

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: P266490

Luminaire Tested: **UTLD-AF24-80-D-U-T4W-CL-7027**

Issue Date: 5/28/2020

Test Information

Test Method: LM-79-08
Report Number: P266490
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1710-388-47)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 5/28/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: UTLD-AF24-80-D-U-T4W-CL-7027
Description: TRADITIONAIRE LED DOWNLIGHT LUMINAIRE
(1) 70 CRI, 2700K, 1050mA LIGHT ENGINE WITH 24 LEDS AND TYPE IV WIDE OPTICS AND CLEAR LENS PANELS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6517.1 lumens
Efficiency: N/A
Efficacy: 78.5 lumens/watt
Luminous Opening: Rectangular w/ Sides (W: 1.21' x L: 1.21' x H: 0.96')
IES Classification: Type IV - Short - Non-Cutoff
BUG Rating: B2 - U2 - G2

Input Watts (W): 83
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

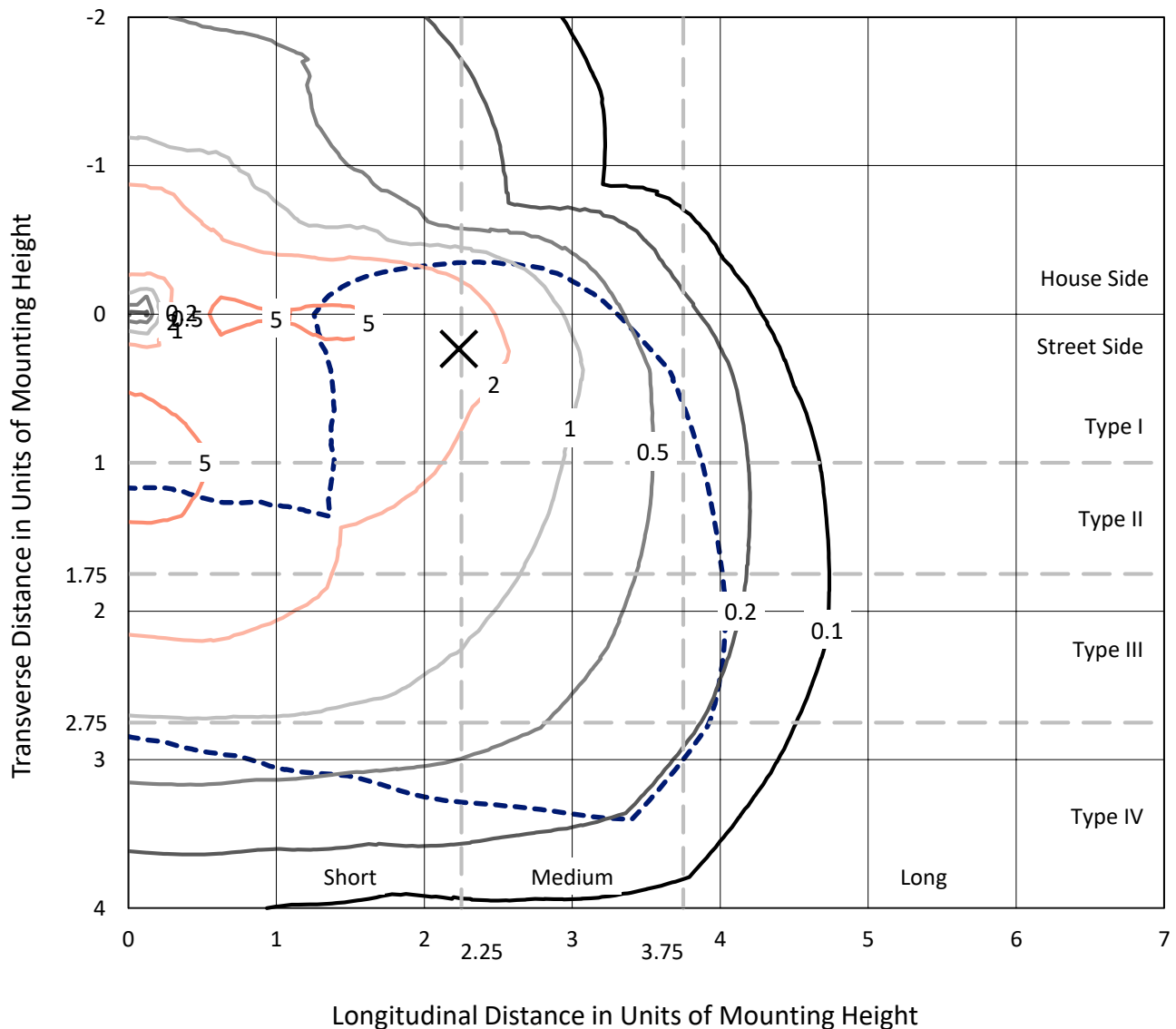


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Iso-Footcandle Lines of Horizontal Illumination

