

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: P841947

Luminaire Tested: **ARCH4-250-727-U-T2R**

Issue Date: 5/27/2024

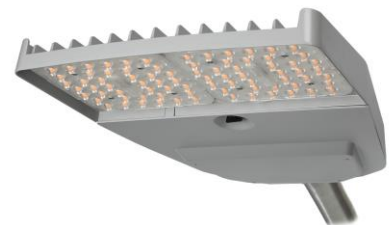
Test Information

Test Method: LM-79-08
Report Number: P841947
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2403-329-1)
Test Lab: INNOVATION CENTER
Issue Date: 5/27/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH4-250-727-U-T2R
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(2) 70 CRI, 2700K, 975mA LIGHTSQUARES WITH 40 LEDS EACH AND TYPE II
ROADWAY OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 35595 lumens
Efficiency: N/A
Efficacy: 142.7 lumens/watt
Luminous Opening: Rectangular (W 1.17' x L: 0.58' x H: 0')
IES Classification: Type II - Medium
BUG Rating: B4 - U0 - G4

Input Watts (W): 249.5
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

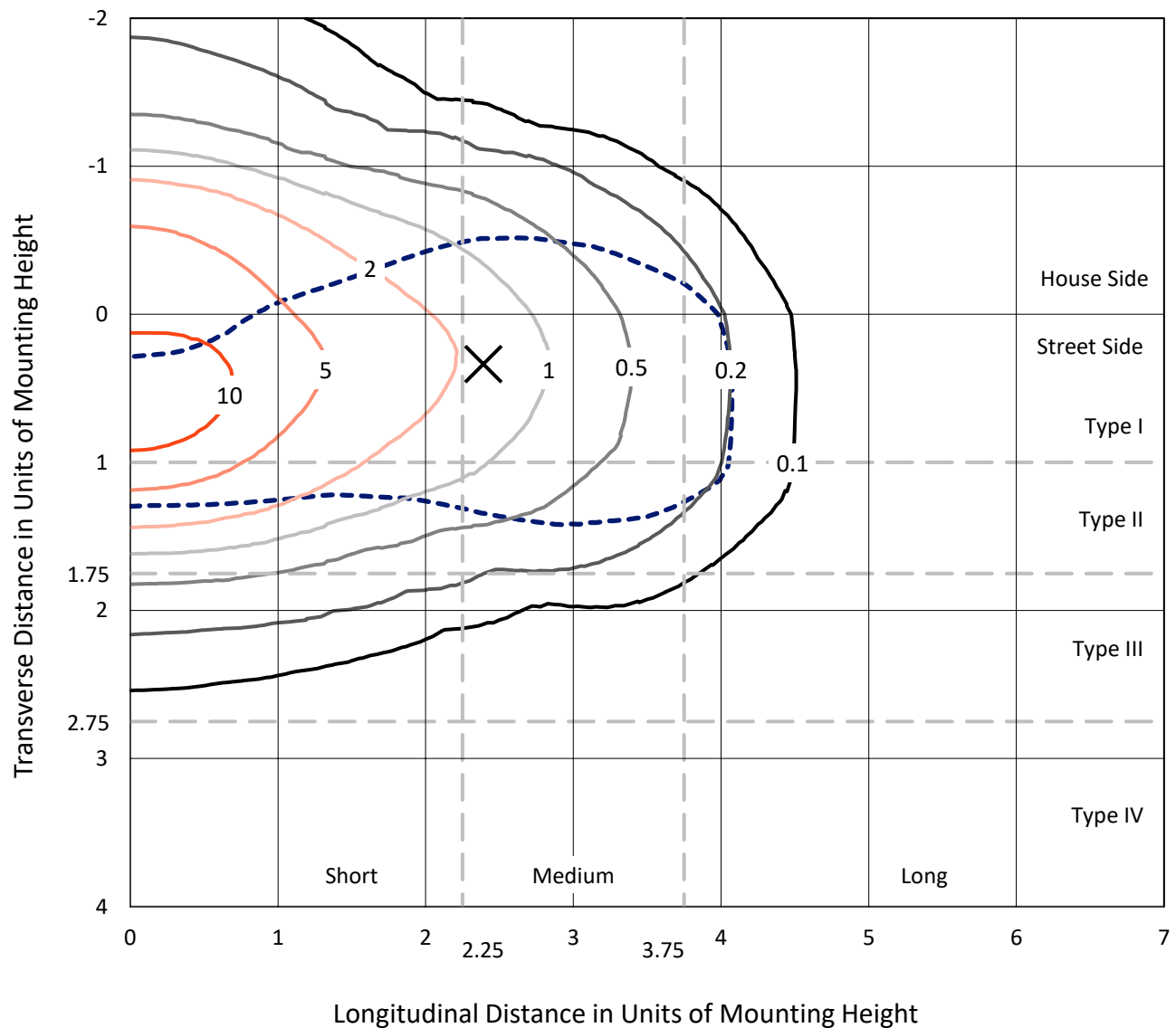


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Iso-Footcandle Lines of Horizontal Illumination

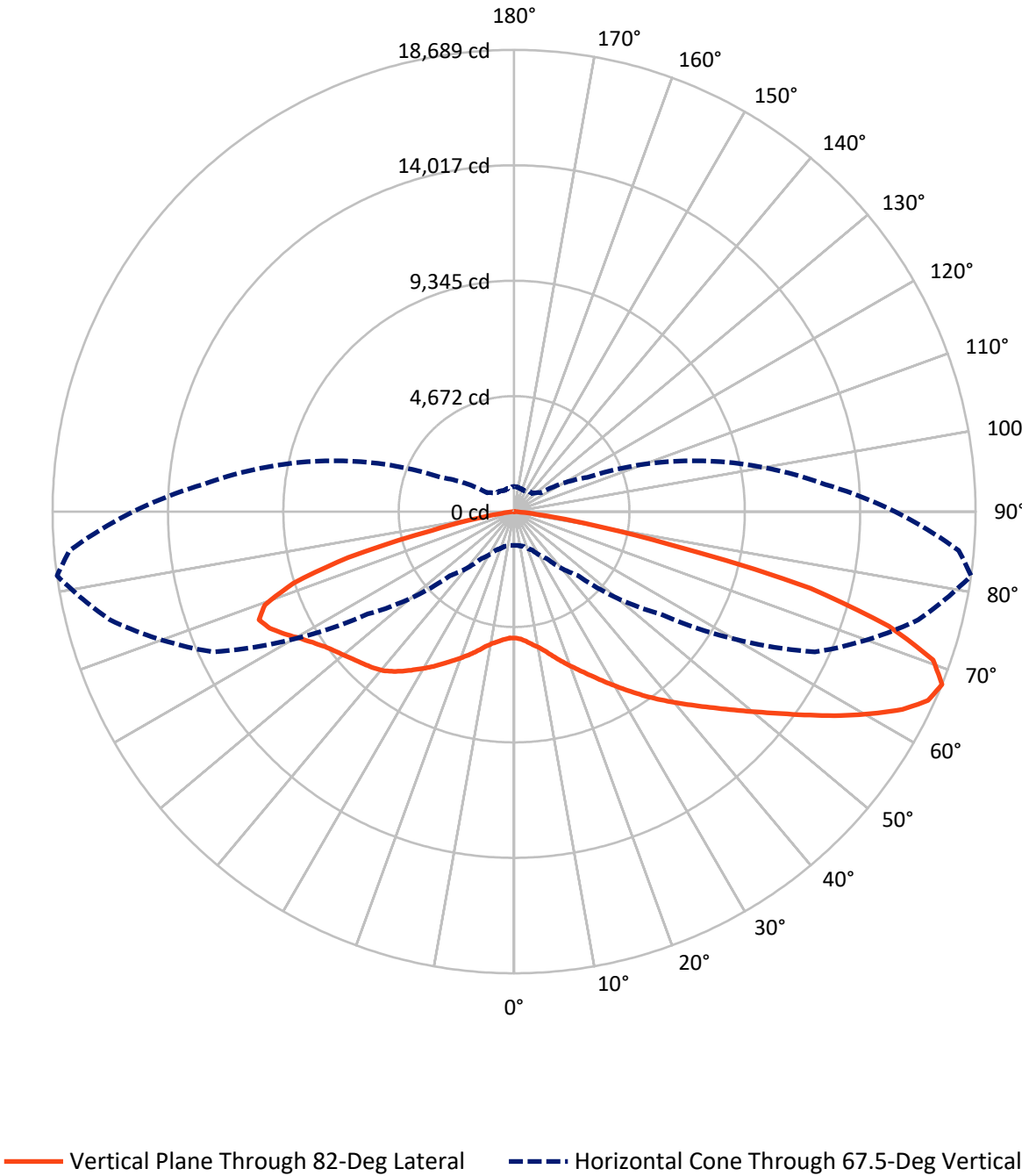
× Max cd
- - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 15.7 fc
Type II - Medium - N/A

