

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: P842623

Luminaire Tested: **ARCH4-70-740-U-T2U-HSS**

Issue Date: 5/27/2024

Test Information

Test Method: LM-79-08
Report Number: P842623
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2401-285-25)
Test Lab: INNOVATION CENTER
Issue Date: 5/27/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH4-70-740-U-T2U-HSS
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(2) 70 CRI, 4000K, 605mA LIGHTSQUARES WITH 40 LEDS EACH AND TYPE II U
OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9428 lumens
Efficiency: N/A
Efficacy: 127.8 lumens/watt
Luminous Opening: Rectangular (W 1.17' x L: 0.58' x H: 0')
IES Classification: Type II - Short
BUG Rating: B1 - U0 - G2

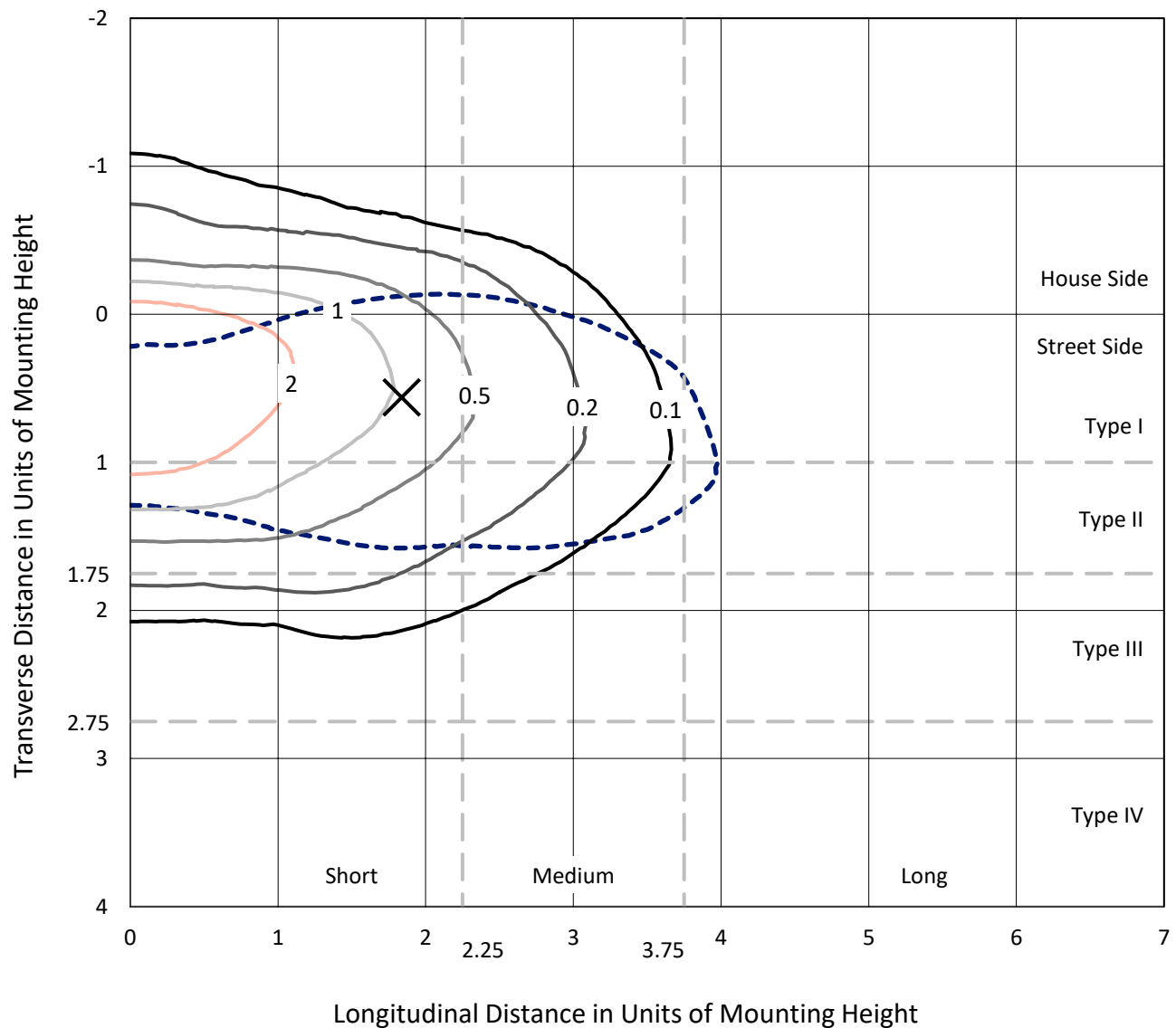
Input Watts (W): 73.8
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

