

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: P842776

Luminaire Tested: **ARCH4-90-750-U-T2U-HSS**

Issue Date: 5/27/2024

Test Information

Test Method: LM-79-08
Report Number: P842776
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: ARCH4-90-750-U-T2U-HSS
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(2) 70 CRI, 5000K, 765mA 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: 11759 lumens
Efficiency: N/A
Efficacy: 126.3 lumens/watt
Luminous Opening: Rectangular (W 1.17' x L: 0.58' x H: 0')
IES Classification: Type II - Short
BUG Rating: B2 - U0 - G2

Input Watts (W): 93.1
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: 24 FT



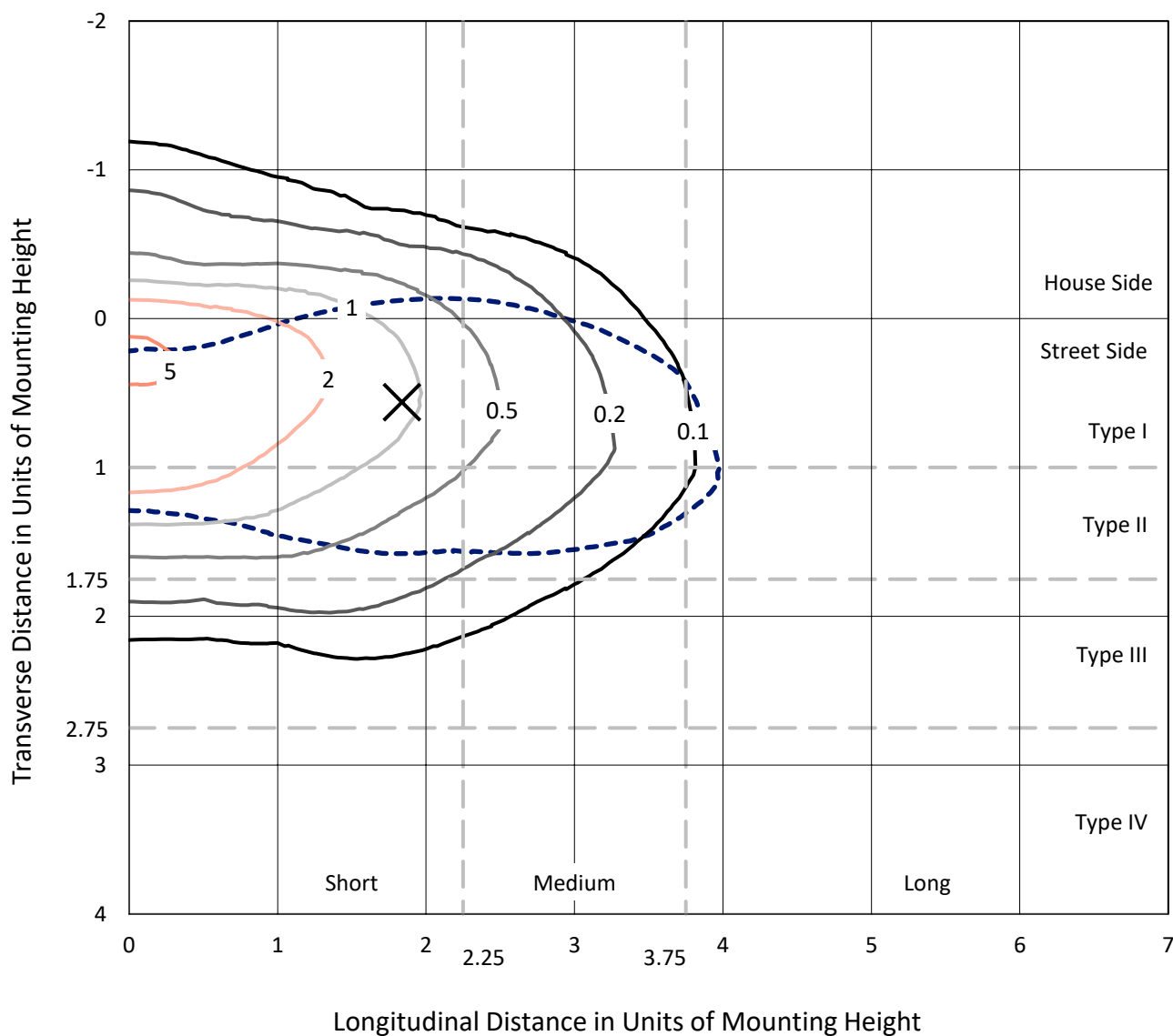
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Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

