

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: P962454

Luminaire Tested: **NAV-SB2C-735-U-SLL-HSS**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P962454
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-9)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB2C-735-U-SLL-HSS
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(2) 70 CRI, 3500K, 615mA LIGHTSQUARES WITH 26 LEDS EACH AND SPILL LIGHT
ELIMINATOR LEFT OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 11715.7 lumens
Efficiency: N/A
Efficacy: 116.1 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B2 - U0 - G3

Input Watts (W): 100.9
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



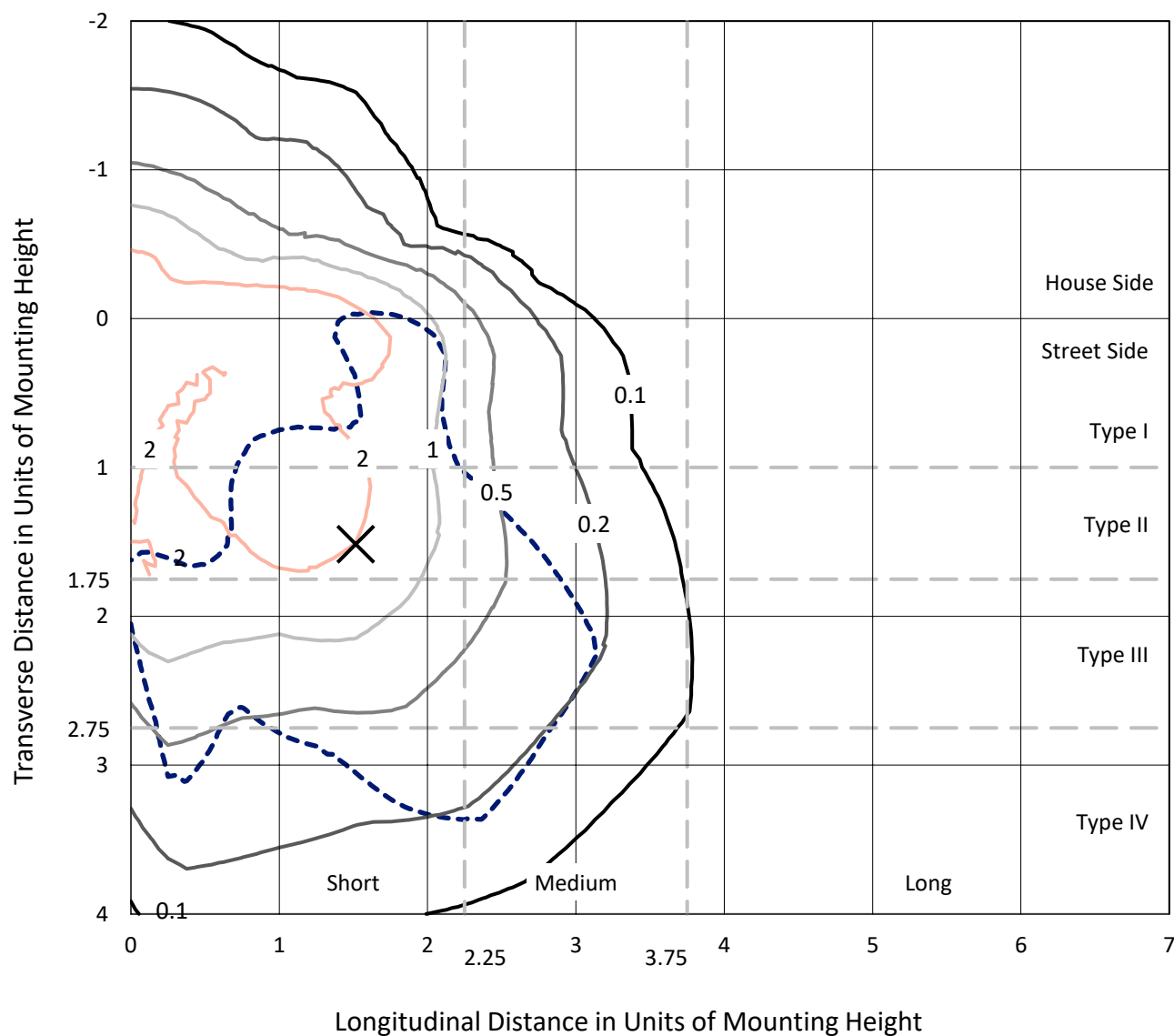
REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

