

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: PORTFOLIO

Report Number: P781477

Luminaire Tested: LER4D45BD010-EC4DR3040509030-4LBS1H

Issue Date: 1/30/2024

Test Information

Test Method: LM-79-2019
Report Number: P781477
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2307-078-16)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 1/30/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: PORTFOLIO
Catalog Number: LER4D45BD010-EC4DR3040509030-4LBS1H
Description: 4 INCH ROUND SHALLOW SEMI-SPECULAR CLEAR TRIM, WITH 30° OPTIC
Light Source: (1) HIGH LUMEN LED 90CRI / 3000K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4235.9 lumens
Efficiency: N/A
Efficacy: 109.5 lumens/watt
Spacing Criteria (0/90/45): 0.52 / 0.52 / 0.49
Luminous Opening: Rectangular (W 0.38' x L: 0.38' x H: 0')
CIE Type: Direct

Input Watts (W): 38.7
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

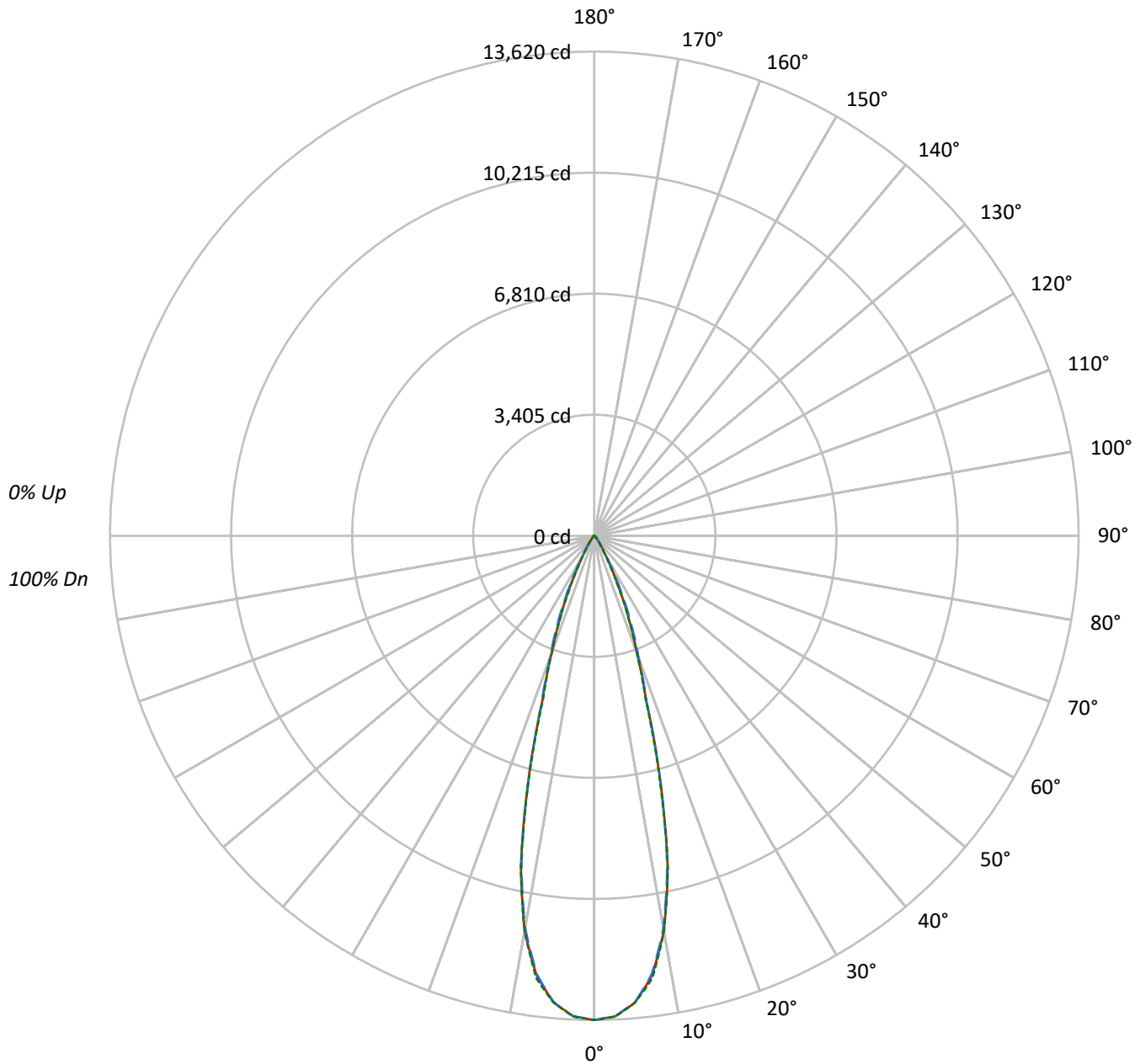


Downlight

TEST NUMBER: P781477

CATALOG NUMBER: LER4D45BD010-EC4DR3040509030-4LBS1H

Luminous Intensity Polar Plot



TEST NUMBER: P781477

CATALOG NUMBER: LER4D45BD010-EC4DR3040509030-4LBS1H

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	115	113	111	109	112	110	109	107	106	105	104		103	102	101		99
2	111	107	104	101	109	105	102	100	102	100	98		99	97	96		97
3	107	102	98	95	105	101	97	94	98	95	93		96	93	91		94
4	103	98	93	90	102	96	93	90	94	91	89		93	90	88		91
5	100	94	89	86	98	93	89	86	91	88	85		90	86	84		88
6	97	90	85	82	95	89	85	82	88	84	81		87	83	81		85
7	94	87	82	79	92	86	82	79	85	81	78		84	81	78		83
8	91	84	79	76	90	83	79	76	82	78	76		81	78	75		80
9	88	81	76	73	87	80	76	73	80	76	73		79	75	73		78
10	85	78	74	71	85	78	74	71	77	73	71		76	73	71		76

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1042552	1042552	1042552
5°	1012619	1011435	1012673
10°	877087	870900	876877
15°	572249	569183	566322
20°	284558	295228	284175
25°	143339	161641	140400
30°	57388	62532	49999
35°	26622	25491	21370
40°	11491	12760	10821
45°	8108	10067	8184
50°	2786	7323	2941
55°	1601	3029	1695
60°	1133	1332	1133
65°	724	724	724
70°	448	291	448
75°	0	207	0
80°	0	0	0
85°	0	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 22.5°

Vertical Angle: 45°