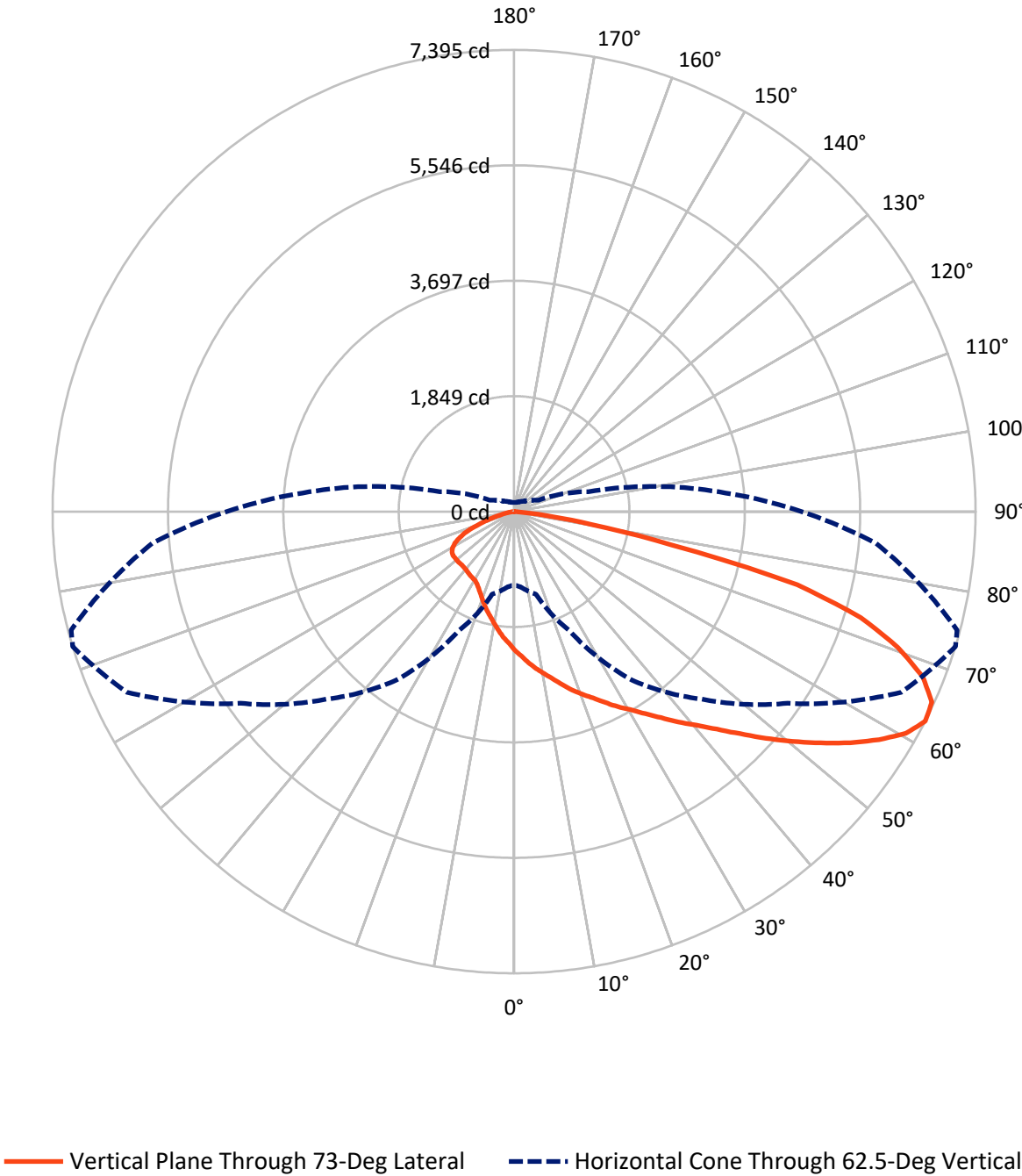


Based on 25 foot mounting height. Maximum calculated value = 5.6 fc

Type II - Short - N/A

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Luminous Intensity Polar Plot