× Max cd
- - - 1/2 Max cd

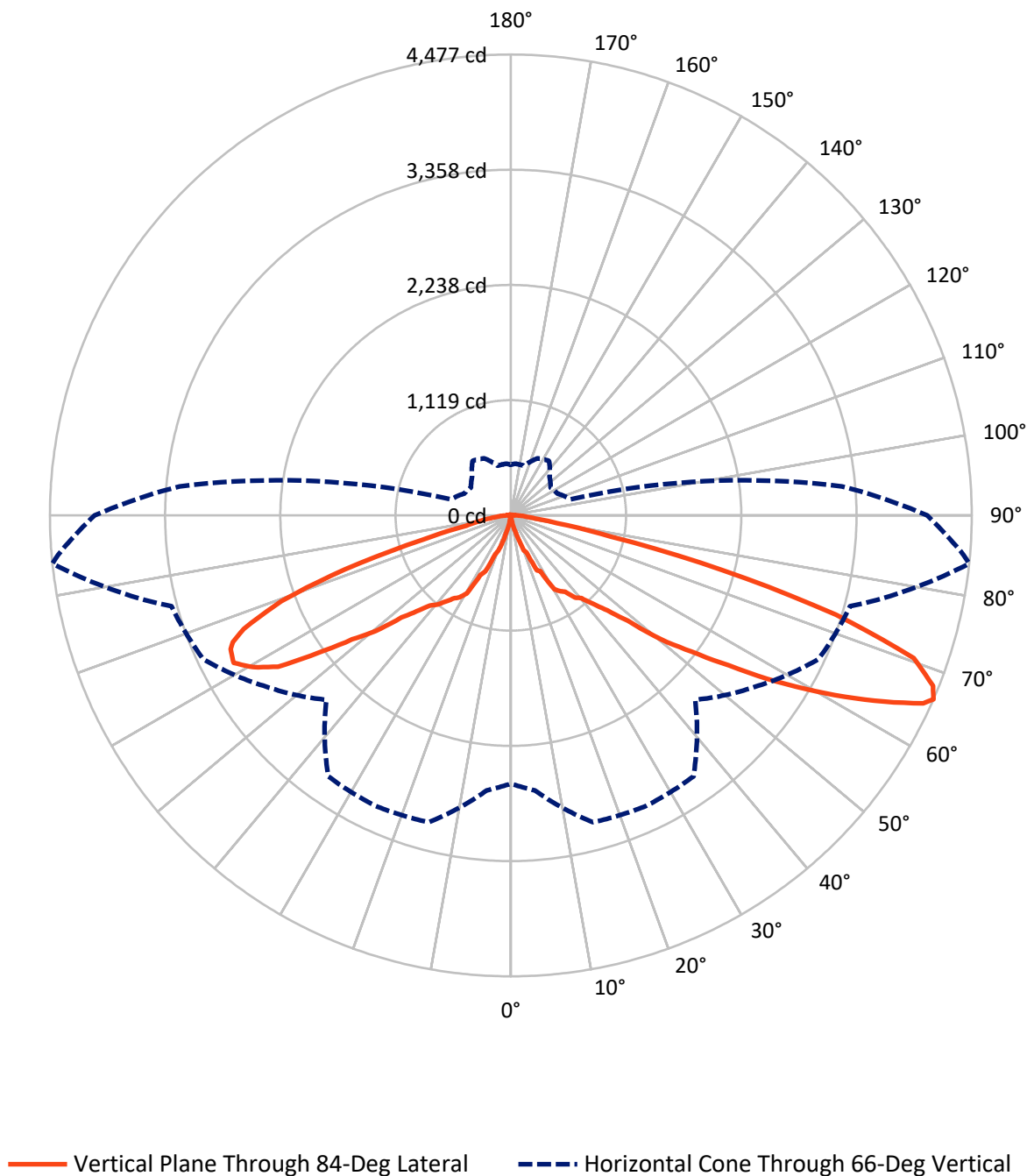


Based on 10 foot mounting height. Maximum calculated value = 7.3 fc
Type IV - Short - Non-Cutoff

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Luminous Intensity Polar Plot



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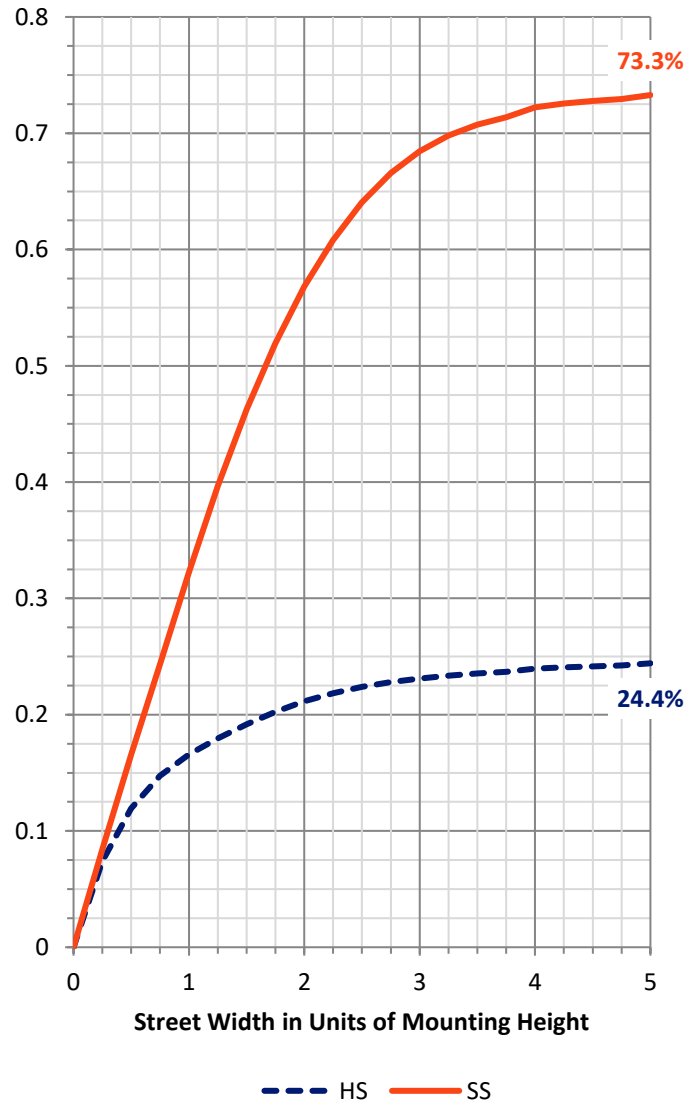
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1630.8	39.7	1670.5
	% Fixture	25.0	0.6	25.6
Street Side	Lumens	4809.3	37.3	4846.6
	% Fixture	73.8	0.6	74.4
Total	Lumens	6440.1	77.0	6517.1
	% Fixture	98.8	1.2	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	4.8	0.1
10°-20°	60.5	0.9
20°-30°	223.5	3.4
30°-40°	459.7	7.1
40°-50°	762.6	11.7
50°-60°	1329.7	20.4
60°-70°	1958.8	30.1
70°-80°	1429.6	21.9
80°-90°	210.9	3.2
90°-100°	39.3	0.6
100°-110°	18.0	0.3
110°-120°	8.5	0.1
120°-130°	5.9	0.1
130°-140°	3.5	0.1
140°-150°	1.6	0.0
150°-160°	0.2	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-90°	6440.1	98.8
0°-180°	6517.1	100.0

