

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: McGRAW-EDISON

Report Number: P300592

Luminaire Tested: **GLNA-AF-10-LED-E1-RW**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P300592  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24166)  
Test Lab: INNOVATION CENTER P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: MCGRAW-EDISON  
Catalog Number: GLNA-AF-10-LED-E1-RW  
Description: GALLEONAIRE AREA AND ROADWAY LUMINAIRE  
(10) 70 CRI, 4000K CCT 1050mA LIGHTSQUARE WITH 16 LEDS EACH AND  
Rectangular Wide Type I OPTICS  
Light Source: -  
Ballast/Driver: -

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 60019.3 lumens  
Efficiency: N/A  
Efficacy: 107.6 lumens/watt  
Luminous Opening: Rectangular (W 2.5' x L: 1' x H: 0')  
IES Classification: Type II - Medium - Full Cutoff  
BUG Rating: B5 - U0 - G5

Input Watts (W): 558  
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: 25 FT

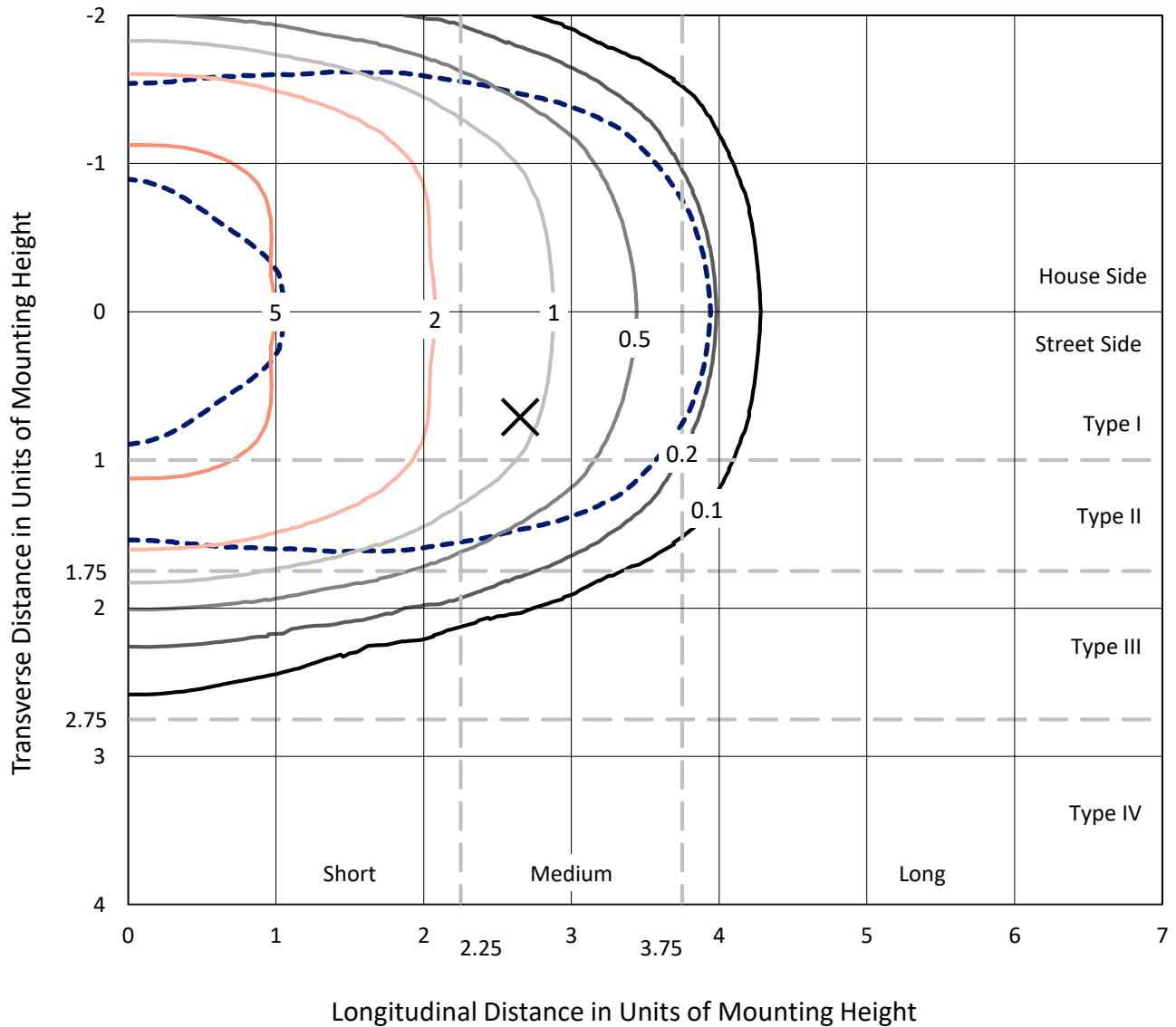


REPORT NUMBER: P300592

CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

### Iso-Footcandle Lines of Horizontal Illumination

× Max cd  
 - - - 1/2 Max cd

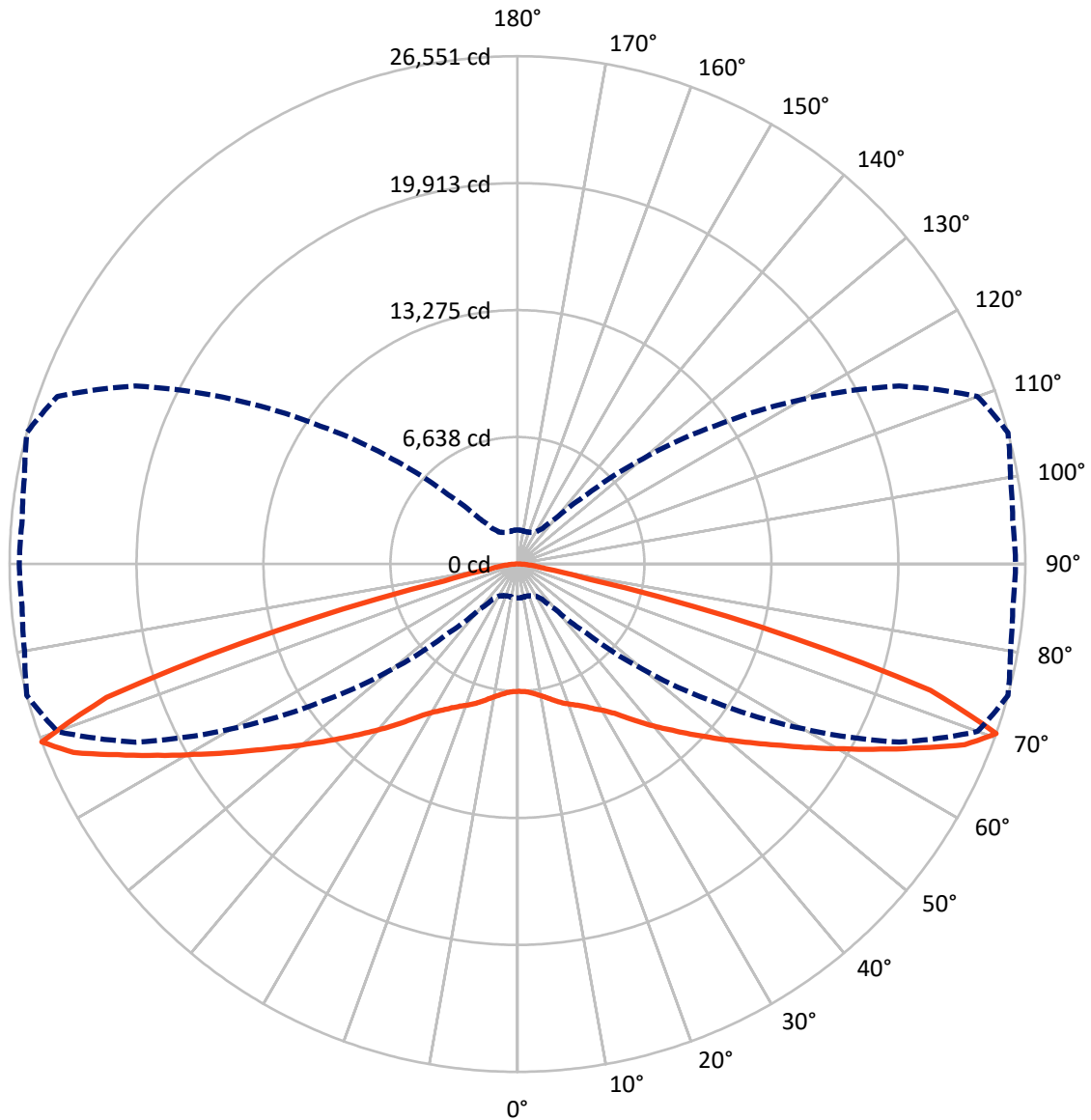


Based on 30 foot mounting height. Maximum calculated value = 7.5 fc  
 Type II - Medium - Full Cutoff

REPORT NUMBER: P300592

CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

### Luminous Intensity Polar Plot



— Vertical Plane Through 75-Deg Lateral      - - - Horizontal Cone Through 70-Deg Vertical

