

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: METALUX

Report Number: P1588834

Luminaire Tested: 24CZSP-A-70VHE-L835-S

Issue Date: 9/3/2026

Test Information

Test Method: LM-79-2019
Report Number: P1588834
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2608-884-6)
Test Lab: INNOVATION CENTER
Issue Date: 9/3/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 24CZSP-A-70VHE-L835-S
Description: 2x4 CZSP LED Luminaire, 3500K CCT and 7500 lumens, 80CRI, Smooth Lens, Air Vented Housing
Light Source: -
Ballast/Driver: -

Summary

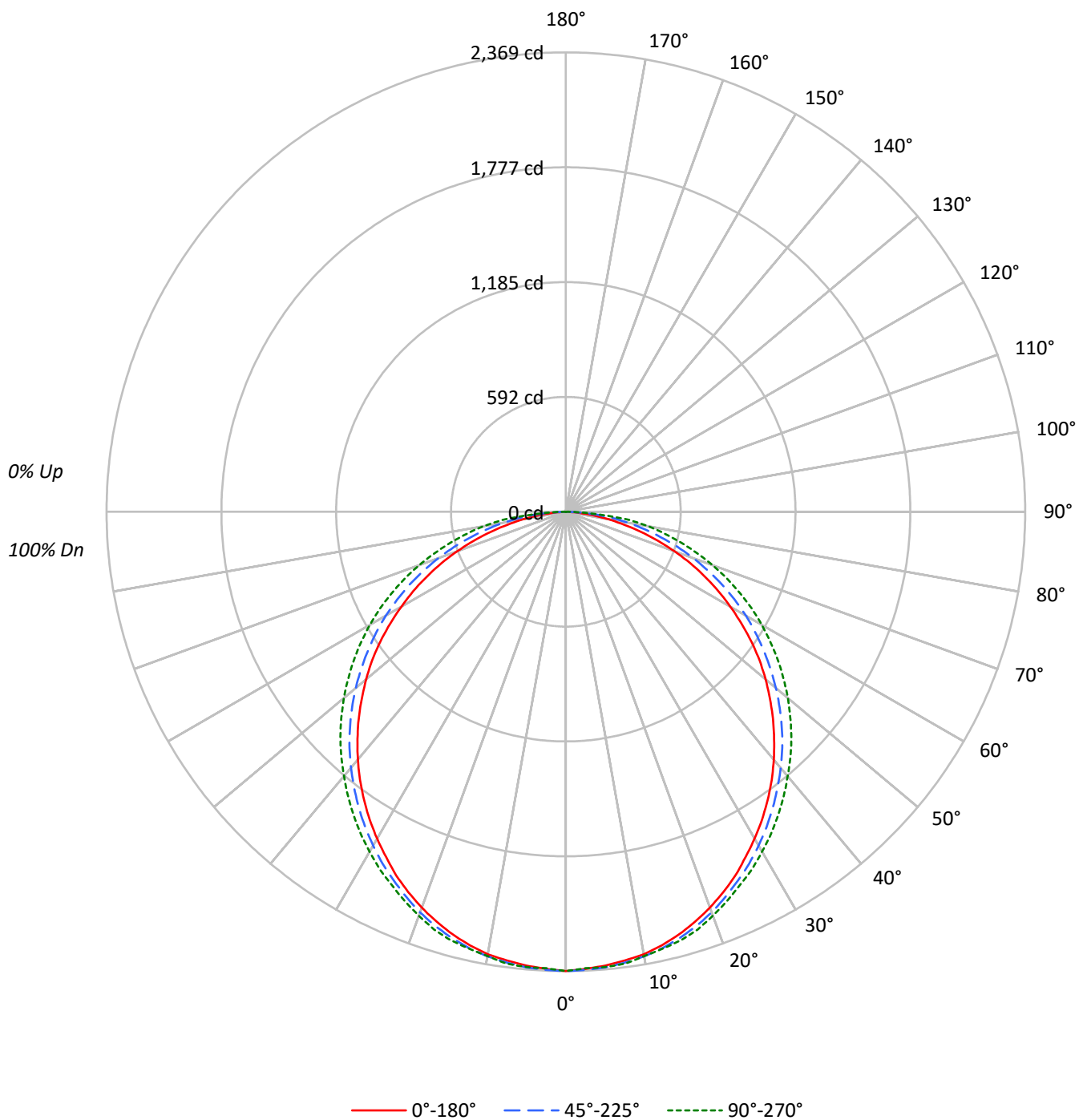
Lumens per Lamp: N/A
Luminaire Lumens: 6915.0 lumens
Efficiency: N/A
Efficacy: 129.7 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.27 / 1.37
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

