

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: McGRAW-EDISON

Report Number: P228797

Luminaire Tested: **ISC-AF-450-LED-E1-RW-8030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P228797
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29765)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: ISC-AF-450-LED-E1-RW-8030
Description: IMPACT ELITE LED CYLINDER LUMINAIRE
LIGHT SQUARE WITH ACCULED OPTICS-RECTANGULAR WIDE TYPE I
Light Source: (16) 3000K CCT, 80 CRI LEDs
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2438 lumens
Efficiency: N/A
Efficacy: 96.3 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type II - Medium - Full Cutoff
BUG Rating: B1 - U0 - G1

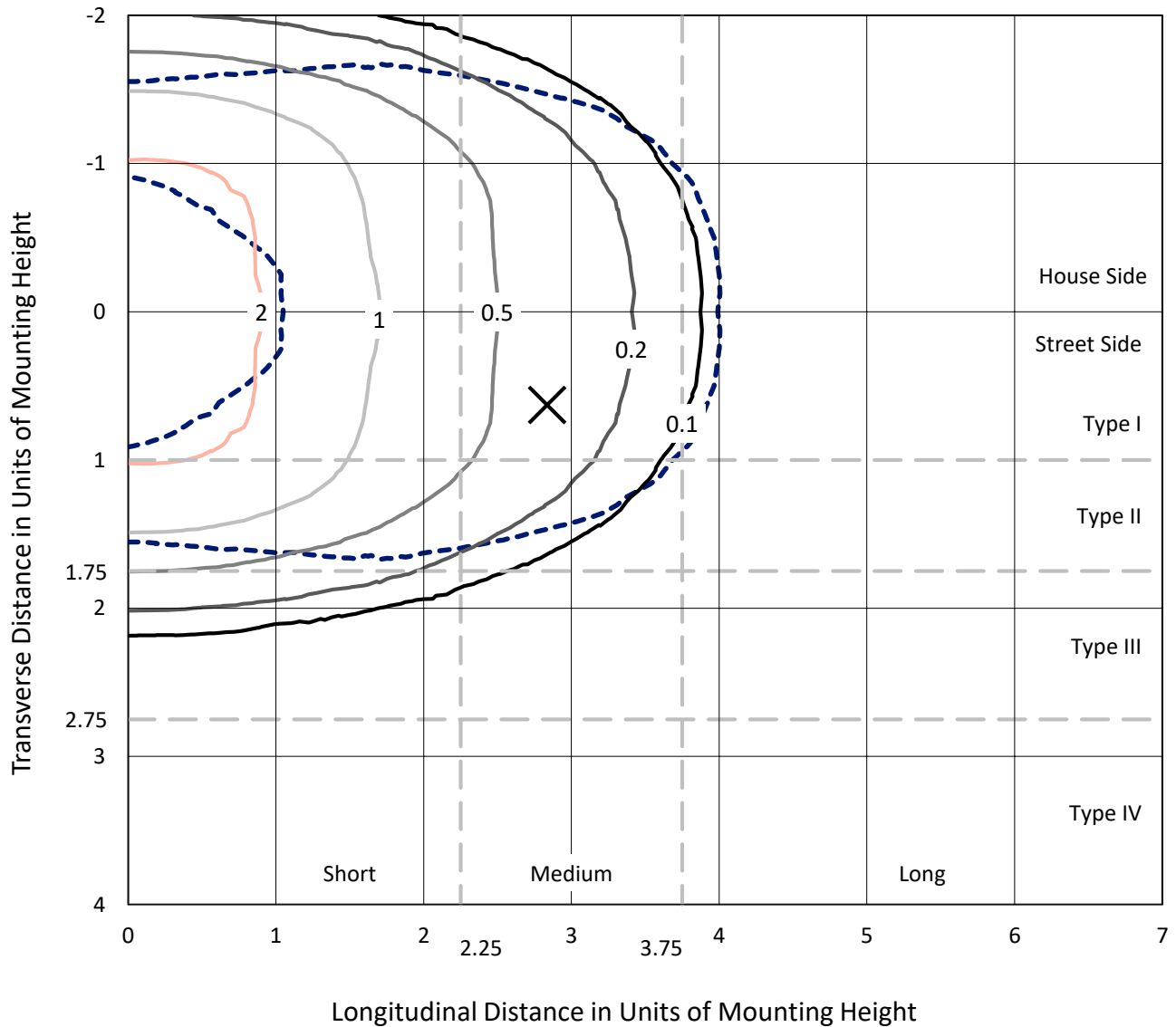
Input Watts (W): 25.31
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Iso-Footcandle Lines of Horizontal Illumination

