

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: P961973

Luminaire Tested: **NAV-SB2B-740-U-T4FT-HSS**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P961973
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2405-108-25)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB2B-740-U-T4FT-HSS
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(2) 70 CRI, 4000K, 450mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE IV
FORWARD THROW OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 9246.5 lumens
Efficiency: N/A
Efficacy: 125.1 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B1 - U0 - G2

Input Watts (W): 73.9
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



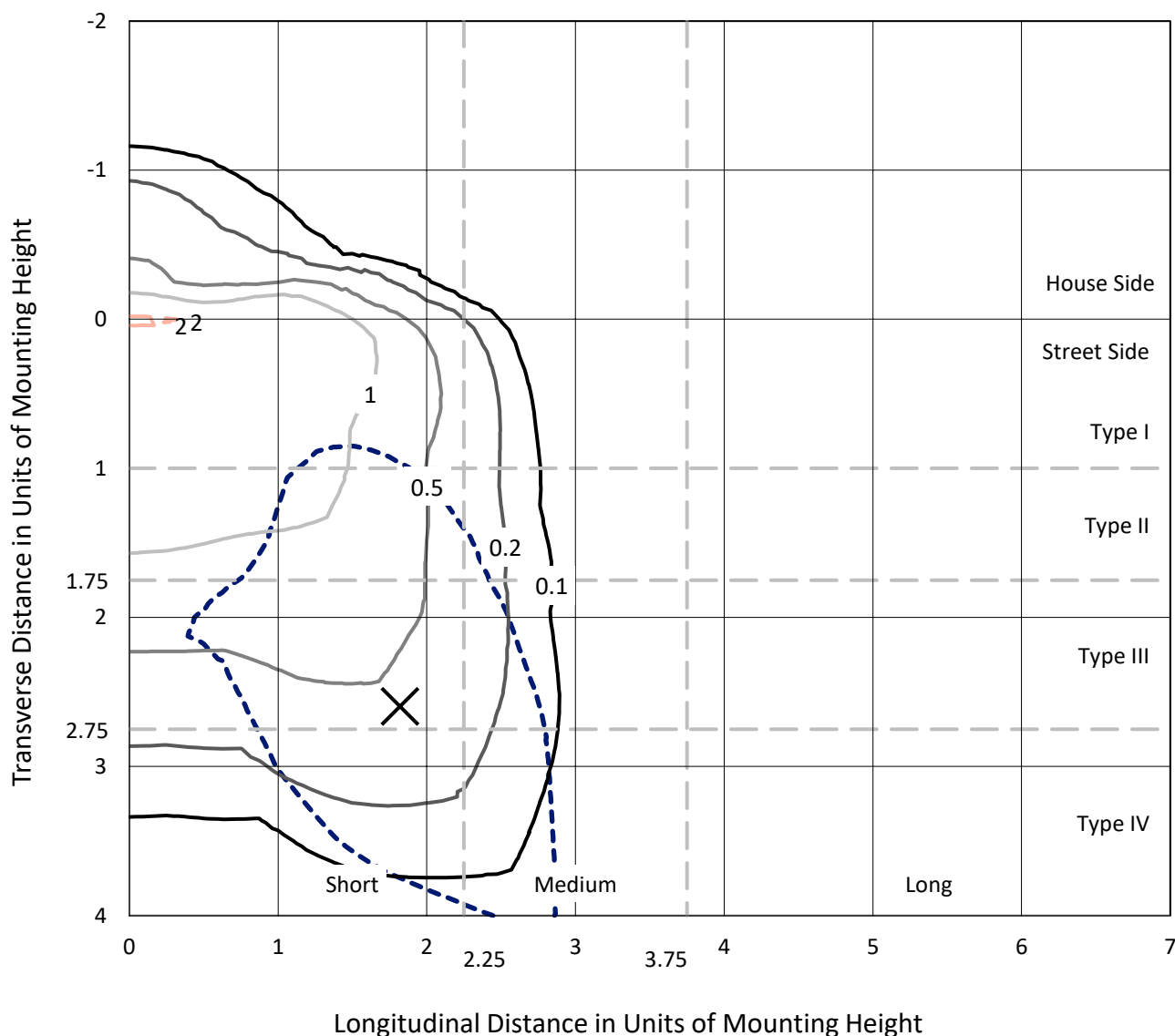
REPORT NUMBER: P961973

CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

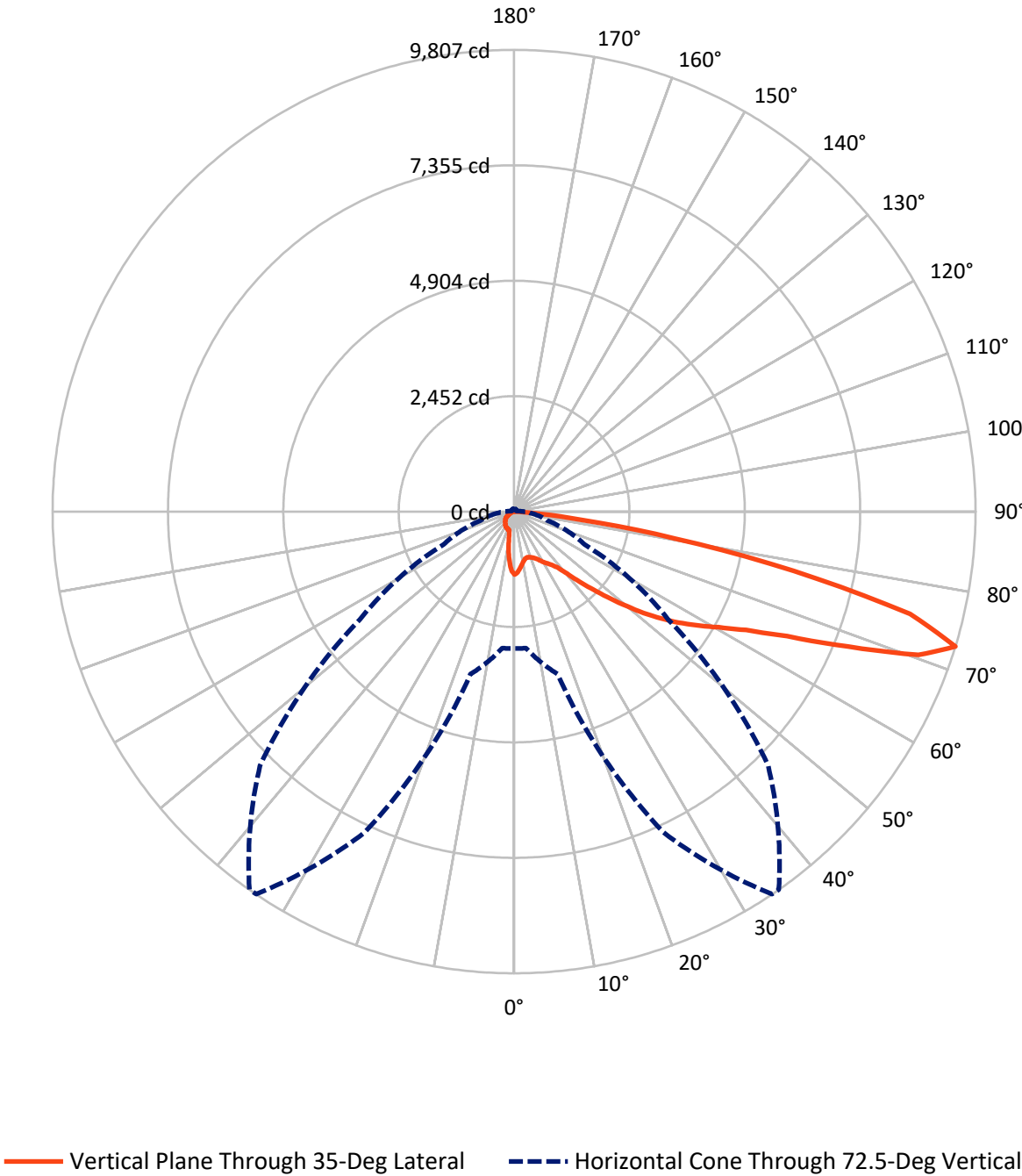


Based on 25 foot mounting height. Maximum calculated value = 2.1 fc

Type IV - Short - N/A

REPORT NUMBER: P961973
CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

Luminous Intensity Polar Plot



REPORT NUMBER: P961973

CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

