

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: P190838

Luminaire Tested: **GAN-AF-10-LED-U-5NQ-600-ADJ**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P190838  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24141)  
Test Lab: INNOVATION CENTER P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: GAN-AF-10-LED-U-5NQ-600-ADJ  
Description: GALLEON AREA AND ROADWAY LUMINAIRE  
(10) 70 CRI, 4000K, 615mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE V  
NARROW OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 40961 lumens  
Efficiency: N/A  
Efficacy: 126.8 lumens/watt  
Luminous Opening: Rectangular (W 2.5' x L: 1' x H: 0')  
IES Classification: Type V - Short - Full Cutoff  
BUG Rating: B5 - U0 - G3

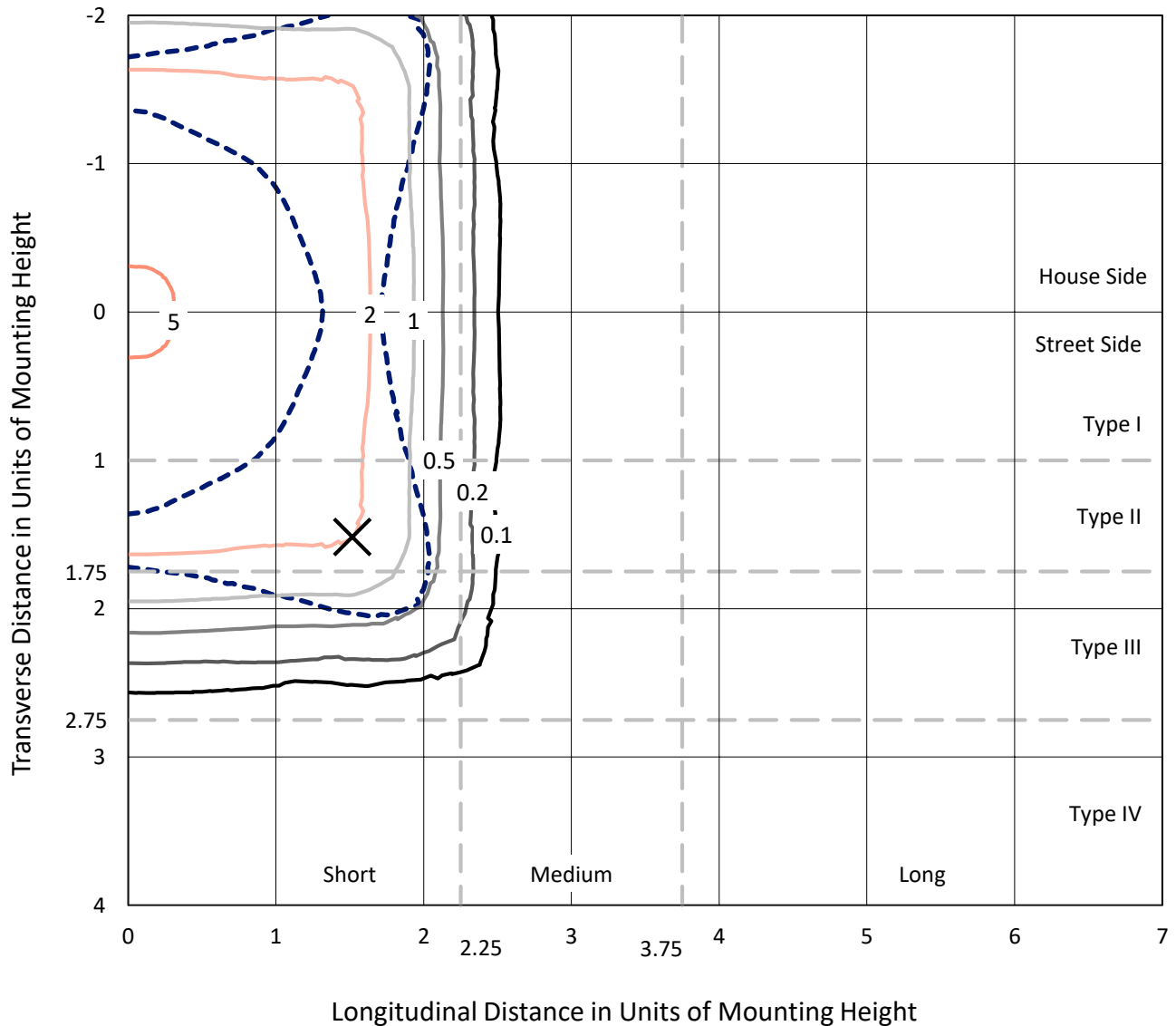
Input Watts (W): 323  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

