

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: P959773

Luminaire Tested: **NAV-SB1B-727-U-T4FT**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P959773
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2405-108-24)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB1B-727-U-T4FT
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(1) 70 CRI, 2700K, 450mA LIGHTSQUARE WITH 26 LEDS AND TYPE IV FORWARD
THROW OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5293.1 lumens
Efficiency: N/A
Efficacy: 133.0 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B1 - U0 - G2

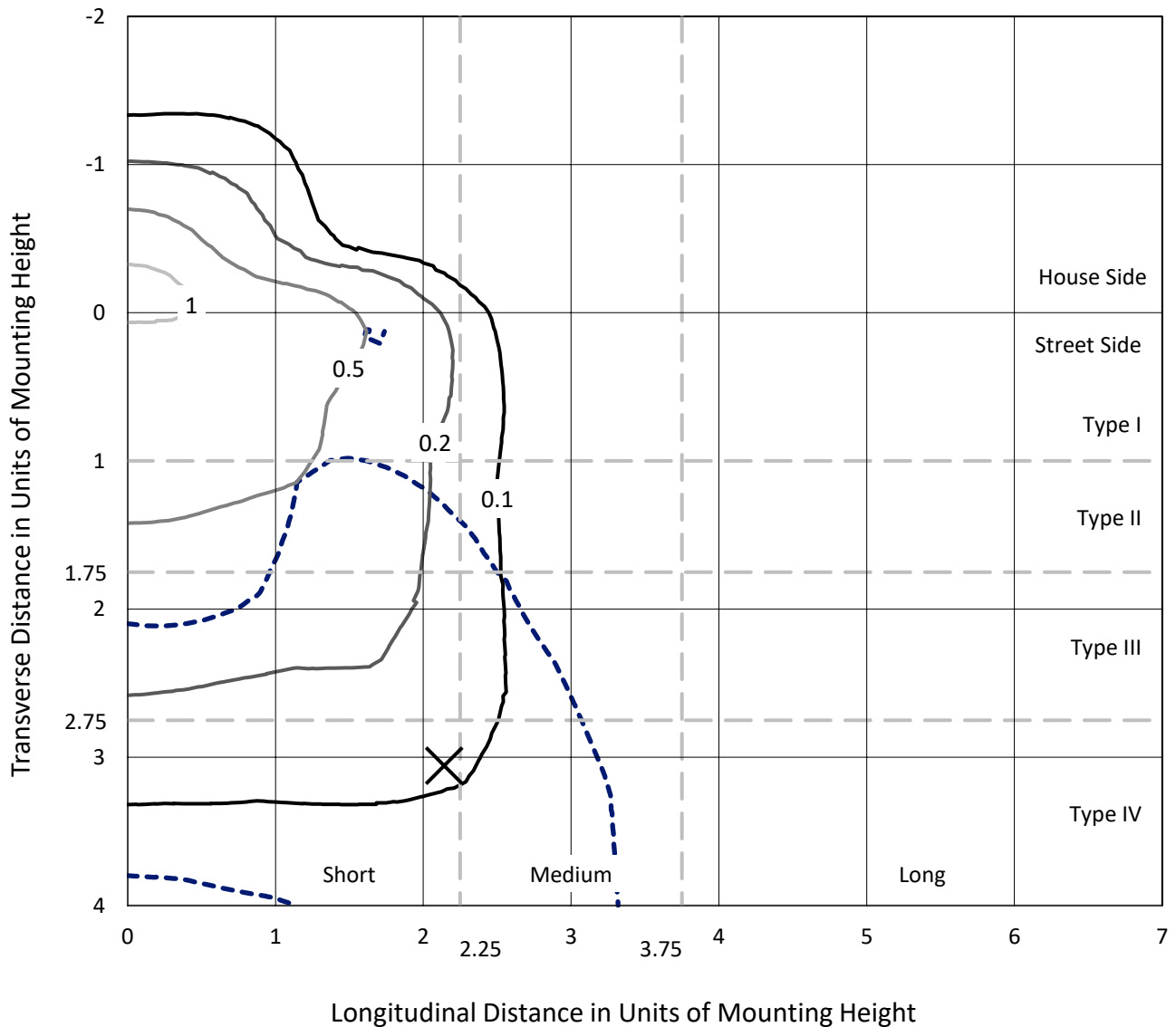
Input Watts (W): 39.8
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