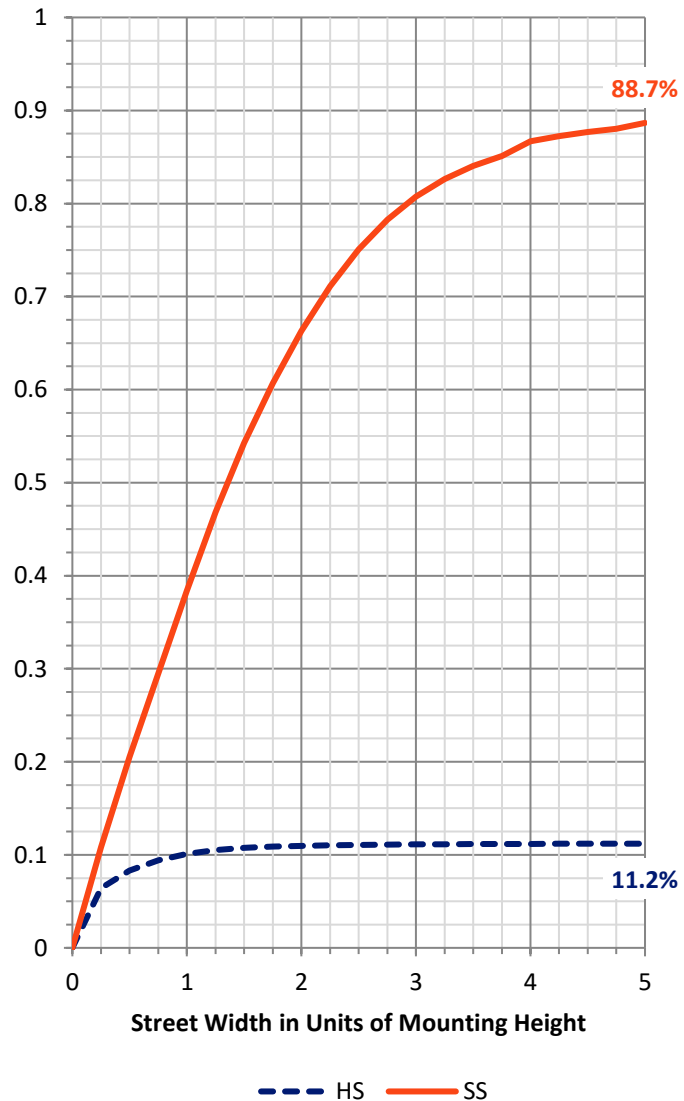
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1040.7	0.0	1040.7
	% Fixture	11.3	0.0	11.3
Street Side	Lumens	8205.9	0.0	8205.9
	% Fixture	88.7	0.0	88.7
Total	Lumens	9246.5	0.0	9246.5
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	110.1	1.2
10°-20°	257.6	2.8
20°-30°	418.5	4.5
30°-40°	698.3	7.6
40°-50°	1321.1	14.3
50°-60°	2099.3	22.7
60°-70°	2596.9	28.1
70°-80°	1614.3	17.5
80°-90°	130.5	1.4
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°	9246.5	100.0
0°-180°	9246.5	100.0

