

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

(formerly Eaton)

Brand: CORELITE

Report Number: P563040

Luminaire Tested: **SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P563040
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-24, G2-2106-289-1)
Test Lab: INNOVATION CENTER
Issue Date: 7/30/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE PYRAMID CONTINUOUS LENS.
DOWNLIGHT 1000 LUMENS PER FOOT
UPLIGHT 1250 LUMENS PER FOOT
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

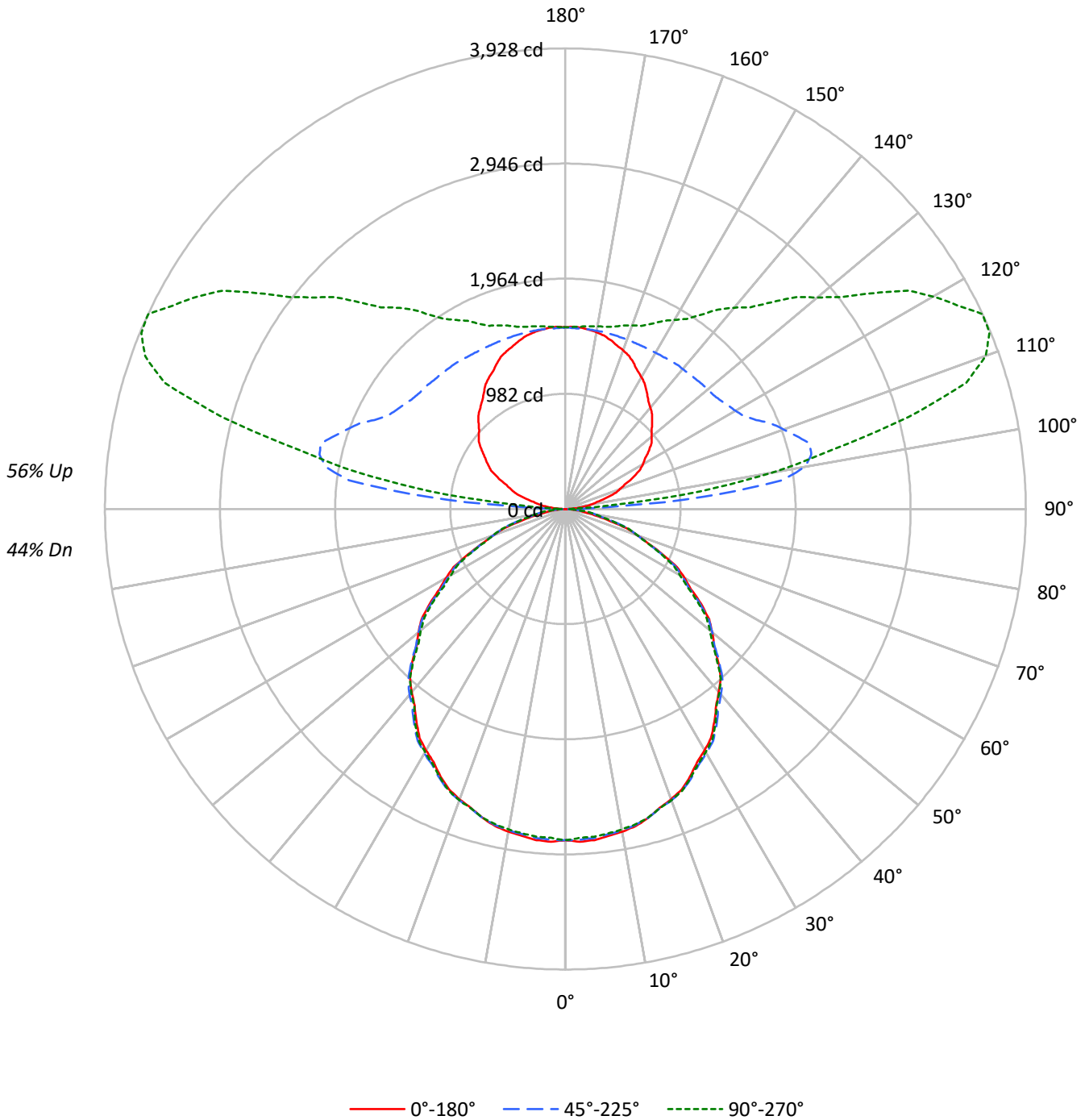
Lumens per Lamp: N/A
Luminaire Lumens: 17710.2 lumens
Efficiency: N/A
Efficacy: 132.9 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.26 / 1.37
Luminous Opening: Rectangular (W 0.29' x L: 8' x H: 0')
CIE Type: General Diffuse

Input Watts (W): 133.3
Input Voltage (V): 120
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: 24 FT



TEST NUMBER: P563040
CATALOG NUMBER: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8

