

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P257043

Luminaire Tested: **HGL-S-FR-80L940-UNV-12**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P257043
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1708-204-1)
Test Lab: INNOVATION CENTER(G2)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: HGL-S-FR-80L940-UNV-12
Description: HUGO 12 FOOT LINEAR LED LUMINAIRE WITH FROSTED LENS
Light Source: (504) 4000K CCT, 90 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 18685.5 lumens
Efficiency: N/A
Efficacy: 88.1 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.23 / 1.33
Luminous Opening: Rectangular w/ Sides (W: 0.23' x L: 12' x H: 0.01')
CIE Type: Direct

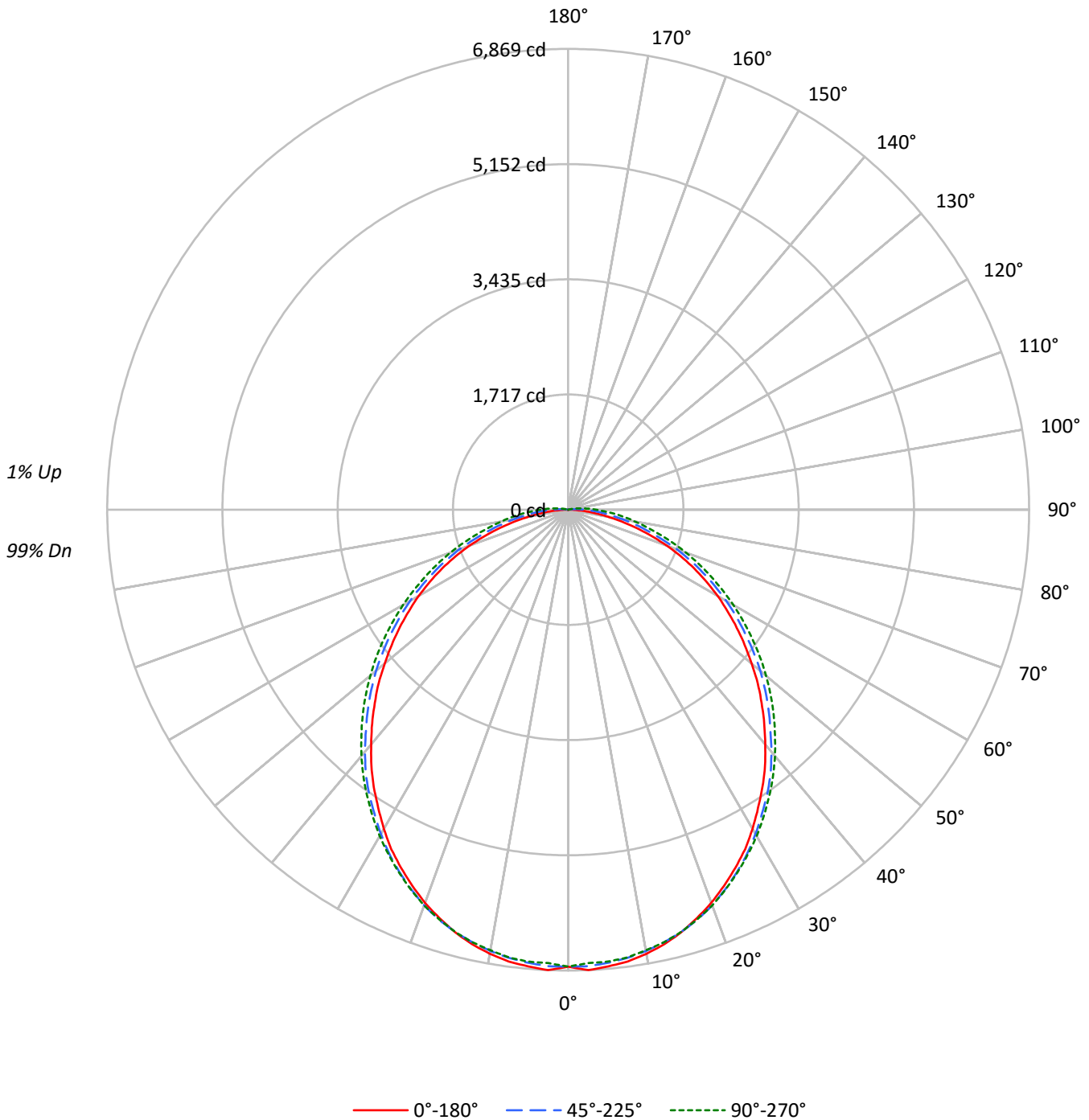
Input Watts (W): 212
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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 | 0 |
| RCR | | | | | | | | | | | | | | | | | | |
| 0 | 119 | 119 | 119 | 119 | 116 | 116 | 116 | 116 | 111 | 111 | 111 | 106 | 106 | 106 | 101 | 101 | 101 | 99 |
| 1 | 108 | 103 | 99 | 95 | 105 | 101 | 97 | 93 | 97 | 93 | 90 | 93 | 90 | 87 | 89 | 87 | 85 | 82 |
| 2 | 98 | 90 | 83 | 77 | 96 | 88 | 82 | 76 | 84 | 79 | 74 | 81 | 77 | 73 | 78 | 74 | 71 | 69 |
| 3 | 90 | 79 | 71 | 64 | 87 | 77 | 70 | 64 | 74 | 68 | 62 | 72 | 66 | 61 | 69 | 64 | 60 | 58 |
