

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: P1588245

Luminaire Tested: 24CZSP-37HE-L935

Issue Date: 9/3/2026

Test Information

Test Method: LM-79-2019
Report Number: P1588245
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2603-711-1)
Test Lab: INNOVATION CENTER
Issue Date: 9/3/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 24CZSP-37HE-L935
Description: 2x4 CZSP LED Luminaire, 3500K CCT and 3500 lumens, 90CRI, Ribbed Lens
Light Source: -
Ballast/Driver: -

Summary

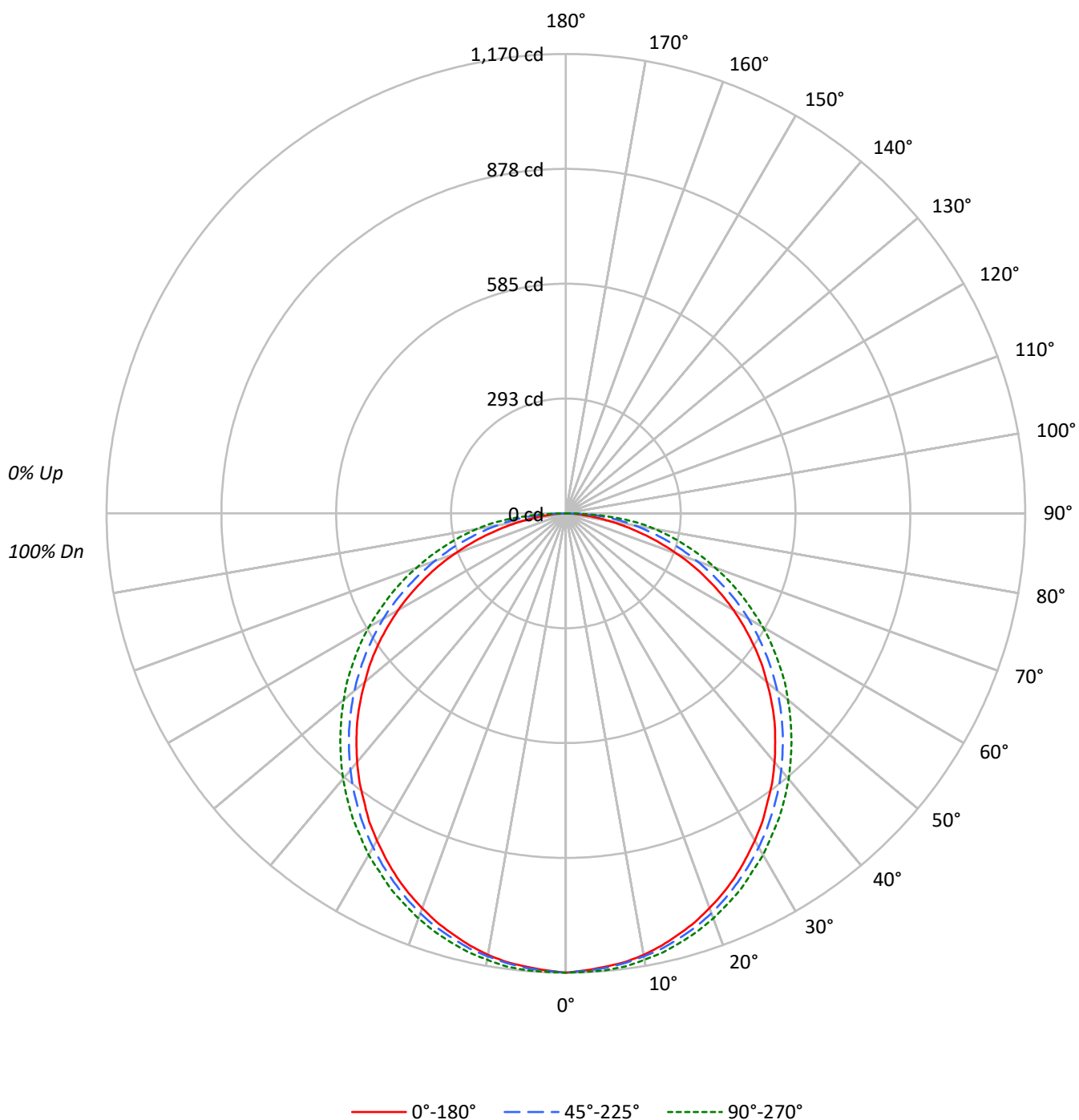
Lumens per Lamp: N/A
Luminaire Lumens: 3470.0 lumens
Efficiency: N/A
Efficacy: 140.5 lumens/watt
Spacing Criteria (0/90/45): 1.23 / 1.27 / 1.38
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

