

JUNO®

Project: _____

Fixture Type: _____

Location: _____

Contact/Phone: _____

PRODUCT DESCRIPTION

Energy efficient LED retrofit module fits into installed 8" non-IC commercial recessed incandescent, CFL or H.I.D. rough-in sections • If installed where insulation is present, the insulation must be pulled back 3" from all sides of the retrofit installation • Replaces CFL lamps totaling 42W or greater, producing up to 2400 lumens typical at 27.5W • Dimmable • LED retrofit module is designed to provide 50,000 hours of life • 5 year warranty.

PRODUCT SPECIFICATIONS

LED Downlight Retrofit Trim Spun aluminum reflector and separate non-metallic trim ring with shadow free, knife edge design • All-in-one design where LED light engine is mounted directly to trim • Quick disconnect in-box allows for easy wiring of retrofit conduit whip assembly without reflector interference • Provided with conduit whip and connector to mount to 1/2" trade size knockout in junction box for ease of installation into existing rough-in sections • Provided with spring steel friction clips for mounting.

LED Light Engine Replaceable light engine is mounted directly to aluminum trim providing superior thermal management to ensure long life • LEDs are binned within a 3-step MacAdam Ellipse exceeding ENERGY STAR® requirements for superior fixture to fixture color uniformity • 2700K, 3000K, 3500K or 4000K LED color temperatures • 80 or 90 CRI minimum.

LED Driver Choice of dedicated 120 volt driver, universal voltage driver that accommodates input voltages from 120-277 volts AC at 50/60Hz or 347V driver • Power factor > 0.9 at 120V input • 120 volt only dimmable with the use of most incandescent, magnetic low voltage and electronic low voltage wall box dimmers • Universal voltage and 347V driver is dimmable with the use of most 0-10V wall box dimmers • For a list of compatible dimmers, see [JUNOJCLR-DIM](#).

Electrical Connections Trim includes conduit whip and connector to attach directly to 1/2" trade size knockout in junction box • All electrical connectors and hardware provided for easy installation after fluorescent socket and ballast are removed from rough-in sections.

Trim Spun aluminum trim with white or haze finish • Deeply regressed diffusing lens conceals the LEDs from direct view.

Life Rated for 50,000 hours at 70% lumen maintenance.

Labels ENERGY STAR® Certified • UL and cUL classified for use with most standard UL listed 8" non-IC commercial rough-in sections; see below for specific compatibility requirements • Damp location.

Testing All reports are based on published industry procedures; field performance may differ from laboratory performance.

Specifications subject to change without notice.

INSTALLATION

The JCLR8L & JCLR8S retrofit trim is provided with spring steel friction clips allowing for installation in a variety of 8" commercial recessed open frame rough-in sections with a ceiling thickness ranging from 1/2" to 1 1/8". Rough-in section inside diameter compatibility range:

JCLR8S: 7 13/16" – 8 5/16", **JCLR8L:** 8 5/8" – 9 1/8".

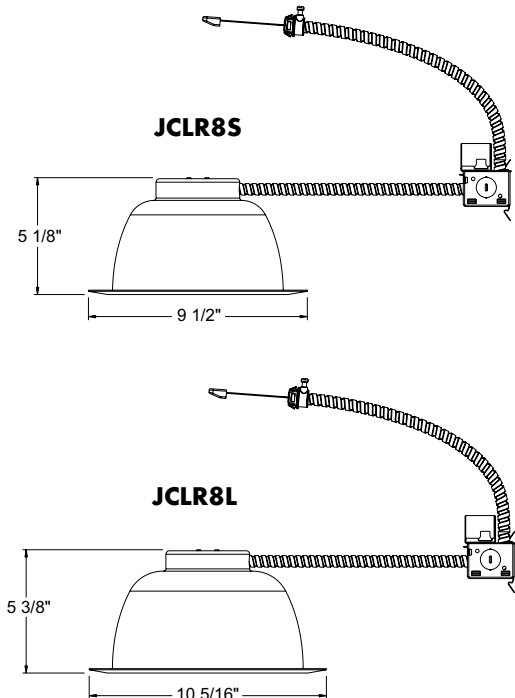
8" LED RETROFIT TRIM

DOWNLIGHT RETROFIT FOR 8" COMMERCIAL ROUGH-IN SECTIONS

JCLR8L & JCLR8S



DIMENSIONS



COMPATIBLE HOUSINGS FOR JCLR8S INCLUDE, BUT NOT LIMITED TO (Compatibility Range: 7 13/16" - 8 5/16")

