

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: P836345

Luminaire Tested: **ARCH3-170-740-U-T2U**

Issue Date: 5/16/2024

Test Information

Test Method: LM-79-08
Report Number: P836345
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2401-285-18)
Test Lab: INNOVATION CENTER
Issue Date: 5/16/2024
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH3-170-740-U-T2U
Description: ARCHEON CONTEMPORARY ROADWAY AND AREA LUMINAIRE
(1) 70 CRI, 4000K, 1310mA LIGHTSQUARE WITH 40 LEDS AND TYPE II U OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 24427 lumens
Efficiency: N/A
Efficacy: 143.2 lumens/watt
Luminous Opening: Rectangular (W 0.58' x L: 0.58' x H: 0')
IES Classification: Type II - Medium
BUG Rating: B3 - U0 - G3

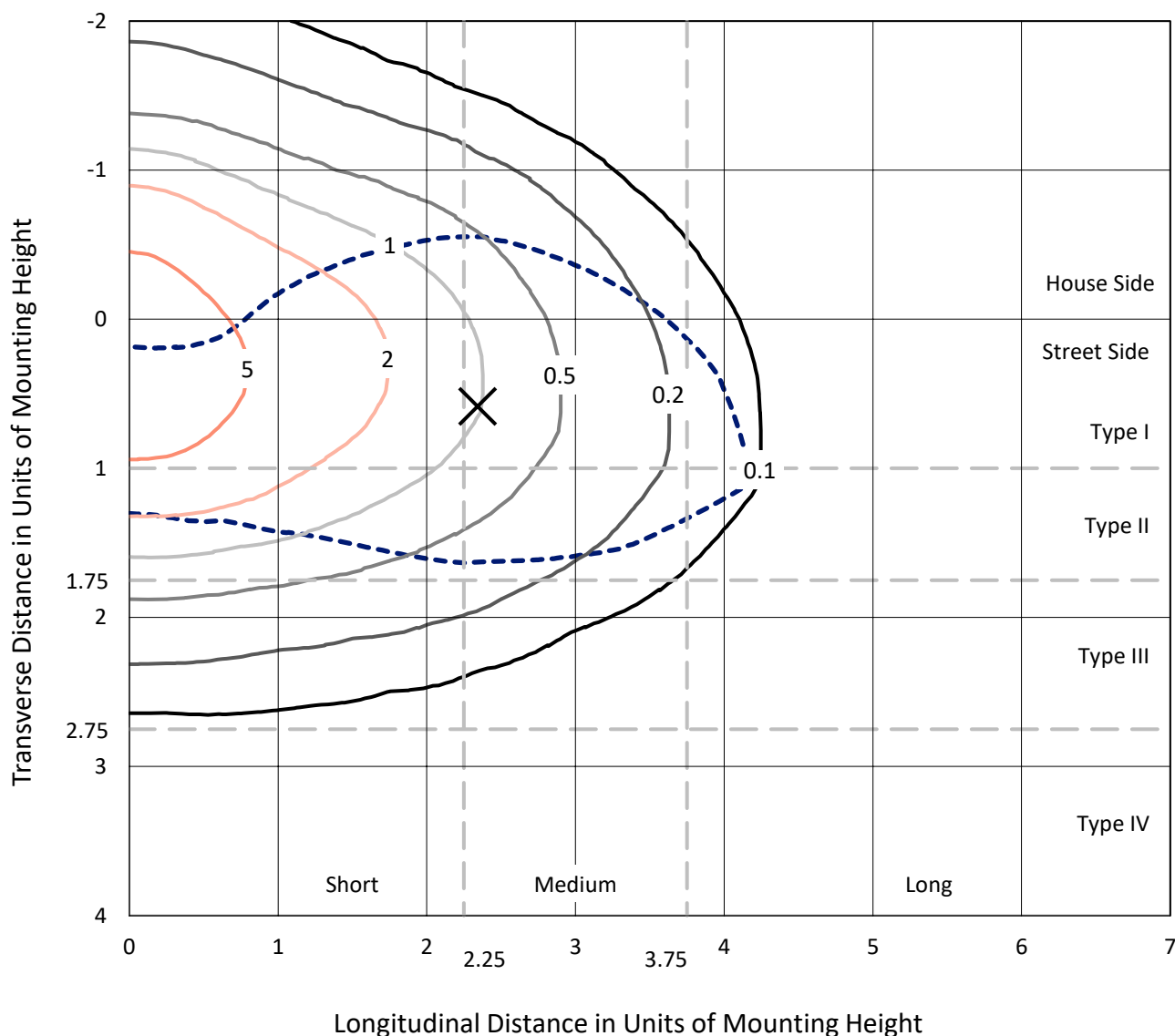
Input Watts (W): 170.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