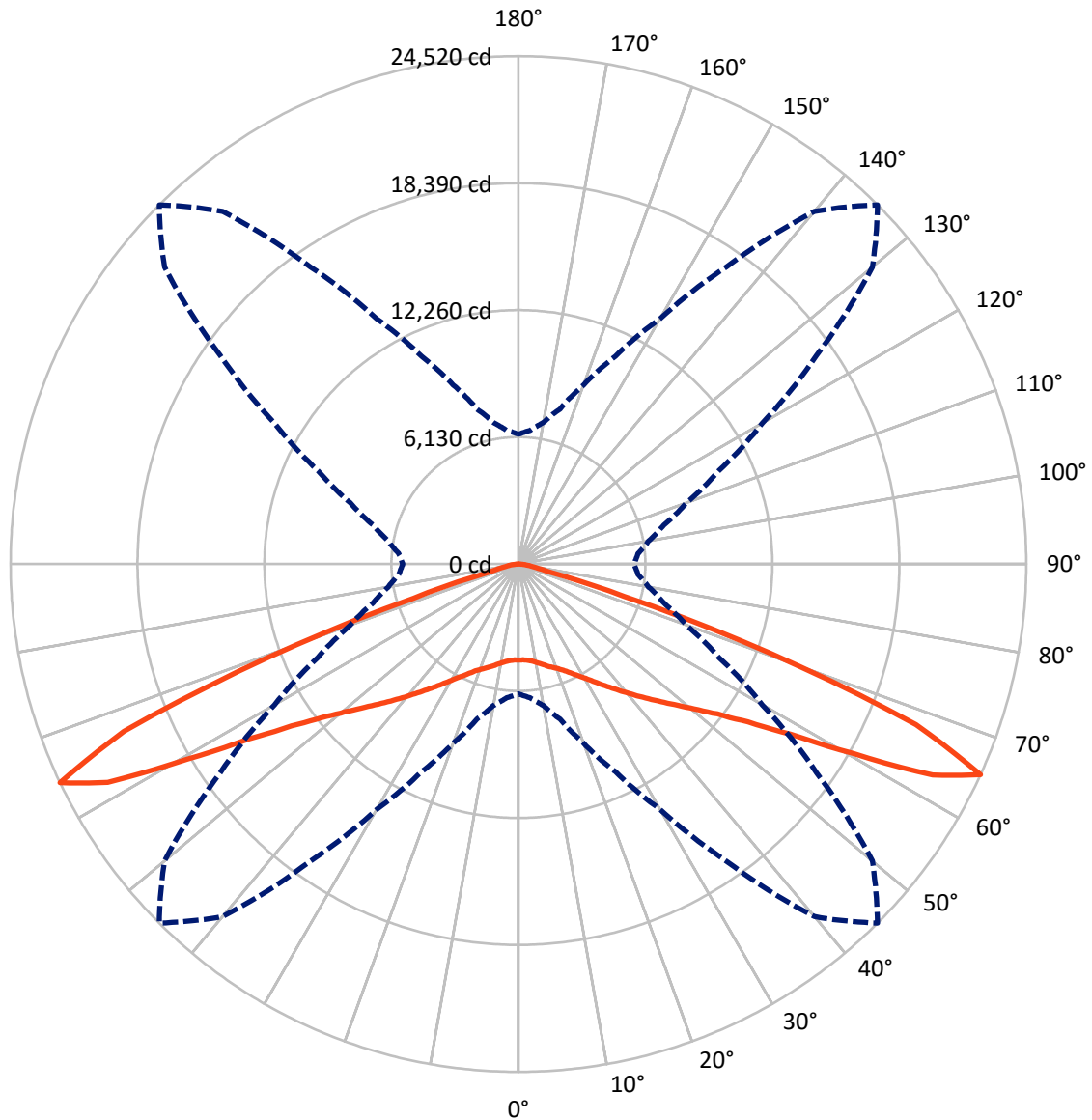
× Max cd  
 - - - 1/2 Max cd



Based on 30 foot mounting height. Maximum calculated value = 5.2 fc  
 Type V - Short - Full Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral      - - - Horizontal Cone Through 65-Deg Vertical

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**FLUX DISTRIBUTION:**

|                    |           | Downward | Upward | Total   |
|--------------------|-----------|----------|--------|---------|
| <b>House Side</b>  | Lumens    | 20480.5  | 0.0    | 20480.5 |
|                    | % Fixture | 50.0     | 0.0    | 50.0    |
| <b>Street Side</b> | Lumens    | 20480.5  | 0.0    | 20480.5 |
|                    | % Fixture | 50.0     | 0.0    | 50.0    |
| <b>Total</b>       | Lumens    | 40961.0  | 0.0    | 40961.0 |