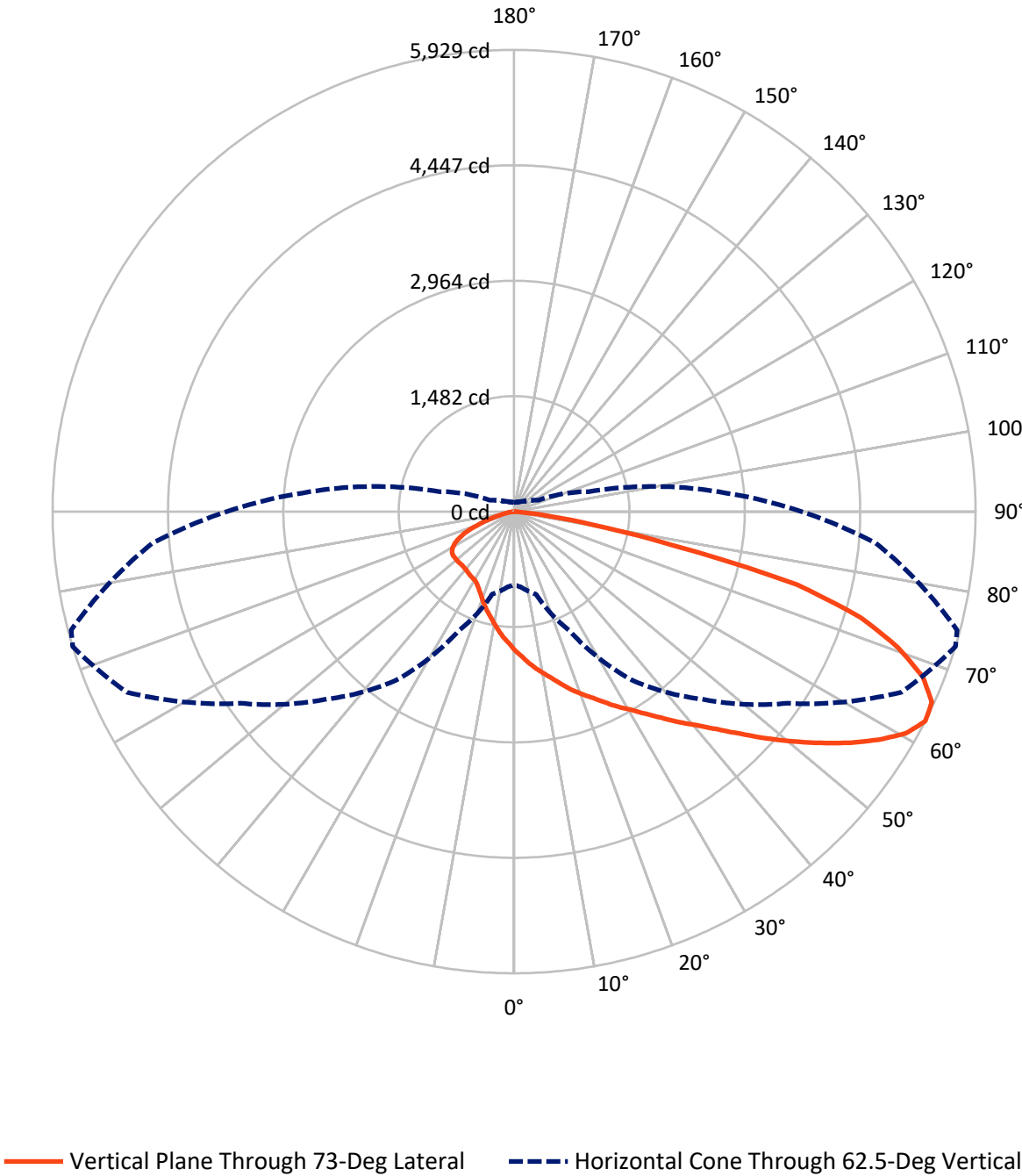
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 4.5 fc
 Type II - Short - N/A

