI	32W
Notes	Delivered lumens based on WH80 optic with no lens, (see page 2)	

FEATURES
- Designed to meet NYS-OMH rigorous requirements
- Tamper resistant, anti-ligature
- IK10 impact rated, vandal resistant
- Optical beam control 30° to 65°
- UGR <15
- Microban antimicrobial finish available on all exposed painted surfaces

DIMMING AND CONTROLS
- eldoLED flicker free 0-10V dimming to 0% and 1%
- eldoLED flicker free DALI dimming to 0% and 1%
- DMX dim to zero
- Lutron Hi-lume Eco System dimming to 0.1% and 1%
- Leading & trailing edge (Triac/ELV) dimming to 1%
- Casambi dimming to 1%
- NLight control interface dimming to 0%

CONSTRUCTION
- Spun Aluminum 6061 lensing frame
- 18-8 stainless steel tamper resistant screws
- Polycarbonate (3mm) shatter resistant lensing
- Electrocoated 16-gauge cold rolled steel construction
- Accommodates ceiling thickness from 1/8" to 1-5/8"

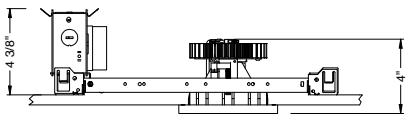
LED
- 90 CRI: SDCM = 2-step MacAdam Ellipse, Lumen Maintenance: L_{70} > 66,000 hrs
- 80 CRI: SDCM = 2-step MacAdam Ellipse, Lumen Maintenance: L_{70} > 66,000 hrs

LISTING
- ULus Listed to UL1598 & UL2108; cUL Listed to CSA C22.2 #250.0
- IP65 with lens - Suitable for wet locations
- Non-conductive, dead-front construction (shower approved)
- NSF/ANSI-2 with lens (Non-Food and Splash Zones)
- NYSOMH - New York State Office of Mental Health compliant
- **Declare.** - LBC Red List Approved
- 5 Year Limited warranty

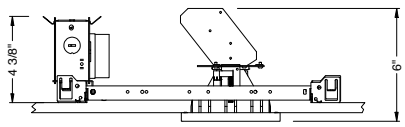
ELECTRICAL
- 120V-277V, 120 only Triac / ELV
- Power factor ≥ 0.9
- 2kV driver input surge protection
- Remote emergency test switch
- 7W, 10W (T20 CEC) and 12W EM 90min battery
- Max. ambient installation temperature 95°F (35°C)

FIXTURE HEIGHT

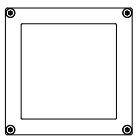
LED LIGHT ENGINE: 10LM - 30LM



LED LIGHT ENGINE: 35LM - 40LM

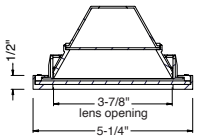


TAMPER RESISTANT



ceiling cutout
4-1/4" square

ceiling thickness
1/8" to 1-5/8 "



alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

60°- 80° BEAM ORDERING CODE

SERIES	**NU4**	NU4
TYPE	**QDTR**	square downlight tamper resistant
LED	**SW**	standard white
DELIVERED LUMENS	**10LM**	840 lm
	15LM	1200 lm
	20LM	1680 lm
	25LM	2000 lm
	30LM	2520 lm
	35LM	2940 lm
	40LM	3360 lm
	Standard Configuration: 3000K 80CRI WH80 **Calculated Delivered Lumens =** [Delivered Lumen Value] x [CCT Multiplier] x [Reflector Multiplier]	
CCT	**27K**	2700K
	30K	3000K
	35K	3500K
	40K	4000K

CCT	2700K		3000K		3500K		4000K	
CRI	80+	90+	80+	90+	80+	90+	80+	90+
CCT MULTIPLIER FOR LUMEN OUTPUT	0.96	0.81	1.00	.85	1.03	.88	1.06	.91

