

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: METALUX

Report Number: P183902

Luminaire Tested: **14SR-LD2-20-C-UNV-L830-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P183902
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P34451)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 14SR-LD2-20-C-UNV-L830-CD1-U
Description: METALUX SKYRIDGE EDGELIT LED 1X4 TROFFER

Light Source: EATON LED 3000K
Ballast/Driver: OSRAM ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2006.9 lumens
Efficiency: N/A
Efficacy: 122.4 lumens/watt
Spacing Criteria (0/90/45): 1.18 / 1.42 / 1.41
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

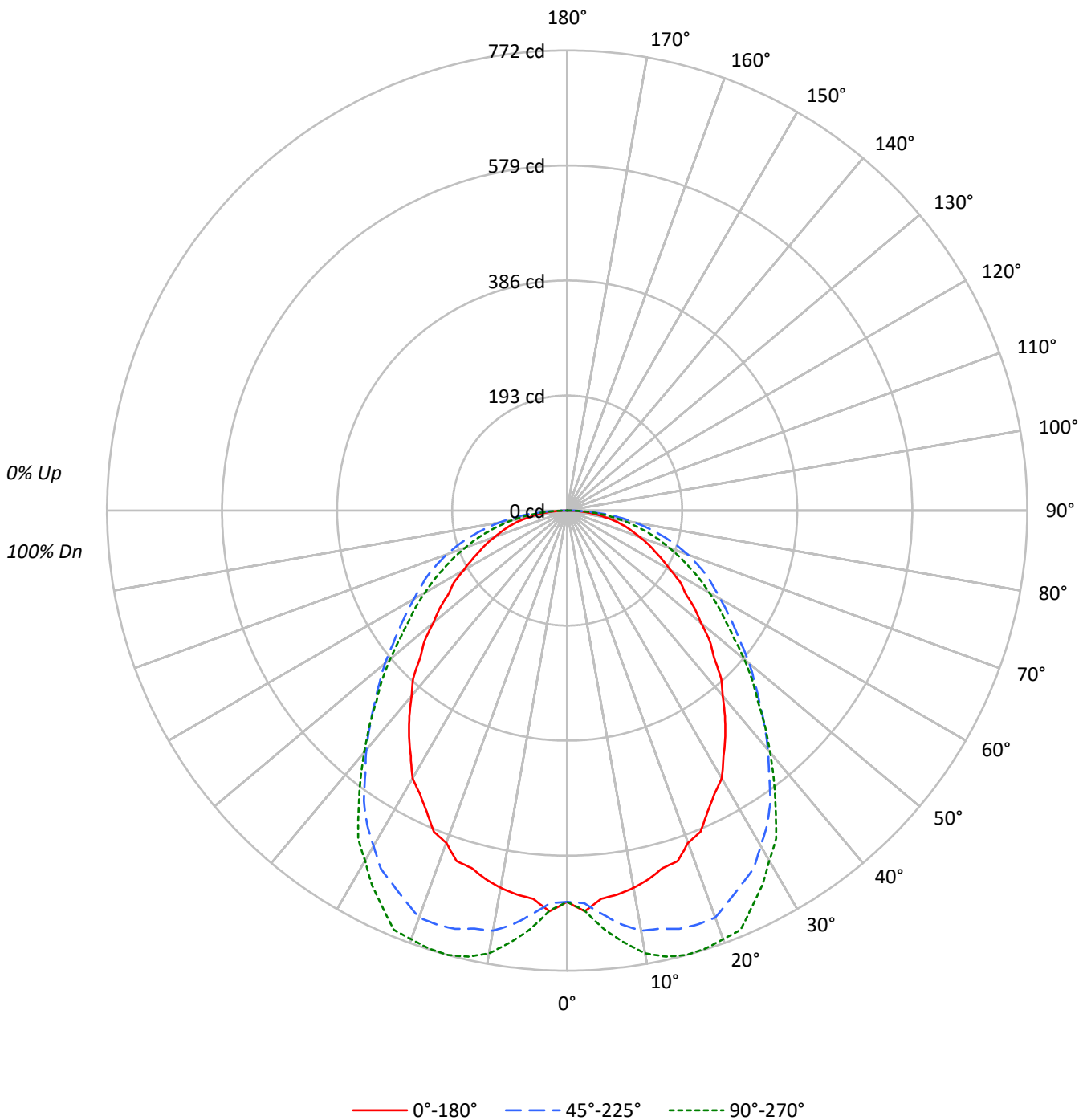
Input Watts (W): 16.4
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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 | 102 | 102 | 102 | 100 |
| 1 | 108 | 103 | 99 | 95 | 106 | 101 | 97 | 93 | 97 | 94 | 91 | 93 | 90 | 88 | 89 | 87 | 85 | 83 |
| 2 | 99 | 90 | 83 | 77 | 96 | 88 | 82 | 77 | 85 | 79 | 75 | 81 | 77 | 73 | 78 | 75 | 71 | 69 |
| 3 | 90 | 79 | 71 | 65 | 87 | 78 | 70 | 64 | 75 | 68 | 63 | 72 | 66 | 62 | 69 | 65 | 61 | 58 |
| 4 | 83 | 70 | 62 | 55 | 80 | 69 | 61 | 55 | 67 | 59 | 54 | 64 | 58 | 53 | 62 | 57 | 52 | 50 |
| 5 | 76 | 63 | 54 | 48 | 74 | 62 | 54 | 47 | 60 | 52 | 47 | 58 | 51 | 46 | 56 | 50 | 46 | 44 |
| 6 | 70 | 57 | 48 | 42 | 68 | 56 | 48 | 41 | 54 | 47 | 41 | 53 | 46 | 41 | 51 | 45 | 40 | 38 |
| 7 | 65 | 52 | 43 | 37 | 64 | 51 | 43 | 37 | 49 | 42 | 37 | 48 | 41 | 36 | 47 | 41 | 36 | 34 |
| 8 | 61 | 47 | 39 | 33 | 59 | 47 | 39 | 33 | 45 | 38 | 33 | 44 | 37 | 33 | 43 | 37 | 32 | 30 |
| 9 | 57 | 44 | 35 | 30 | 55 | 43 | 35 | 30 | 42 | 35 | 30 | 41 | 34 | 29 | 40 | 34 | 29 | 27 |
| 10 | 53 | 40 | 32 | 27 | 52 | 40 | 32 | 27 | 39 | 32 | 27 | 38 | 31 | 27 | 37 | 31 | 27 | 25 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 45° | 90° |
|-----|------|------|------|
| 0° | 1766 | 1766 | 1766 |
| 5° | 1766 | 1836 | 1903 |
| 10° | 1756 | 1955 | 2061 |
| 15° | 1729 | 2024 | 2151 |
| 20° | 1698 | 2081 | 2191 |
| 25° | 1655 | 2055 | 2178 |
| 30° | 1612 | 2018 | 2108 |
| 35° | 1519 | 1953 | 2003 |
| 40° | 1426 | 1842 | 1861 |
| 45° | 1325 | 1739 | 1723 |
| 50° | 1227 | 1671 | 1625 |
| 55° | 1136 | 1608 | 1524 |
| 60° | 1081 | 1600 | 1481 |
| 65° | 1034 | 1647 | 1446 |
| 70° | 1018 | 1689 | 1429 |
| 75° | 1030 | 1731 | 1431 |
| 80° | 1003 | 1791 | 1450 |
| 85° | 979 | 1828 | 1445 |



