

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: P643914

Luminaire Tested: ML5615LSWFL559FS1E - 596WB - 900LM - 4000K

Issue Date: 2/17/2023

**Test Information**

Test Method: LM-79-2019  
Report Number: P643914  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2212-866-58)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 2/17/2023  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: HALO  
Catalog Number: ML5615LSWFL559FS1E - 596WB - 900LM - 4000K  
Description: ML56 RR, 55D TIR OPTIC, 5" SHALLOW WHITE BAFFLE TRIM  
Light Source: (1) STANDARD SELECTABLE LUMEN LED 90CRI / 4000K CCT  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1307.3 lumens  
Efficiency: N/A  
Efficacy: 124.5 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

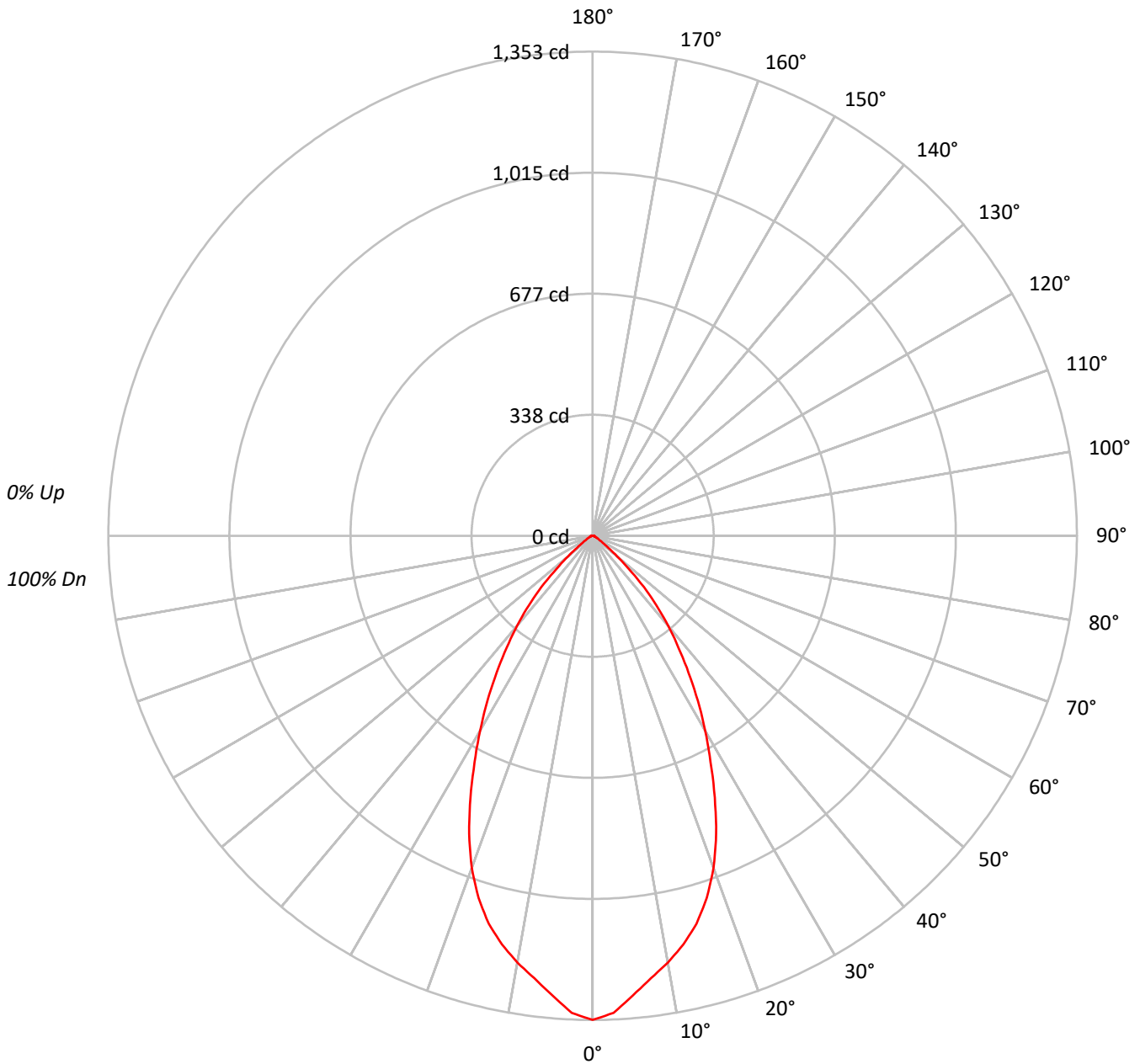
Input Watts (W): 10.5  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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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									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																
1	113	110	107	105	110	108	105	103	104	102	100	100	98	97	96	95	94	92			92																
2	107	101	97	93	104	100	96	92	96	93	90	93	91	88	91	88	86	85			85																
3	101	94	88	84	99	92	87	83	90	85	82	87	84	81	85	82	79	78			78																
4	95	87	81	76	93	86	80	76	84	79	75	82	77	74	80	76	73	72			72																
5	90	81	74	70	88	80	74	69	78	73	69	76	72	68	75	71	68	66			66																
6	85	75	69	64	83	74	68	64	73	67	63	71	67	63	70	66	63	61			61																
7	80	70	64	59	79	70	63	59	68	63	59	67	62	58	66	61	58	57			57																
8	76	66	59	55	75	65	59	55	64	59	55	63	58	54	62	58	54	53			53																
9	72	62	55	51	71	61	55	51	60	55	51	59	54	51	59	54	51	49			49																
10	69	58	52	48	67	58	52	48	57	51	48	56	51	48	55	51	47	46			46																

**AVERAGE LUMINANCE (cd/sqm):**

	0°
0°	106791
5°	102159
10°	97048
15°	91704
20°	82991
25°	70308
30°	57308
35°	45024
40°	33852
45°	22596
50°	10893
55°	4845
60°	3047
65°	2129
70°	1569
75°	1037
80°	2046
85°	3080

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 45°  
 Luminance: 22596 cd/sqm



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	120.7	9.2
10°-20°	312.3	23.9
20°-30°	368.9	28.2
30°-40°	292.7	22.4
40°-50°	154.2	11.8
50°-60°	37.5	2.9
60°-70°	11.9	0.9
70°-80°	5.4	0.4
80°-90°	3.7	0.3
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°	801.9	61.3
0°-40°	1094.5	83.7
0°-60°	1286.3	98.4
0°-90°	1307.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1307.3	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	1353	
5°	1289	121
15°	1122	312
25°	807	369
35°	467	293
45°	202	154
55°	35	38
65°	11	12
75°	3	5
85°	3	4
90°	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°
0°	1352.8
2.5°	1334.6
5°	1289.2
7.5°	1247.1
10°	1210.7
12.5°	1169.8
15°	1122.1
17.5°	1060.7
20°	987.9
22.5°	901.5
25°	807.2
27.5°	713.9
30°	628.7
32.5°	546.8
35°	467.2
37.5°	394.5
40°	328.5
42.5°	263.7
45°	202.4
47.5°	135.3
50°	88.7
52.5°	55.7
55°	35.2
57.5°	25.0
60°	19.3
62.5°	14.8
65°	11.4
67.5°	9.1
70°	6.8
72.5°	5.7
75°	3.4
77.5°	5.7
80°	4.5
82.5°	4.5
85°	3.4
87.5°	3.4
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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(END OF REPORT)