Input Watts (W): 53.3
Input Voltage (V): NR
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			0
RW	70	50	30	10	70	50	30	10	50	30	10		50	30	10		50	30	10	0
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111		106	106	106		102	102	102	100
1	108	103	99	95	106	101	97	93	97	93	90		93	90	88		89	87	85	83
2	98	90	83	77	96	88	81	76	84	79	74		81	76	72		78	74	71	69
3	89	79	70	64	87	77	69	63	74	67	62		71	65	61		69	64	60	57
4	82	69	60	54	79	68	60	53	66	58	52		63	57	52		61	56	51	49
5	75	62	53	46	73	61	52	46	59	51	45		57	50	45		55	49	44	42
6	69	56	47	40	67	55	46	40	53	45	40		51	44	39		50	44	39	37
7	64	50	42	35	62	50	41	35	48	40	35		47	40	35		45	39	34	32
8	60	46	37	32	58	45	37	31	44	37	31		43	36	31		42	35	31	29
9	56	42	34	28	54	42	34	28	40	33	28		39	33	28		38	32	28	26
10	52	39	31	26	51	38	31	26	37	30	25		37	30	25		36	30	25	23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3628	3628	3628
5°	3611	3625	3623
10°	3604	3620	3618
15°	3578	3607	3628
20°	3541	3584	3613
25°	3498	3546	3590
30°	3443	3515	3580
35°	3393	3481	3569
40°	3337	3446	3559
45°	3274	3412	3563
50°	3203	3370	3561
55°	3120	3322	3566
60°	3003	3286	3574
65°	2865	3223	3585
70°	2670	3132	3601
75°	2380	3008	3636
80°	1967	2864	3814
85°	1279	2587	3334

