

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: INVUE

Report Number: P173466

Luminaire Tested: **ENT-EXX-LED-E1-BL2-8030-BBB**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P173466  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33644)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 03/03/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: INVUE  
Catalog Number: ENT-EXX-LED-E1-BL2-8030-BBB  
Description: ENTRI LED LUMINAIRE, EMERGENCY MODE  
LIGHTBARS WITH AccuLED OPTICS - TYPE 2  
Light Source: (42) 3000K CCT, 80 CRI LEDs  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1496.4 lumens  
Efficiency: N/A  
Efficacy: 272.1 lumens/watt  
Luminous Opening: Rectangular (W 1' x L: 0.33' x H: 0')  
IES Classification: Type II - Short - Semi-Cutoff  
BUG Rating: B1 - U0 - G1

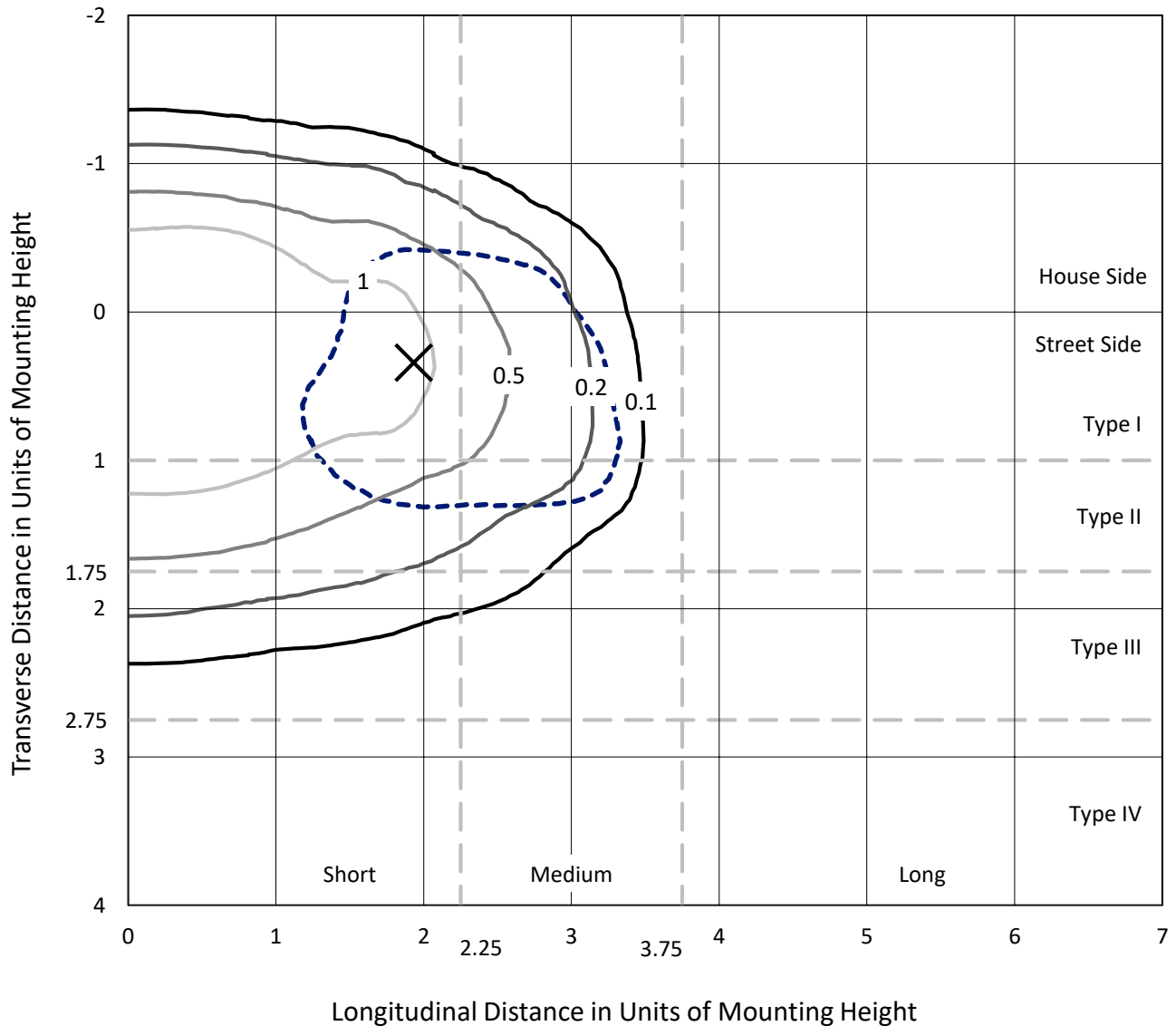
Input Watts (W): 5.5  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Iso-Footcandle Lines of Horizontal Illumination

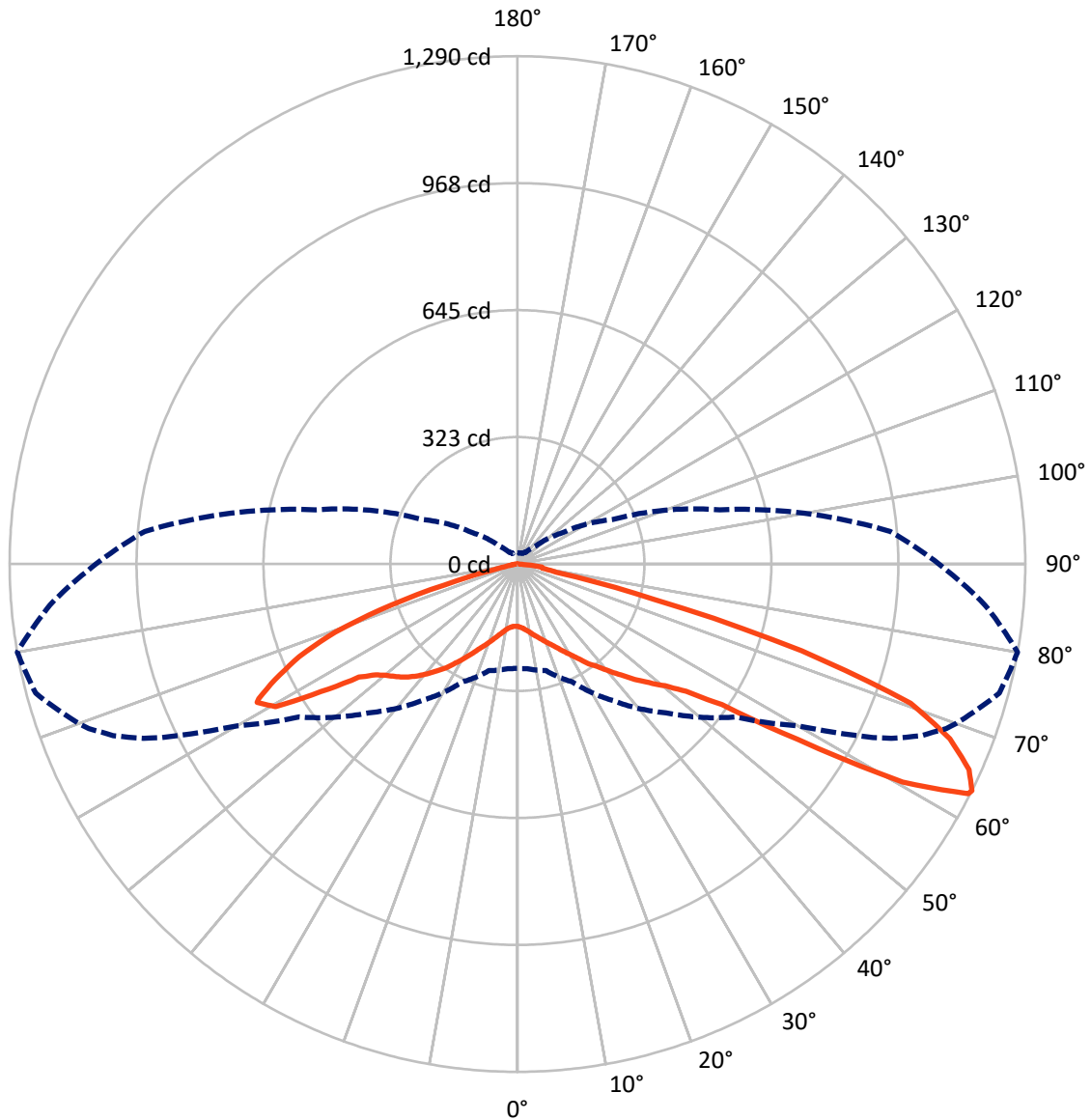
✕ Max cd  
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 1.9 fc  
 Type II - Short - Semi-Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 80-Deg Lateral    - - - Horizontal Cone Through 63-Deg Vertical

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**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	466.0	0.0	466.0
	% Fixture	31.1	0.0	31.1
<b>Street Side</b>	Lumens	1030.4	0.0	1030.4
	% Fixture	68.9	0.0	68.9
<b>Total</b>	Lumens	1496.4	0.0	1496.4
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	15.9	1.1
10°-20°	54.5	3.6
20°-30°	102.4	6.8
30°-40°	162.5	10.9
