

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: P157819

Luminaire Tested: **VST-E08-LED-E-U-5XQ-7030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P157819
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33710)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: VST-E08-LED-E-U-5XQ-7030
Description: VENTUS LED SITE/ROADWAY LUMINAIRE
(8) LIGHTBARS WITH AccuLED OPTICS - TYPE 5 SQUARE EXTRA WIDE
Light Source: (168) 3000K CCT, 70 CRI LEDs
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 23108.4 lumens
Efficiency: N/A
Efficacy: 118.8 lumens/watt
Luminous Opening: Rectangular (W 1.33' x L: 1' x H: 0')
IES Classification: Type V - Short - Non-Cutoff
BUG Rating: B5 - U2 - G4

Input Watts (W): 194.5
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: 28.75 FT

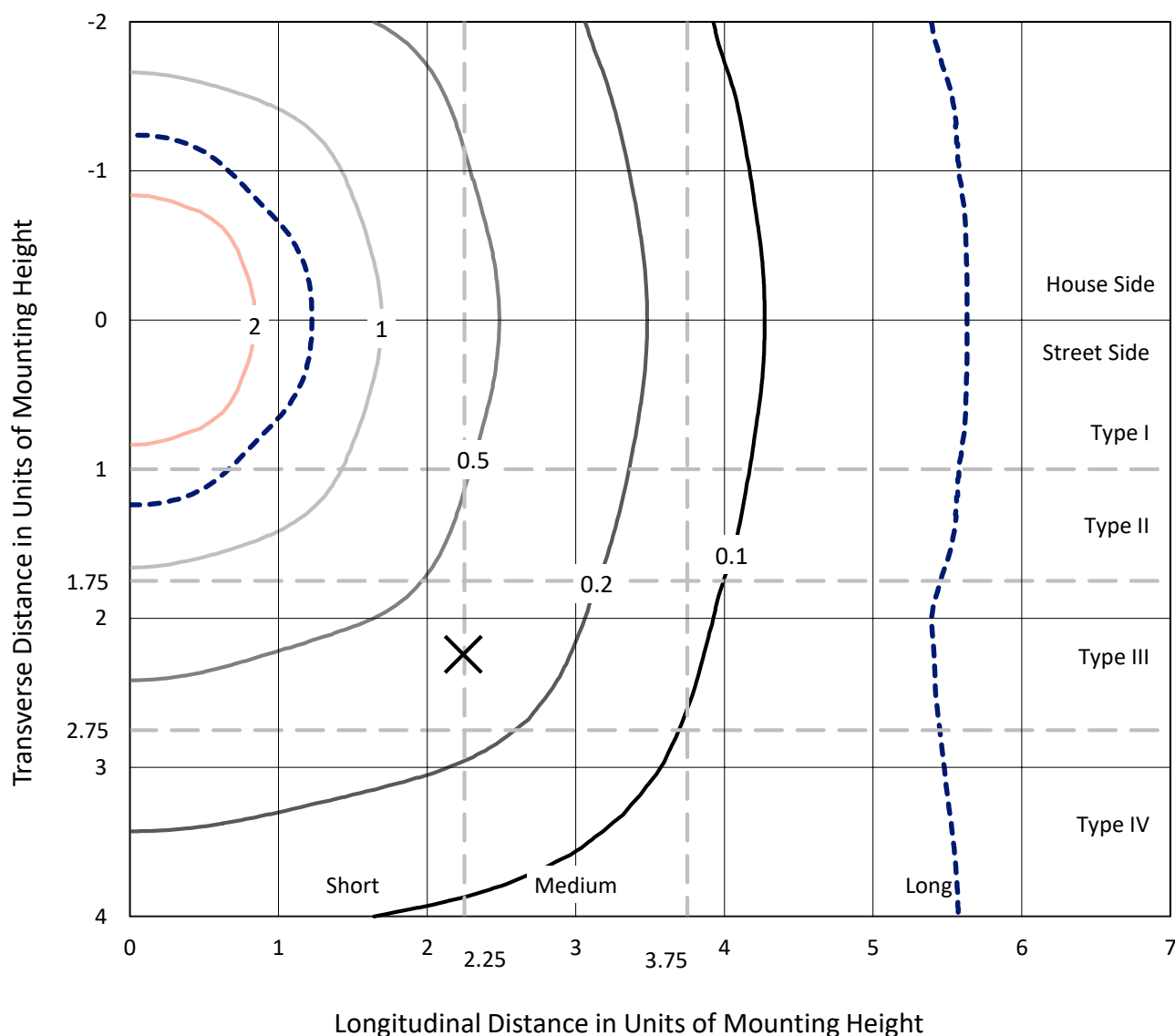


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Iso-Footcandle Lines of Horizontal Illumination