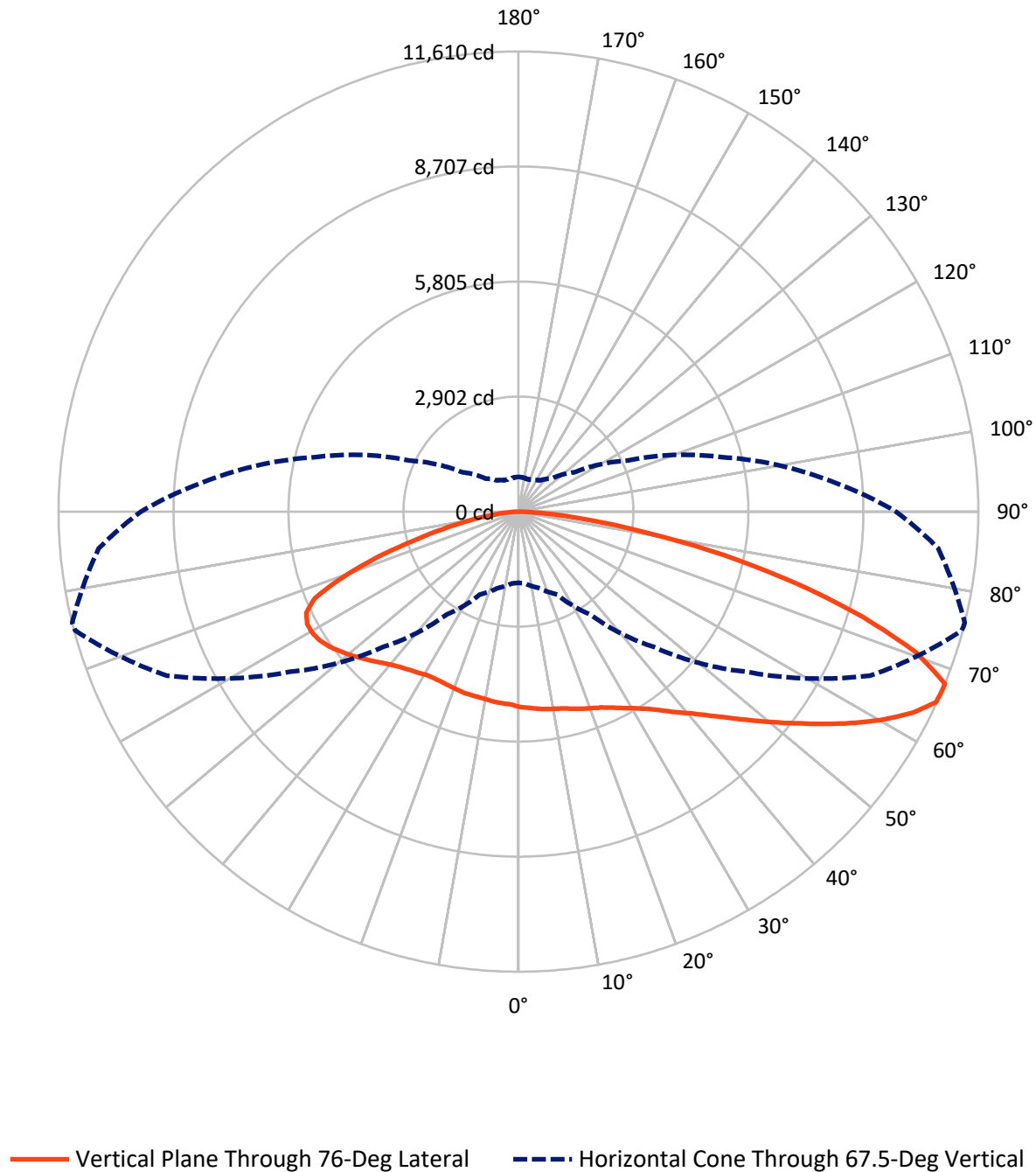
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 8.9 fc
 Type II - Medium - N/A