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Luminous Intensity Polar Plot



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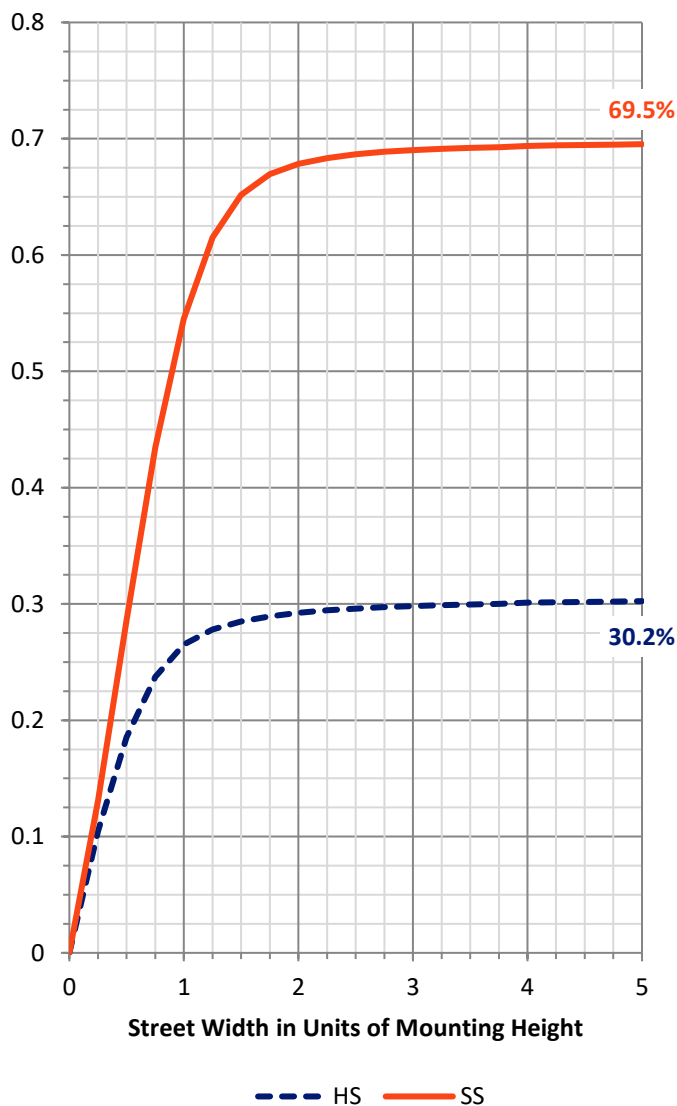
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	10840.1	0.0	10840.1
	% Fixture	30.5	0.0	30.5
Street Side	Lumens	24754.9	0.0	24754.9
	% Fixture	69.5	0.0	69.5
Total	Lumens	35595.0	0.0	35595.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	528.8	1.5
10°-20°	1904.7	5.4
20°-30°	3828.1	10.8
30°-40°	6013.4	16.9
40°-50°	7325.5	20.6
50°-60°	6921.7	19.4
60°-70°	5715.7	16.1
70°-80°	3112.5	8.7
80°-90°	244.7	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°	35595.0	100.0
0°-180°	35595.0	100.0

