

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: STREETWORKS

Report Number: P144149

Luminaire Tested: **OVH-E02-LED-E-U-5WQ-7030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P144149
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33698)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: OVH-E02-LED-E-U-5WQ-7030
Description: OVH LED ROADWAY SMALL CUTOFF COBRAHEAD LUMINAIRE
(2) LIGHTBARS WITH AccuLED OPTICS - TYPE 5 SQUARE WIDE
Light Source: (42) 3000K CCT, 70 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5599.9 lumens
Efficiency: N/A
Efficacy: 107.5 lumens/watt
Luminous Opening: Rectangular (W 0.33' x L: 1' x H: 0')
IES Classification: Type V - Short - Semi-Cutoff
BUG Rating: B3 - U0 - G1

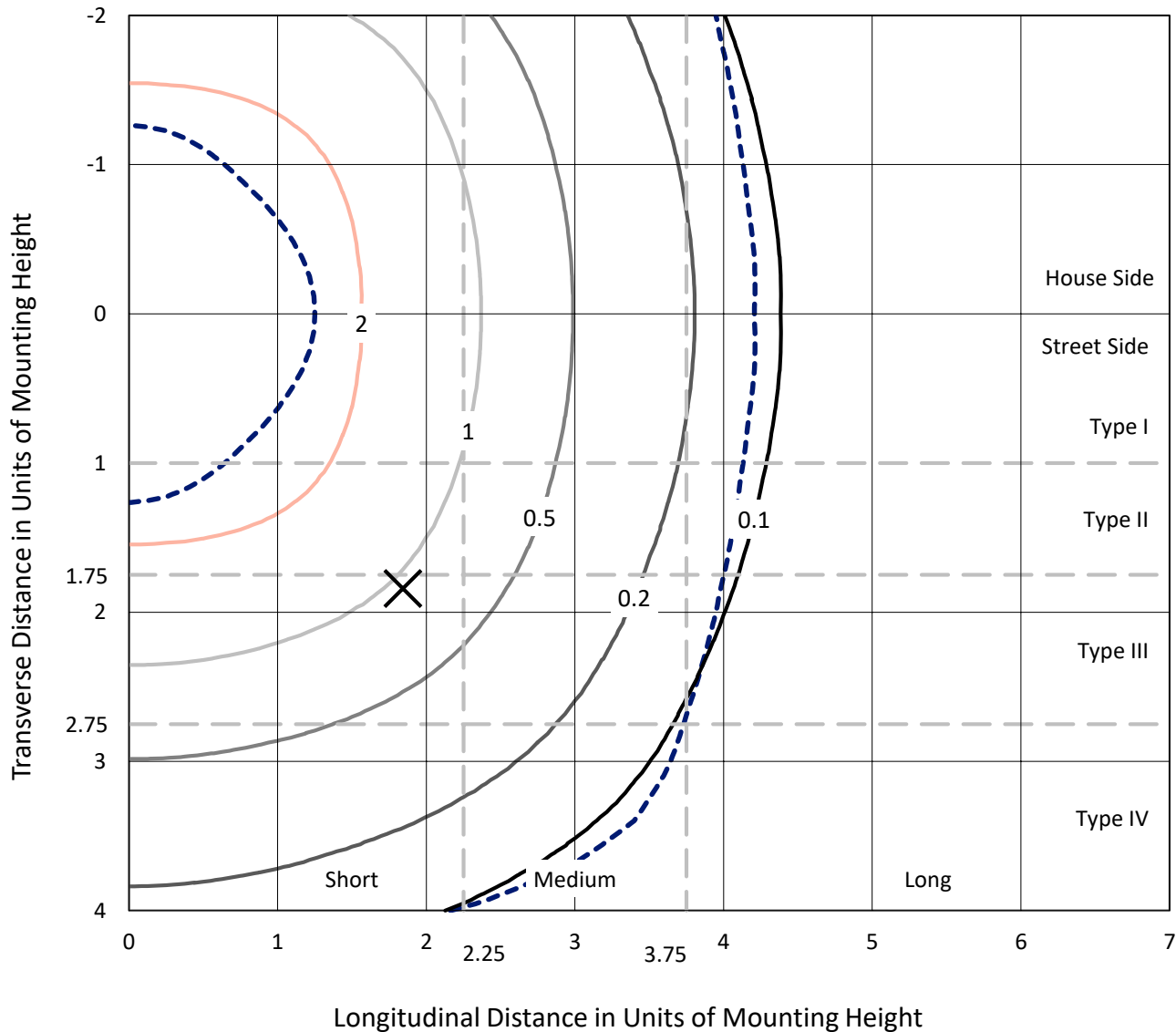
Input Watts (W): 52.1
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

