

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: P1589821

Luminaire Tested: 24CZSP-SB-52-L850

Issue Date: 9/3/2026

Test Information

Test Method: LM-79-2019
Report Number: P1589821
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2608-884-7)
Test Lab: INNOVATION CENTER
Issue Date: 9/3/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 24CZSP-SB-52-L850
Description: 2x4 CZSP LED Luminaire, 5000K CCT and 4500 lumens, 80CRI, Ribbed Lens, SB housing
Light Source: -
Ballast/Driver: -

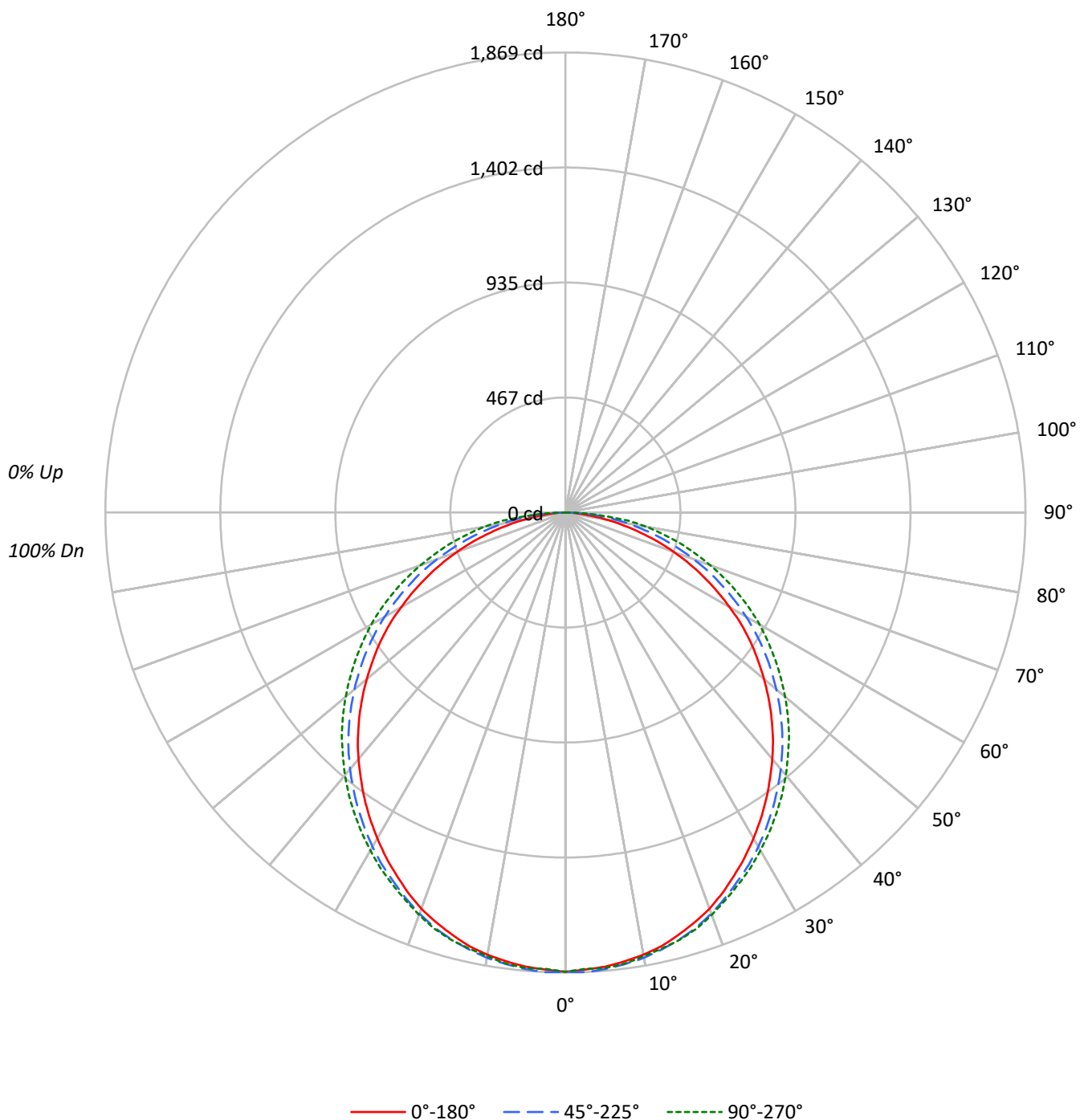
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5445.0 lumens
Efficiency: N/A
Efficacy: 148.4 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.26 / 1.38
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

Input Watts (W): 36.7
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: 28.75 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	68
3	89	79	70	63	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°	2858	2858	2858
5°	2847	2863	2856
10°	2837	2857	2846
15°	2816	2845	2849
20°	2791	2825	2834
25°	2746	2795	2814
30°	2703	2772	2802
35°	2659	2745	2793
40°	2615	2721	2786
45°	2566	2696	2783
50°	2510	2666	2776
55°	2453	2637	2776
60°	2362	2598	2792
65°	2251	2548	2794
70°	2100	2477	2802
75°	1869	2387	2851
80°	1535	2287	2958
85°	1012	2147	2673

