

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: P961874

Luminaire Tested: **NAV-SB2B-727-U-T2U**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P961874
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-16)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB2B-727-U-T2U
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(2) 70 CRI, 2700K, 450mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE II U OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 10849.6 lumens
Efficiency: N/A
Efficacy: 146.8 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')
IES Classification: Type II - Short
BUG Rating: B3 - U0 - G3

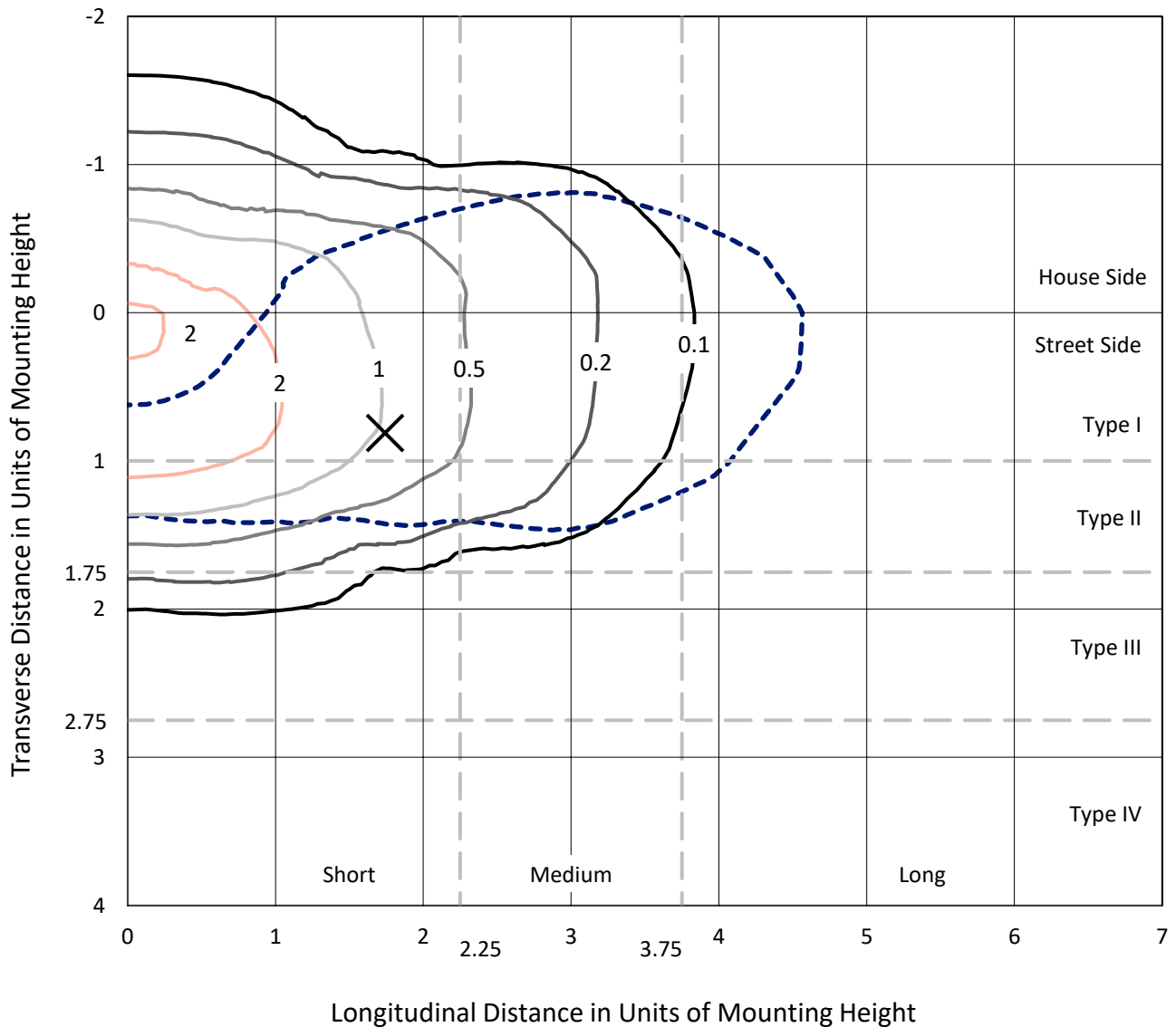
Input Watts (W): 73.9
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