|                    | % Fixture | 100.0    | 0.0    | 100.0   |

**Coefficient of Utilization**

**ZONAL LUMENS:**

| Zone      | Lumens  | % Fixture |
|-----------|---------|-----------|
| 0°-10°    | 451.7   | 1.1       |
| 10°-20°   | 1448.8  | 3.5       |
| 20°-30°   | 2709.0  | 6.6       |
| 30°-40°   | 4581.7  | 11.2      |
| 40°-50°   | 7491.5  | 18.3      |
| 50°-60°   | 11912.7 | 29.1      |
| 60°-70°   | 10768.3 | 26.3      |
| 70°-80°   | 1362.8  | 3.3       |
| 80°-90°   | 234.4   | 0.6       |
| 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°    | 40961.0 | 100.0     |
| 0°-180°   | 40961.0 | 100.0     |



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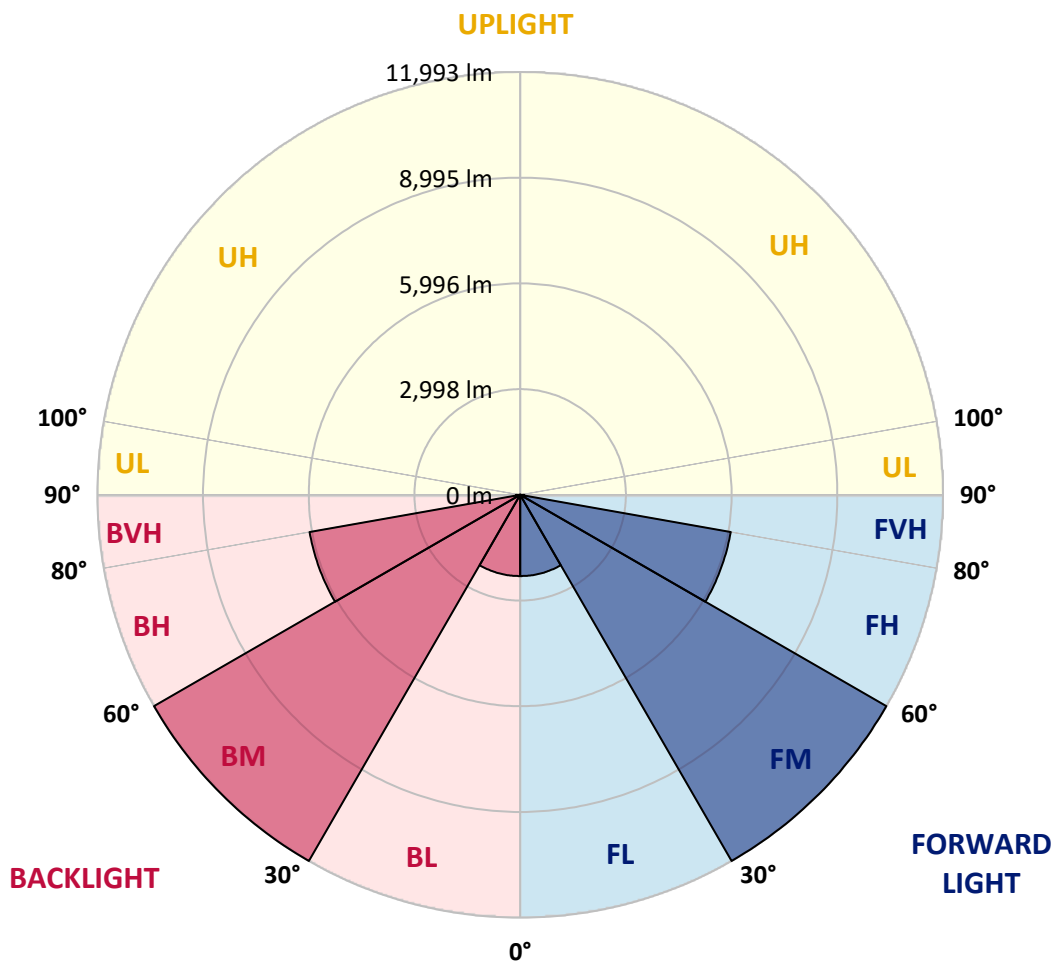
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

