

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: P960514

Luminaire Tested: **NAV-SB1C-830-U-T3R**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P960514
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-5)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB1C-830-U-T3R
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(1) 80 CRI, 3000K, 615mA LIGHTSQUARE WITH 26 LEDS AND TYPE III ROADWAY OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7083.8 lumens
Efficiency: N/A
Efficacy: 130.2 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type III - 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



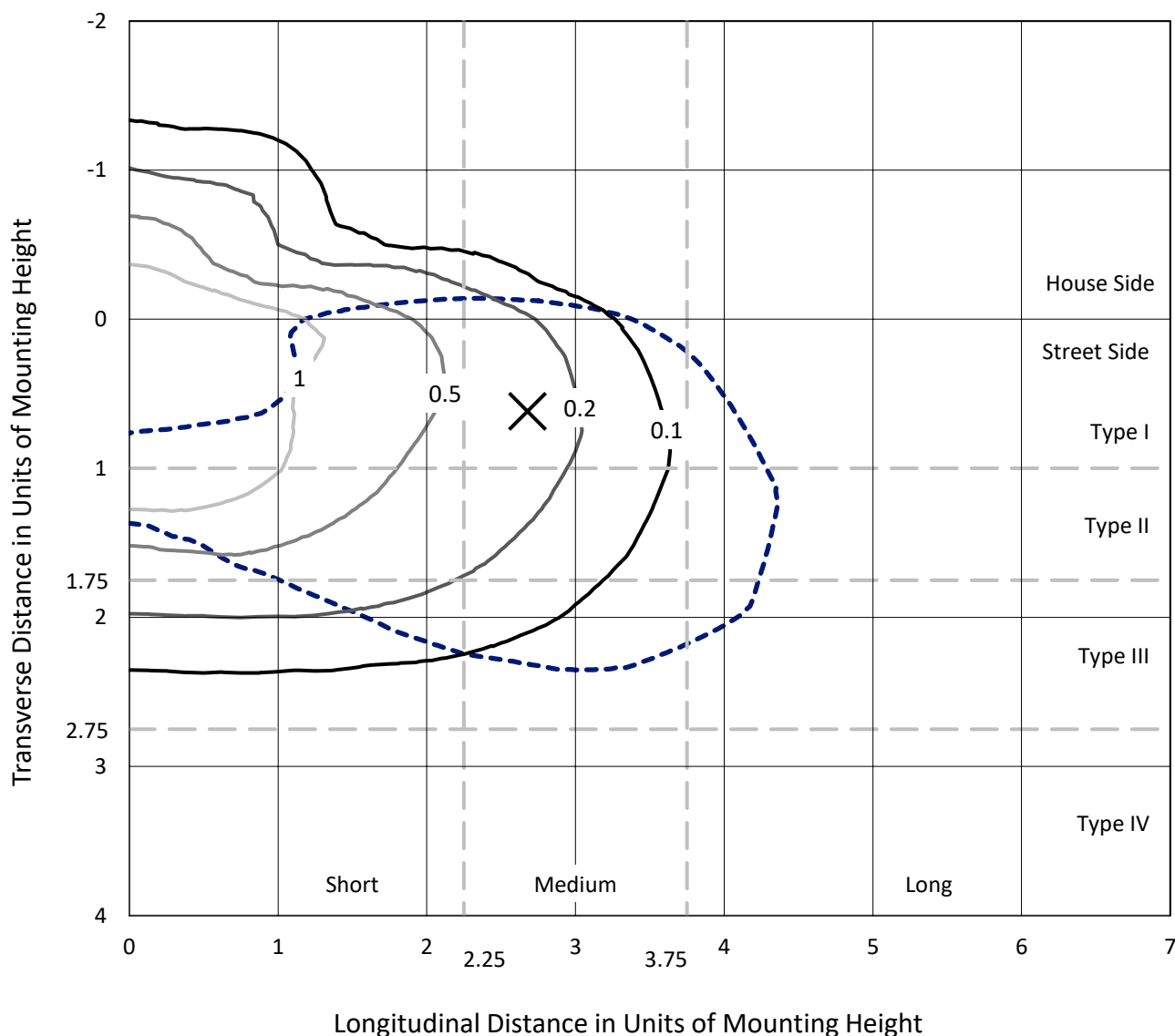
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Iso-Footcandle Lines of Horizontal Illumination