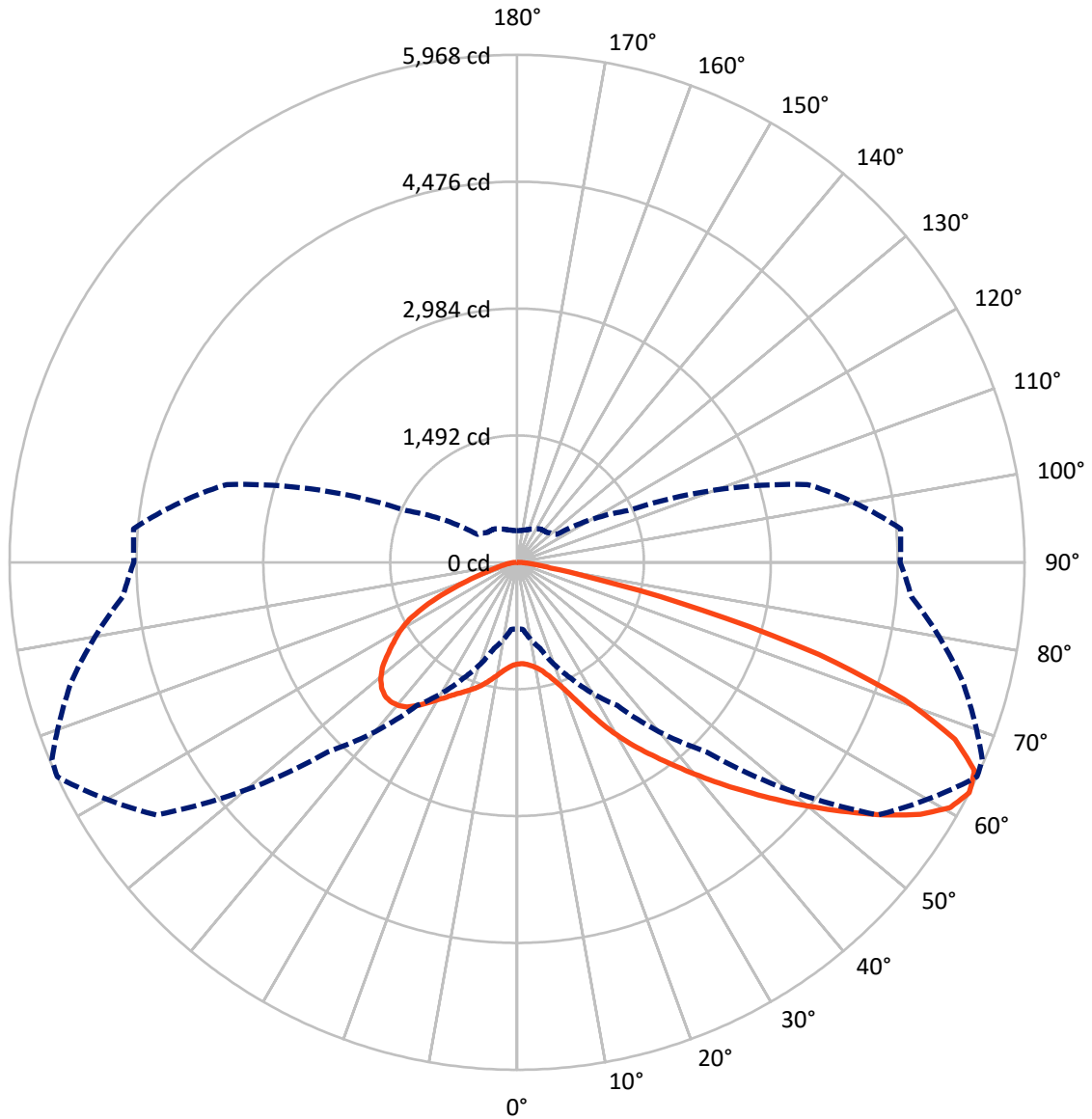
✕ Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 3 fc
 Type II - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 65-Deg Lateral - - - Horizontal Cone Through 62.5-Deg Vertical

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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	3423.7	0.0	3423.7
	% Fixture	31.6	0.0	31.6
Street Side	Lumens	7426.0	0.0	7426.0
	% Fixture	68.4	0.0	68.4
Total	Lumens	10849.6	0.0	10849.6
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	119.2	1.1
10°-20°	404.2	3.7
20°-30°	819.6	7.6
30°-40°	1418.3	13.1
40°-50°	2146.3	19.8
50°-60°	2516.4	23.2
60°-70°	2109.7	19.4
70°-80°	1164.7	10.7
80°-90°	151.3	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°	10849.6	100.0
0°-180°	10849.6	100.0

