

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: P562286

Luminaire Tested: **SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)**

Issue Date: 7/30/2021

Test Information

Test Method: LM-79-2019
Report Number: P562286
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2101-105-51, G2-2106-289-3)
Test Lab: INNOVATION CENTER
Issue Date: 7/30/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE WAVES CONTINUOUS LENS
DOWNLIGHT 1250 LUMENS PER FOOT
UPLIGHT 750 LUMENS PER FOOT
Light Source: 2700K/65000K CCT, 90 CRI LEDS, TUNED TO 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

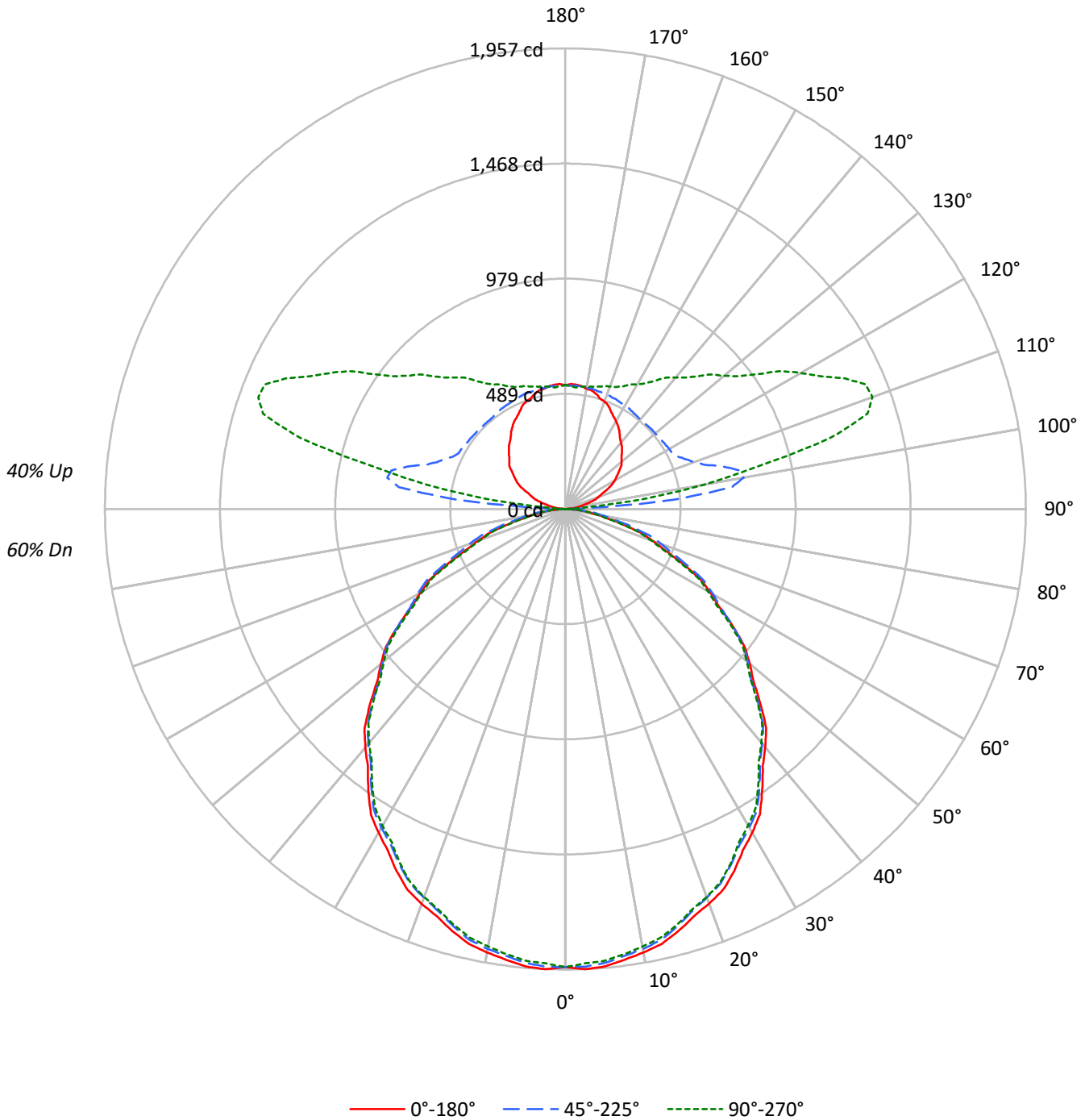
Lumens per Lamp: N/A
Luminaire Lumens: 8219.0 lumens
Efficiency: N/A
Efficacy: 103.4 lumens/watt
Spacing Criteria (0/90/45): 1.22 / 1.19 / 1.31
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')
CIE Type: Semi-Direct