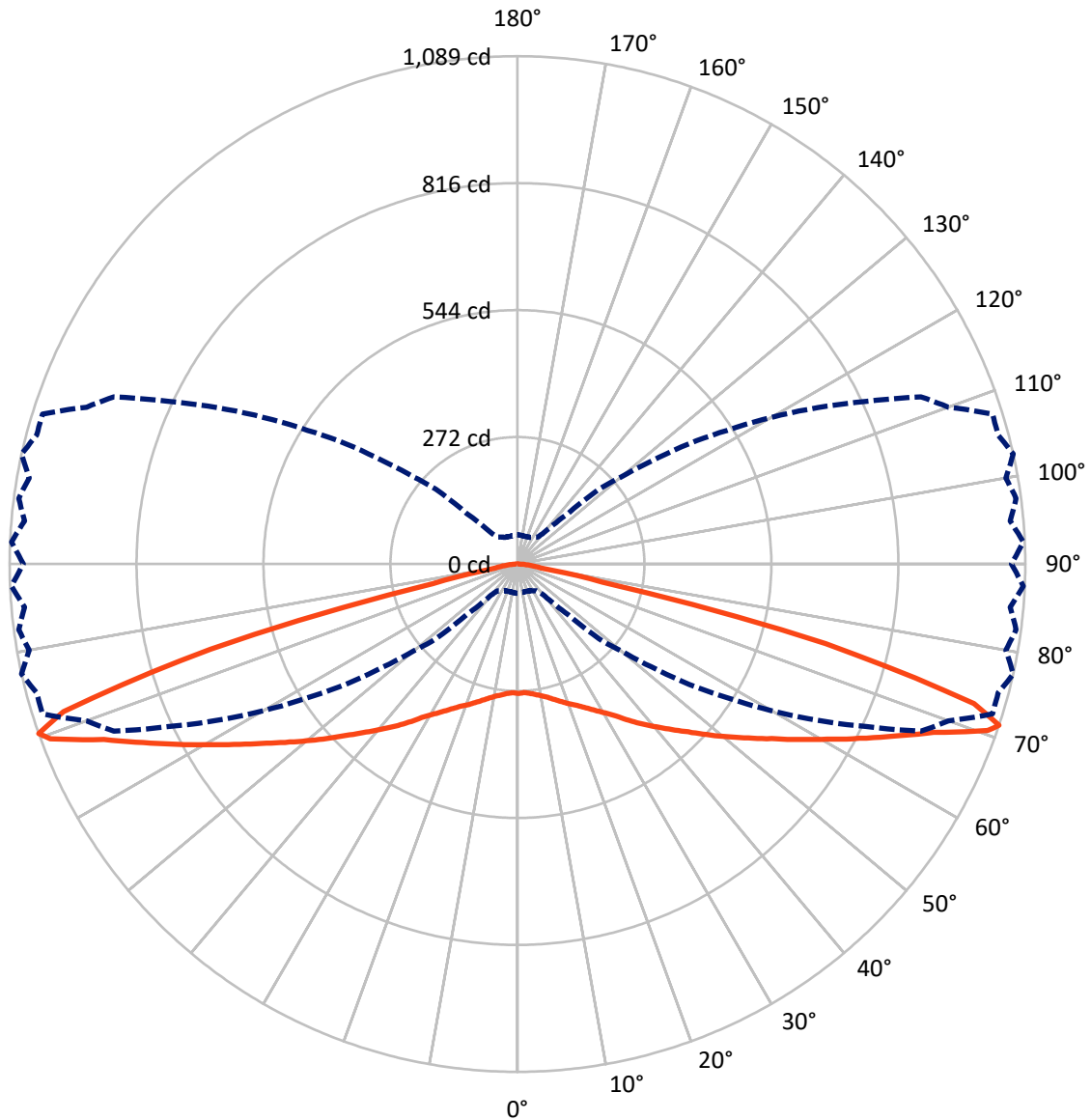
× Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 2.8 fc
 Type II - Medium - Full Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 77.5-Deg Lateral - - - Horizontal Cone Through 71-Deg Vertical