× Max cd
 - - - 1/2 Max cd

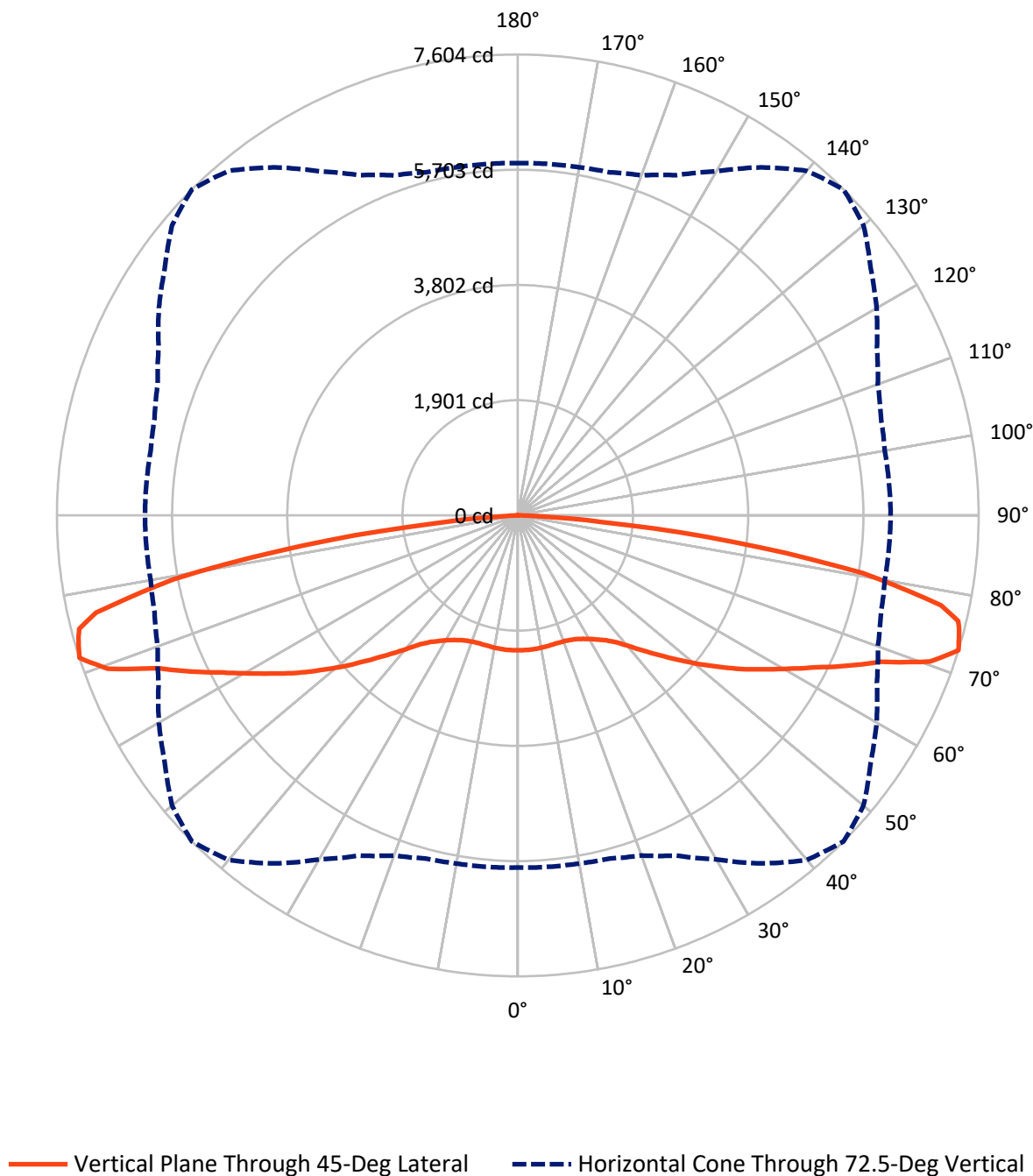


Based on 25 foot mounting height. Maximum calculated value = 3.6 fc
 Type V - Short - Non-Cutoff

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Luminous Intensity Polar Plot



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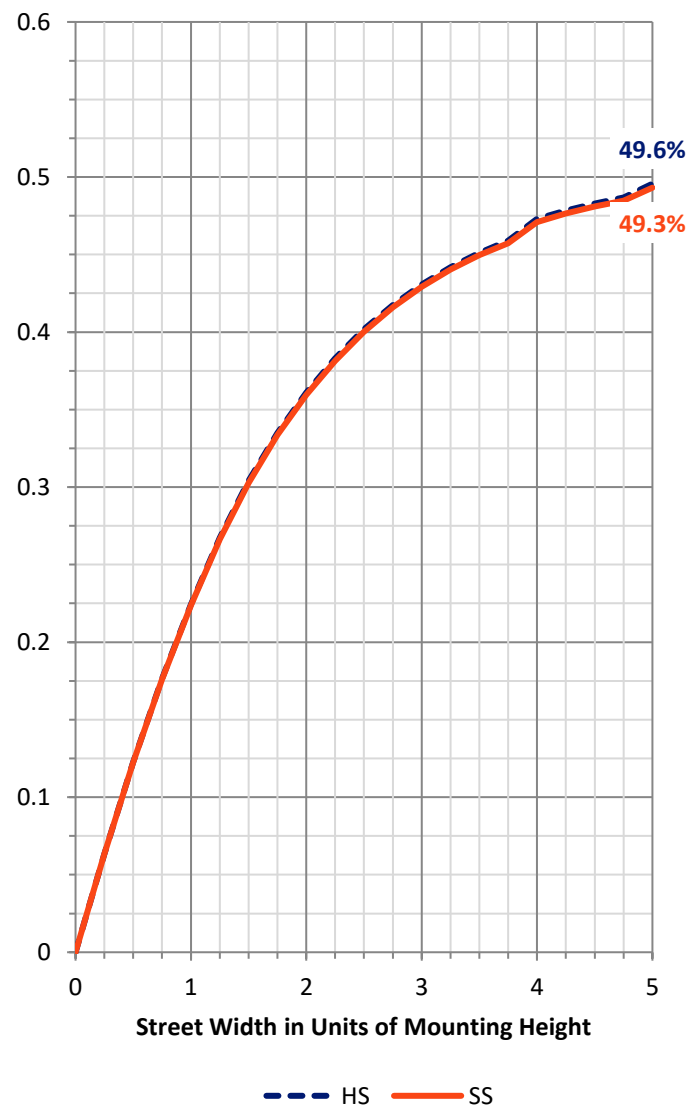
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	11548.5	5.7	11554.2
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	11548.5	5.7	11554.2
	% Fixture	50.0	0.0	50.0
Total	Lumens	23097.1	11.4	23108.4
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	212.2	0.9
10°-20°	626.8	2.7
20°-30°	1048.1	4.5
30°-40°	1593.0	6.9
40°-50°	2523.1	10.9
50°-60°	3859.4	16.7
60°-70°	5523.5	23.9
70°-80°	6320.1	27.3
80°-90°	1391.0	6.0
90°-100°	1.2	0.0
100°-110°	2.4	0.0
110°-120°	1.7	0.0
120°-130°	1.8	0.0
130°-140°	1.7	0.0
140°-150°	1.3	0.0
150°-160°	0.9	0.0
160°-170°	0.4	0.0
170°-180°	0.0	0.0
0°-90°	23097.1	100.0
0°-180°	23108.4	100.0

