

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: P841329

Luminaire Tested: **ARCH4-160-740-U-T3-HSS**

Issue Date: 5/27/2024

Test Information

Test Method: LM-79-08
Report Number: P841329
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2401-285-26)
Test Lab: INNOVATION CENTER
Issue Date: 5/27/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH4-160-740-U-T3-HSS
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(2) 70 CRI, 4000K, 1305mA LIGHTSQUARES WITH 40 LEDS EACH AND TYPE III
OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 18512 lumens
Efficiency: N/A
Efficacy: 115.2 lumens/watt
Luminous Opening: Rectangular (W 1.17' x L: 0.58' x H: 0')
IES Classification: Type III - Short
BUG Rating: B1 - U0 - G3

Input Watts (W): 160.7
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



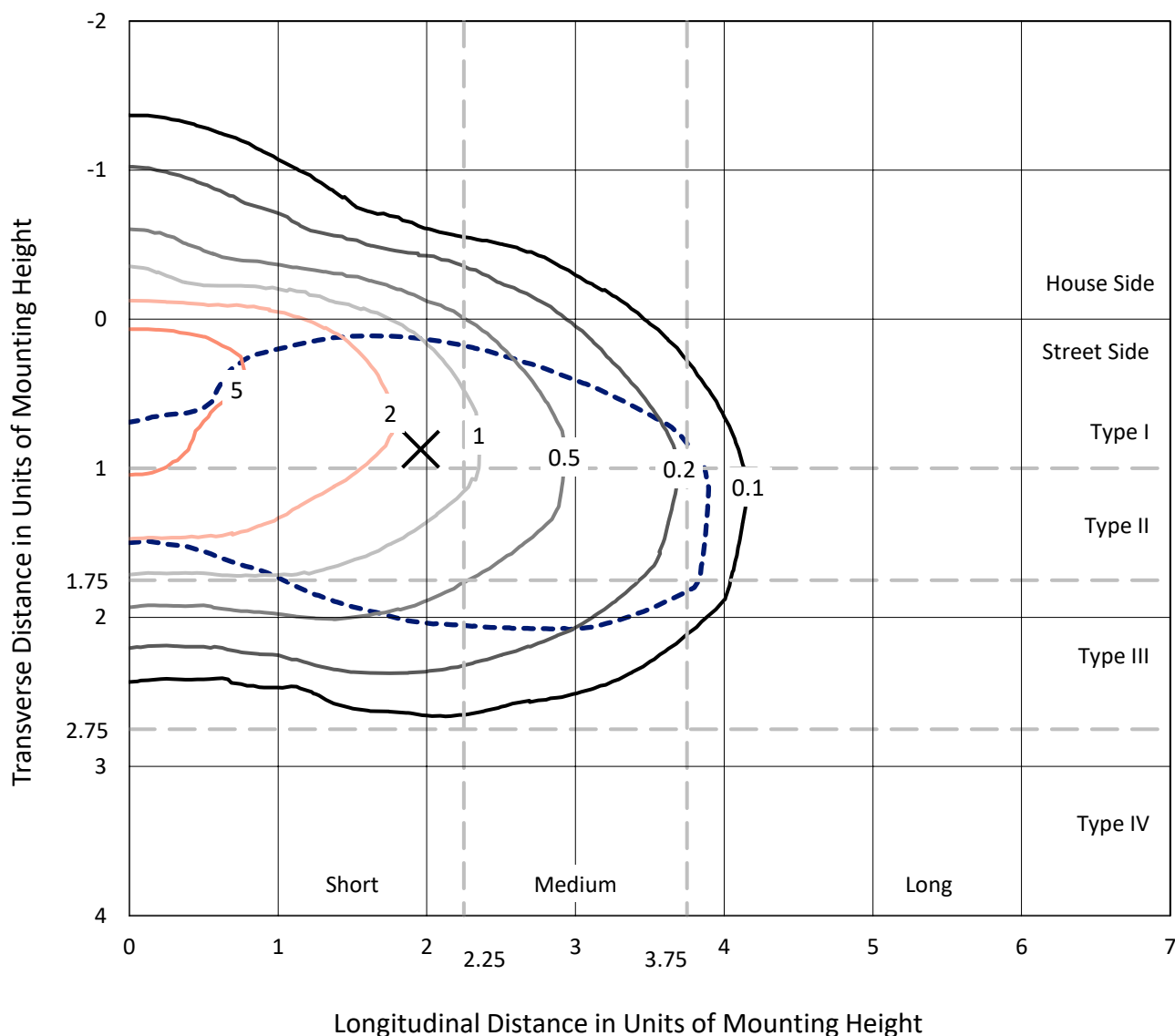
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Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

