

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: P567524

Luminaire Tested: **8SNX-168HL-SLW-UNV-L840-CD**

Issue Date: 9/15/2022



Test Information

Test Method: LM-79-08
Report Number: P567524
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2204-622-1)
Test Lab: INNOVATION CENTER
Issue Date: 9/15/2022
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 8SNX-168HL-SLW-UNV-L840-CD
Description: 8FT 16800 LUMEN, SNX FIXTURE WITH 4000K, 80CRI LEDS AND SLW LENS
Light Source: -
Ballast/Driver: -

Summary

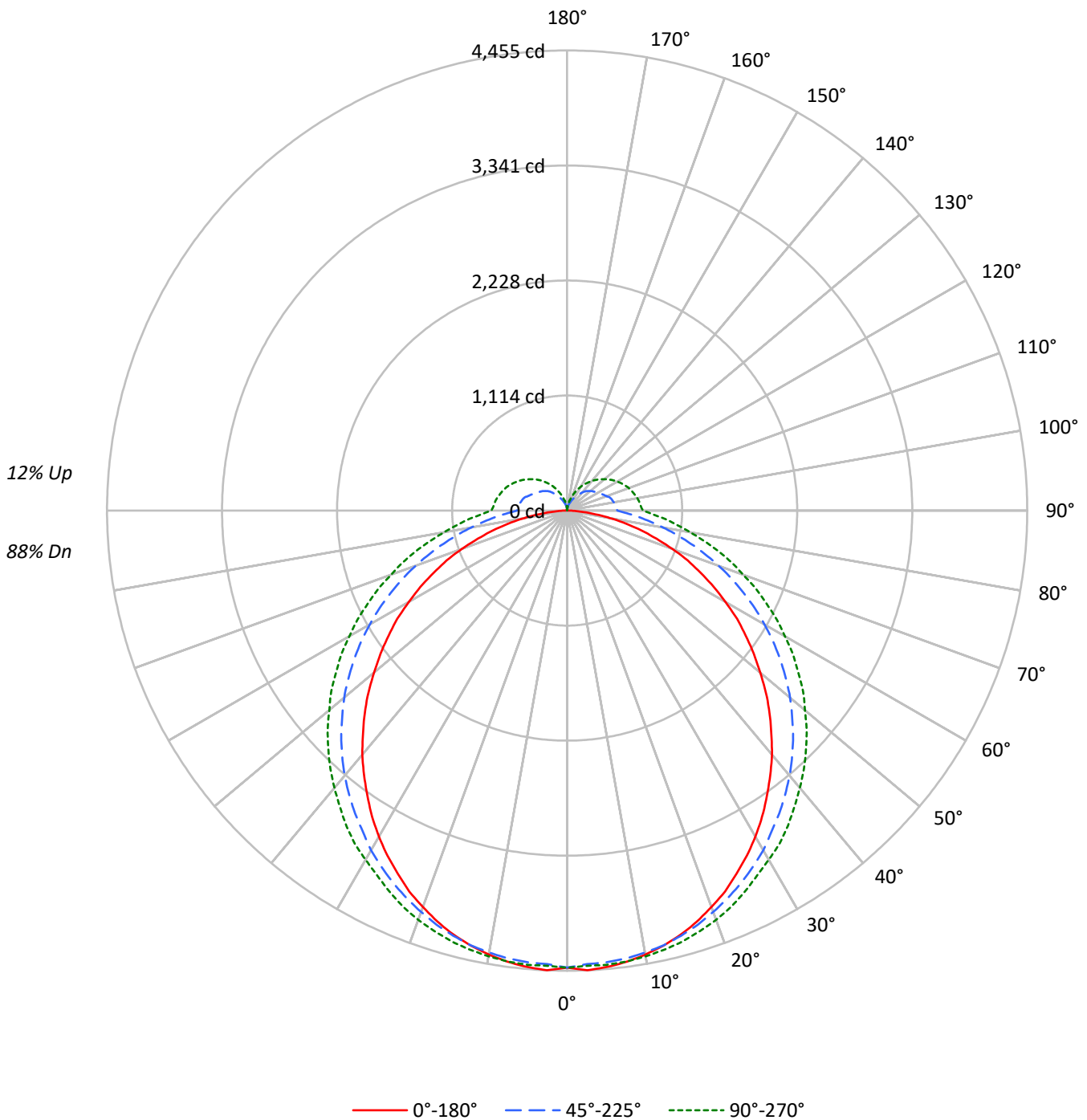
Lumens per Lamp: N/A
Luminaire Lumens: 15930.0 lumens
Efficiency: N/A
Efficacy: 137.6 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.31 / 1.41
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 8' x H: 0.08')
CIE Type: Semi-Direct