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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1219.0	0.0	1219.0
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	1219.0	0.0	1219.0
	% Fixture	50.0	0.0	50.0
Total	Lumens	2438.0	0.0	2438.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	26.8	1.1
10°-20°	83.8	3.4
20°-30°	156.8	6.4
30°-40°	273.0	11.2
40°-50°	445.4	18.3
50°-60°	614.6	25.2
60°-70°	583.0	23.9
70°-80°	240.0	9.8
80°-90°	14.5	0.6
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°	2438.0	100.0
0°-180°	2438.0	100.0



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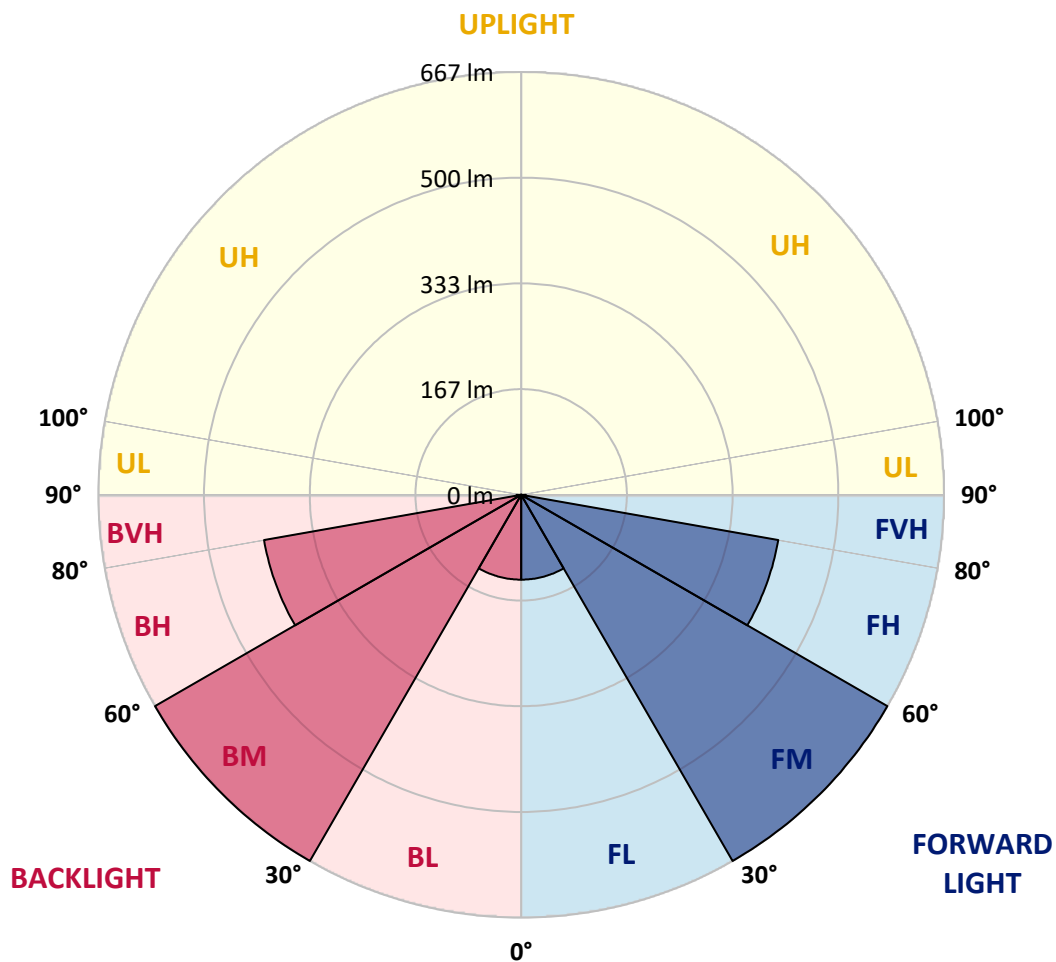
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	133.7	5.5			
FM	(30°-60°)	666.5	27.3			
FH	(60°-80°)	411.5	16.9			G0/660
FVH	(80°-90°)	7.3	0.3			G0/10
BL	(0°-30°)	133.7	5.5	B1/500		
BM	(30°-60°)	666.5	27.3	B1/1000		
BH	(60°-80°)	411.5	16.9	B1/500		G1/500
BVH	(80°-90°)	7.3	0.3			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G1

