

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: LUMARK

Report Number: P960340

Luminaire Tested: **NAV-SB1C-735-U-SL2-HSS**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P960340
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-11)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB1C-735-U-SL2-HSS
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(1) 70 CRI, 3500K, 615mA LIGHTSQUARE WITH 26 LEDS AND TYPE II SPILL LIGHT
ELIMINATOR OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6223.8 lumens
Efficiency: N/A
Efficacy: 114.4 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type II - Medium
BUG Rating: B1 - U0 - G2

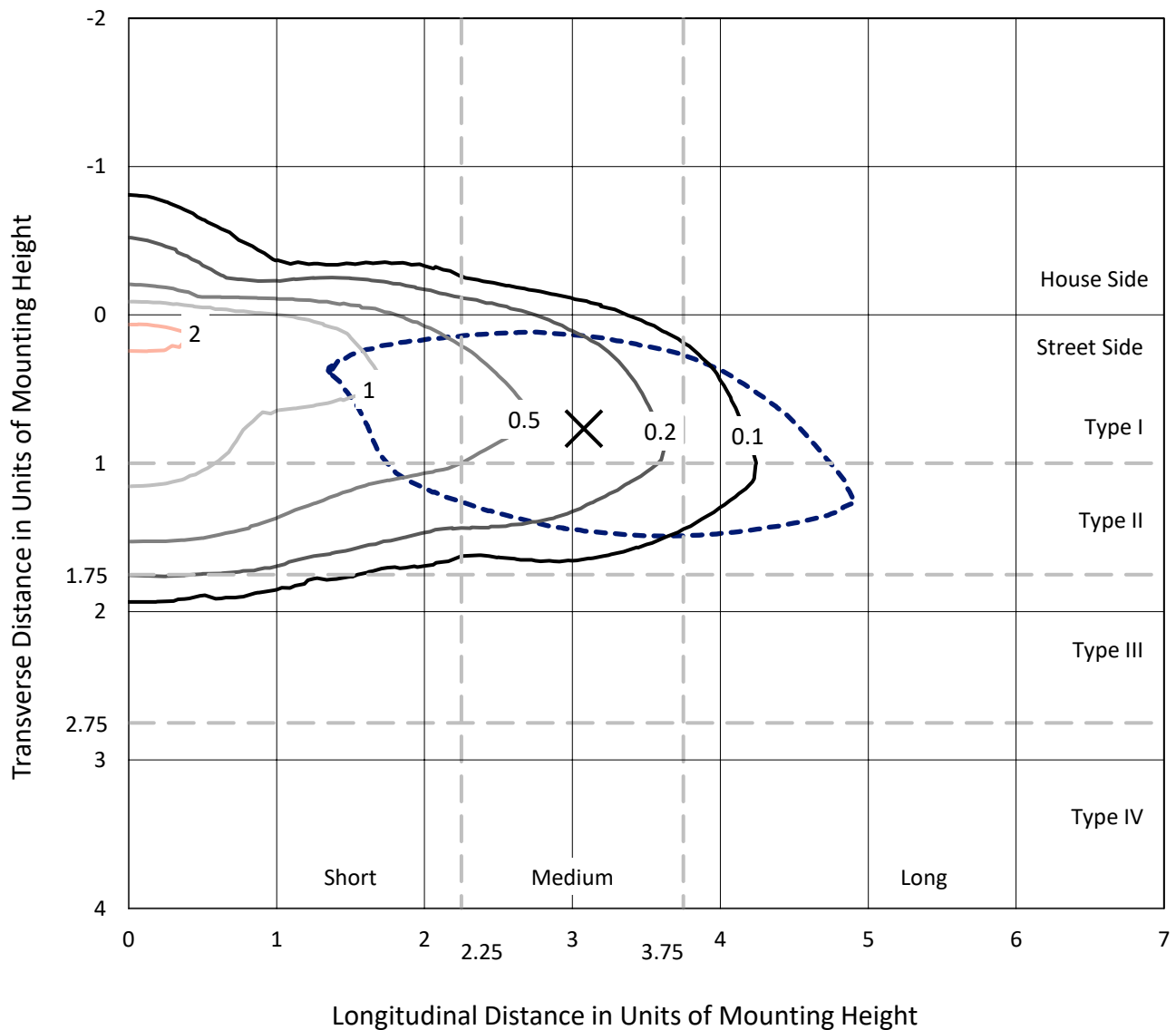
Input Watts (W): 54.4
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