Coefficient of Utilization



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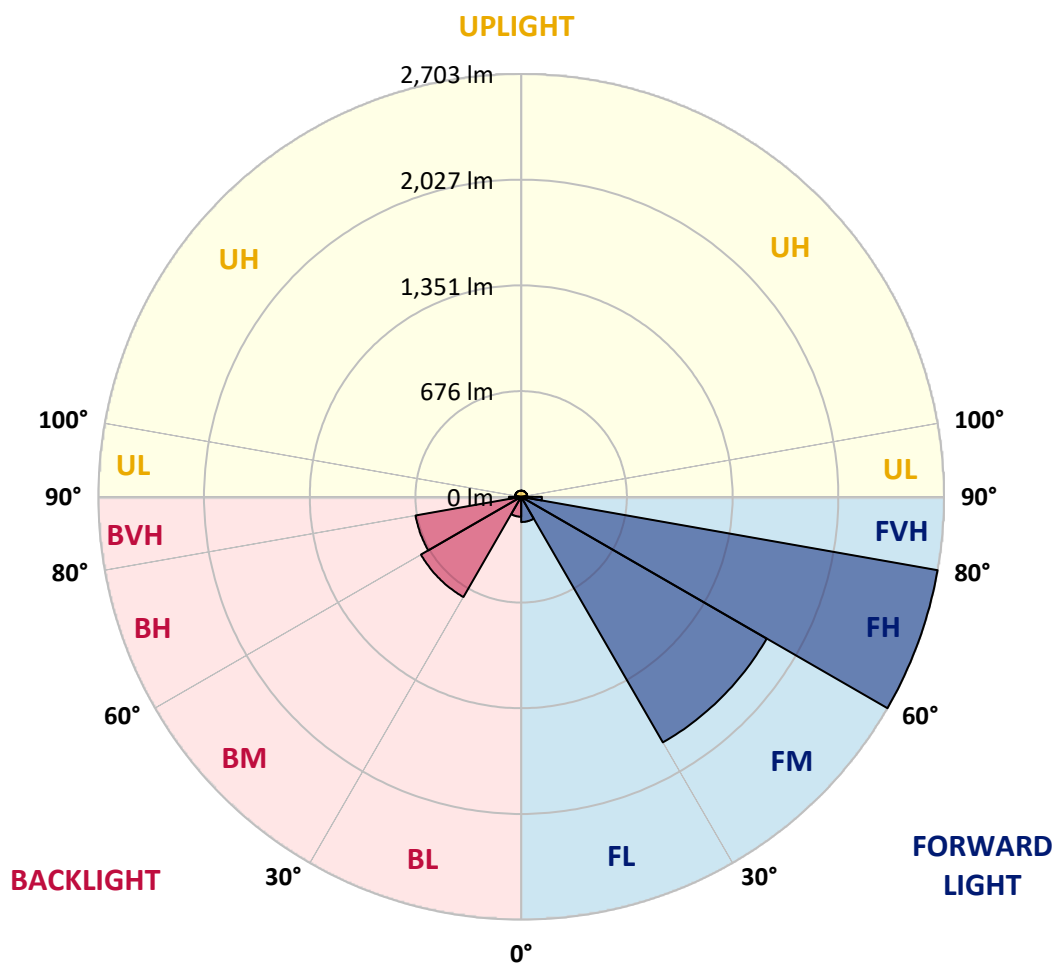
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	161.3	2.5			
FM	(30°-60°)	1812.5	27.8			
FH	(60°-80°)	2702.9	41.5			G2/5000
FVH	(80°-90°)	132.6	2.0			G2/225
BL	(0°-30°)	127.5	2.0	B1/500		
BM	(30°-60°)	739.5	11.3	B1/1000		
BH	(60°-80°)	685.5	10.5	B2/1000		G2/1000
BVH	(80°-90°)	78.3	1.2			G1/100
UL	(90°-100°)	39.3	0.6		U2/50	
UH	(100°-180°)	39.7	0.6		U2/50	