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Luminous Intensity Polar Plot



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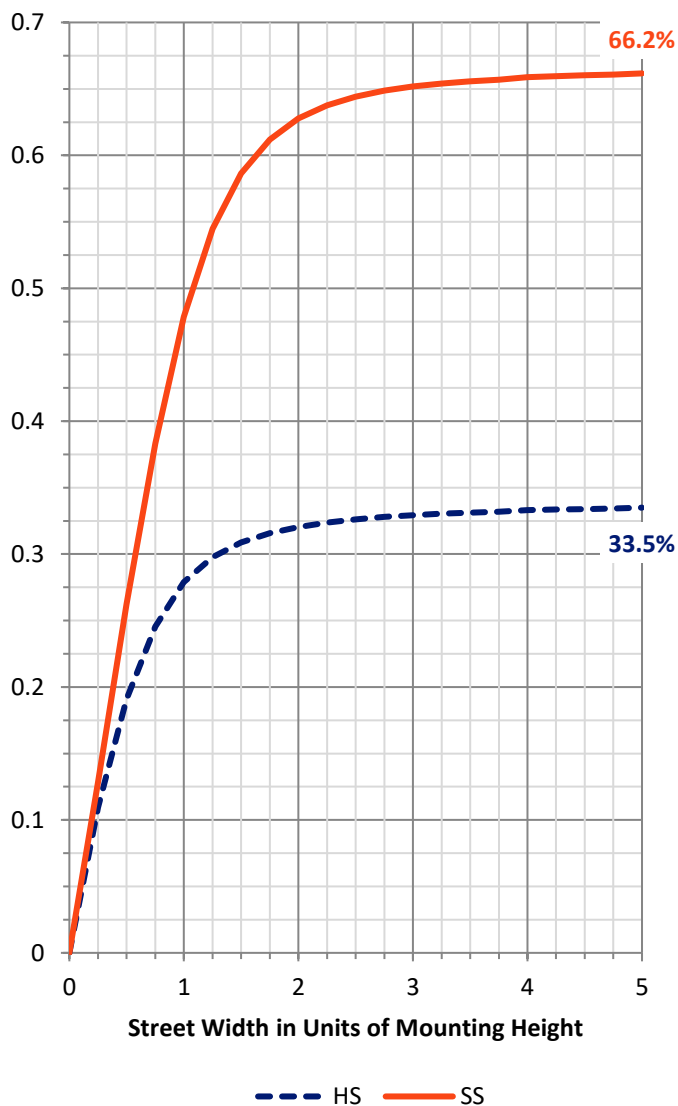
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	8254.0	0.0	8254.0
	% Fixture	33.8	0.0	33.8
Street Side	Lumens	16173.0	0.0	16173.0
	% Fixture	66.2	0.0	66.2
Total	Lumens	24427.0	0.0	24427.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	475.8	1.9
10°-20°	1454.6	6.0
20°-30°	2471.4	10.1
30°-40°	3516.5	14.4
40°-50°	4441.1	18.2
50°-60°	4808.4	19.7
60°-70°	4472.3	18.3
70°-80°	2402.0	9.8
80°-90°	384.9	1.6
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°	24427.0	100.0
0°-180°	24427.0	100.0