× Max cd

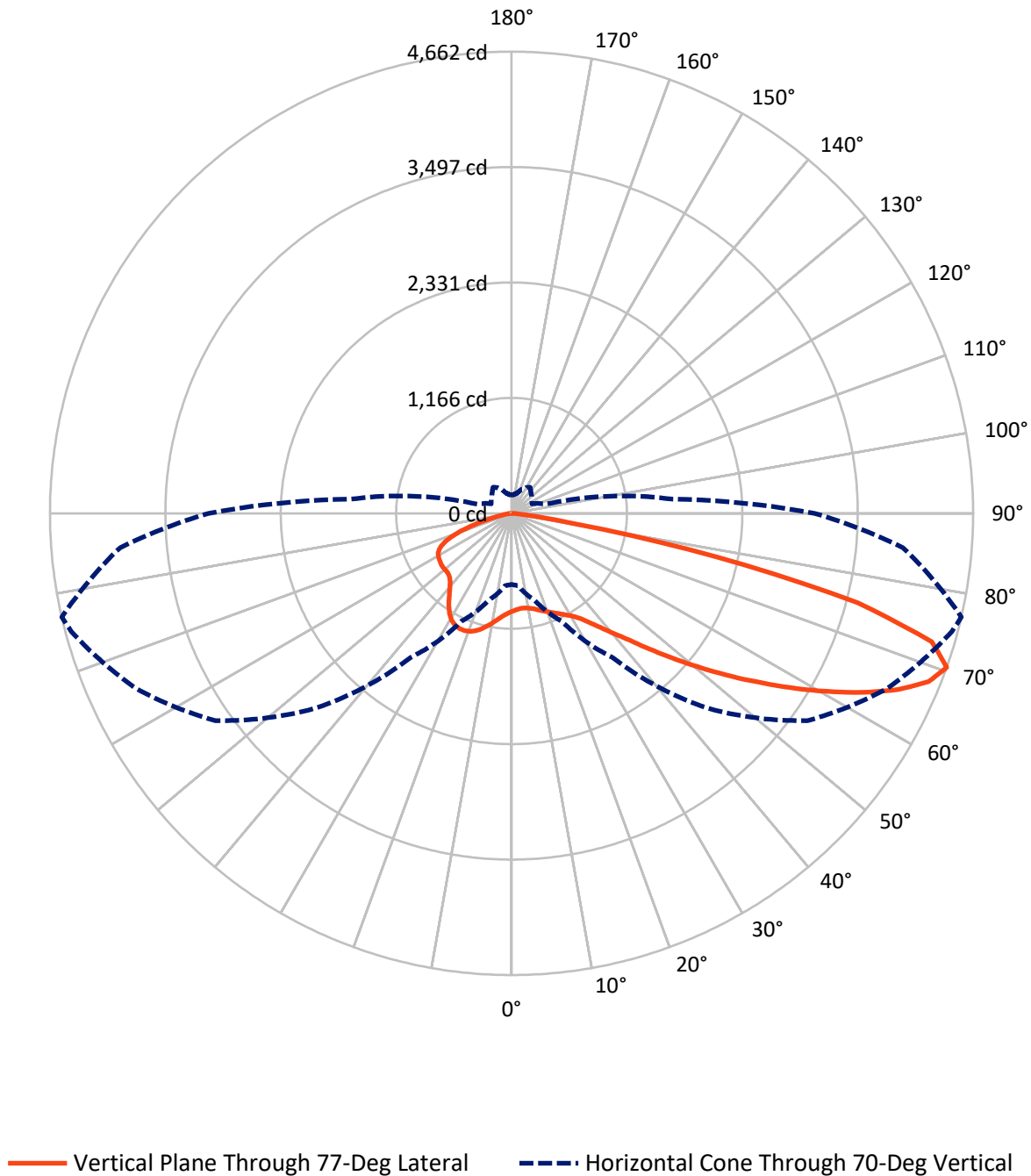
--- 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 1.9 fc
Type III - Medium - N/A

