

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: P#

Luminaire Tested: **LD4C08D010 EX4C089040 4LBSQLI**

Issue Date: 2/9/2022

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.



Test Information

Test Method: LM-79-08
Report Number: P#
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P209151)
Test Lab: INNOVATION CENTER
Issue Date: 2/9/2022
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LD4C08D010 EX4C089040 4LBSQLI
Description: 4 INCH 800 LUMEN PORTFOLIO LED DOWNLIGHT WITH, 4000K, 90CRI LEDS AND 4LBSQ TRIM WITH LI FINISH
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

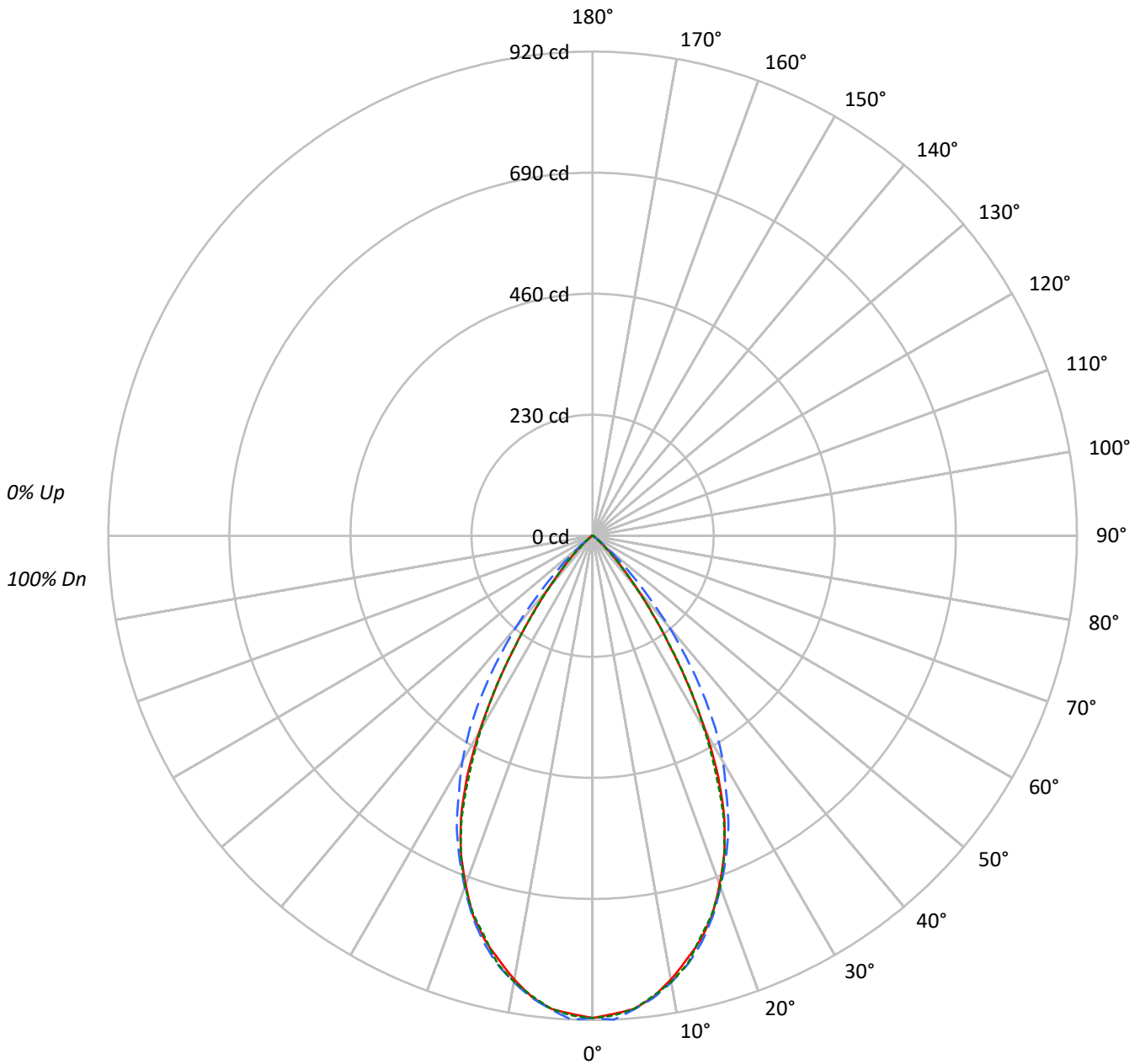
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 846.0 lumens
Efficiency: N/A
Efficacy: 85.5 lumens/watt
Spacing Criteria (0/90/45): 0.91 / 0.9 / 0.94
Luminous Opening: Rectangular (W 0.33' x L: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 9.9
Input Voltage (V):
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