| Zone |             | Lumens  | % Fixture | Zone Rating/Lumen Limit |      |         |
|------|-------------|---------|-----------|-------------------------|------|---------|
|      |             |         |           | B                       | U    | G       |
| FL   | (0°-30°)    | 2304.8  | 5.6       |                         |      |         |
| FM   | (30°-60°)   | 11993.0 | 29.3      |                         |      |         |
| FH   | (60°-80°)   | 6065.6  | 14.8      |                         |      | G3/7500 |
| FVH  | (80°-90°)   | 117.2   | 0.3       |                         |      | G2/225  |
| BL   | (0°-30°)    | 2304.8  | 5.6       | B3/2500                 |      |         |
| BM   | (30°-60°)   | 11993.0 | 29.3      | B5                      |      |         |
| BH   | (60°-80°)   | 6065.6  | 14.8      | B5                      |      | G3/7500 |
| BVH  | (80°-90°)   | 117.2   | 0.3       |                         |      | G2/225  |
| UL   | (90°-100°)  | 0.0     | 0.0       |                         | U0/0 |         |
| UH   | (100°-180°) | 0.0     | 0.0       |                         | U0/0 |         |

**BUG Rating: B5-U0-G3**

Type V Short





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**CANDELA DISTRIBUTION (FULL):**