Coefficient of Utilization



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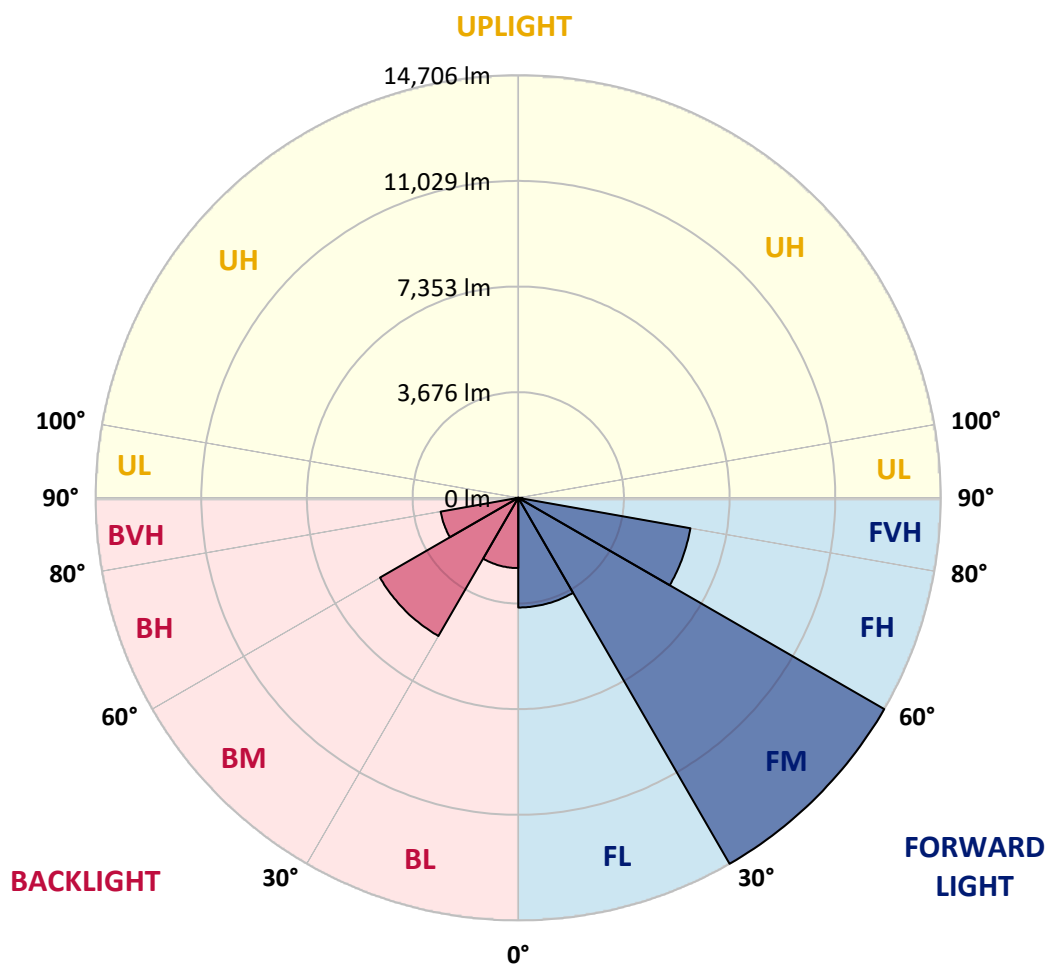
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	3817.1	10.7			
FM	(30°-60°)	14705.8	41.3			
FH	(60°-80°)	6084.5	17.1			G3/7500
FVH	(80°-90°)	147.5	0.4			G2/225
BL	(0°-30°)	2444.5	6.9	B3/2500		
BM	(30°-60°)	5554.7	15.6	B4/8500		
BH	(60°-80°)	2743.7	7.7	B4/5000		G4/5000
BVH	(80°-90°)	97.2	0.3			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B4-U0-G4