Input Watts (W): 24.7
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: 24 FT

TEST NUMBER: P1588245

CATALOG NUMBER: 24CZSP-37HE-L935

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	98	94	105	101	97	93	96	93	90		92	90	87		89	87	85	82
2	98	89	82	76	95	87	81	75	84	78	73		81	76	72		77	74	70	68
3	89	78	70	63	87	77	69	62	74	67	61		71	65	60		68	63	59	57
4	81	69	60	53	79	68	59	53	65	58	52		63	56	51		61	55	51	48
5	75	62	52	46	73	60	52	45	58	51	45		56	50	44		54	49	44	42
6	69	55	46	40	67	54	46	39	53	45	39		51	44	39		49	43	38	36
7	64	50	41	35	62	49	41	35	48	40	35		46	39	34		45	39	34	32
8	60	46	37	31	58	45	37	31	44	36	31		42	36	31		41	35	30	29
9	56	42	34	28	54	41	33	28	40	33	28		39	32	28		38	32	27	26
10	52	39	31	25	51	38	30	25	37	30	25		36	30	25		35	29	25	23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1792	1792	1792
5°	1782	1787	1795
10°	1776	1782	1795
15°	1760	1776	1794
20°	1744	1767	1789
25°	1725	1751	1784
30°	1702	1738	1777
35°	1675	1722	1770
40°	1653	1707	1765
45°	1629	1691	1760
50°	1593	1675	1760
55°	1559	1659	1764
60°	1512	1645	1777
65°	1448	1619	1789
70°	1355	1591	1811
75°	1205	1569	1870
80°	991	1575	2033
85°	675	1756	2244

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 85°

Luminance: 2244 cd/sqm

TEST NUMBER: P1588245

CATALOG NUMBER: 24CZSP-37HE-L935

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	110.7	3.2
10°-20°	317.0	9.1
20°-30°	479.3	13.8
30°-40°	578.4	16.7
40°-50°	604.8	17.4
50°-60°	558.0	16.1
60°-70°	443.7	12.8
70°-80°	280.0	8.1
80°-90°	98.2	2.8
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°	907.0	26.1
0°-40°	1485.4	42.8
0°-60°	2648.1	76.3
0°-90°	3470.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3470.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1170	1170	1170	1170	1170	
5°	1159	1168	1162	1165	1168	110
15°	1110	1123	1120	1128	1131	313
25°	1021	1036	1036	1050	1056	470
35°	896	915	921	939	947	561
45°	752	768	781	804	812	579
55°	584	601	621	651	661	521
65°	400	418	447	484	494	395
75°	204	227	265	304	316	216
85°	38	63	100	124	128	49
90°	0	0	0	0	0	

