

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: P966719

Luminaire Tested: **NAV-SB4C-740-U-T4W**

Issue Date: 1/21/2025

Test Information

Test Method: LM-79-08
Report Number: P966719
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2411-289-1)
Test Lab: INNOVATION CENTER
Issue Date: 1/21/2025
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: LUMARK
Catalog Number: NAV-SB4C-740-U-T4W
Description: NAVION ROADWAY AND AREA HIGH DENSITY LED LUMINAIRE
(4) 70 CRI, 4000K, 615mA LIGHTSQUARES WITH 26 LEDS EACH AND TYPE IV WIDE OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 32485.3 lumens
Efficiency: N/A
Efficacy: 161.9 lumens/watt
Luminous Opening: Rectangular (W 1' x L: 1' x H: 0')
IES Classification: Type IV - Short
BUG Rating: B3 - U0 - G5

Input Watts (W): 200.7
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

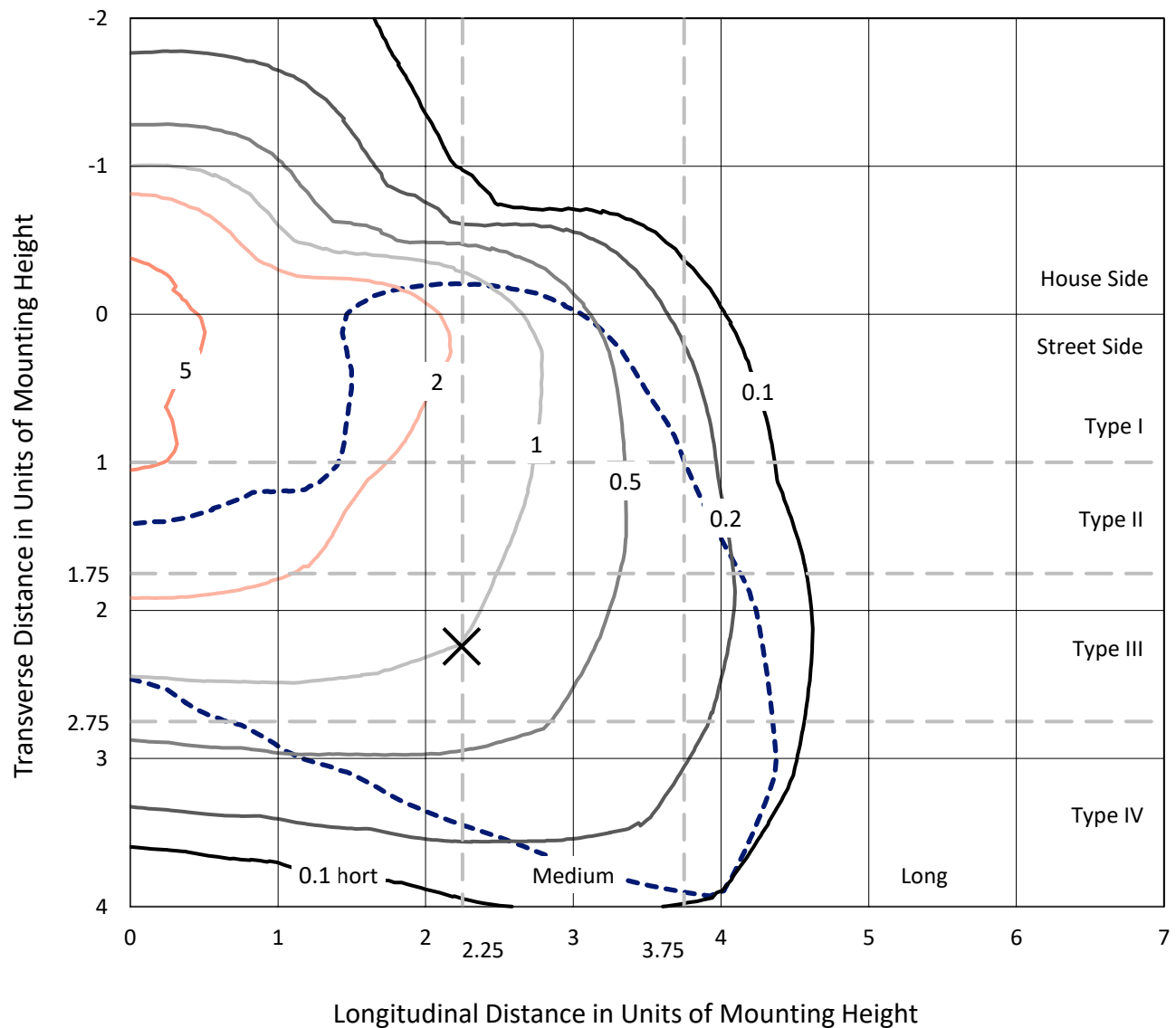


REPORT NUMBER: P966719

CATALOG NUMBER: NAV-SB4C-740-U-T4W

Iso-Footcandle Lines of Horizontal Illumination

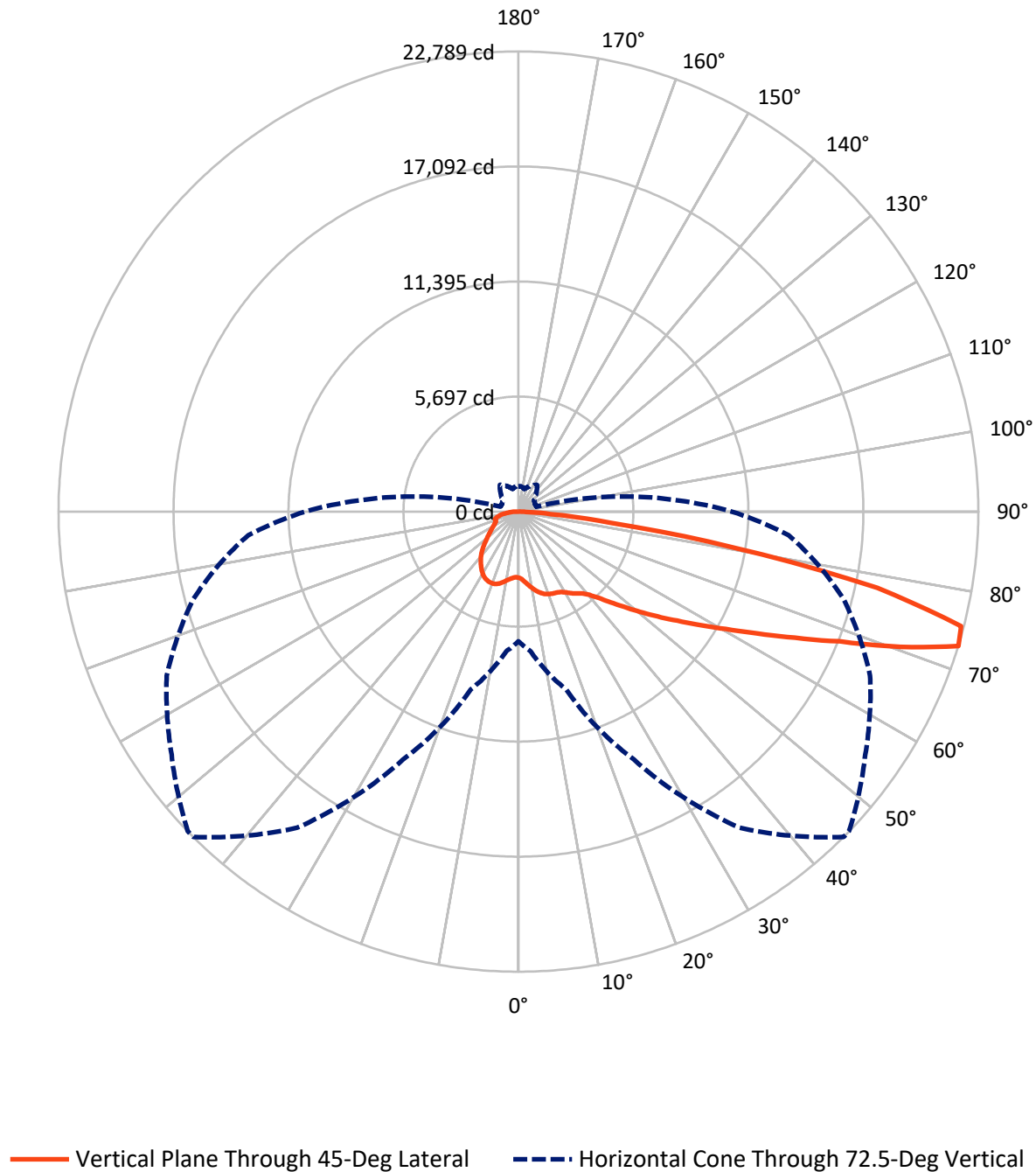
× Max cd
- - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 6.5 fc
Type IV - Short - N/A