Coefficient of Utilization



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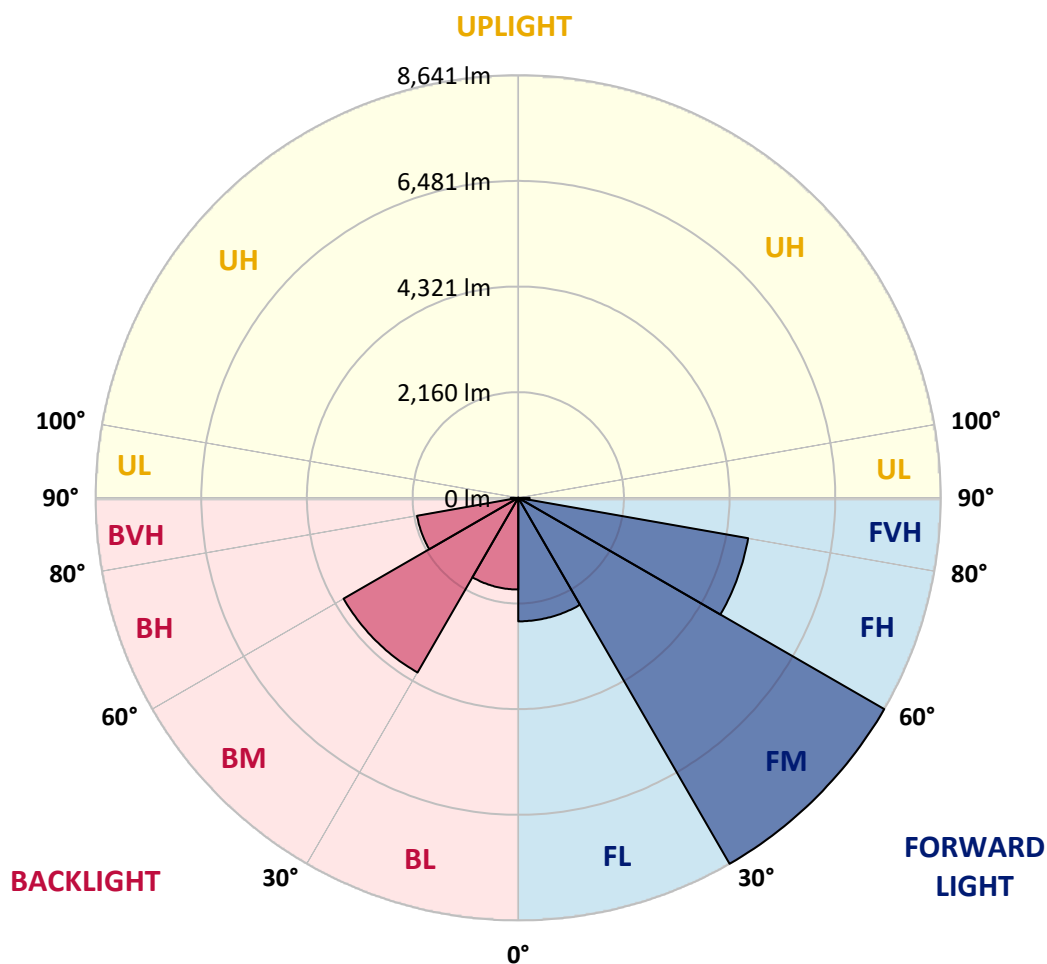
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	2526.0	10.3			
FM	(30°-60°)	8641.3	35.4			
FH	(60°-80°)	4772.8	19.5			G2/5000
FVH	(80°-90°)	232.8	1.0			G3/500
BL	(0°-30°)	1875.7	7.7	B3/2500		
BM	(30°-60°)	4124.6	16.9	B3/5000		
BH	(60°-80°)	2101.5	8.6	B3/2500		G3/2500
BVH	(80°-90°)	152.1	0.6			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 Medium