Coefficient of Utilization



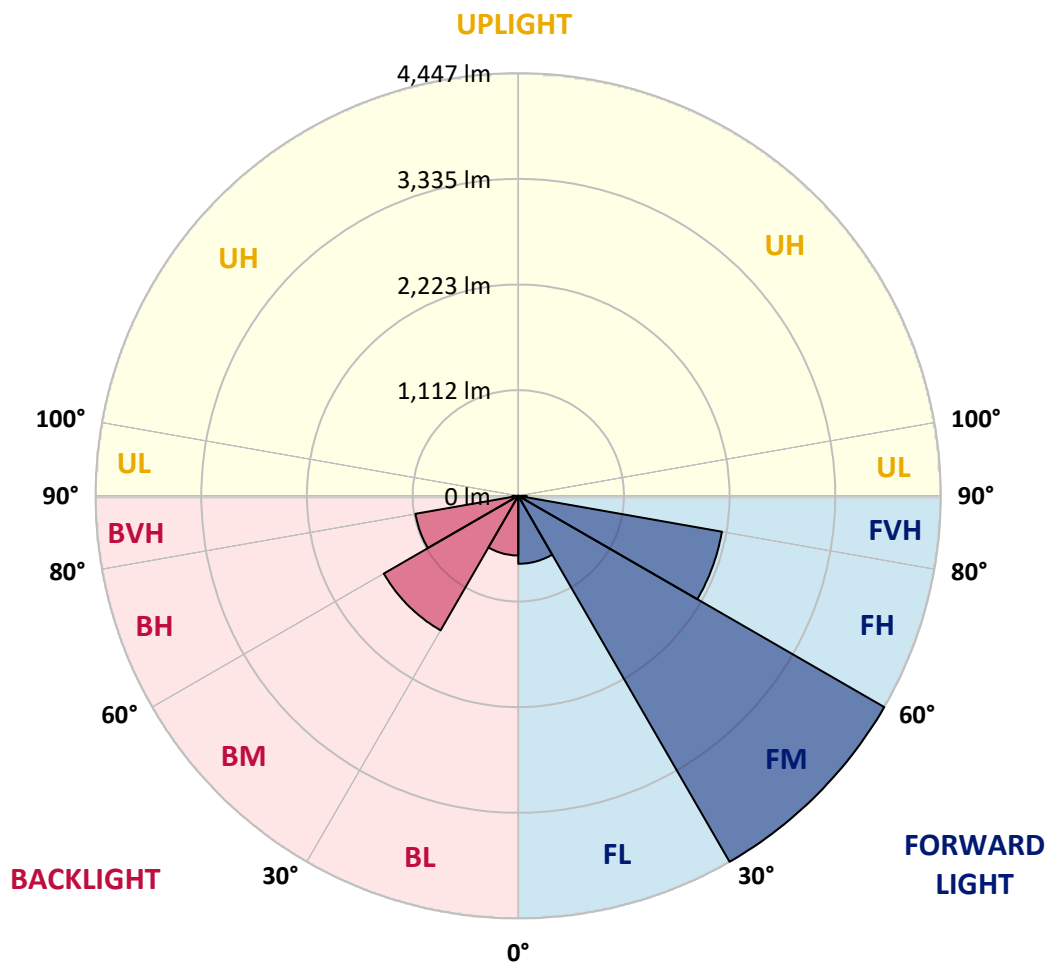
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	715.1	6.6			
FM (30°-60°)	4446.5	41.0			
FH (60°-80°)	2176.1	20.1			G2/5000
FVH (80°-90°)	88.2	0.8			G1/100
BL (0°-30°)	627.9	5.8	B2/1000		
BM (30°-60°)	1634.4	15.1	B2/2500		
BH (60°-80°)	1098.3	10.1	B3/2500		G3/2500
BVH (80°-90°)	63.1	0.6			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G3

