

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: P1584334

Luminaire Tested: 14CZSP-49HE-L835-S

Issue Date: 9/3/2026

Test Information

Test Method: LM-79-2019
Report Number: P1584334
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2608-884-1)
Test Lab: INNOVATION CENTER
Issue Date: 9/3/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: METALUX
Catalog Number: 14CZSP-49HE-L835-S
Description: 1x4 CZSP LED Luminaire, 3500K CCT and 4500 lumens, 80CRI, Smooth Lens
Light Source: -
Ballast/Driver: -

Summary

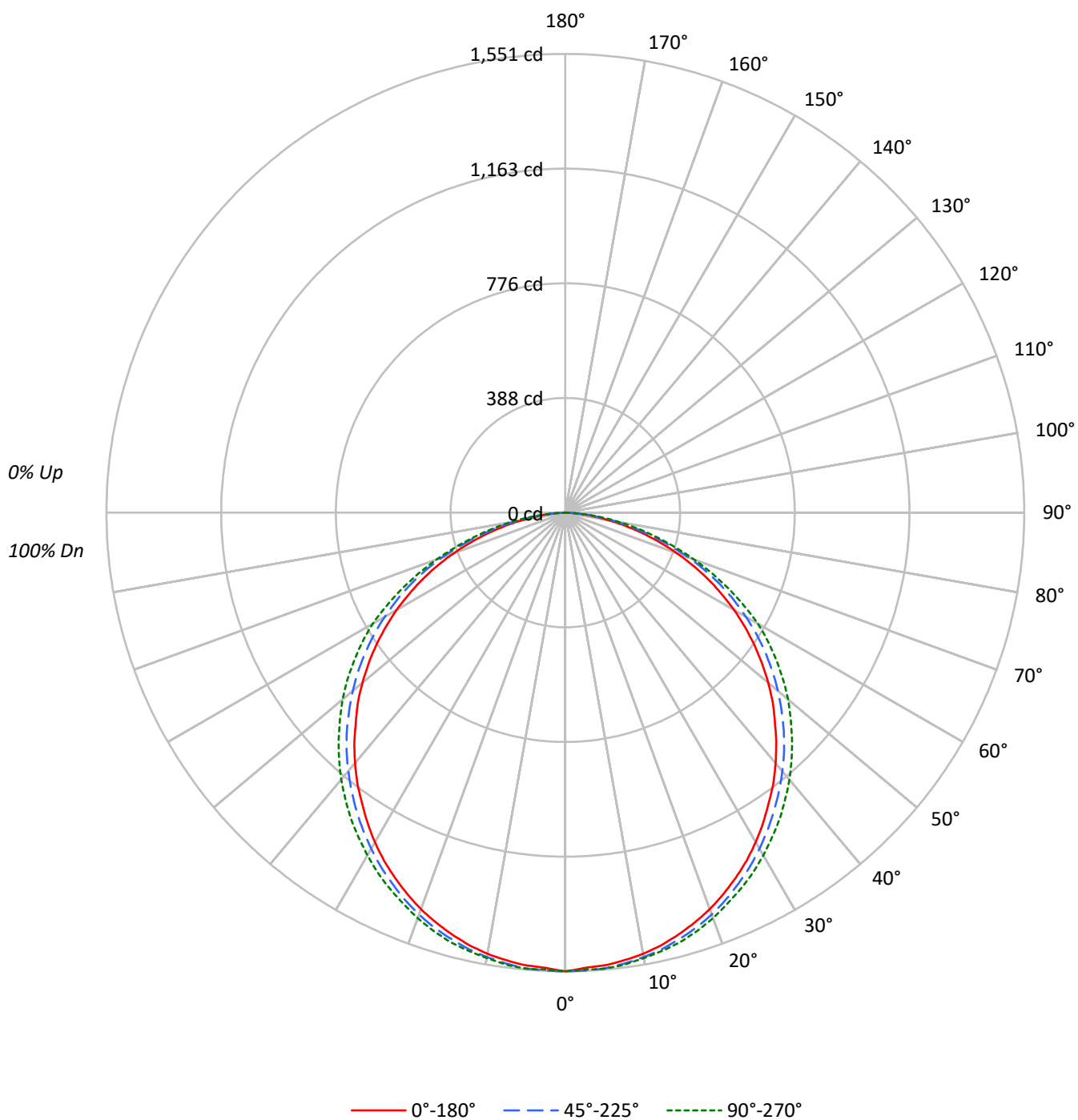
Lumens per Lamp: N/A
Luminaire Lumens: 4484.0 lumens
Efficiency: N/A
Efficacy: 135.5 lumens/watt
Spacing Criteria (0/90/45): 1.23 / 1.28 / 1.38
Luminous Opening: Rectangular (W 0.83' x L: 3.83' x H: 0')
CIE Type: Direct