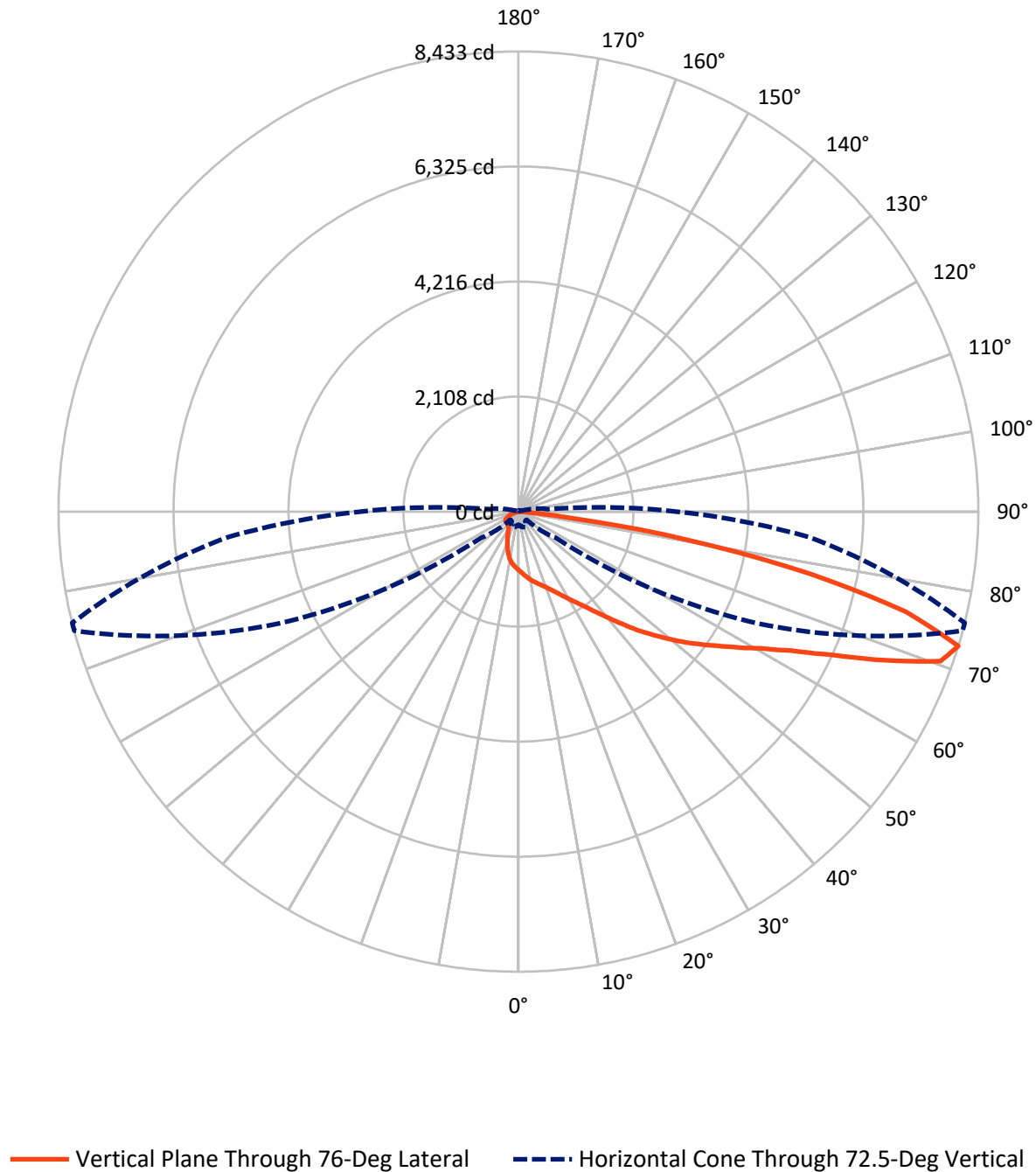
× Max cd
- - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 2.3 fc
Type II - Medium - N/A

