

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: P856784

Luminaire Tested: **LD4C10D010 EU4109050 4LBMDSWWMH**

Issue Date: 4/12/2024



Test Information

Test Method: LM-79-08
Report Number: P856784
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2309-186-3)
Test Lab: INNOVATION CENTER
Issue Date: 4/12/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LD4C10D010 EU4109050 4LBMDSWWMH
Description: 4 INCH 1000 LUMEN PORTFOLIO LED DOWNLIGHT WITH, 5000K, 90CRI LEDS
AND 4LBMDSW TRIM WITH WMH FINISH
Light Source: -
Ballast/Driver: -

Summary

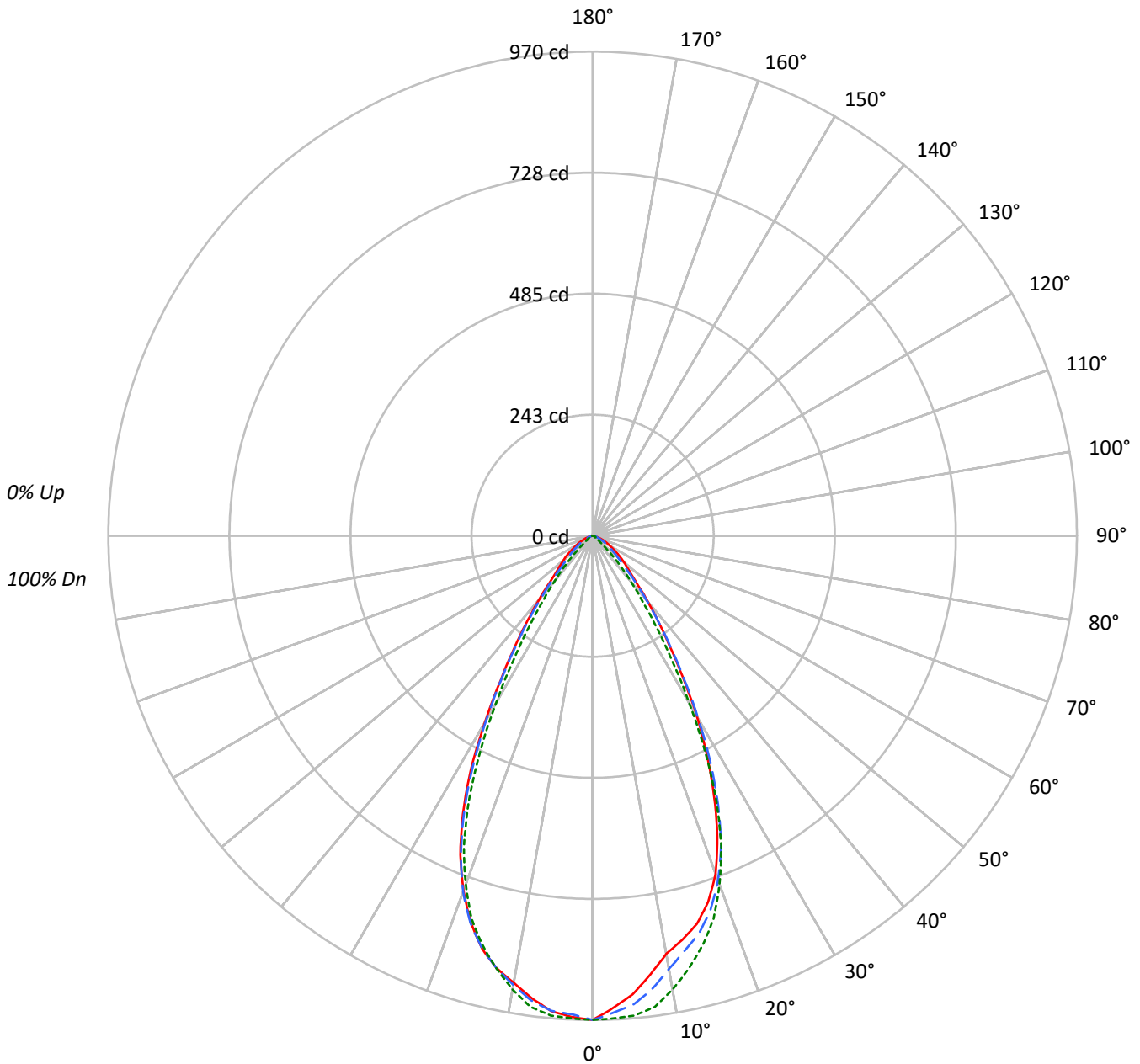
Lumens per Lamp: N/A
Luminaire Lumens: 882.9 lumens
Efficiency: N/A
Efficacy: 90.1 lumens/watt
Spacing Criteria (0/90/45): 0.88 / 0.88 / 0.85
Luminous Opening: Circular (Dia: 0.33' x H: 0')
CIE Type: Direct

Input Watts (W): 9.8
Input Voltage (V): NR
Input Current (A_{in}): 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: P856784