Type II Medium



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	82°	85°
0°	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8
2.5°	5349.3	5349.3	5390.7	5390.7	5354.5	5297.7	5282.2	5220.1	5163.3	5163.3	5168.4
5°	5861.0	5855.9	5886.9	5845.5	5757.7	5643.9	5566.4	5432.0	5318.3	5282.2	5277.0
7.5°	6486.4	6481.2	6496.7	6429.5	6264.2	6078.1	5923.0	5706.0	5519.9	5442.4	5421.7
10°	7184.1	7179.0	7163.5	7049.8	6827.5	6538.1	6305.5	6005.7	5726.6	5602.6	5576.8
12.5°	7985.3	7974.9	7938.7	7773.3	7468.4	7096.3	6760.3	6372.7	6000.6	5830.0	5773.2
15°	8879.4	8863.9	8796.7	8595.1	8186.8	7716.5	7282.3	6786.2	6331.3	6109.1	6031.6
17.5°	9820.0	9820.0	9716.7	9416.9	8962.1	8378.1	7840.5	7210.0	6677.6	6403.7	6310.7
20°	10776.2	10771.0	10641.8	10280.0	9742.5	9070.6	8388.4	7695.8	7034.3	6703.5	6589.8
22.5°	11784.1	11773.7	11613.5	11200.0	10559.1	9799.4	9003.4	8176.5	7427.1	7029.1	6884.4
25°	12941.8	12926.3	12729.9	12223.4	11463.6	10605.7	9696.0	8739.8	7876.7	7390.9	7220.3
27.5°	14171.9	14151.2	13918.6	13329.4	12497.3	11463.6	10460.9	9391.1	8372.9	7794.0	7602.8
30°	15267.6	15252.1	14998.8	14394.1	13438.0	12316.4	11189.7	10042.3	8894.9	8223.0	7985.3
32.5°	16094.5	16094.5	15867.1	15272.8	14280.4	13133.0	11923.6	10657.3	9437.6	8683.0	8403.9
35°	16595.9	16611.4	16415.0	15939.5	15004.0	13903.1	12683.4	11380.9	10016.5	9174.0	8874.2
37.5°	16668.2	16719.9	16606.2	16285.8	15505.3	14544.0	13427.6	12078.7	10616.0	9670.2	9334.2
40°	16332.3	16368.5	16373.6	16249.6	15712.1	15004.0	14084.0	12817.7	11251.7	10192.2	9804.5
42.5°	15660.4	15686.2	15732.8	15768.9	15562.2	15205.6	14585.4	13505.2	11928.8	10724.5	10269.7
45°	14792.1	14786.9	14864.5	15019.5	15009.2	15091.9	14864.5	14130.5	12631.7	11329.2	10786.5
47.5°	13494.8	13469.0	13742.9	14094.4	14270.1	14657.7	14869.6	14621.5	13396.6	11996.0	11375.8
50°	11463.6	11437.8	12037.3	12864.3	13381.1	13970.3	14585.4	14916.1	14197.7	12745.4	12016.6
52.5°	8993.1	8967.3	9727.0	11174.2	12300.9	13158.9	14011.7	14983.3	14957.5	13582.7	12740.2
55°	6688.0	6667.3	7406.4	8972.4	10796.9	12218.2	13308.8	14807.6	15670.7	14544.0	13618.9
57.5°	4713.6	4703.3	5344.2	6641.5	8863.9	11070.8	12631.7	14466.5	16327.1	15588.0	14611.2
60°	3307.8	3292.3	3757.5	4760.1	6703.5	9339.4	11959.8	14011.7	16818.1	16616.6	15665.6
62.5°	2227.6	2217.3	2548.0	3385.3	4760.1	7189.3	10941.6	13706.7	17097.2	17650.2	16730.3
65°	1690.1	1684.9	1834.8	2294.8	3369.8	5163.3	9323.9	13670.5	17133.4	18425.5	17634.7
67.5°	1364.5	1369.6	1452.3	1715.9	2331.0	3669.6	7230.7	13443.1	16942.2	18689.1	18074.1
70°	1116.4	1116.4	1152.6	1328.3	1721.1	2475.7	5049.6	12409.4	16409.8	18001.7	17552.0
72.5°	852.8	858.0	971.7	1075.0	1297.3	1736.6	3235.4	10269.7	15153.9	15872.3	15531.2
75°	677.1	671.9	739.1	883.8	1007.8	1240.4	1984.7	7365.0	12895.3	12404.3	12187.2
77.5°	485.8	480.7	532.4	656.4	764.9	878.6	1183.6	3716.1	7013.6	6445.1	6284.8
80°	330.8	320.4	367.0	454.8	506.5	516.8	578.9	1426.5	3059.7	2884.0	2847.8
82.5°	170.6	170.6	196.4	258.4	263.6	268.8	258.4	460.0	1013.0	945.8	904.5
85°	67.2	67.2	72.4	87.9	87.9	93.0	93.0	118.9	108.5	103.4	98.2