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Luminous Intensity Polar Plot



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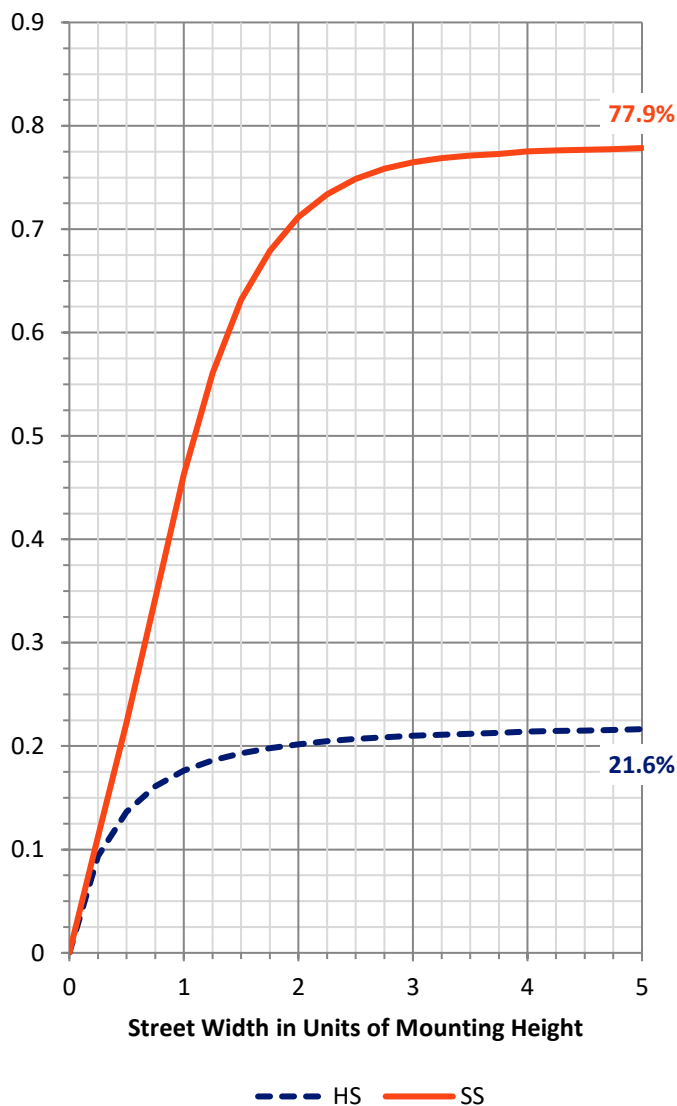
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1551.2	0.0	1551.2
	% Fixture	21.9	0.0	21.9
Street Side	Lumens	5532.5	0.0	5532.5
	% Fixture	78.1	0.0	78.1
Total	Lumens	7083.8	0.0	7083.8
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	94.3	1.3
10°-20°	272.0	3.8
20°-30°	465.2	6.6
30°-40°	748.1	10.6
40°-50°	1168.0	16.5
50°-60°	1560.1	22.0
60°-70°	1662.8	23.5
70°-80°	1023.6	14.5
80°-90°	89.7	1.3
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°	7083.8	100.0
0°-180°	7083.8	100.0