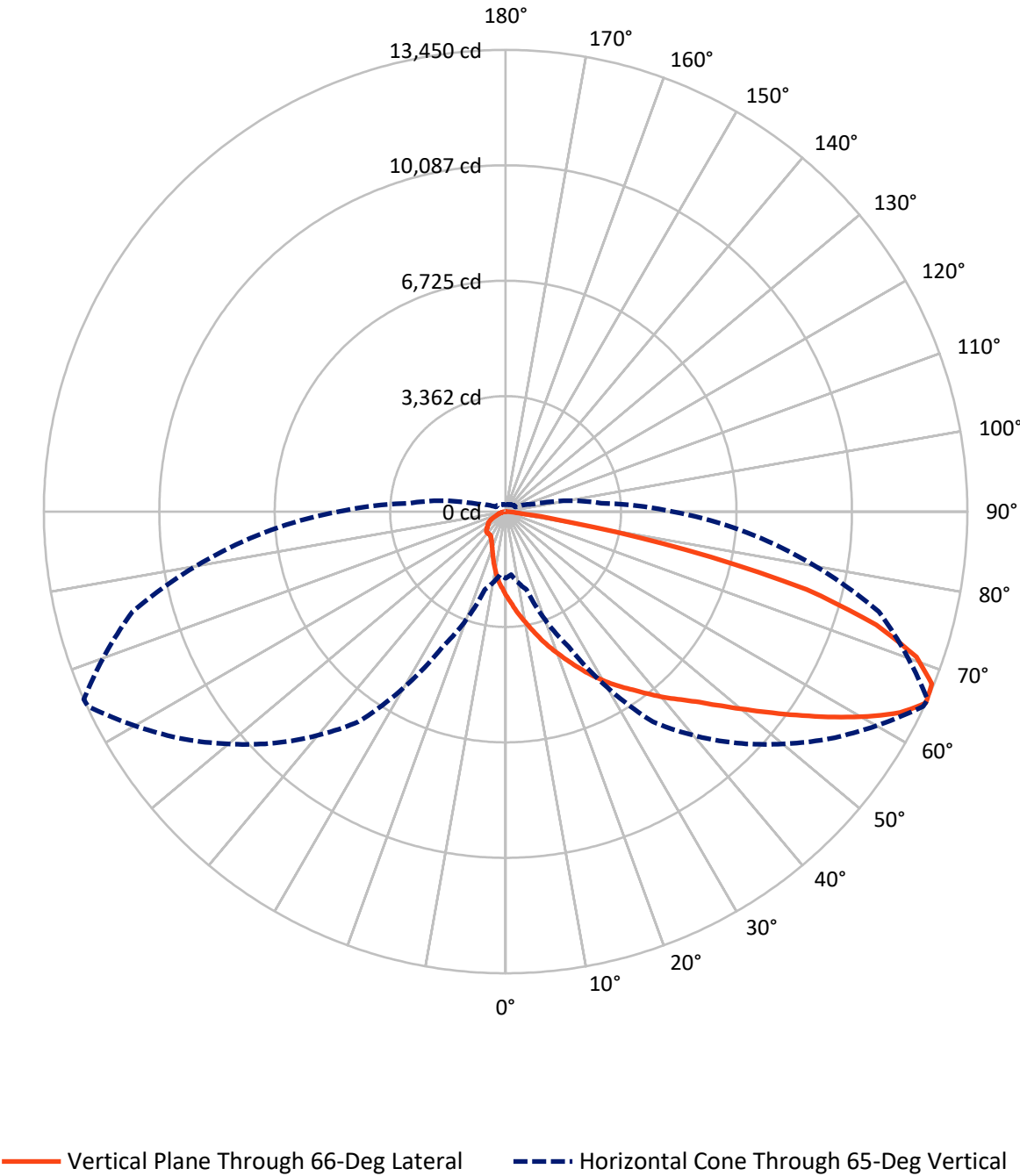


Based on 25 foot mounting height. Maximum calculated value = 7.1 fc

Type III - Short - N/A

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Luminous Intensity Polar Plot