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Luminous Intensity Polar Plot



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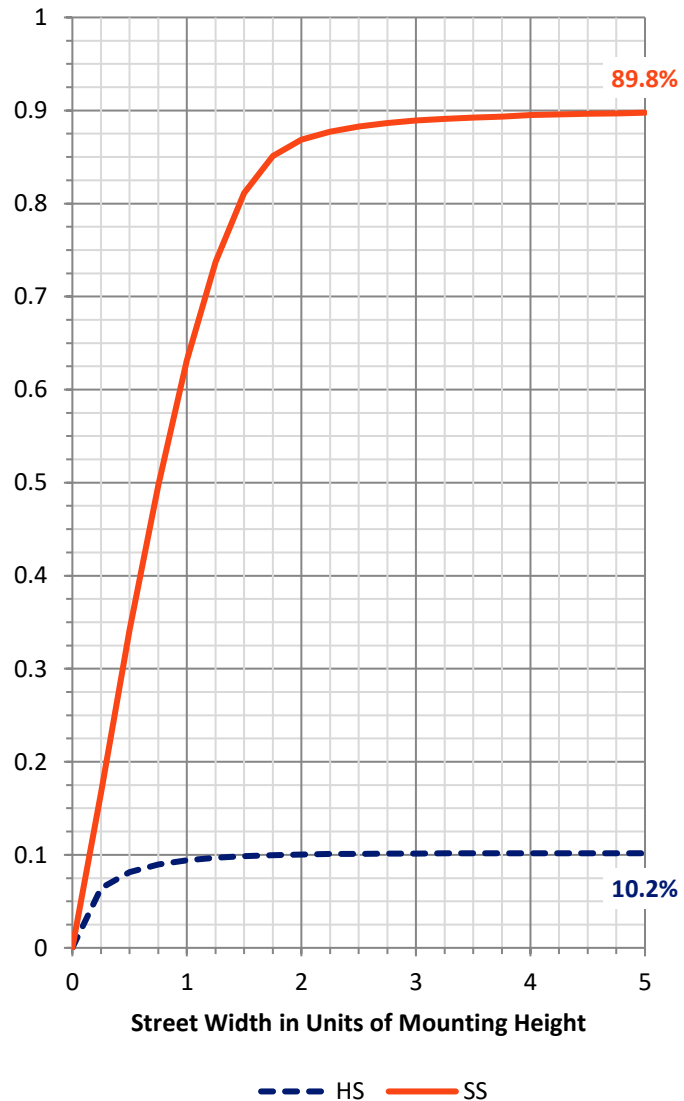
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	637.0	0.0	637.0
	% Fixture	10.2	0.0	10.2
Street Side	Lumens	5586.8	0.0	5586.8
	% Fixture	89.8	0.0	89.8
Total	Lumens	6223.8	0.0	6223.8
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	97.8	1.6
10°-20°	262.3	4.2
20°-30°	415.1	6.7
30°-40°	642.3	10.3
40°-50°	975.5	15.7
50°-60°	1344.8	21.6
60°-70°	1420.7	22.8
70°-80°	974.6	15.7
80°-90°	90.7	1.5
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°	6223.8	100.0
0°-180°	6223.8	100.0