|       | 0°      | 5°      | 10°     | 15°     | 20°     | 25°     | 30°     | 35°     | 40°     | 45°     | 50°     |
|-------|---------|---------|---------|---------|---------|---------|---------|---------|---------|---------|---------|
| 0°    | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  |
| 2.5°  | 4638.6  | 4642.5  | 4646.2  | 4642.5  | 4646.2  | 4640.5  | 4636.6  | 4642.5  | 4636.6  | 4630.9  | 4634.8  |
| 5°    | 4678.9  | 4680.8  | 4680.8  | 4675.1  | 4680.8  | 4676.9  | 4671.2  | 4678.9  | 4673.1  | 4667.4  | 4671.2  |
| 7.5°  | 4746.0  | 4753.7  | 4747.9  | 4742.2  | 4746.0  | 4742.2  | 4738.3  | 4740.3  | 4738.3  | 4732.6  | 4734.5  |
| 10°   | 4836.2  | 4841.9  | 4838.1  | 4836.2  | 4840.0  | 4838.1  | 4834.3  | 4832.3  | 4834.3  | 4828.5  | 4828.5  |
| 12.5° | 4945.6  | 4943.6  | 4941.7  | 4943.6  | 4949.3  | 4949.3  | 4947.5  | 4949.3  | 4953.2  | 4955.2  | 4951.3  |
| 15°   | 5053.0  | 5056.8  | 5056.8  | 5056.8  | 5068.3  | 5077.9  | 5083.7  | 5087.4  | 5095.2  | 5097.1  | 5089.4  |
| 17.5° | 5187.3  | 5187.3  | 5185.3  | 5187.3  | 5198.7  | 5214.1  | 5219.8  | 5227.5  | 5235.2  | 5241.0  | 5231.4  |
| 20°   | 5336.8  | 5340.7  | 5340.7  | 5344.5  | 5359.9  | 5377.1  | 5377.1  | 5381.0  | 5377.1  | 5381.0  | 5375.2  |
| 22.5° | 5519.1  | 5530.6  | 5530.6  | 5532.5  | 5547.9  | 5569.0  | 5563.2  | 5569.0  | 5559.4  | 5567.1  | 5559.4  |
| 25°   | 5757.0  | 5774.3  | 5770.5  | 5770.5  | 5781.9  | 5795.3  | 5797.3  | 5808.8  | 5806.9  | 5816.5  | 5810.7  |
| 27.5° | 6025.6  | 6052.4  | 6060.1  | 6058.2  | 6065.9  | 6079.3  | 6083.1  | 6096.6  | 6088.9  | 6096.6  | 6092.7  |
| 30°   | 6347.8  | 6359.4  | 6374.7  | 6380.5  | 6390.1  | 6403.5  | 6403.5  | 6405.4  | 6395.8  | 6407.4  | 6413.1  |
| 32.5° | 6681.6  | 6702.8  | 6718.1  | 6752.6  | 6769.9  | 6779.5  | 6777.6  | 6781.4  | 6771.8  | 6787.2  | 6798.6  |
| 35°   | 7122.9  | 7138.3  | 7163.1  | 7190.0  | 7213.0  | 7211.1  | 7205.4  | 7207.3  | 7207.3  | 7220.7  | 7232.3  |
| 37.5° | 7654.2  | 7658.1  | 7690.7  | 7729.1  | 7740.6  | 7729.1  | 7694.5  | 7686.9  | 7669.6  | 7686.9  | 7706.1  |
| 40°   | 8216.3  | 8229.7  | 8295.0  | 8320.0  | 8325.7  | 8304.6  | 8254.7  | 8226.0  | 8187.6  | 8208.7  | 8235.5  |
| 42.5° | 8805.3  | 8832.2  | 8891.6  | 8935.7  | 8954.9  | 8941.5  | 8872.5  | 8828.3  | 8778.5  | 8789.9  | 8816.8  |
| 45°   | 9457.5  | 9490.1  | 9574.5  | 9616.8  | 9653.2  | 9632.1  | 9564.9  | 9497.8  | 9419.1  | 9424.9  | 9467.1  |
| 47.5° | 10186.5 | 10219.1 | 10328.4 | 10399.4 | 10418.7 | 10414.8 | 10340.0 | 10247.9 | 10140.4 | 10136.6 | 10173.0 |