Luminous Intensity Polar Plot





TEST NUMBER: P563040

CATALOG NUMBER: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8

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 | 106 | 106 | 106 | 106 | 97 | 97 | 97 | 97 | 80 | 80 | 80 | 64 | 64 | 64 | 50 | 50 | 50 | 44 |
| 1 | 96 | 92 | 88 | 85 | 88 | 84 | 81 | 78 | 70 | 68 | 66 | 57 | 55 | 54 | 44 | 43 | 42 | 37 |
| 2 | 88 | 80 | 74 | 69 | 80 | 74 | 69 | 64 | 61 | 58 | 54 | 50 | 47 | 45 | 39 | 37 | 36 | 31 |
| 3 | 80 | 71 | 63 | 58 | 73 | 65 | 59 | 54 | 54 | 49 | 46 | 44 | 41 | 38 | 35 | 32 | 30 | 26 |
| 4 | 73 | 62 | 55 | 49 | 67 | 57 | 51 | 45 | 48 | 43 | 39 | 39 | 35 | 32 | 31 | 28 | 26 | 22 |
| 5 | 67 | 56 | 48 | 42 | 61 | 51 | 44 | 39 | 43 | 37 | 33 | 35 | 31 | 28 | 28 | 25 | 23 | 19 |
| 6 | 62 | 50 | 42 | 36 | 56 | 46 | 39 | 34 | 39 | 33 | 29 | 32 | 28 | 24 | 25 | 22 | 20 | 17 |
| 7 | 57 | 45 | 37 | 31 | 52 | 41 | 34 | 29 | 35 | 29 | 25 | 29 | 25 | 22 | 23 | 20 | 18 | 15 |
| 8 | 53 | 41 | 33 | 28 | 48 | 38 | 31 | 26 | 32 | 26 | 23 | 26 | 22 | 19 | 21 | 18 | 16 | 13 |
| 9 | 49 | 37 | 30 | 25 | 45 | 34 | 28 | 23 | 29 | 24 | 20 | 24 | 20 | 17 | 19 | 16 | 14 | 12 |
| 10 | 46 | 34 | 27 | 22 | 42 | 31 | 25 | 21 | 27 | 22 | 18 | 22 | 18 | 15 | 18 | 15 | 13 | 11 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 45° | 90° |
|-----|-------|-------|-------|
| 0° | 13029 | 13029 | 13029 |
| 5° | 13127 | 13042 | 12994 |
| 10° | 13095 | 13034 | 12997 |
| 15° | 13026 | 13026 | 13014 |
| 20° | 12941 | 12979 | 12979 |
| 25° | 12818 | 12911 | 12872 |
| 30° | 12662 | 12815 | 12760 |
| 35° | 12473 | 12665 | 12577 |
| 40° | 12267 | 12441 | 12315 |
| 45° | 12044 | 12130 | 11942 |
| 50° | 11730 | 11730 | 11542 |
| 55° | 11357 | 11210 | 11042 |
| 60° | 10808 | 10592 | 10423 |
| 65° | 9991 | 9791 | 9705 |
| 70° | 8747 | 8818 | 8782 |
| 75° | 7039 | 7784 | 7830 |
| 80° | 5002 | 6599 | 6668 |
| 85° | 3043 | 5536 | 5536 |



