

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: P321138

Luminaire Tested: **GAN-SA4D-830-U-AFL**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P321138
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1903-205-29)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: GAN-SA4D-830-U-AFL
Description: GALLEON AREA AND ROADWAY LUMINAIRE
(4) 80 CRI, 3000K, 1200mA LIGHTSQUARES WITH 16 LEDS EACH AND AUTOMOTIVE
FRONTLINE OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 25516 lumens
Efficiency: N/A
Efficacy: 98.9 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1' x H: 0')
IES Classification: Type II - Short
BUG Rating: B3 - U0 - G3

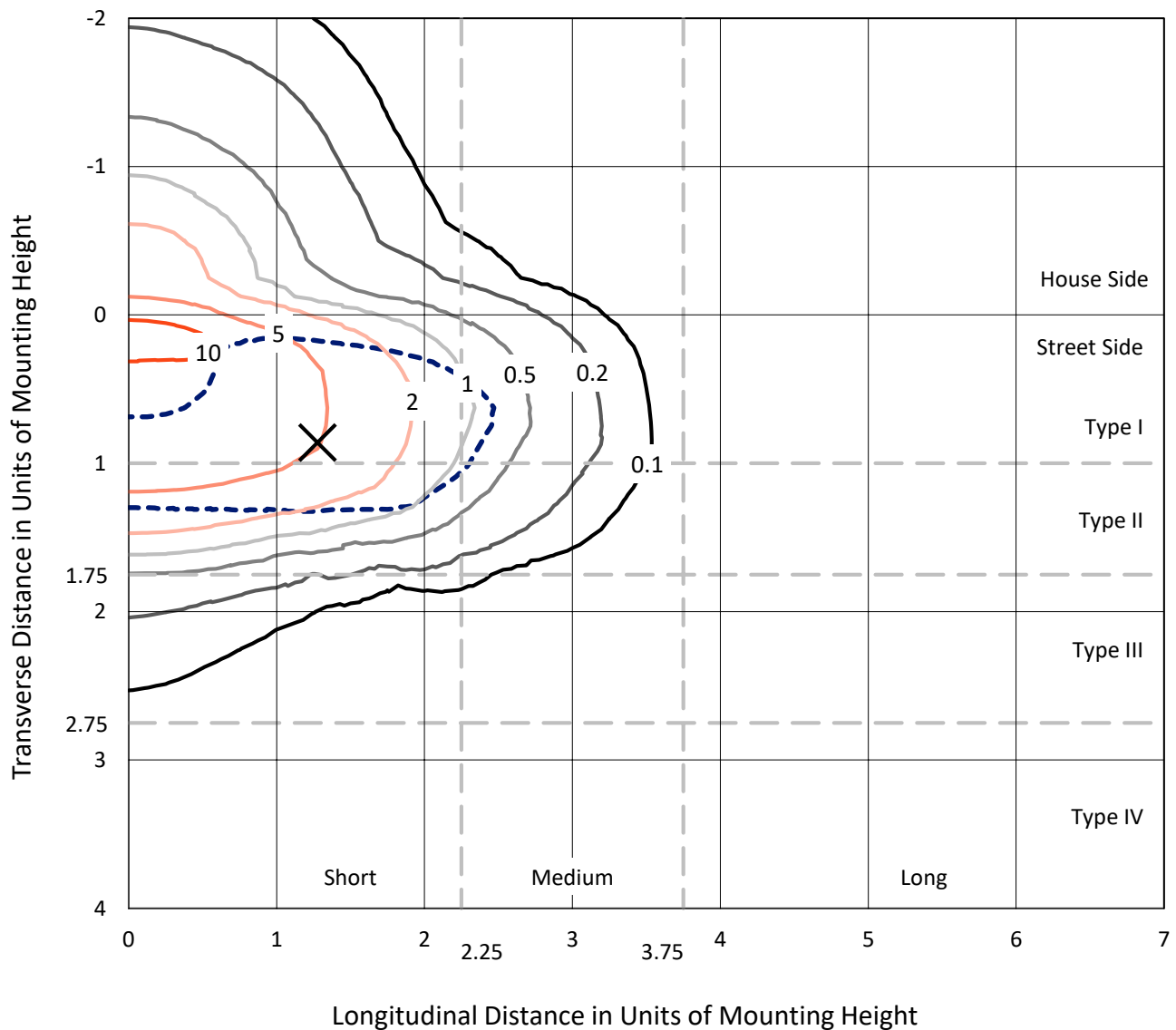
Input Watts (W): 258
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

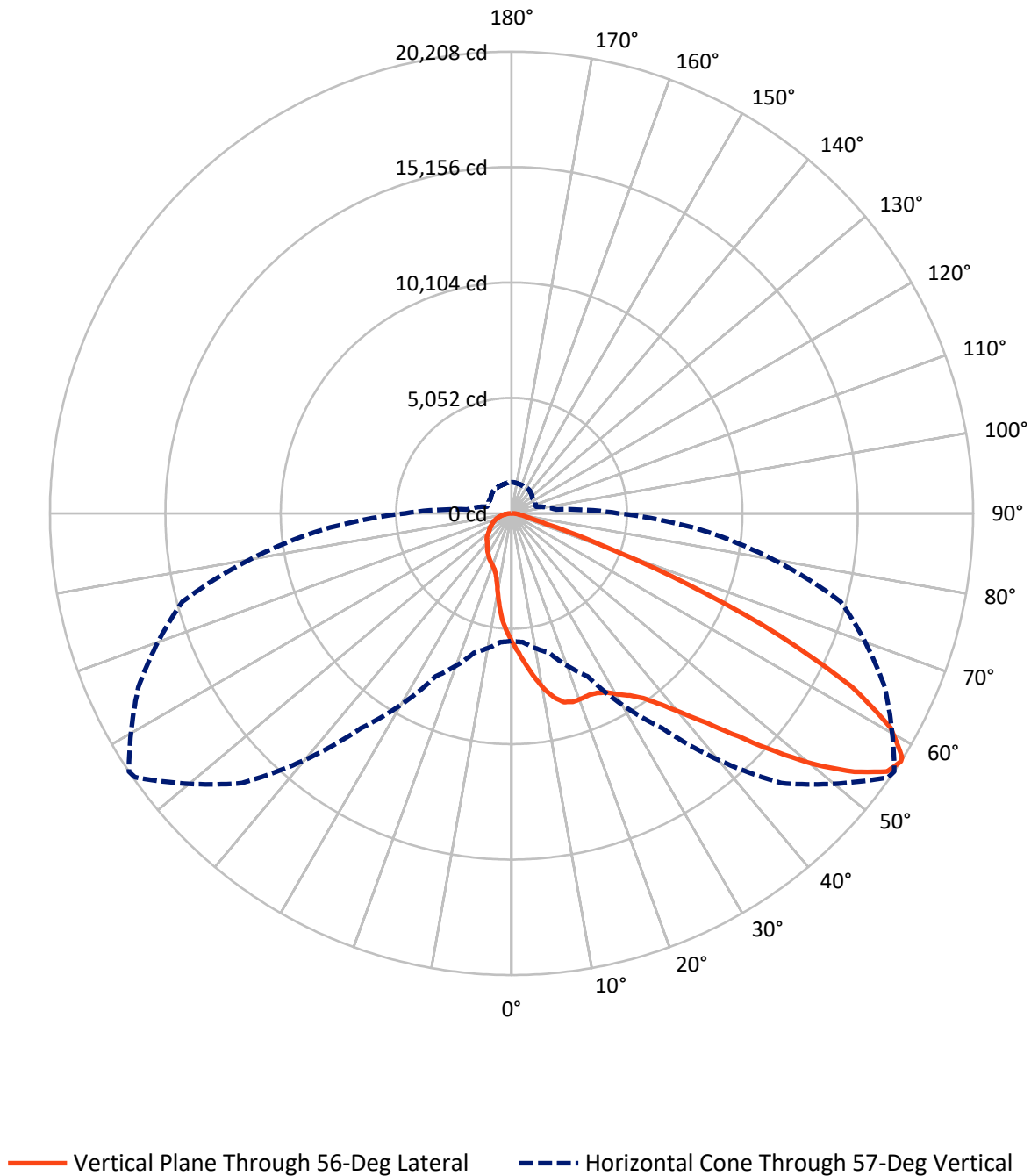
✕ Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 12.5 fc
 Type II - Short - N/A

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Luminous Intensity Polar Plot



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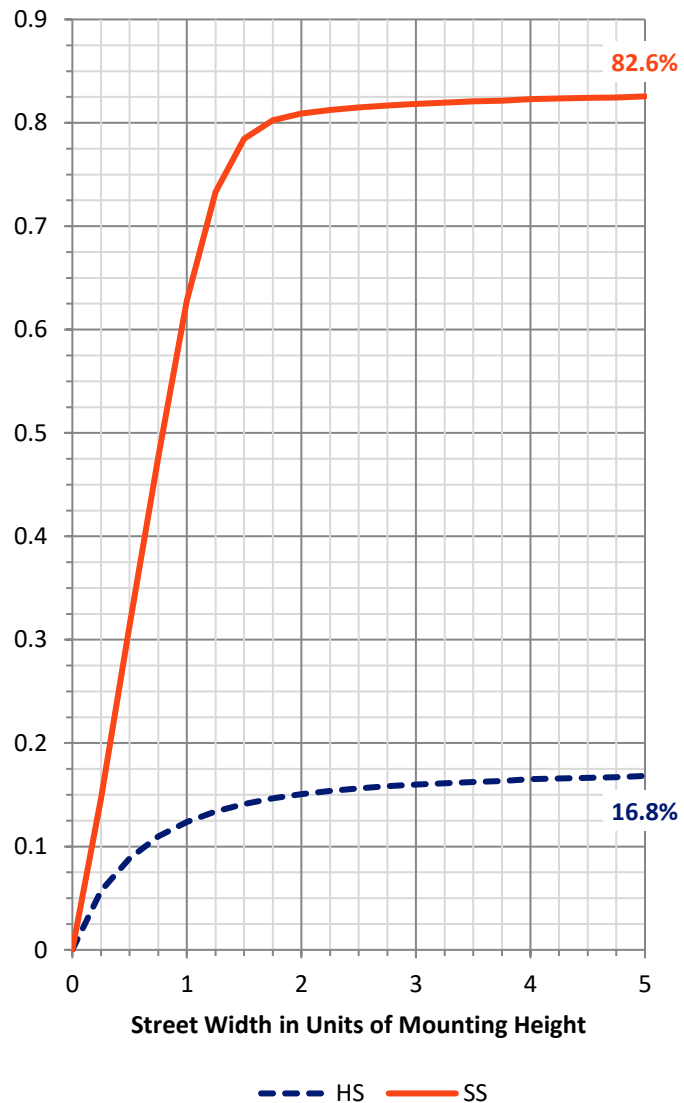
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	4398.4	0.0	4398.4
	% Fixture	17.2	0.0	17.2
Street Side	Lumens	21117.6	0.0	21117.6
	% Fixture	82.8	0.0	82.8
Total	Lumens	25516.0	0.0	25516.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	540.6	2.1
10°-20°	1528.5	6.0