Coefficient of Utilization



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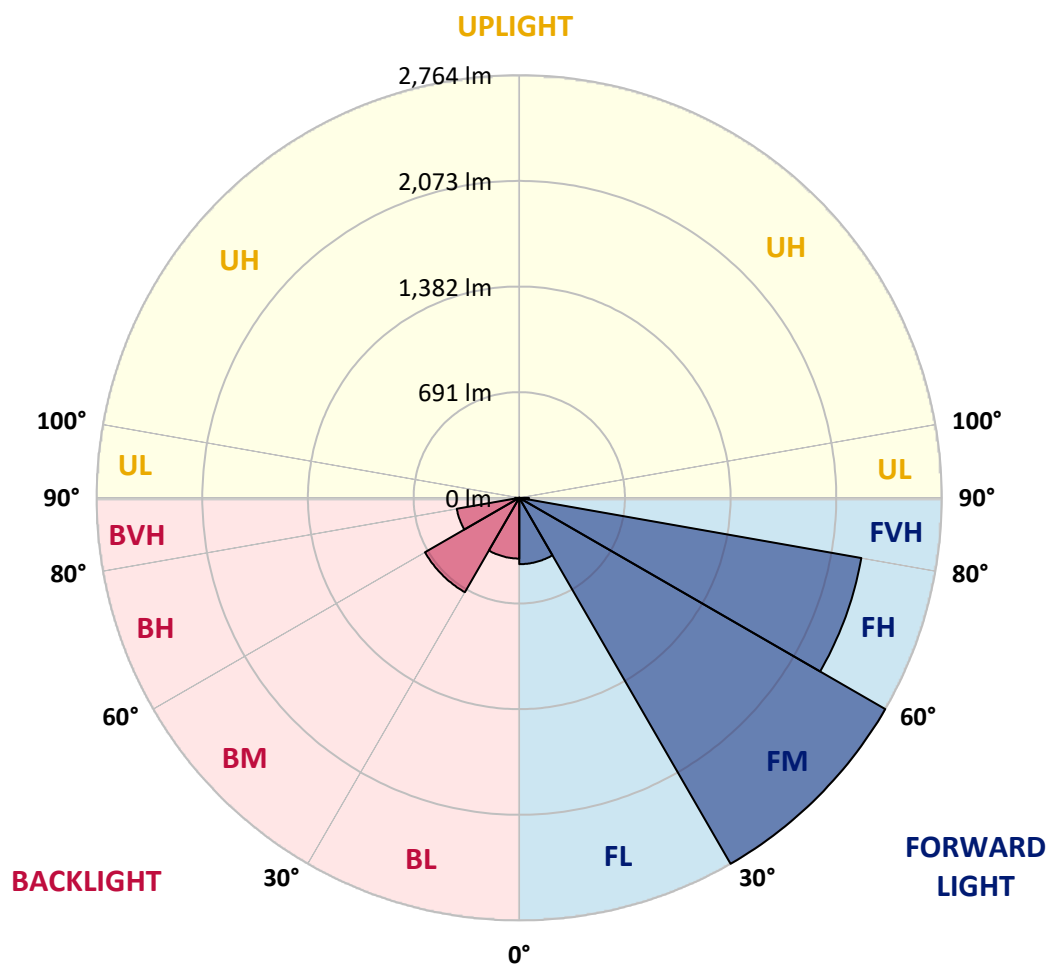
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	434.0	6.1			
FM	(30°-60°)	2763.9	39.0			
FH	(60°-80°)	2271.9	32.1			G2/5000
FVH	(80°-90°)	62.7	0.9			G1/100
BL	(0°-30°)	397.5	5.6	B1/500		
BM	(30°-60°)	712.2	10.1	B1/1000		
BH	(60°-80°)	414.6	5.9	B1/500		G1/500
BVH	(80°-90°)	27.0	0.4			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G2