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Luminous Intensity Polar Plot



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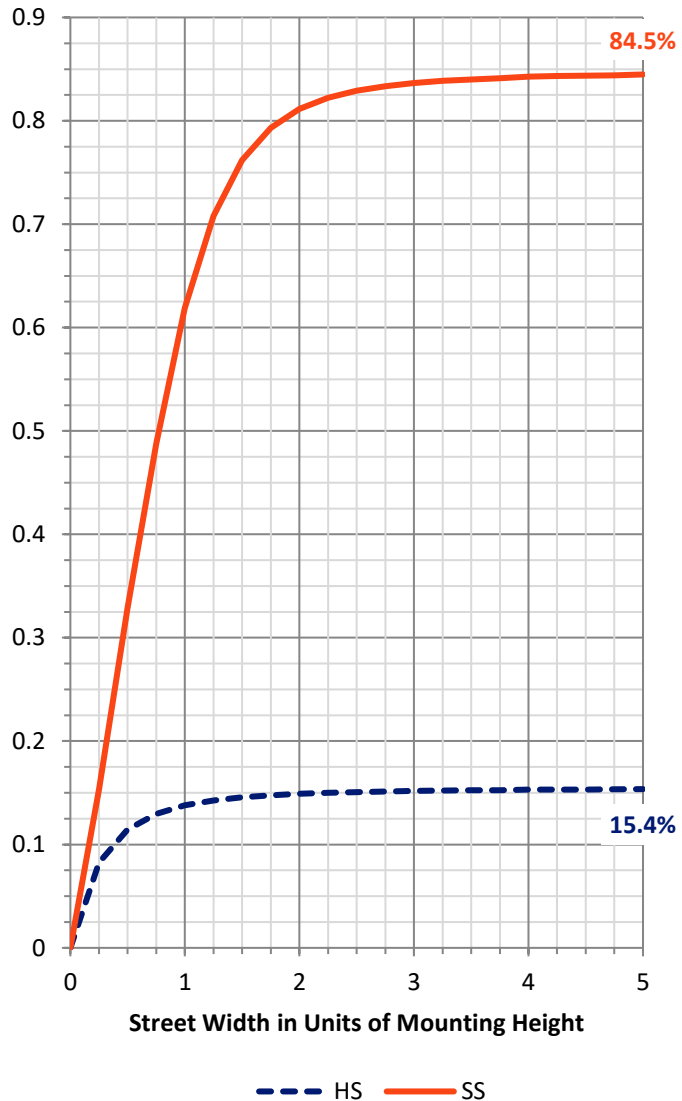
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1461.5	0.0	1461.5
	% Fixture	15.5	0.0	15.5
Street Side	Lumens	7966.5	0.0	7966.5
	% Fixture	84.5	0.0	84.5
Total	Lumens	9428.0	0.0	9428.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	172.5	1.8
10°-20°	520.4	5.5
20°-30°	866.2	9.2
30°-40°	1307.0	13.9
40°-50°	1826.9	19.4
50°-60°	2017.9	21.4
60°-70°	1757.9	18.6
70°-80°	888.0	9.4
80°-90°	71.3	0.8
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°	9428.0	100.0
0°-180°	9428.0	100.0