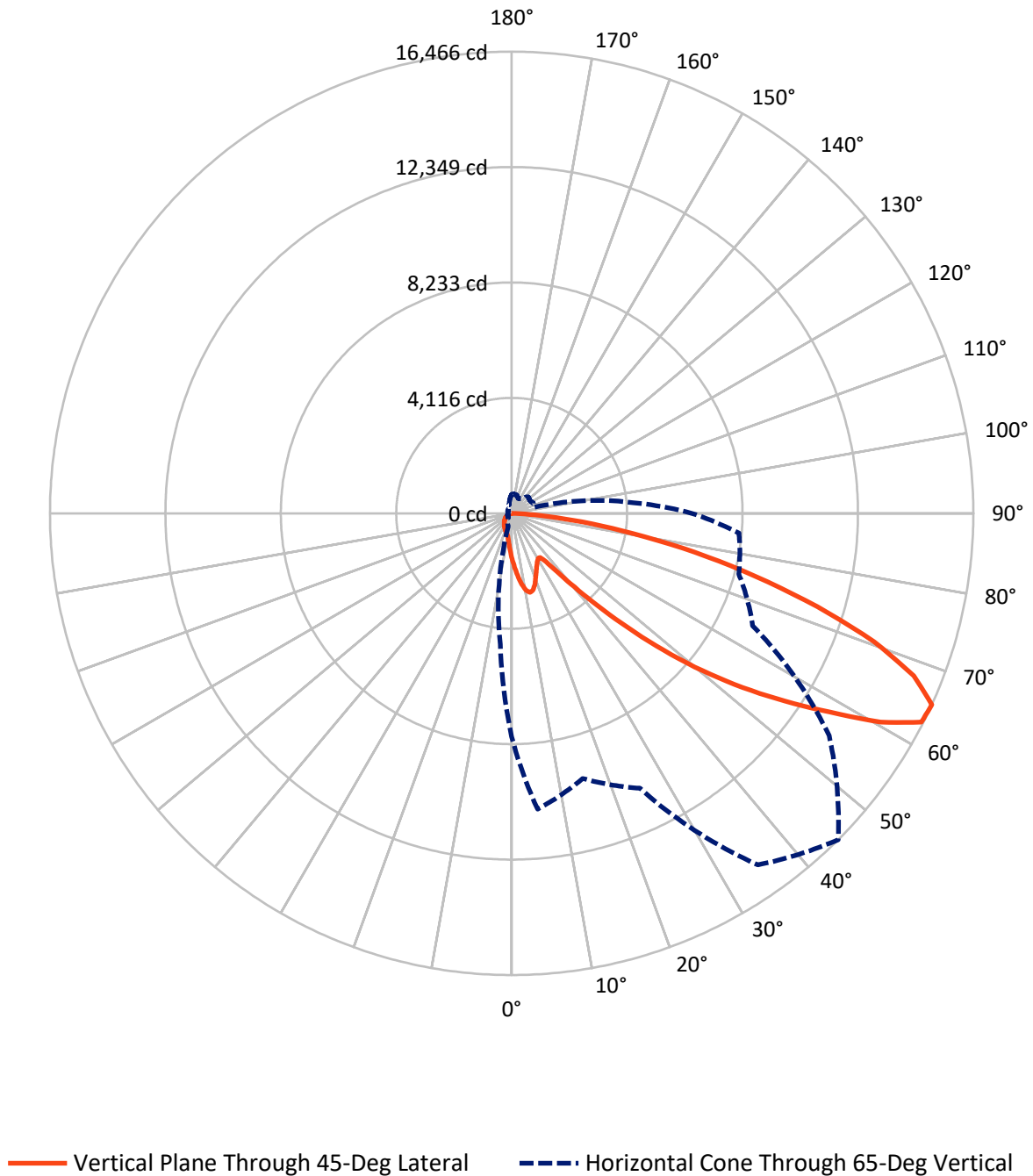


Based on 25 foot mounting height. Maximum calculated value = 4.3 fc

Type IV - Short - N/A

REPORT NUMBER: P962454
CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

Luminous Intensity Polar Plot



REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

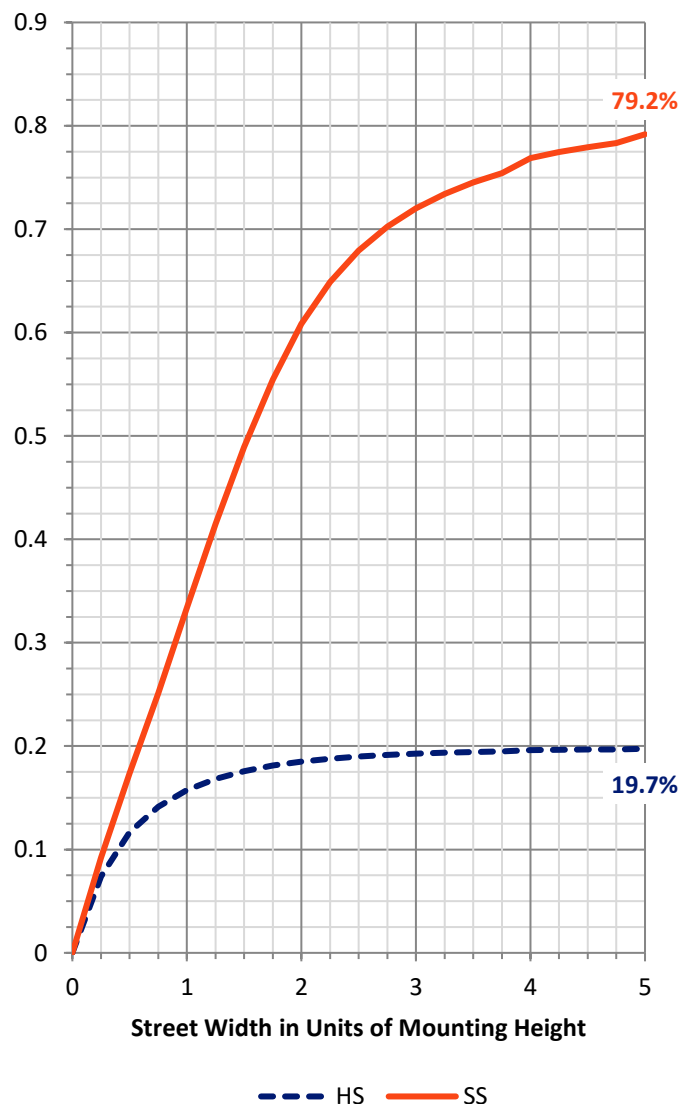
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	2328.7	0.0	2328.7
	% Fixture	19.9	0.0	19.9
Street Side	Lumens	9387.0	0.0	9387.0
	% Fixture	80.1	0.0	80.1
Total	Lumens	11715.7	0.0	11715.7
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	159.7	1.4
10°-20°	478.8	4.1
20°-30°	705.3	6.0
30°-40°	906.2	7.7
40°-50°	1465.6	12.5
50°-60°	2570.0	21.9
60°-70°	3215.8	27.4
70°-80°	1879.1	16.0
80°-90°	335.3	2.9
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°	11715.7	100.0
0°-180°	11715.7	100.0