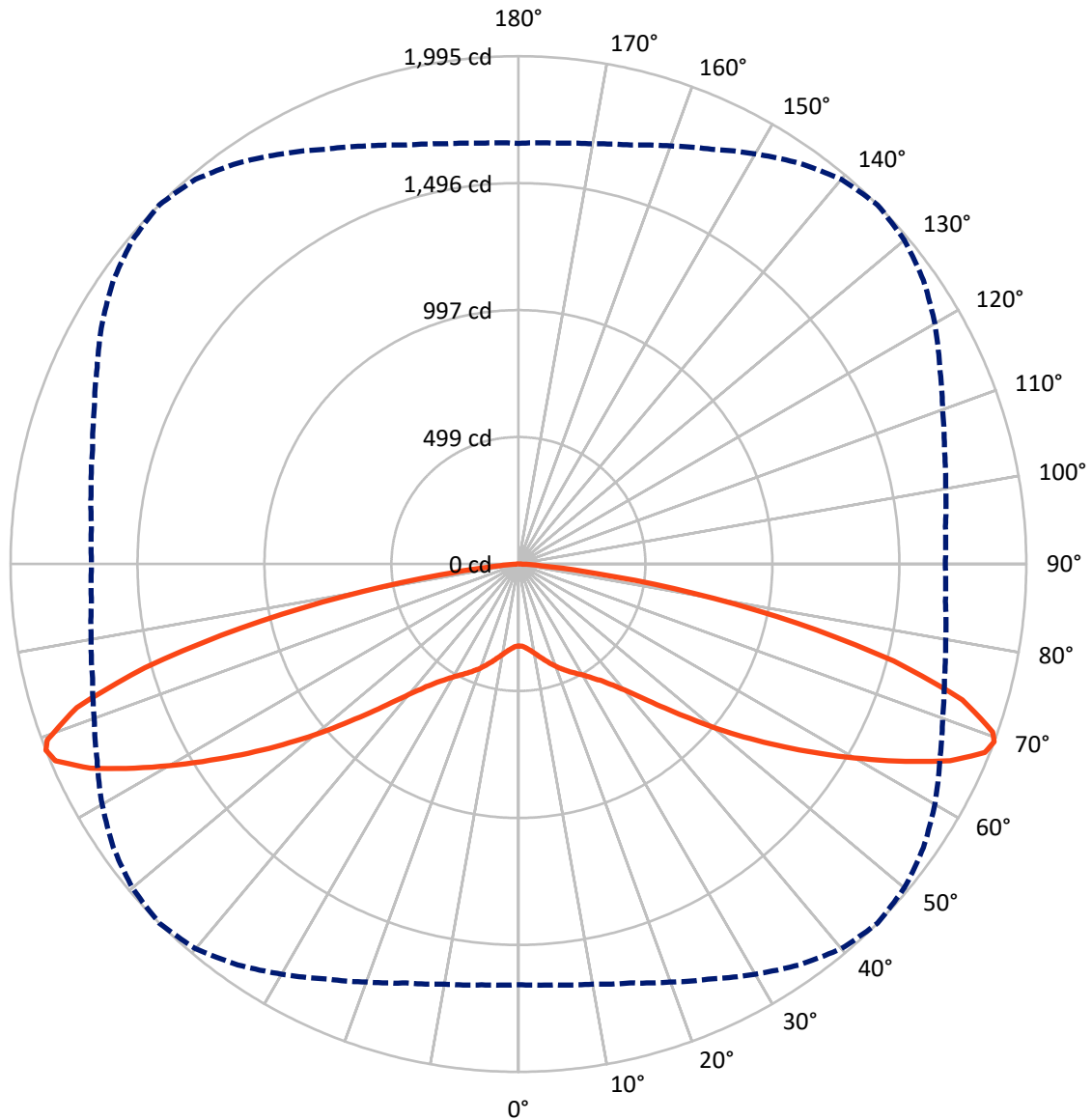
✕ Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 3.6 fc
 Type V - Short - Semi-Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral - - - Horizontal Cone Through 69-Deg Vertical

