

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

Brand: IRiS

Report Number: P1314229

Luminaire Tested: P3SQAS09R359735DE010 E3SQCA451MB

Issue Date: 1/29/2026

**Test Information**

Test Method: LM-79-2019  
Report Number: P1314229  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-2510-583-77)  
Test Lab: INNOVATION CENTER  
Issue Date: 1/29/2026  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: IRiS  
Catalog Number: P3SQAS09R359735DE010 E3SQCA451MB  
Description: 3in Adjustable LED luminaire with, R35 optic, 3500K CCT AND, 97CRI , E3SQCA451MB TRIM  
Light Source: -  
Ballast/Driver: -

**Summary**

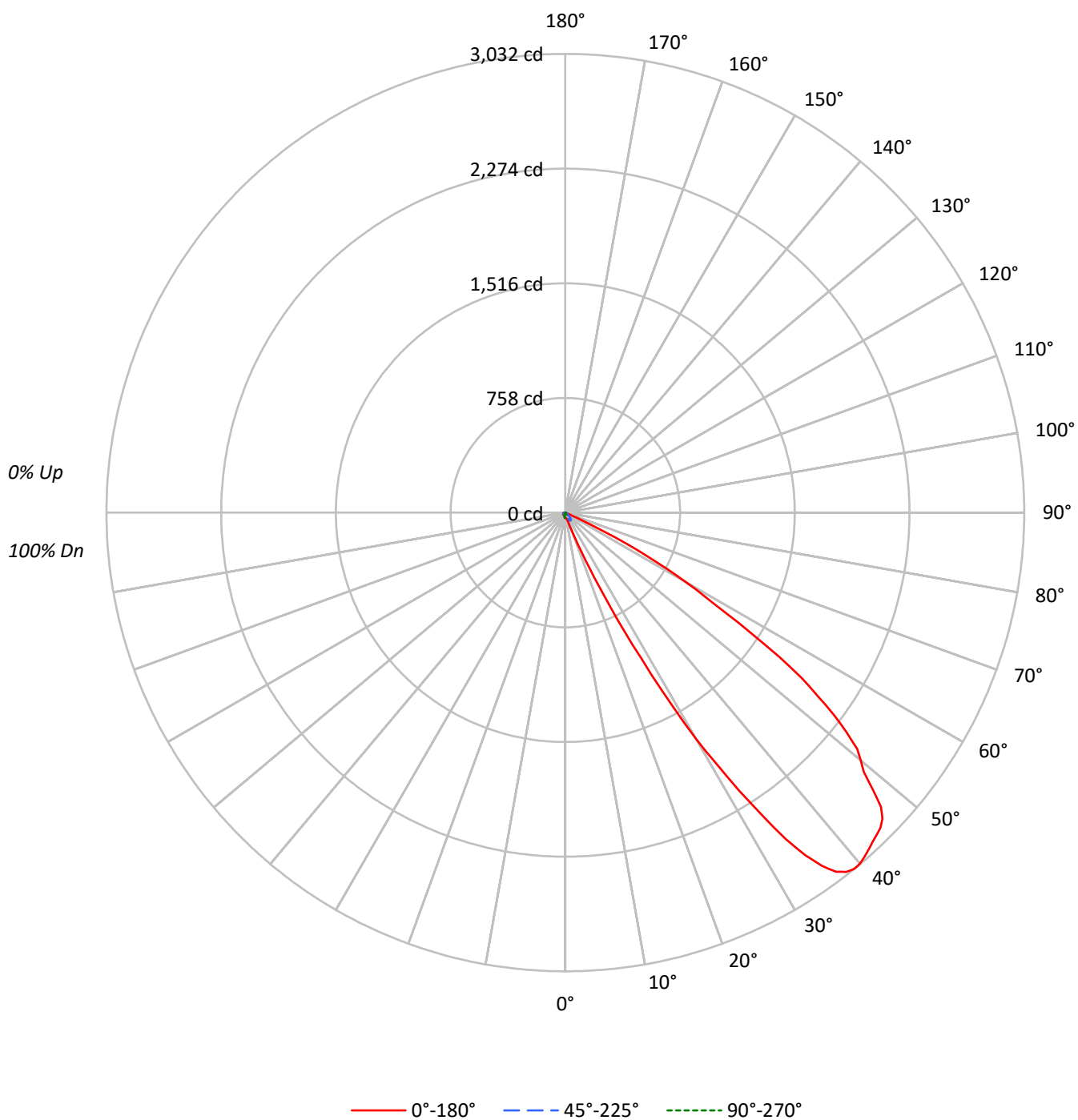
Lumens per Lamp: N/A  
Luminaire Lumens: 755.0 lumens  
Efficiency: N/A  
Efficacy: 68.0 lumens/watt  
Spacing Criteria (0/90/45): 4.01 / 0.66 / 1.41  
Luminous Opening: Rectangular (W 0.25' x L: 0.25' x H: 0')  
CIE Type: Direct

