

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: CORELITE

Report Number: P572210

Luminaire Tested: 24ID-75-L840-DBR

Issue Date: 10/5/2021

Test Information

Test Method: LM-79-2019
Report Number: P572210
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2109-397-7)
Test Lab: INNOVATION CENTER
Issue Date: 10/5/2021
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: CORELITE
Catalog Number: 24ID-75-L840-DBR
Description: 7500 LUMEN, 2X4 INDEPTH TROFFER WITH 2IN REGRESSED DOUBLE BARRELL LENS AND 4000K, 80 CRI LEDS
Light Source: -
Ballast/Driver: -

Summary

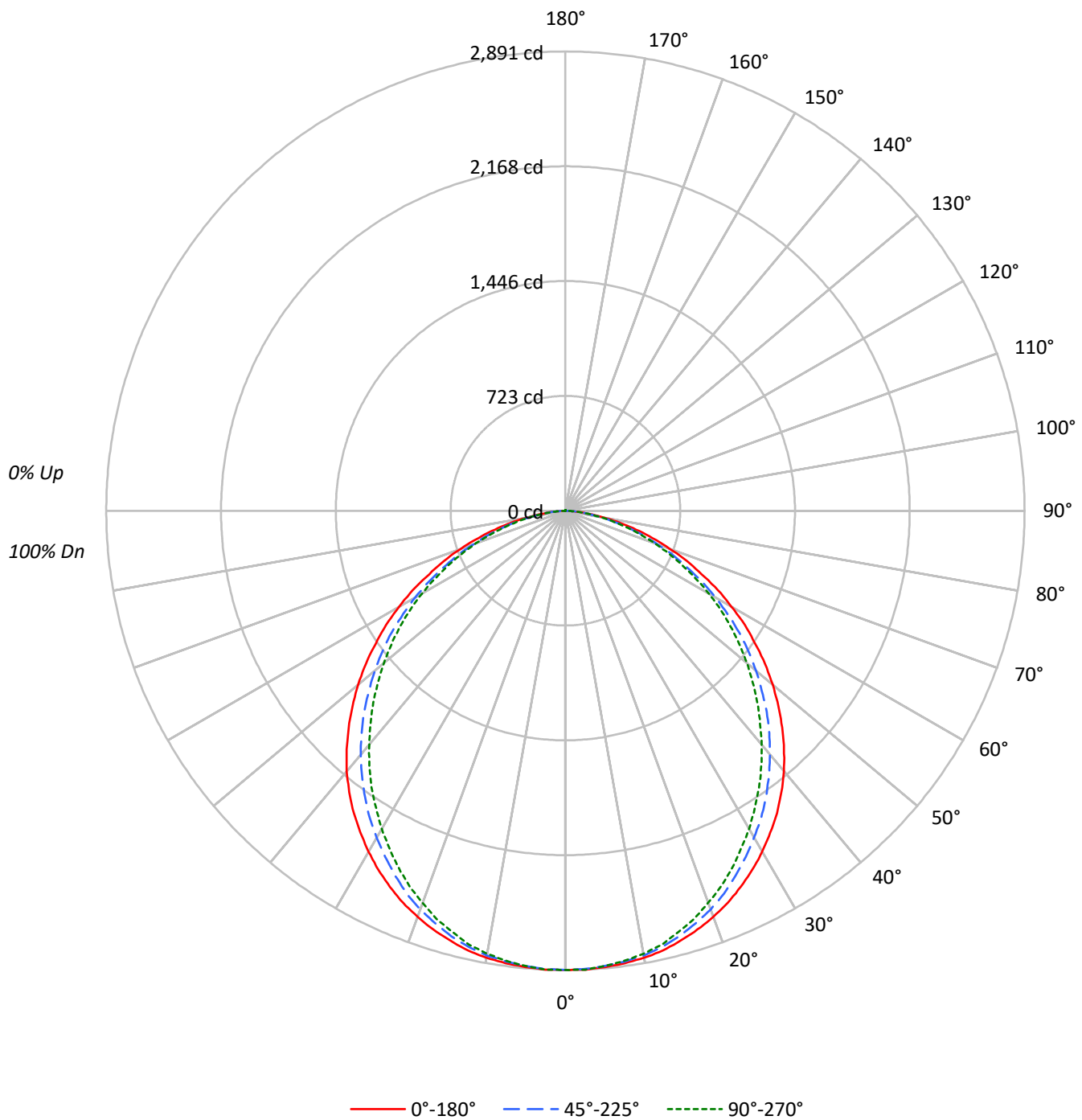
Lumens per Lamp: N/A
Luminaire Lumens: 7598.0 lumens
Efficiency: N/A
Efficacy: 107.3 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.19 / 1.33
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 70.8
Input Voltage (V):
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT

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Luminous Intensity Polar Plot



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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20
RC	80				70				50				30				10
RW	70	50	30	10	70	50	30	10	50	30	10		50	30	10		50
RCR																	
0	119	119	119	119	116	116	116	116	111	111	111		106	106	106		102
1	109	105	101	97	107	103	99	95	98	95	92		94	92	90		91
2	100	92	85	80	97	90	84	79	86	81	77		83	79	75		80
3	91	81	73	67	89	79	72	66	76	70	65		74	68	64		71
4	84	72	63	57	81	71	63	56	68	61	56		66	60	55		64
5	77	64	56	49	75	63	55	49	61	54	48		59	53	48		57
6	71	58	49	43	69	57	49	43	55	48	42		54	47	42		52
7	66	53	44	38	64	52	44	38	50	43	38		49	42	37		48
8	61	48	40	34	60	47	39	34	46	39	34		45	38	33		44
9	57	44	36	31	56	44	36	31	42	35	30		41	35	30		40
10	54	41	33	28	53	40	33	28	39	32	28		38	32	27		37

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3890	3890	3890
5°	3895	3885	3885
10°	3904	3884	3869
15°	3903	3862	3825
20°	3895	3826	3762
25°	3879	3763	3686
30°	3852	3690	3592
35°	3816	3615	3493
40°	3761	3520	3377
45°	3672	3411	3256
50°	3566	3278	3123
55°	3421	3134	2977
60°	3246	2936	2806
65°	3013	2694	2587
70°	2759	2424	2351
75°	2392	2084	2026
80°	1926	1639	1639
85°	974	1031	974

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 3672 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	273.5	3.6
10°-20°	781.9	10.3
20°-30°	1170.6	15.4
30°-40°	1383.6	18.2
40°-50°	1392.7	18.3
50°-60°	1205.2	15.9
60°-70°	858.3	11.3
70°-80°	440.7	5.8
80°-90°	91.2	1.2
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.3	0.0
170°-180°	0.0	0.0
0°-30°	2226.0	29.3
0°-40°	3609.6	47.5
0°-60°	6207.5	81.7
0°-90°	7597.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7598.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2891	2891	2891	2891	2891	
5°	2884	2880	2876	2872	2876	274
15°	2802	2791	2772	2750	2746	791
25°	2613	2590	2535	2494	2483	1204
35°	2323	2286	2201	2145	2126	1452
45°	1930	1889	1792	1729	1711	1488
55°	1458	1418	1336	1280	1269	1305
65°	946	913	846	816	813	943
75°	460	438	401	386	390	491
85°	63	63	67	67	63	95
90°	0	0	0	0	0	4
95°	0	0	0	0	0	0
105°	0	0	0	0	0	0
115°	0	0	0	0	0	0
125°	0	0	0	0	0	0
135°	0	0	0	0	0	0
145°	0	0	0	0	0	0
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	4	0
180°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2891.0	2891.0	2891.0	2891.0	2891.0
2.5°	2891.0	2887.3	2887.3	2883.6	2891.0
5°	2883.6	2879.9	2876.2	2872.5	2876.2
7.5°	2872.5	2865.0	2861.3	2853.9	2857.6
10°	2857.6	2850.2	2842.8	2831.6	2831.6
12.5°	2835.3	2827.9	2813.1	2798.2	2798.2
15°	2801.9	2790.8	2772.3	2750.0	2746.3
17.5°	2764.8	2750.0	2724.0	2698.0	2694.3
20°	2720.3	2705.4	2672.0	2638.6	2627.5
22.5°	2672.0	2653.5	2609.0	2571.8	2560.7
25°	2612.7	2590.4	2534.7	2493.9	2482.8
27.5°	2549.6	2519.9	2456.8	2412.3	2397.4
30°	2479.1	2449.4	2375.2	2330.6	2312.1
32.5°	2401.1	2367.7	2293.5	2237.8	2219.3
35°	2323.2	2286.1	2200.7	2145.1	2126.5
37.5°	2234.1	2193.3	2104.2	2044.9	2026.3
40°	2141.4	2100.5	2004.0	1944.7	1922.4
42.5°	2037.4	1996.6	1900.1	1837.0	1814.8
45°	1929.8	1889.0	1792.5	1729.4	1710.9
47.5°	1818.5	1770.2	1677.5	1618.1	1599.5
50°	1703.4	1655.2	1566.1	1506.7	1491.9
52.5°	1584.7	1536.4	1451.1	1391.7	1380.6
55°	1458.5	1417.7	1336.0	1280.4	1269.2
57.5°	1339.7	1295.2	1209.8	1169.0	1157.9
60°	1206.1	1169.0	1091.1	1054.0	1042.8
62.5°	1083.7	1046.6	968.6	927.8	924.1
65°	946.4	912.9	846.1	816.5	812.7
67.5°	827.6	790.5	734.8	705.1	705.1
70°	701.4	668.0	616.1	597.5	597.5
72.5°	575.2	553.0	508.4	489.9	493.6
75°	460.2	437.9	400.8	386.0	389.7
77.5°	352.6	326.6	304.3	293.2	296.9
80°	248.6	230.1	211.5	207.8	211.5
82.5°	148.4	137.3	133.6	133.6	133.6
85°	63.1	63.1	66.8	66.8	63.1
87.5°	26.0	22.3	22.3	26.0	26.0
90°	0.0	0.0	0.0	0.0	0.0
92.5°	0.0	0.0	0.0	0.0	0.0
95°	0.0	0.0	0.0	0.0	0.0
97.5°	0.0	0.0	0.0	0.0	0.0
100°	0.0	0.0	0.0	0.0	0.0
102.5°	0.0	0.0	0.0	0.0	0.0
105°	0.0	0.0	0.0	0.0	0.0
107.5°	0.0	0.0	0.0	0.0	0.0
110°	0.0	0.0	0.0	0.0	0.0