Coefficient of Utilization



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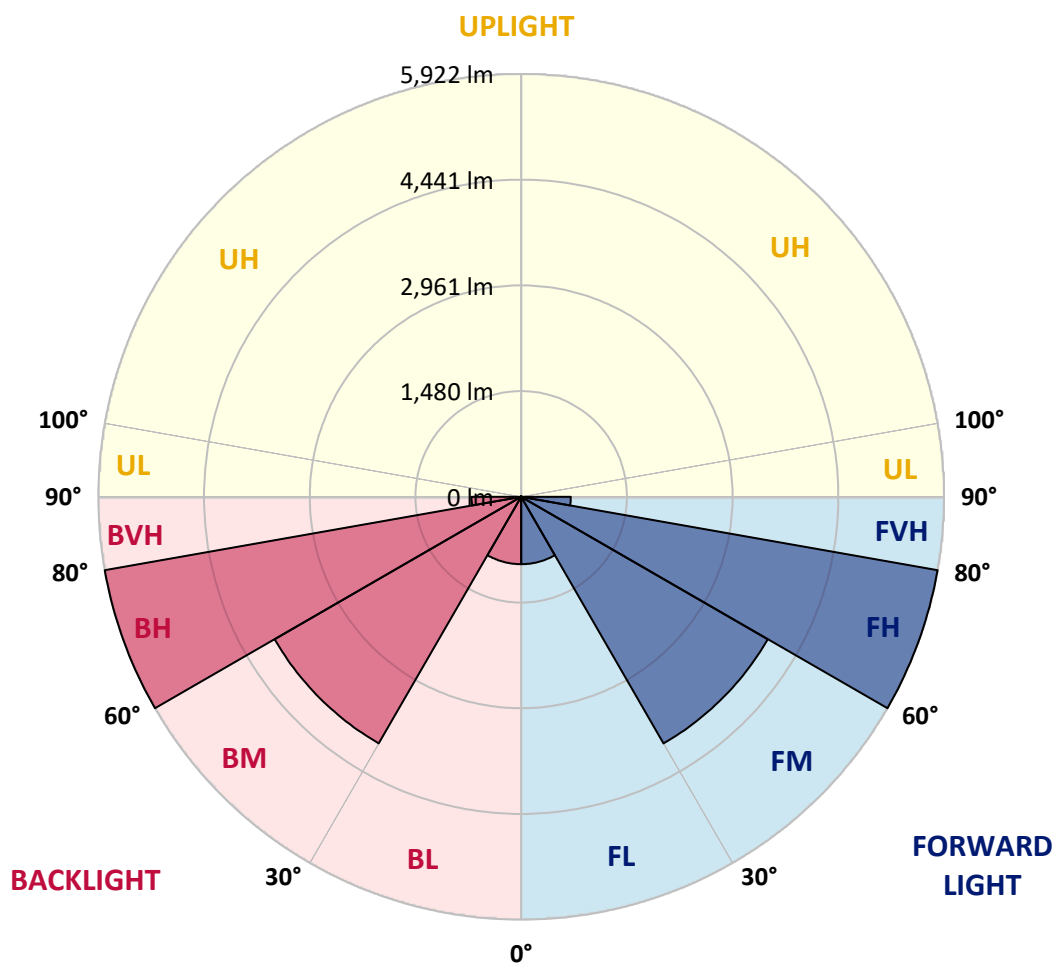
CATALOG NUMBER: VST-E08-LED-E-U-5XQ-7030