Input Watts (W): 115.8
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

TEST NUMBER: P567524

CATALOG NUMBER: 8SNX-168HL-SLW-UNV-L840-CD

Luminous Intensity Polar Plot





TEST NUMBER: P567524

CATALOG NUMBER: 8SNX-168HL-SLW-UNV-L840-CD

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 | 116 | 116 | 116 | 116 | 112 | 112 | 112 | 112 | 105 | 105 | 105 | 98 | 98 | 98 | 91 | 91 | 91 | 88 |
| 1 | 105 | 99 | 95 | 90 | 101 | 96 | 92 | 88 | 89 | 86 | 83 | 84 | 81 | 78 | 78 | 76 | 74 | 71 |
| 2 | 95 | 86 | 79 | 72 | 91 | 83 | 76 | 71 | 77 | 72 | 67 | 72 | 68 | 64 | 68 | 64 | 61 | 58 |
| 3 | 86 | 75 | 66 | 60 | 82 | 72 | 65 | 58 | 68 | 61 | 56 | 63 | 58 | 53 | 59 | 55 | 51 | 48 |
| 4 | 78 | 66 | 57 | 50 | 75 | 64 | 56 | 49 | 60 | 53 | 47 | 56 | 50 | 45 | 53 | 48 | 43 | 41 |
| 5 | 72 | 59 | 50 | 43 | 69 | 57 | 48 | 42 | 54 | 46 | 41 | 50 | 44 | 39 | 47 | 42 | 38 | 35 |
| 6 | 66 | 53 | 44 | 37 | 64 | 51 | 43 | 37 | 48 | 41 | 35 | 45 | 39 | 34 | 43 | 37 | 33 | 31 |
| 7 | 61 | 48 | 39 | 33 | 59 | 46 | 38 | 32 | 44 | 36 | 31 | 41 | 35 | 30 | 39 | 33 | 29 | 27 |
| 8 | 57 | 43 | 35 | 29 | 55 | 42 | 34 | 29 | 40 | 33 | 28 | 38 | 31 | 27 | 36 | 30 | 26 | 24 |
| 9 | 53 | 40 | 32 | 26 | 51 | 39 | 31 | 26 | 37 | 30 | 25 | 35 | 29 | 24 | 33 | 27 | 23 | 21 |
| 10 | 50 | 37 | 29 | 23 | 48 | 36 | 28 | 23 | 34 | 27 | 22 | 32 | 26 | 22 | 31 | 25 | 21 | 19 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 45° | 90° |
|-----|-------|-------|-------|
| 0° | 23814 | 23814 | 23814 |
| 5° | 23942 | 23221 | 23173 |
| 10° | 23809 | 22776 | 22619 |
| 15° | 23615 | 22296 | 22095 |
| 20° | 23301 | 21768 | 21550 |
| 25° | 22924 | 21238 | 20929 |
| 30° | 22514 | 20705 | 20358 |
| 35° | 21993 | 20107 | 19865 |
| 40° | 21489 | 19561 | 19262 |
| 45° | 20879 | 18956 | 18690 |
| 50° | 20170 | 18311 | 18035 |
| 55° | 19497 | 17556 | 17381 |
| 60° | 18720 | 16737 | 16629 |
| 65° | 17773 | 15801 | 15828 |
| 70° | 16570 | 14746 | 14907 |
| 75° | 14854 | 13530 | 14061 |
| 80° | 12458 | 12328 | 12992 |
| 85° | 9037 | 11268 | 12297 |