Type III Medium



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	77°	85°
0°	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2
2.5°	911.0	910.6	915.3	916.8	925.5	931.6	943.3	955.6	971.6	973.3	983.2
5°	858.3	858.3	863.8	869.6	880.9	893.2	911.0	932.3	959.9	964.3	988.6
7.5°	813.7	816.6	821.3	832.6	845.6	863.5	890.6	921.2	957.5	964.3	1003.5
10°	777.9	781.0	786.9	796.0	815.6	840.2	875.8	915.0	963.6	974.5	1025.2
12.5°	766.6	769.9	773.2	780.0	798.2	827.2	869.6	917.9	978.5	989.3	1055.0
15°	792.7	796.7	794.2	792.3	801.8	828.3	872.5	928.3	996.9	1012.6	1091.6
17.5°	852.9	854.3	848.6	831.5	830.0	844.2	886.3	942.9	1020.2	1037.2	1128.6
20°	950.2	947.6	935.6	901.9	882.6	879.8	909.9	964.6	1044.2	1062.3	1168.6
22.5°	1082.2	1079.3	1055.3	1002.0	959.2	930.9	944.0	992.9	1070.9	1091.3	1207.3
25°	1246.9	1242.9	1207.8	1135.2	1068.8	998.8	990.5	1030.3	1104.0	1122.9	1248.0
27.5°	1439.2	1435.9	1397.9	1302.1	1206.3	1091.6	1048.1	1074.2	1138.5	1159.9	1293.8
30°	1646.0	1655.5	1587.9	1484.9	1363.8	1212.8	1125.8	1128.3	1183.1	1202.3	1349.2
32.5°	1889.1	1905.4	1824.1	1693.5	1528.1	1344.5	1223.7	1203.8	1248.0	1263.9	1419.2
35°	2130.0	2148.5	2081.0	1936.6	1746.1	1499.8	1326.0	1290.5	1334.3	1351.8	1512.1
37.5°	2338.2	2362.8	2328.1	2202.5	1979.4	1686.9	1459.5	1392.4	1440.6	1462.5	1636.9
40°	2502.5	2540.3	2537.7	2459.4	2254.4	1914.1	1628.9	1518.3	1572.8	1596.3	1788.2
42.5°	2636.1	2668.7	2697.0	2693.0	2541.4	2172.1	1828.1	1681.9	1723.2	1750.5	1958.4
45°	2728.2	2763.0	2824.0	2889.7	2817.4	2448.1	2056.4	1876.1	1913.8	1954.8	2161.2
47.5°	2810.5	2850.1	2929.2	3033.3	3051.8	2725.3	2306.2	2102.1	2136.5	2178.9	2364.7
50°	2817.8	2852.0	2974.5	3122.3	3218.4	2991.6	2574.8	2355.7	2387.9	2433.2	2582.7
52.5°	2642.6	2696.3	2910.4	3119.7	3294.9	3214.4	2841.4	2619.4	2655.7	2710.1	2808.4
55°	2051.2	2130.0	2722.1	3022.4	3267.7	3358.4	3095.0	2899.8	2946.3	3003.2	3035.5
57.5°	1766.8	1801.2	2160.8	2845.4	3143.6	3395.7	3309.0	3183.1	3257.9	3320.3	3275.7
60°	1587.9	1616.6	1829.2	2570.0	2980.4	3336.6	3474.4	3447.3	3576.4	3650.8	3521.3
62.5°	1396.4	1423.6	1616.9	2145.9	2771.4	3238.3	3579.0	3691.0	3902.9	3984.2	3752.7
65°	1206.3	1229.5	1414.9	1803.1	2505.8	3140.0	3633.0	3901.9	4205.2	4289.3	3945.0
67.5°	994.5	1013.6	1188.9	1521.2	2182.9	3005.4	3659.9	4067.6	4468.2	4540.3	4040.0
70°	717.6	732.5	913.5	1203.0	1777.7	2774.0	3649.0	4185.2	4604.6	4662.3	3968.3
72.5°	339.2	352.6	565.2	781.0	1255.6	2323.4	3428.7	4092.0	4466.0	4437.3	3528.6
75°	181.0	192.6	324.7	428.4	663.2	1592.6	2805.8	3524.9	3750.2	3610.9	2607.8
77.5°	122.6	131.7	201.0	257.2	302.9	756.0	1803.5	2440.5	2348.0	2118.0	1306.1
80°	97.3	106.7	164.7	174.1	146.6	273.2	745.2	1129.8	811.6	649.0	371.5
82.5°	74.7	85.3	138.6	126.3	79.8	112.1	217.0	357.3	207.9	158.2	90.0
85°	45.7	57.0	108.9	80.6	45.0	51.1	73.7	99.4	63.4	53.0	32.3