Type II Medium





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	37.5°	40°	42.5°	45°	47.5°	50°
0°	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6
2.5°	276.8	276.0	276.8	276.8	277.6	277.6	277.6	277.6	276.8	278.4	278.4
5°	276.8	276.8	277.6	277.6	279.2	280.8	278.4	279.2	280.0	279.2	280.8
7.5°	276.8	276.8	276.8	278.4	280.8	282.5	280.8	281.6	283.3	283.3	284.9
10°	274.4	273.6	275.2	278.4	282.5	284.9	284.1	287.3	286.5	287.3	288.9
12.5°	270.3	270.3	273.6	278.4	285.7	287.3	288.1	289.7	292.1	291.3	293.7
15°	271.2	272.0	275.2	281.6	290.5	292.1	292.9	292.9	297.0	295.4	300.2
17.5°	276.8	277.6	280.8	287.3	297.8	297.8	298.6	300.2	305.9	302.6	309.1
20°	285.7	286.5	289.7	297.0	306.7	305.9	307.5	309.1	316.3	313.1	319.6
22.5°	296.2	297.8	301.8	309.9	320.4	315.5	318.8	322.0	329.3	323.6	332.5
25°	310.7	313.1	317.2	326.0	337.3	331.7	334.9	337.3	345.4	337.3	346.2
27.5°	331.7	333.3	336.5	346.2	355.9	351.9	353.5	355.1	364.8	355.9	365.6
30°	356.7	359.1	362.3	371.2	380.9	374.4	377.7	379.3	387.4	378.5	386.6
32.5°	388.2	390.6	394.6	402.7	410.8	401.1	401.9	404.3	412.4	403.5	412.4
35°	425.3	426.9	432.6	442.2	447.9	432.6	433.4	433.4	443.9	431.7	441.4
37.5°	464.0	465.6	472.1	481.8	488.2	471.3	471.3	472.1	481.8	468.1	476.9
40°	504.4	509.2	516.5	526.2	531.0	511.6	513.3	512.4	523.7	507.6	516.5
42.5°	544.7	548.8	559.3	570.6	576.2	556.8	557.6	555.2	566.5	549.6	556.8
45°	579.4	582.7	595.6	611.7	620.6	600.4	600.4	600.4	611.7	590.7	599.6
47.5°	607.7	610.1	623.8	647.2	661.7	641.6	643.2	640.0	656.9	631.1	643.2
50°	627.8	628.7	646.4	673.0	698.1	679.5	681.9	683.5	699.7	677.1	687.6
52.5°	634.3	635.9	656.1	688.4	724.7	712.6	721.5	724.7	739.2	715.0	729.5
55°	611.7	615.7	646.4	694.0	743.3	739.2	749.7	756.2	774.7	754.5	769.9
57.5°	535.9	540.7	583.5	661.7	747.3	753.7	768.3	778.8	805.4	793.3	810.2
60°	427.7	431.7	475.3	569.7	696.4	736.0	769.1	798.9	826.4	828.8	850.6
62.5°	293.7	299.4	341.4	431.7	585.9	638.3	686.0	735.2	781.2	836.9	865.1
65°	143.6	146.9	182.4	269.5	430.1	497.1	552.8	622.2	665.0	744.9	790.9
67.5°	79.1	79.1	84.7	112.2	230.0	296.2	355.9	443.0	486.6	585.1	644.0
70°	66.2	66.2	64.6	68.6	87.2	103.3	134.0	184.0	244.5	343.8	397.0
71°	62.9	62.1	61.3	62.9	70.2	73.4	86.3	113.0	153.3	237.3	289.7
72.5°	58.9	57.3	54.9	55.7	59.7	59.7	62.1	66.2	81.5	111.4	149.3
75°	50.8	49.2	46.8	46.8	47.6	48.4	49.2	50.8	51.6	53.3	59.7
77.5°	42.0	40.4	37.9	37.9	37.1	37.9	39.5	40.4	38.7	42.0	42.8
80°	32.3	29.9	29.1	29.1	28.2	27.4	27.4	27.4	28.2	29.9	30.7
82.5°	20.2	18.6	19.4	18.6	17.8	17.8	17.8	17.8	18.6	18.6	20.2
85°	9.7	9.7	10.5	9.7	8.1	8.1	7.3	6.5	7.3	6.5	8.1
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.8
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):

