

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: HALO

Report Number: P886035

Luminaire Tested: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K

Issue Date: 6/19/2024

Test Information

Test Method: LM-79-2019
Report Number: P886035
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2402-314-146)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 6/19/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO
Catalog Number: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K
Description: 1IN SQUARE ML FLEX, SELECTABLE CCT, WITH 40D TIR, METALLIC SILVER BAFFLED TRIM
Light Source: (1) D2W LED 90CRI / 3000K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 246.4 lumens
Efficiency: N/A
Efficacy: 77.0 lumens/watt
Spacing Criteria (0/90/45): 0.68 / 0.69 / 0.68
Luminous Opening: Rectangular (W 0.08' x L: 0.08' x H: 0')
CIE Type: Direct

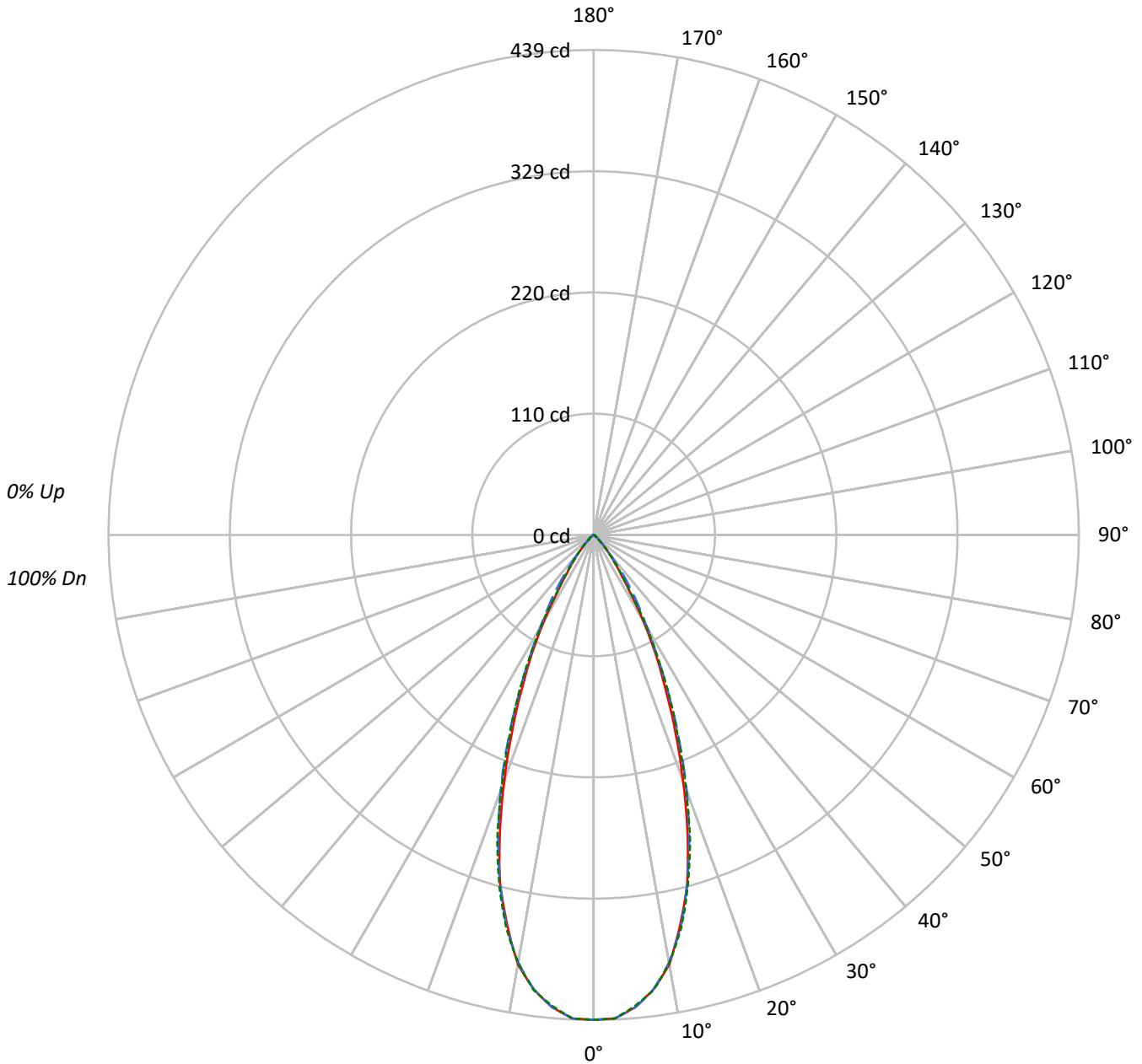
Input Watts (W): 3.2
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