BUG Rating: B2-U2-G2

Type IV Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	84°	85°
0°	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2
2.5°	38.4	34.5	34.5	32.9	29.6	26.5	20.8	17.6	15.2	15.2	14.5
5°	73.8	77.8	89.8	82.6	68.1	89.0	40.1	26.5	16.9	14.5	14.5
7.5°	117.0	123.4	94.6	84.3	84.3	89.8	72.9	44.0	22.5	16.9	16.0
10°	245.2	231.8	161.2	163.5	138.7	96.9	66.6	58.5	34.5	27.3	24.9
12.5°	238.1	234.8	239.7	209.2	210.8	153.2	85.0	136.4	123.4	117.9	129.8
15°	307.0	303.8	243.7	248.6	225.2	234.1	197.2	196.4	190.0	159.4	153.2
17.5°	426.4	423.3	477.0	317.6	226.1	292.6	254.1	218.8	226.9	239.7	249.3
20°	425.6	420.9	443.4	380.8	385.6	302.2	271.0	398.5	364.0	365.6	344.7
22.5°	628.5	599.7	526.6	397.6	434.5	353.6	401.6	393.6	367.1	388.8	382.4
25°	610.0	621.3	596.5	588.4	442.5	506.6	441.7	454.5	561.3	590.0	590.8
27.5°	707.9	686.2	667.0	604.5	594.9	493.0	454.5	605.3	587.6	614.1	613.4
30°	844.1	837.0	832.2	671.8	643.7	543.6	612.5	618.2	713.6	833.7	858.6
32.5°	975.6	941.2	863.5	777.7	646.2	642.2	608.5	768.1	818.5	875.5	884.2
35°	1184.1	1183.2	1051.8	831.3	723.1	682.3	788.1	827.3	826.5	912.3	964.4
37.5°	1362.1	1371.0	1233.1	1003.8	748.0	689.4	822.6	892.2	895.5	1011.8	991.6
40°	1633.1	1609.9	1486.3	1198.5	854.6	735.2	901.9	912.3	978.1	1055.8	1084.8
42.5°	1825.4	1816.6	1776.6	1426.1	978.1	819.3	995.7	950.8	1035.7	1176.9	1207.3
45°	1945.6	1902.4	1941.6	1593.0	1176.2	999.8	1016.5	1076.7	1167.3	1316.3	1402.2
47.5°	2066.8	2099.6	2007.4	1718.8	1354.0	1083.0	1118.4	1308.3	1395.7	1529.6	1584.2
50°	2276.8	2241.5	2209.4	1908.0	1628.3	1216.1	1398.9	1373.2	1618.7	1892.0	1901.6
52.5°	2405.0	2405.0	2353.0	2073.2	1817.5	1412.6	1492.8	1584.2	1949.7	2197.4	2287.3
55°	2587.1	2624.8	2615.1	2268.0	2040.3	1679.6	1738.1	1930.5	2252.8	2570.9	2793.1
57.5°	2716.1	2768.2	2881.3	2476.4	2256.7	1788.5	2096.5	2310.5	2660.1	3047.2	3315.9
60°	2907.8	2908.5	3024.8	2660.8	2530.2	1996.3	2235.2	2663.3	2883.6	3504.9	3646.8
62.5°	2926.9	2959.8	3203.5	2947.8	2802.7	2212.6	2688.8	2845.2	3135.4	3965.2	4089.4
65°	2694.5	2782.7	3190.7	3082.5	3052.0	2412.3	2821.9	3205.2	3339.9	4401.2	4366.0
66°	2605.5	2680.1	3084.9	3112.2	3093.0	2531.8	2899.6	3298.9	3411.3	4476.7	4414.9
67.5°	2574.3	2628.7	2958.3	3144.2	3231.7	2748.2	3089.7	3344.7	3541.8	4422.1	4397.3
70°	2357.0	2425.2	2734.6	3355.9	3527.5	3145.1	3334.1	3455.3	3634.1	4152.0	4044.4
72.5°	1797.4	1867.1	2095.7	2769.0	3552.3	3731.9	3713.5	3594.7	3334.1	3298.9	3126.6
75°	891.5	966.0	1127.2	1613.8	2764.3	3666.2	3691.8	3241.3	2694.5	2127.6	1995.4
77.5°	461.0	519.5	435.3	618.2	1421.4	2600.8	2612.7	2137.2	1561.8	994.2	928.4
80°	314.2	327.2	296.6	304.6	585.2	1329.2	1239.4	1137.7	628.5	456.2	476.2
82.5°	230.9	213.3	204.5	222.2	315.8	415.2	445.7	492.2	335.8	231.8	244.5
85°	109.1	120.3	117.9	135.5	192.3	141.9	218.1	295.8	223.7	149.1	146.8
87.5°	68.1	67.4	72.1	83.4	116.2	93.9	119.5	146.8	134.7	93.1	91.4
90°	44.8	40.1	37.6	44.8	64.9	46.5	64.0	83.4	76.1	50.6	47.3
92.5°	30.5	30.5	32.9	37.6	56.1	49.6	45.8	47.3	47.3	39.3	37.6
95°	22.5	24.1	27.3	28.0	33.6	28.8	36.9	41.0	41.7	32.1	31.4
97.5°	19.3	20.8	22.5	23.3	28.0	23.3	30.5	36.1	35.3	25.6	26.5
100°	17.6	19.3	19.3	20.0	22.5	17.6	24.9	33.6	32.1	22.5	21.6
102.5°	16.9	16.9	16.0	16.0	17.6	13.7	20.8	29.6	24.1	18.4	16.9
105°	16.0	16.0	13.7	12.8	13.7	11.1	16.9	22.5	16.9	15.2	15.2
107.5°	15.2	14.5	12.0	10.4	11.1	8.9	13.7	14.5	12.0	13.7	14.5



