

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for  
Cooper Lighting Solutions  
(formerly Eaton)

Brand: PORTFOLIO

Report Number: P247388

Luminaire Tested: **LSR8B100D010 EC8B100830 8LBW0WH**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P247388  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13927)  
Test Lab: INNOVATION CENTER-P1  
Issue Date: 03/03/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: PORTFOLIO  
Catalog Number: LSR8B100D010 EC8B100830 8LBW0WH  
Description: PORTFOLIO 8 INCH WIDE DISTRIBUTION 60 DEGREE CUTOFF RECESSED  
DOWNLIGHT- CYLINDEC  
80 CRI 3000 CCT WITH WHEAT TRIM  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 10873.0 lumens  
Efficiency: N/A  
Efficacy: 102.3 lumens/watt  
Spacing Criteria (0/90/45): 1.23 / 1.24 / 1.12  
Luminous Opening: Circular (Dia: 0.67' x H: 0')  
CIE Type: Direct

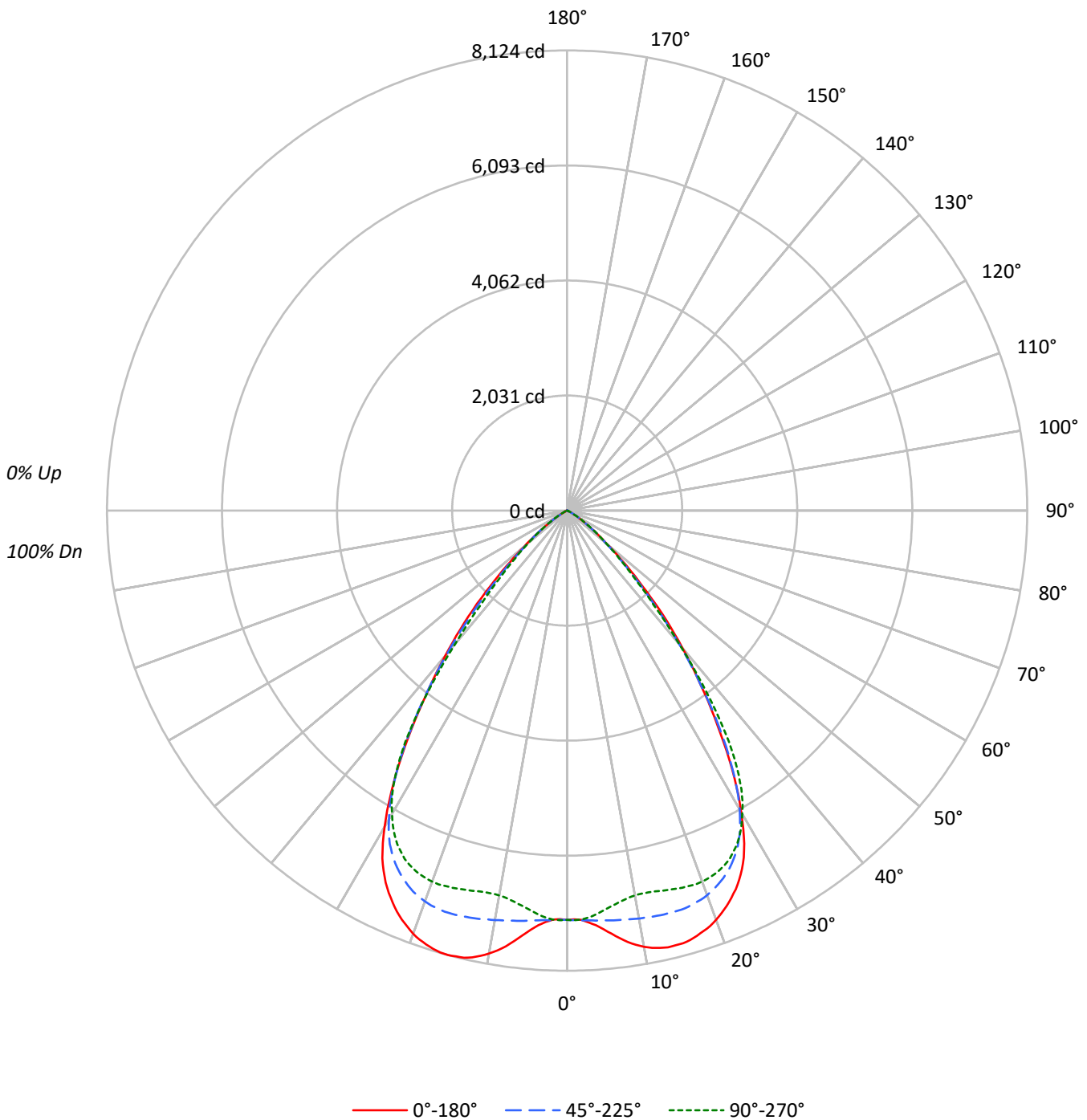
Input Watts (W): 106.3  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	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					100			
1	113	110	107	105	110	108	105	103	104	102	100	100	98	97	96	95	94					92				
2	106	101	96	93	104	99	95	92	96	92	90	93	90	88	90	88	86					84				
3	100	93	87	83	98	91	86	82	89	84	81	86	83	79	84	81	78					76				
4	94	85	79	74	92	84	79	74	82	77	73	80	76	72	78	74	71					70				
5	88	79	72	67	87	78	72	67	76	71	67	74	70	66	73	69	65					64				
6	83	73	66	61	81	72	66	61	71	65	61	69	64	60	68	63	60					58				
7	78	68	61	56	77	67	61	56	66	60	56	64	59	55	63	59	55					53				
8	74	63	56	52	72	62	56	51	61	55	51	60	55	51	59	54	51					49				
9	70	59	52	48	68	58	52	48	57	51	47	56	51	47	55	50	47					45				
10	66	55	48	44	65	54	48	44	54	48	44	53	47	44	52	47	44					42				