TEST NUMBER: P886035

CATALOG NUMBER: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K

Luminous Intensity Polar Plot





TEST NUMBER: P886035

CATALOG NUMBER: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	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	100	100	100	100		
	1	114	112	109	107	112	109	107	105	105	104	102	102	100	99	98	97	96	95	95	95	95	95	95		
	2	109	105	101	98	107	103	100	97	100	97	95	97	95	93	94	92	91	89	89	89	89	89	89		
	3	104	99	94	90	102	97	93	90	95	91	88	92	89	87	90	88	86	84	84	84	84	84	84		
	4	100	93	88	84	98	92	87	84	90	86	83	88	84	82	86	83	81	79	79	79	79	79	79		
	5	95	88	83	79	94	87	82	79	85	81	78	84	80	77	82	79	77	75	75	75	75	75	75		
	6	91	83	78	74	90	83	78	74	81	77	73	80	76	73	79	75	73	71	71	71	71	71	71		
	7	88	79	74	70	86	79	74	70	77	73	70	76	72	69	75	72	69	68	68	68	68	68	68		
	8	84	75	70	66	83	75	70	66	74	69	66	73	69	66	72	68	65	64	64	64	64	64	64		
	9	81	72	67	63	80	71	66	63	71	66	63	70	66	63	69	65	62	61	61	61	61	61	61		
	10	77	69	64	60	76	68	63	60	68	63	60	67	63	60	66	62	60	58	58	58	58	58	58		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	680147	680147	680147
5°	667964	667964	666097
10°	621387	618554	619498
15°	524735	524735	528586
20°	389280	405940	402146
25°	262353	277574	278600
30°	158577	172358	169137
35°	78716	103504	82122
40°	43301	46943	44515
45°	18194	23455	19509
50°	11575	10128	11575
55°	8107	4864	8107
60°	5580	1860	5580
65°	4401	2201	4401
70°	2719	0	2719
75°	0	0	0
80°	0	0	0
85°	0	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 45°
 Vertical Angle: 45°
 Luminance: 23455 cd/sqm



TEST NUMBER: P886035

CATALOG NUMBER: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	39.8	16.2
10°-20°	89.6	36.4
20°-30°	73.7	29.9
30°-40°	31.7	12.9
40°-50°	8.4	3.4
50°-60°	2.2	0.9
60°-70°	0.8	0.3
70°-80°	0.1	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°	203.2	82.5
0°-40°	234.9	95.3
0°-60°	245.5	99.6
0°-90°	246.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	246.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	439	439	439	439	439	
5°	429	429	429	428	428	40
15°	327	327	327	328	329	89
25°	153	157	162	163	163	71
35°	42	46	55	48	43	28
45°	8	10	11	10	9	8
55°	3	2	2	2	3	3
65°	1	1	1	1	1	1
75°	0	0	0	0	0	0
85°	0	0	0	0	0	0
90°	0	0	0	0	0	



TEST NUMBER: P886035

CATALOG NUMBER: ML104LSFLD2W1E-TIR1D40FL-TL1SDSLB-200LM-4000K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	438.8	438.8	438.8	438.8	438.8
2.5°	438.2	438.8	438.2	438.2	438.2
5°	429.3	428.7	429.3	428.1	428.1
7.5°	415.0	414.4	415.0	415.0	415.6
10°	394.8	391.8	393.0	394.8	393.6
12.5°	361.5	363.9	363.9	365.0	365.0
15°	327.0	327.0	327.0	328.2	329.4
17.5°	282.4	283.6	287.2	288.4	290.1
20°	236.0	240.2	246.1	245.0	243.8
22.5°	193.2	195.6	203.3	202.1	200.4
25°	153.4	157.0	162.3	162.9	162.9
27.5°	120.7	124.3	126.0	129.0	126.0
30°	88.6	95.1	96.3	98.7	94.5
32.5°	60.0	66.0	74.3	70.2	62.4
35°	41.6	45.8	54.7	47.6	43.4
37.5°	29.7	31.5	36.9	32.7	30.9
40°	21.4	22.6	23.2	23.2	22.0
42.5°	14.3	14.9	15.5	15.5	14.9
45°	8.3	9.5	10.7	9.5	8.9
47.5°	5.9	5.9	6.5	5.9	5.9
50°	4.8	4.2	4.2	4.2	4.8
52.5°	3.6	3.0	2.4	3.0	3.6
55°	3.0	2.4	1.8	2.4	3.0
57.5°	2.4	1.8	1.2	1.8	2.4
60°	1.8	1.2	0.6	1.2	1.8
62.5°	1.2	1.2	0.6	1.2	1.2
65°	1.2	0.6	0.6	0.6	1.2
67.5°	0.6	0.6	0.6	0.6	0.6
70°	0.6	0.6	0.0	0.6	0.6
72.5°	0.6	0.0	0.0	0.0	0.6
75°	0.0	0.0	0.0	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

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



Report Generated By 670245859 / DESKTOP-T8S5UU9

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report





— 0°-180° - - 45°-225° - - - 90°-270°

Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



Signify Classified - Internal
Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269

Scaled Data Report



(END OF REPORT)