

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: P886374

Luminaire Tested: ML204LSFL9FS1E-TIR1D40FL-TL2SDSL-550LM-5000K

Issue Date: 6/20/2024

Test Information

Test Method: LM-79-2019
Report Number: P886374
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2402-314-96)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 6/20/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO
Catalog Number: ML204LSFL9FS1E-TIR1D40FL-TL2SDSL-550LM-5000K
Description: 2IN SQUARE ML FLEX, SELECTABLE CCT, WITH 40D TIR, METALLIC SILVER TRIM
Light Source: (1) STANDARD SELECTABLE LUMEN LED 90CRI / 5000K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 698.9 lumens
Efficiency: N/A
Efficacy: 88.5 lumens/watt
Spacing Criteria (0/90/45): 0.68 / 0.68 / 0.68
Luminous Opening: Rectangular (W 0.33' x L: 0.33' x H: 0')
CIE Type: Direct

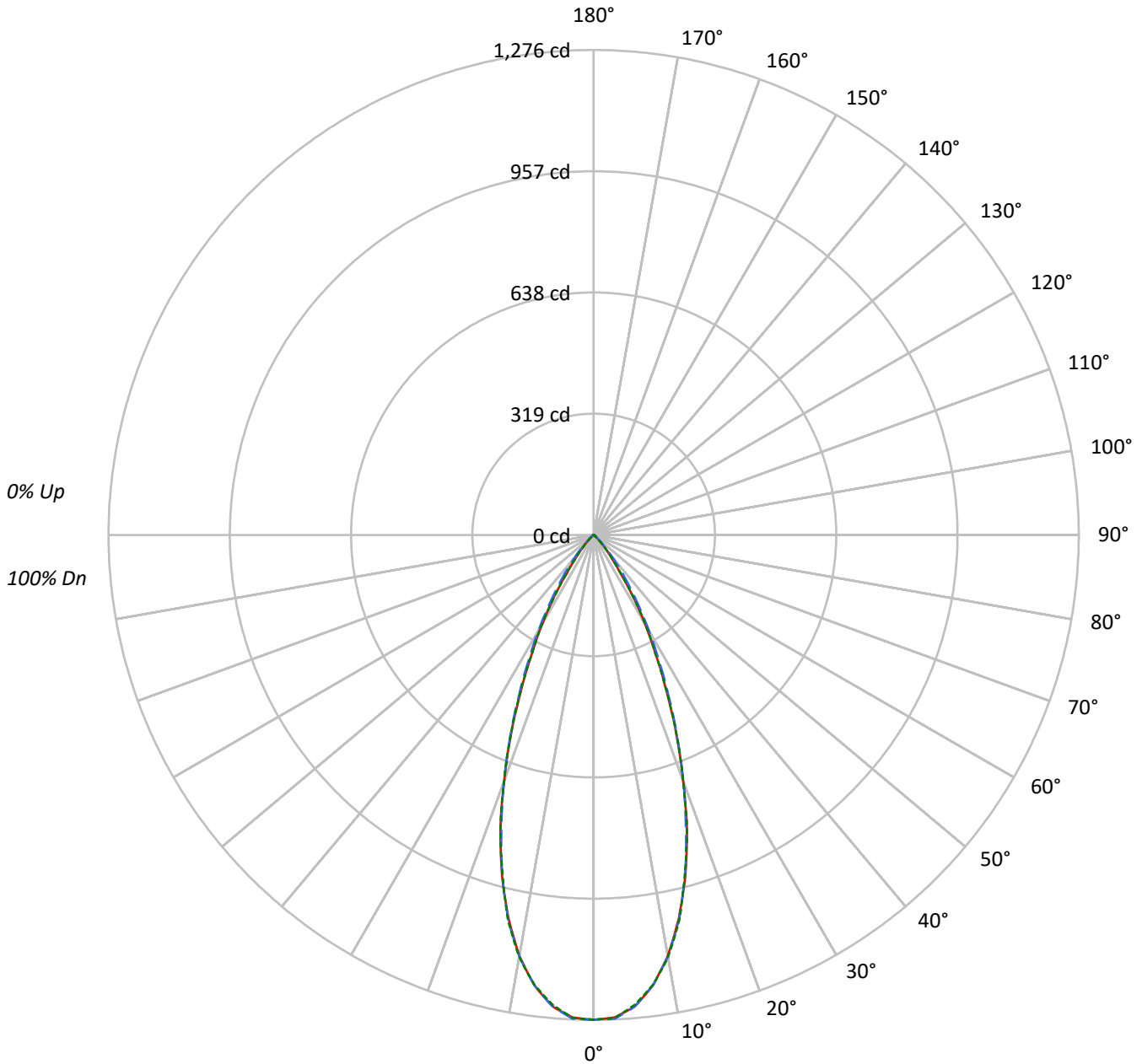
Input Watts (W): 7.9
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Luminous Intensity Polar Plot