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FLUX DISTRIBUTION:

| | | Downward | Upward | Total |
|--------------------|-----------|----------|--------|--------|
| House Side | Lumens | 2799.9 | 0.0 | 2799.9 |
| | % Fixture | 50.0 | 0.0 | 50.0 |
| Street Side | Lumens | 2799.9 | 0.0 | 2799.9 |
| | % Fixture | 50.0 | 0.0 | 50.0 |
| Total | Lumens | 5599.9 | 0.0 | 5599.9 |
| | % Fixture | 100.0 | 0.0 | 100.0 |

Coefficient of Utilization

ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|--------|-----------|
| 0°-10° | 32.5 | 0.6 |
| 10°-20° | 111.9 | 2.0 |
| 20°-30° | 215.7 | 3.9 |
| 30°-40° | 353.5 | 6.3 |
| 40°-50° | 614.6 | 11.0 |
| 50°-60° | 1091.8 | 19.5 |
| 60°-70° | 1695.1 | 30.3 |
| 70°-80° | 1350.5 | 24.1 |
| 80°-90° | 134.3 | 2.4 |
| 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°-90° | 5599.9 | 100.0 |
| 0°-180° | 5599.9 | 100.0 |



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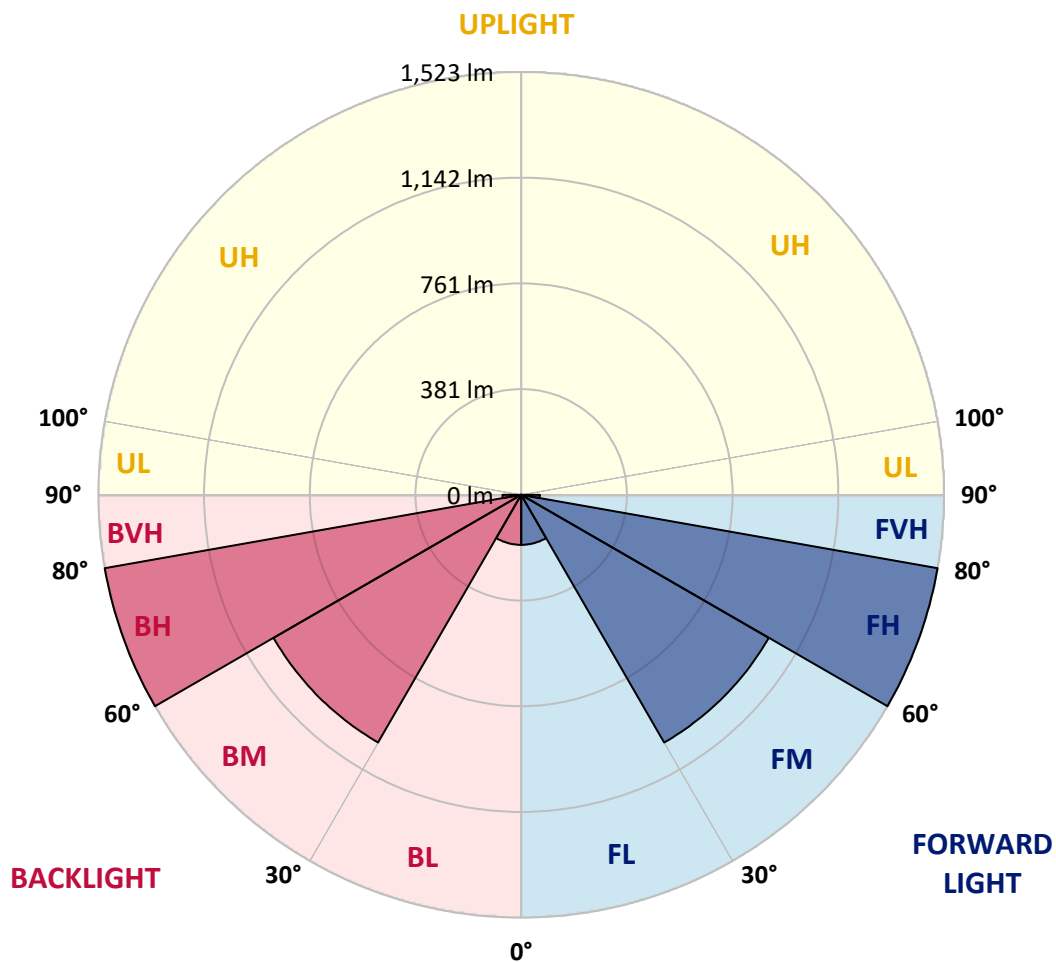
CATALOG NUMBER: OVH-E02-LED-E-U-5WQ-7030

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

| Zone | | Lumens | % Fixture | Zone Rating/Lumen Limit | | |
|------|-------------|--------|-----------|-------------------------|------|---------|
| | | | | B | U | G |
| FL | (0°-30°) | 180.0 | 3.2 | | | |
| FM | (30°-60°) | 1029.9 | 18.4 | | | |
| FH | (60°-80°) | 1522.8 | 27.2 | | | G1/1800 |
| FVH | (80°-90°) | 67.1 | 1.2 | | | G1/100 |
| BL | (0°-30°) | 180.0 | 3.2 | B1/500 | | |
| BM | (30°-60°) | 1029.9 | 18.4 | B2/2500 | | |
| BH | (60°-80°) | 1522.8 | 27.2 | B3/2500 | | G1/1800 |
| BVH | (80°-90°) | 67.1 | 1.2 | | | G1/100 |
| UL | (90°-100°) | 0.0 | 0.0 | | U0/0 | |
| UH | (100°-180°) | 0.0 | 0.0 | | U0/0 | |

BUG Rating: B3-U0-G1

Type V Short





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CANDELA DISTRIBUTION (FULL):