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ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 66.1 | 3.3 |
| 10°-20° | 203.1 | 10.1 |
| 20°-30° | 312.8 | 15.6 |
| 30°-40° | 358.0 | 17.8 |
| 40°-50° | 338.5 | 16.9 |
| 50°-60° | 287.4 | 14.3 |
| 60°-70° | 228.6 | 11.4 |
| 70°-80° | 155.0 | 7.7 |
| 80°-90° | 57.5 | 2.9 |
| 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° | 582.0 | 29.0 |
| 0°-40° | 940.1 | 46.8 |
| 0°-60° | 1565.9 | 78.0 |
| 0°-90° | 2006.9 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 2006.9 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|-----|-----|-------|-----|-------|-----|------|
| 0° | 656 | 656 | 656 | 656 | 656 | |
| 5° | 654 | 667 | 680 | 703 | 705 | 62 |
| 15° | 621 | 687 | 727 | 769 | 772 | 176 |
| 25° | 557 | 651 | 692 | 729 | 734 | 257 |
| 35° | 462 | 556 | 594 | 611 | 610 | 289 |
| 45° | 348 | 431 | 457 | 462 | 453 | 271 |
| 55° | 242 | 315 | 343 | 334 | 325 | 220 |
| 65° | 162 | 233 | 259 | 237 | 227 | 162 |
| 75° | 99 | 160 | 166 | 143 | 138 | 104 |
| 85° | 32 | 67 | 59 | 48 | 47 | 35 |
| 90° | 0 | 0 | 0 | 0 | 0 | |