	52.5°	55°	57.5°	60°	62.5°	65°	67.5°	70°	72.5°	75°	77.5°
0°	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6	277.6
2.5°	276.0	277.6	276.8	277.6	276.0	277.6	275.2	277.6	276.8	277.6	276.0
5°	278.4	280.8	278.4	281.6	278.4	281.6	278.4	281.6	279.2	281.6	278.4
7.5°	280.8	285.7	282.5	286.5	282.5	287.3	282.5	287.3	284.1	288.1	282.5
10°	285.7	291.3	286.5	291.3	286.5	292.1	286.5	292.9	288.1	294.6	287.3
12.5°	289.7	296.2	291.3	297.8	290.5	299.4	292.1	301.8	293.7	303.4	293.7
15°	295.4	303.4	298.6	305.9	298.6	308.3	299.4	310.7	301.8	312.3	301.8
17.5°	303.4	312.3	305.9	314.7	306.7	317.2	307.5	319.6	310.7	321.2	310.7
20°	314.7	322.0	315.5	325.2	316.3	326.0	318.0	327.6	320.4	330.1	320.4
22.5°	327.6	334.1	329.3	334.9	326.8	334.9	326.8	334.9	329.3	337.3	329.3
25°	342.2	347.0	341.4	347.0	339.7	346.2	338.9	345.4	339.7	347.0	341.4
27.5°	361.5	364.0	357.5	362.3	353.5	359.9	351.9	358.3	352.7	359.1	355.1
30°	382.5	384.9	378.5	381.7	372.0	376.1	367.2	372.8	368.0	372.8	370.4
32.5°	405.9	409.2	401.9	403.5	395.4	396.2	389.0	391.4	387.4	389.0	388.2
35°	432.6	436.6	428.5	430.9	422.1	422.1	415.6	414.8	413.2	411.6	411.6
37.5°	466.4	468.1	461.6	461.6	451.1	451.1	443.0	443.0	439.8	436.6	435.0
40°	503.6	504.4	493.9	493.1	482.6	482.6	473.7	471.3	465.6	461.6	459.2
42.5°	543.1	542.3	527.0	528.6	513.3	514.1	502.8	500.3	494.7	489.9	485.0
45°	583.5	580.2	564.9	564.1	546.3	547.1	533.4	531.8	523.7	518.9	513.3
47.5°	624.6	623.0	606.1	602.0	583.5	582.7	564.9	564.9	556.8	552.0	546.3
50°	667.4	666.6	647.2	644.8	625.4	622.2	601.2	601.2	591.5	589.9	581.9
52.5°	714.2	711.0	690.0	689.2	670.6	668.2	645.6	644.0	629.5	628.7	619.8
55°	760.2	754.5	740.8	734.4	715.8	715.0	694.8	690.8	672.2	672.2	660.9
57.5°	802.2	797.3	786.0	780.4	762.6	760.2	738.4	738.4	722.3	721.5	709.4
60°	845.7	847.4	835.2	832.8	815.9	815.1	793.3	793.3	777.1	776.3	762.6
62.5°	882.9	899.0	894.2	895.8	881.2	878.8	857.0	855.4	836.9	834.4	823.1
65°	846.5	903.0	939.4	963.6	961.9	961.1	940.2	936.9	913.5	907.1	888.5
67.5°	711.0	784.4	850.6	923.2	976.5	1016.8	1028.9	1024.1	1003.9	985.4	962.8
70°	476.1	560.9	644.8	735.2	826.4	915.1	1006.3	1045.9	1087.8	1073.3	1069.3
71°	362.3	449.5	533.4	628.7	725.5	824.0	936.1	982.9	1067.7	1066.9	1088.6
72.5°	204.2	281.6	371.2	454.3	545.5	647.2	762.6	814.3	936.1	960.3	1023.3
75°	65.4	89.6	118.6	187.2	243.7	336.5	422.1	473.7	554.4	594.8	682.7
77.5°	43.6	48.4	50.0	58.1	65.4	92.8	125.9	154.1	169.5	177.5	186.4
80°	31.5	33.9	35.5	39.5	40.4	45.2	45.2	50.0	49.2	52.5	50.0
82.5°	20.2	22.6	23.4	25.0	25.8	29.1	30.7	33.9	33.9	35.5	34.7
85°	9.7	11.3	11.3	12.9	12.9	15.3	15.3	17.8	17.8	20.2	19.4
87.5°	0.8	0.8	0.8	1.6	1.6	1.6	2.4	3.2	3.2	3.2	3.2
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):