REPORT NUMBER: P966719
CATALOG NUMBER: NAV-SB4C-740-U-T4W

Luminous Intensity Polar Plot



REPORT NUMBER: P966719

CATALOG NUMBER: NAV-SB4C-740-U-T4W

FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	7343.8	0.0	7343.8
	% Fixture	22.6	0.0	22.6
Street Side	Lumens	25141.5	0.0	25141.5
	% Fixture	77.4	0.0	77.4
Total	Lumens	32485.3	0.0	32485.3
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	333.5	1.0
10°-20°	1112.1	3.4
20°-30°	1934.5	6.0
30°-40°	2773.3	8.5
40°-50°	3904.9	12.0
50°-60°	5981.2	18.4
60°-70°	8664.7	26.7
70°-80°	6919.3	21.3
80°-90°	861.8	2.7
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°	32485.3	100.0
0°-180°	32485.3	100.0

Coefficient of Utilization



REPORT NUMBER: P966719

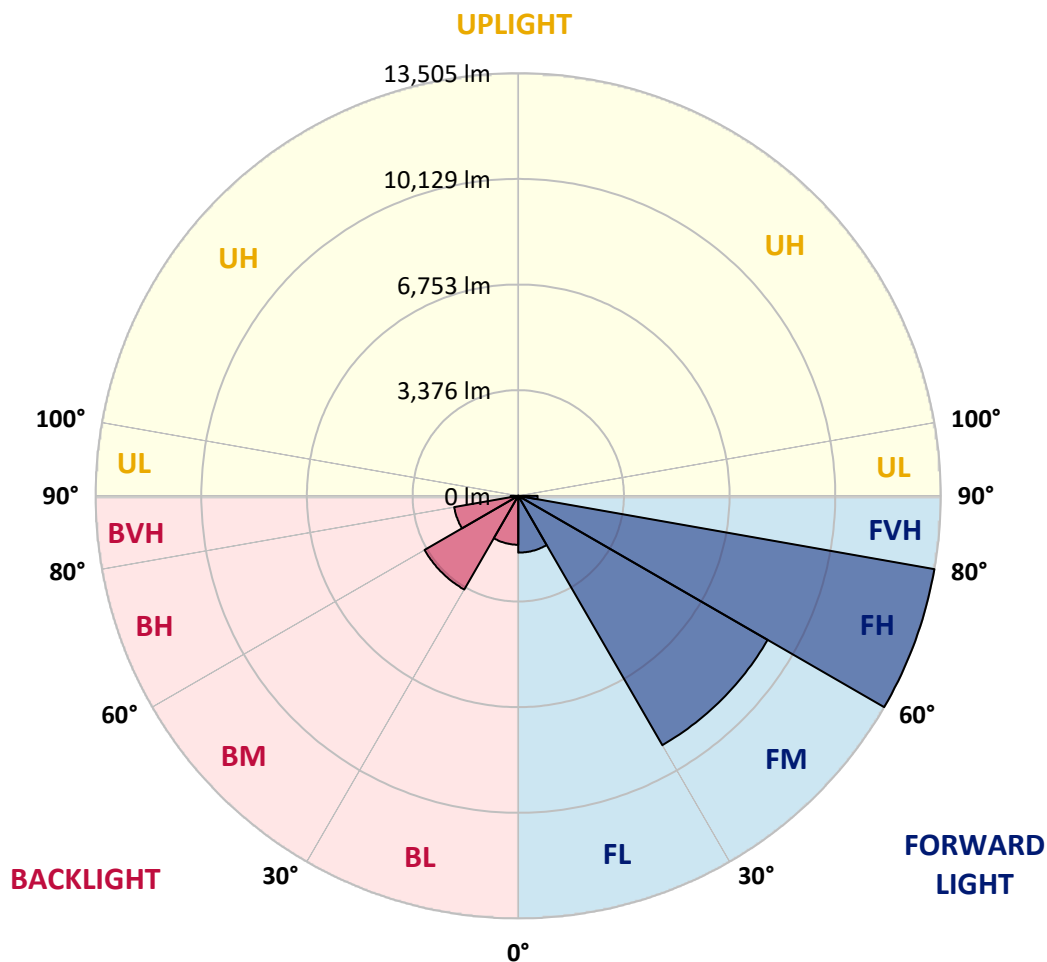
CATALOG NUMBER: NAV-SB4C-740-U-T4W

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1816.6	5.6			
FM	(30°-60°)	9201.5	28.3			
FH	(60°-80°)	13505.1	41.6			G5
FVH	(80°-90°)	618.2	1.9			G4/750
BL	(0°-30°)	1563.6	4.8	B3/2500		
BM	(30°-60°)	3457.9	10.6	B3/5000		
BH	(60°-80°)	2078.8	6.4	B3/2500		G3/2500
BVH	(80°-90°)	243.5	0.7			G3/500
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G5