20°-30°	2489.6	9.8
30°-40°	3721.6	14.6
40°-50°	5644.9	22.1
50°-60°	6327.0	24.8
60°-70°	3736.9	14.6
70°-80°	1224.4	4.8
80°-90°	302.5	1.2
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°	25516.0	100.0
0°-180°	25516.0	100.0

Coefficient of Utilization



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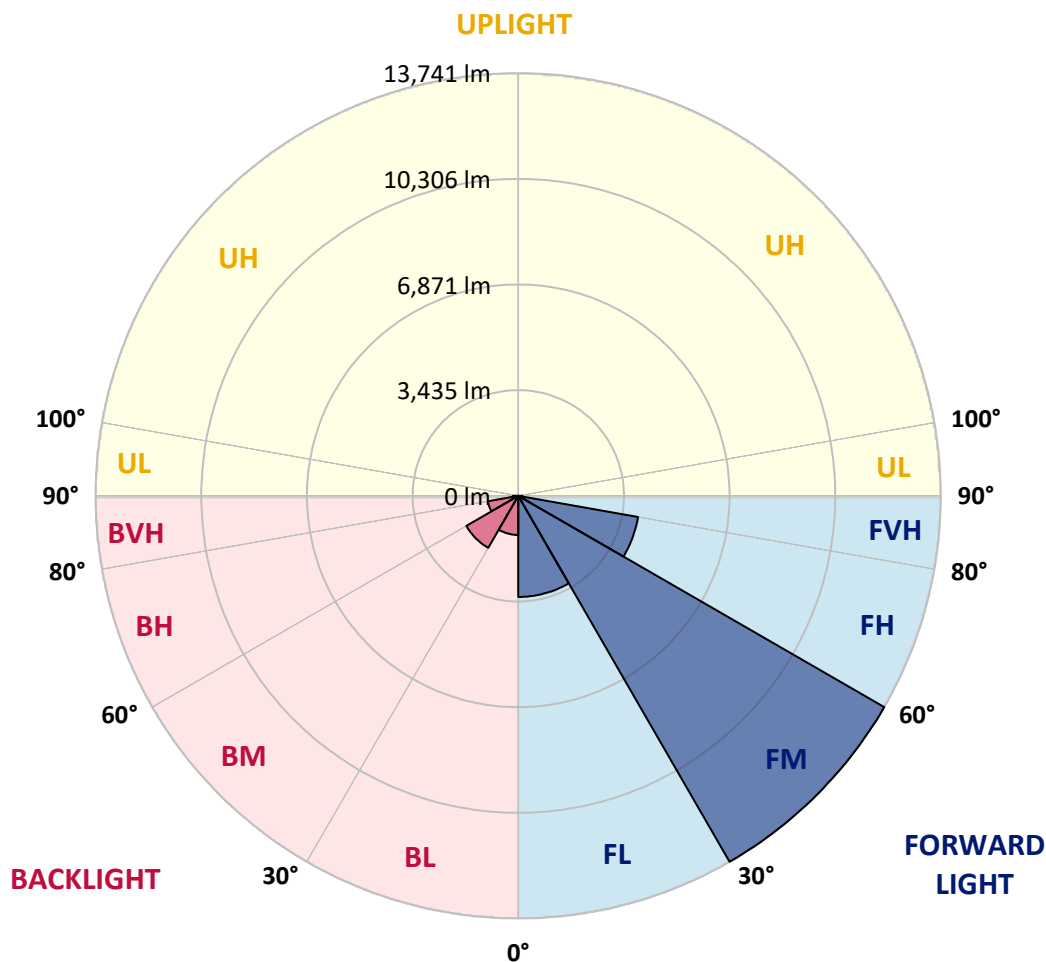
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	3286.8	12.9			
FM	(30°-60°)	13741.2	53.9			
FH	(60°-80°)	3956.3	15.5			G2/5000
FVH	(80°-90°)	133.2	0.5			G2/225
BL	(0°-30°)	1271.8	5.0	B3/2500		
BM	(30°-60°)	1952.3	7.7	B2/2500		
BH	(60°-80°)	1005.0	3.9	B3/2500		G3/2500
BVH	(80°-90°)	169.3	0.7			G2/225
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G3

Type II Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	56°	65°	75°	85°
0°	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5
2.5°	6498.7	6558.3	6532.0	6440.8	6370.6	6271.5	6161.1	6127.7	6011.1	5880.4	5723.5
5°	7527.3	7497.4	7454.5	7312.4	7162.5	6988.0	6710.9	6667.0	6407.5	6111.9	5799.8
7.5°	8113.0	8110.4	8085.0	8001.7	7864.9	7636.9	7302.8	7251.0	6859.1	6383.8	5899.7
10°	8028.0	8021.8	8063.9	8150.7	8191.9	8144.6	7863.1	7811.4	7330.0	6684.6	6015.5
12.5°	7544.8	7548.3	7615.8	7798.2	8046.4	8344.5	8298.9	8273.5	7818.4	7024.8	6155.8
15°	7168.6	7176.5	7230.0	7388.7	7681.6	8222.6	8563.7	8572.5	8291.0	7400.1	6319.8