Coefficient of Utilization



REPORT NUMBER: P962454

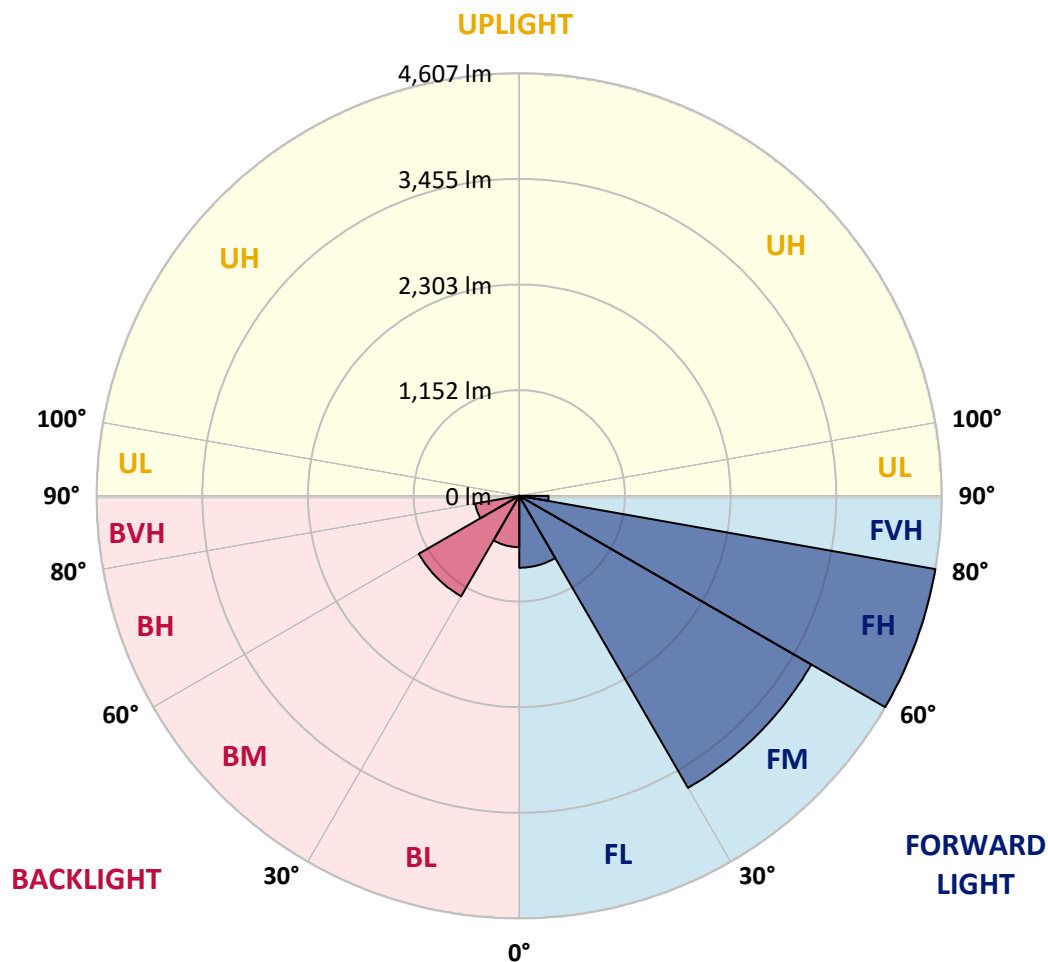
CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	783.9	6.7			
FM	(30°-60°)	3676.5	31.4			
FH	(60°-80°)	4607.0	39.3			G2/5000
FVH	(80°-90°)	319.6	2.7			G3/500
BL	(0°-30°)	559.9	4.8	B2/1000		
BM	(30°-60°)	1265.2	10.8	B2/2500		
BH	(60°-80°)	487.9	4.2	B1/500		G1/500
BVH	(80°-90°)	15.7	0.1			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B2-U0-G3