CRI	**80**	80 CRI	
	90	90 CRI	
OPTIC & LM MULTIPLIER SEE PAGE 3	**HE60**	60° high efficiency diffused lens	(0.94)
	HE70	70° high efficiency diffused lens	(0.98)
	HE80	80° high efficiency diffused lens	(0.97)
	D65	65° diffused with clear lens	(1.00)
	WH80	80° brilliant white with clear lens	(0.98)
TRIM COLOR SEE PAGE 3	**BK**	black	
	WH	white	
	MC	matte chrome	
	Antimicrobial finish, add **AM** to black, white or matte chrome i.e. BKAM.		
	Includes shatter proof lens and tamper resistant screws.		
BEZEL COLOR SEE PAGE 3	**BK**	black	(0.98)
	WH	white	(1.00)
	MC	matte chrome	(0.99)
	Antimicrobial finish, add **AM** to black, white or matte chrome i.e. BKAM.		

60°- 80° BEAM ORDERING CODE

MOUNTING OPTIONS SEE PAGE 5	**NC**	new construction with ceiling fitting plate
VOLTAGE	**120**	120V
	UNV	120V-277V
DIMMING	**DIM10**	eldoLED flicker free 0-10V dimming to 1%
	DIM10Z	eldoLED flicker free 0-10V dimming to 0%
	DALI	eldoLED flicker free DALI-2 dimming to 1%
	DALIZ	eldoLED flicker free DALI-2 dimming to 0%
	DMX-RJ45	DMX control dimming to 0.1% with RJ45 connection
	DMX-WL	DMX control dimming to 0.1% with wire lead connection
	DMX-XLR	DMX control dimming to 0.1% with XLR 5pin connection
	LUT	Lutron Hi-lume Ecosystem dimming to 1%, Soft-on & Fade-to-Black
	LUTP[1]	Lutron Hi-lume Premier Ecosystem dimming to 0.1%, Soft-on & Fade-to-Black
	ELV1[2]	leading & trailing edge (Triac/ELV) dimming to 1%
	NLT	nLight control interface: standard Cat-5/RJ45 connection (female), dim to off
	CAS	Casambi control with flicker free 1% dimming
ELECTRICAL OPTIONS	**EM7**	emergency battery backup, 90 minutes at 7W to LED
	EM12	emergency battery backup, 90 minutes at 12W to LED
	EM10CA20	remote emergency battery backup, 90 minutes at 10W to LED, CA title 20

ADDITIONAL MOUNTING INFO	
New Construction Bar Hangers (included)	Mounting Length: 14-3/4" to 26"
Extension Kit p/n: K20266 (ordered separately, 1 per fixture)	*Extends a pair of Bar Hangers* Total Mounting Length: 29" to 48"

YOUR COMPLETED ORDERING CODE

Follow the steps to specify your fixture, example:

NU4 - QDTR - SW - 20LM - 35K - 90 - HE60 - WH - WH - NC - UNV - DIM10

NOTES

1. LUTP not available in 25LM/30LM/40LM.
2. ELV1 (120V) not available in 10LM.

* EldoLED driver uses logarithmic dimming curve as standard. For linear dimming curve add "LIN" after dimming code, i.e. DIM10LIN.

In a continuing effort to offer the best product possible we reserve the right to change, without notice, specifications or materials that in our opinion will not alter the function of the product.

alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

TRIM OPTIONS

TRIM COLORS



WH BK MC

OPTICAL OPTIONS

- UGR calculation based on CIE 117-1995; room size: 4H X 8H, reflectance: 70/50/20;
- UGR calculation based on 15LM fixtures, unless otherwise noted.