Input Watts (W): 79.5
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



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CATALOG NUMBER: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)

Luminous Intensity Polar Plot





TEST NUMBER: P562286

CATALOG NUMBER: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)

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 | 110 | 110 | 110 | 110 | 102 | 102 | 102 | 102 | 89 | 89 | 89 | 77 | 77 | 77 | 66 | 66 | 66 | 60 |
| 1 | 100 | 96 | 92 | 88 | 94 | 90 | 86 | 83 | 78 | 76 | 74 | 68 | 66 | 64 | 58 | 57 | 56 | 51 |
| 2 | 91 | 84 | 78 | 72 | 85 | 79 | 73 | 69 | 69 | 65 | 61 | 60 | 57 | 54 | 51 | 49 | 47 | 43 |
| 3 | 83 | 74 | 66 | 60 | 78 | 69 | 63 | 57 | 61 | 56 | 51 | 53 | 49 | 46 | 46 | 43 | 40 | 36 |
| 4 | 76 | 65 | 57 | 51 | 71 | 61 | 54 | 49 | 54 | 48 | 44 | 47 | 43 | 39 | 41 | 37 | 35 | 31 |
| 5 | 70 | 58 | 50 | 44 | 65 | 55 | 48 | 42 | 48 | 42 | 38 | 42 | 38 | 34 | 37 | 33 | 30 | 27 |
| 6 | 65 | 52 | 44 | 38 | 60 | 49 | 42 | 37 | 44 | 38 | 33 | 38 | 34 | 30 | 33 | 30 | 27 | 24 |
| 7 | 60 | 47 | 39 | 34 | 56 | 45 | 37 | 32 | 40 | 34 | 29 | 35 | 30 | 26 | 30 | 27 | 24 | 21 |
| 8 | 56 | 43 | 35 | 30 | 52 | 41 | 34 | 29 | 36 | 30 | 26 | 32 | 27 | 24 | 28 | 24 | 21 | 19 |
| 9 | 52 | 39 | 32 | 27 | 48 | 37 | 30 | 26 | 33 | 27 | 23 | 29 | 25 | 21 | 26 | 22 | 19 | 17 |
| 10 | 48 | 36 | 29 | 24 | 45 | 34 | 28 | 23 | 31 | 25 | 21 | 27 | 23 | 19 | 24 | 20 | 17 | 16 |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 45° | 90° |
|-----|-------|-------|-------|
| 0° | 17956 | 17956 | 17956 |
| 5° | 18072 | 17929 | 17850 |
| 10° | 17928 | 17783 | 17687 |
| 15° | 17737 | 17542 | 17476 |
| 20° | 17526 | 17257 | 17222 |
| 25° | 17282 | 16967 | 16915 |
| 30° | 16916 | 16660 | 16550 |
| 35° | 16435 | 16203 | 16107 |
| 40° | 15922 | 15675 | 15613 |
| 45° | 15304 | 15102 | 15035 |
| 50° | 14669 | 14546 | 14447 |
| 55° | 13985 | 13985 | 13763 |
| 60° | 13131 | 13384 | 12909 |
| 65° | 12016 | 12616 | 11717 |
| 70° | 10593 | 11610 | 10315 |
| 75° | 9047 | 10391 | 8801 |
| 80° | 7013 | 8745 | 7104 |
| 85° | 4541 | 6711 | 5992 |