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	76°	85°
0°	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2
2.5°	5083.9	5074.8	5038.5	5043.0	5043.0	5038.5	4984.1	4961.4	4961.4	4956.9	4907.0
5°	5265.3	5251.7	5210.8	5201.8	5183.6	5161.0	5074.8	5024.9	5002.2	4997.7	4929.7
7.5°	5478.4	5460.3	5410.4	5383.2	5337.8	5278.9	5170.0	5092.9	5038.5	5034.0	4938.7
10°	5691.6	5673.4	5614.5	5564.6	5501.1	5405.9	5265.3	5151.9	5065.7	5056.6	4943.3
12.5°	5945.5	5927.4	5854.8	5791.3	5696.1	5569.1	5383.2	5229.0	5111.1	5097.5	4956.9
15°	6213.1	6185.9	6113.3	6040.8	5922.9	5759.6	5537.4	5333.3	5183.6	5161.0	4997.7
17.5°	6435.3	6399.0	6340.1	6267.5	6136.0	5945.5	5691.6	5437.6	5251.7	5233.5	5038.5
20°	6625.8	6598.6	6535.1	6467.1	6326.5	6117.9	5836.7	5541.9	5315.1	5292.5	5070.3
22.5°	6807.2	6770.9	6734.6	6684.8	6530.6	6299.3	6004.5	5668.9	5396.8	5369.6	5111.1
25°	7015.8	6975.0	6961.4	6934.2	6752.8	6517.0	6208.6	5827.6	5510.2	5478.4	5183.6
27.5°	7274.3	7229.0	7201.8	7201.8	6984.1	6739.2	6426.3	6013.6	5641.7	5614.5	5274.3
30°	7546.4	7492.0	7451.2	7451.2	7206.3	6961.4	6639.4	6199.5	5791.3	5759.6	5392.2
32.5°	7786.8	7732.4	7687.0	7682.5	7428.5	7183.6	6861.6	6403.6	5972.7	5931.9	5537.4
35°	7972.7	7922.8	7882.0	7891.1	7650.7	7410.4	7111.1	6675.7	6199.5	6154.1	5727.8
37.5°	8086.1	8068.0	8045.3	8077.0	7854.8	7628.1	7369.6	6938.7	6458.0	6417.2	5963.7
40°	8145.1	8131.5	8222.2	8263.0	8027.1	7823.1	7628.1	7210.8	6739.2	6693.8	6235.8
42.5°	8231.2	8344.6	8380.9	8371.8	8154.1	7972.7	7863.9	7505.6	7070.2	7029.4	6562.3
45°	7922.8	7895.6	8095.2	8204.0	8163.2	8068.0	8086.1	7859.3	7455.7	7414.9	6938.7
47.5°	7510.1	7473.9	7587.2	7854.8	8013.5	8104.2	8285.6	8226.7	7900.2	7863.9	7378.6
50°	6639.4	6689.3	7111.1	7469.3	7782.2	8095.2	8453.4	8621.2	8390.0	8353.7	7850.3
52.5°	5673.4	5723.3	6163.2	6988.6	7501.1	8027.1	8575.9	9015.8	8920.6	8879.7	8353.7
55°	4970.5	5079.3	5578.2	6176.8	7102.0	7814.0	8648.5	9419.4	9492.0	9455.7	8902.4
57.5°	4272.1	4353.7	4730.1	5260.7	6557.8	7442.1	8643.9	9795.8	10090.6	10054.3	9460.2
60°	3451.2	3555.5	3854.8	4426.3	5832.2	6997.7	8516.9	10090.6	10666.6	10639.4	9999.9
62.5°	2888.9	2920.6	3133.8	3628.1	4897.9	6435.3	8231.2	10249.3	11188.1	11170.0	10485.2
65°	2326.5	2331.0	2526.1	2938.8	3995.4	5736.9	7746.0	10190.4	11582.7	11591.7	10834.4
67.5°	1795.9	1818.6	1995.4	2308.4	3174.6	4829.9	7052.1	9791.3	11587.2	11609.9	10634.8
70°	1242.6	1260.8	1528.3	1832.2	2453.5	3850.3	6113.3	8734.6	10634.8	10653.0	9532.8
72.5°	875.3	884.3	1170.1	1464.8	1918.4	2902.5	4612.2	7224.4	9065.7	9079.3	8018.1
75°	653.1	662.1	825.4	1111.1	1469.4	2009.1	3151.9	5532.8	7242.6	7242.6	6331.0
77.5°	462.6	467.1	535.1	766.4	979.6	1356.0	1895.7	3623.6	5315.1	5324.2	4612.2
80°	312.9	317.5	349.2	517.0	612.2	734.7	1029.5	1900.2	3351.4	3365.1	2929.7
82.5°	163.3	172.3	195.0	263.0	308.4	408.2	530.6	966.0	1854.9	1891.1	1759.6
85°	63.5	63.5	72.6	86.2	113.4	158.7	244.9	367.3	839.0	866.2	775.5
87.5°	22.7	22.7	27.2	27.2	31.7	36.3	40.8	54.4	95.2	95.2	90.7