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CANDELA DISTRIBUTION (continued):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	84°	85°
110°	13.7	13.7	10.4	8.9	8.9	7.2	9.6	10.4	10.4	13.7	14.5
112.5°	12.8	12.0	8.9	7.2	7.2	6.4	7.2	8.1	8.9	12.8	13.7
115°	12.0	11.1	8.1	6.4	5.6	4.9	5.6	6.4	8.1	12.8	12.8
117.5°	11.1	10.4	7.2	5.6	4.9	4.0	4.9	5.6	8.1	12.8	12.8
120°	11.1	10.4	7.2	4.9	4.0	4.0	4.0	4.9	8.9	12.8	13.7
122.5°	10.4	10.4	7.2	4.9	4.0	3.2	3.2	4.9	8.1	12.0	12.0
125°	10.4	10.4	6.4	4.0	3.2	3.2	3.2	4.0	8.1	11.1	12.0
127.5°	9.6	9.6	6.4	4.0	3.2	2.4	2.4	4.0	7.2	11.1	11.1
130°	9.6	9.6	6.4	3.2	2.4	2.4	2.4	3.2	7.2	10.4	10.4
132.5°	8.1	8.1	5.6	3.2	2.4	1.5	2.4	3.2	6.4	8.9	9.6
135°	8.1	8.1	5.6	3.2	2.4	1.5	1.5	3.2	5.6	8.1	8.1
137.5°	7.2	7.2	4.9	3.2	2.4	1.5	1.5	2.4	4.9	7.2	7.2
140°	6.4	6.4	5.6	3.2	2.4	1.5	1.5	1.5	4.0	5.6	5.6
142.5°	6.4	6.4	4.9	3.2	1.5	0.8	0.8	1.5	3.2	4.0	4.0
145°	5.6	5.6	4.9	3.2	1.5	0.8	0.8	1.5	2.4	3.2	3.2
147.5°	5.6	5.6	4.9	2.4	0.8	0.8	0.8	1.5	2.4	3.2	3.2
150°	4.9	4.9	3.2	1.5	0.0	0.0	0.8	0.8	1.5	2.4	2.4
152.5°	3.2	3.2	2.4	0.8	0.0	0.0	0.0	0.8	1.5	1.5	1.5
155°	1.5	1.5	0.8	0.0	0.0	0.0	0.0	0.0	0.8	0.8	0.8
157.5°	0.8	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.8
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2	15.2
2.5°	14.5	14.5	14.5	14.5	14.5	14.5	13.7	13.7	13.7	13.7	13.7
5°	13.7	13.7	13.7	13.7	13.7	13.7	13.7	14.5	15.2	15.2	15.2
7.5°	15.2	15.2	14.5	13.7	14.5	16.0	24.1	55.3	80.9	99.4	98.6
10°	24.9	24.9	23.3	20.0	24.9	54.4	107.4	108.2	89.8	82.6	85.8
12.5°	131.5	117.0	99.4	81.7	80.2	96.9	91.4	127.5	142.7	153.2	151.5
15°	150.7	159.4	146.0	163.5	167.5	99.4	155.5	208.4	224.4	230.9	238.1
17.5°	248.6	275.1	196.4	185.9	186.8	198.9	210.1	220.4	225.2	222.9	223.7
20°	374.5	356.7	383.1	327.2	250.1	266.2	243.7	240.4	317.6	385.6	376.7
22.5°	382.4	413.0	377.6	345.5	382.4	271.0	335.8	356.7	367.1	376.0	387.2
25°	618.9	604.5	529.1	396.8	377.6	361.6	364.8	372.7	392.7	423.3	441.7
27.5°	657.4	654.1	585.2	534.8	402.4	452.1	374.5	450.6	486.6	518.7	525.1
30°	884.2	893.0	673.4	513.9	466.6	387.2	434.5	464.2	492.2	537.1	537.9
32.5°	939.5	958.0	744.8	568.4	489.0	400.9	436.9	459.4	566.0	607.7	609.3