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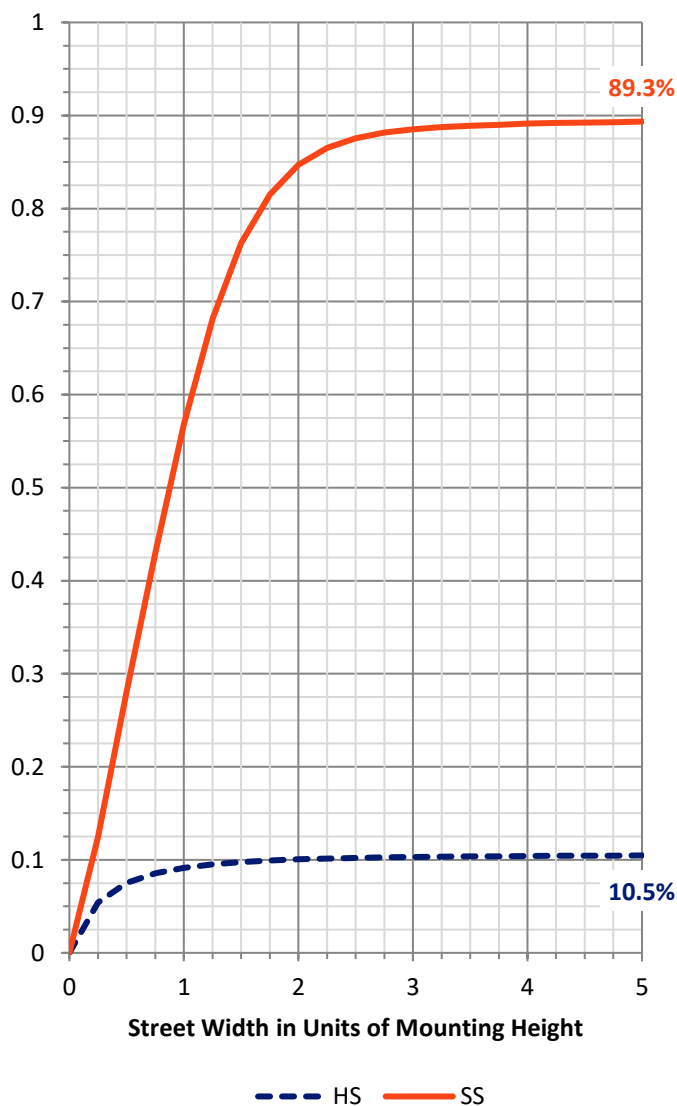
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1958.1	0.0	1958.1
	% Fixture	10.6	0.0	10.6
Street Side	Lumens	16553.9	0.0	16553.9
	% Fixture	89.4	0.0	89.4
Total	Lumens	18512.0	0.0	18512.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	241.8	1.3
10°-20°	788.1	4.3
20°-30°	1426.0	7.7
30°-40°	2229.8	12.0
40°-50°	3382.7	18.3
50°-60°	4297.8	23.2
60°-70°	4015.8	21.7
70°-80°	1995.8	10.8
80°-90°	134.1	0.7
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°	18512.0	100.0
0°-180°	18512.0	100.0