TEST NUMBER: P#
CATALOG NUMBER: LD4C08D010 EX4C089040 4LBSQLI

Luminous Intensity Polar Plot





TEST NUMBER: P#

CATALOG NUMBER: LD4C08D010 EX4C089040 4LBSQLI

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									20									
RC	80									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	0																
RCR																																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100																			
1	113	111	108	106	111	108	106	104	104	103	101	101	99	98	97	96	95	93																			
2	108	103	99	95	105	101	97	94	98	95	92	95	92	90	92	90	88	87																			
3	102	96	91	87	100	94	90	86	92	88	84	89	86	83	87	84	82	80																			
4	97	89	84	79	95	88	83	79	86	81	78	84	80	77	82	79	76	75																			
5	92	83	77	73	90	82	77	73	81	76	72	79	75	71	77	74	71	69																			
6	87	78	72	68	86	77	71	67	76	71	67	74	70	66	73	69	66	64																			
7	83	73	67	63	81	73	67	63	71	66	62	70	65	62	69	65	62	60																			
8	79	69	63	59	77	68	62	58	67	62	58	66	61	58	65	61	58	56																			
9	75	65	59	55	74	64	59	55	63	58	55	63	58	54	62	57	54	53																			
10	71	61	55	51	70	61	55	51	60	55	51	59	54	51	58	54	51	50																			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	88413	88413	88413
5°	87404	87511	87404
10°	83908	84417	84310
15°	79325	79904	78915
20°	72390	72935	72750
25°	63037	65017	62601
30°	47931	55129	47218
35°	30178	42864	30449
40°	16274	28303	15984
45°	7710	13987	7628
50°	2882	5239	2882
55°	1363	1665	1278
60°	907	791	907
65°	525	525	525
70°	339	508	339
75°	224	224	224
80°	333	333	333
85°	0	0	0



TEST NUMBER: P#

CATALOG NUMBER: LD4C08D010 EX4C089040 4LBSQLI

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	85.0	10.0
10°-20°	222.7	26.3
20°-30°	272.0	32.2
30°-40°	190.2	22.5
40°-50°	62.3	7.4
50°-60°	9.9	1.2
60°-70°	2.7	0.3
70°-80°	0.9	0.1
80°-90°	0.3	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°	579.6	68.5
0°-40°	769.9	91.0
0°-60°	842.1	99.5
0°-90°	846.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	846.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	916	916	916	916	916	
5°	902	903	904	898	902	85
15°	794	797	800	795	790	222
25°	592	601	611	600	588	266
35°	256	302	364	298	258	163
45°	56	70	102	69	56	47
55°	8	9	10	9	8	8
65°	2	3	2	3	2	3
75°	1	1	1	1	1	1
85°	0	0	0	0	0	0
90°	0	0	0	0	0	