40°-50°	245.3	16.4
50°-60°	344.7	23.0
60°-70°	402.2	26.9
70°-80°	155.5	10.4
80°-90°	13.5	0.9
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°	1496.4	100.0
0°-180°	1496.4	100.0



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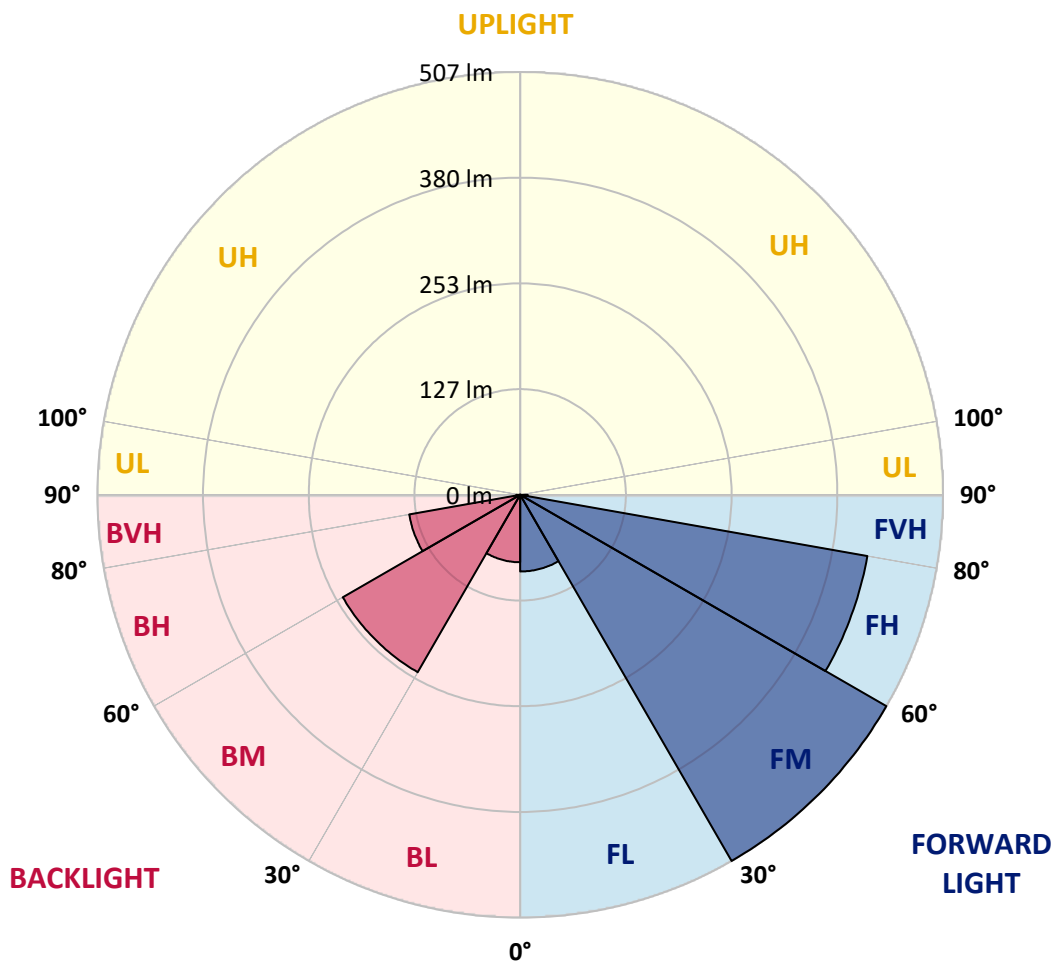
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	91.9	6.1			
FM	(30°-60°)	506.9	33.9			
FH	(60°-80°)	422.6	28.2			G0/660
FVH	(80°-90°)	9.0	0.6			G0/10
BL	(0°-30°)	80.8	5.4	B0/110		
BM	(30°-60°)	245.6	16.4	B1/1000		
BH	(60°-80°)	135.1	9.0	B1/500		G1/500
BVH	(80°-90°)	4.5	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 Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	60°	61°	62°	64°
0°	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5
2.5°	166.4	165.9	166.1	165.9	165.9	165.3	163.7	163.7	163.4	163.7	163.1
5°	175.4	175.2	174.9	174.3	174.3	173.2	170.5	170.0	170.2	169.7	168.6
7.5°	185.5	185.3	184.7	183.6	183.1	181.4	177.6	177.1	176.8	176.3	175.4
10°	195.6	195.4	194.5	193.2	191.8	189.4	185.5	184.2	183.9	183.6	182.8
12.5°	206.0	205.2	205.5	203.0	200.8	197.8	193.4	192.1	191.8	191.5	191.3
15°	217.5	217.2	216.7	213.4	209.3	205.2	200.8	199.2	198.1	198.4	198.1
17.5°	228.4	228.2	226.2	221.6	216.1	211.5	206.0	204.9	204.9	204.7	204.7
20°	236.4	236.1	234.2	228.4	221.3	216.1	211.8	211.8	211.5	211.8	212.0
22.5°	239.9	239.9	237.4	231.2	223.5	219.7	218.3	219.2	219.4	219.7	220.3
25°	241.3	241.3	238.8	231.5	224.3	224.9	226.5	227.9	228.4	228.4	230.4
27.5°	243.7	244.0	240.7	232.8	227.1	232.3	236.4	238.3	239.1	239.6	242.1
30°	251.1	250.9	248.1	239.6	235.3	242.7	250.0	252.0	253.9	253.9	256.6
32.5°	262.1	261.8	260.1	253.6	251.7	261.0	267.5	271.6	271.3	271.9	273.8