Coefficient of Utilization



REPORT NUMBER: P961973

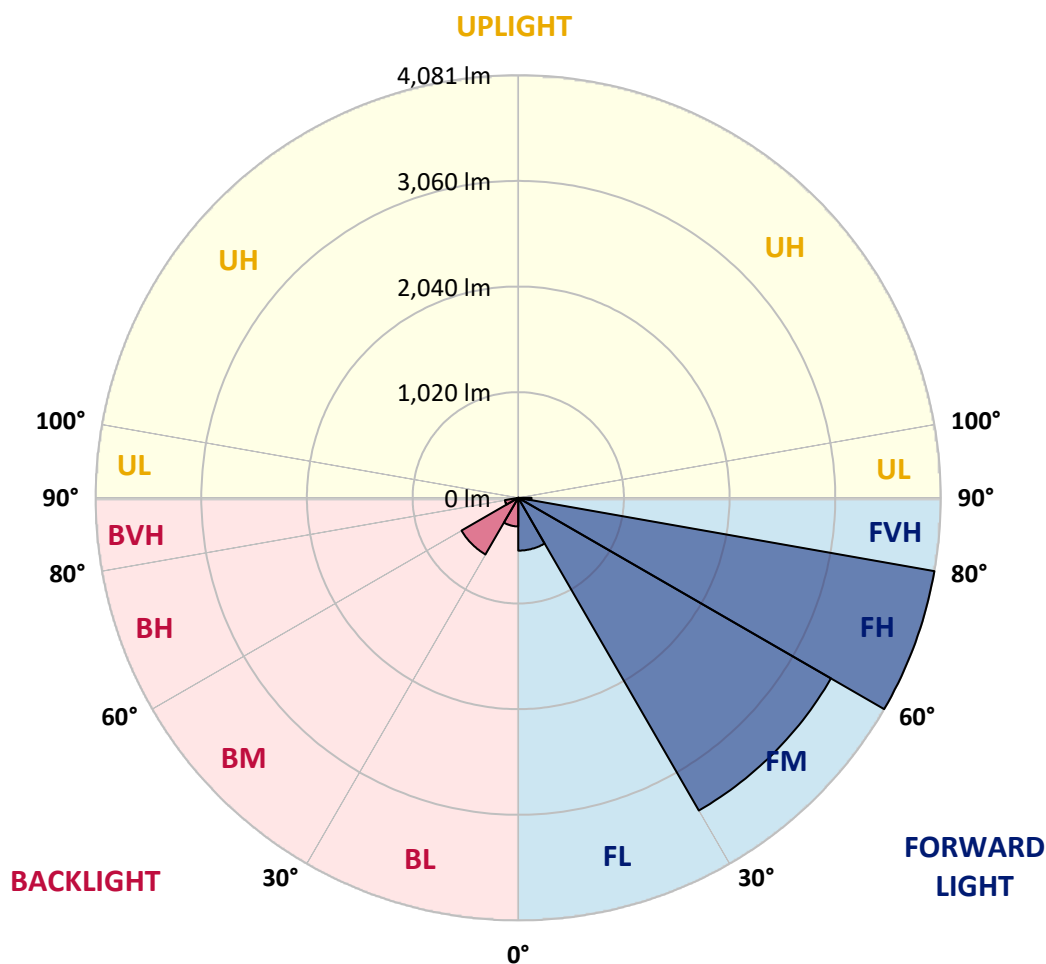
CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	509.7	5.5			
FM	(30°-60°)	3486.9	37.7			
FH	(60°-80°)	4080.6	44.1			G2/5000
FVH	(80°-90°)	128.7	1.4			G2/225
BL	(0°-30°)	276.5	3.0	B1/500		
BM	(30°-60°)	631.8	6.8	B1/1000		
BH	(60°-80°)	130.6	1.4	B1/500		G1/500
BVH	(80°-90°)	1.8	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 IV Short