17.5°	7003.8	7020.4	7045.0	7156.3	7424.7	7979.7	8626.9	8674.2	8704.9	7789.4	6477.6
20°	7056.4	7072.1	7079.2	7150.2	7370.3	7832.4	8583.0	8668.1	9022.4	8156.0	6635.5
22.5°	7292.2	7301.9	7306.3	7324.7	7495.7	7874.5	8554.1	8643.5	9252.1	8484.8	6754.7
25°	7683.3	7676.3	7648.3	7624.6	7739.5	8041.1	8620.7	8705.8	9438.9	8783.0	6832.8
27.5°	8151.6	8142.8	8088.5	8023.6	8089.3	8300.7	8812.8	8880.3	9606.4	9061.8	6872.2
30°	8713.7	8690.9	8588.3	8511.1	8536.6	8690.0	9129.3	9190.7	9865.1	9378.4	6910.8
32.5°	9363.5	9338.9	9190.7	9062.7	9062.7	9190.7	9455.5	9506.4	10084.3	9736.2	6973.1
35°	10177.2	10146.5	9953.6	9738.8	9678.3	9743.2	9900.1	9936.1	10478.9	10186.9	7086.2
37.5°	11136.6	11095.3	10845.4	10557.8	10425.4	10421.9	10535.0	10608.7	11109.4	10778.8	7278.2
40°	12098.5	12069.6	11851.2	11625.0	11365.4	11282.1	11456.6	11479.4	11933.6	11513.6	7523.7
42.5°	12842.1	12836.8	12796.5	12826.3	12560.6	12392.3	12529.1	12547.5	12940.3	12309.0	7785.1
45°	13235.0	13243.7	13439.3	13872.5	13970.7	13847.9	13915.4	13920.7	14090.8	13111.3	8024.5
47.5°	12920.2	12965.8	13460.3	14429.3	15233.4	15641.2	15528.9	15593.8	15206.2	13800.6	8212.1
50°	11693.4	11749.5	12591.3	14181.1	15822.7	17376.5	17317.8	17302.9	16105.9	14305.6	8313.8
52.5°	10173.7	10217.6	10912.1	12891.2	15390.4	18335.8	18875.1	18798.0	16905.6	14683.6	8333.1
55°	7859.6	7928.0	8593.6	10316.7	13641.8	17969.3	20020.4	19951.1	17634.3	14881.8	8310.3