Input Watts (W): 33.1
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: P1584334

CATALOG NUMBER: 14CZSP-49HE-L835-S

Luminous Intensity Polar Plot



TEST NUMBER: P1584334

CATALOG NUMBER: 14CZSP-49HE-L835-S

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	109	104	100	96	106	102	98	94	97	94	91		93	91	88		90	88	86	84
2	99	90	83	78	96	88	82	77	85	80	75		82	77	73		79	75	72	69
3	90	79	71	64	87	78	70	64	75	68	63		72	66	62		69	65	60	58
4	82	70	61	54	80	69	60	54	66	59	53		64	58	52		62	56	52	50
5	76	63	53	47	73	61	53	46	59	52	46		57	51	45		55	50	45	43
6	70	56	47	41	68	55	47	41	53	46	40		52	45	40		50	44	39	37
7	65	51	42	36	63	50	42	36	49	41	35		47	40	35		46	40	35	33
8	60	46	38	32	59	46	38	32	44	37	32		43	36	31		42	36	31	29
9	56	43	34	29	55	42	34	29	41	34	28		40	33	28		39	33	28	26
10	53	39	31	26	51	39	31	26	38	31	26		37	30	26		36	30	26	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5226	5226	5226
5°	5197	5231	5235
10°	5183	5221	5232
15°	5153	5206	5242
20°	5117	5185	5233
25°	5065	5146	5217
30°	5008	5105	5205
35°	4928	5061	5197
40°	4863	5020	5182
45°	4771	4975	5161
50°	4692	4917	5152
55°	4579	4847	5118
60°	4439	4750	5066
65°	4242	4620	4857
70°	3954	4363	4559
75°	3532	3936	4158
80°	2895	3316	3636
85°	1941	2424	2706

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 5161 cd/sqm

TEST NUMBER: P1584334

CATALOG NUMBER: 14CZSP-49HE-L835-S

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	146.9	3.3
10°-20°	421.1	9.4
20°-30°	637.7	14.2
30°-40°	770.1	17.2
40°-50°	804.8	17.9
50°-60°	737.4	16.4
60°-70°	569.2	12.7
70°-80°	320.2	7.1
80°-90°	76.6	1.7
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°	1205.7	26.9
0°-40°	1975.7	44.1
0°-60°	3518.0	78.5
0°-90°	4484.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4484.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1551	1551	1551	1551	1551	
5°	1536	1548	1546	1548	1548	146
15°	1477	1489	1492	1498	1503	417
25°	1362	1374	1384	1391	1403	628
35°	1198	1213	1230	1247	1263	751
45°	1001	1021	1044	1065	1083	774
55°	780	800	825	851	871	696
65°	532	555	580	603	609	526
75°	271	296	302	315	319	288
85°	50	57	63	69	70	64
90°	0	0	0	0	0	