35°	276.5	276.8	277.9	276.3	277.9	287.2	294.6	296.2	296.5	296.8	297.0
37.5°	292.9	293.2	299.2	304.4	311.8	325.4	329.8	330.6	328.7	328.7	328.2
40°	305.2	306.6	320.0	333.6	349.2	367.8	374.4	372.7	371.4	370.3	367.0
42.5°	330.4	331.2	345.4	365.1	386.9	412.6	424.1	418.6	418.4	413.4	411.0
45°	355.5	357.7	373.0	395.1	421.3	456.9	473.8	469.2	468.4	466.2	459.3
47.5°	375.4	378.4	395.4	421.6	451.7	492.7	523.0	526.3	524.4	521.9	516.4
50°	392.4	394.9	412.1	440.8	475.2	520.0	563.4	575.2	576.8	575.7	574.4
52.5°	403.3	405.8	422.7	453.3	488.8	540.2	593.5	616.7	621.7	621.4	627.1
55°	403.6	406.3	423.8	457.4	496.5	554.2	621.4	658.0	664.0	671.4	683.7
57.5°	388.6	391.3	413.2	452.0	498.7	565.1	648.4	712.9	729.3	743.8	777.7
60°	346.7	347.9	371.9	423.8	488.3	562.6	668.9	760.2	783.4	814.8	869.5
62.5°	282.5	284.7	299.5	350.1	439.9	541.0	677.1	812.9	851.2	897.1	984.5
63°	264.8	266.7	280.3	330.4	423.5	534.2	676.9	821.4	863.5	910.7	1005.0
65°	204.4	204.9	215.0	252.8	347.6	484.5	662.1	809.4	862.7	917.9	1016.8
67.5°	164.8	166.7	176.8	203.3	274.6	406.9	595.9	701.2	737.5	791.9	909.6
70°	129.0	132.3	141.8	171.9	234.2	327.6	501.4	585.3	607.7	633.7	733.7
72.5°	85.2	86.1	87.7	104.4	163.4	254.9	417.3	474.4	483.1	501.7	550.6
75°	40.2	43.2	45.6	54.1	79.0	167.0	302.5	336.9	347.3	366.7	384.5
77.5°	17.5	17.2	18.3	24.9	41.5	74.3	188.3	248.9	252.5	248.1	240.5
80°	5.5	5.7	6.0	6.6	13.1	35.5	81.4	167.2	184.7	196.5	193.2
82.5°	0.6	0.3	0.8	1.7	2.7	5.2	30.6	78.4	98.7	121.1	149.7
85°	0.0	0.0	0.3	0.3	0.6	1.1	1.9	8.2	13.7	15.9	31.4
87.5°	0.0	0.0	0.3	0.3	0.6	0.8	0.8	1.1	1.1	1.1	1.1
