

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: P1588510

Luminaire Tested: 24CZSP-70VHE-L950-S

Issue Date: 9/3/2026

Test Information

Test Method: LM-79-2019
Report Number: P1588510
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-70VHE-L950-S
Description: 2x4 CZSP LED Luminaire, 5000K CCT and 7500 lumens, 90CRI, Smooth Lens
Light Source: -
Ballast/Driver: -

Summary

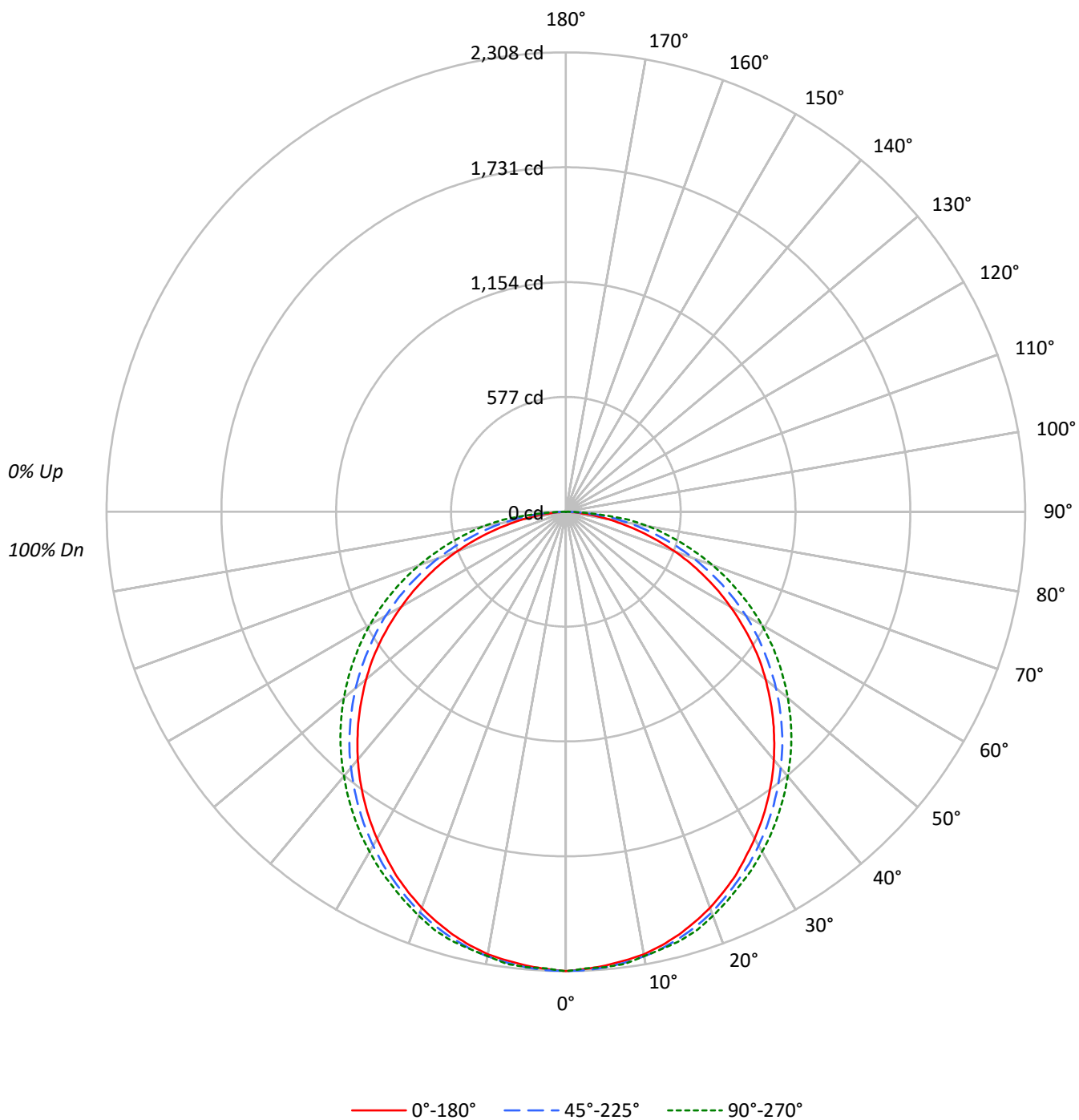
Lumens per Lamp: N/A
Luminaire Lumens: 6738.0 lumens
Efficiency: N/A
Efficacy: 126.4 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.27 / 1.37
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

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
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	108	103	99	95	106	101	97	93	97	93	90		93	90	88		89
2	98	90	83	77	96	88	81	76	84	79	74		81	76	72		78
3	89	79	70	64	87	77	69	63	74	67	62		71	65	61		69
4	82	69	60	54	79	68	60	53	66	58	52		63	57	52		61
5	75	62	53	46	73	61	52	46	59	51	45		57	50	45		55
6	69	56	47	40	67	55	46	40	53	45	40		51	44	39		50
7	64	50	42	35	62	50	41	35	48	40	35		47	40	35		45
8	60	46	37	32	58	45	37	31	44	37	31		43	36	31		42
9	56	42	34	28	54	42	34	28	40	33	28		39	33	28		38
10	52	39	31	26	51	38	31	26	37	30	25		37	30	25		36

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3535	3535	3535
5°	3519	3533	3530
10°	3511	3527	3525
15°	3486	3514	3535
20°	3451	3492	3521
25°	3408	3456	3498
30°	3355	3425	3488
35°	3306	3392	3478
40°	3252	3358	3468
45°	3190	3324	3472
50°	3121	3283	3470
55°	3040	3237	3474
60°	2926	3202	3483
65°	2792	3140	3494
70°	2602	3052	3509
75°	2319	2931	3544
80°	1917	2791	3717
85°	1248	2520	3248