35°	954.0	1001.3	768.1	548.3	472.1	399.2	403.2	480.2	533.1	618.2	648.5
37.5°	1105.5	1071.0	816.1	555.6	441.7	384.0	435.3	461.0	544.4	598.9	609.3
40°	1169.7	1150.4	847.5	570.1	436.0	427.4	403.2	429.7	468.9	508.4	508.4
42.5°	1289.1	1213.8	865.0	559.6	424.1	458.6	367.9	397.6	434.5	411.2	420.9
45°	1447.9	1346.9	925.2	504.3	401.6	389.7	353.6	399.2	376.0	376.0	371.2
47.5°	1653.2	1515.3	905.1	485.1	452.1	368.8	466.6	375.2	346.3	359.1	360.0
50°	1977.8	1814.2	966.8	472.1	428.9	361.6	399.2	362.3	362.3	371.2	367.9
52.5°	2385.0	2062.8	993.3	471.4	405.7	420.9	396.1	433.7	375.2	406.5	402.4
55°	2826.0	2437.1	1020.6	465.1	401.6	380.1	484.2	415.2	389.7	446.5	448.2
57.5°	3384.8	2870.9	1132.9	452.1	403.2	380.8	457.0	465.1	474.7	512.3	518.0
60°	3732.6	3111.4	1033.4	476.2	399.2	434.5	531.4	519.5	489.8	629.4	650.2
62.5°	3998.0	3293.4	851.5	496.3	472.1	437.7	549.1	606.0	578.8	634.9	651.0
65°	4046.1	3277.2	651.0	496.3	465.9	509.9	658.9	604.5	515.4	521.0	514.6
66°	4042.9	3228.4	599.7	500.3	472.1	531.4	647.0	611.7	498.6	504.3	492.2
67.5°	3910.6	3073.7	521.0	494.6	517.1	546.0	635.7	570.9	479.4	481.0	468.9
70°	3401.6	2592.7	443.4	508.4	536.4	547.5	695.1	531.4	440.1	428.9	426.4
72.5°	2502.0	1839.1	415.2	505.8	544.4	530.7	586.1	436.9	380.1	357.5	355.1
75°	1406.9	939.5	413.7	485.1	481.9	455.4	443.4	336.8	314.2	287.7	283.0
77.5°	648.5	452.9	350.2	390.5	364.0	360.0	330.2	280.6	267.8	250.1	242.9
80°	375.2	319.8	249.3	258.9	261.3	254.1	266.9	252.6	238.9	226.1	214.1
82.5°	218.8	202.8	181.9	170.8	170.8	182.7	219.6	210.1	199.7	188.5	162.0
85°	137.1	131.5	124.2	119.5	119.5	109.9	157.9	175.6	165.9	141.9	126.8
87.5°	89.8	93.9	83.4	84.3	81.7	72.9	106.5	117.9	101.0	80.9	67.4
90°	41.0	44.8	48.9	48.1	52.1	40.1	58.5	60.1	53.7	36.9	26.5
92.5°	31.4	36.9	41.0	41.0	44.8	27.3	42.5	47.3	44.0	34.5	24.9
95°	26.5	32.9	39.3	38.4	38.4	21.6	39.3	44.0	41.7	29.6	21.6
97.5°	21.6	26.5	32.1	32.1	35.3	18.4	36.1	42.5	40.1	29.6	20.8
100°	20.0	24.1	28.0	28.8	32.1	14.5	32.9	40.1	36.1	24.9	20.0
102.5°	18.4	20.0	23.3	23.3	24.1	12.8	26.5	32.9	28.8	19.3	19.3
105°	16.9	16.9	16.9	15.2	15.2	10.4	16.0	22.5	17.6	15.2	16.9
107.5°	16.0	15.2	12.8	12.0	11.1	8.9	11.1	13.7	10.4	13.7	15.2