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):**

	65°	66°	67°	68°	69°	70°	75°	80°	85°	90°	95°
0°	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5
2.5°	162.9	162.9	162.3	162.6	162.3	162.3	161.8	161.2	160.9	159.6	158.8
5°	168.6	168.6	168.3	167.8	167.8	167.5	166.1	164.8	164.0	162.3	160.7
7.5°	175.2	174.9	174.3	173.8	173.8	173.5	171.6	170.2	168.6	166.1	164.2
10°	182.8	182.5	182.0	181.2	181.2	180.9	179.0	176.8	175.4	172.4	170.0
12.5°	191.0	190.2	189.9	189.4	188.8	188.8	187.2	185.0	183.9	180.6	178.2
15°	197.8	197.3	197.0	196.8	196.5	195.9	194.5	192.6	191.8	189.1	187.2
17.5°	204.4	204.4	204.7	204.1	203.8	203.3	202.5	201.9	201.1	198.7	197.6
20°	212.0	212.0	212.6	212.3	212.0	212.9	212.6	212.3	212.3	210.1	209.3
22.5°	221.1	220.8	221.6	221.3	221.6	222.4	223.5	223.0	224.1	222.7	222.2
25°	231.5	231.2	232.0	232.5	233.1	233.6	235.8	236.4	237.7	237.4	236.4
27.5°	243.2	243.5	243.7	245.1	245.9	246.5	249.5	251.1	253.9	252.8	253.9
30°	256.9	258.2	259.3	260.7	261.0	261.5	266.4	268.1	269.4	270.2	271.9
32.5°	275.7	276.5	276.8	278.4	279.0	279.8	285.0	287.2	289.1	289.4	292.4
35°	298.7	299.2	300.0	300.8	301.9	301.4	307.4	310.7	313.1	313.4	316.7
37.5°	329.0	327.1	327.9	326.8	325.2	325.2	327.1	330.4	333.1	335.3	338.6
40°	365.3	364.0	363.7	361.3	358.5	356.0	354.9	356.9	359.1	361.0	365.1
42.5°	406.9	405.5	400.9	399.2	394.6	391.8	384.5	385.3	389.1	390.2	392.7
45°	455.5	450.6	449.0	438.8	436.9	433.1	419.2	418.1	421.3	421.6	420.0
47.5°	511.0	507.4	503.6	496.5	489.1	482.8	461.5	450.3	453.9	453.6	445.7
50°	571.4	570.8	565.1	560.4	553.9	544.9	506.9	486.4	489.1	486.6	472.2
52.5°	629.0	627.4	627.1	623.6	621.1	618.1	571.9	536.7	530.4	525.2	506.6