Juno® Housings:	CV8, CH8, M8, M8-E, MX8, MX8-E, TC908, TC931, TC925
Indy™ Housings:	C8V, C8H, M8, MD8, A8, P8D
Portfolio® Housings:	C7018, C7042, C7118, C7126, C7142, C7242, C7113, C7213, C7218, MD750, 770, 7100, 7150, HD7
Hubbell® Housings:	LF8CFM, LF8CFH, LF8MH, LF8INC, CFT8, CFQ8, CFTD8, CFR8, RHD8, INC800, 84X
Lightolier® Housings	S7126BU, S7132BU, S7142BU, C770MH, C710MH, C715MH, C700

COMPATIBLE HOUSINGS FOR JCLR8L INCLUDE, BUT NOT LIMITED TO (Compatibility Range: 8 5/8" - 9 1/8")

Lithonia® Housings:	CCR82, 8HF, 8VF, 8VH, 8VI, LF8N, LP8FN, LP8HN, LP8N
Gotham® Housings:	8": AF, AFLP, AFV, AH, A (GRSO, LG)
Halo® Housings:	PD8H142, PD8H213, PD8H218, PD8H242, PD8V142, PD8P70, PD8V50, PD8V120
Portfolio® Housings:	C8042, C8142, C8242
Capri/Omega® Housings	OM8 Series

8" LED RETROFIT TRIM

DOWNLIGHT RETROFIT FOR 8" COMMERCIAL ROUGH-IN SECTIONS

JCLR8L & JCLR8S

ORDERING INFORMATION

Ordering Example: JCLR8S 15LM 27K 90CRI 120 FRPC HZWH

Series	Lumens	Color Temperature	Color Rendering Index
JCLR8L 8" Commercial LED Retrofit	15LM 1500 Nominal Lumens 18LM 1800 Nominal Lumens	27K 2700K 30K 3000K	80CRI¹ 80+ CRI 90CRI² 90+ CRI
JCLR8S 8" Commercial LED Retrofit	20LM 2000 Nominal Lumens 24LM 2400 Nominal Lumens	35K 3500K 40K 4000K	

Voltage	Driver	Trim Finish
120 120V	FRPC Forward/Reverse Phase	HZWH Haze, White Trim Ring
347 347V	ZT 0-10V Dimmable Driver	WWH White, White
MVOLT Multi-Volt		

Notes:

- 1 18LM and 24LM must be ordered with 80CRI
- 2 15LM and 20LM must be ordered with 90CRI

ENGINEERING DATA

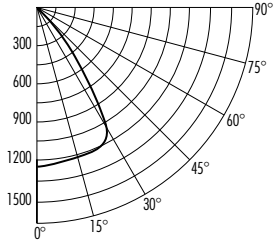
	Dedicated 120V (1)		Universal Voltage (U)		Dedicated 347V (3)	
	1500L/1800L	2000L/2400L	1500L/1800L	2000L/2400L	1500L/1800L	2000L/2400L
Lumens	1500L/1800L	2000L/2400L	1500L/1800L	2000L/2400L	1500L/1800L	2000L/2400L
Input Voltage	120V	120V	120-277V	120-277V	347V	347V
Input Power	20.3W (±5%)	27.5W (±5%)	19.9W (±5%)	27.3W (±5%)	21.8W (±5%)	27.9W (±5%)
Input Current	500mA	650mA	470mA	650mA	500mA	650mA
Frequency	50/60Hz		50/60Hz		50/60Hz	
Power Factor	>.90		>.90		>.90	
CRI	80/90CRI		80/90CRI		80/90CRI	
CCT	2700K, 3000K, 3500K, 4000K		2700K, 3000K, 3500K, 4000K		2700K, 3000K, 3500K, 4000K	

JCLR8L & JCLR8S

PHOTOMETRICS

PHOTOMETRIC REPORT

Test Report#: PT07162801R
 Catalog No: JCLR8S 18LM 35K 80CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.30
 Luminaire LPW: 94