87.5°	23.3	32.7	55.1	29.4	20.3	12.0	19.6	19.6	16.7	14.6	8.3
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°	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2	988.2
2.5°	991.9	999.2	1011.5	1023.1	1032.2	1040.9	1049.6	1054.3	1055.8	1061.5	1064.8
5°	1003.5	1016.9	1040.9	1063.3	1077.5	1086.2	1092.3	1096.0	1096.8	1098.5	1101.5
7.5°	1024.9	1046.3	1079.6	1102.2	1112.7	1111.9	1109.5	1100.3	1096.8	1093.5	1094.2
10°	1055.0	1083.3	1124.3	1139.9	1133.3	1115.9	1093.5	1067.0	1054.6	1042.6	1039.0
12.5°	1092.3	1128.3	1168.6	1167.9	1135.5	1090.9	1038.6	998.0	972.3	953.8	949.5
15°	1137.8	1179.1	1209.9	1185.2	1114.5	1034.3	957.8	904.8	881.6	861.3	859.1
17.5°	1184.5	1228.8	1242.9	1179.8	1061.5	950.5	863.8	822.0	799.2	788.3	791.6
20°	1230.2	1274.2	1262.5	1148.6	981.0	855.5	778.2	755.3	750.6	753.2	752.0
22.5°	1278.5	1317.6	1266.5	1088.3	878.3	758.2	715.8	716.5	727.0	734.6	736.5
25°	1327.8	1354.3	1256.0	1001.3	768.0	686.7	676.3	687.9	708.6	723.4	727.4
27.5°	1375.3	1386.9	1233.2	893.6	673.3	635.6	637.4	661.3	692.6	713.3	718.3
30°	1429.1	1415.9	1189.2	772.3	607.7	591.7	607.0	634.9	666.0	684.6	688.9
32.5°	1489.6	1441.0	1119.6	660.3	561.3	556.6	581.6	599.7	613.5	618.9	621.9
35°	1565.1	1476.2	1030.3	581.6	519.5	530.7	554.7	545.6	540.2	537.3	540.2
37.5°	1663.1	1523.8	925.9	530.4	485.7	512.3	522.0	493.7	472.3	461.9	464.4
40°	1780.9	1593.4	825.3	490.9	464.4	496.3	479.3	445.2	417.9	403.0	404.2
42.5°	1911.9	1666.3	740.9	461.1	452.4	483.3	447.7	407.0	363.2	358.4	363.2
45°	2049.4	1741.4	683.2	438.3	446.6	472.0	429.6	363.9	332.7	351.9	362.0
47.5°	2186.9	1810.4	648.3	421.2	443.7	459.3	413.6	339.9	317.9	345.7	358.9
50°	2340.0	1872.1	632.7	408.9	440.4	454.2	389.6	333.7	302.2	320.7	334.5
52.5°	2492.1	1919.9	621.2	396.6	435.7	450.2	378.0	326.6	283.3	284.4	292.0
55°	2643.7	1951.1	608.4	380.2	425.2	441.6	376.9	318.6	269.2	264.1	267.7
57.5°	2805.5	1968.9	592.8	362.0	407.0	419.4	375.9	312.3	264.9	256.5	257.6
60°	2970.2	1995.0	572.5	339.9	382.7	392.9	373.3	310.2	262.3	248.2	249.3
62.5°	3117.8	2004.1	548.2	318.9	351.6	366.7	367.9	308.4	255.4	231.1	231.1
65°	3214.7	1964.9	505.7	295.0	317.9	339.9	357.3	302.2	243.0	218.7	218.7
67.5°	3210.7	1853.2	439.3	264.1	285.2	310.2	342.1	291.7	228.2	203.6	204.6
70°	3061.3	1632.6	355.2	228.2	249.3	278.3	322.6	276.1	210.4	186.9	189.0
72.5°	2625.5	1277.8	258.0	186.1	207.6	245.3	297.1	257.2	192.3	172.0	170.9
75°	1875.6	808.6	174.9	143.0	161.4	207.9	265.6	235.1	175.6	172.7	162.9
77.5°	958.2	386.4	115.7	104.4	112.4	164.0	223.1	210.0	178.1	142.6	127.0
80°	311.6	142.6	72.9	71.1	74.7	109.2	172.7	172.3	135.0	96.9	85.6
82.5°	99.4	61.3	47.6	45.7	43.9	68.6	120.4	136.4	91.0	61.3	61.0
85°	39.6	36.6	28.0	25.7	18.6	32.3	63.1	90.7	67.9	44.3	45.3
87.5°	14.6	14.6	7.6	5.4	4.0	10.9	17.0	27.2	38.8	22.9	22.4
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)