TEST NUMBER: P1584334

CATALOG NUMBER: 14CZSP-49HE-L835-S

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1551.0	1551.0	1551.0	1551.0	1551.0
2.5°	1540.5	1552.3	1549.7	1553.7	1546.4
5°	1536.5	1547.7	1546.4	1547.7	1547.7
7.5°	1526.6	1538.5	1537.8	1539.8	1541.1
10°	1514.7	1525.9	1525.9	1527.9	1529.2
12.5°	1498.2	1510.1	1511.4	1514.7	1517.4
15°	1477.1	1489.0	1492.3	1498.2	1502.8
17.5°	1453.3	1465.9	1471.2	1477.1	1483.0
20°	1426.9	1438.2	1446.1	1450.7	1459.3
22.5°	1395.9	1408.5	1417.0	1421.7	1430.9
25°	1362.3	1374.1	1384.0	1391.3	1403.2
27.5°	1326.6	1338.5	1350.4	1359.0	1372.8
30°	1287.0	1299.6	1312.1	1325.3	1337.8
32.5°	1244.1	1258.6	1272.5	1287.0	1300.9
35°	1197.9	1213.1	1230.3	1246.8	1263.3
37.5°	1155.0	1168.9	1186.7	1204.5	1221.0
40°	1105.5	1120.7	1141.2	1161.0	1178.1
42.5°	1055.4	1071.9	1094.3	1113.4	1131.9
45°	1001.2	1021.0	1044.1	1065.3	1083.1
47.5°	951.1	968.2	991.3	1014.4	1032.9
50°	895.0	914.1	937.9	962.3	982.8
52.5°	838.2	858.0	882.4	906.9	928.0
55°	779.5	799.9	825.0	850.8	871.2
57.5°	719.4	741.2	766.9	792.7	813.1
60°	658.7	680.5	704.9	733.3	751.7
62.5°	595.3	619.7	642.8	669.2	680.5
65°	532.0	555.1	579.5	602.6	609.2
67.5°	467.3	491.0	512.8	528.0	536.6
70°	401.3	427.0	442.9	457.4	462.7
72.5°	335.9	361.7	370.9	384.8	390.1
75°	271.3	296.3	302.3	314.8	319.4
77.5°	208.6	231.7	233.6	248.2	252.1
80°	149.2	167.6	170.9	184.8	187.4
82.5°	95.7	108.9	113.5	125.4	129.4
85°	50.2	57.4	62.7	68.6	70.0
87.5°	16.5	20.5	17.2	17.8	16.5
90°	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1584334

CATALOG NUMBER: 14CZSP-49HE-L835-S

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	17.46	19.11	17.82	19.42	19.74	18.00	19.65	18.36	19.96	20.28
	3H	19.23	20.73	19.61	21.05	21.41	19.85	21.35	20.23	21.67	22.03
	4H	19.86	21.27	20.26	21.61	21.99	20.52	21.93	20.92	22.28	22.65
	6H	20.27	21.57	20.68	21.94	22.33	21.00	22.30	21.41	22.67	23.06
	8H	20.37	21.62	20.80	22.01	22.41	21.15	22.39	21.57	22.78	23.18
	12H	20.42	21.62	20.85	22.00	22.43	21.23	22.42	21.66	22.81	23.23
4H	2H	18.18	19.59	18.58	19.94	20.31	18.60	20.01	19.00	20.36	20.73
	3H	20.18	21.36	20.59	21.75	22.15	20.68	21.86	21.09	22.25	22.65
	4H	20.93	22.00	21.37	22.42	22.85	21.47	22.54	21.90	22.95	23.39
	6H	21.46	22.40	21.92	22.84	23.29	22.08	23.01	22.53	23.45	23.90
	8H	21.60	22.48	22.06	22.92	23.38	22.27	23.14	22.73	23.58	24.05
	12H	21.68	22.47	22.16	22.94	23.41	22.39	23.17	22.87	23.65	24.12
8H	4H	21.27	22.14	21.73	22.59	23.05	21.75	22.62	22.21	23.06	23.53
	6H	21.91	22.64	22.40	23.12	23.60	22.46	23.19	22.95	23.67	24.15
	8H	22.11	22.76	22.62	23.27	23.75	22.72	23.37	23.23	23.87	24.36
	12H	22.24	22.82	22.75	23.31	23.87	22.90	23.47	23.41	23.96	24.52
12H	4H	21.31	22.09	21.79	22.57	23.04	21.77	22.56	22.25	23.03	23.50
	6H	21.97	22.62	22.47	23.12	23.61	22.50	23.15	23.01	23.66	24.14
	8H	22.22	22.79	22.72	23.28	23.84	22.81	23.38	23.31	23.87	24.43