TEST NUMBER: P183902

CATALOG NUMBER: 14SR-LD2-20-C-UNV-L830-CD1-U

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|-------|-------|-------|-------|-------|-------|
| 0° | 656.4 | 656.4 | 656.4 | 656.4 | 656.4 |
| 2.5° | 672.9 | 663.3 | 659.2 | 672.9 | 671.6 |
| 5° | 653.7 | 667.4 | 679.8 | 703.2 | 704.6 |
| 7.5° | 649.5 | 681.2 | 700.5 | 729.3 | 730.7 |
| 10° | 642.7 | 683.9 | 715.6 | 750.0 | 754.1 |
| 12.5° | 633.0 | 686.7 | 718.3 | 761.0 | 766.5 |
| 15° | 620.6 | 686.7 | 726.6 | 769.3 | 772.0 |
| 17.5° | 616.5 | 686.7 | 728.0 | 765.1 | 770.6 |
| 20° | 593.1 | 679.8 | 726.6 | 759.6 | 765.1 |
| 22.5° | 583.5 | 667.4 | 708.7 | 748.6 | 761.0 |
| 25° | 557.3 | 650.9 | 692.2 | 729.3 | 733.5 |
| 27.5° | 535.3 | 633.0 | 677.1 | 708.7 | 708.7 |
| 30° | 518.8 | 611.0 | 649.5 | 679.8 | 678.4 |
| 32.5° | 488.5 | 580.7 | 624.8 | 648.2 | 652.3 |
| 35° | 462.4 | 556.0 | 594.5 | 611.0 | 609.6 |
| 37.5° | 434.9 | 524.3 | 556.0 | 575.2 | 569.7 |
| 40° | 406.0 | 492.7 | 524.3 | 536.7 | 529.8 |
| 42.5° | 382.6 | 459.6 | 489.9 | 498.2 | 491.3 |
| 45° | 348.2 | 430.7 | 456.9 | 462.4 | 452.7 |
| 47.5° | 324.8 | 399.1 | 426.6 | 426.6 | 421.1 |
| 50° | 293.1 | 368.8 | 399.1 | 390.8 | 388.1 |
| 52.5° | 269.7 | 342.7 | 368.8 | 361.9 | 353.7 |
| 55° | 242.2 | 315.1 | 342.7 | 334.4 | 324.8 |
| 57.5° | 225.7 | 293.1 | 319.3 | 309.6 | 301.4 |
| 60° | 200.9 | 271.1 | 297.2 | 284.9 | 275.2 |
| 62.5° | 181.6 | 251.8 | 276.6 | 261.5 | 251.8 |
| 65° | 162.4 | 232.6 | 258.7 | 236.7 | 227.1 |
| 67.5° | 147.2 | 214.7 | 236.7 | 213.3 | 205.0 |
| 70° | 129.4 | 194.0 | 214.7 | 189.9 | 181.6 |
| 72.5° | 114.2 | 177.5 | 191.3 | 166.5 | 161.0 |
| 75° | 99.1 | 159.6 | 166.5 | 143.1 | 137.6 |
| 77.5° | 83.9 | 141.7 | 141.7 | 121.1 | 115.6 |
| 80° | 64.7 | 121.1 | 115.6 | 97.7 | 93.6 |
| 82.5° | 49.5 | 96.3 | 88.1 | 72.9 | 70.2 |
| 85° | 31.7 | 67.4 | 59.2 | 48.2 | 46.8 |
| 87.5° | 15.1 | 35.8 | 28.9 | 23.4 | 22.0 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |

(END OF REPORT)