REPORT NUMBER: P959773
 CATALOG NUMBER: NAV-SB1B-727-U-T4FT

Iso-Footcandle Lines of Horizontal Illumination

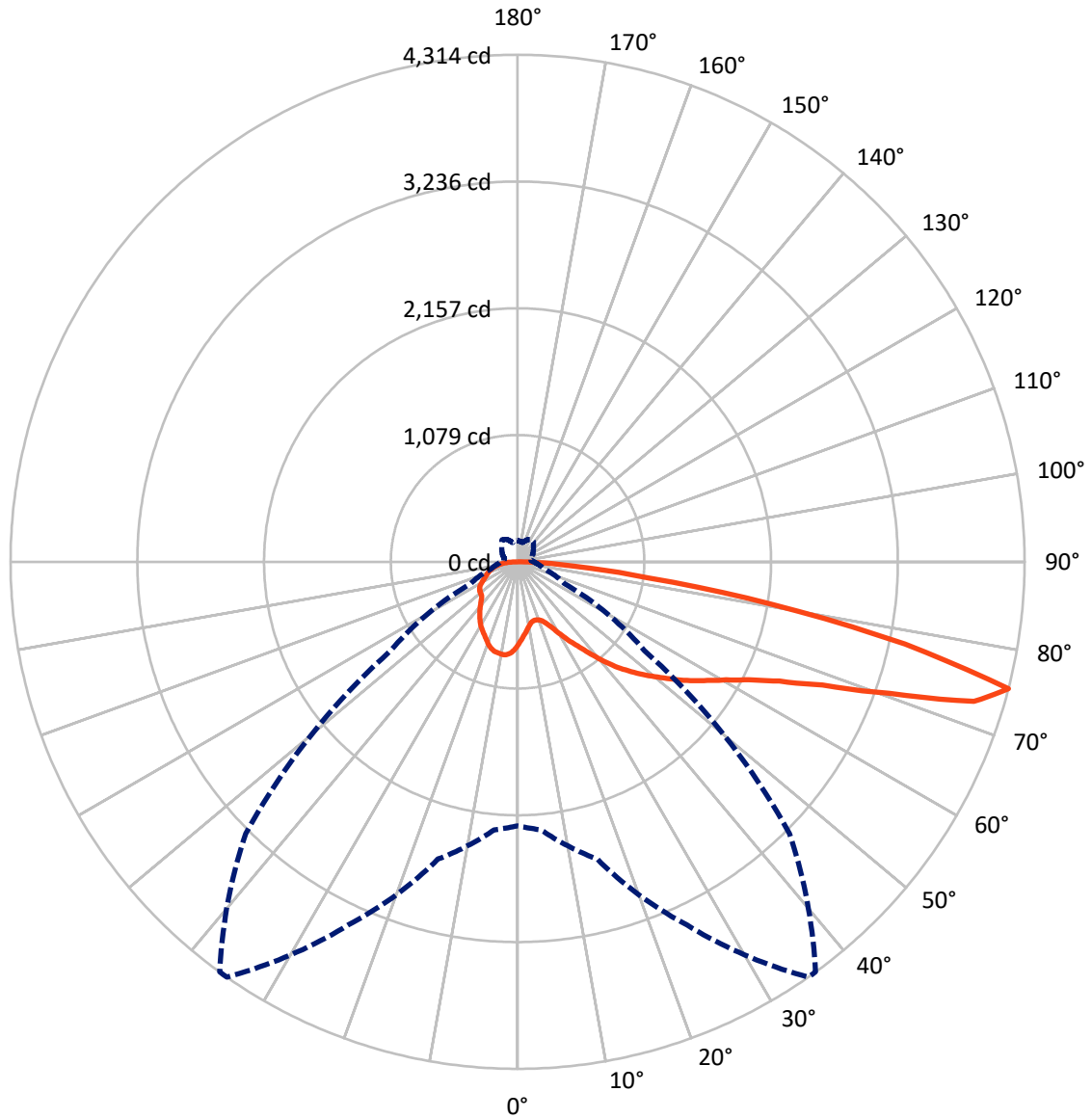
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 1.2 fc
 Type IV - Short - N/A

REPORT NUMBER: P959773
CATALOG NUMBER: NAV-SB1B-727-U-T4FT

Luminous Intensity Polar Plot



— Vertical Plane Through 35-Deg Lateral - - - Horizontal Cone Through 75-Deg Vertical