| | 0° | 5° | 10° | 15° | 20° | 25° | 30° | 35° | 40° | 45° | 50° |
|-------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0° | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 |
| 2.5° | 324.4 | 324.4 | 324.4 | 324.1 | 324.1 | 323.7 | 324.1 | 323.7 | 323.7 | 323.7 | 323.7 |
| 5° | 332.8 | 332.1 | 332.1 | 331.7 | 332.5 | 332.5 | 331.7 | 332.1 | 331.7 | 331.7 | 332.1 |
| 7.5° | 343.4 | 343.4 | 343.4 | 343.1 | 343.8 | 343.4 | 343.1 | 343.4 | 343.4 | 343.4 | 343.1 |
| 10° | 356.6 | 356.9 | 356.6 | 356.6 | 357.7 | 357.3 | 357.7 | 357.7 | 358.0 | 357.7 | 357.7 |
| 12.5° | 371.9 | 371.9 | 372.3 | 372.6 | 373.0 | 373.4 | 374.5 | 374.1 | 374.8 | 374.1 | 374.1 |
| 15° | 389.8 | 390.5 | 389.8 | 389.8 | 390.9 | 391.6 | 392.0 | 392.0 | 392.7 | 392.4 | 391.6 |
| 17.5° | 408.8 | 409.2 | 408.8 | 408.5 | 409.5 | 410.6 | 411.0 | 411.0 | 412.1 | 411.4 | 411.4 |
| 20° | 428.2 | 428.5 | 427.8 | 427.4 | 428.9 | 428.9 | 429.6 | 430.0 | 431.1 | 431.5 | 430.4 |
| 22.5° | 446.1 | 446.4 | 446.1 | 445.7 | 447.2 | 447.2 | 448.3 | 448.6 | 450.1 | 449.7 | 449.7 |
| 25° | 463.6 | 463.6 | 463.3 | 463.3 | 464.7 | 465.1 | 466.2 | 466.9 | 468.4 | 468.4 | 468.4 |
| 27.5° | 479.7 | 480.1 | 479.3 | 479.0 | 481.9 | 483.0 | 483.7 | 485.2 | 486.3 | 487.0 | 486.6 |
| 30° | 498.0 | 498.0 | 497.6 | 498.7 | 500.5 | 502.0 | 503.4 | 505.6 | 507.8 | 507.1 | 507.1 |
| 32.5° | 519.5 | 520.2 | 519.9 | 521.3 | 523.5 | 525.7 | 527.6 | 530.1 | 531.2 | 533.0 | 531.6 |
| 35° | 548.4 | 549.8 | 549.1 | 550.6 | 552.4 | 553.9 | 557.9 | 560.4 | 562.3 | 563.4 | 562.6 |
| 37.5° | 584.5 | 583.8 | 585.3 | 585.6 | 589.3 | 591.1 | 595.9 | 599.5 | 602.4 | 603.5 | 602.8 |
| 40° | 629.5 | 628.4 | 630.2 | 632.0 | 636.8 | 638.6 | 644.1 | 649.6 | 653.6 | 655.1 | 654.3 |
| 42.5° | 683.2 | 684.6 | 687.6 | 690.1 | 696.7 | 701.8 | 708.0 | 716.1 | 720.5 | 722.3 | 719.7 |
| 45° | 753.7 | 751.1 | 756.6 | 763.2 | 766.8 | 778.2 | 788.4 | 796.8 | 804.1 | 807.0 | 804.1 |