Coefficient of Utilization



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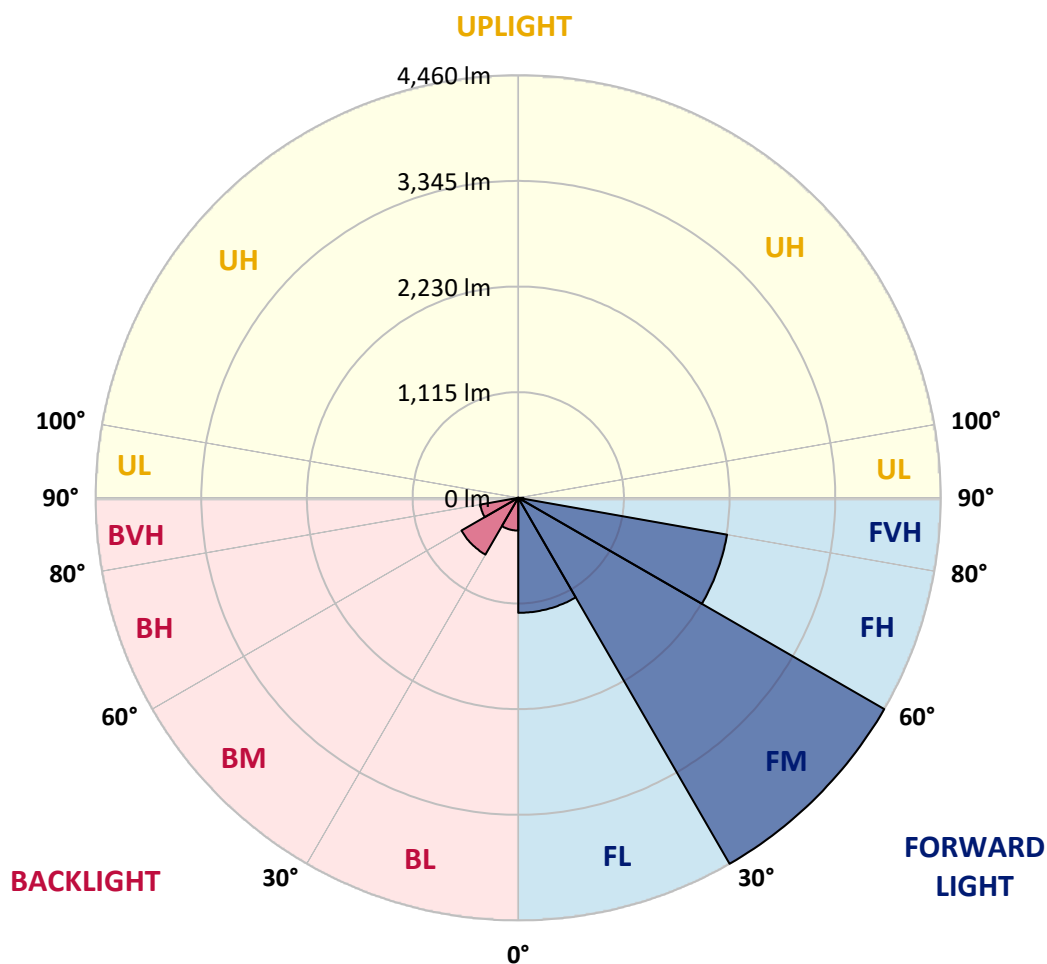
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1213.7	12.9			
FM	(30°-60°)	4459.8	47.3			
FH	(60°-80°)	2237.9	23.7			G2/5000
FVH	(80°-90°)	55.2	0.6			G1/100
BL	(0°-30°)	345.4	3.7	B1/500		
BM	(30°-60°)	692.0	7.3	B1/1000		
BH	(60°-80°)	407.9	4.3	B1/500		G1/500
BVH	(80°-90°)	16.1	0.2			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G2