55°	689.7	693.8	691.1	696.8	701.2	700.6	681.5	629.8	597.9	593.8	565.4
57.5°	790.8	800.6	813.7	814.3	826.0	843.0	877.4	840.3	760.2	744.3	706.4
60°	906.7	932.1	964.8	981.0	1006.1	1032.3	1118.7	1124.4	1012.4	951.2	881.5
62.5°	1023.1	1056.4	1095.2	1120.3	1151.5	1172.0	1263.3	1285.1	1182.9	1070.1	955.3
63°	1047.7	1081.8	1115.4	1140.0	1166.3	1185.1	1267.1	1290.0	1192.2	1070.3	950.6
65°	1060.5	1092.5	1118.7	1140.5	1158.0	1170.9	1235.6	1260.5	1179.9	1030.7	898.4
67.5°	962.9	1014.3	1047.4	1073.9	1091.6	1109.4	1169.0	1184.5	1127.4	953.6	819.2
70°	797.1	856.4	908.6	949.8	980.4	1007.5	1070.1	1059.4	1010.2	828.8	694.9
72.5°	586.4	638.0	688.9	735.6	775.5	809.9	851.2	754.7	679.8	551.1	480.9
75°	394.3	405.5	428.7	452.0	466.4	476.3	450.9	359.3	291.8	261.8	229.0
77.5°	232.8	225.1	226.0	220.3	216.4	215.6	180.9	100.6	53.0	54.1	56.9
80°	185.8	177.4	168.3	158.2	151.7	144.6	117.8	64.5	23.0	18.6	19.4
82.5°	150.3	148.1	143.2	132.8	122.4	110.1	84.1	62.0	13.1	10.4	11.2
85°	29.2	32.8	29.5	32.2	24.1	22.7	13.4	14.5	5.2	4.6	5.7
87.5°	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	1.1	2.2
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):**

	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5	158.5
2.5°	157.4	156.3	155.5	154.4	153.9	153.0	152.8	151.9	152.2
5°	157.9	156.0	154.4	152.8	151.7	151.1	150.5	150.0	150.0
7.5°	160.7	158.2	156.3	154.4	153.6	152.5	152.2	151.4	151.4
10°	166.4	163.7	161.2	159.0	157.9	156.6	156.0	155.2	155.2
12.5°	174.9	172.4	169.7	166.4	164.2	162.6	161.2	160.7	160.7
15°	184.4	182.5	180.3	176.0	172.4	169.4	166.7	165.6	165.3
17.5°	195.9	194.3	192.1	187.2	181.4	175.2	170.5	168.3	168.1