| 50°   | 11003.7 | 11036.3 | 11172.6 | 11281.9 | 11337.5 | 11331.7 | 11243.6 | 11113.0 | 10982.6 | 10984.5 | 11030.6 |
| 52.5° | 11801.8 | 11842.1 | 11984.0 | 12172.0 | 12281.3 | 12360.0 | 12306.3 | 12183.5 | 12024.3 | 12028.2 | 12070.3 |
| 55°   | 12549.9 | 12617.1 | 12780.1 | 13035.3 | 13238.6 | 13459.2 | 13522.5 | 13518.7 | 13422.8 | 13449.7 | 13491.8 |
| 57.5° | 12912.5 | 13012.2 | 13263.6 | 13666.4 | 14080.8 | 14529.7 | 14909.5 | 15193.4 | 15314.3 | 15496.5 | 15454.3 |
| 60°   | 12225.7 | 12385.0 | 12755.2 | 13348.0 | 14167.1 | 15103.3 | 16106.6 | 17086.9 | 17923.2 | 18554.4 | 18191.9 |
| 62.5° | 10010.0 | 10217.2 | 10666.1 | 11425.7 | 12665.1 | 14163.3 | 16083.5 | 18400.9 | 20925.5 | 22448.7 | 21361.0 |
| 65°   | 6263.4  | 6478.3  | 6934.9  | 7748.2  | 9198.6  | 11061.3 | 13666.4 | 17507.0 | 22224.2 | 24520.4 | 22306.7 |
| 67.5° | 2442.1  | 2559.1  | 2806.6  | 3326.4  | 4416.1  | 6073.6  | 8688.2  | 13046.8 | 18688.7 | 20701.0 | 18341.4 |
| 70°   | 1224.0  | 1235.4  | 1281.5  | 1377.4  | 1611.5  | 2093.0  | 3184.4  | 6048.6  | 10717.9 | 12945.1 | 10332.3 |
| 72.5° | 884.3   | 886.3   | 909.3   | 951.5   | 1026.3  | 1133.7  | 1340.9  | 1851.2  | 3485.7  | 5327.3  | 3267.0  |
| 75°   | 677.2   | 684.9   | 698.3   | 721.3   | 761.6   | 815.3   | 890.1   | 1066.6  | 1321.8  | 1532.8  | 1289.1  |
| 77.5° | 521.8   | 537.2   | 546.8   | 567.8   | 592.8   | 629.2   | 650.3   | 717.5   | 834.5   | 878.6   | 865.2   |
| 80°   | 397.1   | 410.5   | 431.6   | 448.9   | 466.2   | 483.4   | 475.8   | 506.5   | 567.8   | 604.3   | 585.1   |
| 82.5° | 253.2   | 268.5   | 330.0   | 345.3   | 353.0   | 364.5   | 351.1   | 353.0   | 379.8   | 402.8   | 379.8   |
| 85°   | 163.1   | 172.7   | 209.1   | 228.3   | 230.2   | 237.8   | 232.1   | 218.7   | 218.7   | 199.5   | 224.4   |
| 87.5° | 74.8    | 76.7    | 94.0    | 111.3   | 115.1   | 103.6   | 101.7   | 97.8    | 78.7    | 74.8    | 80.6    |
| 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°    | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  | 4634.8  |
| 2.5°  | 4632.8  | 4636.6  | 4638.6  | 4644.4  | 4646.2  | 4646.2  | 4648.2  | 4652.1  |
| 5°    | 4669.3  | 4675.1  | 4676.9  | 4684.6  | 4686.5  | 4684.6  | 4688.5  | 4690.4  |
| 7.5°  | 4734.5  | 4744.1  | 4747.9  | 4755.6  | 4749.9  | 4757.5  | 4759.5  | 4759.5  |
| 10°   | 4830.5  | 4840.0  | 4841.9  | 4849.6  | 4845.8  | 4849.6  | 4849.6  | 4845.8  |
| 12.5° | 4957.0  | 4959.0  | 4953.2  | 4959.0  | 4951.3  | 4955.2  | 4949.3  | 4945.6  |
| 15°   | 5097.1  | 5091.3  | 5077.9  | 5077.9  | 5066.4  | 5068.3  | 5066.4  | 5064.4  |
| 17.5° | 5233.3  | 5221.8  | 5212.1  | 5208.4  | 5198.7  | 5196.8  | 5191.1  | 5191.1  |