Type IV Short



REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3
2.5°	1817.5	1831.3	1861.9	1878.1	1903.1	1904.8	1904.8	1882.9	1882.1	1837.7	1832.9
5°	2031.4	2063.7	2136.4	2211.4	2227.5	2231.6	2223.5	2180.0	2147.7	2061.3	2042.7
7.5°	2243.7	2305.8	2416.4	2516.5	2548.8	2548.8	2529.4	2458.4	2392.2	2267.1	2220.4
10°	2419.6	2497.9	2648.1	2760.2	2797.4	2789.3	2749.8	2660.2	2569.0	2417.3	2355.9
12.5°	2535.8	2623.9	2788.5	2878.9	2916.8	2895.8	2850.6	2763.5	2667.5	2507.7	2438.3
15°	2594.0	2686.0	2828.9	2876.5	2866.0	2844.2	2838.5	2796.6	2723.9	2574.6	2498.7
17.5°	2619.0	2704.6	2803.9	2774.0	2685.2	2668.3	2724.8	2778.1	2760.2	2632.7	2561.7
20°	2642.4	2714.3	2744.1	2611.8	2456.8	2441.4	2549.6	2701.4	2778.8	2686.8	2621.4
22.5°	2674.7	2719.1	2657.7	2440.6	2273.6	2238.1	2357.5	2586.0	2784.5	2755.4	2690.0
25°	2719.1	2731.2	2562.5	2278.5	2110.6	2075.0	2186.4	2457.6	2774.8	2829.7	2774.0
27.5°	2772.3	2747.3	2471.3	2142.9	1980.6	1947.5	2058.9	2334.1	2747.3	2903.9	2864.4
30°	2841.8	2768.3	2381.0	2037.9	1887.7	1863.6	1970.9	2227.5	2713.5	2998.3	2976.6
32.5°	2912.0	2777.2	2297.0	1976.6	1866.8	1875.6	1963.7	2170.2	2676.3	3088.7	3099.2
35°	2987.9	2805.4	2255.8	2037.1	2041.9	2119.4	2155.8	2223.5	2670.6	3211.4	3252.6
37.5°	3091.2	2868.4	2305.0	2338.1	2506.0	2666.6	2636.8	2484.2	2736.0	3394.6	3471.3
40°	3239.7	2979.0	2519.8	2850.6	3195.2	3456.0	3342.2	2957.9	2936.2	3658.5	3773.1
42.5°	3456.0	3155.0	2900.6	3477.0	4061.3	4490.6	4185.6	3568.9	3286.5	4035.4	4181.6
45°	3775.6	3439.8	3361.6	4137.9	5129.1	5805.4	5171.0	4220.3	3777.2	4606.0	4720.6
47.5°	4218.7	3858.7	3793.3	4834.5	6426.9	7301.8	6263.9	4824.0	4335.8	5384.1	5410.8
50°	4807.0	4422.9	4202.5	5596.4	7849.8	8827.2	7355.8	5406.7	4975.8	6334.9	6304.2
52.5°	5583.5	5209.8	4679.5	6322.0	9313.0	10320.3	8452.7	5918.5	5769.9	7438.1	7375.2
55°	6642.4	6393.7	5331.6	7014.5	10775.5	11822.2	9506.8	6401.0	6819.1	8748.9	8367.9
57.5°	7956.4	8133.9	6271.9	7817.5	12090.3	13370.3	10565.7	7075.8	8181.6	10214.5	8944.3
60°	8803.7	10447.8	8072.6	9004.7	13584.2	15120.9	12016.8	8359.1	9613.3	10739.9	8834.5
62.5°	8598.7	11183.9	10229.1	10520.5	14957.8	16393.6	13438.9	9648.0	9882.8	9966.0	7988.6
65°	7970.1	10589.9	9789.3	10815.1	15305.7	16465.5	13819.0	9481.8	8383.3	8136.3	6421.2
67.5°	7104.8	9885.3	8744.1	10033.8	14677.0	15461.5	13111.2	8387.3	6478.5	6105.6	4658.5
70°	6171.0	9105.6	8058.0	9157.2	13478.4	13711.7	11907.8	7376.8	4765.1	4123.5	2989.5
72.5°	5284.8	8293.7	7588.3	8258.9	11879.6	11397.0	10341.3	6483.3	3469.7	2974.1	2125.0
75°	4378.5	7096.0	6919.2	7192.0	9777.2	8977.3	8592.3	5367.9	2723.1	2151.7	1466.5
77.5°	3378.5	5544.7	5951.5	5759.4	6882.1	6668.2	6660.1	4033.9	1989.5	1435.8	919.3
80°	2312.3	3864.4	4649.7	4062.9	4466.4	4357.5	5016.0	2706.2	1443.1	864.4	511.7
82.5°	1359.1	2352.7	3236.4	1966.9	2469.7	2535.0	2987.1	1316.4	849.1	199.4	111.4
85°	551.2	929.0	1265.6	770.0	1191.3	1004.8	1134.0	369.6	236.5	4.8	0.0
87.5°	138.8	297.0	208.3	86.4	138.0	126.7	100.0	45.2	9.6	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

REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

CANDELA DISTRIBUTION (continued):