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	0.0	0.0	0.0	0.0
115°	0.0	0.0	0.0	0.0	0.0
117.5°	0.0	0.0	0.0	0.0	0.0
120°	0.0	0.0	0.0	0.0	0.0
122.5°	0.0	0.0	0.0	0.0	0.0
125°	0.0	0.0	0.0	0.0	0.0
127.5°	0.0	0.0	0.0	0.0	0.0
130°	0.0	0.0	0.0	0.0	0.0
132.5°	0.0	0.0	0.0	0.0	0.0
135°	0.0	0.0	0.0	0.0	0.0
137.5°	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0
162.5°	3.7	0.0	3.7	3.7	3.7
165°	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	3.7	0.0
170°	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	3.7
177.5°	0.0	0.0	3.7	3.7	3.7
180°	0.0	0.0	0.0	0.0	0.0

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CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	16.45	18.05	16.81	18.36	18.68	15.68	17.28	16.05	17.60	17.91
	3H	18.07	19.52	18.45	19.84	20.20	17.23	18.68	17.61	19.00	19.36
	4H	18.62	19.98	19.02	20.33	20.71	17.75	19.11	18.15	19.46	19.84
	6H	18.98	20.23	19.39	20.60	20.99	18.09	19.34	18.50	19.71	20.10
	8H	19.05	20.25	19.48	20.64	21.04	18.17	19.37	18.59	19.75	20.15
	12H	19.08	20.22	19.51	20.61	21.04	18.20	19.34	18.63	19.73	20.16
4H	2H	16.91	18.27	17.31	18.62	18.99	16.29	17.65	16.69	17.99	18.37
	3H	18.74	19.88	19.15	20.27	20.67	18.04	19.17	18.45	19.57	19.97
	4H	19.41	20.43	19.84	20.85	21.28	18.66	19.68	19.09	20.09	20.53
	6H	19.87	20.76	20.33	21.20	21.66	19.09	19.98	19.54	20.42	20.88
	8H	19.98	20.81	20.44	21.25	21.72	19.20	20.03	19.66	20.47	20.94
	12H	20.02	20.77	20.50	21.24	21.71	19.25	20.00	19.73	20.47	20.94
8H	4H	19.60	20.43	20.06	20.87	21.34	18.92	19.75	19.38	20.19	20.66
	6H	20.14	20.82	20.63	21.31	21.79	19.43	20.12	19.92	20.61	21.08
	8H	20.28	20.90	20.79	21.41	21.89	19.58	20.20	20.09	20.71	21.19
	12H	20.36	20.90	20.87	21.39	21.96	19.68	20.22	20.18	20.71	21.27
12H	4H	19.61	20.35	20.09	20.83	21.30	18.94	19.68	19.42	20.16	20.63
	6H	20.14	20.76	20.65	21.27	21.76	19.45	20.07	19.97	20.58	21.07
	8H	20.33	20.87	20.84	21.37	21.93	19.65	20.20	20.16	20.69	21.25