Coefficient of Utilization



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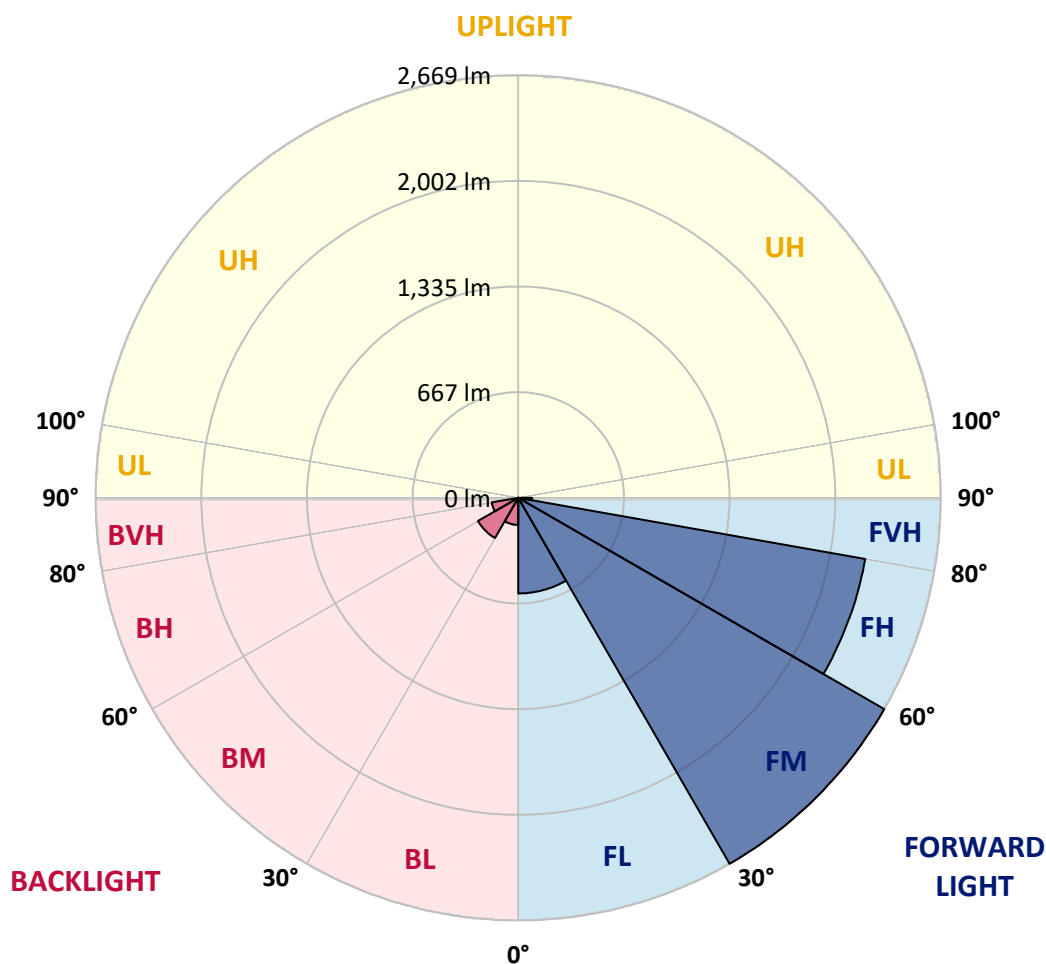
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	604.0	9.7			
FM	(30°-60°)	2669.2	42.9			
FH	(60°-80°)	2225.3	35.8			G2/5000
FVH	(80°-90°)	88.3	1.4			G1/100
BL	(0°-30°)	171.2	2.8	B1/500		
BM	(30°-60°)	293.3	4.7	B1/1000		
BH	(60°-80°)	170.0	2.7	B1/500		G1/500
BVH	(80°-90°)	2.5	0.0			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G2