Input Watts (W): 11.1  
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: 24 FT

TEST NUMBER: P1314229

CATALOG NUMBER: P3SQAS09R359735DE010 E3SQCA451MB

### Luminous Intensity Polar Plot



TEST NUMBER: P1314229

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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  | 50  | 30  | 10  |
| RCR |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |
| 0   | 119 | 119 | 119 | 119 | 116 | 116 | 116 | 116 | 111 | 111 | 111 | 106 | 106 | 106 | 102 | 102 | 102 | 100 | 100 | 100 |
| 1   | 110 | 106 | 102 | 99  | 107 | 104 | 100 | 97  | 100 | 97  | 94  | 96  | 93  | 91  | 92  | 90  | 89  | 87  | 87  | 87  |
| 2   | 100 | 93  | 86  | 81  | 98  | 91  | 85  | 80  | 87  | 83  | 78  | 84  | 80  | 77  | 81  | 78  | 75  | 73  | 73  | 73  |
| 3   | 91  | 81  | 73  | 67  | 89  | 79  | 72  | 66  | 76  | 70  | 65  | 74  | 68  | 64  | 71  | 67  | 63  | 61  | 61  | 61  |
| 4   | 83  | 71  | 62  | 55  | 80  | 69  | 61  | 55  | 67  | 60  | 54  | 64  | 58  | 53  | 62  | 57  | 52  | 50  | 50  | 50  |
| 5   | 75  | 62  | 52  | 46  | 73  | 61  | 52  | 45  | 58  | 51  | 45  | 56  | 50  | 44  | 55  | 49  | 44  | 42  | 42  | 42  |
| 6   | 68  | 54  | 45  | 38  | 66  | 53  | 44  | 38  | 51  | 43  | 38  | 50  | 43  | 37  | 48  | 42  | 37  | 35  | 35  | 35  |
| 7   | 62  | 48  | 38  | 32  | 60  | 47  | 38  | 32  | 45  | 37  | 32  | 44  | 37  | 31  | 42  | 36  | 31  | 29  | 29  | 29  |
| 8   | 57  | 42  | 33  | 27  | 55  | 41  | 33  | 27  | 40  | 32  | 27  | 39  | 32  | 26  | 38  | 31  | 26  | 24  | 24  | 24  |
| 9   | 52  | 38  | 29  | 23  | 50  | 37  | 29  | 23  | 36  | 28  | 23  | 35  | 28  | 22  | 34  | 27  | 22  | 20  | 20  | 20  |
| 10  | 48  | 34  | 25  | 19  | 46  | 33  | 25  | 19  | 32  | 25  | 19  | 31  | 24  | 19  | 30  | 24  | 19  | 17  | 17  | 17  |

**AVERAGE LUMINANCE (cd/sqm):**

|     | 0°     | 45°   | 90°  | 135° | 180°  |
|-----|--------|-------|------|------|-------|
| 0°  | 5993   | 5993  | 5993 | 5993 | 5993  |
| 5°  | 6483   | 6362  | 5895 | 5307 | 5186  |
| 10° | 6785   | 6191  | 5246 | 4529 | 4529  |
| 15° | 9717   | 6080  | 4261 | 3887 | 4012  |
| 20° | 24357  | 6488  | 3372 | 3372 | 3739  |
| 25° | 113066 | 8285  | 2584 | 3116 | 3496  |
| 30° | 343719 | 11256 | 2028 | 2844 | 3520  |
| 35° | 580907 | 13035 | 1724 | 2712 | 3448  |
| 40° | 680937 | 12882 | 1371 | 2765 | 3687  |
| 45° | 717113 | 9133  | 1169 | 2996 | 3994  |
| 50° | 682581 | 5466  | 1099 | 3108 | 4394  |
| 55° | 571967 | 2252  | 1231 | 3483 | 5104  |
| 60° | 320196 | 482   | 1412 | 3996 | 5649  |
| 65° | 55259  | 285   | 1386 | 4442 | 6398  |
| 70° | 1007   | 352   | 1712 | 4784 | 7201  |
| 75° | 932    | 466   | 2262 | 5456 | 8185  |
| 80° | 694    | 694   | 2678 | 6050 | 9422  |
| 85° | 0      | 1383  | 5335 | 6719 | 10868 |