REPORT NUMBER: P961973

CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	34°	35°	45°	55°	65°	75°	85°
0°	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1
2.5°	1280.5	1291.4	1293.3	1296.7	1296.7	1300.8	1307.6	1317.1	1332.7	1340.8	1346.2
5°	1180.3	1188.4	1198.5	1206.6	1222.2	1224.3	1250.7	1276.4	1312.3	1339.5	1358.4
7.5°	1079.3	1088.8	1102.3	1122.0	1142.3	1148.4	1188.4	1231.7	1288.6	1339.5	1371.3
10°	1008.2	1008.8	1021.0	1040.7	1073.2	1080.7	1129.4	1191.0	1262.2	1331.4	1383.4
12.5°	968.2	972.9	978.4	993.2	1024.4	1029.1	1081.3	1153.8	1235.8	1326.6	1397.7
15°	968.2	971.6	975.0	982.4	1007.5	1011.6	1057.6	1130.1	1222.2	1328.6	1420.8
17.5°	978.4	983.8	981.0	989.8	1016.3	1019.0	1059.6	1123.3	1221.6	1341.5	1456.0
20°	1002.8	1006.8	1001.3	1006.8	1033.2	1038.6	1080.7	1136.2	1233.1	1363.9	1500.0
22.5°	1041.3	1043.3	1030.5	1034.5	1061.7	1068.5	1117.2	1172.8	1260.9	1399.7	1558.9
25°	1090.1	1094.2	1074.5	1079.3	1105.1	1113.1	1169.4	1227.6	1304.9	1449.2	1634.2
27.5°	1146.4	1148.4	1131.5	1130.8	1164.0	1175.5	1232.4	1295.4	1363.9	1511.6	1729.1
30°	1210.7	1216.8	1200.6	1197.8	1239.8	1249.4	1305.5	1378.7	1450.6	1605.0	1863.9
32.5°	1261.6	1266.3	1256.8	1263.6	1306.3	1313.7	1394.3	1496.6	1586.7	1737.8	2047.4
35°	1334.8	1337.4	1315.7	1327.9	1376.7	1395.6	1515.6	1661.9	1758.2	1904.6	2287.3
37.5°	1599.6	1599.6	1507.5	1447.2	1493.9	1510.8	1681.6	1869.9	1969.5	2128.1	2589.5
40°	1966.2	1960.1	1825.2	1701.9	1695.9	1729.1	1918.1	2132.1	2242.6	2396.3	2929.6
42.5°	2357.1	2347.6	2164.0	2042.0	2021.7	2033.2	2191.1	2455.3	2567.8	2723.6	3295.5
45°	2704.0	2701.3	2533.3	2369.3	2332.7	2369.3	2531.9	2833.4	2914.0	3078.0	3660.6
47.5°	2994.6	2994.6	2872.0	2764.9	2746.0	2767.7	2993.3	3252.7	3245.4	3455.4	4016.4
50°	3329.3	3326.6	3210.1	3164.0	3183.6	3214.2	3524.5	3694.5	3588.1	3825.9	4334.1
52.5°	3563.7	3580.0	3540.0	3532.6	3632.8	3685.7	4063.7	4126.8	3895.1	4177.6	4571.9
55°	3749.3	3768.3	3814.4	3866.6	4059.7	4128.8	4586.2	4536.6	4151.9	4482.4	4708.7
57.5°	4012.3	3985.2	4056.3	4159.2	4471.7	4555.0	5092.2	4923.5	4358.5	4729.8	4723.6
60°	4331.3	4335.4	4347.6	4477.7	4882.9	4989.9	5590.9	5289.4	4491.2	4881.6	4558.4
62.5°	4714.9	4720.9	4746.1	4945.9	5435.1	5536.0	6122.0	5588.8	4552.2	4838.8	4131.5
65°	4688.5	4714.2	4994.0	5677.6	6274.5	6374.1	6741.9	5798.8	4460.1	4448.6	3363.8
67.5°	4271.1	4313.1	4781.2	6551.6	7540.1	7651.2	7491.3	5840.2	4062.4	3459.4	2194.5
70°	3723.6	3738.6	4301.5	7337.6	9005.5	9118.1	8162.1	5385.6	3082.7	1929.6	983.1
72.5°	2907.9	2911.3	3571.9	7519.8	9800.9	9807.1	7635.6	3998.0	1657.9	741.2	341.4
75°	2077.3	2057.0	2392.4	6098.3	8622.8	8691.9	5724.3	1875.3	633.4	350.2	170.0
77.5°	1113.9	1136.2	1353.7	3616.6	5956.8	6074.7	3123.4	540.7	322.5	238.5	112.4
80°	344.2	363.2	554.9	1655.9	3374.0	3445.2	1157.8	240.6	224.9	170.0	73.8
82.5°	108.4	112.4	258.8	695.8	1400.5	1432.9	335.4	136.2	153.8	112.4	43.4
85°	31.2	31.9	115.2	259.5	346.2	353.0	94.2	52.9	88.0	69.8	22.3
87.5°	3.4	10.9	43.4	43.4	30.4	29.8	10.1	11.5	25.1	8.8	4.1
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: P961973

