

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: P183899

Luminaire Tested: **14SR-LD2-15-C-UNV-L840-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P183899
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-LD2-15-C-UNV-L840-CD1-U
Description: METALUX SKYRIDGE EDGELIT LED 1X4 TROFFER

Light Source: EATON LED 4000K
Ballast/Driver: OSRAM ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1487.1 lumens
Efficiency: N/A
Efficacy: 110.2 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

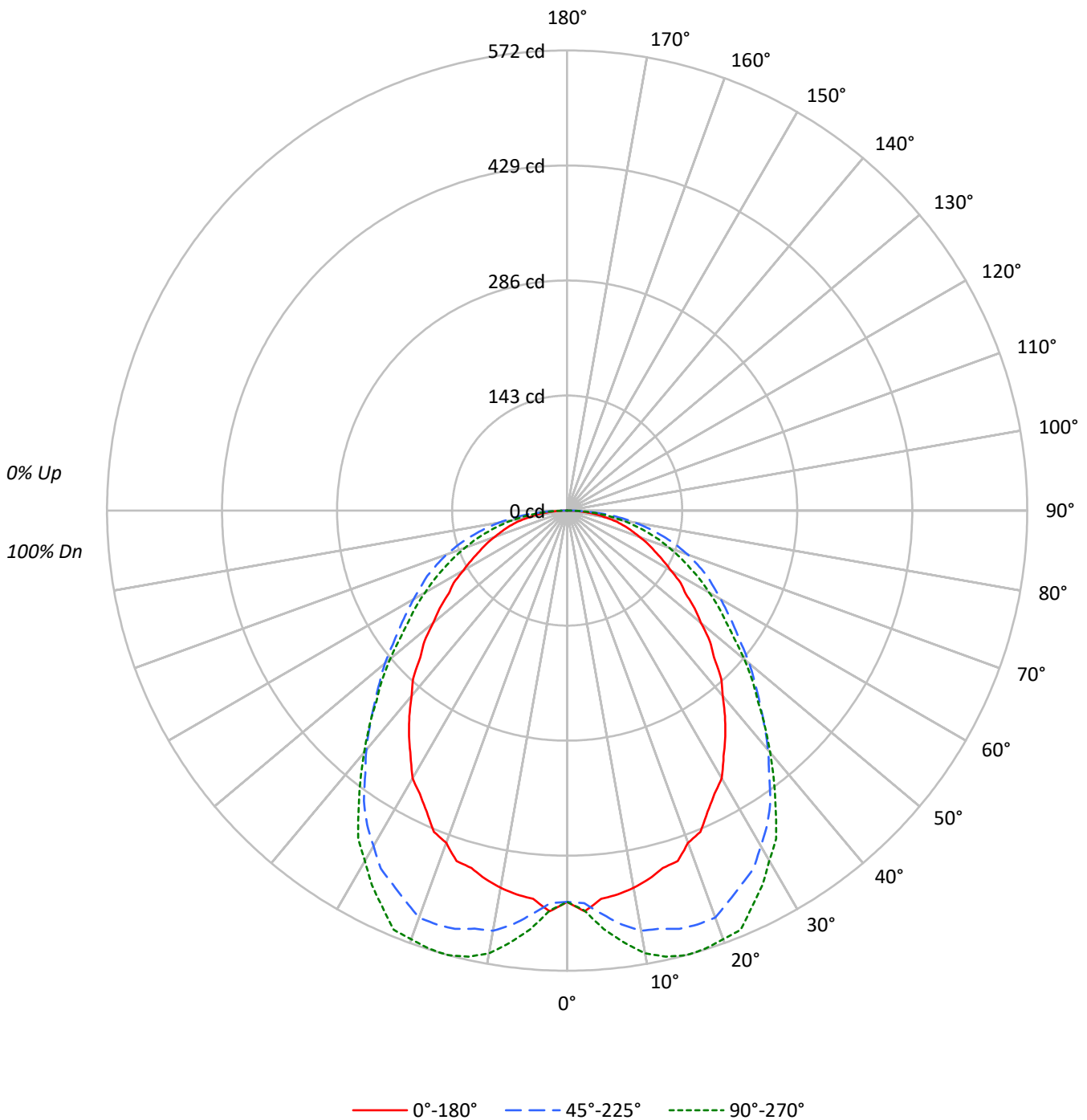
Input Watts (W): 13.5
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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° | 1309 | 1309 | 1309 |
| 5° | 1308 | 1361 | 1410 |
| 10° | 1301 | 1449 | 1527 |
| 15° | 1281 | 1500 | 1594 |
| 20° | 1259 | 1542 | 1624 |
| 25° | 1226 | 1523 | 1614 |
| 30° | 1194 | 1496 | 1562 |
| 35° | 1125 | 1447 | 1484 |
| 40° | 1057 | 1365 | 1379 |
| 45° | 982 | 1289 | 1277 |
| 50° | 909 | 1238 | 1204 |
| 55° | 842 | 1191 | 1129 |
| 60° | 801 | 1186 | 1097 |
| 65° | 766 | 1221 | 1072 |
| 70° | 755 | 1252 | 1059 |
| 75° | 763 | 1283 | 1061 |
| 80° | 742 | 1328 | 1074 |
| 85° | 726 | 1352 | 1071 |