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1262
5	1254
15	1238
25	1210
35	968
45	237
55	67
65	19
75	5
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	129	109	92
5'	82	70	59
6'	57	48	41
7'	46	39	33
8'	37	31	26
9'	28	24	20
10'	21	17	15

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1024	N/A	54.7
0-40°	1581	N/A	84.5
0-60°	1845	N/A	98.6
0-90°	1871	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 19.9W, 77.5° Beam)

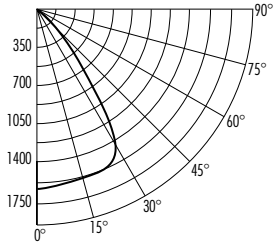
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	78.9	6.4
6'	35.1	9.6
8'	19.7	12.8
10'	12.6	16.1

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	13654
55°	4736
65°	1825
75°	713
85°	48

PHOTOMETRIC REPORT

Test Report#: PT07162802R
 Catalog No: JCLR8S 24LM 35K 80CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.30
 Luminaire LPW: 87



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1611
5	1601
15	1581
25	1547
35	1238
45	307
55	86
65	25
75	6
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	165	139	118
5'	105	89	76
6'	73	62	53
7'	59	50	43
8'	47	40	34
9'	36	30	26
10'	26	22	19

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1309	N/A	54.6
0-40°	2022	N/A	84.3
0-60°	2363	N/A	98.6
0-90°	2397	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 27.4W, 77.6° Beam)

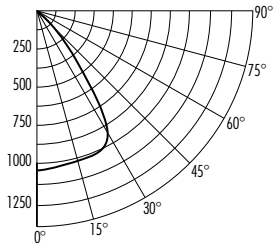
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	100.7	6.4
6'	44.8	9.6
8'	25.2	12.9
10'	16.1	16.1

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	17662
55°	6125
65°	2381
75°	972
85°	144

PHOTOMETRIC REPORT

Test Report#: PT07162801R
 Catalog No: JCLR8S 15LM 35K 90CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.30
 Luminaire LPW: 78



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1042
5	1035
15	1021
25	999
35	799
45	196
55	55
65	16
75	4
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	106	90	76
5'	68	57	49
6'	47	40	34
7'	38	32	27
8'	30	26	22
9'	23	20	17
10'	17	14	12

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	845	N/A	54.7
0-40°	1305	N/A	84.5
0-60°	1523	N/A	98.6
0-90°	1544	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 19.9W, 77.5° Beam)

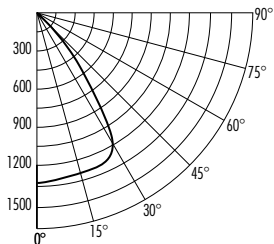
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	65.1	6.4
6'	28.9	9.6
8'	16.3	12.8
10'	10.4	16.1

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	11268
55°	3909
65°	1506
75°	588
85°	40

PHOTOMETRIC REPORT

Test Report#: PT07162802R
 Catalog No: JCLR8S 20LM 35K 90CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.30
 Luminaire LPW: 72



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1330
5	1321
15	1305
25	1276
35	1022
45	253
55	71
65	20
75	5
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	136	115	98
5'	87	74	63
6'	60	51	43
7'	49	41	35
8'	39	33	28
9'	30	25	21
10'	22	18	16

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1080	N/A	54.6
0-40°	1668	N/A	84.3
0-60°	1951	N/A	98.6
0-90°	1978	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 27.4W, 77.6° Beam)

Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	83.1	6.4
6'	36.9	9.6
8'	20.8	12.9
10'	13.3	16.1

LUMINANCE (Average cd/m²)

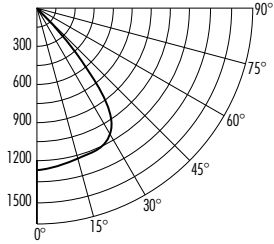
Angle in Degrees	Average 0-90°
45°	14575
55°	5055
65°	1965
75°	802
85°	119

JCLR8L & JCLR8S

PHOTOMETRICS

PHOTOMETRIC REPORT

Test Report#: PTO7162805R
 Catalog No: JCLR8L 18LM 35K 80CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.32
 Luminaire LPW: 97



