

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: P247386

Luminaire Tested: **LSR8B80D010 EC8B80830 8LBW0WH**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P247386  
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: LSR8B80D010 EC8B80830 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: 8367.0 lumens  
Efficiency: N/A  
Efficacy: 112.5 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

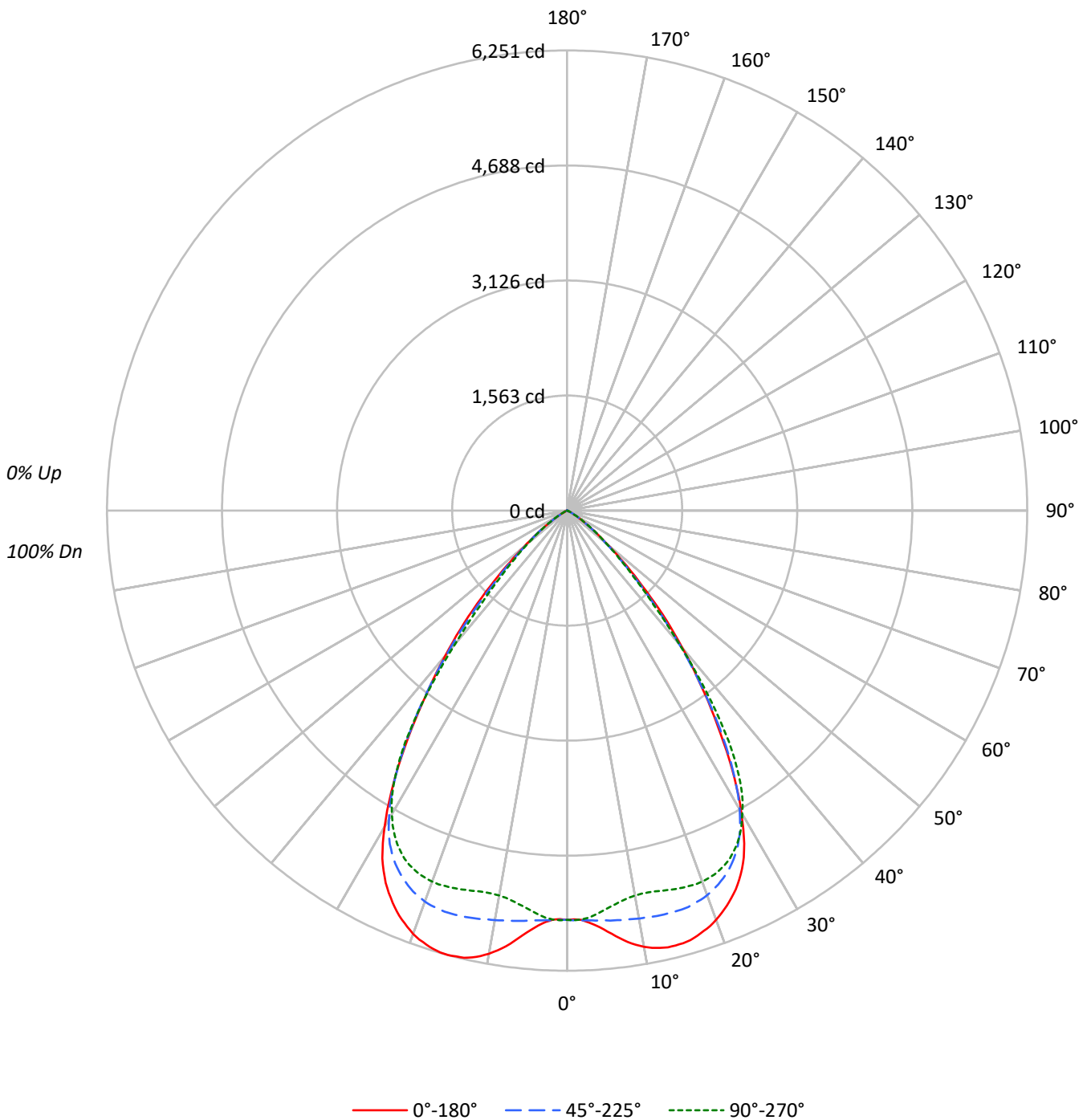
Input Watts (W): 74.4  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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