TEST NUMBER: P#

CATALOG NUMBER: LD4C08D010 EX4C089040 4LBSQLI

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	916.3	916.3	916.3	916.3	916.3	916.3	916.3	916.3	916.3	916.3	916.3
2.5°	909.4	915.8	914.0	918.1	918.1	913.5	914.6	916.3	918.7	920.4	906.4
5°	902.4	908.2	903.0	908.8	905.3	900.1	908.8	904.1	907.0	903.5	905.9
7.5°	883.8	893.1	882.6	889.6	887.2	884.3	887.8	886.7	888.4	885.5	879.1
10°	856.4	864.0	857.0	866.9	862.2	859.3	862.2	865.1	864.5	861.6	865.1
12.5°	825.0	833.7	830.2	836.0	830.8	830.8	837.8	836.0	836.6	834.3	838.3
15°	794.1	800.5	795.3	802.8	800.5	794.1	797.0	797.0	801.7	799.9	795.3
17.5°	755.7	760.9	755.1	756.8	754.5	753.3	765.6	757.4	762.1	758.6	759.2
20°	705.0	707.4	705.6	710.3	707.4	710.8	709.7	708.5	708.5	710.3	706.2
22.5°	653.8	653.8	655.5	656.7	659.0	655.5	662.5	656.7	657.3	661.4	660.2
25°	592.1	590.3	594.4	600.2	602.6	599.6	609.0	604.3	607.8	610.7	604.3
27.5°	517.0	517.0	521.0	531.0	532.7	536.2	549.0	549.0	553.6	549.6	554.2
30°	430.2	436.6	441.9	454.7	458.8	466.3	479.7	486.1	496.6	494.8	492.5
32.5°	341.2	349.9	350.5	363.9	374.9	387.7	405.8	420.9	428.5	433.7	427.9
35°	256.2	261.4	266.1	275.4	294.0	310.9	327.2	347.0	360.4	363.9	358.6
37.5°	187.5	188.6	193.3	202.0	216.0	232.3	252.1	273.6	287.6	292.8	287.0
40°	129.2	130.4	132.7	140.3	152.0	163.6	179.3	201.4	214.2	224.7	217.1
42.5°	86.7	87.9	90.2	96.1	102.5	113.5	125.7	139.7	152.0	156.6	152.5
45°	56.5	56.5	57.6	61.7	65.2	73.9	82.7	91.4	99.5	102.5	99.5
47.5°	33.2	33.8	34.9	37.8	41.9	45.4	51.8	57.6	60.0	62.3	61.1
50°	19.2	19.2	21.0	22.7	25.6	27.9	30.3	32.6	33.8	34.9	33.8
52.5°	10.5	11.1	11.6	12.2	13.4	15.7	17.5	17.5	18.1	18.6	18.1
55°	8.1	8.1	8.1	8.1	8.7	8.7	8.7	9.3	9.3	9.9	9.3
57.5°	5.8	5.8	5.8	6.4	6.4	6.4	5.8	5.8	5.8	5.8	5.8
60°	4.7	4.7	4.7	4.7	4.7	4.7	4.7	4.1	4.1	4.1	4.1
62.5°	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
65°	2.3	2.3	2.9	2.9	2.9	2.9	2.9	2.3	2.3	2.3	2.3
67.5°	1.8	1.8	1.8	1.8	2.3	2.3	1.8	1.8	1.8	1.8	1.8
70°	1.2	1.2	1.2	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8
72.5°	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2
75°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
77.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
80°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P#

CATALOG NUMBER: LD4C08D010 EX4C089040 4LBSQLI

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	916.3	916.3	916.3	916.3	916.3	916.3	916.3	916.3
2.5°	916.3	906.4	907.6	912.9	909.9	912.9	912.3	912.3
5°	906.4	903.5	898.9	897.1	900.6	908.2	907.0	902.4
7.5°	887.8	880.3	885.5	887.8	884.9	889.6	891.9	882.0
10°	865.7	862.8	861.6	862.8	861.6	866.3	860.5	860.5
12.5°	834.3	829.6	829.6	836.6	832.5	829.0	833.7	833.1
15°	802.8	793.5	793.5	795.8	797.6	795.3	795.8	790.0
17.5°	756.2	753.3	749.3	755.7	757.4	755.1	756.8	753.9
20°	712.6	712.6	705.0	707.9	710.3	712.0	713.2	708.5
22.5°	656.7	657.9	652.6	658.4	660.2	654.4	655.5	654.4
25°	605.5	604.9	600.8	598.5	599.6	597.3	596.7	588.0
27.5°	549.0	543.2	534.4	536.8	526.9	518.7	518.7	505.3
30°	487.9	478.0	466.3	454.7	446.0	436.6	431.4	423.8
32.5°	416.3	402.9	388.3	372.6	362.7	348.7	341.2	345.2
35°	345.2	325.4	305.6	289.9	274.8	266.6	257.3	258.5
37.5°	276.5	248.6	231.1	214.2	201.4	191.0	186.9	185.7
40°	202.0	179.9	162.4	150.2	141.5	133.3	128.7	126.9
42.5°	139.7	124.0	110.0	100.1	94.3	89.1	86.7	86.2
45°	90.8	81.5	72.2	65.2	60.6	57.1	56.5	55.9
47.5°	57.1	52.4	46.6	41.3	37.3	34.9	33.2	33.2
50°	32.6	30.9	27.9	25.0	22.7	21.5	19.8	19.2
52.5°	17.5	17.5	16.3	14.0	12.2	11.1	11.1	10.5
55°	9.3	9.3	8.7	8.7	8.1	8.1	8.1	7.6
57.5°	5.8	5.8	6.4	6.4	5.8	5.8	5.8	5.8
60°	4.1	4.7	4.7	4.7	4.7	4.7	4.7	4.7
62.5°	3.5	3.5	3.5	3.5	3.5	3.5	3.5	3.5
65°	2.3	2.9	2.9	2.9	2.9	2.3	2.3	2.3
67.5°	1.8	1.8	1.8	1.8	1.8	1.8	1.8	1.8
70°	1.8	1.8	1.8	1.8	1.8	1.2	1.2	1.2
72.5°	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2
75°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
77.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
80°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
82.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	0.6
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-50001EG





— 0°-180° - - 45°-225° - - - - 90°-270°









(END OF REPORT)