57°	5587.6	5659.5	6320.6	7873.6	11475.9	16700.4	20134.4	20208.0	18028.1	14915.1	8335.8
57.5°	4986.0	5059.7	5714.7	7223.0	10800.7	16241.8	20036.1	20158.9	18099.1	14909.8	8349.8
60°	2510.5	2538.6	2956.0	4032.0	6827.5	13130.6	18755.0	19071.6	18163.1	14652.0	8410.3
62.5°	1560.9	1540.7	1527.5	1857.3	3321.7	8707.6	16111.2	16720.6	16938.1	14027.7	8263.8
65°	1372.3	1334.6	1189.9	1163.6	1467.0	4229.3	12132.7	12891.2	14320.6	13043.8	7914.8
67.5°	1289.0	1252.2	1089.1	990.9	991.8	1676.6	7532.5	8386.6	11155.8	11380.3	7091.4
70°	1203.1	1169.8	1017.2	901.4	844.4	928.6	3465.5	4113.5	7272.1	8945.2	5926.9
72.5°	1092.6	1069.8	925.1	805.9	745.4	695.4	1326.7	1567.0	4210.0	6007.6	4116.1
75°	976.9	955.8	832.2	718.2	644.5	547.2	747.1	805.0	2138.7	3073.5	2026.5
77.5°	849.7	837.4	740.1	634.9	576.1	453.4	528.8	556.8	917.2	1318.0	1016.3
80°	676.1	699.8	647.1	565.6	511.2	363.0	374.4	392.8	534.0	643.6	577.0
82.5°	440.2	481.4	506.8	459.5	420.9	285.9	269.2	277.1	348.1	392.8	250.8
85°	183.3	206.1	333.2	300.8	279.7	208.7	180.6	184.1	215.7	223.6	102.6
87.5°	81.6	86.8	146.4	137.7	118.4	71.9	77.2	84.2	114.9	108.7	39.5
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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5	5659.5
2.5°	5664.7	5591.1	5464.8	5325.4	5211.4	5120.2	5028.1	4965.0	4891.3	4851.9	4831.7
5°	5669.1	5524.4	5258.7	4986.0	4742.2	4519.5	4307.3	4144.2	3991.6	3909.2	3886.4