Type II Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	67°	75°	85°
0°	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6
2.5°	1187.7	1184.3	1187.2	1187.2	1188.3	1187.7	1191.7	1192.8	1194.4	1197.8	1197.8
5°	1175.9	1175.4	1180.4	1184.9	1189.4	1193.3	1198.4	1205.7	1206.8	1210.7	1215.9
7.5°	1172.0	1168.6	1176.4	1182.0	1192.8	1202.3	1215.9	1228.3	1233.3	1235.0	1244.6
10°	1202.3	1196.7	1204.1	1207.4	1216.4	1226.0	1241.8	1261.5	1267.1	1273.9	1284.5
12.5°	1254.1	1247.9	1258.6	1263.7	1272.1	1280.5	1291.3	1310.5	1313.2	1325.6	1335.8
15°	1325.0	1317.7	1324.5	1330.7	1344.7	1352.6	1363.4	1381.9	1381.9	1391.4	1398.8
17.5°	1421.3	1411.7	1416.8	1419.0	1428.0	1439.9	1457.9	1474.3	1482.7	1479.3	1469.1
20°	1564.9	1553.0	1553.0	1541.8	1538.4	1548.0	1571.6	1594.1	1603.1	1585.7	1560.9
22.5°	1780.4	1763.5	1754.0	1715.6	1700.5	1701.6	1725.3	1752.9	1760.1	1729.2	1673.5
25°	2054.5	2028.1	2015.2	1958.9	1924.5	1894.7	1913.3	1948.7	1958.9	1920.5	1830.5
27.5°	2328.7	2330.3	2318.0	2250.5	2193.6	2139.0	2129.4	2166.5	2177.3	2133.9	2022.4
30°	2713.2	2673.2	2649.5	2568.4	2487.4	2410.9	2371.4	2386.6	2389.5	2337.7	2208.3
32.5°	3044.7	3034.5	2983.9	2912.9	2808.8	2688.9	2623.1	2598.9	2594.4	2520.6	2366.9
35°	3422.4	3416.7	3363.2	3278.9	3166.2	2999.7	2880.9	2811.7	2806.0	2702.4	2524.0
37.5°	3806.2	3806.2	3754.0	3661.6	3545.1	3336.8	3156.2	3046.4	3028.4	2893.3	2683.9
40°	4112.5	4094.0	4103.5	4064.6	3931.3	3710.0	3461.7	3302.4	3278.3	3116.2	2853.9
42.5°	4286.4	4280.2	4337.6	4381.0	4326.4	4149.6	3798.3	3580.0	3546.2	3361.6	3049.8
45°	4325.3	4318.5	4420.9	4579.7	4656.3	4583.6	4164.3	3872.1	3831.0	3618.2	3259.7
47.5°	4235.7	4222.3	4372.5	4623.1	4868.4	4996.3	4560.5	4189.1	4129.4	3868.1	3475.3
50°	3966.6	3953.7	4181.2	4513.8	4939.9	5276.5	4990.6	4525.1	4433.9	4136.1	3693.2
52.5°	3381.9	3388.0	3744.3	4201.4	4845.9	5451.1	5361.0	4879.1	4769.4	4410.3	3897.5
55°	2634.4	2647.9	3085.8	3589.0	4469.9	5424.6	5613.7	5243.9	5134.7	4668.1	4108.5
57.5°	1886.2	1946.0	2356.3	2854.4	3747.7	5005.3	5668.9	5590.7	5484.8	4949.5	4315.1
60°	1222.6	1233.3	1655.5	2157.5	2853.9	4260.0	5556.8	5853.5	5770.7	5236.6	4488.0
62.5°	783.5	790.9	1048.1	1509.1	2054.0	3151.7	5179.7	5967.8	5942.4	5426.2	4654.0
65°	575.8	570.2	704.2	997.4	1383.5	1943.7	4447.4	5912.6	5962.7	5545.0	4791.4
67.5°	480.7	472.8	538.6	690.6	1019.4	1103.8	3290.7	5554.1	5737.5	5531.5	4892.1
70°	437.9	431.2	471.1	512.8	795.4	739.1	1658.9	4828.5	5111.1	5377.9	4875.7
72.5°	370.9	359.2	413.7	455.4	618.6	566.8	685.6	3708.9	4053.4	4885.4	4646.1
75°	287.6	279.7	326.5	400.8	464.9	442.4	433.5	2252.1	2628.1	3778.2	4064.6
77.5°	228.0	217.3	260.0	312.4	418.2	333.8	315.8	969.9	1342.5	2412.0	3041.3
80°	171.7	162.2	197.6	247.1	321.4	251.6	204.3	395.8	506.0	1222.0	1529.4
82.5°	122.2	113.7	137.9	181.2	216.2	225.7	125.6	221.8	249.4	471.1	341.6
85°	78.2	73.2	92.4	113.7	137.4	145.2	76.6	115.9	127.2	194.2	142.4
87.5°	42.7	34.8	49.5	52.9	63.7	58.0	36.6	42.2	45.6	70.3	60.3
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: P961874
 CATALOG NUMBER: NAV-SB2B-727-U-T2U