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°	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2	4934.2
2.5°	4888.8	4888.8	4866.2	4875.2	4870.7	4861.6	4852.6	4866.2	4852.6	4820.8	4816.3
5°	4897.9	4888.8	4852.6	4848.0	4834.4	4816.3	4793.6	4802.7	4780.0	4752.8	4748.3
7.5°	4902.5	4884.3	4834.4	4816.3	4789.1	4752.8	4716.5	4716.5	4684.8	4657.6	4653.0
10°	4893.4	4870.7	4802.7	4766.4	4716.5	4662.1	4612.2	4598.6	4562.3	4530.6	4530.6
12.5°	4897.9	4866.2	4780.0	4721.0	4653.0	4585.0	4521.5	4503.4	4471.6	4439.9	4435.3
15°	4925.1	4879.8	4770.9	4693.8	4594.1	4517.0	4448.9	4435.3	4408.1	4385.5	4385.5
17.5°	4952.3	4893.4	4757.3	4648.5	4526.0	4439.9	4376.4	4376.4	4358.2	4344.6	4344.6
20°	4965.9	4897.9	4730.1	4585.0	4444.4	4353.7	4294.7	4303.8	4299.3	4294.7	4294.7
22.5°	4997.7	4907.0	4707.4	4526.0	4358.2	4263.0	4208.6	4222.2	4217.7	4217.7	4222.2
25°	5047.6	4929.7	4689.3	4471.6	4276.6	4172.3	4113.3	4122.4	4122.4	4122.4	4122.4
27.5°	5115.6	4975.0	4684.8	4421.7	4195.0	4077.1	4004.5	4004.5	3986.4	3990.9	3995.4
30°	5219.9	5061.2	4693.8	4376.4	4108.8	3959.2	3873.0	3859.4	3854.8	3863.9	3868.4
32.5°	5346.9	5179.1	4748.3	4344.6	4018.1	3827.6	3718.8	3714.3	3700.7	3700.7	3700.7
35°	5505.6	5292.5	4798.1	4340.1	3927.4	3687.0	3569.1	3555.5	3523.8	3510.2	3510.2
37.5°	5709.7	5469.3	4857.1	4308.4	3850.3	3551.0	3410.4	3365.1	3328.8	3324.2	3324.2
40°	5959.1	5668.9	4943.3	4272.1	3768.7	3410.4	3224.5	3147.4	3151.9	3170.0	3170.0
42.5°	6253.9	5913.8	5052.1	4253.9	3650.8	3265.3	3006.8	2916.1	2947.8	2966.0	2970.5
45°	6598.6	6204.0	5174.6	4231.3	3541.9	3102.0	2775.5	2662.1	2675.7	2680.3	2684.8
47.5°	6997.7	6526.0	5301.5	4213.1	3419.5	2897.9	2521.5	2371.9	2367.3	2340.1	2349.2
50°	7414.9	6866.2	5433.1	4181.4	3269.8	2657.6	2253.9	2077.1	2040.8	2000.0	2004.5
52.5°	7859.3	7215.4	5555.5	4131.5	3083.9	2412.7	2000.0	1809.5	1736.9	1691.6	1700.7
55°	8349.1	7573.6	5673.4	4054.4	2888.9	2167.8	1773.2	1578.2	1487.5	1451.2	1455.8
57.5°	8798.1	7918.3	5759.6	3959.2	2675.7	1945.6	1573.7	1383.2	1324.3	1319.7	1324.3
60°	9233.5	8208.5	5795.9	3827.6	2458.0	1741.5	1387.7	1242.6	1201.8	1224.5	1229.0
62.5°	9600.8	8394.5	5777.7	3650.8	2235.8	1546.5	1238.1	1133.8	1106.6	1151.9	1156.5
65°	9814.0	8453.4	5650.7	3396.8	1995.4	1356.0	1097.5	984.1	970.5	997.7	1011.3
67.5°	9532.8	8086.1	5306.1	3047.6	1727.9	1179.1	961.4	870.7	848.1	870.7	870.7
70°	8448.9	7006.7	4489.8	2494.3	1433.1	1006.8	834.5	771.0	752.8	771.0	766.4
72.5°	7038.5	5827.6	3537.4	1945.6	1129.2	848.1	725.6	666.7	648.5	630.4	621.3
75°	5460.3	4426.3	2566.9	1428.6	852.6	680.3	607.7	553.3	507.9	526.1	517.0
77.5°	4000.0	3106.6	1818.6	988.7	612.2	526.1	476.2	435.4	403.6	439.9	435.4
80°	2575.9	2009.1	1215.4	662.1	421.8	367.3	349.2	326.5	358.3	467.1	476.2
82.5°	1573.7	1274.4	725.6	430.8	276.6	244.9	226.8	226.8	367.3	403.6	408.2
85°	702.9	675.7	394.6	222.2	154.2	140.6	127.0	163.3	149.7	108.8	113.4
87.5°	113.4	117.9	86.2	77.1	59.0	59.0	45.4	31.7	22.7	13.6	13.6
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)