TEST NUMBER: P1588245

CATALOG NUMBER: 24CZSP-37HE-L935

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1169.7	1169.7	1169.7	1169.7	1169.7
2.5°	1164.9	1172.6	1165.9	1169.7	1168.8
5°	1159.2	1167.8	1162.1	1164.9	1167.8
7.5°	1152.5	1162.1	1155.3	1160.1	1164.0
10°	1141.9	1151.5	1145.7	1151.5	1154.4
12.5°	1127.5	1139.0	1135.2	1141.9	1144.8
15°	1110.2	1122.7	1119.8	1128.5	1131.3
17.5°	1092.0	1105.4	1103.5	1113.1	1116.0
20°	1069.9	1085.2	1084.3	1093.9	1097.7
22.5°	1046.8	1062.2	1061.2	1071.8	1076.6
25°	1020.9	1036.3	1036.3	1049.7	1055.5
27.5°	992.1	1009.4	1010.3	1023.8	1028.6
30°	962.3	979.6	982.5	996.9	1004.6
32.5°	931.6	947.9	952.7	969.0	974.8
35°	896.0	915.2	921.0	939.3	946.9
37.5°	863.4	880.7	888.4	907.6	915.2
40°	826.9	845.1	853.8	874.9	882.6
42.5°	789.4	807.7	817.3	840.3	848.0
45°	752.0	768.3	780.8	803.8	812.5
47.5°	710.7	728.9	742.4	767.3	776.0
50°	668.4	687.6	703.0	729.9	738.5
52.5°	628.1	645.4	662.7	692.4	702.0
55°	583.9	601.2	621.4	651.1	660.7
57.5°	538.8	556.1	579.1	610.8	621.4
60°	493.6	510.9	536.9	569.5	580.1
62.5°	446.6	463.9	492.7	526.3	535.9
65°	399.5	417.8	446.6	484.0	493.6
67.5°	351.5	369.7	400.5	439.9	450.4
70°	302.5	322.7	355.3	394.7	404.3
72.5°	251.6	274.7	311.2	349.6	361.1
75°	203.6	226.7	265.1	304.4	316.0
77.5°	156.5	182.5	220.9	262.2	274.7
80°	112.4	138.3	178.6	219.0	230.5
82.5°	72.0	98.9	139.3	177.7	187.3
85°	38.4	63.4	99.9	123.9	127.7
87.5°	12.5	32.7	45.1	59.5	60.5
90°	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1588245

CATALOG NUMBER: 24CZSP-37HE-L935

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	13.58	15.25	13.95	15.57	15.88	14.30	15.98	14.67	16.29	16.60
	3H	15.37	16.89	15.75	17.21	17.57	16.47	17.99	16.85	18.31	18.67
	4H	16.00	17.43	16.40	17.78	18.15	17.40	18.84	17.80	19.18	19.56
	6H	16.42	17.75	16.83	18.12	18.51	18.26	19.60	18.67	19.96	20.35
	8H	16.54	17.81	16.96	18.20	18.60	18.64	19.91	19.06	20.30	20.70
	12H	16.59	17.82	17.02	18.20	18.63	18.95	20.17	19.38	20.55	20.98
4H	2H	14.35	15.78	14.74	16.13	16.50	14.91	16.34	15.30	16.69	17.06
	3H	16.37	17.58	16.78	17.98	18.37	17.32	18.53	17.73	18.93	19.32
	4H	17.13	18.23	17.56	18.64	19.08	18.42	19.52	18.85	19.93	20.37
	6H	17.69	18.65	18.14	19.09	19.54	19.46	20.43	19.92	20.87	21.32
	8H	17.85	18.75	18.30	19.19	19.65	19.93	20.83	20.39	21.27	21.74
	12H	17.94	18.76	18.42	19.23	19.70	20.32	21.14	20.80	21.61	22.08
8H	4H	17.62	18.52	18.08	18.97	19.43	18.74	19.64	19.20	20.08	20.55
	6H	18.33	19.09	18.82	19.57	20.04	19.96	20.71	20.45	21.20	21.67
	8H	18.57	19.25	19.08	19.75	20.24	20.56	21.24	21.06	21.74	22.22
	12H	18.74	19.34	19.25	19.83	20.39	21.10	21.70	21.60	22.19	22.75
12H	4H	17.72	18.54	18.20	19.01	19.48	18.77	19.59	19.25	20.06	20.53
	6H	18.49	19.17	19.00	19.68	20.16	20.02	20.70	20.53	21.21	21.69
	8H	18.81	19.42	19.32	19.91	20.46	20.70	21.30	21.20	21.79	22.35