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°

Vertical Angle: 46°

Luminance: 722178 cd/sqm

TEST NUMBER: P1314229

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**ZONAL LUMENS:**

| Zone      | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10°    | 3.1    | 0.4       |
| 10°-20°   | 8.9    | 1.2       |
| 20°-30°   | 46.3   | 6.1       |
| 30°-40°   | 200.1  | 26.5      |
| 40°-50°   | 285.4  | 37.8      |
| 50°-60°   | 176.8  | 23.4      |
| 60°-70°   | 26.9   | 3.6       |
| 70°-80°   | 5.0    | 0.7       |
| 80°-90°   | 2.5    | 0.3       |
| 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°    | 58.4   | 7.7       |
| 0°-40°    | 258.4  | 34.2      |
| 0°-60°    | 720.6  | 95.4      |
| 0°-90°    | 755.0  | 100.0     |
| 90°-120°  | 0.0    | 0.0       |
| 90°-150°  | 0.0    | 0.0       |
| 90°-180°  | 0.0    | 0.0       |
| 0°-180°   | 755.0  | 100.0     |

**CANDELA DISTRIBUTION:**

|     | 0°   | 45° | 90° | 135° | 180° | Flux |
|-----|------|-----|-----|------|------|------|
| 0°  | 35   | 35  | 35  | 35   | 35   |      |
| 5°  | 38   | 37  | 34  | 31   | 30   | 4    |
| 15° | 54   | 34  | 24  | 22   | 22   | 20   |
| 25° | 595  | 44  | 14  | 16   | 18   | 356  |
| 35° | 2763 | 62  | 8   | 13   | 16   | 1659 |
| 45° | 2944 | 38  | 5   | 12   | 16   | 2224 |
| 55° | 1905 | 8   | 4   | 12   | 17   | 1622 |
| 65° | 136  | 1   | 3   | 11   | 16   | 277  |
| 75° | 1    | 1   | 3   | 8    | 12   | 1    |
| 85° | 0    | 1   | 3   | 3    | 6    | 0    |
| 90° | 0    | 0   | 0   | 0    | 0    |      |

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**CANDELA DISTRIBUTION (FULL):**