| 4 | 82 | 70 | 61 | 55 | 80 | 69 | 61 | 54 | 66 | 59 | 53 | 64 | 58 | 53 | 62 | 56 | 52 | 50 |
| 5 | 76 | 63 | 54 | 47 | 74 | 62 | 53 | 47 | 59 | 52 | 46 | 57 | 51 | 46 | 55 | 50 | 45 | 43 |
| 6 | 70 | 57 | 48 | 41 | 68 | 56 | 47 | 41 | 54 | 46 | 41 | 52 | 45 | 40 | 50 | 44 | 40 | 38 |
| 7 | 65 | 51 | 43 | 36 | 63 | 50 | 42 | 36 | 49 | 41 | 36 | 47 | 41 | 36 | 46 | 40 | 35 | 33 |
| 8 | 60 | 47 | 38 | 33 | 59 | 46 | 38 | 32 | 45 | 37 | 32 | 43 | 37 | 32 | 42 | 36 | 32 | 30 |
| 9 | 56 | 43 | 35 | 29 | 55 | 42 | 35 | 29 | 41 | 34 | 29 | 40 | 34 | 29 | 39 | 33 | 29 | 27 |
| 10 | 53 | 40 | 32 | 27 | 52 | 39 | 32 | 27 | 38 | 31 | 26 | 37 | 31 | 26 | 36 | 30 | 26 | 24 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 45° | 90° |
|-----|-------|-------|-------|
| 0° | 26655 | 26655 | 26655 |
| 5° | 26848 | 26567 | 26469 |
| 10° | 26708 | 26401 | 26298 |
| 15° | 26411 | 26173 | 26088 |
| 20° | 25961 | 25846 | 25733 |
| 25° | 25429 | 25350 | 25258 |
| 30° | 24815 | 24778 | 24765 |
| 35° | 24107 | 24184 | 24204 |
| 40° | 23322 | 23447 | 23625 |
| 45° | 22539 | 22666 | 22968 |
| 50° | 21688 | 21934 | 22284 |
| 55° | 20903 | 21036 | 21491 |
| 60° | 20125 | 20214 | 20680 |
| 65° | 19139 | 19198 | 19844 |
| 70° | 17813 | 18122 | 19034 |
| 75° | 15919 | 16699 | 18129 |
| 80° | 13441 | 15772 | 18221 |
| 85° | 10819 | 16264 | 20442 |