| 47.5° | 834.1 | 833.7 | 840.3 | 848.3 | 857.8 | 868.4 | 880.5 | 891.4 | 904.2 | 904.9 | 901.3 |
| 50° | 922.8 | 930.2 | 933.8 | 941.8 | 959.4 | 972.5 | 987.9 | 1004.3 | 1016.0 | 1019.7 | 1013.1 |
| 52.5° | 1029.9 | 1035.4 | 1037.6 | 1051.1 | 1067.2 | 1083.2 | 1104.8 | 1124.5 | 1138.0 | 1139.5 | 1136.2 |
| 55° | 1146.1 | 1150.5 | 1154.5 | 1170.9 | 1188.5 | 1202.7 | 1230.1 | 1249.5 | 1263.0 | 1268.1 | 1265.9 |
| 57.5° | 1266.3 | 1270.3 | 1275.4 | 1293.3 | 1311.2 | 1331.3 | 1357.2 | 1379.9 | 1395.6 | 1405.1 | 1402.5 |
| 60° | 1399.6 | 1399.6 | 1411.3 | 1429.2 | 1443.8 | 1467.6 | 1494.6 | 1520.9 | 1538.1 | 1553.1 | 1549.0 |
| 62.5° | 1539.9 | 1543.9 | 1555.3 | 1569.9 | 1585.2 | 1607.1 | 1637.8 | 1669.2 | 1695.5 | 1706.9 | 1706.5 |
| 65° | 1646.2 | 1653.5 | 1668.5 | 1685.3 | 1710.9 | 1736.8 | 1775.6 | 1814.6 | 1846.4 | 1862.9 | 1862.9 |
| 67.5° | 1677.3 | 1682.0 | 1700.7 | 1726.2 | 1763.1 | 1804.4 | 1857.0 | 1911.5 | 1954.9 | 1976.5 | 1963.0 |
| 69° | 1652.4 | 1659.4 | 1675.8 | 1703.6 | 1747.4 | 1797.8 | 1860.3 | 1922.1 | 1972.5 | 1994.8 | 1979.0 |
| 70° | 1623.6 | 1631.2 | 1647.7 | 1675.1 | 1720.4 | 1774.1 | 1836.6 | 1903.1 | 1957.1 | 1976.1 | 1958.2 |
| 72.5° | 1505.9 | 1515.4 | 1527.1 | 1550.9 | 1591.8 | 1642.2 | 1698.5 | 1756.9 | 1808.8 | 1823.8 | 1801.5 |
| 75° | 1305.4 | 1307.2 | 1313.0 | 1330.6 | 1345.2 | 1381.0 | 1428.8 | 1475.2 | 1514.3 | 1523.1 | 1499.4 |
| 77.5° | 923.9 | 914.1 | 904.2 | 919.2 | 930.9 | 976.9 | 1028.8 | 1066.8 | 1107.7 | 1120.1 | 1096.0 |
| 80° | 405.2 | 401.5 | 415.4 | 435.1 | 486.6 | 517.3 | 568.1 | 622.5 | 657.2 | 697.8 | 654.3 |
| 82.5° | 80.0 | 84.4 | 97.5 | 120.6 | 148.7 | 187.1 | 220.3 | 257.9 | 291.9 | 307.3 | 291.5 |
| 85° | 32.5 | 35.4 | 40.2 | 44.9 | 48.2 | 54.1 | 63.6 | 78.9 | 87.0 | 88.0 | 83.7 |
| 87.5° | 13.5 | 15.7 | 21.2 | 25.2 | 25.6 | 24.5 | 25.2 | 25.9 | 21.2 | 17.2 | 21.6 |
| 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):

