

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: P643574

Luminaire Tested: ML5615LSVWFL9FS1E - 691WB - 1200LM - 4000K

Issue Date: 2/17/2023

Test Information

Test Method: LM-79-2019
Report Number: P643574
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2212-866-105)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 2/17/2023
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: HALO
Catalog Number: ML5615LSVWFL9FS1E - 691WB - 1200LM - 4000K
Description: ML56 RR, MILKY OPTIC, 6" DEADFRONT TRIM
Light Source: (1) STANDARD SELECTABLE LUMEN LED 90CRI / 4000K CCT
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1511.1 lumens
Efficiency: N/A
Efficacy: 112.8 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.21 / 1.28
Luminous Opening: Circular (Dia: 0.5' x H: 0')
CIE Type: Direct

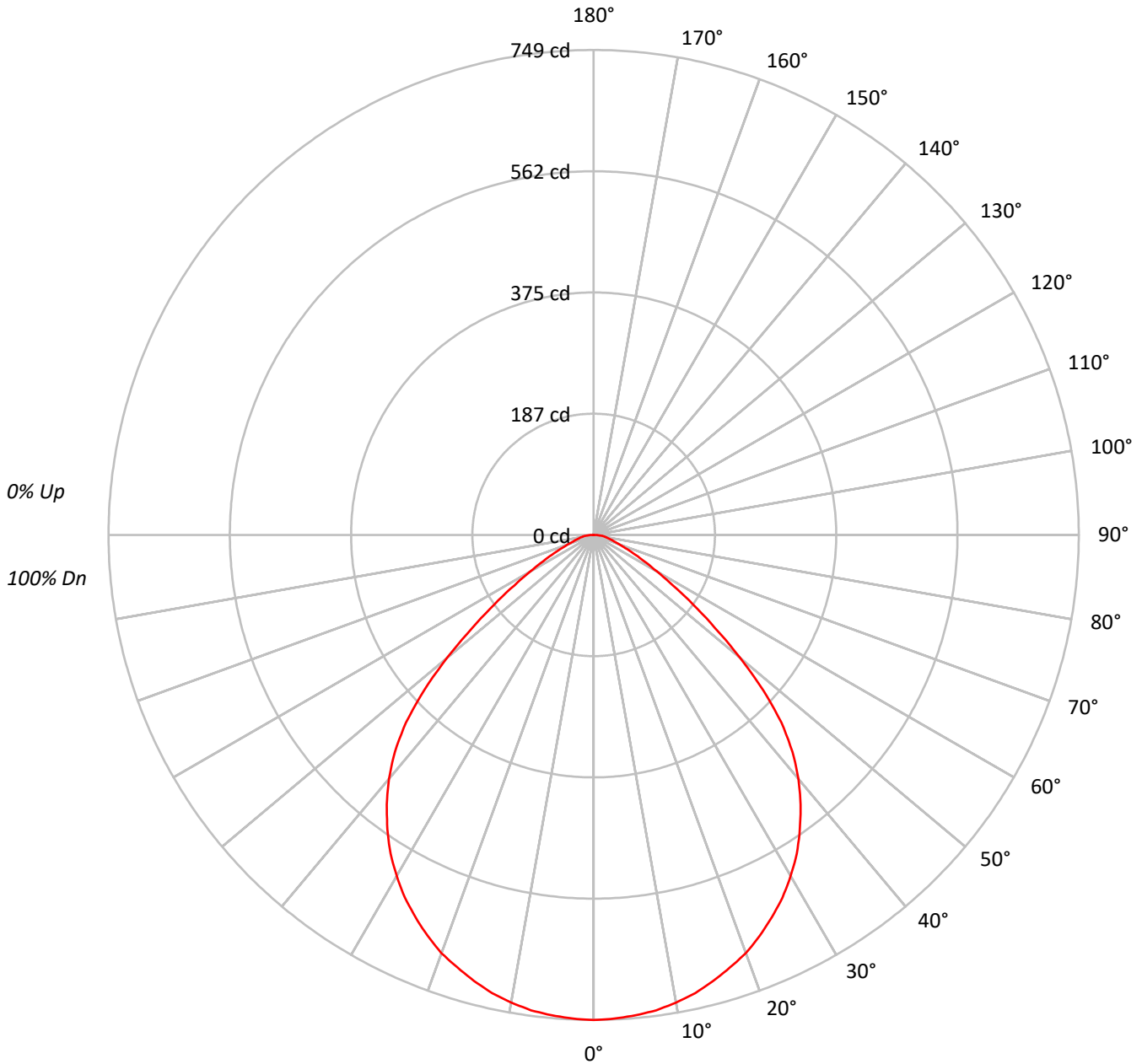
Input Watts (W): 13.4
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

| | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----|----|---|--|--|--|--|--|--|----|--|--|--|--|--|--|--|--|---|
| RF | 20 | | | | | | | | | 20 | | | | | | | | | 20 | | | | | | | | | 20 | | | | | | | | | |
| 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 | | | | | | | | | | | | | | | | | | | |
| 1 | 111 | 107 | 104 | 101 | 108 | 105 | 102 | 99 | 101 | 98 | 96 | 97 | 95 | 93 | 94 | 92 | 90 | 89 | | | | | | | | | | | | | | | | | | | |
| 2 | 103 | 96 | 91 | 86 | 101 | 94 | 89 | 85 | 91 | 87 | 83 | 88 | 84 | 81 | 85 | 82 | 80 | 78 | | | | | | | | | | | | | | | | | | | |
| 3 | 95 | 87 | 80 | 74 | 93 | 85 | 79 | 74 | 82 | 77 | 72 | 80 | 75 | 71 | 77 | 73 | 70 | 68 | | | | | | | | | | | | | | | | | | | |
| 4 | 88 | 78 | 71 | 65 | 86 | 77 | 70 | 64 | 75 | 68 | 64 | 72 | 67 | 63 | 70 | 66 | 62 | 60 | | | | | | | | | | | | | | | | | | | |
| 5 | 82 | 71 | 63 | 57 | 80 | 70 | 62 | 57 | 68 | 61 | 56 | 66 | 60 | 56 | 64 | 59 | 55 | 53 | | | | | | | | | | | | | | | | | | | |
| 6 | 76 | 65 | 57 | 51 | 75 | 64 | 56 | 51 | 62 | 55 | 50 | 60 | 54 | 50 | 59 | 54 | 50 | 48 | | | | | | | | | | | | | | | | | | | |
| 7 | 71 | 59 | 51 | 46 | 70 | 58 | 51 | 46 | 57 | 50 | 45 | 55 | 49 | 45 | 54 | 49 | 45 | 43 | | | | | | | | | | | | | | | | | | | |
| 8 | 67 | 54 | 47 | 41 | 65 | 54 | 46 | 41 | 52 | 46 | 41 | 51 | 45 | 41 | 50 | 45 | 40 | 39 | | | | | | | | | | | | | | | | | | | |
| 9 | 62 | 50 | 43 | 37 | 61 | 49 | 42 | 37 | 48 | 42 | 37 | 47 | 41 | 37 | 46 | 41 | 37 | 35 | | | | | | | | | | | | | | | | | | | |
| 10 | 59 | 46 | 39 | 34 | 57 | 46 | 39 | 34 | 45 | 38 | 34 | 44 | 38 | 34 | 43 | 38 | 34 | 32 | | | | | | | | | | | | | | | | | | | |

AVERAGE LUMINANCE (cd/sqm):

| | |
|-----|-------|
| | 0° |
| 0° | 41071 |
| 5° | 40986 |
| 10° | 40820 |
| 15° | 40477 |
| 20° | 40096 |
| 25° | 39401 |
| 30° | 38500 |
| 35° | 37142 |
| 40° | 35195 |
| 45° | 31771 |
| 50° | 25142 |
| 55° | 17863 |
| 60° | 12302 |
| 65° | 8769 |
| 70° | 6684 |
| 75° | 5782 |
| 80° | 5904 |
| 85° | 6353 |

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 31771 cd/sqm



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ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 70.7 | 4.7 |
| 10°-20° | 201.2 | 13.3 |
| 20°-30° | 299.9 | 19.8 |
| 30°-40° | 346.2 | 22.9 |
| 40°-50° | 310.2 | 20.5 |
| 50°-60° | 171.5 | 11.3 |
| 60°-70° | 70.4 | 4.7 |
| 70°-80° | 30.0 | 2.0 |
| 80°-90° | 11.2 | 0.7 |
| 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° | 571.8 | 37.8 |
| 0°-40° | 918.0 | 60.7 |
| 0°-60° | 1399.6 | 92.6 |
| 0°-90° | 1511.1 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 1511.1 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | Flux |
|-----|-----|------|
| 0° | 749 | |
| 5° | 745 | 71 |
| 15° | 713 | 201 |
| 25° | 651 | 300 |
| 35° | 555 | 346 |
| 45° | 410 | 310 |
| 55° | 187 | 171 |
| 65° | 68 | 70 |
| 75° | 27 | 30 |
| 85° | 10 | 11 |
| 90° | 0 | |



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CANDELA DISTRIBUTION (FULL):

| | 0° |
|-------|-------|
| 0° | 749.2 |
| 2.5° | 747.7 |
| 5° | 744.8 |
| 7.5° | 740.5 |
| 10° | 733.3 |
| 12.5° | 724.7 |
| 15° | 713.2 |
| 17.5° | 700.3 |
| 20° | 687.3 |
| 22.5° | 670.1 |
| 25° | 651.4 |
| 27.5° | 631.3 |
| 30° | 608.2 |
| 32.5° | 583.8 |
| 35° | 555.0 |
| 37.5° | 524.8 |
| 40° | 491.8 |
| 42.5° | 454.4 |
| 45° | 409.8 |
| 47.5° | 355.2 |
| 50° | 294.8 |
| 52.5° | 235.8 |
| 55° | 186.9 |
| 57.5° | 145.2 |
| 60° | 112.2 |
| 62.5° | 87.7 |
| 65° | 67.6 |
| 67.5° | 53.2 |
| 70° | 41.7 |
| 72.5° | 33.1 |
| 75° | 27.3 |
| 77.5° | 23.0 |
| 80° | 18.7 |
| 82.5° | 15.8 |
| 85° | 10.1 |
| 87.5° | 5.8 |
| 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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Scaled Data Report



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