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CATALOG NUMBER: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 183.3 | 2.2 |
| 10°-20° | 517.4 | 6.3 |
| 20°-30° | 767.5 | 9.3 |
| 30°-40° | 898.0 | 10.9 |
| 40°-50° | 894.0 | 10.9 |
| 50°-60° | 772.0 | 9.4 |
| 60°-70° | 555.7 | 6.8 |
| 70°-80° | 291.4 | 3.5 |
| 80°-90° | 72.3 | 0.9 |
| 90°-100° | 239.7 | 2.9 |
| 100°-110° | 682.0 | 8.3 |
| 110°-120° | 653.4 | 8.0 |
| 120°-130° | 517.2 | 6.3 |
| 130°-140° | 415.1 | 5.1 |
| 140°-150° | 325.0 | 4.0 |
| 150°-160° | 237.8 | 2.9 |
| 160°-170° | 147.3 | 1.8 |
| 170°-180° | 50.0 | 0.6 |
| 0°-30° | 1468.2 | 17.9 |
| 0°-40° | 2366.2 | 28.8 |
| 0°-60° | 4032.2 | 49.1 |
| 0°-90° | 4951.6 | 60.2 |
| 90°-120° | 1575.1 | 19.2 |
| 90°-150° | 2832.3 | 34.5 |
| 90°-180° | 3267.0 | 39.7 |
| 0°-180° | 8219.0 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 22.5° | 45° | 67.5° | 90° | Flux |
|------|------|-------|------|-------|------|------|
| 0° | 1946 | 1946 | 1946 | 1946 | 1946 | |
| 5° | 1951 | 1930 | 1936 | 1931 | 1927 | 185 |
| 15° | 1857 | 1834 | 1836 | 1833 | 1830 | 523 |
| 25° | 1698 | 1669 | 1667 | 1656 | 1662 | 781 |
| 35° | 1459 | 1439 | 1439 | 1425 | 1430 | 912 |
| 45° | 1173 | 1163 | 1157 | 1154 | 1152 | 905 |
| 55° | 869 | 868 | 869 | 857 | 856 | 776 |
| 65° | 550 | 567 | 578 | 555 | 537 | 545 |
| 75° | 254 | 277 | 292 | 272 | 247 | 272 |
| 85° | 43 | 56 | 63 | 60 | 57 | 57 |
| 90° | 0 | 0 | 0 | 0 | 0 | 3 |
| 95° | 26 | 103 | 464 | 161 | 99 | 30 |
| 105° | 106 | 161 | 695 | 1228 | 1167 | 112 |
| 115° | 197 | 238 | 527 | 1116 | 1311 | 194 |
| 125° | 278 | 308 | 503 | 835 | 998 | 249 |
| 135° | 340 | 368 | 497 | 705 | 797 | 262 |
| 145° | 401 | 422 | 501 | 610 | 665 | 250 |
| 155° | 458 | 469 | 513 | 552 | 574 | 212 |
| 165° | 506 | 508 | 519 | 530 | 538 | 142 |
| 175° | 530 | 527 | 525 | 522 | 518 | 50 |
| 180° | 526 | 526 | 526 | 526 | 526 | |

TEST NUMBER: P562286

CATALOG NUMBER: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|--------|--------|--------|--------|--------|
| 0° | 1946.2 | 1946.2 | 1946.2 | 1946.2 | 1946.2 |
| 2.5° | 1957.2 | 1941.1 | 1946.2 | 1941.9 | 1932.5 |
| 5° | 1951.3 | 1929.5 | 1935.9 | 1930.7 | 1927.3 |
| 7.5° | 1931.4 | 1911.3 | 1916.0 | 1910.5 | 1908.5 |
| 10° | 1913.6 | 1893.5 | 1898.2 | 1891.2 | 1887.9 |
| 12.5° | 1893.0 | 1871.6 | 1876.2 | 1869.3 | 1867.3 |
| 15° | 1857.0 | 1833.6 | 1836.5 | 1832.9 | 1829.6 |
| 17.5° | 1815.2 | 1791.4 | 1791.9 | 1786.4 | 1785.7 |
| 20° | 1785.0 | 1759.9 | 1757.6 | 1750.8 | 1754.1 |
| 22.5° | 1752.1 | 1725.6 | 1723.3 | 1713.8 | 1718.5 |
| 25° | 1697.6 | 1669.1 | 1666.7 | 1656.5 | 1661.6 |
| 27.5° | 1634.5 | 1606.3 | 1606.3 | 1592.1 | 1597.4 |
| 30° | 1587.8 | 1561.0 | 1563.8 | 1546.8 | 1553.5 |
| 32.5° | 1538.4 | 1514.3 | 1515.8 | 1498.8 | 1505.5 |
| 35° | 1459.2 | 1439.1 | 1438.6 | 1425.0 | 1430.1 |
| 37.5° | 1378.3 | 1360.5 | 1357.7 | 1349.8 | 1351.2 |
| 40° | 1322.0 | 1307.0 | 1301.5 | 1296.3 | 1296.3 |
| 42.5° | 1263.1 | 1249.3 | 1243.9 | 1240.0 | 1238.7 |
| 45° | 1172.9 | 1162.8 | 1157.4 | 1154.0 | 1152.3 |
| 47.5° | 1083.7 | 1074.3 | 1069.6 | 1067.2 | 1065.5 |
| 50° | 1022.0 | 1015.3 | 1013.4 | 1008.2 | 1006.5 |
| 52.5° | 960.2 | 956.2 | 954.4 | 947.9 | 946.2 |
| 55° | 869.4 | 867.7 | 869.4 | 857.3 | 855.6 |
| 57.5° | 774.7 | 777.4 | 782.9 | 766.7 | 762.7 |
| 60° | 711.6 | 718.3 | 725.3 | 706.3 | 699.6 |
| 62.5° | 647.1 | 657.9 | 667.7 | 645.9 | 636.5 |
| 65° | 550.4 | 567.2 | 577.9 | 555.1 | 536.7 |
| 67.5° | 457.1 | 477.9 | 490.7 | 466.3 | 445.5 |
| 70° | 392.7 | 416.1 | 430.4 | 405.9 | 382.4 |
| 72.5° | 336.4 | 362.6 | 374.1 | 351.0 | 327.5 |
| 75° | 253.8 | 277.2 | 291.5 | 272.1 | 246.9 |
| 77.5° | 180.0 | 202.2 | 214.0 | 197.1 | 176.3 |
| 80° | 132.0 | 155.5 | 164.6 | 150.5 | 133.7 |
| 82.5° | 93.6 | 113.1 | 119.3 | 110.9 | 99.5 |
| 85° | 42.9 | 56.3 | 63.4 | 59.9 | 56.6 |
| 87.5° | 11.0 | 20.4 | 26.1 | 26.1 | 27.4 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 92.5° | 8.0 | 42.4 | 98.4 | 28.6 | 21.6 |
| 95° | 26.0 | 103.2 | 464.0 | 160.6 | 99.0 |
| 97.5° | 47.8 | 120.9 | 714.6 | 511.3 | 350.4 |
| 100° | 63.0 | 131.4 | 769.0 | 778.9 | 600.0 |
| 102.5° | 79.8 | 142.8 | 757.0 | 997.0 | 840.8 |
| 105° | 106.0 | 160.8 | 695.0 | 1227.6 | 1167.0 |
| 107.5° | 132.6 | 181.7 | 622.6 | 1292.6 | 1346.6 |
| 110° | 151.0 | 197.0 | 581.0 | 1267.8 | 1389.0 |