TEST NUMBER: P563040

CATALOG NUMBER: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|---------|-----------|
| 0°-10° | 267.3 | 1.5 |
| 10°-20° | 767.0 | 4.3 |
| 20°-30° | 1161.6 | 6.6 |
| 30°-40° | 1392.6 | 7.9 |
| 40°-50° | 1419.9 | 8.0 |
| 50°-60° | 1239.5 | 7.0 |
| 60°-70° | 887.4 | 5.0 |
| 70°-80° | 457.1 | 2.6 |
| 80°-90° | 119.2 | 0.7 |
| 90°-100° | 724.6 | 4.1 |
| 100°-110° | 1951.8 | 11.0 |
| 110°-120° | 2048.3 | 11.6 |
| 120°-130° | 1662.1 | 9.4 |
| 130°-140° | 1303.6 | 7.4 |
| 140°-150° | 1000.8 | 5.7 |
| 150°-160° | 719.6 | 4.1 |
| 160°-170° | 439.6 | 2.5 |
| 170°-180° | 148.3 | 0.8 |
| 0°-30° | 2195.9 | 12.4 |
| 0°-40° | 3588.5 | 20.3 |
| 0°-60° | 6247.9 | 35.3 |
| 0°-90° | 7711.6 | 43.5 |
| 90°-120° | 4724.6 | 26.7 |
| 90°-150° | 8691.2 | 49.1 |
| 90°-180° | 9999.0 | 56.5 |
| 0°-180° | 17710.2 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|------|------|-------|------|-------|------|------|
| 0° | 2824 | 2824 | 2824 | 2824 | 2824 | |
| 5° | 2835 | 2807 | 2816 | 2808 | 2806 | 269 |
| 15° | 2728 | 2704 | 2728 | 2727 | 2725 | 769 |
| 25° | 2518 | 2500 | 2537 | 2529 | 2529 | 1159 |
| 35° | 2215 | 2210 | 2249 | 2233 | 2233 | 1385 |
| 45° | 1846 | 1841 | 1859 | 1836 | 1830 | 1421 |
| 55° | 1412 | 1394 | 1394 | 1373 | 1373 | 1259 |
| 65° | 915 | 895 | 897 | 889 | 889 | 905 |
| 75° | 395 | 413 | 437 | 439 | 439 | 427 |
| 85° | 58 | 88 | 105 | 107 | 105 | 78 |
| 90° | 4 | 12 | 24 | 26 | 26 | 10 |
| 95° | 110 | 394 | 1188 | 607 | 420 | 115 |
| 105° | 361 | 562 | 2158 | 3229 | 3031 | 380 |
| 115° | 637 | 780 | 1797 | 3473 | 3928 | 627 |
| 125° | 870 | 999 | 1614 | 2728 | 3210 | 777 |
| 135° | 1048 | 1169 | 1569 | 2201 | 2492 | 809 |
| 145° | 1211 | 1306 | 1549 | 1882 | 2020 | 760 |
| 155° | 1375 | 1425 | 1535 | 1688 | 1742 | 633 |
| 165° | 1492 | 1509 | 1541 | 1602 | 1610 | 421 |
| 175° | 1551 | 1549 | 1543 | 1564 | 1561 | 147 |
| 180° | 1549 | 1549 | 1549 | 1549 | 1549 | |

TEST NUMBER: P563040

CATALOG NUMBER: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|--------|--------|--------|--------|--------|
| 0° | 2824.3 | 2824.3 | 2824.3 | 2824.3 | 2824.3 |
| 2.5° | 2841.0 | 2816.4 | 2824.3 | 2817.7 | 2807.5 |
| 5° | 2834.7 | 2806.6 | 2816.4 | 2808.5 | 2806.0 |
| 7.5° | 2814.3 | 2786.2 | 2799.2 | 2793.9 | 2791.3 |
| 10° | 2795.5 | 2767.4 | 2782.4 | 2777.1 | 2774.6 |
| 12.5° | 2770.4 | 2744.3 | 2761.5 | 2756.3 | 2755.7 |
| 15° | 2727.5 | 2704.5 | 2727.5 | 2727.4 | 2724.9 |
| 17.5° | 2673.6 | 2652.7 | 2677.3 | 2678.8 | 2677.3 |
| 20° | 2636.0 | 2613.0 | 2643.8 | 2641.3 | 2643.8 |
| 22.5° | 2589.9 | 2571.0 | 2604.1 | 2597.3 | 2599.9 |
| 25° | 2518.3 | 2500.4 | 2536.6 | 2528.8 | 2528.8 |
| 27.5° | 2433.6 | 2420.8 | 2460.2 | 2451.9 | 2451.9 |
| 30° | 2377.1 | 2364.3 | 2405.8 | 2395.4 | 2395.4 |
| 32.5° | 2314.3 | 2305.6 | 2345.2 | 2332.6 | 2332.6 |
| 35° | 2214.9 | 2209.8 | 2248.9 | 2233.3 | 2233.3 |
| 37.5° | 2112.4 | 2107.8 | 2143.3 | 2124.3 | 2118.2 |
| 40° | 2037.1 | 2034.6 | 2065.9 | 2045.0 | 2045.0 |
| 42.5° | 1961.8 | 1959.3 | 1986.4 | 1961.3 | 1961.3 |
| 45° | 1846.2 | 1841.1 | 1859.3 | 1835.7 | 1830.5 |
| 47.5° | 1720.2 | 1715.1 | 1726.5 | 1700.8 | 1698.2 |
| 50° | 1634.4 | 1629.3 | 1634.4 | 1610.8 | 1608.3 |
| 52.5° | 1546.5 | 1537.3 | 1538.2 | 1514.6 | 1514.1 |
| 55° | 1412.1 | 1394.2 | 1393.8 | 1372.9 | 1372.9 |
| 57.5° | 1269.9 | 1246.3 | 1248.4 | 1230.6 | 1228.0 |
| 60° | 1171.5 | 1146.0 | 1148.0 | 1132.3 | 1129.7 |
| 62.5° | 1075.3 | 1045.6 | 1051.8 | 1034.0 | 1033.5 |
| 65° | 915.3 | 894.8 | 897.0 | 889.1 | 889.1 |
| 67.5° | 761.5 | 742.6 | 756.3 | 750.0 | 749.5 |
| 70° | 648.5 | 635.7 | 653.8 | 653.7 | 651.1 |
| 72.5° | 543.9 | 543.4 | 565.9 | 565.9 | 567.5 |
| 75° | 394.9 | 412.8 | 436.7 | 439.3 | 439.3 |
| 77.5° | 263.6 | 295.3 | 321.7 | 322.7 | 322.2 |
| 80° | 188.3 | 224.1 | 248.4 | 253.6 | 251.0 |
| 82.5° | 127.6 | 165.5 | 185.7 | 190.8 | 188.3 |
| 85° | 57.5 | 88.2 | 104.6 | 107.2 | 104.6 |
| 87.5° | 17.5 | 37.5 | 46.6 | 46.9 | 42.8 |
| 90° | 3.9 | 11.7 | 23.7 | 25.6 | 25.6 |
| 92.5° | 48.1 | 170.1 | 336.2 | 161.9 | 112.5 |
| 95° | 110.5 | 394.1 | 1187.8 | 607.4 | 420.3 |
| 97.5° | 176.4 | 451.1 | 1862.9 | 1556.3 | 1173.6 |
| 100° | 226.9 | 473.8 | 2077.6 | 2173.8 | 1803.4 |
| 102.5° | 275.8 | 505.8 | 2148.6 | 2636.2 | 2332.1 |
| 105° | 361.1 | 561.7 | 2158.5 | 3229.3 | 3030.6 |
| 107.5° | 441.6 | 620.6 | 2066.6 | 3534.1 | 3585.4 |
| 110° | 495.2 | 665.0 | 1982.9 | 3628.7 | 3815.9 |