20°	209.9	208.2	204.9	198.1	189.1	179.3	171.9	168.6	168.3
22.5°	224.1	224.1	218.6	207.4	194.0	180.9	171.0	166.7	165.9
25°	239.6	240.5	232.3	214.8	196.8	180.1	167.5	162.0	160.9
27.5°	258.5	257.7	244.0	220.5	197.0	176.8	161.8	155.2	154.1
30°	279.3	273.8	253.6	223.8	195.1	170.8	154.1	146.7	145.9
32.5°	300.0	288.3	260.7	224.3	189.6	162.0	144.0	136.4	135.3
35°	322.2	301.1	265.1	221.3	180.6	150.3	131.4	124.1	123.0
37.5°	340.8	311.0	266.4	213.4	167.0	136.6	120.0	112.3	110.4
40°	357.7	318.1	264.0	200.6	151.7	123.2	107.9	101.4	100.8
42.5°	373.3	321.3	255.2	183.9	136.4	111.8	97.8	91.5	91.0
45°	385.3	319.2	240.5	165.6	123.8	101.9	88.8	83.1	82.0
47.5°	393.0	311.2	220.3	150.3	113.4	91.8	79.0	72.9	71.9
50°	398.9	299.5	199.8	138.5	103.3	81.4	68.9	63.4	62.6
52.5°	406.9	284.5	182.0	127.9	91.5	69.7	58.5	53.3	52.4
55°	424.4	271.6	169.4	116.1	79.0	57.4	48.1	44.8	43.7
57.5°	483.7	276.0	161.5	101.9	64.5	46.2	39.9	38.0	37.7
60°	546.0	294.6	157.7	85.5	50.0	37.4	33.9	33.3	33.1
62.5°	542.7	277.9	141.8	67.2	38.5	30.9	29.2	29.5	29.5
63°	531.7	267.8	136.6	63.1	36.6	30.0	28.4	28.4	28.4
65°	465.6	227.1	111.0	47.8	30.6	26.8	25.4	25.7	26.0
67.5°	384.5	164.0	72.9	33.3	27.6	24.3	22.7	22.1	22.1
70°	294.0	110.4	43.2	29.0	27.3	22.7	19.9	19.4	19.4
72.5°	192.9	67.5	29.2	29.0	27.1	21.6	18.6	17.5	17.5
75°	88.5	33.3	24.3	27.9	25.7	19.9	16.4	15.0	14.8
77.5°	34.4	21.0	21.9	23.5	19.9	16.4	14.8	13.7	13.4
80°	19.9	16.9	19.1	16.9	14.5	12.6	12.6	11.8	11.5
82.5°	14.5	14.5	14.8	12.3	10.9	10.4	10.4	9.6	9.3
85°	10.4	10.7	12.3	9.8	8.5	7.4	6.8	6.8	6.6
87.5°	5.2	8.5	6.8	4.1	3.8	3.6	3.6	3.6	3.3
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)