| 20°   | 5382.9  | 5377.1  | 5371.4  | 5363.7  | 5354.1  | 5344.5  | 5342.7  | 5346.5  |
| 22.5° | 5563.2  | 5561.4  | 5561.4  | 5557.5  | 5544.1  | 5534.5  | 5528.7  | 5528.7  |
| 25°   | 5804.9  | 5787.7  | 5787.7  | 5785.8  | 5780.0  | 5774.3  | 5762.8  | 5768.5  |
| 27.5° | 6077.4  | 6067.7  | 6075.4  | 6073.6  | 6067.7  | 6067.7  | 6060.1  | 6060.1  |
| 30°   | 6413.1  | 6409.2  | 6420.8  | 6411.1  | 6392.0  | 6390.1  | 6382.4  | 6372.8  |
| 32.5° | 6800.6  | 6796.8  | 6814.0  | 6802.5  | 6771.8  | 6754.5  | 6739.2  | 6731.5  |
| 35°   | 7232.3  | 7234.1  | 7255.3  | 7247.6  | 7213.0  | 7201.6  | 7174.7  | 7170.8  |
| 37.5° | 7704.1  | 7734.8  | 7771.3  | 7778.9  | 7750.2  | 7742.5  | 7713.8  | 7698.4  |
| 40°   | 8258.6  | 8298.8  | 8354.4  | 8367.8  | 8337.2  | 8331.4  | 8291.1  | 8270.0  |
| 42.5° | 8849.4  | 8918.5  | 8987.5  | 8999.0  | 8968.3  | 8937.6  | 8899.3  | 8883.9  |
| 45°   | 9509.4  | 9591.8  | 9681.9  | 9704.9  | 9658.9  | 9622.5  | 9572.6  | 9572.6  |
| 47.5° | 10249.8 | 10353.4 | 10455.1 | 10518.4 | 10476.1 | 10437.8 | 10378.3 | 10340.0 |
| 50°   | 11124.6 | 11266.6 | 11398.9 | 11464.1 | 11397.0 | 11324.1 | 11220.4 | 11186.0 |
| 52.5° | 12221.9 | 12375.4 | 12490.4 | 12456.0 | 12352.3 | 12250.7 | 12137.5 | 12091.4 |
| 55°   | 13622.2 | 13674.1 | 13674.1 | 13543.7 | 13336.4 | 13165.7 | 12987.3 | 12927.8 |
| 57.5° | 15373.7 | 15174.2 | 14867.3 | 14477.8 | 13988.6 | 13562.8 | 13275.0 | 13138.9 |
| 60°   | 17432.1 | 16473.0 | 15389.1 | 14324.4 | 13449.7 | 12728.3 | 12300.6 | 12104.9 |
| 62.5° | 18803.8 | 16294.6 | 14123.0 | 12413.7 | 11155.3 | 10286.3 | 9695.4  | 9465.2  |
| 65°   | 17574.1 | 13589.7 | 10681.4 | 8636.5  | 7264.8  | 6380.5  | 5795.3  | 5580.5  |
| 67.5° | 12872.2 | 8515.6  | 5687.9  | 4076.6  | 2986.9  | 2382.6  | 2142.8  | 2043.0  |
| 70°   | 5778.1  | 2998.4  | 1837.8  | 1434.9  | 1237.4  | 1135.7  | 1091.6  | 1076.2  |
| 72.5° | 1741.9  | 1260.4  | 1062.7  | 959.2   | 880.6   | 830.6   | 794.2   | 790.3   |
| 75°   | 1051.3  | 874.7   | 776.9   | 715.6   | 665.6   | 625.4   | 606.2   | 600.5   |
| 77.5° | 734.7   | 642.6   | 596.6   | 552.5   | 514.1   | 483.4   | 466.2   | 452.8   |
| 80°   | 516.1   | 471.9   | 450.8   | 425.9   | 400.9   | 372.1   | 347.2   | 335.7   |
| 82.5° | 345.3   | 335.7   | 335.7   | 320.4   | 299.2   | 272.4   | 222.5   | 211.0   |
| 85°   | 222.5   | 220.7   | 224.4   | 218.7   | 203.4   | 174.6   | 143.8   | 136.2   |
| 87.5° | 103.6   | 105.5   | 117.0   | 115.1   | 111.3   | 92.1    | 72.9    | 69.0    |
| 90°   | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     | 0.0     |

(END OF REPORT)