7.5°	5687.5	5470.1	5040.4	4591.4	4158.2	3762.8	3457.6	3266.4	3128.8	3067.4	3049.8
10°	5702.4	5406.0	4770.3	4105.6	3516.3	3115.6	2878.8	2771.9	2724.5	2716.6	2708.7
12.5°	5737.5	5340.3	4486.2	3598.8	3017.4	2740.3	2657.9	2650.8	2664.0	2683.3	2683.3
15°	5792.8	5275.4	4161.7	3163.8	2700.0	2602.6	2619.3	2657.9	2693.8	2723.6	2728.0
17.5°	5833.1	5195.6	3812.7	2815.7	2530.7	2557.0	2616.7	2671.0	2707.8	2736.8	2739.4
20°	5862.0	5072.0	3440.1	2550.0	2433.4	2514.9	2589.5	2637.7	2663.1	2692.1	2696.4
22.5°	5847.1	4906.2	3109.5	2359.7	2354.5	2453.5	2524.6	2582.5	2563.2	2535.1	2553.5
25°	5775.2	4678.2	2769.2	2217.7	2271.2	2371.1	2458.8	2420.2	2355.3	2343.1	2350.1
27.5°	5647.2	4387.1	2454.4	2086.1	2174.7	2294.8	2289.6	2251.0	2228.2	2212.4	2222.0
30°	5509.5	4071.4	2179.1	1971.3	2067.7	2166.8	2146.6	2145.8	2123.0	2097.5	2109.8
32.5°	5373.6	3754.0	1960.7	1876.6	1987.0	2000.2	2044.0	2057.2	2012.5	1959.0	1955.5
35°	5255.2	3454.1	1795.0	1790.6	1889.7	1891.5	1955.5	1937.1	1825.7	1770.4	1770.4
37.5°	5166.7	3155.1	1668.7	1713.5	1761.7	1807.3	1839.7	1763.4	1745.0	1714.3	1713.5
40°	5128.1	2892.0	1589.8	1654.7	1671.4	1729.2	1645.9	1675.7	1684.5	1668.7	1668.7
42.5°	5087.7	2663.1	1521.4	1610.0	1607.3	1599.5	1557.4	1595.9	1631.0	1631.9	1629.3
45°	5047.4	2465.8	1460.9	1514.4	1551.2	1466.2	1474.1	1515.3	1564.4	1581.9	1581.9
47.5°	5002.7	2309.7	1405.7	1413.6	1470.6	1413.6	1407.4	1439.0	1496.9	1524.9	1531.1