CATALOG NUMBER: LD4C10D010 EU4109050 4LBMDSWWMH

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	0
RCR																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100	100	100	100
1	113	110	107	105	111	108	105	103	104	102	100	100	99	97	97	95	94	92	92	92	92
2	107	102	97	94	105	100	96	93	97	93	91	94	91	89	91	89	87	85	85	85	85
3	101	94	89	85	99	93	88	84	90	86	83	88	84	81	85	83	80	78	78	78	78
4	96	88	82	77	94	86	81	77	84	80	76	82	78	75	80	77	74	72	72	72	72
5	91	82	75	71	89	81	75	71	79	74	70	77	73	69	76	72	69	67	67	67	67
6	86	76	70	66	84	76	70	65	74	69	65	73	68	64	71	67	64	62	62	62	62
7	81	72	65	61	80	71	65	61	70	64	60	68	64	60	67	63	60	58	58	58	58
8	77	67	61	57	76	67	61	57	66	60	56	65	60	56	64	59	56	55	55	55	55
9	74	63	57	53	72	63	57	53	62	57	53	61	56	53	60	56	53	51	51	51	51
10	70	60	54	50	69	60	54	50	59	53	50	58	53	50	57	53	49	48	48	48	48

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	119168	119168	119168
5°	113704	118969	117860
10°	106049	115118	113434
15°	102411	108122	108885
20°	94197	97138	98903
25°	78079	79502	83352
30°	59396	54928	61099
35°	40209	32920	40659
40°	27392	18860	26542
45°	19007	9504	17965
50°	15462	3861	14449
55°	12509	2399	11395
60°	9927	1843	9017
65°	7849	1512	6977
70°	5927	1329	5388
75°	4272	1044	3892
80°	3184	1061	2618
85°	2114	987	2114



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	89.2	10.1
10°-20°	234.3	26.5
20°-30°	268.8	30.4
30°-40°	163.3	18.5
40°-50°	70.0	7.9
50°-60°	33.6	3.8
60°-70°	16.3	1.8
70°-80°	6.0	0.7
80°-90°	1.4	0.2
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°	592.3	67.1
0°-40°	755.6	85.6
0°-60°	859.2	97.3
0°-90°	882.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	882.9	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	970	970	970	970	970	
5°	922	942	965	955	956	86
15°	805	824	850	855	856	224
25°	576	595	586	609	615	261
35°	268	272	220	265	271	172
45°	109	97	55	88	103	89
55°	58	43	11	39	53	53
65°	27	18	5	16	24	27
75°	9	6	2	5	8	10
85°	2	2	1	1	2	2
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°	970.0	970.0	970.0	970.0	970.0	970.0	970.0	970.0	970.0
2.5°	946.7	957.2	956.5	965.5	967.7	965.5	959.5	965.5	964.7
5°	922.0	934.0	942.2	957.2	964.7	963.2	955.0	956.5	955.7
7.5°	886.1	901.1	915.3	937.8	952.0	951.2	939.3	937.0	934.0
10°	850.1	864.4	880.8	904.1	922.8	925.8	913.8	910.8	909.3
12.5°	829.1	840.4	851.6	871.8	888.3	894.3	887.6	888.3	887.6
15°	805.2	816.4	823.9	838.9	850.1	858.4	855.4	859.9	856.1
17.5°	769.2	782.7	785.7	796.9	805.2	810.4	813.4	817.9	811.9
20°	720.5	731.0	734.8	739.3	743.0	749.8	758.7	763.2	756.5
22.5°	652.4	672.6	671.9	669.6	673.4	675.6	689.8	697.3	692.1
25°	576.0	597.0	594.7	585.7	586.5	591.0	608.9	618.7	614.9
27.5°	495.8	515.3	510.1	492.8	488.4	495.1	518.3	529.5	527.3
30°	418.7	431.4	423.2	392.5	387.2	395.5	425.4	436.7	430.7
32.5°	335.6	345.3	341.5	304.1	295.1	303.3	338.6	349.0	342.3
35°	268.1	277.1	271.9	227.7	219.5	228.4	265.1	277.1	271.1
37.5°	215.0	221.7	215.0	167.8	160.3	169.3	204.5	220.2	212.7
40°	170.8	176.0	167.0	123.6	117.6	122.1	155.0	170.8	165.5
42.5°	134.8	138.6	128.8	90.6	83.9	89.9	116.8	131.1	128.1
45°	109.4	109.4	97.4	62.9	54.7	60.7	87.6	102.6	103.4
47.5°	93.6	91.4	76.4	41.9	31.5	39.7	69.7	85.4	87.6
50°	80.9	77.9	62.9	30.7	20.2	28.5	57.7	73.4	75.6
52.5°	69.7	67.4	52.4	24.0	14.2	21.7	48.7	63.7	65.9
55°	58.4	56.9	43.4	18.7	11.2	16.5	38.9	51.7	53.2
57.5°	47.9	45.7	35.2	15.7	9.0	13.5	32.2	42.7	44.2
60°	40.4	38.2	28.5	12.7	7.5	10.5	26.2	35.2	36.7
62.5°	33.7	31.5	23.2	10.5	6.0	9.0	21.0	28.5	30.0
65°	27.0	25.5	18.0	8.2	5.2	6.7	16.5	22.5	24.0
67.5°	21.7	20.2	14.2	6.7	4.5	5.2	12.7	18.0	19.5
70°	16.5	15.0	10.5	5.2	3.7	4.5	9.7	13.5	15.0
72.5°	12.0	11.2	8.2	4.5	3.0	3.7	6.7	9.7	11.2
75°	9.0	8.2	6.0	3.0	2.2	3.0	5.2	7.5	8.2
77.5°	6.0	6.0	4.5	2.2	2.2	2.2	3.7	5.2	5.2
80°	4.5	3.7	3.0	1.5	1.5	1.5	2.2	3.7	3.7
82.5°	3.0	2.2	2.2	1.5	1.5	1.5	1.5	2.2	2.2
85°	1.5	1.5	1.5	0.7	0.7	0.7	0.7	1.5	1.5
87.5°	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7
90°	0.0	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)