Luminance: 10067 cd/sqm



TEST NUMBER: P781477

CATALOG NUMBER: LER4D45BD010-EC4DR3040509030-4LBS1H

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	1197.7	28.3
10°-20°	1928.9	45.5
20°-30°	833.5	19.7
30°-40°	190.0	4.5
40°-50°	65.2	1.5
50°-60°	15.9	0.4
60°-70°	4.1	0.1
70°-80°	0.4	0.0
80°-90°	0.0	0.0
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°	3960.2	93.5
0°-40°	4150.1	98.0
0°-60°	4231.3	99.9
0°-90°	4235.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4235.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	13620	13620	13620	13620	13620	
5°	13179	13166	13164	13191	13180	1199
15°	7221	7134	7183	7159	7147	1934
25°	1697	1761	1914	1717	1662	812
35°	285	291	273	271	229	193
45°	75	93	93	93	76	53
55°	12	13	23	13	13	12
65°	4	4	4	4	4	4
75°	0	0	1	0	0	1
85°	0	0	0	0	0	0
90°	0	0	0	0	0	



TEST NUMBER: P781477

CATALOG NUMBER: LER4D45BD010-EC4DR3040509030-4LBS1H

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	13620.4	13620.4	13620.4	13620.4	13620.4
2.5°	13530.1	13520.7	13526.1	13532.8	13535.5
5°	13179.0	13166.3	13163.6	13191.1	13179.7
7.5°	12470.9	12452.8	12425.4	12487.6	12545.8
10°	11284.6	11264.5	11205.0	11234.4	11281.9
12.5°	9533.2	9468.3	9467.0	9560.6	9547.9
15°	7221.4	7134.5	7182.7	7159.3	7146.6
17.5°	4856.2	4822.8	4887.0	4867.6	4784.0
20°	3493.4	3502.1	3624.4	3562.9	3488.7
22.5°	2549.1	2580.6	2725.7	2567.2	2509.0
25°	1697.2	1761.4	1913.9	1716.6	1662.4
27.5°	1043.9	1073.3	1227.8	1030.5	1001.1
30°	649.3	634.6	707.5	607.2	565.7
32.5°	426.0	407.2	430.7	386.5	353.1
35°	284.9	290.9	272.8	270.8	228.7
37.5°	177.9	204.6	180.6	192.6	147.1
40°	115.0	148.5	127.7	141.1	108.3
42.5°	94.3	114.4	105.0	111.7	96.3
45°	74.9	93.0	93.0	93.0	75.6
47.5°	41.5	62.2	79.6	63.5	44.1
50°	23.4	31.4	61.5	32.8	24.7
52.5°	16.0	18.1	42.1	18.7	16.7
55°	12.0	12.7	22.7	13.4	12.7
57.5°	9.4	10.0	12.0	10.0	9.4
60°	7.4	7.4	8.7	8.0	7.4
62.5°	5.3	5.3	6.0	5.3	5.3
65°	4.0	4.0	4.0	4.0	4.0
67.5°	2.0	2.7	2.7	2.7	2.7
70°	2.0	1.3	1.3	1.3	2.0
72.5°	1.3	0.7	0.7	0.7	0.7
75°	0.0	0.0	0.7	0.0	0.0
77.5°	0.0	0.0	0.0	0.0	0.0
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0



Report Generated By 670245859 / DESKTOP-T8S5UU9





— 0°-180° - - 45°-225° - - - 90°-270°







(END OF REPORT)