REPORT NUMBER: P959773
 CATALOG NUMBER: NAV-SB1B-727-U-T4FT

FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1259.6	0.0	1259.6
	% Fixture	23.8	0.0	23.8
Street Side	Lumens	4033.5	0.0	4033.5
	% Fixture	76.2	0.0	76.2
Total	Lumens	5293.1	0.0	5293.1
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	66.8	1.3
10°-20°	192.6	3.6
20°-30°	323.5	6.1
30°-40°	502.7	9.5
40°-50°	746.2	14.1
50°-60°	1030.1	19.5
60°-70°	1249.8	23.6
70°-80°	1032.9	19.5
80°-90°	148.6	2.8
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°	5293.1	100.0
0°-180°	5293.1	100.0

Coefficient of Utilization

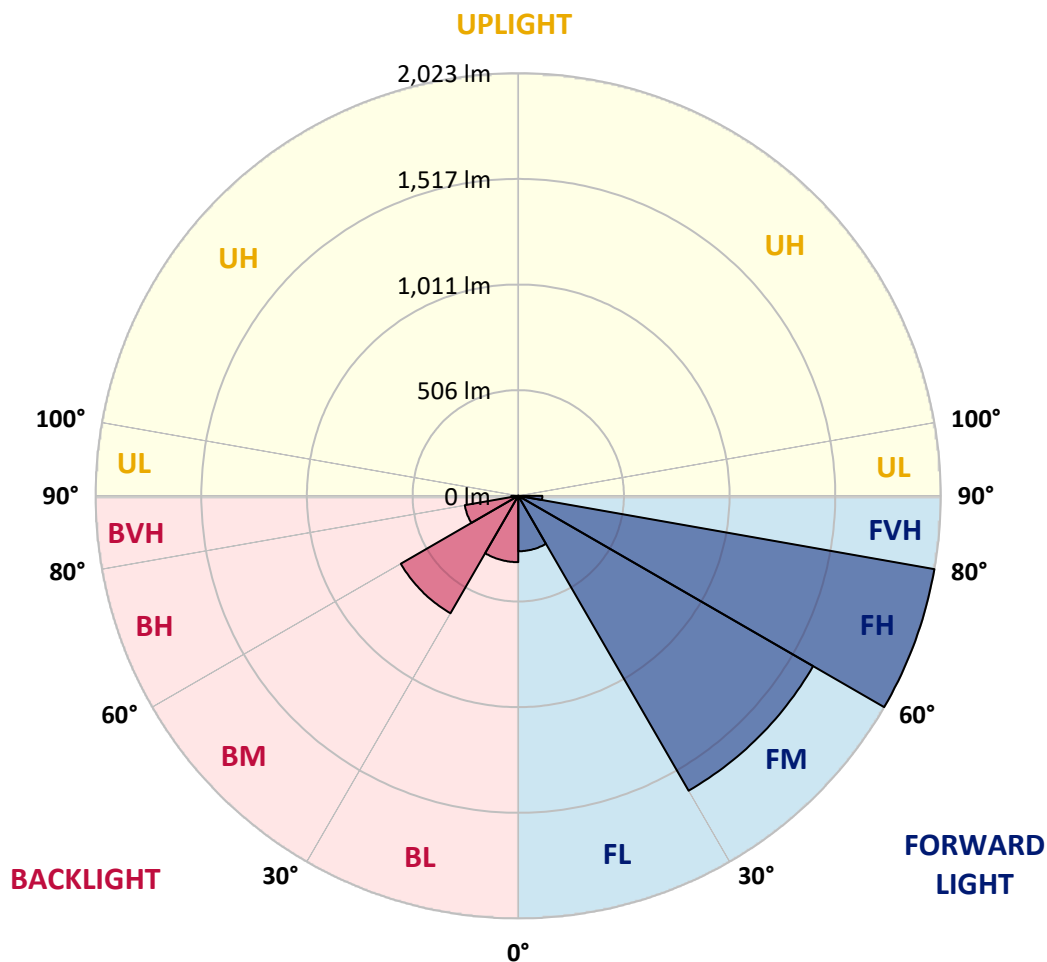


REPORT NUMBER: P959773
 CATALOG NUMBER: NAV-SB1B-727-U-T4FT

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	265.4	5.0			
FM (30°-60°)	1630.0	30.8			
FH (60°-80°)	2022.9	38.2			G2/5000
FVH (80°-90°)	115.1	2.2			G2/225
BL (0°-30°)	317.4	6.0	B1/500		
BM (30°-60°)	649.0	12.3	B1/1000		
BH (60°-80°)	259.7	4.9	B1/500		G1/500
BVH (80°-90°)	33.4	0.6			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 IV Short