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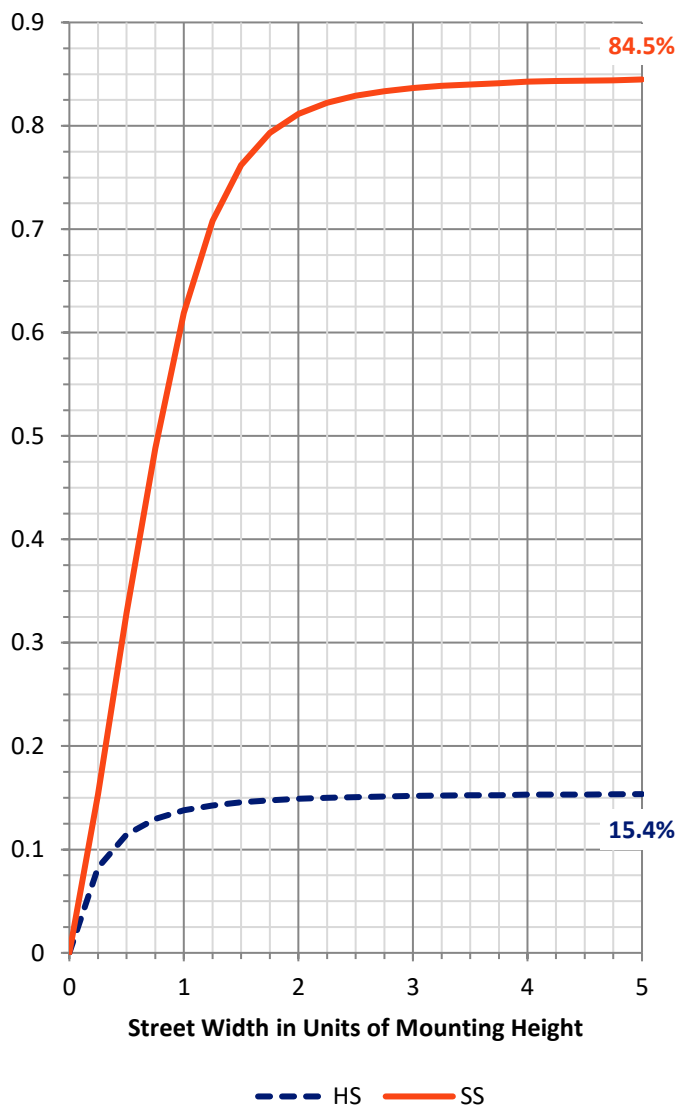
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1822.8	0.0	1822.8
	% Fixture	15.5	0.0	15.5
Street Side	Lumens	9936.2	0.0	9936.2
	% Fixture	84.5	0.0	84.5
Total	Lumens	11759.0	0.0	11759.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	215.1	1.8
10°-20°	649.1	5.5
20°-30°	1080.4	9.2
30°-40°	1630.2	13.9
40°-50°	2278.6	19.4
50°-60°	2516.8	21.4
60°-70°	2192.5	18.6
70°-80°	1107.5	9.4
80°-90°	88.9	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°	11759.0	100.0
0°-180°	11759.0	100.0