TEST NUMBER: P563040

CATALOG NUMBER: SQ4-PC3-125U-100D-835-1D-UNV-STD-W-8

CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|--------|--------|--------|--------|--------|
| 112.5° | 552.1 | 709.5 | 1902.4 | 3607.8 | 3915.3 |
| 115° | 637.3 | 780.1 | 1797.4 | 3473.0 | 3928.3 |
| 117.5° | 715.0 | 848.9 | 1716.2 | 3258.0 | 3765.0 |
| 120° | 765.5 | 894.8 | 1675.1 | 3103.6 | 3624.5 |
| 122.5° | 809.7 | 937.4 | 1645.1 | 2945.7 | 3465.1 |
| 125° | 870.1 | 999.4 | 1613.9 | 2727.8 | 3210.1 |
| 127.5° | 928.1 | 1055.4 | 1594.2 | 2535.7 | 2966.3 |
| 130° | 962.8 | 1090.2 | 1586.3 | 2425.6 | 2803.7 |
| 132.5° | 997.6 | 1123.4 | 1578.4 | 2328.6 | 2675.8 |
| 135° | 1047.7 | 1169.2 | 1568.6 | 2200.6 | 2491.9 |
| 137.5° | 1095.4 | 1212.0 | 1563.4 | 2092.1 | 2331.3 |
| 140° | 1128.6 | 1240.5 | 1558.7 | 2025.3 | 2241.4 |
| 142.5° | 1163.3 | 1267.5 | 1555.5 | 1963.0 | 2145.1 |
| 145° | 1211.4 | 1306.0 | 1548.8 | 1881.5 | 2020.4 |
| 147.5° | 1263.5 | 1345.7 | 1542.1 | 1812.9 | 1922.1 |
| 150° | 1298.3 | 1369.6 | 1539.0 | 1769.9 | 1860.6 |
| 152.5° | 1329.8 | 1391.9 | 1537.4 | 1734.8 | 1808.5 |
| 155° | 1375.2 | 1425.4 | 1535.0 | 1688.2 | 1742.2 |
| 157.5° | 1415.1 | 1454.0 | 1535.4 | 1655.4 | 1691.7 |
| 160° | 1440.3 | 1473.1 | 1537.0 | 1636.3 | 1663.3 |
| 162.5° | 1462.4 | 1489.0 | 1538.6 | 1620.3 | 1639.6 |
| 165° | 1491.6 | 1509.0 | 1540.9 | 1602.3 | 1610.0 |
| 167.5° | 1515.3 | 1525.3 | 1542.9 | 1588.4 | 1591.5 |
| 170° | 1531.1 | 1534.9 | 1542.9 | 1580.4 | 1580.4 |
| 172.5° | 1540.5 | 1541.3 | 1544.5 | 1572.5 | 1572.5 |
| 175° | 1550.8 | 1548.9 | 1542.9 | 1564.5 | 1560.7 |
| 177.5° | 1555.2 | 1552.1 | 1544.1 | 1556.7 | 1553.6 |
| 180° | 1548.8 | 1548.8 | 1548.8 | 1548.8 | 1548.8 |

(END OF REPORT)