50°	4904.5	2169.4	1342.5	1325.0	1340.8	1360.1	1365.3	1380.2	1444.2	1489.0	1499.5
52.5°	4768.5	2044.0	1261.9	1243.4	1243.4	1316.2	1340.8	1345.2	1399.5	1453.0	1463.5
55°	4655.4	1964.2	1178.5	1175.0	1171.5	1269.7	1311.8	1318.8	1356.6	1398.6	1403.9
57°	4663.3	1958.1	1114.5	1118.0	1117.2	1222.4	1284.6	1299.6	1318.8	1354.8	1360.9
57.5°	4667.7	1962.5	1100.5	1102.3	1101.4	1209.2	1276.8	1293.4	1308.3	1346.0	1352.2
60°	4733.5	1973.9	1043.5	1024.2	1028.6	1139.1	1232.0	1253.1	1262.7	1312.7	1320.6
62.5°	4636.1	1923.0	997.9	951.4	951.4	1065.4	1169.8	1203.1	1218.0	1285.5	1298.7
65°	4353.8	1780.1	944.4	869.0	877.8	991.8	1095.2	1149.6	1172.4	1256.6	1270.6
67.5°	3918.0	1614.4	887.4	795.3	804.1	914.6	1018.1	1076.8	1112.8	1225.0	1236.4
70°	3350.6	1411.8	810.2	717.3	727.8	830.4	926.9	993.5	1047.0	1195.2	1198.7
72.5°	2470.2	1157.5	702.4	631.4	642.8	732.2	834.8	912.0	983.9	1120.7	1118.9
75°	1468.8	905.0	583.1	544.6	552.4	635.7	751.5	845.3	953.2	1091.7	1108.4
77.5°	890.9	681.3	475.3	456.0	465.6	550.7	691.9	791.8	940.0	1029.5	1024.2
80°	538.4	486.7	379.7	367.4	377.1	470.9	640.1	751.5	821.6	879.5	879.5
82.5°	281.5	297.3	278.9	269.2	282.4	382.3	582.3	655.9	726.1	623.5	582.3
85°	114.9	155.2	169.2	168.4	176.3	264.8	502.5	561.2	468.3	444.6	455.1
87.5°	38.6	65.8	82.4	71.0	74.5	166.6	348.1	271.0	321.8	224.5	213.1
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)