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1296
5	1281
15	1235
25	1222
35	1058
45	231
55	47
65	15
75	4
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	133	112	95
5'	85	72	61
6'	59	50	42
7'	48	40	34
8'	38	32	27
9'	29	24	21
10'	21	18	15

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1033	N/A	53.5
0-40°	1653	N/A	85.6
0-60°	1911	N/A	99.0
0-90°	1932	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 19.9W, 79.9° Beam)

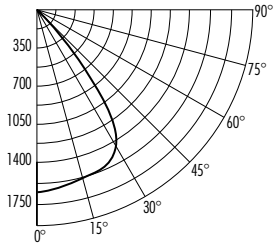
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	80.9	6.7
6'	36.0	10.1
8'	20.2	13.4
10'	13.0	16.8

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	9957
55°	2509
65°	1048
75°	473
85°	72

PHOTOMETRIC REPORT

Test Report#: PTO7162806R
 Catalog No: JCLR8L 24LM 35K 80CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.32
 Luminaire LPW: 91



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1661
5	1642
15	1585
25	1568
35	1359
45	299
55	61
65	19
75	5
85	1
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	171	144	123
5'	109	92	78
6'	76	64	55
7'	61	52	44
8'	49	41	35
9'	37	31	27
10'	27	23	20

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1325	N/A	53.4
0-40°	2123	N/A	85.5
0-60°	2457	N/A	98.9
0-90°	2484	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 27.4W, 79.9° Beam)

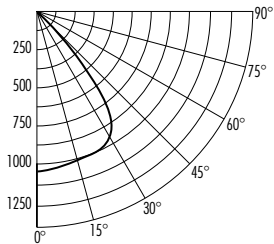
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	103.8	6.7
6'	46.1	10.1
8'	26.0	13.4
10'	16.6	16.8

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	12916
55°	3270
65°	1375
75°	643
85°	180

PHOTOMETRIC REPORT

Test Report#: PTO7162805R
 Catalog No: JCLR8L 15LM 35K 90CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.32
 Luminaire LPW: 80



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1069
5	1057
15	1019
25	1008
35	873
45	190
55	39
65	12
75	3
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	110	93	79
5'	70	59	50
6'	49	41	35
7'	39	33	28
8'	31	26	22
9'	24	20	17
10'	18	15	13

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	852	N/A	53.5
0-40°	1364	N/A	85.6
0-60°	1577	N/A	99.0
0-90°	1594	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 19.9W, 79.9° Beam)

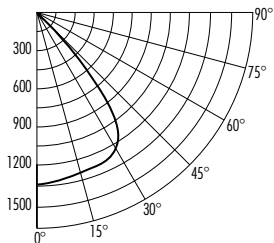
Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	66.8	6.7
6'	29.7	10.1
8'	16.7	13.4
10'	10.7	16.8

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	8217
55°	2070
65°	865
75°	391
85°	59

PHOTOMETRIC REPORT

Test Report#: PTO7162806R
 Catalog No: JCLR8L 20LM 35K 90CRI MVOLT ZT HZWH
 Luminaire Spacing Criteria: 1.32
 Luminaire LPW: 75



CANDLEPOWER DISTRIBUTION (Candelas)

Degrees Vertical	0°
0	1371
5	1356
15	1308
25	1294
35	1122
45	247
55	51
65	16
75	5
85	0
90	0

AVERAGE INITIAL FOOTCANDLES Multiple Units (Square Array, 60'x60' room)

Ceiling 80%, Walls 50%, Floors 20%

Spacing	RCR1	RCR3	RCR5
4'	141	119	101
5'	90	76	65
6'	63	53	45
7'	51	43	36
8'	40	34	29
9'	31	26	22
10'	23	19	16

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixture
0-30°	1094	N/A	53.4
0-40°	1752	N/A	85.5
0-60°	2028	N/A	98.9
0-90°	2050	N/A	100.0

INITIAL FOOTCANDLES (One Unit: 27.4W, 79.9° Beam)

Distance to Illuminated Plane (Feet)	Footcandles Beam Center	Beam Diameter
4'	85.7	6.7
6'	38.1	10.1
8'	21.4	13.4
10'	13.7	16.8

LUMINANCE (Average cd/m²)

Angle in Degrees	Average 0-90°
45°	10659
55°	2699
65°	1135
75°	531
85°	149