REPORT NUMBER: P959773

CATALOG NUMBER: NAV-SB1B-727-U-T4FT

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	36°	45°	55°	65°	75°	85°
0°	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3
2.5°	650.4	654.4	656.1	655.3	659.6	659.0	665.0	672.4	682.8	692.8	707.4
5°	600.3	604.6	608.3	611.8	620.0	622.7	632.1	646.4	665.3	684.5	708.5
7.5°	553.7	557.4	563.1	569.4	583.4	586.0	601.8	624.1	650.4	678.4	711.7
10°	515.7	519.4	525.3	532.5	550.0	553.1	573.2	602.9	637.2	672.7	715.0
12.5°	499.3	500.5	503.9	511.1	526.2	528.2	550.2	584.4	624.3	668.4	720.3
15°	498.5	500.7	501.0	504.7	517.3	518.2	538.5	572.3	616.3	667.6	728.0
17.5°	507.1	508.8	506.1	508.5	519.1	520.5	536.5	566.5	613.8	671.3	741.1
20°	529.9	531.4	523.7	520.5	528.2	529.4	545.1	570.3	616.3	679.1	759.1
22.5°	578.6	579.4	560.6	547.7	548.3	548.8	562.5	585.5	626.4	693.0	782.1
25°	654.4	653.8	623.8	598.9	584.6	581.5	590.6	610.1	643.3	711.7	811.5
27.5°	743.1	738.8	708.8	671.6	640.4	635.8	633.8	642.1	667.3	736.3	847.6
30°	843.3	839.3	806.9	758.3	715.0	707.7	688.7	684.5	703.0	769.7	897.6
32.5°	953.1	950.6	911.9	853.0	795.2	786.6	754.8	743.4	758.0	820.4	967.5
35°	1045.3	1043.0	1011.0	950.3	879.6	869.0	836.7	823.8	831.3	885.3	1058.7
37.5°	1128.5	1127.4	1099.9	1052.2	979.2	966.3	930.0	925.7	924.2	970.9	1169.4
40°	1205.8	1202.9	1174.3	1149.1	1095.1	1083.3	1051.2	1047.6	1036.7	1076.1	1294.8
42.5°	1291.4	1283.9	1242.4	1230.7	1216.1	1206.4	1187.2	1187.8	1163.8	1194.9	1427.5
45°	1361.2	1356.9	1314.3	1307.4	1323.2	1319.1	1335.7	1340.0	1293.3	1319.4	1565.5
47.5°	1436.1	1432.1	1396.0	1391.2	1433.9	1435.0	1493.6	1495.1	1419.8	1448.7	1703.7
50°	1528.6	1522.8	1487.1	1493.1	1540.9	1545.2	1652.5	1642.8	1536.3	1580.0	1840.8
52.5°	1589.6	1593.0	1585.3	1595.0	1660.2	1664.2	1808.7	1783.8	1651.6	1709.7	1975.3
55°	1634.5	1641.3	1665.3	1687.7	1786.1	1790.1	1956.1	1918.0	1747.2	1829.9	2101.8
57.5°	1692.3	1682.5	1727.4	1770.9	1905.7	1916.3	2099.4	2047.3	1831.9	1933.5	2188.4
60°	1775.2	1768.3	1803.3	1867.7	2039.6	2056.5	2251.1	2163.8	1894.0	2015.6	2205.3
62.5°	1943.5	1926.3	1931.7	1988.7	2208.5	2230.8	2422.2	2265.4	1924.8	2047.6	2114.9
65°	2195.0	2165.5	2138.0	2177.5	2446.3	2468.3	2615.4	2345.2	1913.5	1985.5	1874.8
67.5°	2511.8	2482.5	2448.8	2486.0	2796.5	2813.9	2853.7	2390.2	1823.3	1746.3	1450.5
70°	2773.0	2762.2	2802.5	2955.6	3355.8	3356.5	3159.3	2353.0	1576.3	1238.1	839.3
72.5°	2738.4	2731.8	2944.4	3417.7	4060.9	4045.8	3448.6	2071.4	1061.9	558.5	314.5
75°	2246.5	2289.1	2618.5	3409.4	4314.1	4312.2	3271.5	1316.8	439.2	231.4	162.6
77.5°	1204.7	1272.2	1700.0	2517.2	3367.9	3418.6	2300.0	460.7	188.6	148.2	112.4
80°	392.9	451.8	677.6	1281.7	2188.4	2178.9	985.7	180.8	129.0	105.1	77.8
82.5°	166.9	173.7	302.8	605.2	1123.1	1105.7	313.9	103.8	90.7	71.9	48.1
85°	65.2	73.0	133.7	279.8	486.5	475.8	113.3	51.5	58.1	46.9	28.6
87.5°	21.4	26.0	47.8	95.8	151.4	146.0	27.8	17.7	25.2	21.4	10.2
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: P959773
 CATALOG NUMBER: NAV-SB1B-727-U-T4FT