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 82.5°

Luminance: 3029 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	176.5	3.2
10°-20°	505.2	9.3
20°-30°	761.4	14.0
30°-40°	917.0	16.8
40°-50°	958.0	17.6
50°-60°	880.1	16.2
60°-70°	693.1	12.7
70°-80°	424.9	7.8
80°-90°	128.8	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°	1443.1	26.5
0°-40°	2360.1	43.3
0°-60°	4198.2	77.1
0°-90°	5445.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	5445.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1866	1866	1866	1866	1866	
5°	1852	1855	1862	1860	1858	176
15°	1776	1783	1794	1801	1797	501
25°	1625	1635	1654	1671	1665	749
35°	1422	1440	1468	1495	1494	889
45°	1185	1210	1245	1279	1285	914
55°	918	945	988	1030	1040	819
65°	621	653	703	750	771	614
75°	316	353	403	452	482	336
85°	58	85	122	136	152	74
90°	0	0	0	0	0	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1865.8	1865.8	1865.8	1865.8	1865.8
2.5°	1858.9	1863.5	1869.2	1860.0	1855.4
5°	1852.0	1855.4	1862.3	1860.0	1857.7
7.5°	1839.3	1841.6	1850.8	1850.8	1848.5
10°	1824.3	1828.9	1837.0	1835.8	1830.1
12.5°	1804.7	1808.2	1817.4	1817.4	1813.9
15°	1775.9	1782.8	1794.3	1801.2	1796.6
17.5°	1745.9	1752.8	1767.8	1774.7	1772.4
20°	1712.5	1718.3	1733.3	1743.6	1739.0
22.5°	1671.0	1677.9	1695.2	1706.7	1702.1
25°	1624.9	1635.3	1653.7	1671.0	1665.3
27.5°	1578.8	1590.4	1613.4	1630.7	1628.4
30°	1528.1	1543.1	1567.3	1589.2	1584.6
32.5°	1476.3	1493.5	1518.9	1542.0	1540.8
35°	1422.1	1440.5	1468.2	1494.7	1493.5
37.5°	1364.5	1386.4	1415.2	1444.0	1445.1
40°	1308.0	1328.8	1361.0	1392.1	1393.3
42.5°	1248.1	1270.0	1304.6	1336.8	1338.0
45°	1184.7	1210.1	1244.6	1279.2	1285.0
47.5°	1120.2	1146.7	1182.4	1219.3	1226.2
50°	1053.3	1081.0	1119.0	1158.2	1165.1
52.5°	985.3	1014.1	1053.3	1092.5	1102.9
55°	918.5	945.0	987.6	1030.3	1039.5
57.5°	848.2	872.4	918.5	963.4	975.0
60°	771.0	800.9	848.2	893.1	911.6
62.5°	696.1	728.3	776.7	821.7	842.4
65°	621.2	653.4	703.0	750.2	771.0
67.5°	545.1	578.5	631.5	676.5	699.5
70°	469.0	502.5	553.2	601.6	625.8
72.5°	393.0	428.7	478.3	527.8	552.0
75°	315.8	352.6	403.4	451.8	481.7
77.5°	243.2	278.9	329.6	379.1	404.5
80°	174.0	209.7	259.3	308.9	335.4
82.5°	110.6	144.1	192.5	233.9	258.1
85°	57.6	85.3	122.2	136.0	152.1
87.5°	17.3	33.4	47.2	53.0	65.7
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	15.2	16.8	15.5	17.1	17.5	15.9	17.6	16.3	17.9	18.2
	3H	16.9	18.4	17.3	18.8	19.1	18.0	19.5	18.4	19.8	20.2
	4H	17.5	19.0	17.9	19.3	19.7	18.9	20.3	19.3	20.7	21.0
	6H	18.0	19.3	18.4	19.6	20.0	19.7	21.0	20.1	21.3	21.7
	8H	18.1	19.3	18.5	19.7	20.1	20.0	21.2	20.4	21.6	22.0
	12H	18.1	19.3	18.5	19.7	20.1	20.2	21.4	20.6	21.8	22.2
4H	2H	15.9	17.4	16.3	17.7	18.1	16.5	17.9	16.9	18.3	18.7
	3H	17.9	19.1	18.3	19.5	19.9	18.8	20.0	19.2	20.4	20.8
	4H	18.7	19.8	19.1	20.2	20.6	19.9	21.0	20.3	21.4	21.8
	6H	19.2	20.2	19.7	20.6	21.1	20.8	21.8	21.3	22.2	22.7
	8H	19.4	20.3	19.8	20.7	21.2	21.2	22.1	21.6	22.5	23.0
	12H	19.4	20.3	19.9	20.7	21.2	21.5	22.3	21.9	22.7	23.2
8H	4H	19.1	20.0	19.6	20.5	20.9	20.2	21.1	20.6	21.5	22.0
	6H	19.8	20.6	20.3	21.0	21.5	21.3	22.0	21.8	22.5	23.0
	8H	20.0	20.7	20.5	21.2	21.7	21.7	22.4	22.3	22.9	23.4
	12H	20.2	20.8	20.7	21.3	21.8	22.1	22.7	22.6	23.2	23.8
12H	4H	19.2	20.0	19.7	20.5	21.0	20.2	21.0	20.7	21.5	21.9
	6H	20.0	20.6	20.5	21.1	21.6	21.3	22.0	21.8	22.5	23.0
	8H	20.2	20.8	20.7	21.3	21.9	21.9	22.5	22.4	22.9	23.5

(END OF REPORT)