Type II Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	73°	75°	85°
0°	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2
2.5°	2031.7	2054.3	2042.0	2050.2	2009.1	1982.4	1951.6	1892.0	1859.2	1855.1	1816.0
5°	2329.6	2354.3	2333.7	2327.6	2255.7	2194.0	2124.2	2019.4	1949.6	1937.2	1851.0
7.5°	2627.5	2650.1	2625.4	2606.9	2510.4	2401.5	2298.8	2144.7	2035.8	2015.3	1879.7
10°	2837.0	2857.6	2839.1	2820.6	2719.9	2609.0	2463.1	2261.8	2113.9	2081.0	1898.2
12.5°	2995.2	3007.5	2999.3	2982.9	2888.4	2769.2	2629.5	2393.3	2202.2	2161.2	1927.0
15°	3124.6	3145.2	3134.9	3122.6	3032.2	2913.0	2779.5	2530.9	2305.0	2253.6	1970.1
17.5°	3210.9	3225.3	3227.4	3227.4	3147.2	3030.1	2900.7	2656.2	2407.7	2341.9	2011.2
20°	3249.9	3266.4	3276.7	3293.1	3227.4	3126.7	2995.2	2763.1	2504.2	2430.3	2050.2
22.5°	3268.4	3282.8	3309.5	3346.5	3293.1	3208.9	3087.7	2861.7	2600.8	2522.7	2095.4
25°	3282.8	3301.3	3340.3	3410.2	3373.2	3301.3	3196.5	2974.7	2715.8	2635.7	2161.2
27.5°	3321.8	3344.4	3381.4	3465.7	3420.5	3385.5	3311.6	3095.9	2837.0	2754.9	2241.3
30°	3457.4	3475.9	3473.9	3527.3	3471.8	3461.5	3410.2	3213.0	2954.1	2872.0	2335.8
32.5°	3704.0	3722.4	3677.2	3656.7	3535.5	3537.6	3517.0	3338.3	3093.8	3009.6	2444.7
35°	3969.0	3989.5	3929.9	3895.0	3691.6	3632.1	3642.3	3494.4	3249.9	3165.7	2580.2
37.5°	4205.2	4229.9	4178.5	4127.1	3921.7	3784.1	3782.0	3669.0	3428.7	3342.4	2730.2
40°	4334.6	4363.4	4394.2	4365.4	4149.7	3997.7	3932.0	3847.8	3605.3	3517.0	2892.5
42.5°	4396.3	4476.4	4531.8	4513.4	4336.7	4182.6	4104.5	4034.7	3821.1	3734.8	3085.6
45°	4223.7	4225.8	4342.9	4443.5	4410.6	4307.9	4293.5	4244.2	4067.6	3985.4	3303.4
47.5°	4008.0	3991.6	4073.7	4252.5	4344.9	4371.6	4455.8	4476.4	4349.0	4266.8	3525.2
50°	3490.3	3500.6	3767.6	4024.4	4205.2	4377.8	4570.9	4714.7	4638.7	4560.6	3759.4
52.5°	2839.1	2863.7	3169.8	3734.8	4020.3	4316.1	4638.7	4953.0	4934.5	4860.5	3993.6
55°	2276.2	2315.2	2639.8	3252.0	3784.1	4178.5	4667.4	5170.7	5240.6	5172.8	4223.7
57.5°	1740.0	1781.1	2054.3	2683.0	3482.1	3954.6	4646.9	5361.8	5526.1	5483.0	4435.3
60°	1310.7	1351.7	1526.4	2175.5	3104.1	3704.0	4544.2	5487.1	5782.9	5737.7	4589.4
62.5°	938.8	971.7	1101.1	1692.8	2643.9	3406.1	4291.5	5489.2	5928.8	5891.8	4663.3
65°	675.9	675.9	780.6	1207.9	2212.5	3048.6	3909.4	5236.5	5898.0	5887.7	4612.0
67.5°	486.9	491.0	575.2	844.3	1764.7	2615.2	3414.3	4786.6	5659.7	5711.0	4427.1
70°	345.1	355.4	394.4	589.6	1333.3	2064.6	2884.3	4197.0	5230.3	5320.7	4069.6
72.5°	267.1	273.2	299.9	410.9	973.8	1534.6	2298.8	3539.6	4657.2	4759.9	3582.7
75°	205.4	211.6	232.1	302.0	698.5	1076.5	1633.2	2746.6	3755.3	3938.1	2878.1
77.5°	150.0	158.2	172.6	219.8	406.8	684.1	990.2	1544.9	2072.8	2159.1	1507.9
80°	69.8	80.1	100.7	141.7	219.8	322.5	351.3	595.8	996.3	1041.5	817.6
82.5°	39.0	49.3	57.5	86.3	110.9	115.0	119.2	150.0	375.9	415.0	343.1