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	943.5	4.1			
FM	(30°-60°)	3987.7	17.3			
FH	(60°-80°)	5921.8	25.6			G3/7500
FVH	(80°-90°)	695.5	3.0			G4/750
BL	(0°-30°)	943.5	4.1	B2/1000		
BM	(30°-60°)	3987.7	17.3	B3/5000		
BH	(60°-80°)	5921.8	25.6	B5		G3/7500
BVH	(80°-90°)	695.5	3.0			G4/750
UL	(90°-100°)	1.2	0.0		U1/10	
UH	(100°-180°)	5.7	0.0		U1/10	

BUG Rating: B5-U2-G4

Type V Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2
2.5°	2225.7	2222.7	2224.2	2227.1	2225.7	2225.7	2224.2	2224.2	2227.1	2224.2	2225.7
5°	2227.1	2224.2	2225.7	2227.1	2225.7	2227.1	2225.7	2225.7	2225.7	2224.2	2227.1
7.5°	2221.3	2221.3	2222.7	2222.7	2221.3	2222.7	2222.7	2222.7	2221.3	2221.3	2224.2
10°	2218.3	2216.9	2216.9	2218.3	2216.9	2216.9	2218.3	2218.3	2215.4	2215.4	2218.3
12.5°	2214.0	2212.5	2212.5	2212.5	2211.0	2211.0	2212.5	2212.5	2211.0	2209.6	2214.0
15°	2211.0	2209.6	2209.6	2209.6	2206.7	2208.1	2208.1	2208.1	2206.7	2205.2	2209.6
17.5°	2209.6	2208.1	2208.1	2208.1	2206.7	2206.7	2206.7	2206.7	2205.2	2205.2	2208.1
20°	2212.5	2212.5	2212.5	2212.5	2211.0	2211.0	2211.0	2212.5	2212.5	2212.5	2215.4
22.5°	2219.8	2219.8	2221.3	2222.7	2222.7	2225.7	2227.1	2228.6	2228.6	2230.0	2233.0
25°	2238.8	2238.8	2240.3	2241.7	2246.1	2249.0	2254.9	2257.8	2259.3	2259.3	2260.7
27.5°	2273.9	2275.3	2278.3	2281.2	2287.0	2291.4	2297.3	2303.1	2304.6	2306.0	2307.5
30°	2317.7	2319.2	2325.0	2327.9	2335.3	2344.0	2351.3	2357.2	2361.6	2364.5	2363.0
32.5°	2380.6	2383.5	2390.8	2395.2	2405.4	2414.2	2424.4	2433.2	2437.5	2441.9	2440.5
35°	2468.2	2475.5	2482.9	2487.2	2497.5	2504.8	2517.9	2526.7	2535.5	2532.5	2534.0
37.5°	2598.3	2604.1	2605.6	2608.5	2618.8	2624.6	2639.2	2650.9	2655.3	2658.2	2659.7
40°	2773.7	2773.7	2781.0	2775.1	2788.3	2789.7	2807.3	2823.3	2827.7	2839.4	2830.7
42.5°	2978.3	2976.8	2981.2	2976.8	2976.8	2991.4	3006.0	3035.2	3038.2	3052.8	3044.0
45°	3200.4	3200.4	3196.0	3197.5	3200.4	3216.5	3234.0	3266.1	3280.8	3289.5	3283.7