Coefficient of Utilization



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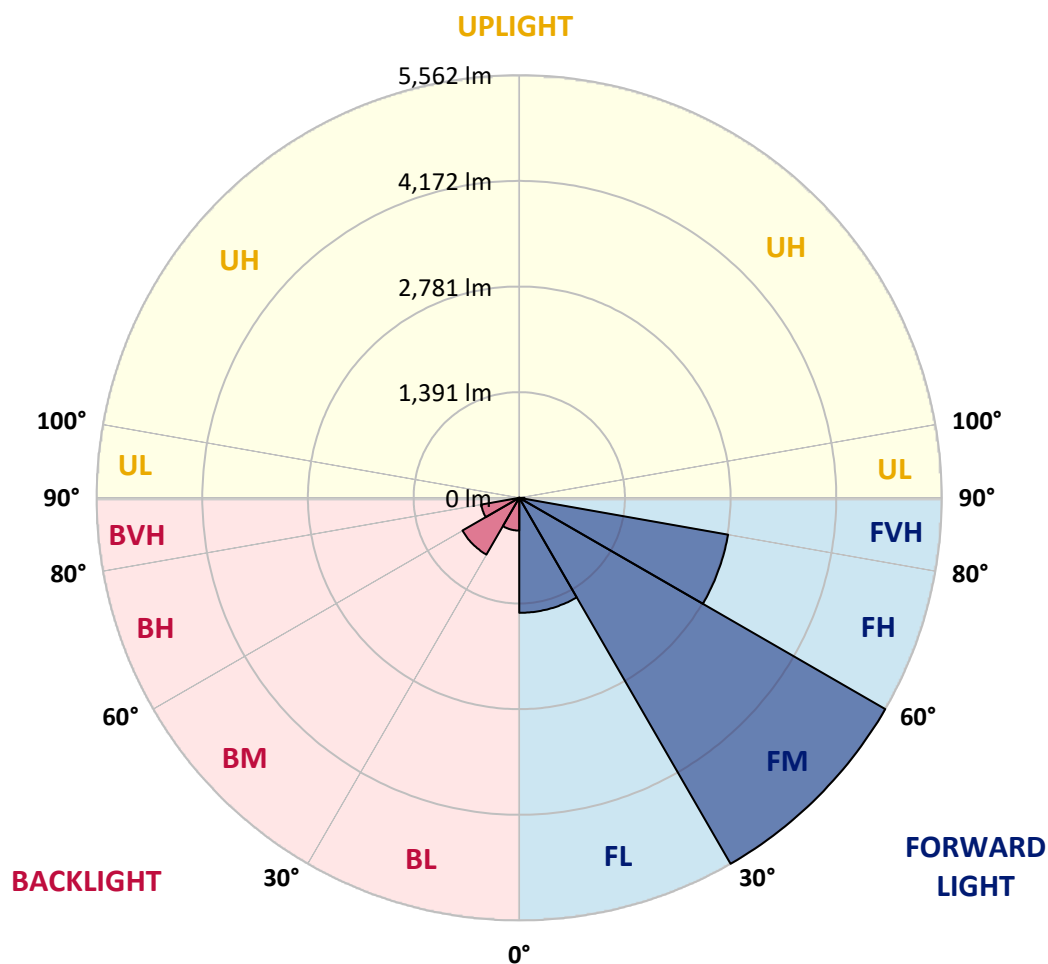
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1513.7	12.9			
FM	(30°-60°)	5562.4	47.3			
FH	(60°-80°)	2791.2	23.7			G2/5000
FVH	(80°-90°)	68.8	0.6			G1/100
BL	(0°-30°)	430.8	3.7	B1/500		
BM	(30°-60°)	863.1	7.3	B1/1000		
BH	(60°-80°)	508.8	4.3	B2/1000		G2/1000
BVH	(80°-90°)	20.1	0.2			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B2-U0-G2