CL
Clear Lens



OPTIC	BEAM ANGLE	UGR
D65	68	20.1
WH80	77	22.8

HET
High Efficiency Textured Lens



OPTIC	BEAM ANGLE	UGR
HE60	67	22.5
HE70	74	22.8
HE80	82	24.2

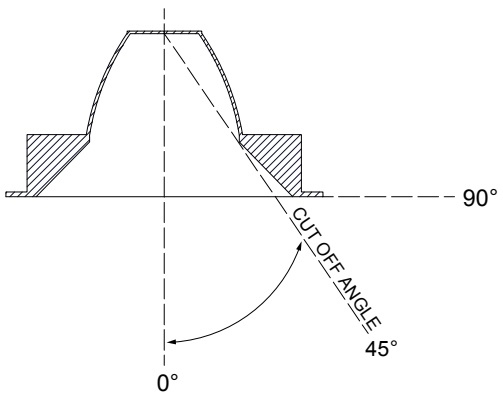
GLARE CONTROL

CUT-OFF ANGLE

Visual comfort is achieved with a lower cut-off angle due to improved glare control. The smaller the cut-off angle, the easier it is on the eye.

Alphabet downlights have been thoughtfully engineered to eliminate glare while still delivering functional illumination.

- Cutoff angle of NL and CL is 45.5 degrees;



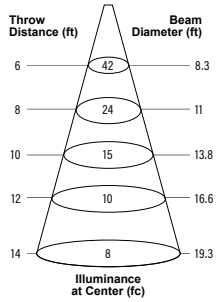
alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

PHOTOMETRIC DATA

20LM CCT MULTIPLIERS		
	80CRI	90CRI
2700K	.96	.81
3000K	1	.85
3500K	1.03	.88
4000K	1.06	.91
FC Formula = CBCP / Distance^2		

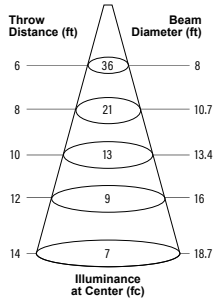
D65 — 69° DIFFUSED WITH CLEAR LENS



WATTS: 16.2	LPW: 104.9
LUMENS: 1700	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	1507
5	1487
15	1327
25	1060
35	734
45	165

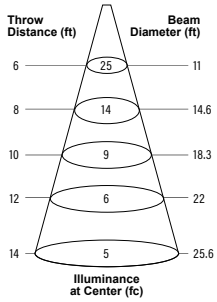
HE60 — 67° HIGH EFFICIENCY DIFFUSED LENS



WATTS: 16.2	LPW: 104.3
LUMENS: 1689	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	1312
5	1291
15	1137
25	896
35	619
45	310

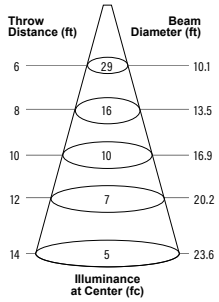
HE80 — 85° HIGH EFFICIENCY DIFFUSED LENS



WATTS: 16.2	LPW: 103.2
LUMENS: 1672	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	906
5	901
15	856
25	766
35	622
45	387

WH80 — 80° BRILLIANT WHITE WITH CLEAR LENS

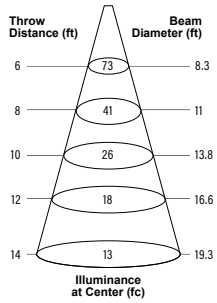


WATTS: 16.2	LPW: 109.2
LUMENS: 1769	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	1028
5	1025
15	996
25	925
35	799
45	296

40LM CCT MULTIPLIERS		
	80CRI	90CRI
2700K	.96	.81
3000K	1	.85
3500K	1.03	.88
4000K	1.06	.91
FC Formula = CBCP / Distance^2		

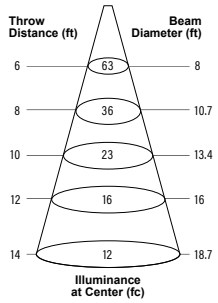
D65 — 69° DIFFUSED WITH CLEAR LENS



WATTS: 30.4	LPW: 97.2
LUMENS: 2956	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	2621
5	2585
15	2307
25	1844
35	1277
45	287

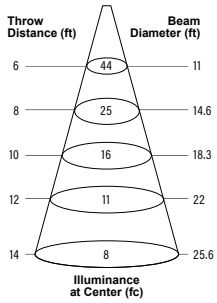
HE60 — 67° HIGH EFFICIENCY DIFFUSED LENS