Type IV Short



REPORT NUMBER: P966719

CATALOG NUMBER: NAV-SB4C-740-U-T4W

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	46°	55°	65°	75°	85°
0°	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1
2.5°	3405.5	3427.7	3407.2	3388.3	3379.8	3357.6	3355.8	3342.2	3333.6	3309.6	3302.9
5°	3643.4	3672.5	3638.2	3600.6	3566.4	3511.5	3504.8	3465.4	3420.8	3369.6	3340.5
7.5°	3912.0	3937.7	3898.4	3841.9	3781.9	3691.2	3689.6	3617.6	3547.5	3460.2	3410.6
10°	4146.4	4180.7	4127.7	4050.6	3975.4	3872.7	3860.7	3778.6	3689.6	3576.6	3501.3
12.5°	4353.6	4377.5	4326.1	4232.0	4144.8	4042.1	4026.7	3936.0	3836.8	3708.3	3612.5
15°	4517.8	4548.6	4480.2	4379.2	4286.8	4185.8	4172.2	4090.0	3990.7	3855.5	3732.3
17.5°	4625.6	4651.3	4581.1	4468.2	4379.2	4295.4	4285.1	4216.6	4129.3	3992.5	3860.7
20°	4666.7	4694.1	4620.5	4505.9	4423.7	4358.7	4353.6	4303.9	4244.0	4119.1	3985.6
22.5°	4707.8	4733.4	4637.6	4517.8	4445.9	4404.8	4403.2	4370.7	4346.7	4244.0	4113.9
25°	4873.8	4880.6	4752.3	4579.4	4476.8	4440.8	4439.1	4437.4	4447.7	4367.2	4252.6
27.5°	5017.5	5015.8	4906.3	4743.7	4584.6	4509.3	4507.5	4524.7	4557.2	4490.4	4396.3
30°	5228.0	5209.2	5079.2	4909.8	4764.3	4647.9	4637.6	4622.2	4647.9	4594.9	4540.0
32.5°	5674.7	5614.7	5404.3	5103.1	4913.1	4824.2	4810.4	4714.6	4724.9	4692.3	4665.0
35°	6314.7	6236.0	5955.4	5469.3	5097.9	4971.4	4964.5	4843.0	4822.4	4793.3	4803.7
37.5°	7076.2	6978.7	6651.8	5999.8	5416.3	5142.4	5132.2	5022.7	4938.8	4908.0	4966.2
40°	7841.1	7717.9	7447.5	6646.7	5885.1	5428.2	5395.7	5229.8	5133.9	5082.6	5205.8
42.5°	8583.9	8481.2	8250.1	7372.3	6463.5	5845.8	5773.9	5489.8	5417.9	5370.1	5592.5