87.5°	5.2	5.2	10.3	10.3	15.5	15.5	15.5	20.7	25.8	25.8	25.8
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°	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8	5116.8
2.5°	5158.1	5137.4	5070.2	5054.7	5044.4	5028.9	5034.1	4997.9	4982.4	4987.6	4966.9
5°	5251.1	5215.0	5132.3	5096.1	5085.8	5070.2	5085.8	5059.9	5034.1	5044.4	5034.1
7.5°	5380.4	5328.7	5225.3	5189.1	5184.0	5168.4	5189.1	5168.4	5147.8	5158.1	5137.4
10°	5514.7	5447.5	5333.8	5297.7	5297.7	5292.5	5313.2	5282.2	5261.5	5266.6	5256.3
12.5°	5711.1	5623.3	5499.2	5468.2	5452.7	5468.2	5473.4	5432.0	5395.9	5401.0	5385.5
15°	5948.9	5850.7	5716.3	5669.8	5659.4	5654.3	5633.6	5581.9	5535.4	5530.2	5514.7
17.5°	6207.3	6083.3	5923.0	5876.5	5830.0	5814.5	5762.8	5695.6	5623.3	5623.3	5602.6
20°	6455.4	6315.8	6124.6	6057.4	5990.2	5928.2	5840.3	5731.8	5638.8	5623.3	5602.6
22.5°	6724.1	6558.8	6336.5	6238.3	6119.4	5995.4	5845.5	5700.8	5581.9	5556.1	5540.6
25°	7023.9	6817.2	6553.6	6408.9	6217.6	6026.4	5804.2	5618.1	5478.6	5437.2	5426.9
27.5°	7354.7	7106.6	6786.2	6574.3	6295.2	5995.4	5711.1	5488.9	5318.3	5266.6	5251.1
30°	7690.6	7396.0	6998.1	6688.0	6295.2	5897.2	5540.6	5282.2	5085.8	5013.4	5003.1
32.5°	8026.6	7695.8	7189.3	6750.0	6233.1	5731.8	5318.3	5013.4	4791.2	4703.3	4724.0
35°	8429.7	8026.6	7365.0	6775.8	6129.8	5530.2	5065.1	4708.5	4481.0	4403.5	4419.0
37.5°	8848.4	8357.4	7504.6	6755.2	5985.1	5302.8	4780.8	4434.5	4150.3	4015.9	4031.4
40°	9210.2	8657.1	7602.8	6682.8	5799.0	5044.4	4501.7	4046.9	3654.1	3524.9	3509.4
42.5°	9551.3	8879.4	7654.5	6574.3	5587.1	4744.6	4103.7	3519.7	3126.9	2966.7	2971.9
45°	9907.9	9096.5	7633.8	6429.5	5323.5	4393.2	3592.1	3002.9	2656.6	2511.9	2517.0
47.5°	10316.2	9329.0	7613.1	6274.5	5003.1	3938.4	3101.1	2548.0	2248.3	2144.9	2134.6
50°	10750.4	9587.5	7587.3	6083.3	4646.4	3431.8	2615.2	2124.2	1871.0	1803.8	1788.3
52.5°	11241.4	9866.6	7571.8	5855.9	4217.5	2894.3	2181.1	1752.1	1581.5	1535.0	1529.9
55°	11830.6	10192.2	7592.4	5581.9	3700.6	2387.8	1814.1	1509.2	1395.5	1369.6	1364.5
57.5°	12549.0	10610.8	7654.5	5261.5	3157.9	1948.5	1545.4	1359.3	1286.9	1266.3	1266.3
60°	13329.4	11086.3	7768.2	4899.7	2615.2	1607.4	1369.6	1240.4	1209.4	1235.3	1235.3
62.5°	14171.9	11644.5	7969.7	4460.4	2108.7	1359.3	1230.1	1142.2	1121.6	1173.2	1178.4
65°	14952.3	12187.2	8099.0	3933.2	1674.6	1178.4	1121.6	1044.0	1054.4	1106.0	1100.9
67.5°	15433.0	12636.9	7918.1	3271.6	1328.3	1044.0	1007.8	940.7	966.5	1007.8	1013.0
70°	15138.4	12383.6	7023.9	2470.5	1038.9	909.6	883.8	842.5	863.1	914.8	935.5
72.5°	13696.4	11091.5	5463.0	1669.4	837.3	764.9	775.3	754.6	780.4	827.0	873.5
75°	11117.3	8383.2	3664.4	1069.9	661.6	651.2	666.7	651.2	661.6	708.1	733.9
77.5°	5804.2	4088.2	1824.5	666.7	491.0	506.5	532.4	537.5	568.5	578.9	589.2
80°	2708.3	1840.0	759.8	372.1	325.6	356.6	408.3	413.5	423.8	439.3	444.5
82.5°	883.8	553.0	351.5	201.6	186.1	201.6	263.6	315.3	320.4	351.5	351.5
85°	93.0	56.9	77.5	82.7	72.4	87.9	118.9	113.7	51.7	31.0	31.0
87.5°	25.8	20.7	25.8	25.8	20.7	20.7	15.5	5.2	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)