|       | 0°     | 5°     | 10°    | 15°    | 20°    | 25°    | 30°   | 45°  | 67.5° | 90°  | 112.5° |
|-------|--------|--------|--------|--------|--------|--------|-------|------|-------|------|--------|
| 0°    | 34.8   | 34.8   | 34.8   | 34.8   | 34.8   | 34.8   | 34.8  | 34.8 | 34.8  | 34.8 | 34.8   |
| 2.5°  | 36.1   | 36.1   | 36.1   | 36.1   | 36.1   | 36.1   | 36.1  | 36.1 | 36.1  | 34.8 | 34.1   |
| 5°    | 37.5   | 37.5   | 36.8   | 36.8   | 36.8   | 36.8   | 36.8  | 36.8 | 35.4  | 34.1 | 32.0   |
| 7.5°  | 38.2   | 38.2   | 37.5   | 37.5   | 37.5   | 37.5   | 36.8  | 36.1 | 34.8  | 32.0 | 30.0   |
| 10°   | 38.8   | 38.8   | 38.8   | 38.8   | 38.2   | 37.5   | 36.8  | 35.4 | 33.4  | 30.0 | 27.9   |
| 12.5° | 43.6   | 43.6   | 42.9   | 41.6   | 40.2   | 38.8   | 37.5  | 34.8 | 30.7  | 27.3 | 25.2   |
| 15°   | 54.5   | 53.8   | 52.5   | 50.4   | 47.7   | 44.3   | 41.6  | 34.1 | 27.9  | 23.9 | 22.5   |
| 17.5° | 76.3   | 75.0   | 72.9   | 66.1   | 60.0   | 53.8   | 48.4  | 34.1 | 25.2  | 21.1 | 19.8   |
| 20°   | 132.9  | 133.6  | 119.3  | 102.9  | 89.3   | 74.3   | 60.7  | 35.4 | 22.5  | 18.4 | 17.7   |
| 22.5° | 277.4  | 266.5  | 232.4  | 192.9  | 147.2  | 113.8  | 85.9  | 38.8 | 19.8  | 15.7 | 15.7   |
| 25°   | 595.0  | 553.4  | 471.0  | 355.8  | 250.8  | 177.9  | 124.7 | 43.6 | 17.7  | 13.6 | 14.3   |
| 27.5° | 1086.4 | 1048.9 | 883.3  | 665.2  | 441.6  | 268.5  | 169.0 | 49.8 | 15.7  | 11.6 | 12.9   |
| 30°   | 1728.4 | 1624.8 | 1408.8 | 1090.5 | 738.1  | 411.0  | 227.0 | 56.6 | 12.9  | 10.2 | 12.3   |
| 31°   | 1928.8 | 1881.1 | 1618.0 | 1261.5 | 864.9  | 488.0  | 251.5 | 58.6 | 12.3  | 10.2 | 11.6   |
| 32°   | 2166.6 | 2082.1 | 1846.3 | 1449.0 | 993.7  | 556.8  | 280.8 | 60.7 | 11.6  | 8.9  | 11.6   |
| 33°   | 2379.3 | 2297.5 | 2010.6 | 1613.9 | 1123.9 | 635.2  | 312.1 | 61.3 | 10.2  | 8.9  | 10.9   |
| 34°   | 2602.8 | 2491.1 | 2206.9 | 1786.3 | 1257.5 | 719.7  | 340.8 | 62.0 | 9.5   | 8.2  | 10.9   |
| 35°   | 2763.0 | 2651.2 | 2375.9 | 1922.7 | 1372.6 | 794.7  | 373.5 | 62.0 | 8.9   | 8.2  | 10.2   |
| 36°   | 2887.0 | 2788.9 | 2521.7 | 2063.0 | 1487.1 | 862.2  | 399.4 | 62.0 | 7.5   | 7.5  | 10.2   |
| 37°   | 2972.2 | 2878.9 | 2619.9 | 2183.7 | 1574.4 | 922.1  | 422.6 | 62.0 | 6.8   | 7.5  | 10.2   |
| 38°   | 3013.8 | 2936.1 | 2714.6 | 2271.6 | 1658.9 | 969.2  | 441.0 | 60.7 | 6.1   | 6.8  | 9.5    |
| 39°   | 3031.5 | 2968.1 | 2772.5 | 2345.9 | 1722.3 | 1010.1 | 454.6 | 59.3 | 5.5   | 6.8  | 9.5    |
| 40°   | 3028.8 | 2973.6 | 2805.3 | 2397.0 | 1773.4 | 1038.0 | 462.1 | 57.3 | 4.8   | 6.1  | 9.5    |
| 41°   | 3013.1 | 2965.4 | 2822.3 | 2440.6 | 1804.1 | 1057.1 | 464.1 | 55.2 | 4.1   | 6.1  | 8.9    |
| 42°   | 2995.4 | 2951.8 | 2827.7 | 2463.8 | 1823.8 | 1063.2 | 458.7 | 52.5 | 4.1   | 5.5  | 8.9    |
| 43°   | 2977.0 | 2936.8 | 2827.7 | 2471.3 | 1828.6 | 1059.1 | 449.8 | 47.7 | 3.4   | 5.5  | 8.9    |
| 44°   | 2962.0 | 2923.8 | 2818.9 | 2469.3 | 1818.4 | 1043.5 | 433.5 | 42.3 | 2.7   | 5.5  | 8.9    |
| 45°   | 2944.3 | 2906.8 | 2807.3 | 2456.3 | 1798.6 | 1016.9 | 413.0 | 37.5 | 2.0   | 4.8  | 8.9    |
| 46°   | 2912.9 | 2883.6 | 2786.9 | 2429.7 | 1767.3 | 980.1  | 387.1 | 34.1 | 1.4   | 4.8  | 8.2    |
| 47°   | 2852.3 | 2827.1 | 2747.3 | 2390.2 | 1725.7 | 936.4  | 360.5 | 30.7 | 1.4   | 4.8  | 8.2    |
| 48°   | 2730.3 | 2729.6 | 2668.3 | 2316.6 | 1659.6 | 881.9  | 332.6 | 27.3 | 1.4   | 4.8  | 8.2    |
| 49°   | 2612.4 | 2600.1 | 2523.8 | 2187.1 | 1564.8 | 816.5  | 303.3 | 24.5 | 0.7   | 4.8  | 8.2    |
| 50°   | 2547.6 | 2521.1 | 2395.6 | 2034.4 | 1443.5 | 725.8  | 271.9 | 20.4 | 0.7   | 4.1  | 8.2    |
| 51°   | 2480.2 | 2442.0 | 2294.1 | 1896.8 | 1299.0 | 638.6  | 237.9 | 16.4 | 0.7   | 4.1  | 7.5    |
| 52°   | 2358.2 | 2322.0 | 2156.4 | 1765.2 | 1158.6 | 549.3  | 205.1 | 13.6 | 0.7   | 4.1  | 8.2    |
| 53°   | 2226.6 | 2174.8 | 1994.9 | 1620.7 | 1035.3 | 470.3  | 171.8 | 11.6 | 0.7   | 4.1  | 7.5    |
| 54°   | 2061.0 | 2037.8 | 1831.3 | 1443.5 | 890.8  | 393.9  | 141.1 | 9.5  | 0.7   | 4.1  | 7.5    |
| 55°   | 1904.9 | 1870.9 | 1656.2 | 1262.2 | 759.9  | 323.1  | 117.9 | 7.5  | 0.7   | 4.1  | 7.5    |
| 56°   | 1705.9 | 1654.8 | 1453.7 | 1095.9 | 627.0  | 260.4  | 99.5  | 6.1  | 0.7   | 4.1  | 7.5    |
| 57°   | 1468.7 | 1414.2 | 1255.4 | 911.2  | 492.1  | 198.3  | 83.1  | 4.8  | 0.7   | 4.1  | 7.5    |
| 58°   | 1242.5 | 1195.4 | 1025.0 | 703.4  | 370.8  | 137.7  | 68.8  | 3.4  | 0.7   | 3.4  | 7.5    |
| 59°   | 1073.4 | 1021.6 | 852.6  | 541.2  | 257.6  | 101.6  | 51.8  | 2.7  | 0.7   | 4.1  | 7.5    |
| 60°   | 929.6  | 862.8  | 686.3  | 419.2  | 184.0  | 72.9   | 38.2  | 1.4  | 1.4   | 4.1  | 7.5    |
| 62.5° | 535.7  | 473.0  | 327.8  | 170.4  | 75.7   | 37.5   | 18.4  | 0.7  | 1.4   | 4.1  | 7.5    |
| 65°   | 135.6  | 120.6  | 78.4   | 36.8   | 21.1   | 12.9   | 6.8   | 0.7  | 1.4   | 3.4  | 6.8    |