Coefficient of Utilization



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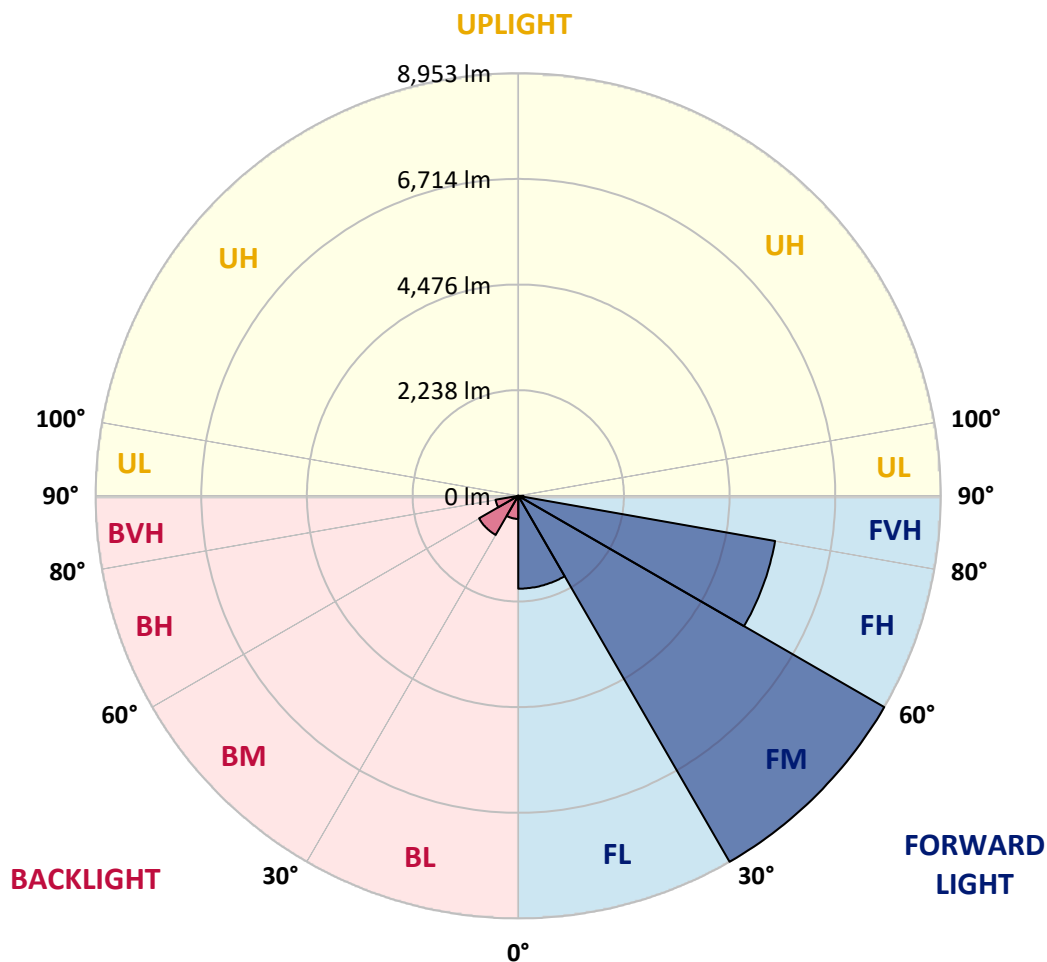
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1966.9	10.6			
FM	(30°-60°)	8952.6	48.4			
FH	(60°-80°)	5524.1	29.8			G3/7500
FVH	(80°-90°)	110.4	0.6			G2/225
BL	(0°-30°)	489.0	2.6	B1/500		
BM	(30°-60°)	957.7	5.2	B1/1000		
BH	(60°-80°)	487.6	2.6	B1/500		G1/500
BVH	(80°-90°)	23.7	0.1			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G3