WATTS: 30.4	LPW: 96.6
LUMENS: 2937	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	2281
5	2245
15	1977
25	1558
35	1076
45	538

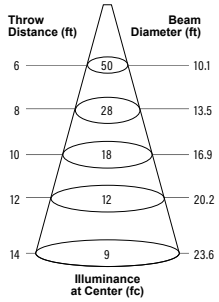
HE80 — 85° HIGH EFFICIENCY DIFFUSED LENS



WATTS: 30.4	LPW: 95.6
LUMENS: 2907	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	1576
5	1566
15	1489
25	1333
35	1081
45	673

WH80 — 80° BRILLIANT WHITE WITH CLEAR LENS



WATTS: 30.4	LPW: 101.1
LUMENS: 3075	CCT: 3000K

INTENSITY	
DEGREE	CANDELA
0	1788
5	1782
15	1731
25	1609
35	1389
45	514

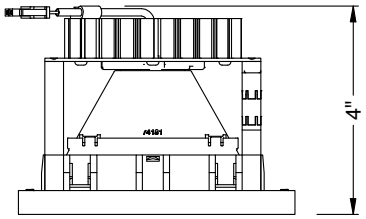
alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

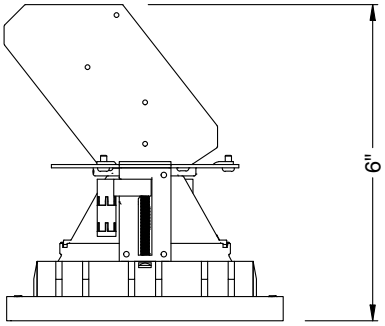
MOUNTING OPTIONS

FIXTURE HEIGHT

10LM-30LM CONFIGURATIONS

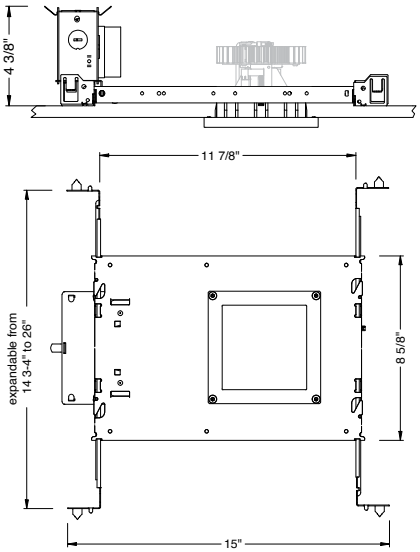


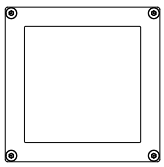
35LM-40LM CONFIGURATIONS



NC - NEW CONSTRUCTION

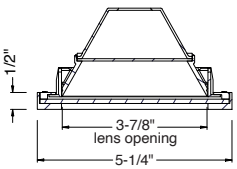
LED LIGHT ENGINE 10LM-30LM



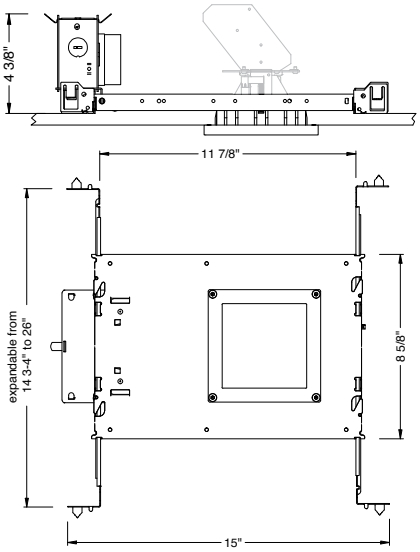


ceiling cutout
4-1/4" square

ceiling thickness
1/8" to 1-5/8 "



LED LIGHT ENGINE 35LM-40LM



alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

MOUNTING OPTIONS (CONTINUED)