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**CANDELA DISTRIBUTION (continued):**

|       | 0°  | 5°  | 10° | 15° | 20° | 25° | 30° | 45° | 67.5° | 90° | 112.5° |
|-------|-----|-----|-----|-----|-----|-----|-----|-----|-------|-----|--------|
| 67.5° | 4.8 | 4.8 | 4.8 | 4.1 | 3.4 | 2.7 | 1.4 | 0.7 | 1.4   | 3.4 | 6.8    |
| 70°   | 2.0 | 2.0 | 2.0 | 1.4 | 1.4 | 0.7 | 0.7 | 0.7 | 1.4   | 3.4 | 6.1    |
| 72.5° | 1.4 | 1.4 | 1.4 | 1.4 | 0.7 | 0.7 | 0.7 | 0.7 | 2.0   | 3.4 | 5.5    |
| 75°   | 1.4 | 1.4 | 1.4 | 1.4 | 0.7 | 0.7 | 0.7 | 0.7 | 2.0   | 3.4 | 5.5    |
| 77.5° | 1.4 | 1.4 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 2.0   | 2.7 | 4.8    |
| 80°   | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 2.0   | 2.7 | 4.1    |
| 82.5° | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 0.7 | 2.0   | 2.7 | 3.4    |
| 85°   | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 0.0 | 0.7 | 2.0   | 2.7 | 2.7    |
| 87.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.7 | 2.0   | 2.7 | 2.0    |
| 90°   | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0   | 0.0 | 0.0    |