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ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|---------|-----------|
| 0°-10° | 643.6 | 3.4 |
| 10°-20° | 1831.1 | 9.8 |
| 20°-30° | 2727.0 | 14.6 |
| 30°-40° | 3209.4 | 17.2 |
| 40°-50° | 3241.6 | 17.3 |
| 50°-60° | 2872.7 | 15.4 |
| 60°-70° | 2185.7 | 11.7 |
| 70°-80° | 1312.2 | 7.0 |
| 80°-90° | 539.2 | 2.9 |
| 90°-100° | 117.4 | 0.6 |
| 100°-110° | 5.7 | 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° | 5201.7 | 27.8 |
| 0°-40° | 8411.1 | 45.0 |
| 0°-60° | 14525.4 | 77.7 |
| 0°-90° | 18562.5 | 99.3 |
| 90°-120° | 123.0 | 0.7 |
| 90°-150° | 123.0 | 0.7 |
| 90°-180° | 123.0 | 0.7 |
| 0°-180° | 18685.5 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|------|------|-------|------|-------|------|------|
| 0° | 6810 | 6810 | 6810 | 6810 | 6810 | |
| 5° | 6834 | 6756 | 6780 | 6768 | 6762 | 649 |
| 15° | 6519 | 6454 | 6513 | 6507 | 6513 | 1836 |
| 25° | 5890 | 5843 | 5956 | 5950 | 5968 | 2713 |
| 35° | 5048 | 5030 | 5173 | 5196 | 5220 | 3155 |
| 45° | 4075 | 4093 | 4224 | 4283 | 4330 | 3145 |
| 55° | 3067 | 3108 | 3221 | 3304 | 3346 | 2742 |
| 65° | 2070 | 2100 | 2213 | 2302 | 2343 | 2046 |
| 75° | 1056 | 1103 | 1234 | 1358 | 1394 | 1121 |
| 85° | 243 | 320 | 492 | 635 | 682 | 273 |
| 90° | 6 | 101 | 243 | 368 | 415 | 16 |
| 95° | 0 | 6 | 89 | 178 | 214 | 0 |
| 105° | 6 | 0 | 0 | 0 | 6 | 3 |
| 115° | 0 | 0 | 0 | 0 | 0 | 0 |
| 125° | 0 | 0 | 0 | 0 | 0 | 0 |
| 135° | 0 | 0 | 0 | 0 | 0 | 0 |
| 145° | 0 | 0 | 0 | 0 | 0 | 0 |
| 155° | 0 | 0 | 0 | 0 | 0 | 0 |
| 165° | 0 | 0 | 0 | 0 | 0 | 0 |
| 175° | 0 | 0 | 0 | 0 | 0 | 0 |
| 180° | 0 | 0 | 0 | 0 | 0 | 0 |



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CATALOG NUMBER: HGL-S-FR-80L940-UNV-12