Type II Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	73°	75°	85°
0°	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6
2.5°	2534.1	2562.2	2546.9	2557.1	2505.9	2472.6	2434.1	2359.8	2318.8	2313.7	2265.0
5°	2905.6	2936.3	2910.7	2903.0	2813.3	2736.5	2649.4	2518.7	2431.6	2416.2	2308.6
7.5°	3277.1	3305.3	3274.6	3251.5	3131.1	2995.3	2867.2	2675.0	2539.2	2513.6	2344.5
10°	3538.5	3564.1	3541.0	3518.0	3392.4	3254.1	3072.1	2821.0	2636.6	2595.6	2367.5
12.5°	3735.8	3751.1	3740.9	3720.4	3602.5	3453.9	3279.7	2985.0	2746.7	2695.5	2403.4
15°	3897.2	3922.8	3910.0	3894.6	3781.9	3633.3	3466.7	3156.7	2874.8	2810.8	2457.2
17.5°	4004.8	4022.7	4025.3	4025.3	3925.4	3779.3	3617.9	3313.0	3003.0	2921.0	2508.4
20°	4053.5	4074.0	4086.8	4107.3	4025.3	3899.7	3735.8	3446.2	3123.4	3031.1	2557.1
22.5°	4076.5	4094.5	4127.8	4173.9	4107.3	4002.2	3851.1	3569.2	3243.8	3146.4	2613.5
25°	4094.5	4117.5	4166.2	4253.3	4207.2	4117.5	3986.9	3710.1	3387.3	3287.4	2695.5
27.5°	4143.2	4171.3	4217.5	4322.5	4266.1	4222.6	4130.3	3861.3	3538.5	3436.0	2795.4
30°	4312.3	4335.3	4332.8	4399.4	4330.2	4317.4	4253.3	4007.4	3684.5	3582.0	2913.3
32.5°	4619.7	4642.8	4586.4	4560.8	4409.6	4412.2	4386.6	4163.6	3858.7	3753.7	3049.1
35°	4950.3	4975.9	4901.6	4858.0	4604.4	4530.1	4542.9	4358.4	4053.5	3948.4	3218.2
37.5°	5244.9	5275.7	5211.6	5147.6	4891.3	4719.7	4717.1	4576.2	4276.4	4168.8	3405.2
40°	5406.3	5442.2	5480.6	5444.8	5175.7	4986.1	4904.1	4799.1	4496.7	4386.6	3607.6
42.5°	5483.2	5583.1	5652.3	5629.3	5408.9	5216.7	5119.4	5032.3	4765.8	4658.2	3848.5
45°	5268.0	5270.5	5416.6	5542.1	5501.1	5373.0	5355.1	5293.6	5073.2	4970.8	4120.1
47.5°	4998.9	4978.4	5080.9	5303.8	5419.1	5452.5	5557.5	5583.1	5424.3	5321.8	4396.8
50°	4353.3	4366.1	4699.2	5019.4	5244.9	5460.1	5701.0	5880.4	5785.6	5688.2	4688.9
52.5°	3541.0	3571.8	3953.5	4658.2	5014.3	5383.3	5785.6	6177.6	6154.5	6062.3	4981.0
55°	2839.0	2887.7	3292.5	4056.0	4719.7	5211.6	5821.4	6449.2	6536.3	6451.7	5268.0
57.5°	2170.2	2221.5	2562.2	3346.3	4343.0	4932.3	5795.8	6687.5	6892.4	6838.6	5531.9
60°	1634.7	1686.0	1903.7	2713.4	3871.6	4619.7	5667.7	6843.8	7212.7	7156.4	5724.1
62.5°	1170.9	1211.9	1373.4	2111.3	3297.6	4248.2	5352.5	6846.3	7394.6	7348.5	5816.3
65°	843.0	843.0	973.7	1506.6	2759.5	3802.4	4876.0	6531.2	7356.2	7343.4	5752.2
67.5°	607.3	612.4	717.4	1053.1	2201.0	3261.7	4258.5	5970.0	7059.0	7123.0	5521.6
70°	430.5	443.3	492.0	735.4	1662.9	2575.1	3597.4	5234.7	6523.5	6636.2	5075.8
72.5°	333.1	340.8	374.1	512.4	1214.5	1914.0	2867.2	4414.7	5808.6	5936.7	4468.6
75°	256.2	263.9	289.5	376.7	871.2	1342.6	2037.0	3425.7	4683.8	4911.8	3589.7
77.5°	187.0	197.3	215.2	274.2	507.3	853.2	1235.0	1926.8	2585.3	2692.9	1880.7
80°	87.1	99.9	125.6	176.8	274.2	402.3	438.1	743.1	1242.7	1299.1	1019.8
82.5°	48.7	61.5	71.7	107.6	138.4	143.5	148.6	187.0	468.9	517.6	427.9