	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°	185°
0°	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3
2.5°	1801.4	1782.9	1736.9	1690.8	1653.7	1603.7	1570.6	1531.0	1493.1	1459.2	1452.7
5°	1991.9	1930.6	1846.6	1770.0	1691.7	1615.8	1540.8	1461.6	1389.0	1344.6	1316.4
7.5°	2146.9	2038.7	1927.3	1829.7	1735.2	1646.5	1547.2	1451.2	1337.3	1276.8	1221.9
10°	2262.3	2120.2	1974.2	1861.9	1766.7	1680.4	1596.4	1499.6	1362.3	1286.5	1204.2
12.5°	2338.1	2169.5	1998.3	1870.0	1763.5	1696.5	1659.4	1621.4	1485.0	1396.3	1276.8
15°	2390.6	2204.2	2015.4	1851.5	1720.8	1671.5	1708.6	1752.2	1665.0	1562.5	1406.8
17.5°	2447.9	2249.4	2022.5	1801.4	1637.6	1616.6	1712.7	1813.5	1809.5	1707.9	1555.2
20°	2508.5	2288.9	2017.7	1720.8	1536.7	1555.2	1677.9	1795.0	1844.2	1789.3	1653.7
22.5°	2570.6	2326.9	1999.2	1615.8	1442.3	1500.4	1623.1	1725.6	1783.7	1766.7	1663.4
25°	2648.9	2380.2	1971.7	1502.9	1364.0	1444.7	1559.3	1642.5	1682.7	1682.0	1611.0
27.5°	2742.5	2451.2	1957.2	1411.6	1308.3	1381.7	1483.5	1557.7	1586.0	1586.0	1529.4
30°	2851.4	2535.0	1941.0	1351.9	1276.0	1316.4	1395.4	1468.1	1496.4	1496.4	1448.7
32.5°	2972.5	2615.8	1902.3	1315.6	1251.8	1252.7	1302.7	1368.8	1402.7	1407.5	1373.7
35°	3117.8	2702.1	1817.5	1286.5	1223.5	1190.4	1214.6	1269.6	1309.9	1320.4	1299.4
37.5°	3308.3	2807.9	1696.5	1243.7	1180.0	1125.0	1130.8	1172.7	1217.1	1233.3	1219.5
40°	3564.1	2932.2	1570.6	1182.4	1118.6	1053.3	1050.8	1081.5	1125.0	1142.9	1135.6
42.5°	3902.3	3081.5	1450.4	1123.5	1044.4	977.4	973.3	997.5	1035.5	1054.1	1050.8
45°	4334.9	3264.7	1347.1	1077.5	971.7	905.6	903.9	924.1	957.2	976.6	972.5
47.5°	4936.2	3447.9	1276.8	1053.3	914.4	846.6	849.8	867.7	897.5	911.2	905.6
50°	5719.9	3503.6	1241.3	1053.3	883.8	794.2	810.4	824.8	847.5	855.6	848.3
52.5°	6472.1	3319.6	1209.0	1059.7	887.8	749.8	784.5	795.0	814.4	817.5	807.1
55°	6841.0	2853.9	1164.6	1061.3	912.9	711.9	763.5	782.9	790.2	789.4	771.6
57.5°	6714.2	2307.5	1089.6	1054.8	929.8	687.7	737.7	774.8	779.6	772.3	739.3
60°	6269.5	1698.9	1032.3	1007.3	923.3	680.4	698.1	757.1	764.3	754.6	700.6
62.5°	5523.7	1179.2	987.9	902.3	895.0	677.9	636.0	718.3	736.1	722.3	643.3
65°	4348.7	832.9	850.6	791.0	833.7	665.0	571.4	671.5	695.7	674.8	563.3
67.5°	2942.7	601.3	689.2	716.7	734.4	636.0	524.6	618.3	650.6	623.1	470.6
70°	1589.2	422.1	455.2	603.7	623.9	586.0	482.7	564.2	601.3	571.4	383.3
72.5°	938.7	303.5	318.8	485.0	519.8	515.8	435.8	501.2	546.4	510.9	311.5
75°	517.3	205.0	227.6	351.9	422.1	397.9	374.5	424.6	470.6	435.8	240.5
77.5°	231.6	122.7	158.2	230.8	331.7	272.8	289.8	330.9	373.7	337.3	160.6
80°	89.6	68.6	105.0	125.9	241.3	150.9	186.4	243.7	274.4	245.4	97.7
82.5°	11.3	30.6	45.2	49.2	140.4	79.9	108.1	153.3	150.9	130.8	49.2
85°	0.0	5.6	6.5	3.2	60.6	29.0	35.5	50.0	46.8	35.5	4.0
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.6	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

REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

CANDELA DISTRIBUTION (continued):

	195°	205°	215°	225°	235°	245°	255°	265°	270°	275°	285°
0°	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3
2.5°	1413.3	1384.2	1369.6	1357.5	1368.8	1375.2	1375.2	1402.7	1418.9	1425.4	1470.6
5°	1245.4	1191.3	1155.0	1133.1	1140.4	1148.5	1157.3	1192.1	1215.4	1230.8	1301.0
7.5°	1112.9	1030.6	979.8	953.1	957.2	962.9	970.2	1004.0	1027.5	1047.7	1125.9
10°	1047.7	931.4	864.4	832.1	826.5	823.3	820.8	841.0	858.7	874.8	952.3
12.5°	1050.8	888.6	807.1	767.5	750.6	731.2	715.9	719.1	730.4	750.6	799.8
15°	1092.0	874.8	777.3	728.0	699.8	677.1	658.6	654.6	658.6	661.8	692.5
17.5°	1147.7	873.3	751.4	690.0	661.0	642.5	625.5	619.8	620.6	624.7	632.7
20°	1192.1	868.5	722.3	653.7	627.9	611.8	594.8	589.2	590.8	591.6	600.4
22.5°	1215.4	861.2	690.0	617.5	595.6	579.5	564.2	563.3	563.3	568.2	574.6
25°	1215.4	845.8	661.0	582.7	563.3	548.8	530.2	533.5	535.2	541.6	551.2
27.5°	1186.4	816.8	637.7	552.9	532.7	518.1	501.2	505.2	507.7	515.0	527.1
30°	1149.3	782.1	611.0	524.6	501.2	490.7	476.2	477.8	481.0	489.1	502.9
32.5°	1109.8	740.9	589.2	496.4	472.9	464.8	448.7	451.2	454.4	463.3	478.6
35°	1066.2	692.5	563.3	470.6	447.1	440.6	422.1	423.7	428.6	438.3	453.6
37.5°	1020.2	652.9	537.5	445.5	421.3	414.8	395.4	397.1	402.7	414.0	428.6
40°	975.0	614.2	510.0	418.9	394.6	389.0	368.1	369.6	376.1	388.2	403.5
42.5°	925.8	584.4	474.6	391.4	365.6	360.0	340.6	343.0	350.2	362.3	377.7
45°	866.8	565.0	435.0	365.6	336.5	330.9	313.1	318.0	326.1	338.1	354.3
47.5°	806.3	556.9	401.9	338.1	306.7	301.9	287.3	295.4	304.3	314.0	331.7
50°	748.1	546.4	368.1	312.3	280.8	276.0	266.3	276.9	285.7	294.6	311.5
52.5°	682.0	523.8	337.3	289.8	259.1	257.5	252.7	262.3	270.4	278.5	292.9
55°	613.4	487.5	310.8	269.6	240.5	242.1	239.7	247.7	254.2	261.5	274.4
57.5°	553.7	441.5	289.8	247.7	224.4	229.2	226.0	230.0	234.0	242.9	253.4
60°	493.1	386.6	266.3	221.9	208.3	213.9	205.0	204.2	205.8	208.3	227.6
62.5°	411.6	329.3	237.3	199.4	190.4	192.9	176.0	163.1	163.1	165.4	194.5
65°	330.9	276.0	205.0	173.5	166.3	164.6	140.4	122.7	121.1	128.3	153.3
67.5°	272.0	229.2	172.7	144.4	139.6	141.2	123.5	105.8	104.1	112.1	130.8
70°	225.2	184.8	138.0	111.4	116.2	123.5	105.8	88.8	86.4	93.6	111.4
72.5°	179.2	144.4	105.8	82.3	96.0	105.0	86.4	70.2	68.6	75.0	92.0
75°	131.5	103.3	71.9	59.8	74.2	82.3	62.9	50.0	47.7	53.3	70.2
77.5°	81.5	58.1	45.2	35.5	50.8	54.8	33.1	29.0	28.3	32.3	44.4
80°	37.9	25.0	21.8	12.1	18.6	21.8	13.7	15.4	16.1	19.4	27.5
82.5°	10.5	4.0	0.8	0.0	0.0	6.5	3.2	6.5	8.1	12.1	17.7
85°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.6	4.0	7.3	12.9
87.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	3.2	6.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