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3	705.3
2.5°	711.3	716.0	721.4	729.4	736.3	742.0	747.9	751.7	753.2	757.4	757.2
5°	716.5	726.5	739.9	753.2	766.0	773.8	780.6	784.0	787.2	789.5	790.1
7.5°	725.1	738.0	759.1	776.3	787.2	793.5	798.1	796.9	798.1	798.6	799.5
10°	732.6	750.5	775.7	792.0	800.3	800.6	799.5	795.5	793.5	793.8	794.4
12.5°	741.4	761.5	788.6	802.4	804.6	798.4	793.5	786.6	784.0	782.9	782.3
15°	753.4	776.3	802.7	807.8	802.1	794.1	785.8	774.6	768.9	764.2	765.7
17.5°	768.0	793.1	813.5	809.7	797.4	784.3	770.9	754.0	742.3	737.4	737.7
20°	788.3	810.9	821.8	805.4	786.9	766.9	743.9	723.3	712.5	707.7	707.0
22.5°	812.9	834.7	829.8	798.1	771.7	739.6	711.0	695.9	690.4	687.1	687.6
25°	842.4	861.0	835.6	787.2	746.8	703.7	681.6	676.7	674.1	671.6	671.6
27.5°	880.8	890.7	839.8	771.1	708.0	665.3	657.2	658.2	657.2	653.0	653.8
30°	931.4	929.4	843.9	745.1	663.3	630.7	631.2	635.0	635.5	632.6	634.1
32.5°	998.0	977.7	845.8	711.3	620.6	600.3	600.9	605.0	607.7	602.9	605.2
35°	1078.7	1034.1	842.7	669.0	587.7	571.4	567.1	568.3	569.2	564.6	567.7
37.5°	1172.9	1097.4	828.7	622.1	560.6	543.1	533.9	526.2	521.6	517.3	520.2
40°	1276.2	1166.3	802.9	576.3	530.2	513.0	499.3	484.7	469.2	463.5	466.2
42.5°	1384.4	1237.3	771.7	532.5	495.3	481.3	466.7	445.6	422.3	410.6	412.0
45°	1496.5	1309.9	741.1	489.3	459.5	453.6	436.6	411.2	386.0	371.2	370.0
47.5°	1606.4	1378.6	696.2	445.8	426.1	432.7	419.5	396.1	368.0	344.5	341.9
50°	1711.4	1443.0	622.7	401.7	398.9	426.4	413.8	380.0	348.0	318.0	315.3
52.5°	1815.6	1495.1	528.5	361.7	384.3	424.7	406.3	369.1	329.9	298.5	295.0
55°	1904.0	1522.0	437.8	327.4	363.2	410.0	397.5	356.3	304.4	271.0	268.1
57.5°	1954.4	1500.3	362.2	293.6	333.9	386.0	382.3	328.8	274.1	248.4	245.0
60°	1932.6	1412.1	300.4	264.1	306.2	360.0	356.0	301.6	250.9	226.6	223.1
62.5°	1812.7	1244.1	251.5	238.3	281.0	333.3	329.6	280.7	233.2	209.7	206.0
65°	1571.2	1012.1	213.5	216.9	255.5	301.3	306.8	263.2	219.1	196.3	192.6
67.5°	1198.3	733.1	183.7	198.3	230.6	269.9	285.6	250.6	207.5	185.7	182.2
70°	683.1	416.4	158.6	180.3	208.6	240.7	269.3	240.7	194.9	176.8	174.6
72.5°	258.9	191.2	137.0	162.3	187.5	216.1	251.2	224.9	180.3	166.9	164.5
75°	138.2	116.4	115.3	141.0	163.1	192.0	228.7	209.4	169.4	176.3	181.9
77.5°	94.1	82.4	96.5	120.7	136.5	165.4	204.6	186.0	146.8	146.3	134.8
80°	65.2	58.3	78.4	97.3	105.6	139.1	178.6	159.7	119.6	111.6	106.7
82.5°	39.2	38.0	58.6	72.7	74.7	107.3	147.9	133.9	97.9	85.3	85.8
85°	21.4	22.7	37.5	42.6	43.5	74.9	115.9	103.6	75.2	63.2	63.9
87.5°	6.0	7.7	13.7	16.9	20.9	38.9	69.0	61.5	37.7	26.3	26.3
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)