Type II Medium



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	76°	85°
0°	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5
2.5°	1250.3	1233.8	1237.0	1220.5	1212.8	1194.2	1174.9	1149.4	1121.1	1121.1	1093.7
5°	1381.9	1371.4	1371.4	1352.1	1337.1	1308.1	1273.4	1228.6	1175.3	1170.0	1118.0
7.5°	1462.7	1456.2	1460.3	1448.9	1436.8	1406.6	1365.4	1306.9	1231.3	1224.9	1146.6
10°	1478.5	1478.0	1489.3	1492.6	1500.6	1485.3	1448.5	1381.2	1286.7	1277.4	1171.2
12.5°	1417.5	1409.8	1437.7	1470.4	1516.4	1537.0	1518.0	1448.9	1337.1	1324.2	1194.2
15°	1317.3	1319.0	1345.6	1396.0	1472.8	1546.3	1570.9	1515.2	1388.5	1373.1	1216.1
17.5°	1260.0	1254.0	1276.9	1322.2	1407.0	1510.7	1595.5	1577.0	1442.9	1425.6	1238.2
20°	1253.2	1252.8	1258.0	1278.6	1343.2	1459.9	1592.7	1637.1	1507.2	1487.0	1270.1
22.5°	1300.8	1300.0	1295.6	1291.5	1309.3	1410.2	1580.6	1694.4	1583.8	1562.0	1315.4
25°	1373.9	1372.7	1365.8	1341.2	1323.8	1383.5	1569.3	1747.7	1674.6	1650.5	1370.2
27.5°	1463.1	1462.3	1449.8	1412.7	1367.9	1386.0	1563.6	1802.7	1779.6	1755.8	1433.7
30°	1572.6	1570.9	1545.1	1492.6	1434.1	1424.3	1571.3	1864.4	1889.1	1870.8	1506.7
32.5°	1709.8	1705.3	1671.5	1592.3	1510.3	1475.6	1585.9	1927.8	2018.6	2001.7	1604.4
35°	1816.0	1809.1	1789.3	1719.4	1598.8	1538.6	1619.7	2002.8	2174.4	2159.6	1729.2
37.5°	1907.2	1900.4	1884.2	1826.9	1725.5	1619.0	1674.2	2103.0	2358.5	2351.4	1881.4
40°	2005.7	1994.4	1986.8	1925.4	1833.7	1734.8	1752.1	2220.0	2570.5	2571.3	2064.2
42.5°	2081.6	2077.2	2078.0	2030.7	1938.3	1872.1	1855.6	2352.1	2824.5	2832.2	2284.3
45°	2146.7	2143.0	2157.9	2124.8	2043.6	1962.2	1976.6	2501.5	3102.3	3117.9	2530.5
47.5°	2196.7	2200.7	2222.1	2200.7	2153.1	2025.5	2084.0	2662.5	3394.1	3396.1	2784.9
50°	2246.7	2248.3	2283.9	2273.3	2254.0	2105.9	2182.9	2842.6	3701.8	3705.4	3022.7
52.5°	2262.5	2260.0	2316.6	2342.4	2343.3	2205.2	2311.0	3038.8	4003.3	4015.0	3267.4
55°	2181.7	2188.6	2279.8	2384.8	2426.4	2342.4	2483.7	3287.2	4324.7	4329.6	3509.6
57.5°	1786.9	1824.8	2026.7	2270.2	2480.1	2539.0	2732.0	3577.5	4695.7	4691.3	3755.1
60°	1084.4	1129.7	1371.0	1903.9	2304.9	2736.4	3097.8	4027.1	5101.1	5088.6	4003.3
62.5°	606.4	620.1	697.2	1139.7	1753.0	2610.9	3455.1	4604.9	5645.3	5603.0	4247.6
65°	446.9	451.4	469.6	558.3	861.5	2008.2	3376.8	5295.7	6409.9	6334.5	4540.3
67.5°	388.4	392.8	410.6	422.7	384.8	1054.9	2782.1	5678.8	7380.9	7282.0	4936.4
70°	327.0	329.4	358.1	366.1	275.3	401.3	1787.3	5560.5	8279.6	8208.9	5361.5
72.5°	243.8	253.6	295.1	314.5	220.9	213.2	841.3	4861.7	8431.9	8432.7	5332.9
75°	165.5	174.5	222.0	258.8	170.4	149.3	339.6	3630.3	7342.2	7342.2	4674.7
77.5°	113.1	120.3	154.7	203.1	129.1	102.5	176.0	2304.1	5267.4	5452.7	3332.0
80°	50.0	54.5	99.7	147.4	98.1	66.2	99.7	1261.7	3185.4	3146.2	1306.1