Type III Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	66°	75°	85°
0°	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0
2.5°	2861.5	2884.8	2896.5	2900.4	2811.0	2772.2	2733.4	2644.1	2624.7	2574.2	2508.2
5°	3366.3	3397.3	3389.6	3374.0	3265.3	3141.1	3040.1	2873.2	2846.0	2725.6	2578.1
7.5°	3863.3	3890.4	3882.7	3824.4	3704.1	3529.3	3362.4	3117.8	3079.0	2884.8	2648.0
10°	4278.7	4302.0	4298.1	4239.9	4096.2	3882.7	3680.8	3354.6	3308.0	3032.4	2706.2
12.5°	4620.4	4651.4	4647.6	4608.7	4480.6	4247.6	4018.6	3626.4	3568.2	3211.0	2787.8
15°	4888.3	4927.1	4927.1	4911.6	4822.3	4628.1	4368.0	3925.4	3855.5	3416.7	2888.7
17.5°	5051.3	5082.4	5109.6	5136.8	5074.6	4927.1	4690.3	4224.3	4150.6	3618.6	2993.5
20°	5136.8	5167.8	5187.2	5245.5	5257.1	5183.4	4997.0	4519.4	4441.8	3847.7	3113.9
22.5°	5276.5	5303.7	5307.6	5358.1	5381.4	5400.8	5284.3	4810.6	4748.5	4100.1	3249.8
25°	5509.5	5540.6	5528.9	5552.2	5556.1	5579.4	5567.7	5144.5	5082.4	4387.4	3412.9
27.5°	5808.5	5847.3	5839.5	5816.2	5781.3	5761.9	5812.3	5482.3	5424.1	4674.7	3579.8
30°	6130.7	6177.3	6165.7	6119.1	6025.9	5944.4	6014.2	5800.7	5746.3	4969.8	3766.2
32.5°	6456.9	6511.2	6507.3	6429.7	6270.5	6130.7	6235.6	6099.7	6060.8	5288.2	3968.1
35°	6670.4	6740.3	6732.5	6685.9	6480.2	6359.8	6487.9	6406.4	6379.2	5676.5	4259.3
37.5°	7016.0	7089.7	7023.7	6907.3	6670.4	6608.3	6763.6	6752.0	6732.5	6088.0	4566.0
40°	7854.6	7963.3	7788.6	7311.1	6922.8	6868.4	7089.7	7136.3	7116.9	6495.7	4841.7
42.5°	8732.1	8895.2	8623.4	7963.3	7380.9	7182.9	7447.0	7513.0	7489.7	6845.1	5090.2
45°	9264.0	9333.9	9062.1	8549.6	8192.4	7563.4	7827.5	7936.2	7916.8	7264.5	5408.6
47.5°	9698.9	9671.7	9361.1	9015.5	9081.6	8099.2	8258.4	8472.0	8456.4	7726.5	5758.0
50°	9792.1	9730.0	9605.7	9388.3	9563.0	8642.8	8712.7	9081.6	9066.0	8239.0	6111.3
52.5°	9135.9	9054.4	9392.2	9574.7	9516.4	9038.8	9213.6	9749.4	9741.6	8794.2	6449.1
55°	7497.4	7431.4	8340.0	9283.5	9465.9	9318.4	9768.8	10444.4	10487.1	9384.4	6755.8
57.5°	5897.8	5827.9	6720.9	8553.5	9279.6	9574.7	10417.2	11240.3	11294.7	10025.0	7047.0
60°	4701.9	4597.1	5280.4	7404.2	8930.1	9772.7	11042.3	12113.9	12121.7	10611.3	7225.6
62.5°	3195.4	3079.0	3836.1	5948.2	8343.8	9803.7	11523.7	12867.2	12898.2	11050.1	7256.7
65°	1941.3	1844.3	2356.8	4344.7	7478.0	9539.7	11531.5	13422.4	13449.6	11252.0	7070.3
67.5°	1126.0	1087.1	1347.3	2706.2	6041.4	8829.2	11046.2	13337.0	13387.4	11166.5	6647.1
70°	656.2	652.3	749.4	1339.5	4263.2	7419.8	9962.9	12618.7	12692.4	10720.0	5998.7
72.5°	481.5	489.2	528.0	718.3	2469.4	5342.5	8437.0	11174.3	11286.9	9846.4	5074.6
75°	380.5	384.4	419.3	489.2	1296.8	3020.7	6321.0	8969.0	9058.3	8289.5	3964.2
77.5°	283.4	291.2	318.4	345.6	601.8	1386.1	3556.5	5525.0	5377.5	4550.5	1914.2
80°	205.8	225.2	236.8	248.5	318.4	535.8	1067.7	1925.8	1910.3	1987.9	904.7
82.5°	132.0	147.5	159.2	167.0	190.3	256.3	318.4	431.0	465.9	772.7	361.1