TEST NUMBER: P567524

CATALOG NUMBER: 8SNX-168HL-SLW-UNV-L840-CD

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|---------|-----------|
| 0°-10° | 420.1 | 2.6 |
| 10°-20° | 1208.3 | 7.6 |
| 20°-30° | 1838.2 | 11.5 |
| 30°-40° | 2235.1 | 14.0 |
| 40°-50° | 2364.7 | 14.8 |
| 50°-60° | 2216.6 | 13.9 |
| 60°-70° | 1823.5 | 11.4 |
| 70°-80° | 1261.7 | 7.9 |
| 80°-90° | 701.6 | 4.4 |
| 90°-100° | 462.2 | 2.9 |
| 100°-110° | 414.5 | 2.6 |
| 110°-120° | 343.1 | 2.2 |
| 120°-130° | 265.2 | 1.7 |
| 130°-140° | 187.7 | 1.2 |
| 140°-150° | 113.2 | 0.7 |
| 150°-160° | 54.4 | 0.3 |
| 160°-170° | 17.8 | 0.1 |
| 170°-180° | 2.2 | 0.0 |
| 0°-30° | 3466.6 | 21.8 |
| 0°-40° | 5701.7 | 35.8 |
| 0°-60° | 10282.9 | 64.6 |
| 0°-90° | 14069.7 | 88.3 |
| 90°-120° | 1219.7 | 7.7 |
| 90°-150° | 1785.9 | 11.2 |
| 90°-180° | 1860.0 | 11.7 |
| 0°-180° | 15930.0 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|------|------|-------|------|-------|------|------|
| 0° | 4425 | 4425 | 4425 | 4425 | 4425 | |
| 5° | 4436 | 4428 | 4389 | 4425 | 4414 | 421 |
| 15° | 4250 | 4264 | 4261 | 4318 | 4318 | 1198 |
| 25° | 3879 | 3934 | 3980 | 4067 | 4070 | 1788 |
| 35° | 3372 | 3462 | 3579 | 3694 | 3726 | 2110 |
| 45° | 2772 | 2916 | 3094 | 3233 | 3271 | 2136 |
| 55° | 2109 | 2297 | 2518 | 2676 | 2731 | 1888 |
| 65° | 1427 | 1631 | 1885 | 2070 | 2128 | 1415 |
| 75° | 742 | 958 | 1238 | 1435 | 1514 | 787 |
| 85° | 164 | 406 | 687 | 878 | 955 | 188 |
| 90° | 3 | 229 | 486 | 668 | 734 | 11 |
| 95° | 3 | 218 | 472 | 646 | 709 | 2 |
| 105° | 3 | 188 | 442 | 608 | 663 | 3 |
| 115° | 6 | 164 | 374 | 540 | 600 | 4 |
| 125° | 6 | 139 | 319 | 461 | 518 | 5 |
| 135° | 6 | 109 | 267 | 379 | 426 | 4 |
| 145° | 6 | 79 | 186 | 286 | 322 | 3 |
| 155° | 8 | 55 | 115 | 183 | 213 | 4 |
| 165° | 8 | 36 | 63 | 85 | 109 | 2 |
| 175° | 8 | 14 | 19 | 19 | 11 | 1 |
| 180° | 6 | 6 | 6 | 6 | 6 | |



TEST NUMBER: P567524

CATALOG NUMBER: 8SNX-168HL-SLW-UNV-L840-CD

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|--------|--------|--------|--------|--------|
| 0° | 4424.7 | 4424.7 | 4424.7 | 4424.7 | 4424.7 |
| 2.5° | 4454.7 | 4441.1 | 4394.7 | 4424.7 | 4411.1 |
| 5° | 4435.6 | 4427.5 | 4389.3 | 4424.7 | 4413.8 |
| 7.5° | 4405.6 | 4402.9 | 4372.9 | 4413.8 | 4402.9 |
| 10° | 4364.7 | 4370.2 | 4345.6 | 4389.3 | 4381.1 |
| 12.5° | 4312.9 | 4321.1 | 4310.2 | 4359.3 | 4353.8 |
| 15° | 4250.1 | 4263.8 | 4261.1 | 4318.3 | 4318.3 |
| 17.5° | 4173.8 | 4192.9 | 4203.8 | 4269.2 | 4269.2 |
| 20° | 4083.7 | 4113.8 | 4135.6 | 4206.5 | 4217.4 |
| 22.5° | 3993.7 | 4029.2 | 4061.9 | 4135.6 | 4151.9 |
| 25° | 3879.1 | 3933.7 | 3980.1 | 4067.4 | 4070.1 |
| 27.5° | 3767.3 | 3827.3 | 3890.1 | 3974.6 | 3982.8 |
| 30° | 3644.5 | 3720.9 | 3797.3 | 3879.1 | 3903.7 |
| 32.5° | 3513.6 | 3598.2 | 3682.7 | 3791.9 | 3824.6 |
| 35° | 3371.7 | 3461.8 | 3579.1 | 3693.6 | 3726.4 |
| 37.5° | 3229.9 | 3330.8 | 3467.2 | 3584.5 | 3614.5 |
| 40° | 3085.3 | 3197.2 | 3349.9 | 3470.0 | 3505.4 |
| 42.5° | 2924.4 | 3060.8 | 3224.4 | 3352.7 | 3393.6 |
| 45° | 2771.6 | 2916.2 | 3093.5 | 3232.6 | 3270.8 |
| 47.5° | 2610.7 | 2763.4 | 2954.4 | 3101.7 | 3145.3 |
| 50° | 2438.8 | 2613.4 | 2818.0 | 2965.3 | 3006.2 |
| 52.5° | 2277.8 | 2455.2 | 2670.7 | 2823.4 | 2880.7 |
| 55° | 2108.7 | 2296.9 | 2517.9 | 2676.1 | 2730.7 |
| 57.5° | 1950.5 | 2130.5 | 2367.9 | 2526.1 | 2594.3 |
| 60° | 1770.4 | 1969.6 | 2206.9 | 2378.8 | 2433.3 |
| 62.5° | 1601.3 | 1803.2 | 2048.7 | 2226.0 | 2288.8 |
| 65° | 1426.7 | 1631.3 | 1885.0 | 2070.5 | 2127.8 |
| 67.5° | 1263.0 | 1464.9 | 1724.1 | 1906.8 | 1980.5 |
| 70° | 1083.0 | 1295.8 | 1560.4 | 1748.6 | 1811.4 |
| 72.5° | 905.7 | 1126.6 | 1396.7 | 1598.6 | 1669.5 |
| 75° | 742.0 | 957.5 | 1238.5 | 1434.9 | 1514.0 |
| 77.5° | 583.8 | 802.0 | 1085.7 | 1287.6 | 1355.8 |
| 80° | 425.6 | 654.7 | 943.9 | 1143.0 | 1208.5 |
| 82.5° | 281.0 | 521.0 | 807.5 | 1006.6 | 1077.5 |
| 85° | 163.7 | 406.5 | 687.4 | 878.4 | 954.8 |
| 87.5° | 70.9 | 308.3 | 575.6 | 763.8 | 826.6 |
| 90° | 2.7 | 229.1 | 485.6 | 668.3 | 733.8 |
| 92.5° | 2.7 | 223.7 | 474.7 | 654.7 | 717.5 |
| 95° | 2.7 | 218.2 | 471.9 | 646.5 | 709.3 |
| 97.5° | 2.7 | 215.5 | 466.5 | 641.1 | 701.1 |
| 100° | 2.7 | 207.3 | 458.3 | 630.2 | 690.2 |
| 102.5° | 2.7 | 196.4 | 450.1 | 619.2 | 676.5 |
| 105° | 2.7 | 188.2 | 441.9 | 608.3 | 662.9 |
| 107.5° | 2.7 | 180.0 | 428.3 | 594.7 | 649.3 |
| 110° | 2.7 | 171.9 | 406.5 | 581.1 | 635.6 |