| | 55° | 60° | 65° | 70° | 75° | 80° | 85° | 90° |
|-------|--------|--------|--------|--------|--------|--------|--------|--------|
| 0° | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 | 321.9 |
| 2.5° | 323.7 | 324.1 | 323.7 | 324.1 | 323.7 | 323.7 | 324.1 | 323.7 |
| 5° | 331.7 | 332.1 | 331.7 | 331.4 | 331.0 | 331.4 | 331.4 | 331.4 |
| 7.5° | 343.1 | 342.7 | 342.3 | 342.3 | 342.0 | 341.6 | 342.3 | 342.3 |
| 10° | 356.9 | 356.6 | 355.8 | 355.8 | 355.5 | 355.5 | 355.5 | 355.5 |
| 12.5° | 373.7 | 372.6 | 372.3 | 371.2 | 370.8 | 370.5 | 370.5 | 370.8 |
| 15° | 391.3 | 390.2 | 389.8 | 388.0 | 388.0 | 387.6 | 387.6 | 387.6 |
| 17.5° | 409.9 | 408.8 | 407.4 | 407.4 | 406.3 | 405.5 | 405.9 | 405.2 |
| 20° | 428.9 | 427.4 | 426.7 | 426.4 | 424.9 | 424.9 | 424.9 | 424.5 |
| 22.5° | 447.5 | 446.4 | 445.3 | 443.9 | 442.4 | 442.1 | 442.1 | 441.7 |
| 25° | 466.5 | 464.7 | 462.5 | 461.1 | 459.6 | 458.5 | 458.5 | 458.5 |
| 27.5° | 485.5 | 483.3 | 480.1 | 478.2 | 476.0 | 474.9 | 474.9 | 474.6 |
| 30° | 505.6 | 503.1 | 500.2 | 497.6 | 494.7 | 493.6 | 493.2 | 492.5 |
| 32.5° | 529.7 | 527.2 | 524.3 | 520.6 | 517.7 | 515.9 | 515.9 | 514.8 |
| 35° | 560.4 | 557.5 | 555.3 | 550.6 | 546.9 | 544.0 | 544.4 | 545.1 |
| 37.5° | 600.6 | 597.0 | 595.1 | 589.3 | 584.5 | 581.6 | 581.6 | 581.3 |
| 40° | 651.8 | 648.1 | 644.1 | 638.6 | 632.8 | 628.8 | 627.7 | 627.7 |
| 42.5° | 716.8 | 713.5 | 708.0 | 700.4 | 693.4 | 689.0 | 685.4 | 685.7 |
| 45° | 798.3 | 794.2 | 786.6 | 777.1 | 768.7 | 762.5 | 757.4 | 757.4 |
| 47.5° | 897.3 | 888.9 | 878.3 | 869.9 | 855.6 | 846.1 | 842.5 | 841.7 |
| 50° | 1010.2 | 994.5 | 981.3 | 969.2 | 954.3 | 944.4 | 938.9 | 937.5 |
| 52.5° | 1128.5 | 1112.1 | 1095.7 | 1079.9 | 1061.7 | 1051.4 | 1042.7 | 1042.0 |
| 55° | 1257.1 | 1236.3 | 1215.5 | 1200.1 | 1178.6 | 1168.0 | 1159.2 | 1154.1 |
| 57.5° | 1388.3 | 1364.9 | 1349.9 | 1328.0 | 1305.4 | 1297.7 | 1289.3 | 1283.1 |
| 60° | 1535.9 | 1510.3 | 1490.6 | 1467.6 | 1453.0 | 1436.5 | 1428.5 | 1423.7 |
| 62.5° | 1686.8 | 1663.0 | 1637.8 | 1615.9 | 1595.4 | 1584.1 | 1573.2 | 1567.7 |
| 65° | 1840.2 | 1801.1 | 1771.2 | 1740.8 | 1716.7 | 1696.3 | 1679.1 | 1676.9 |
| 67.5° | 1934.5 | 1885.2 | 1835.1 | 1790.9 | 1755.5 | 1726.6 | 1709.1 | 1702.9 |
| 69° | 1942.1 | 1888.4 | 1826.0 | 1773.0 | 1732.1 | 1704.3 | 1683.5 | 1676.9 |
| 70° | 1921.0 | 1866.9 | 1801.1 | 1744.1 | 1701.8 | 1671.4 | 1654.3 | 1643.3 |
| 72.5° | 1766.1 | 1718.6 | 1655.4 | 1599.1 | 1560.7 | 1525.3 | 1508.1 | 1503.7 |
| 75° | 1457.0 | 1406.6 | 1348.5 | 1321.4 | 1294.8 | 1272.5 | 1260.8 | 1259.7 |
| 77.5° | 1034.6 | 983.1 | 938.9 | 903.5 | 874.6 | 860.4 | 863.7 | 851.6 |
| 80° | 592.2 | 525.0 | 471.7 | 440.2 | 397.5 | 371.9 | 343.1 | 363.9 |
| 82.5° | 254.6 | 205.7 | 156.7 | 127.5 | 97.2 | 77.1 | 63.6 | 59.2 |
| 85° | 71.2 | 58.1 | 48.6 | 44.6 | 40.2 | 35.8 | 30.3 | 28.1 |
| 87.5° | 24.1 | 23.0 | 20.5 | 20.5 | 18.6 | 15.7 | 11.0 | 9.9 |
| 90° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |

(END OF REPORT)