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6	1195.6
2.5°	1200.1	1201.8	1207.4	1209.1	1213.0	1218.1	1221.5	1224.9	1224.9	1228.3	1228.3
5°	1216.4	1220.4	1232.2	1238.4	1248.4	1258.6	1264.8	1272.1	1276.6	1278.9	1280.0
7.5°	1247.9	1254.1	1271.0	1281.7	1299.2	1313.2	1322.8	1332.9	1335.2	1341.4	1339.2
10°	1290.7	1298.1	1317.1	1337.4	1358.2	1375.8	1384.7	1392.1	1394.8	1395.9	1393.2
12.5°	1339.7	1350.3	1375.1	1399.9	1421.9	1437.0	1439.3	1437.7	1429.8	1423.0	1423.0
15°	1399.9	1409.5	1437.0	1464.1	1485.4	1488.3	1474.3	1465.2	1455.6	1454.0	1454.0
17.5°	1472.0	1477.0	1502.3	1528.8	1530.5	1520.9	1500.1	1491.7	1482.7	1476.5	1477.0
20°	1555.8	1554.1	1572.1	1583.4	1571.6	1542.3	1510.8	1496.7	1487.7	1480.4	1480.9
22.5°	1656.0	1643.1	1640.8	1638.1	1606.5	1545.2	1502.3	1484.3	1470.3	1460.1	1463.5
25°	1801.8	1752.2	1717.9	1698.8	1627.9	1529.9	1475.4	1435.4	1409.0	1391.4	1398.2
27.5°	1984.2	1900.9	1814.2	1767.5	1627.9	1499.0	1410.1	1345.3	1302.0	1283.9	1292.9
30°	2158.1	2070.9	1943.1	1850.2	1623.9	1448.3	1304.8	1214.7	1164.1	1146.1	1156.7
32.5°	2306.8	2211.6	2079.9	1940.8	1614.4	1366.1	1174.2	1074.6	1025.6	1004.2	1014.9
35°	2444.6	2343.4	2217.3	2040.5	1589.1	1245.7	1030.6	954.7	900.1	865.7	877.0
37.5°	2586.0	2465.4	2347.2	2130.6	1543.4	1104.9	920.3	855.6	791.4	745.3	757.7
40°	2739.6	2595.5	2486.3	2184.1	1468.6	971.0	834.8	775.6	707.6	658.6	668.2
42.5°	2919.2	2751.4	2641.1	2211.6	1366.1	875.9	779.0	721.1	656.9	616.9	624.8
45°	3106.6	2923.1	2782.4	2211.0	1251.8	831.4	761.1	703.7	632.7	591.0	597.8
47.5°	3303.1	3102.7	2904.5	2175.0	1152.8	837.6	750.9	665.9	587.6	547.1	552.8
50°	3500.1	3299.1	3022.7	2107.5	1110.6	824.1	713.2	612.9	520.7	484.1	486.4
52.5°	3695.4	3508.0	3124.6	2011.3	1067.8	774.0	664.8	544.3	493.1	467.8	467.8
55°	3891.8	3714.5	3235.5	1871.0	960.8	715.4	583.7	518.4	471.1	448.0	445.8
57.5°	4088.8	3953.2	3340.8	1730.9	826.4	643.4	539.3	486.9	449.2	429.5	426.1
60°	4293.7	4226.2	3449.4	1602.0	693.5	551.0	506.6	461.6	423.3	401.4	399.6
62.5°	4504.8	4526.8	3534.4	1435.9	571.3	494.8	477.3	431.2	394.0	373.2	372.6
65°	4717.6	4816.7	3590.2	1205.7	463.3	441.3	445.8	398.0	360.3	342.2	341.6
67.5°	4878.0	5025.5	3574.4	912.5	380.0	390.6	406.4	363.1	327.6	313.5	314.1
70°	4896.0	5000.8	3419.0	624.8	318.1	341.1	362.5	328.7	292.1	282.0	282.6
72.5°	4656.3	4663.0	2986.1	408.1	269.1	299.5	316.3	293.9	258.4	248.3	247.6
75°	4027.5	3856.4	2192.5	269.1	225.2	257.3	273.0	257.3	222.9	225.2	217.3
77.5°	3051.4	2731.1	1331.3	191.4	188.0	216.2	237.5	226.3	197.0	221.2	194.7
80°	1572.1	1477.6	593.9	143.0	148.6	172.8	195.4	180.7	155.9	148.6	135.6
82.5°	360.3	418.8	234.2	102.4	107.5	124.4	149.1	135.6	112.0	94.6	93.5
85°	126.1	137.9	103.5	64.2	63.0	77.7	101.3	90.6	76.0	60.8	64.2
87.5°	40.0	52.4	38.8	25.9	27.1	34.8	46.7	42.7	35.5	23.1	24.2
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)