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ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 49.0 | 3.3 |
| 10°-20° | 150.5 | 10.1 |
| 20°-30° | 231.8 | 15.6 |
| 30°-40° | 265.3 | 17.8 |
| 40°-50° | 250.8 | 16.9 |
| 50°-60° | 213.0 | 14.3 |
| 60°-70° | 169.4 | 11.4 |
| 70°-80° | 114.8 | 7.7 |
| 80°-90° | 42.6 | 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° | 431.3 | 29.0 |
| 0°-40° | 696.6 | 46.8 |
| 0°-60° | 1160.4 | 78.0 |
| 0°-90° | 1487.1 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 1487.1 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|-----|-----|-------|-----|-------|-----|------|
| 0° | 486 | 486 | 486 | 486 | 486 | |
| 5° | 484 | 495 | 504 | 521 | 522 | 46 |
| 15° | 460 | 509 | 538 | 570 | 572 | 130 |
| 25° | 413 | 482 | 513 | 540 | 544 | 191 |
| 35° | 343 | 412 | 440 | 453 | 452 | 214 |
| 45° | 258 | 319 | 339 | 343 | 336 | 201 |
| 55° | 180 | 234 | 254 | 248 | 241 | 163 |
| 65° | 120 | 172 | 192 | 175 | 168 | 120 |
| 75° | 73 | 118 | 123 | 106 | 102 | 77 |
| 85° | 24 | 50 | 44 | 36 | 35 | 26 |
| 90° | 0 | 0 | 0 | 0 | 0 | |



TEST NUMBER: P183899

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CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|-------|-------|-------|-------|-------|-------|
| 0° | 486.4 | 486.4 | 486.4 | 486.4 | 486.4 |
| 2.5° | 498.6 | 491.5 | 488.5 | 498.6 | 497.6 |
| 5° | 484.4 | 494.6 | 503.7 | 521.1 | 522.1 |
| 7.5° | 481.3 | 504.8 | 519.0 | 540.5 | 541.5 |
| 10° | 476.2 | 506.8 | 530.3 | 555.8 | 558.8 |
| 12.5° | 469.1 | 508.8 | 532.3 | 563.9 | 568.0 |
| 15° | 459.9 | 508.8 | 538.4 | 570.0 | 572.1 |
| 17.5° | 456.8 | 508.8 | 539.4 | 567.0 | 571.0 |
| 20° | 439.5 | 503.7 | 538.4 | 562.9 | 567.0 |
| 22.5° | 432.4 | 494.6 | 525.2 | 554.7 | 563.9 |
| 25° | 413.0 | 482.3 | 512.9 | 540.5 | 543.5 |
| 27.5° | 396.7 | 469.1 | 501.7 | 525.2 | 525.2 |
| 30° | 384.4 | 452.8 | 481.3 | 503.7 | 502.7 |
| 32.5° | 362.0 | 430.3 | 463.0 | 480.3 | 483.4 |
| 35° | 342.6 | 412.0 | 440.5 | 452.8 | 451.7 |
| 37.5° | 322.2 | 388.5 | 412.0 | 426.2 | 422.2 |
| 40° | 300.8 | 365.1 | 388.5 | 397.7 | 392.6 |
| 42.5° | 283.5 | 340.6 | 363.0 | 369.1 | 364.0 |
| 45° | 258.0 | 319.2 | 338.6 | 342.6 | 335.5 |
| 47.5° | 240.7 | 295.7 | 316.1 | 316.1 | 312.0 |
| 50° | 217.2 | 273.3 | 295.7 | 289.6 | 287.6 |
| 52.5° | 199.9 | 253.9 | 273.3 | 268.2 | 262.1 |
| 55° | 179.5 | 233.5 | 253.9 | 247.8 | 240.7 |
| 57.5° | 167.2 | 217.2 | 236.6 | 229.4 | 223.3 |
| 60° | 148.9 | 200.9 | 220.3 | 211.1 | 203.9 |
| 62.5° | 134.6 | 186.6 | 205.0 | 193.7 | 186.6 |
| 65° | 120.3 | 172.3 | 191.7 | 175.4 | 168.3 |
| 67.5° | 109.1 | 159.1 | 175.4 | 158.1 | 151.9 |
| 70° | 95.9 | 143.8 | 159.1 | 140.7 | 134.6 |
| 72.5° | 84.6 | 131.5 | 141.7 | 123.4 | 119.3 |
| 75° | 73.4 | 118.3 | 123.4 | 106.1 | 102.0 |
| 77.5° | 62.2 | 105.0 | 105.0 | 89.7 | 85.7 |
| 80° | 47.9 | 89.7 | 85.7 | 72.4 | 69.3 |
| 82.5° | 36.7 | 71.4 | 65.3 | 54.0 | 52.0 |
| 85° | 23.5 | 50.0 | 43.8 | 35.7 | 34.7 |
| 87.5° | 11.2 | 26.5 | 21.4 | 17.3 | 16.3 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |

(END OF REPORT)