

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: P640496

Luminaire Tested: ML5609LSWFL55D2W1E - 593TBZB - 900LM - 3000K

Issue Date: 2/17/2023

Test Information

Test Method: LM-79-2019
Report Number: P640496
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2212-866-54)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 2/17/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO
Catalog Number: ML5609LSWFL55D2W1E - 593TBZB - 900LM - 3000K
Description: ML56 RR, 55D TIR OPTIC, 5" TUSCON BRONZE BAFFLE TRIM
Light Source: (1) D2W SELECTABLE LUMEN LED 90CRI / 3000K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1174.9 lumens
Efficiency: N/A
Efficacy: 99.6 lumens/watt
Spacing Criteria (0/90/45): 0.86 / 0.86 / 0.89
Luminous Opening: Circular (Dia: 0.42' x H: 0')
CIE Type: Direct

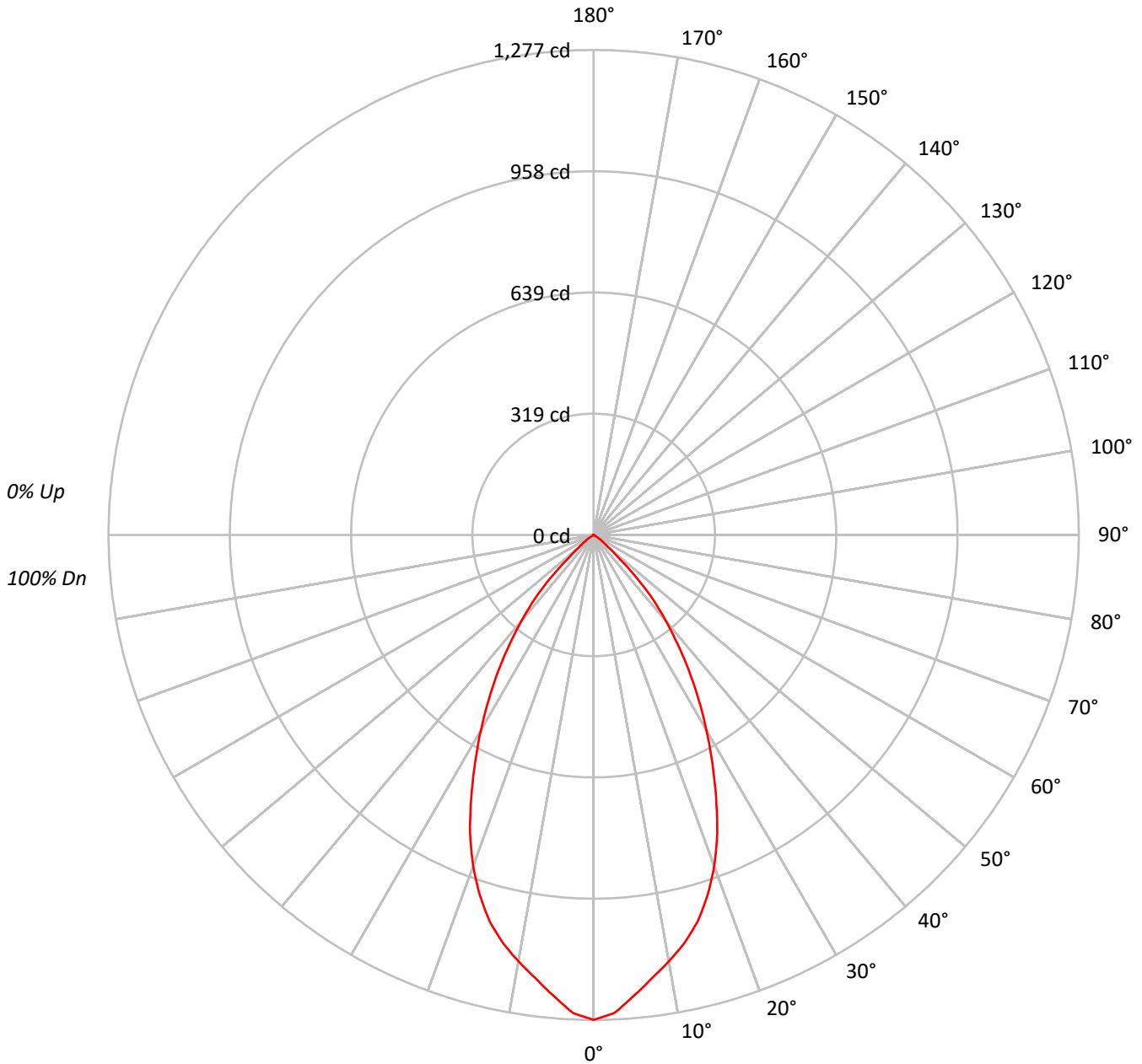
Input Watts (W): 11.8
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				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			
1	113	110	108	106	111	108	106	104	104	102	101	101	99	98	97	96	95	93			
2	107	102	98	95	105	101	97	94	97	94	92	94	92	90	92	90	88	86			
3	102	95	90	86	100	94	89	85	91	87	84	89	85	82	86	83	81	79			
4	96	88	83	78	94	87	82	78	85	80	77	83	79	76	81	78	75	73			
5	91	82	76	72	89	81	76	71	80	75	71	78	73	70	76	72	69	68			
6	86	77	71	66	85	76	70	66	75	69	65	73	68	65	72	68	65	63			
7	82	72	66	61	80	71	65	61	70	65	61	69	64	60	68	63	60	59			
8	77	67	61	57	76	67	61	57	66	60	57	65	60	56	64	59	56	55			
9	73	63	57	53	72	63	57	53	62	57	53	61	56	53	60	56	52	51			
10	70	60	54	50	69	59	54	50	58	53	49	58	53	49	57	52	49	48			

AVERAGE LUMINANCE (cd/sqm):

	0°
0°	100815
5°	96509
10°	91405
15°	86229
20°	77950
25°	66371
30°	54127
35°	42171
40°	30431
45°	18287
50°	6226
55°	2821
60°	853
65°	205
70°	0
75°	0
80°	0
85°	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 18287 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	113.8	9.7
10°-20°	293.6	25.0
20°-30°	348.2	29.6
30°-40°	272.7	23.2
40°-50°	124.6	10.6
50°-60°	20.4	1.7
60°-70°	1.5	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°	755.7	64.3
0°-40°	1028.3	87.5
0°-60°	1173.4	99.9
0°-90°	1174.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1174.9	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	1277	
5°	1218	114
15°	1055	294
25°	762	348
35°	438	273
45°	164	125
55°	20	20
65°	1	1
75°	0	0
85°	0	0
90°	0	



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CANDELA DISTRIBUTION (FULL):

	0°
0°	1277.1
2.5°	1259.9
5°	1217.9
7.5°	1176.9
10°	1140.3
12.5°	1101.5
15°	1055.1
17.5°	995.8
20°	927.9
22.5°	850.3
25°	762.0
27.5°	675.8
30°	593.8
32.5°	514.1
35°	437.6
37.5°	363.2
40°	295.3
42.5°	231.7
45°	163.8
47.5°	89.5
50°	50.7
52.5°	32.3
55°	20.5
57.5°	11.9
60°	5.4
62.5°	2.2
65°	1.1
67.5°	0.0
70°	0.0
72.5°	0.0
75°	0.0
77.5°	0.0
80°	0.0
82.5°	0.0
85°	0.0
87.5°	0.0
90°	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

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— 0°-180°

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