REPORT NUMBER: P962454

CATALOG NUMBER: NAV-SB2C-735-U-SLL-HSS

CANDELA DISTRIBUTION (continued):

	295°	305°	315°	325°	335°	345°	355°	360°
0°	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3	1622.3
2.5°	1504.4	1536.7	1588.3	1641.6	1694.1	1747.3	1799.0	1817.5
5°	1364.8	1439.0	1541.5	1651.3	1764.3	1878.9	1983.8	2031.4
7.5°	1209.0	1315.6	1469.7	1641.6	1821.6	2001.6	2167.1	2243.7
10°	1042.7	1177.5	1353.5	1586.0	1844.2	2092.7	2320.4	2419.6
12.5°	884.6	1025.8	1220.4	1498.8	1826.4	2145.2	2418.9	2535.8
15°	752.2	877.3	1087.1	1395.4	1769.2	2148.5	2465.6	2594.0
17.5°	652.9	734.4	951.6	1280.8	1694.1	2118.6	2481.8	2619.0
20°	603.7	626.3	775.6	1134.0	1623.9	2090.4	2497.9	2642.4
22.5°	574.6	580.3	634.4	944.3	1540.0	2081.5	2526.2	2674.7
25°	551.2	552.9	567.3	748.1	1411.6	2075.8	2569.8	2719.1
27.5°	527.9	527.9	535.9	602.9	1237.3	2051.6	2626.3	2772.3
30°	504.4	504.4	510.0	533.5	1033.1	2004.0	2694.1	2841.8
32.5°	480.2	480.2	485.0	502.0	824.8	1944.3	2756.2	2912.0
35°	456.0	454.4	460.8	478.6	656.2	1868.4	2818.3	2987.9
37.5°	430.2	429.4	435.8	456.0	566.6	1780.4	2865.2	3091.2
40°	402.7	402.7	410.0	431.8	540.8	1669.8	2939.4	3239.7
42.5°	377.7	376.1	384.2	410.8	521.4	1564.1	3072.6	3456.0
45°	353.5	350.2	357.5	390.6	487.5	1527.0	3321.2	3775.6
47.5°	330.9	322.9	329.3	366.4	456.8	1665.8	3727.9	4218.7
50°	312.3	297.0	302.7	342.2	433.4	1966.9	4255.8	4807.0
52.5°	292.9	272.8	276.0	312.3	412.5	2253.4	4828.1	5583.5
55°	272.8	250.2	251.8	282.5	382.5	2296.2	5386.6	6642.4
57.5°	250.2	229.2	229.2	255.0	360.8	1990.2	5816.0	7956.4
60°	225.2	211.5	207.5	233.3	380.2	1404.4	5866.0	8803.7
62.5°	197.7	190.4	184.8	212.3	394.6	832.1	5463.2	8598.7
65°	166.3	164.6	160.6	233.3	332.5	491.5	4690.0	7970.1
67.5°	139.6	137.2	137.2	244.6	252.7	309.1	3664.2	7104.8
70°	120.2	111.4	111.4	184.8	153.3	213.9	2558.5	6171.0
72.5°	100.9	91.2	84.8	147.7	114.6	156.6	1598.9	5284.8
75°	80.7	73.5	65.4	97.7	85.6	118.6	929.0	4378.5
77.5°	58.1	54.8	46.0	71.9	62.1	85.6	552.9	3378.5
80°	29.8	30.6	29.0	41.2	41.9	58.1	314.8	2312.3
82.5°	17.7	13.7	15.4	20.2	24.2	33.1	118.6	1359.1
85°	11.3	7.3	7.3	9.6	12.1	12.9	36.3	551.2
87.5°	5.6	2.5	3.2	4.8	4.0	3.2	1.6	138.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)