RATINGS / CERTIFICATIONS	NC	RET
TYPE NON-IC	✔	✔
TYPE IC		
CHICAGO PLENUM (CCEA)		
SUITABLE FOR AIR HANDLING PLENUMS		
REDUCED AIRFLOW (WITH LENS) ASTM E283	✔	✔

CEILING THICKNESS		
FIXTURE TYPE	MOUNTING TYPE	
	NC, RET	NC, RET
	CEILING THICKNESS	CEILING CUTOUT
TRIM	3/8" to 1-5/8"	4-1/4" square

In a continuing effort to offer the best product possible we reserve the right to change, without notice, specifications or materials that in our opinion will not alter the function of the product.

alphabet

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

BATTERY OPTIONS

EMERGENCY BATTERY

IOTA's ILB Battery Backups are UL Listed LED emergency drivers that allow the same LED fixture to be used for both normal and emergency operation. In the event of a power failure, the ILB switches to the emergency mode and operates the existing fixture for 90 minutes. The unit contains a battery, charger, and converter circuit in a single can. The Constant Power design of the ILB maintains the output wattage to the LED array even as the system voltage diminishes. UL 924 Listed for U.S. and Canada. UL 1310 Certified, Output Class 2 Compliant. Includes single-piece TBTS test switch and charge indicator accessory kit. For use with switched and unswitched fixtures, and includes Two-wire universal AC input. Meets or exceeds all National Electric Code and Life Safety Code Emergency Lighting Requirements. Rated for use in Plenum, Damp Location, Recessed Type IC, and Enclosed and Gasketed Luminares.

REMOTE TEST SWITCH

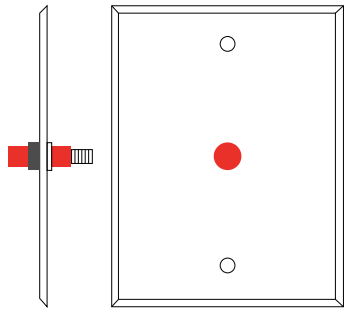
The Remote Test Switch may be mounted adjacent to the LED Fixture by others.

EMERGENCY BATTERY ACCESS

Above ceiling access is required for service. An access panel in the ceiling (or other form of access) adjacent to the installation location of the Emergency Battery is required.

REMOTE LOCATION

Maximum remote mounting distance of the emergency driver shall be 50 feet. Remote location wiring provided by others. Follow all Local and National Electric/ Building Codes.

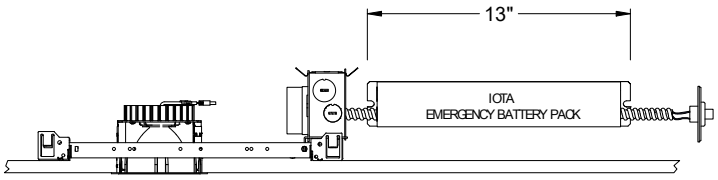


Remote Test Switch

EM MODE OUTPUT (DELIVERED LUMENS)			
LUMEN ORDERING CODE	EM7	EM10	EM12
ALL OPTIONS (10LM TO 40LM)	650LM	930LM	1000LM
Notes: Based on 30K, 80CRI			

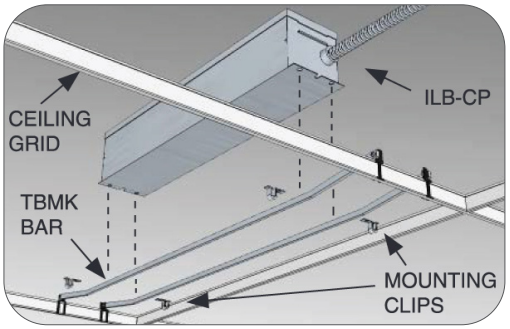
NC - NEW CONSTRUCTION

WITH EM BATTERY (REMOTE TEST SWITCH)



Accessory

76066 Optional T-Grid Mounting Kit[1]



1. Can be used with any of the Emergency Battery Backups. Must be ordered as a separate line item.

In a continuing effort to offer the best product possible we reserve the right to change, without notice, specifications or materials that in our opinion will not alter the function of the product.