CATALOG NUMBER: NAV-SB2B-740-U-T4FT-HSS

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1	1340.1
2.5°	1342.9	1343.6	1334.8	1319.8	1303.6	1290.0	1273.0	1259.5	1250.0	1247.3	1252.0
5°	1352.3	1347.6	1322.6	1277.1	1222.9	1176.2	1124.0	1082.7	1055.5	1044.1	1048.2
7.5°	1366.5	1353.0	1298.2	1208.7	1105.1	1012.9	919.4	846.9	800.8	777.8	781.2
10°	1378.7	1351.7	1257.5	1109.8	951.2	811.7	685.6	598.3	549.5	526.4	527.2
12.5°	1390.3	1350.9	1204.6	992.6	777.8	607.1	489.8	446.5	433.0	428.1	426.8
15°	1411.9	1353.0	1138.3	858.4	605.1	458.7	416.0	415.3	418.0	416.7	416.0
17.5°	1441.8	1355.0	1063.0	716.2	466.8	404.5	402.4	408.6	412.6	410.6	409.9
20°	1480.4	1363.1	983.1	575.2	401.1	390.9	395.6	401.1	404.5	401.1	400.4
22.5°	1534.6	1377.4	895.6	462.1	380.1	382.8	386.8	393.0	396.4	391.7	390.9
25°	1600.9	1399.7	809.6	401.8	369.9	373.3	379.5	386.2	390.2	385.5	384.8
27.5°	1687.0	1435.6	730.4	388.2	359.8	361.8	370.6	380.8	386.2	380.1	380.1
30°	1811.7	1494.7	661.9	394.3	353.6	348.9	361.1	375.4	381.4	376.1	375.4
32.5°	1977.0	1578.0	619.9	403.8	351.0	334.0	345.5	363.9	374.0	370.6	370.6
35°	2193.8	1704.7	603.6	414.6	348.9	318.5	326.6	346.2	363.9	367.3	367.3
37.5°	2456.7	1880.8	608.4	419.4	342.9	305.6	309.7	326.6	349.6	360.4	363.2
40°	2755.5	2086.1	635.5	414.6	336.1	294.7	295.4	308.3	328.6	344.8	350.2
42.5°	3063.7	2325.9	685.6	397.0	329.9	285.3	283.2	292.0	305.6	317.0	321.8
45°	3357.1	2572.5	735.1	372.6	322.5	275.7	271.0	274.4	277.1	281.9	284.5
47.5°	3613.2	2746.0	720.9	350.2	312.3	264.9	256.8	255.4	247.3	246.6	245.9
50°	3790.0	2783.9	640.2	327.9	297.5	252.8	239.8	231.8	217.5	210.7	211.4
52.5°	3846.3	2634.1	523.1	305.6	273.1	236.5	218.1	205.3	187.7	181.5	180.9
55°	3771.8	2340.8	418.0	278.5	239.1	214.7	194.4	177.5	163.3	155.8	155.8
57.5°	3589.4	1967.5	330.7	246.6	203.3	190.3	170.0	153.1	140.9	133.5	132.1
60°	3287.3	1562.4	261.5	208.7	173.4	164.0	143.0	132.1	121.3	112.4	110.4
62.5°	2828.6	1115.2	205.3	165.3	145.0	134.2	122.0	113.8	101.0	88.8	86.7
65°	2207.3	682.2	158.6	121.3	116.5	111.1	103.6	96.2	80.7	68.5	66.4
67.5°	1392.3	323.2	113.2	91.4	92.1	89.5	86.0	79.9	68.5	57.6	56.3
70°	613.2	156.5	74.5	69.8	68.5	68.5	71.1	69.1	58.2	48.1	46.0
72.5°	208.7	84.0	55.6	52.9	49.5	48.8	59.7	57.6	46.7	37.3	35.3
75°	109.1	56.3	40.7	37.9	29.8	35.9	47.5	44.7	33.2	24.4	22.3
77.5°	71.1	40.0	27.8	24.4	16.9	23.7	35.3	31.2	19.7	12.2	10.9
80°	44.7	26.4	16.3	11.5	8.1	12.9	19.0	13.5	7.5	2.7	2.0
82.5°	23.7	13.5	6.0	4.1	3.4	4.1	4.7	3.4	1.3	0.0	0.0
85°	9.5	4.7	2.0	1.3	0.7	0.0	1.3	0.7	0.0	0.0	0.0
87.5°	3.4	0.7	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)