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

	0°	90°	180°
0°	171496	171496	171496
5°	176760	169084	177054
10°	188420	166229	191382
15°	194220	170309	199570
20°	194211	175995	200804
25°	188262	177653	195016
30°	168502	169509	176577
35°	134209	144256	141678
40°	98051	95390	103662
45°	62640	55841	68104
50°	33888	33207	36383
55°	17397	18037	17397
60°	7573	7573	5538
65°	1554	2072	1722
70°	1064	1488	1704
75°	0	846	0
80°	408	408	1669
85°	0	814	0



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	536.1	6.4
10°-20°	1612.9	19.3
20°-30°	2454.9	29.3
30°-40°	2284.5	27.3
40°-50°	1111.9	13.3
50°-60°	316.8	3.8
60°-70°	41.4	0.5
70°-80°	6.5	0.1
80°-90°	2.0	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°	4603.8	55.0
0°-40°	6888.3	82.3
0°-60°	8317.1	99.4
0°-90°	8367.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	8367.0	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	5562	5562	5562	5562	5562	
5°	5710	5585	5462	5590	5720	556
15°	6084	5642	5335	5696	6251	1712
25°	5533	5292	5221	5408	5732	2512
35°	3565	3615	3832	3792	3764	2217
45°	1436	1330	1280	1434	1562	1135
55°	324	324	336	328	324	317
65°	21	26	28	26	24	41
75°	0	2	7	2	0	4
85°	0	2	2	5	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°	5561.5	5561.5	5561.5	5561.5	5561.5	5561.5	5561.5	5561.5	5561.5
1°	5554.4	5561.5	5566.3	5564.0	5566.3	5564.0	5559.2	5549.8	5549.8
2°	5564.0	5573.4	5571.0	5566.3	5559.2	5559.2	5573.4	5554.4	5559.2
3°	5601.7	5601.7	5573.4	5547.4	5537.9	5547.4	5571.0	5585.2	5597.0
4°	5649.0	5639.5	5582.8	5523.8	5504.9	5528.5	5580.5	5625.3	5649.0
5°	5710.4	5682.0	5585.2	5495.4	5462.4	5497.8	5589.9	5674.9	5719.9
6°	5781.3	5738.7	5599.4	5464.7	5422.2	5471.8	5604.1	5734.1	5802.5
7°	5852.2	5783.7	5606.5	5441.1	5386.7	5455.3	5615.9	5800.2	5889.9
8°	5918.3	5826.2	5613.6	5419.9	5353.6	5424.5	5625.3	5859.2	5977.4
9°	5972.7	5866.3	5618.2	5403.3	5325.3	5405.7	5637.2	5911.2	6050.6
10°	6017.5	5897.0	5627.8	5393.8	5308.8	5396.2	5649.0	5956.2	6112.1
11°	6053.0	5918.3	5630.1	5389.1	5301.7	5389.1	5658.4	6001.0	6164.1
12°	6074.2	5937.2	5637.2	5391.5	5304.0	5396.2	5672.6	6020.0	6206.6
13°	6088.4	5944.3	5641.9	5398.6	5308.8	5400.9	5682.0	6036.5	6234.9
14°	6088.4	5939.6	5641.9	5405.7	5323.0	5410.3	5689.1	6048.3	6242.0
15°	6083.8	5937.2	5641.9	5417.4	5334.8	5419.9	5696.2	6055.4	6251.4
16°	6069.6	5923.0	5639.5	5424.5	5346.5	5429.3	5698.6	6050.6	6244.4
17°	6041.2	5916.0	5630.1	5431.6	5358.4	5438.7	5698.6	6038.8	6227.8