TEST NUMBER: P567524

CATALOG NUMBER: 8SNX-168HL-SLW-UNV-L840-CD

CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|-----|-------|-------|-------|-------|
| 112.5° | 2.7 | 169.1 | 390.1 | 562.0 | 619.2 |
| 115° | 5.5 | 163.7 | 373.7 | 540.1 | 600.1 |
| 117.5° | 5.5 | 160.9 | 360.1 | 518.3 | 581.1 |
| 120° | 5.5 | 152.8 | 346.4 | 499.2 | 559.2 |
| 122.5° | 5.5 | 144.6 | 332.8 | 480.1 | 540.1 |
| 125° | 5.5 | 139.1 | 319.2 | 461.0 | 518.3 |
| 127.5° | 5.5 | 130.9 | 308.3 | 441.9 | 493.8 |
| 130° | 5.5 | 125.5 | 294.6 | 420.1 | 471.9 |
| 132.5° | 5.5 | 117.3 | 281.0 | 398.3 | 447.4 |
| 135° | 5.5 | 109.1 | 267.3 | 379.2 | 425.6 |
| 137.5° | 5.5 | 98.2 | 251.0 | 357.4 | 401.0 |
| 140° | 5.5 | 90.0 | 229.1 | 335.5 | 376.5 |
| 142.5° | 5.5 | 84.6 | 207.3 | 311.0 | 349.2 |
| 145° | 5.5 | 79.1 | 185.5 | 286.4 | 321.9 |
| 147.5° | 5.5 | 73.7 | 166.4 | 261.9 | 294.6 |
| 150° | 5.5 | 65.5 | 147.3 | 240.1 | 267.3 |
| 152.5° | 8.2 | 60.0 | 130.9 | 212.8 | 240.1 |
| 155° | 8.2 | 54.6 | 114.6 | 182.8 | 212.8 |
| 157.5° | 8.2 | 49.1 | 98.2 | 152.8 | 185.5 |
| 160° | 8.2 | 43.6 | 84.6 | 125.5 | 158.2 |
| 162.5° | 8.2 | 40.9 | 73.7 | 103.7 | 133.7 |
| 165° | 8.2 | 35.5 | 62.7 | 84.6 | 109.1 |
| 167.5° | 8.2 | 27.3 | 51.8 | 65.5 | 90.0 |
| 170° | 8.2 | 21.8 | 40.9 | 46.4 | 68.2 |
| 172.5° | 8.2 | 16.4 | 30.0 | 32.7 | 35.5 |
| 175° | 8.2 | 13.6 | 19.1 | 19.1 | 10.9 |
| 177.5° | 8.2 | 10.9 | 10.9 | 10.9 | 5.5 |
| 180° | 5.5 | 5.5 | 5.5 | 5.5 | 5.5 |

(END OF REPORT)