TEST NUMBER: P562286

CATALOG NUMBER: SQ4-PW1-075U-125D-92765-1D-UNV-STD-W-4 (3500K)

CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° |
|--------|-------|-------|-------|--------|--------|
| 112.5° | 168.6 | 212.2 | 553.0 | 1208.9 | 1381.8 |
| 115° | 197.0 | 238.1 | 527.0 | 1116.4 | 1311.0 |
| 117.5° | 222.0 | 260.5 | 511.6 | 1015.3 | 1221.4 |
| 120° | 242.0 | 274.3 | 510.0 | 957.5 | 1155.0 |
| 122.5° | 258.0 | 290.3 | 506.0 | 906.8 | 1090.2 |
| 125° | 278.0 | 308.3 | 503.0 | 834.7 | 998.0 |
| 127.5° | 299.8 | 328.2 | 501.4 | 791.7 | 926.2 |
| 130° | 311.0 | 339.4 | 499.0 | 761.7 | 879.0 |
| 132.5° | 323.0 | 350.6 | 499.0 | 738.3 | 846.2 |
| 135° | 340.0 | 368.4 | 497.0 | 705.1 | 797.0 |
| 137.5° | 356.0 | 383.6 | 496.8 | 677.0 | 756.4 |
| 140° | 368.0 | 396.4 | 496.0 | 653.7 | 730.0 |
| 142.5° | 381.6 | 405.3 | 498.4 | 635.2 | 703.6 |
| 145° | 401.0 | 421.5 | 501.0 | 610.2 | 665.0 |
| 147.5° | 417.6 | 437.5 | 505.4 | 585.1 | 632.4 |
| 150° | 432.0 | 445.7 | 507.0 | 576.8 | 610.0 |
| 152.5° | 443.2 | 457.7 | 508.6 | 565.5 | 596.4 |
| 155° | 458.0 | 468.8 | 513.0 | 551.5 | 574.0 |
| 157.5° | 476.4 | 482.9 | 514.0 | 545.2 | 561.2 |
| 160° | 486.0 | 490.9 | 518.0 | 540.3 | 554.0 |
| 162.5° | 491.6 | 497.3 | 518.8 | 536.2 | 546.8 |
| 165° | 506.0 | 508.0 | 519.0 | 530.2 | 538.0 |
| 167.5° | 515.8 | 514.0 | 523.6 | 528.7 | 531.8 |
| 170° | 519.0 | 518.0 | 522.0 | 523.1 | 527.0 |
| 172.5° | 526.2 | 522.9 | 524.4 | 521.5 | 524.6 |
| 175° | 530.0 | 527.1 | 525.0 | 521.9 | 518.0 |
| 177.5° | 531.6 | 526.9 | 524.4 | 521.2 | 522.0 |
| 180° | 526.0 | 526.0 | 526.0 | 526.0 | 526.0 |

(END OF REPORT)