**AVERAGE LUMINANCE (cd/sqm):**

	0°	90°	180°
0°	222863	222863	222863
5°	229704	219725	230082
10°	244854	216015	248702
15°	252389	221317	259345
20°	252379	228706	260944
25°	244650	230860	253425
30°	218971	220281	229464
35°	174406	187464	184114
40°	127420	123962	134710
45°	81405	72570	88500
50°	44039	43152	47282
55°	22612	23440	22612
60°	9843	9843	7191
65°	2021	2692	2240
70°	1379	1938	2209
75°	0	1096	0
80°	533	533	2184
85°	0	1061	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	696.6	6.4
10°-20°	2095.9	19.3
20°-30°	3190.1	29.3
30°-40°	2968.8	27.3
40°-50°	1444.9	13.3
50°-60°	411.7	3.8
60°-70°	53.8	0.5
70°-80°	8.5	0.1
80°-90°	2.6	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°	5982.7	55.0
0°-40°	8951.5	82.3
0°-60°	10808.1	99.4
0°-90°	10873.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	10873.0	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	7227	7227	7227	7227	7227	
5°	7421	7258	7098	7264	7433	723
15°	7906	7332	6933	7402	8124	2224
25°	7190	6877	6785	7028	7448	3264
35°	4633	4697	4980	4928	4891	2881
45°	1867	1728	1664	1864	2029	1476
55°	421	421	436	427	421	413
65°	28	34	37	34	31	53
75°	0	3	9	3	0	6
85°	0	3	3	6	0	1
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	7227.3	7227.3	7227.3	7227.3	7227.3	7227.3	7227.3	7227.3	7227.3
1°	7218.1	7227.3	7233.5	7230.4	7233.5	7230.4	7224.3	7212.0	7212.0
2°	7230.4	7242.7	7239.5	7233.5	7224.3	7224.3	7242.7	7218.1	7224.3
3°	7279.5	7279.5	7242.7	7209.0	7196.6	7209.0	7239.5	7258.0	7273.4
4°	7340.9	7328.6	7255.0	7178.3	7153.6	7184.3	7251.9	7310.2	7340.9
5°	7420.8	7383.9	7258.0	7141.3	7098.4	7144.4	7264.2	7374.6	7433.0
6°	7512.9	7457.5	7276.4	7101.4	7046.2	7110.6	7282.6	7451.5	7540.4
7°	7605.0	7515.9	7285.7	7070.7	7000.1	7089.2	7297.9	7537.4	7654.0
8°	7690.9	7571.1	7294.9	7043.2	6957.1	7049.2	7310.2	7614.1	7767.7
9°	7761.6	7623.3	7301.0	7021.7	6920.3	7024.7	7325.6	7681.7	7862.8
10°	7819.8	7663.3	7313.3	7009.3	6898.8	7012.4	7340.9	7740.1	7942.7
11°	7866.0	7690.9	7316.4	7003.2	6889.6	7003.2	7353.2	7798.4	8010.3
12°	7893.5	7715.5	7325.6	7006.3	6892.6	7012.4	7371.6	7823.0	8065.5
13°	7912.0	7724.7	7331.7	7015.5	6898.8	7018.5	7383.9	7844.5	8102.3
14°	7912.0	7718.6	7331.7	7024.7	6917.3	7030.8	7393.1	7859.8	8111.5
15°	7905.9	7715.5	7331.7	7040.0	6932.6	7043.2	7402.3	7869.0	8123.8
16°	7887.5	7697.0	7328.6	7049.2	6947.9	7055.4	7405.3	7862.8	8114.7
17°	7850.6	7687.9	7316.4	7058.4	6963.3	7067.7	7405.3	7847.5	8093.1