82.5°	24.6	28.3	63.8	92.0	63.3	40.8	52.5	599.9	1032.3	981.0	203.9
85°	4.8	6.5	34.3	39.2	29.5	18.1	19.8	184.5	124.3	142.1	43.2
87.5°	0.0	0.0	10.5	7.3	3.3	4.0	4.0	16.5	9.7	11.3	11.3
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°	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5	1075.5
2.5°	1079.1	1064.3	1031.6	999.3	966.2	935.8	914.8	893.8	880.9	875.2	876.1
5°	1087.6	1057.4	988.7	916.9	845.8	776.3	724.3	675.5	660.1	634.7	636.3
7.5°	1101.0	1051.8	943.5	822.4	706.9	605.2	531.7	473.1	449.8	427.1	426.7
10°	1109.9	1041.2	883.8	721.9	565.6	451.4	381.1	338.8	323.4	309.7	309.2
12.5°	1113.5	1021.8	815.1	609.3	440.0	344.0	302.0	282.2	277.0	272.1	272.1
15°	1116.7	1002.9	738.4	500.6	347.6	287.8	271.3	264.9	261.2	258.0	258.0
17.5°	1119.5	978.7	650.8	406.9	293.6	265.3	257.2	250.3	247.4	243.8	243.8
20°	1129.2	955.2	572.5	335.9	264.0	249.1	240.3	233.0	230.5	228.1	228.5
22.5°	1147.4	936.2	496.6	287.8	246.3	232.6	221.2	213.2	211.6	209.9	208.7
25°	1169.2	912.9	425.2	256.8	228.9	213.6	201.1	194.2	192.6	193.0	192.2
27.5°	1197.1	887.0	363.8	237.0	213.6	195.8	181.6	176.4	177.2	178.9	178.0
30°	1227.7	863.2	315.7	223.2	199.9	180.1	165.9	162.3	165.1	167.6	166.8
32.5°	1273.4	842.1	282.2	212.4	187.8	167.2	155.8	151.4	154.7	157.8	157.0
35°	1335.6	831.7	263.2	203.1	177.2	157.0	145.8	142.5	145.8	146.6	146.2
37.5°	1411.8	830.9	255.1	195.4	167.6	148.5	136.0	134.9	137.2	137.7	136.8
40°	1510.3	836.1	249.1	189.7	157.4	138.9	127.2	126.0	126.8	129.6	129.1
42.5°	1635.1	857.9	240.7	182.4	146.6	129.1	119.9	117.1	116.6	119.9	119.5
45°	1791.7	906.0	229.3	170.8	136.8	121.2	111.8	108.6	107.4	108.2	109.4
47.5°	1962.5	964.9	218.0	159.9	130.0	114.7	105.4	101.4	99.3	99.3	99.3
50°	2128.0	1031.6	210.3	148.5	125.2	108.6	98.5	94.5	91.2	90.4	90.0
52.5°	2292.0	1097.0	204.3	137.2	119.5	101.0	92.0	87.6	83.9	82.4	81.6
55°	2441.3	1159.1	193.8	126.4	112.2	92.9	85.6	81.2	76.7	73.9	72.7
57.5°	2584.6	1210.7	174.5	115.1	101.0	85.2	78.7	73.9	68.7	65.0	63.3
60°	2715.0	1237.4	150.2	102.9	89.6	77.1	71.0	66.6	59.8	53.7	52.1
62.5°	2814.3	1226.9	123.9	89.2	77.9	69.8	62.2	57.7	49.6	42.4	39.6
65°	2916.1	1169.6	98.9	74.7	68.3	60.2	52.1	47.7	38.3	30.6	28.7
67.5°	3048.1	1047.2	77.9	62.2	58.9	47.7	40.8	37.9	31.5	24.2	22.7
70°	3132.9	813.5	60.6	50.4	48.5	34.7	31.5	31.1	25.0	18.6	16.5
72.5°	2900.3	533.3	46.4	38.3	34.7	22.7	24.2	24.2	18.1	12.5	10.9
75°	2421.2	312.1	33.5	27.5	19.8	14.6	16.5	16.5	11.3	6.0	4.8
77.5°	1729.2	166.4	22.2	16.9	10.0	6.5	8.9	8.5	3.6	0.4	0.0
80°	661.3	57.3	10.5	6.9	2.9	1.2	0.8	0.4	0.4	0.0	0.0
82.5°	101.0	15.0	2.0	1.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	18.1	2.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	4.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
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)