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**CANDELA DISTRIBUTION (continued):**

|       | 135° | 157.5° | 180° |
|-------|------|--------|------|
| 0°    | 34.8 | 34.8   | 34.8 |
| 2.5°  | 32.7 | 32.7   | 32.7 |
| 5°    | 30.7 | 30.7   | 30.0 |
| 7.5°  | 28.6 | 27.9   | 27.9 |
| 10°   | 25.9 | 25.9   | 25.9 |
| 12.5° | 23.9 | 23.9   | 23.9 |
| 15°   | 21.8 | 22.5   | 22.5 |
| 17.5° | 19.8 | 21.1   | 21.1 |
| 20°   | 18.4 | 19.8   | 20.4 |
| 22.5° | 17.0 | 18.4   | 19.1 |
| 25°   | 16.4 | 17.7   | 18.4 |
| 27.5° | 15.0 | 17.0   | 18.4 |
| 30°   | 14.3 | 16.4   | 17.7 |
| 31°   | 14.3 | 16.4   | 17.0 |
| 32°   | 13.6 | 16.4   | 17.0 |
| 33°   | 13.6 | 16.4   | 17.0 |
| 34°   | 13.6 | 15.7   | 17.0 |
| 35°   | 12.9 | 15.7   | 16.4 |
| 36°   | 12.9 | 15.7   | 16.4 |
| 37°   | 12.9 | 15.7   | 17.0 |
| 38°   | 12.9 | 15.7   | 16.4 |
| 39°   | 12.3 | 15.7   | 16.4 |
| 40°   | 12.3 | 15.7   | 16.4 |
| 41°   | 12.3 | 15.7   | 16.4 |
| 42°   | 12.3 | 15.7   | 16.4 |
| 43°   | 12.3 | 15.7   | 16.4 |
| 44°   | 12.3 | 15.0   | 16.4 |
| 45°   | 12.3 | 15.0   | 16.4 |
| 46°   | 12.3 | 15.7   | 16.4 |
| 47°   | 12.3 | 15.7   | 17.0 |
| 48°   | 12.3 | 15.0   | 16.4 |
| 49°   | 11.6 | 15.0   | 16.4 |
| 50°   | 11.6 | 15.0   | 16.4 |
| 51°   | 11.6 | 15.7   | 17.0 |
| 52°   | 11.6 | 15.7   | 17.0 |
| 53°   | 11.6 | 15.7   | 17.0 |
| 54°   | 11.6 | 15.7   | 16.4 |
| 55°   | 11.6 | 15.7   | 17.0 |
| 56°   | 11.6 | 15.7   | 16.4 |
| 57°   | 11.6 | 15.7   | 16.4 |
| 58°   | 11.6 | 15.0   | 16.4 |
| 59°   | 11.6 | 15.0   | 16.4 |
| 60°   | 11.6 | 15.0   | 16.4 |
| 62.5° | 10.9 | 15.0   | 16.4 |
| 65°   | 10.9 | 14.3   | 15.7 |



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**CANDELA DISTRIBUTION (continued):**

|       | 135° | 157.5° | 180° |
|-------|------|--------|------|
| 67.5° | 10.2 | 14.3   | 15.0 |
| 70°   | 9.5  | 13.6   | 14.3 |
| 72.5° | 8.9  | 12.9   | 13.6 |
| 75°   | 8.2  | 11.6   | 12.3 |
| 77.5° | 6.8  | 10.2   | 11.6 |
| 80°   | 6.1  | 8.9    | 9.5  |
| 82.5° | 4.8  | 7.5    | 8.2  |
| 85°   | 3.4  | 5.5    | 5.5  |
| 87.5° | 1.4  | 2.7    | 2.7  |
| 90°   | 0.0  | 0.0    | 0.0  |

(END OF REPORT)