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|--------|--------|--------|--------|--------|
| 0° | 6809.9 | 6809.9 | 6809.9 | 6809.9 | 6809.9 |
| 2.5° | 6869.2 | 6792.1 | 6809.9 | 6798.0 | 6762.4 |
| 5° | 6833.6 | 6756.5 | 6780.2 | 6768.3 | 6762.4 |
| 7.5° | 6792.1 | 6714.9 | 6738.7 | 6726.8 | 6732.7 |
| 10° | 6720.9 | 6643.8 | 6679.3 | 6667.5 | 6667.5 |
| 12.5° | 6631.9 | 6566.6 | 6602.2 | 6590.4 | 6602.2 |
| 15° | 6519.2 | 6453.9 | 6513.3 | 6507.3 | 6513.3 |
| 17.5° | 6382.8 | 6323.4 | 6406.5 | 6394.6 | 6400.5 |
| 20° | 6234.5 | 6175.1 | 6276.0 | 6252.3 | 6276.0 |
| 22.5° | 6068.4 | 6020.9 | 6121.7 | 6104.0 | 6127.7 |
| 25° | 5890.4 | 5842.9 | 5955.7 | 5949.7 | 5967.5 |
| 27.5° | 5706.5 | 5665.0 | 5777.7 | 5789.6 | 5795.5 |
| 30° | 5493.0 | 5463.3 | 5581.9 | 5599.7 | 5617.5 |
| 32.5° | 5267.6 | 5249.8 | 5374.3 | 5404.0 | 5421.8 |
| 35° | 5048.1 | 5030.3 | 5172.6 | 5196.4 | 5220.1 |
| 37.5° | 4816.7 | 4804.9 | 4953.2 | 4976.9 | 5012.5 |
| 40° | 4567.6 | 4573.5 | 4709.9 | 4751.5 | 4793.0 |
| 42.5° | 4324.4 | 4336.2 | 4460.8 | 4520.1 | 4561.7 |
| 45° | 4075.2 | 4093.0 | 4223.5 | 4282.9 | 4330.3 |
| 47.5° | 3832.0 | 3849.8 | 3980.3 | 4045.6 | 4093.0 |
| 50° | 3565.1 | 3606.6 | 3737.1 | 3796.4 | 3849.8 |
| 52.5° | 3315.9 | 3357.5 | 3476.1 | 3553.2 | 3600.7 |
| 55° | 3066.8 | 3108.3 | 3221.0 | 3304.1 | 3345.6 |
| 57.5° | 2811.7 | 2871.1 | 2971.9 | 3054.9 | 3096.5 |
| 60° | 2574.5 | 2610.0 | 2722.8 | 2805.8 | 2841.4 |
| 62.5° | 2319.4 | 2355.0 | 2461.7 | 2562.6 | 2586.3 |
| 65° | 2070.2 | 2099.9 | 2212.6 | 2301.6 | 2343.1 |
| 67.5° | 1815.2 | 1850.8 | 1963.5 | 2058.4 | 2099.9 |
| 70° | 1560.1 | 1595.7 | 1720.3 | 1827.0 | 1862.6 |
| 72.5° | 1299.1 | 1340.6 | 1465.2 | 1589.8 | 1631.3 |
| 75° | 1055.9 | 1103.3 | 1233.8 | 1358.4 | 1394.0 |
| 77.5° | 818.6 | 877.9 | 1020.3 | 1150.8 | 1198.2 |
| 80° | 599.1 | 670.3 | 824.5 | 966.9 | 1008.4 |
| 82.5° | 409.3 | 486.4 | 646.6 | 794.9 | 848.3 |
| 85° | 243.2 | 320.3 | 492.3 | 634.7 | 682.2 |
| 87.5° | 106.8 | 189.8 | 355.9 | 492.3 | 533.9 |
| 90° | 5.9 | 100.8 | 243.2 | 367.8 | 415.2 |
| 92.5° | 0.0 | 41.5 | 154.2 | 261.0 | 308.5 |
| 95° | 0.0 | 5.9 | 89.0 | 178.0 | 213.5 |
| 97.5° | 0.0 | 0.0 | 41.5 | 106.8 | 136.4 |
| 100° | 0.0 | 0.0 | 5.9 | 53.4 | 77.1 |
| 102.5° | 5.9 | 0.0 | 0.0 | 11.9 | 29.7 |
| 105° | 5.9 | 0.0 | 0.0 | 0.0 | 5.9 |
| 107.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 110° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |



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CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|-----|-------|-----|-------|-----|
| 112.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 115° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 117.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 120° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 122.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 125° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 127.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 130° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 132.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 135° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 137.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 140° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 142.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 145° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 147.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 150° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 152.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 155° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 157.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 160° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 162.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 165° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 167.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 170° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 172.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 175° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 177.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 180° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |

(END OF REPORT)