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 82.5°

Luminance: 3834 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	218.3	3.2
10°-20°	625.0	9.3
20°-30°	942.6	14.0
30°-40°	1135.3	16.8
40°-50°	1185.7	17.6
50°-60°	1088.9	16.2
60°-70°	857.7	12.7
70°-80°	526.2	7.8
80°-90°	158.3	2.4
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°	1785.9	26.5
0°-40°	2921.2	43.4
0°-60°	5195.8	77.1
0°-90°	6738.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	6738.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2308	2308	2308	2308	2308	
5°	2289	2292	2298	2305	2296	217
15°	2198	2203	2216	2230	2230	620
25°	2017	2021	2045	2070	2070	928
35°	1768	1777	1814	1851	1860	1106
45°	1473	1489	1535	1588	1603	1135
55°	1138	1159	1212	1280	1301	1016
65°	770	797	866	939	964	762
75°	392	423	495	574	599	415
85°	71	98	143	182	185	93
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2307.9	2307.9	2307.9	2307.9	2307.9
2.5°	2299.1	2303.5	2305.0	2306.5	2296.1
5°	2288.7	2291.7	2297.6	2305.0	2296.1
7.5°	2273.9	2276.9	2284.3	2294.6	2290.2
10°	2257.7	2259.2	2268.0	2275.4	2266.5
12.5°	2231.1	2235.5	2245.8	2251.8	2248.8
15°	2198.5	2203.0	2216.3	2229.6	2229.6
17.5°	2160.1	2166.0	2182.3	2200.0	2201.5
20°	2117.2	2121.7	2142.4	2160.1	2160.1
22.5°	2068.4	2074.3	2095.0	2114.3	2117.2
25°	2016.7	2021.1	2044.8	2069.9	2069.9
27.5°	1956.1	1964.9	1994.5	2019.6	2025.6
30°	1896.9	1904.3	1936.8	1967.9	1972.3
32.5°	1834.8	1843.7	1877.7	1911.7	1919.1
35°	1768.3	1777.2	1814.1	1851.1	1860.0
37.5°	1698.8	1709.2	1747.6	1790.5	1799.3
40°	1626.4	1638.2	1679.6	1725.4	1734.3
42.5°	1549.5	1565.7	1610.1	1657.4	1670.7
45°	1472.6	1488.9	1534.7	1587.9	1602.7
47.5°	1391.3	1410.5	1457.8	1514.0	1530.3
50°	1310.0	1329.2	1378.0	1438.6	1456.3
52.5°	1227.2	1246.4	1296.6	1360.2	1379.4
55°	1138.4	1159.1	1212.4	1280.4	1301.1
57.5°	1046.8	1073.4	1129.6	1199.1	1219.8
60°	955.1	981.7	1045.3	1113.3	1137.0
62.5°	864.9	890.1	955.1	1027.6	1052.7
65°	770.3	796.9	866.4	938.9	964.0
67.5°	677.2	703.8	773.3	848.7	875.3
70°	581.1	610.6	681.6	757.0	783.6
72.5°	484.9	516.0	588.4	665.3	690.5
75°	391.8	422.9	495.3	573.7	598.8
77.5°	300.1	334.1	405.1	484.9	508.6
80°	217.3	249.9	316.4	394.8	421.4
82.5°	139.0	167.1	233.6	307.5	326.7
85°	71.0	97.6	143.4	181.9	184.8
87.5°	22.2	31.0	47.3	71.0	72.4
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	15.86	17.53	16.23	17.84	18.16	16.70	18.36	17.06	18.67	18.99
	3H	17.62	19.13	18.00	19.45	19.81	18.81	20.32	19.19	20.65	21.01
	4H	18.24	19.66	18.64	20.01	20.38	19.70	21.12	20.10	21.47	21.85
	6H	18.65	19.97	19.06	20.33	20.72	20.48	21.80	20.89	22.17	22.56
	8H	18.76	20.02	19.18	20.41	20.81	20.80	22.06	21.23	22.45	22.85
	12H	18.81	20.02	19.24	20.40	20.83	21.01	22.22	21.44	22.61	23.03
4H	2H	16.64	18.06	17.03	18.41	18.78	17.28	18.71	17.68	19.05	19.43
	3H	18.61	19.81	19.02	20.21	20.61	19.64	20.84	20.05	21.23	21.63
	4H	19.35	20.44	19.78	20.85	21.28	20.69	21.78	21.12	22.19	22.62
	6H	19.88	20.83	20.33	21.27	21.73	21.64	22.60	22.10	23.03	23.49
	8H	20.03	20.92	20.48	21.36	21.82	22.04	22.93	22.50	23.37	23.84
	12H	20.11	20.91	20.59	21.39	21.86	22.32	23.12	22.80	23.59	24.06
8H	4H	19.81	20.70	20.27	21.14	21.61	20.98	21.87	21.44	22.31	22.78
	6H	20.47	21.22	20.96	21.70	22.18	22.09	22.84	22.58	23.32	23.80
	8H	20.68	21.35	21.19	21.86	22.34	22.60	23.27	23.11	23.78	24.26
	12H	20.82	21.41	21.33	21.90	22.46	22.99	23.58	23.49	24.07	24.63
12H	4H	19.90	20.70	20.38	21.18	21.65	21.00	21.81	21.48	22.28	22.75
	6H	20.60	21.27	21.11	21.78	22.26	22.14	22.81	22.65	23.31	23.80
	8H	20.88	21.47	21.39	21.96	22.52	22.72	23.31	23.22	23.80	24.36