	80°	82.5°	85°	87.5°	90°
0°	277.6	277.6	277.6	277.6	277.6
2.5°	278.4	277.6	278.4	276.8	278.4
5°	282.5	279.2	283.3	279.2	283.3
7.5°	288.9	284.9	289.7	283.3	288.9
10°	294.6	288.9	295.4	288.9	294.6
12.5°	304.2	295.4	305.9	295.4	305.9
15°	313.9	303.4	316.3	305.0	315.5
17.5°	322.8	313.1	325.2	313.9	324.4
20°	330.9	322.0	332.5	321.2	332.5
22.5°	338.9	333.3	341.4	333.3	341.4
25°	349.4	345.4	351.0	345.4	351.0
27.5°	361.5	359.9	363.2	359.1	364.0
30°	375.3	376.1	376.9	376.1	377.7
32.5°	392.2	396.2	394.6	394.6	394.6
35°	415.6	422.9	418.0	419.6	418.8
37.5°	437.4	447.9	441.4	443.9	442.2
40°	461.6	468.9	467.3	467.3	465.6
42.5°	488.2	497.1	494.7	495.5	493.9
45°	517.3	525.4	522.1	521.3	522.1
47.5°	550.4	559.3	555.2	554.4	555.2
50°	585.1	595.6	592.3	590.7	592.3
52.5°	623.0	635.9	634.3	632.7	635.1
55°	667.4	679.5	677.9	679.5	680.3
57.5°	711.8	725.5	722.3	726.3	727.9
60°	767.5	775.5	776.3	777.1	778.0
62.5°	824.0	827.2	829.6	832.0	832.8
65°	889.3	890.1	891.7	889.3	891.7
67.5°	952.3	946.6	945.8	948.2	949.8
70°	1049.9	1049.9	1041.8	1053.1	1043.5
71°	1062.8	1078.2	1060.4	1085.4	1058.8
72.5°	999.9	1028.1	1007.9	1030.5	1003.9
75°	695.6	761.0	760.2	792.5	766.7
77.5°	192.9	180.8	192.9	166.2	159.0
80°	52.5	47.6	51.6	43.6	49.2
82.5°	34.7	29.9	29.1	23.4	25.0
85°	20.2	15.3	15.3	12.1	12.9
87.5°	3.2	0.8	3.2	1.6	2.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)