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 82.5°

Luminance: 3934 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	224.0	3.2
10°-20°	641.4	9.3
20°-30°	967.4	14.0
30°-40°	1165.2	16.8
40°-50°	1216.8	17.6
50°-60°	1117.5	16.2
60°-70°	880.2	12.7
70°-80°	540.0	7.8
80°-90°	162.5	2.3
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°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	1832.8	26.5
0°-40°	2997.9	43.4
0°-60°	5332.3	77.1
0°-90°	6915.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6915.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2369	2369	2369	2369	2369	
5°	2349	2352	2358	2366	2356	223
15°	2256	2261	2274	2288	2288	636
25°	2070	2074	2098	2124	2124	953
35°	1815	1824	1862	1900	1909	1135
45°	1511	1528	1575	1630	1645	1165
55°	1168	1190	1244	1314	1335	1043
65°	790	818	889	964	989	782
75°	402	434	508	589	614	426
85°	73	100	147	187	190	95
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2368.6	2368.6	2368.6	2368.6	2368.6
2.5°	2359.5	2364.0	2365.5	2367.1	2356.4
5°	2348.8	2351.9	2358.0	2365.5	2356.4
7.5°	2333.7	2336.7	2344.3	2354.9	2350.4
10°	2317.0	2318.5	2327.6	2335.2	2326.1
12.5°	2289.7	2294.2	2304.8	2310.9	2307.9
15°	2256.3	2260.8	2274.5	2288.2	2288.2
17.5°	2216.8	2222.9	2239.6	2257.8	2259.3
20°	2172.8	2177.4	2198.6	2216.8	2216.8
22.5°	2122.8	2128.8	2150.1	2169.8	2172.8
25°	2069.7	2074.2	2098.5	2124.3	2124.3
27.5°	2007.4	2016.5	2046.9	2072.7	2078.8
30°	1946.8	1954.3	1987.7	2019.6	2024.1
32.5°	1883.0	1892.1	1927.0	1961.9	1969.5
35°	1814.7	1823.8	1861.8	1899.7	1908.8
37.5°	1743.4	1754.0	1793.5	1837.5	1846.6
40°	1669.1	1681.2	1723.7	1770.7	1779.8
42.5°	1590.2	1606.9	1652.4	1700.9	1714.6
45°	1511.3	1528.0	1575.0	1629.6	1644.8
47.5°	1427.8	1447.5	1496.1	1553.8	1570.4
50°	1344.4	1364.1	1414.2	1476.4	1494.6
52.5°	1259.4	1279.1	1330.7	1396.0	1415.7
55°	1168.4	1189.6	1244.2	1314.0	1335.3
57.5°	1074.3	1101.6	1159.2	1230.6	1251.8
60°	980.2	1007.5	1072.8	1142.6	1166.8
62.5°	887.6	913.4	980.2	1054.6	1080.3
65°	790.5	817.8	889.2	963.5	989.3
67.5°	694.9	722.3	793.6	871.0	898.3
70°	596.3	626.7	699.5	776.9	804.2
72.5°	497.7	529.6	603.9	682.8	708.6
75°	402.1	434.0	508.3	588.7	614.5
77.5°	308.0	342.9	415.8	497.7	522.0
80°	223.0	256.4	324.7	405.1	432.4
82.5°	142.6	171.5	239.7	315.6	335.3
85°	72.8	100.1	147.2	186.6	189.7
87.5°	22.8	31.9	48.6	72.8	74.3
90°	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	15.96	17.62	16.32	17.93	18.25	16.79	18.45	17.15	18.76	19.08
	3H	17.71	19.22	18.09	19.54	19.90	18.90	20.41	19.28	20.74	21.10
	4H	18.33	19.75	18.73	20.10	20.47	19.79	21.21	20.19	21.56	21.94
	6H	18.74	20.06	19.15	20.42	20.81	20.57	21.89	20.98	22.26	22.65
	8H	18.85	20.11	19.27	20.50	20.90	20.89	22.15	21.32	22.54	22.94
	12H	18.90	20.11	19.33	20.49	20.92	21.10	22.31	21.53	22.70	23.12
4H	2H	16.73	18.15	17.12	18.50	18.87	17.37	18.80	17.77	19.14	19.52
	3H	18.70	19.90	19.11	20.30	20.70	19.73	20.93	20.14	21.32	21.72
	4H	19.44	20.53	19.87	20.94	21.37	20.78	21.87	21.21	22.28	22.71
	6H	19.97	20.92	20.42	21.36	21.82	21.73	22.69	22.19	23.12	23.58
	8H	20.12	21.01	20.57	21.45	21.91	22.13	23.02	22.59	23.46	23.93
	12H	20.20	21.00	20.68	21.48	21.95	22.41	23.21	22.89	23.68	24.15
8H	4H	19.90	20.79	20.36	21.23	21.70	21.07	21.96	21.53	22.40	22.87
	6H	20.56	21.31	21.05	21.79	22.27	22.18	22.93	22.67	23.41	23.89
	8H	20.77	21.44	21.28	21.95	22.43	22.69	23.36	23.20	23.87	24.35
	12H	20.91	21.50	21.42	21.99	22.55	23.08	23.67	23.58	24.16	24.72
12H	4H	19.99	20.79	20.47	21.27	21.74	21.09	21.90	21.57	22.37	22.84
	6H	20.69	21.36	21.20	21.87	22.35	22.23	22.90	22.74	23.40	23.89
	8H	20.97	21.56	21.48	22.05	22.61	22.81	23.40	23.31	23.89	24.45