45°	9241.0	9148.6	8979.2	8147.5	7141.3	6413.9	6343.8	5880.0	5857.8	5857.8	6179.5
47.5°	9774.9	9754.4	9574.7	8938.1	7940.5	7060.8	6939.4	6422.5	6482.4	6574.8	7012.9
50°	10367.1	10310.6	10118.9	9716.8	8879.9	7801.8	7702.6	7088.2	7312.4	7565.6	8217.6
52.5°	10911.2	10942.1	10728.2	10527.9	9941.0	8628.3	8453.8	7873.6	8358.0	8777.3	9629.5
55°	11470.9	11472.5	11412.7	11385.3	11053.3	9542.2	9350.6	8818.3	9588.4	10108.7	11275.7
57.5°	11996.2	11999.7	12088.6	12329.9	12343.6	10596.3	10379.0	9978.6	10955.7	11486.3	12973.3
60°	12465.1	12489.0	12732.0	13296.8	13478.2	11804.5	11599.2	11349.3	12369.3	12903.2	14758.3
62.5°	12622.6	12709.8	13250.6	14053.2	14599.1	13286.6	13084.6	12935.7	13854.7	14350.9	16250.5
65°	12355.6	12555.8	13601.4	14677.8	15752.5	15047.4	14847.2	14684.7	15398.3	15865.5	17475.7
67.5°	11700.2	11958.6	13580.8	15333.3	17152.4	17166.1	16979.5	16597.9	17053.1	17232.8	17874.6
70°	9973.5	10360.2	12384.7	15578.0	18759.2	20063.2	19883.6	18901.3	18704.5	17835.2	16751.9
72.5°	6425.9	6946.1	9119.5	13563.7	19117.0	22789.3	22779.1	20980.5	19226.4	16664.7	13435.4
75°	2344.5	2662.7	4237.1	8513.8	16046.9	22650.8	22717.5	20624.5	17551.1	12872.4	8369.9
77.5°	853.9	934.4	1382.7	3272.0	9869.1	18174.0	18312.6	16488.4	12492.5	6460.2	3316.5
80°	448.3	492.8	708.5	1269.8	4228.6	10793.1	11010.4	9798.9	5871.5	1945.8	994.2
82.5°	248.2	268.7	397.0	689.6	1904.7	4615.4	4745.4	3870.9	2065.6	824.8	410.7
85°	133.5	142.1	186.5	376.5	930.9	1600.0	1636.0	1156.8	823.2	484.3	198.5
87.5°	39.4	47.9	61.6	119.8	364.5	359.4	368.0	229.3	325.1	244.7	65.0
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: P966719