85°	18.5	24.7	26.7	37.0	37.0	32.9	39.0	28.8	61.6	74.0	71.9
87.5°	0.0	2.1	4.1	10.3	8.2	6.2	6.2	6.2	6.2	8.2	6.2
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°	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2	1785.2
2.5°	1797.5	1770.8	1709.2	1655.8	1620.9	1590.1	1549.0	1530.5	1497.6	1503.8	1485.3
5°	1807.8	1758.5	1649.6	1549.0	1475.0	1409.3	1337.4	1296.3	1251.1	1247.0	1232.6
7.5°	1814.0	1738.0	1581.8	1440.1	1327.1	1226.4	1129.9	1076.5	1021.0	1008.7	996.3
10°	1807.8	1707.1	1512.0	1327.1	1177.1	1051.8	942.9	875.1	817.6	803.2	790.9
12.5°	1814.0	1690.7	1446.2	1222.3	1043.6	901.9	778.6	708.7	655.3	641.0	632.7
15°	1828.4	1680.4	1390.8	1127.8	924.4	766.3	645.1	585.5	542.3	528.0	523.9
17.5°	1840.7	1670.2	1331.2	1035.4	805.3	647.1	542.3	493.0	456.1	441.7	437.6
20°	1857.1	1655.8	1271.6	947.0	700.5	552.6	460.2	417.0	388.3	378.0	375.9
22.5°	1871.5	1645.5	1216.2	858.7	604.0	476.6	398.5	363.6	343.1	332.8	332.8
25°	1908.5	1649.6	1168.9	776.5	532.1	417.0	351.3	324.6	308.1	302.0	302.0
27.5°	1951.6	1666.1	1131.9	706.7	470.4	371.8	318.4	295.8	287.6	279.4	281.4
30°	2013.2	1698.9	1107.3	649.2	425.2	336.9	291.7	275.3	267.1	265.0	265.0
32.5°	2091.3	1752.3	1105.2	612.2	392.4	310.2	273.2	258.8	254.7	252.7	252.7
35°	2183.8	1799.6	1092.9	595.8	371.8	291.7	258.8	248.6	246.5	246.5	246.5
37.5°	2294.7	1877.7	1084.7	573.2	361.6	281.4	248.6	240.4	240.4	240.4	240.4
40°	2409.7	1941.3	1072.4	552.6	357.5	275.3	242.4	232.1	232.1	232.1	232.1
42.5°	2547.4	2033.8	1068.3	542.3	351.3	271.2	234.2	221.9	223.9	223.9	226.0
45°	2713.8	2138.6	1066.2	532.1	349.2	267.1	226.0	211.6	213.7	211.6	211.6
47.5°	2882.2	2259.8	1072.4	525.9	347.2	263.0	219.8	201.3	201.3	199.3	199.3
50°	3058.9	2370.7	1076.5	519.7	343.1	254.7	209.5	193.1	189.0	184.9	186.9
52.5°	3225.3	2473.4	1078.5	509.5	330.7	242.4	201.3	182.8	176.7	170.5	172.6
55°	3391.7	2572.0	1082.6	497.1	314.3	230.1	191.1	172.6	164.3	156.1	156.1
57.5°	3541.7	2658.3	1072.4	466.3	295.8	217.8	180.8	160.2	147.9	139.7	139.7
60°	3644.4	2719.9	1041.5	421.1	271.2	203.4	170.5	147.9	133.5	127.4	127.4
62.5°	3693.7	2730.2	986.1	347.2	240.4	189.0	158.2	135.6	123.3	119.2	119.2
65°	3646.4	2685.0	899.8	260.9	207.5	172.6	145.9	125.3	113.0	102.7	102.7
67.5°	3482.1	2557.6	780.6	197.2	176.7	156.1	133.5	115.0	100.7	92.4	92.4
70°	3151.3	2292.6	604.0	158.2	150.0	135.6	121.2	102.7	90.4	80.1	80.1
72.5°	2717.9	1943.4	425.2	127.4	127.4	115.0	102.7	90.4	78.1	69.8	69.8
75°	2085.1	1438.0	285.6	102.7	104.8	96.6	84.2	74.0	65.7	59.6	59.6
77.5°	1138.1	710.8	174.6	76.0	78.1	74.0	65.7	59.6	55.5	49.3	49.3
80°	552.6	312.3	100.7	53.4	55.5	53.4	49.3	43.1	43.1	39.0	39.0
82.5°	232.1	117.1	53.4	37.0	37.0	32.9	30.8	30.8	30.8	28.8	28.8
85°	57.5	22.6	22.6	20.5	20.5	20.5	18.5	18.5	18.5	14.4	16.4
87.5°	8.2	8.2	8.2	8.2	8.2	8.2	6.2	2.1	0.0	0.0	0.0
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)