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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	106	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	93	91	89	89	89	89	89	89		
	3	105	99	94	91	103	97	93	90	95	91	89	93	90	87	90	88	86	85	85	85	85	85	85		
	4	100	93	88	85	98	92	88	84	90	86	83	88	85	82	86	84	81	80	80	80	80	80	80		
	5	96	88	83	79	94	87	83	79	86	82	78	84	80	78	83	80	77	76	76	76	76	76	76		
	6	92	84	79	75	90	83	78	74	82	77	74	80	76	73	79	76	73	72	72	72	72	72	72		
	7	88	80	74	71	87	79	74	70	78	73	70	77	73	70	76	72	69	68	68	68	68	68	68		
	8	84	76	71	67	83	75	70	67	74	70	67	73	69	66	72	69	66	65	65	65	65	65	65		
	9	81	72	67	64	80	72	67	64	71	66	63	70	66	63	69	66	63	62	62	62	62	62	62		
	10	78	69	64	61	77	69	64	61	68	63	60	67	63	60	67	63	60	59	59	59	59	59	59		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	123565	123565	123565
5°	121100	121100	120643
10°	110607	110715	110951
15°	93292	93062	92821
20°	70959	71082	70959
25°	48346	49715	48592
30°	30303	32261	30561
35°	14440	18981	14984
40°	6905	9700	6766
45°	2384	4137	2384
50°	874	1582	874
55°	388	388	388
60°	233	233	233
65°	275	275	275
70°	0	0	0
75°	0	0	0
80°	0	0	0
85°	0	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 45°
 Vertical Angle: 45°
 Luminance: 4137 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	115.0	16.4
10°-20°	254.5	36.4
20°-30°	211.5	30.3
30°-40°	93.6	13.4
40°-50°	20.9	3.0
50°-60°	2.6	0.4
60°-70°	0.9	0.1
70°-80°	0.0	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°	581.0	83.1
0°-40°	674.6	96.5
0°-60°	698.0	99.9
0°-90°	698.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	698.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1276	1276	1276	1276	1276	
5°	1245	1245	1245	1244	1241	115
15°	930	924	928	924	926	255
25°	452	462	465	463	455	209
35°	122	142	160	142	127	85
45°	17	23	30	22	17	17
55°	2	2	2	2	2	2
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	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1275.5	1275.5	1275.5	1275.5	1275.5
2.5°	1270.9	1272.0	1274.4	1270.9	1272.0
5°	1245.3	1245.3	1245.3	1244.1	1240.6
7.5°	1195.3	1194.1	1195.3	1193.0	1194.1
10°	1124.4	1127.9	1125.5	1125.5	1127.9
12.5°	1033.7	1044.1	1037.2	1036.0	1039.5
15°	930.2	924.4	927.9	924.4	925.5
17.5°	816.2	804.6	806.9	811.6	816.2
20°	688.3	690.7	689.5	690.7	688.3
22.5°	568.6	575.6	573.2	573.2	570.9
25°	452.3	461.6	465.1	462.8	454.6
27.5°	351.1	357.0	369.8	358.1	350.0
30°	270.9	276.7	288.4	275.6	273.2
32.5°	194.2	207.0	218.6	205.8	190.7
35°	122.1	141.9	160.5	141.9	126.7
37.5°	80.2	90.7	115.1	90.7	82.6
40°	54.6	60.5	76.7	59.3	53.5
42.5°	33.7	39.5	48.8	38.4	33.7
45°	17.4	23.3	30.2	22.1	17.4
47.5°	9.3	10.5	19.8	11.6	8.1
50°	5.8	5.8	10.5	5.8	5.8
52.5°	3.5	3.5	4.7	3.5	3.5
55°	2.3	2.3	2.3	2.3	2.3
57.5°	1.2	1.2	2.3	1.2	1.2
60°	1.2	1.2	1.2	1.2	1.2
62.5°	1.2	1.2	1.2	1.2	1.2
65°	1.2	1.2	1.2	1.2	1.2
67.5°	1.2	1.2	0.0	0.0	1.2
70°	0.0	0.0	0.0	0.0	0.0
72.5°	0.0	0.0	0.0	0.0	0.0
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



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Scaled Data Report





— 0°-180° - - 45°-225° - - - 90°-270°

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