18°	6003.3	5866.3	5606.5	5424.5	5360.7	5436.4	5684.5	6008.1	6197.2
19°	5970.3	5838.0	5589.9	5419.9	5370.2	5443.5	5674.9	5986.8	6164.1
20°	5918.3	5790.8	5561.5	5405.7	5363.2	5429.3	5651.4	5949.1	6119.2
21°	5854.5	5736.4	5521.4	5382.0	5351.3	5410.3	5618.2	5897.0	6057.7
22°	5790.8	5674.9	5478.9	5358.4	5332.4	5393.8	5582.8	5842.7	5993.9
23°	5715.1	5606.5	5424.5	5318.2	5304.0	5356.1	5533.2	5783.7	5918.3
24°	5630.1	5526.1	5365.5	5273.3	5268.6	5315.9	5476.6	5705.7	5828.6
25°	5533.2	5441.1	5292.3	5216.6	5221.4	5261.5	5408.0	5618.2	5731.7
26°	5417.4	5332.4	5207.2	5148.1	5155.2	5195.4	5330.0	5516.7	5625.3
27°	5287.5	5209.5	5108.0	5065.4	5084.4	5119.8	5235.6	5405.7	5493.1
28°	5124.5	5063.1	4989.8	4971.0	4994.6	5034.8	5131.6	5271.0	5349.0
29°	4935.5	4902.4	4845.7	4855.1	4888.2	4921.3	5001.6	5103.2	5164.7
30°	4732.3	4718.1	4685.1	4722.9	4760.6	4789.0	4843.4	4911.8	4959.1
31°	4524.4	4507.9	4512.5	4574.0	4630.7	4649.6	4680.3	4713.4	4748.9
32°	4290.5	4285.8	4304.6	4394.5	4467.7	4477.1	4479.5	4488.9	4507.9
33°	4051.9	4044.8	4082.6	4193.7	4276.3	4283.4	4264.5	4255.0	4269.2
34°	3803.8	3803.8	3853.4	3969.2	4066.1	4073.1	4035.4	4030.6	4016.4
35°	3565.2	3558.1	3614.8	3723.5	3832.1	3834.5	3791.9	3766.0	3763.6
37.5°	2974.5	2962.7	2981.6	3038.3	3118.6	3161.2	3156.4	3147.0	3139.9
40°	2435.8	2407.5	2369.7	2346.1	2369.7	2457.1	2532.7	2568.2	2575.2
42.5°	1927.9	1887.8	1807.4	1741.2	1750.7	1831.1	1946.8	2027.1	2067.3
45°	1436.4	1396.3	1330.1	1280.5	1280.5	1337.2	1434.1	1516.8	1561.7
47.5°	1025.4	999.4	961.6	940.3	954.5	978.1	1032.5	1093.9	1112.8
50°	706.4	699.3	678.1	678.1	692.2	711.2	720.6	751.3	758.4
52.5°	493.8	482.0	484.3	486.7	498.5	500.9	515.0	507.9	519.8
55°	323.6	323.6	323.6	330.7	335.5	335.5	328.4	323.6	323.6
57.5°	205.6	200.8	203.1	207.9	207.9	200.8	189.0	186.6	174.8



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
60°	122.8	122.8	125.3	125.3	122.8	115.7	104.0	94.5	89.8
62.5°	63.8	66.1	66.1	78.0	66.1	59.0	54.4	42.5	40.2
65°	21.3	26.0	26.0	26.0	28.4	26.0	26.0	23.6	23.6
67.5°	14.2	16.5	16.5	18.9	18.9	18.9	18.9	23.6	16.5
70°	11.8	11.8	14.2	16.5	16.5	18.9	14.2	11.8	18.9
72.5°	7.1	9.4	7.1	11.8	9.4	9.4	9.4	9.4	9.4
75°	0.0	4.8	2.3	0.0	7.1	4.8	2.3	4.8	0.0
77.5°	2.3	2.3	2.3	2.3	4.8	4.8	4.8	4.8	2.3
80°	2.3	2.3	4.8	2.3	2.3	4.8	0.0	0.0	9.4
82.5°	2.3	2.3	2.3	2.3	2.3	2.3	0.0	2.3	2.3
85°	0.0	2.3	2.3	2.3	2.3	2.3	4.8	4.8	0.0
87.5°	0.0	2.3	0.0	2.3	0.0	0.0	0.0	4.8	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)