18°	7801.4	7623.3	7285.7	7049.2	6966.3	7064.6	7387.0	7807.6	8053.3
19°	7758.4	7586.6	7264.2	7043.2	6978.6	7073.9	7374.6	7779.9	8010.3
20°	7690.9	7525.1	7227.3	7024.7	6969.5	7055.4	7344.1	7730.9	7951.9
21°	7608.0	7454.5	7175.1	6994.0	6954.1	7030.8	7301.0	7663.3	7872.0
22°	7525.1	7374.6	7119.9	6963.3	6929.5	7009.3	7255.0	7592.6	7789.1
23°	7426.8	7285.7	7049.2	6911.1	6892.6	6960.3	7190.5	7515.9	7690.9
24°	7316.4	7181.3	6972.5	6852.7	6846.6	6908.1	7116.8	7414.6	7574.3
25°	7190.5	7070.7	6877.4	6779.0	6785.2	6837.4	7027.7	7301.0	7448.4
26°	7040.0	6929.5	6766.8	6690.1	6699.3	6751.5	6926.4	7169.0	7310.2
27°	6871.2	6769.8	6637.9	6582.5	6607.2	6653.2	6803.7	7024.7	7138.3
28°	6659.4	6579.5	6484.3	6459.8	6490.5	6542.7	6668.6	6849.7	6951.0
29°	6413.7	6370.7	6297.1	6309.3	6352.3	6395.2	6499.6	6631.7	6711.6
30°	6149.7	6131.2	6088.3	6137.4	6186.5	6223.4	6294.0	6383.0	6444.4
31°	5879.5	5858.0	5864.1	5944.0	6017.6	6042.2	6082.1	6125.1	6171.2
32°	5575.6	5569.4	5593.9	5710.7	5805.8	5818.1	5821.1	5833.4	5858.0
33°	5265.5	5256.2	5305.4	5449.7	5557.1	5566.4	5541.7	5529.5	5547.9
34°	4943.1	4943.1	5007.5	5158.0	5283.9	5293.0	5244.0	5237.8	5219.3
35°	4633.0	4623.7	4697.4	4838.7	4979.9	4983.0	4927.7	4893.9	4890.9
37.5°	3865.4	3850.1	3874.6	3948.3	4052.7	4108.0	4101.8	4089.6	4080.3
40°	3165.4	3128.6	3079.5	3048.8	3079.5	3193.1	3291.3	3337.4	3346.5
42.5°	2505.3	2453.2	2348.8	2262.7	2275.1	2379.5	2529.9	2634.2	2686.4
45°	1866.7	1814.5	1728.5	1664.1	1664.1	1737.8	1863.6	1971.0	2029.4
47.5°	1332.5	1298.7	1249.6	1221.9	1240.4	1271.1	1341.7	1421.6	1446.1
50°	918.0	908.7	881.2	881.2	899.5	924.2	936.4	976.4	985.6
52.5°	641.7	626.3	629.3	632.5	647.8	650.9	669.3	660.0	675.5
55°	420.6	420.6	420.6	429.8	436.0	436.0	426.8	420.6	420.6
57.5°	267.2	261.0	264.0	270.2	270.2	261.0	245.7	242.5	227.2



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
60°	159.6	159.6	162.8	162.8	159.6	150.4	135.1	122.8	116.6
62.5°	82.9	85.9	85.9	101.4	85.9	76.7	70.6	55.2	52.2
65°	27.7	33.7	33.7	33.7	36.9	33.7	33.7	30.7	30.7
67.5°	18.5	21.5	21.5	24.5	24.5	24.5	24.5	30.7	21.5
70°	15.3	15.3	18.5	21.5	21.5	24.5	18.5	15.3	24.5
72.5°	9.2	12.3	9.2	15.3	12.3	12.3	12.3	12.3	12.3
75°	0.0	6.2	3.0	0.0	9.2	6.2	3.0	6.2	0.0
77.5°	3.0	3.0	3.0	3.0	6.2	6.2	6.2	6.2	3.0
80°	3.0	3.0	6.2	3.0	3.0	6.2	0.0	0.0	12.3
82.5°	3.0	3.0	3.0	3.0	3.0	3.0	0.0	3.0	3.0
85°	0.0	3.0	3.0	3.0	3.0	3.0	6.2	6.2	0.0
87.5°	0.0	3.0	0.0	3.0	0.0	0.0	0.0	6.2	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)