47.5°	3441.5	3435.7	3434.2	3432.7	3441.5	3459.0	3485.3	3516.0	3552.6	3555.5	3552.6
50°	3685.6	3684.1	3673.9	3682.6	3688.5	3697.2	3746.9	3787.8	3825.8	3849.2	3841.9
52.5°	3942.8	3929.6	3929.6	3929.6	3944.2	3972.0	4015.8	4071.4	4122.5	4147.3	4143.0
55°	4202.9	4198.5	4185.3	4179.5	4198.5	4237.9	4300.8	4368.0	4435.2	4473.2	4458.6
57.5°	4441.1	4433.8	4435.2	4436.7	4458.6	4511.2	4584.3	4673.4	4746.5	4787.4	4777.2
60°	4628.1	4619.4	4635.4	4639.8	4679.3	4767.0	4883.9	4996.4	5092.8	5133.8	5117.7
62.5°	4840.0	4834.2	4844.4	4842.9	4885.3	4983.2	5139.6	5319.4	5465.5	5518.1	5494.7
65°	5182.0	5164.4	5160.1	5144.0	5171.8	5247.7	5404.1	5613.1	5846.9	5981.3	5949.2
67.5°	5591.2	5586.8	5572.2	5563.4	5573.6	5668.6	5819.1	6020.8	6259.0	6444.6	6485.5
70°	5861.5	5867.4	5882.0	5903.9	5988.7	6172.8	6447.5	6752.9	7080.3	7219.1	7194.3
72.5°	5810.4	5819.1	5830.8	5858.6	5969.7	6190.3	6552.7	7008.7	7419.3	7603.5	7445.6
75°	5560.5	5567.8	5594.1	5636.5	5772.4	6039.8	6430.0	6913.7	7337.5	7521.6	7356.5
76°	5329.6	5353.0	5401.2	5450.9	5614.5	5905.4	6321.8	6837.7	7286.3	7473.4	7314.1
77.5°	4806.4	4826.9	4866.3	4952.6	5138.1	5510.8	5997.4	6504.5	6972.2	7140.2	7005.8
80°	3616.9	3634.4	3670.9	3774.7	3935.4	4166.3	4543.4	5038.8	5551.7	5772.4	5684.7
82.5°	1527.1	1547.6	1692.3	1842.8	2019.6	2269.5	2515.0	2953.4	3330.4	3581.8	3447.3
85°	168.1	207.5	255.7	347.8	426.7	568.5	707.3	973.3	1230.5	1386.8	1226.1
87.5°	29.2	33.6	48.2	61.4	68.7	78.9	95.0	133.0	181.2	156.4	159.3
90°	4.4	4.4	4.4	4.4	4.4	4.4	4.4	2.9	2.9	2.9	2.9
92.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.5	1.5
95°	0.0	0.0	0.0	0.0	0.0	0.0	1.5	1.5	1.5	1.5	1.5
97.5°	0.0	0.0	0.0	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
100°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	2.9	2.9	2.9
102.5°	1.5	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9	2.9
105°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
107.5°	1.5	1.5	1.5	1.5	2.9	2.9	1.5	1.5	1.5	2.9	1.5