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CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
110°	15.2	15.2	12.0	10.4	9.6	8.1	9.6	8.9	8.9	13.7	14.5
112.5°	15.2	14.5	10.4	8.9	8.1	7.2	8.1	6.4	8.1	13.7	14.5
115°	14.5	14.5	9.6	8.1	8.1	6.4	6.4	5.6	7.2	12.8	14.5
117.5°	14.5	14.5	9.6	7.2	6.4	5.6	5.6	5.6	7.2	12.8	14.5
120°	14.5	13.7	9.6	7.2	5.6	4.9	4.9	4.9	7.2	12.8	13.7
122.5°	13.7	12.8	8.9	6.4	5.6	4.9	4.0	4.9	7.2	12.0	12.8
125°	12.8	12.8	8.9	5.6	4.9	4.0	3.2	4.0	7.2	12.0	12.8
127.5°	12.8	12.0	8.1	4.9	4.0	4.0	3.2	4.0	7.2	11.1	12.0
130°	11.1	11.1	7.2	4.9	3.2	3.2	2.4	3.2	7.2	11.1	11.1
132.5°	10.4	9.6	6.4	4.0	3.2	2.4	2.4	2.4	6.4	9.6	10.4
135°	8.9	8.1	5.6	3.2	2.4	2.4	1.5	2.4	5.6	8.9	8.9
137.5°	7.2	7.2	5.6	3.2	2.4	1.5	1.5	2.4	5.6	8.1	8.9
140°	6.4	5.6	4.0	2.4	1.5	1.5	1.5	2.4	4.9	6.4	7.2
142.5°	4.9	4.9	3.2	2.4	1.5	1.5	0.8	1.5	4.0	5.6	5.6
145°	4.0	4.0	3.2	1.5	1.5	0.8	0.8	0.8	3.2	4.0	4.9
147.5°	3.2	3.2	2.4	1.5	0.8	0.8	0.0	0.8	2.4	3.2	3.2
150°	2.4	2.4	2.4	1.5	0.8	0.0	0.0	0.0	0.8	1.5	1.5
152.5°	1.5	1.5	1.5	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	1.5	0.8	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.8	0.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	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

(END OF REPORT)