85°	23.1	30.7	33.3	46.1	46.1	41.0	48.7	35.9	76.9	92.2	89.7
87.5°	0.0	2.6	5.1	12.8	10.2	7.7	7.7	7.7	7.7	10.2	7.7
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°	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6	2226.6
2.5°	2242.0	2208.7	2131.8	2065.2	2021.6	1983.2	1931.9	1908.9	1867.9	1875.6	1852.5
5°	2254.8	2193.3	2057.5	1931.9	1839.7	1757.7	1668.0	1616.8	1560.4	1555.3	1537.3
7.5°	2262.5	2167.7	1972.9	1796.1	1655.2	1529.7	1409.2	1342.6	1273.4	1258.1	1242.7
10°	2254.8	2129.2	1885.8	1655.2	1468.2	1311.9	1176.1	1091.5	1019.8	1001.8	986.5
12.5°	2262.5	2108.7	1803.8	1524.5	1301.6	1124.8	971.1	884.0	817.4	799.4	789.2
15°	2280.4	2095.9	1734.6	1406.7	1153.0	955.7	804.5	730.2	676.4	658.5	653.4
17.5°	2295.8	2083.1	1660.3	1291.4	1004.4	807.1	676.4	614.9	568.8	550.9	545.8
20°	2316.3	2065.2	1586.0	1181.2	873.7	689.2	573.9	520.1	484.3	471.5	468.9
22.5°	2334.2	2052.4	1516.8	1071.0	753.3	594.4	497.1	453.5	427.9	415.1	415.1
25°	2380.3	2057.5	1457.9	968.5	663.6	520.1	438.1	404.8	384.3	376.7	376.7
27.5°	2434.1	2078.0	1411.8	881.4	586.8	463.8	397.1	369.0	358.7	348.5	351.0
30°	2511.0	2119.0	1381.1	809.7	530.4	420.2	363.8	343.3	333.1	330.5	330.5
32.5°	2608.4	2185.6	1378.5	763.5	489.4	386.9	340.8	322.8	317.7	315.2	315.2
35°	2723.7	2244.5	1363.1	743.1	463.8	363.8	322.8	310.0	307.5	307.5	307.5
37.5°	2862.0	2341.9	1352.9	714.9	451.0	351.0	310.0	299.8	299.8	299.8	299.8
40°	3005.5	2421.3	1337.5	689.2	445.8	343.3	302.3	289.5	289.5	289.5	289.5
42.5°	3177.2	2536.6	1332.4	676.4	438.1	338.2	292.1	276.7	279.3	279.3	281.8
45°	3384.7	2667.3	1329.8	663.6	435.6	333.1	281.8	263.9	266.5	263.9	263.9
47.5°	3594.8	2818.5	1337.5	655.9	433.0	328.0	274.2	251.1	251.1	248.5	248.5
50°	3815.2	2956.8	1342.6	648.2	427.9	317.7	261.3	240.9	235.7	230.6	233.2
52.5°	4022.7	3084.9	1345.2	635.4	412.5	302.3	251.1	228.0	220.4	212.7	215.2
55°	4230.3	3207.9	1350.3	620.1	392.0	287.0	238.3	215.2	205.0	194.7	194.7
57.5°	4417.3	3315.5	1337.5	581.6	369.0	271.6	225.5	199.9	184.5	174.2	174.2
60°	4545.4	3392.4	1299.1	525.3	338.2	253.7	212.7	184.5	166.5	158.9	158.9
62.5°	4606.9	3405.2	1229.9	433.0	299.8	235.7	197.3	169.1	153.7	148.6	148.6
65°	4548.0	3348.9	1122.3	325.4	258.8	215.2	181.9	156.3	140.9	128.1	128.1
67.5°	4343.0	3190.0	973.7	246.0	220.4	194.7	166.5	143.5	125.6	115.3	115.3
70°	3930.5	2859.5	753.3	197.3	187.0	169.1	151.2	128.1	112.7	99.9	99.9
72.5°	3389.9	2423.9	530.4	158.9	158.9	143.5	128.1	112.7	97.4	87.1	87.1
75°	2600.7	1793.6	356.2	128.1	130.7	120.4	105.1	92.2	82.0	74.3	74.3
77.5°	1419.5	886.5	217.8	94.8	97.4	92.2	82.0	74.3	69.2	61.5	61.5
80°	689.2	389.5	125.6	66.6	69.2	66.6	61.5	53.8	53.8	48.7	48.7
82.5°	289.5	146.0	66.6	46.1	46.1	41.0	38.4	38.4	38.4	35.9	35.9
85°	71.7	28.2	28.2	25.6	25.6	25.6	23.1	23.1	23.1	17.9	20.5
87.5°	10.2	10.2	10.2	10.2	10.2	10.2	7.7	2.6	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)