85°	58.2	66.0	73.8	89.3	81.5	89.3	132.0	85.4	73.8	116.5	66.0
87.5°	0.0	0.0	11.6	19.4	15.5	7.8	23.3	15.5	11.6	11.6	11.6
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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	2450.0
2.5°	2473.3	2430.5	2341.2	2255.8	2205.4	2139.3	2081.1	2026.8	2022.9	2007.3	1980.2
5°	2504.3	2422.8	2255.8	2096.6	1976.3	1848.1	1739.4	1654.0	1623.0	1599.7	1568.6
7.5°	2535.4	2407.3	2158.8	1925.8	1735.6	1556.9	1428.8	1312.3	1277.4	1246.3	1226.9
10°	2547.0	2380.1	2046.2	1735.6	1487.1	1296.8	1160.9	1075.5	1044.4	1028.9	1017.3
12.5°	2582.0	2364.5	1941.3	1556.9	1269.6	1094.9	997.8	947.4	935.7	924.1	912.4
15°	2628.6	2364.5	1836.5	1382.2	1098.8	959.0	900.8	865.8	858.1	854.2	846.4
17.5°	2679.0	2364.5	1735.6	1234.7	974.5	869.7	827.0	807.6	803.7	799.8	795.9
20°	2748.9	2368.4	1626.8	1106.6	885.2	803.7	768.8	745.5	741.6	737.7	737.7
22.5°	2818.8	2376.2	1522.0	1009.5	827.0	753.2	710.5	687.2	679.5	679.5	679.5
25°	2908.1	2399.5	1424.9	928.0	776.5	706.6	652.3	632.9	629.0	629.0	625.1
27.5°	3012.9	2426.7	1339.5	865.8	726.1	652.3	597.9	578.5	570.8	570.8	566.9
30°	3125.5	2453.8	1269.6	819.2	675.6	597.9	547.5	524.2	516.4	520.3	516.4
32.5°	3249.8	2492.7	1215.3	788.2	629.0	551.3	504.7	477.6	473.7	473.7	469.8
35°	3459.5	2601.4	1207.5	772.7	590.2	516.4	469.8	442.6	438.7	438.7	434.9
37.5°	3684.6	2725.6	1242.5	764.9	559.1	485.3	442.6	415.4	411.6	411.6	411.6
40°	3874.9	2818.8	1281.3	764.9	539.7	458.2	419.3	396.0	396.0	396.0	396.0
42.5°	4003.0	2826.6	1273.5	764.9	524.2	438.7	403.8	380.5	380.5	384.4	380.5
45°	4193.3	2865.4	1242.5	753.2	512.5	423.2	388.3	368.9	365.0	368.9	368.9
47.5°	4418.5	2935.3	1211.4	706.6	508.6	407.7	376.6	353.3	349.4	353.3	349.4
50°	4632.0	2997.4	1195.9	644.5	500.9	392.1	361.1	337.8	333.9	337.8	333.9
52.5°	4810.6	3024.6	1168.7	601.8	481.5	376.6	345.6	322.3	314.5	318.4	318.4
55°	4954.3	3016.8	1129.9	566.9	446.5	361.1	326.1	306.7	295.1	295.1	291.2
57.5°	5086.3	3020.7	1094.9	531.9	407.7	337.8	310.6	287.3	271.8	267.9	264.0
60°	5136.8	3001.3	1032.8	485.3	368.9	318.4	291.2	264.0	248.5	244.6	240.7
62.5°	5066.9	2931.4	951.3	403.8	333.9	295.1	271.8	244.6	229.1	225.2	221.3
65°	4868.9	2799.4	827.0	318.4	302.8	267.9	248.5	229.1	209.7	201.9	198.0
67.5°	4531.1	2609.2	671.7	256.3	267.9	244.6	233.0	209.7	186.4	178.6	174.7
70°	4049.6	2356.8	504.7	217.4	236.8	217.4	209.7	186.4	167.0	159.2	155.3
72.5°	3374.0	1949.1	353.3	186.4	205.8	190.3	182.5	167.0	147.5	135.9	135.9
75°	2550.9	1397.8	233.0	159.2	170.8	163.1	151.4	139.8	128.1	120.4	116.5
77.5°	1098.8	543.6	143.7	120.4	139.8	135.9	120.4	112.6	108.7	100.9	100.9
80°	473.7	221.3	89.3	89.3	100.9	97.1	93.2	85.4	85.4	81.5	77.7
82.5°	174.7	89.3	54.4	66.0	73.8	66.0	66.0	66.0	66.0	62.1	62.1
85°	42.7	27.2	27.2	38.8	42.7	38.8	42.7	38.8	38.8	38.8	34.9
87.5°	11.6	11.6	15.5	15.5	15.5	15.5	15.5	11.6	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)