CATALOG NUMBER: NAV-SB4C-740-U-T4W

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1	3277.1
2.5°	3292.5	3287.4	3268.6	3260.0	3249.8	3248.0	3256.6	3258.3	3260.0	3261.8	3268.6
5°	3323.4	3306.2	3289.1	3278.9	3282.3	3284.0	3301.1	3313.1	3321.6	3328.5	3331.9
7.5°	3383.2	3369.6	3340.5	3338.7	3343.9	3359.2	3381.5	3408.9	3424.3	3436.3	3439.7
10°	3472.2	3446.6	3412.3	3417.5	3427.7	3449.9	3496.2	3518.4	3544.1	3566.4	3561.3
12.5°	3562.9	3540.7	3501.3	3504.8	3521.9	3561.3	3605.7	3633.1	3650.2	3667.3	3674.1
15°	3681.0	3641.6	3598.9	3598.9	3629.6	3672.5	3693.0	3715.2	3725.5	3744.3	3751.2
17.5°	3802.5	3751.2	3694.7	3691.2	3729.0	3749.4	3761.4	3764.8	3768.3	3788.8	3795.7
20°	3924.0	3867.5	3787.1	3780.3	3788.8	3785.4	3783.7	3780.3	3785.4	3811.1	3821.3
22.5°	4043.8	3978.7	3867.5	3836.8	3812.8	3780.3	3778.6	3776.8	3780.3	3805.9	3823.0
25°	4184.2	4105.4	3956.5	3864.1	3783.7	3739.2	3744.3	3746.1	3749.4	3770.0	3797.4
27.5°	4336.5	4249.1	4038.7	3855.5	3710.1	3679.3	3670.7	3675.9	3687.8	3720.3	3752.8
30°	4488.8	4386.1	4113.9	3821.3	3617.6	3574.9	3547.5	3559.5	3597.1	3629.6	3665.6
32.5°	4627.4	4524.7	4173.9	3746.1	3499.6	3432.8	3397.0	3412.3	3449.9	3461.9	3504.8
35°	4789.9	4673.6	4199.5	3626.2	3371.2	3268.6	3220.7	3198.4	3217.3	3205.3	3242.9
37.5°	4971.4	4849.8	4196.1	3468.8	3220.7	3102.6	3035.8	2952.0	2912.6	2871.5	2897.3
40°	5240.0	5065.4	4155.0	3278.9	3034.1	2926.3	2806.6	2664.5	2575.5	2495.1	2500.2
42.5°	5606.2	5365.0	4079.7	3070.1	2823.7	2722.7	2560.1	2394.1	2253.8	2120.3	2108.3
45°	6152.2	5756.8	3985.6	2847.6	2596.0	2496.8	2320.5	2133.9	1974.9	1803.7	1783.2
47.5°	6939.4	6283.9	3896.6	2594.4	2356.5	2265.8	2106.6	1933.8	1745.6	1579.5	1560.7
50°	8020.8	7040.3	3814.4	2347.9	2120.3	2051.8	1925.3	1749.0	1559.0	1425.5	1417.0
52.5°	9396.8	8068.8	3780.3	2110.1	1899.5	1873.9	1772.9	1608.6	1429.0	1316.0	1307.4
55°	10976.3	9299.2	3780.3	1882.4	1706.2	1714.7	1644.5	1492.3	1336.5	1235.5	1225.3
57.5°	12588.3	10545.0	3711.8	1672.0	1541.9	1577.8	1533.3	1399.8	1259.5	1155.2	1138.1
60°	14073.8	11589.0	3434.6	1480.3	1396.5	1452.9	1423.8	1309.1	1138.1	1050.7	1037.1
62.5°	15215.2	12177.6	2900.6	1328.0	1276.6	1341.6	1326.2	1189.3	1115.8	1079.8	1067.8
65°	15786.7	12081.8	2217.8	1192.8	1175.7	1276.6	1244.1	1239.0	1180.8	1139.7	1126.1
67.5°	15435.9	11257.0	1608.6	1093.5	1117.5	1216.8	1341.6	1362.2	1254.4	1173.9	1160.3
70°	13897.5	9764.7	1197.9	999.4	1043.9	1218.4	1529.9	1425.5	1230.4	1136.3	1120.9
72.5°	10572.4	7281.6	929.3	900.2	948.0	1227.0	1613.8	1396.5	1161.9	1256.1	1245.8
75°	6046.1	3997.6	746.1	778.6	828.3	1146.6	1571.0	1321.1	1108.9	1153.4	1153.4
77.5°	2305.1	1536.8	616.0	658.9	665.7	1001.1	1502.5	1316.0	1055.9	1030.2	939.5
80°	799.2	600.6	509.9	523.7	515.1	889.9	1440.9	1144.8	864.2	773.5	747.8
82.5°	326.9	299.5	403.8	386.7	366.2	691.4	1163.7	936.0	706.7	624.6	617.8
85°	142.1	189.9	267.0	234.4	212.2	479.2	932.6	792.3	597.3	515.1	513.4
87.5°	29.1	71.9	113.0	106.1	109.6	320.0	662.3	563.0	422.7	316.6	248.2
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)