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
110°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
112.5°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
115°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
117.5°	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
120°	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
122.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
125°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
127.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
130°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5
132.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
135°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5
137.5°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5
140°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5
142.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
145°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	1.5
147.5°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	1.5	1.5
150°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	0.0	0.0	0.0
152.5°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	0.0
155°	2.9	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	1.5
157.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	0.0	0.0
160°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	0.0	0.0
162.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	0.0	0.0
165°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	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):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2	2224.2
2.5°	2224.2	2224.2	2227.1	2225.7	2225.7	2227.1	2230.0	2228.6
5°	2225.7	2227.1	2224.2	2225.7	2227.1	2227.1	2228.6	2227.1
7.5°	2222.7	2222.7	2222.7	2224.2	2225.7	2224.2	2225.7	2225.7
10°	2216.9	2218.3	2216.9	2219.8	2221.3	2221.3	2222.7	2222.7
12.5°	2212.5	2212.5	2212.5	2215.4	2216.9	2216.9	2218.3	2216.9
15°	2208.1	2208.1	2206.7	2209.6	2212.5	2212.5	2214.0	2214.0
17.5°	2206.7	2206.7	2205.2	2208.1	2211.0	2211.0	2212.5	2212.5
20°	2211.0	2212.5	2209.6	2212.5	2215.4	2216.9	2216.9	2216.9
22.5°	2228.6	2227.1	2222.7	2224.2	2225.7	2225.7	2225.7	2225.7
25°	2254.9	2252.0	2247.6	2246.1	2244.6	2243.2	2243.2	2243.2
27.5°	2300.2	2295.8	2288.5	2287.0	2285.6	2282.6	2282.6	2282.6
30°	2354.3	2348.4	2339.6	2336.7	2332.3	2329.4	2327.9	2326.5
32.5°	2431.7	2420.0	2409.8	2402.5	2398.1	2389.3	2387.9	2384.9
35°	2520.8	2512.1	2497.5	2493.1	2485.8	2481.4	2479.9	2472.6
37.5°	2643.6	2633.4	2620.2	2617.3	2615.8	2611.5	2611.5	2610.0
40°	2814.6	2804.4	2792.7	2781.0	2783.9	2785.4	2785.4	2779.5
42.5°	3023.6	3007.5	2984.1	2991.4	2987.0	2981.2	2992.9	2985.6
45°	3261.8	3239.8	3222.3	3215.0	3215.0	3207.7	3219.4	3219.4
47.5°	3526.3	3491.2	3459.0	3460.5	3448.8	3451.7	3459.0	3469.3
50°	3805.4	3758.6	3727.9	3713.3	3701.6	3706.0	3719.2	3722.1
52.5°	4094.7	4037.7	3996.8	3974.9	3960.3	3966.1	3976.4	3985.1
55°	4395.8	4332.9	4271.6	4248.2	4230.6	4242.3	4243.8	4255.5
57.5°	4710.0	4623.7	4552.1	4517.1	4499.5	4511.2	4520.0	4531.7
60°	5027.1	4927.7	4842.9	4802.0	4777.2	4793.3	4813.7	4819.6
62.5°	5395.3	5258.0	5163.0	5104.5	5092.8	5108.9	5114.8	5132.3
65°	5830.8	5665.7	5534.2	5462.6	5459.6	5468.4	5481.6	5485.9
67.5°	6327.7	6143.6	5966.7	5895.1	5867.4	5893.7	5906.8	5924.4
70°	7029.1	6776.3	6520.6	6361.3	6294.1	6273.6	6279.5	6298.5
72.5°	7108.1	6836.2	6538.1	6321.8	6203.5	6149.4	6147.9	6150.9
75°	6935.6	6501.6	6291.2	6042.7	5874.7	5787.0	5775.3	5773.8
76°	6849.4	6336.5	6032.5	5835.2	5633.5	5544.4	5531.2	5523.9
77.5°	6485.5	5934.6	5477.2	5357.3	5164.4	5051.9	5075.3	5056.3
80°	5199.5	4653.0	4221.9	3884.3	3894.5	3812.7	3779.1	3768.8
82.5°	3064.5	2615.8	2139.4	1860.3	1594.3	1524.2	1312.3	1264.1
85°	979.1	694.1	420.9	305.4	207.5	173.9	135.9	124.2
87.5°	130.1	102.3	83.3	80.4	73.1	62.8	40.9	29.2
90°	1.5	1.5	1.5	0.0	0.0	0.0	0.0	0.0
92.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
95°	1.5	1.5	1.5	1.5	0.0	0.0	0.0	0.0
97.5°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
100°	2.9	1.5	1.5	1.5	1.5	1.5	1.5	1.5
102.5°	2.9	2.9	2.9	2.9	1.5	1.5	1.5	1.5
105°	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9
107.5°	2.9	2.9	2.9	2.9	2.9	2.9	2.9	2.9



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CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
110°	1.5	1.5	1.5	1.5	1.5	2.9	2.9	2.9
112.5°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	2.9
115°	1.5	1.5	1.5	1.5	1.5	1.5	1.5	2.9
117.5°	1.5	1.5	1.5	1.5	1.5	2.9	2.9	2.9
120°	1.5	1.5	1.5	1.5	1.5	2.9	2.9	2.9
122.5°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
125°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
127.5°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
130°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
132.5°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
135°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
137.5°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
140°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
142.5°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
145°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
147.5°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
150°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
152.5°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
155°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
157.5°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
160°	1.5	1.5	1.5	1.5	2.9	2.9	2.9	2.9
162.5°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
165°	1.5	1.5	1.5	2.9	2.9	2.9	2.9	2.9
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)