REPORT NUMBER: P300592

CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	30009.7	0.0	30009.7
	% Fixture	50.0	0.0	50.0
<b>Street Side</b>	Lumens	30009.7	0.0	30009.7
	% Fixture	50.0	0.0	50.0
<b>Total</b>	Lumens	60019.3	0.0	60019.3
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	638.5	1.1
10°-20°	1983.9	3.3
20°-30°	3734.1	6.2
30°-40°	6612.4	11.0
40°-50°	11058.0	18.4
50°-60°	15409.3	25.7
60°-70°	14289.7	23.8
70°-80°	5694.9	9.5
80°-90°	598.6	1.0
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°	60019.3	100.0
0°-180°	60019.3	100.0



REPORT NUMBER: P300592

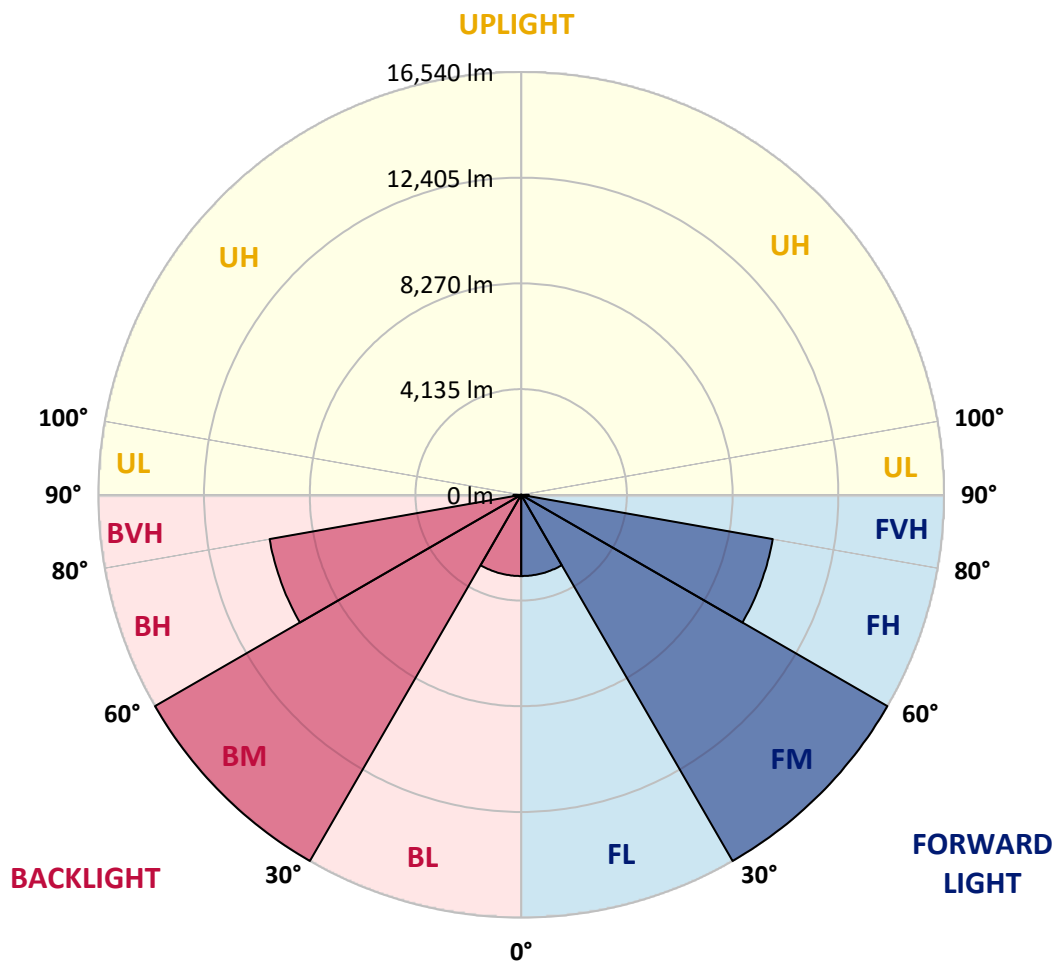
CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	3178.3	5.3			
FM	(30°-60°)	16539.8	27.6			
FH	(60°-80°)	9992.3	16.6			G4/12000
FVH	(80°-90°)	299.3	0.5			G3/500
BL	(0°-30°)	3178.3	5.3	B4/5000		
BM	(30°-60°)	16539.8	27.6	B5		
BH	(60°-80°)	9992.3	16.6	B5		G5
BVH	(80°-90°)	299.3	0.5			G3/500
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B5-U0-G5**

Type II Medium





REPORT NUMBER: P300592

CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5
2.5°	6646.2	6640.5	6646.2	6643.4	6649.0	6649.0	6654.7	6666.1	6666.1	6674.6	6671.7
5°	6581.0	6578.1	6586.6	6595.1	6603.6	6620.7	6637.7	6663.2	6683.1	6697.3	6711.4
7.5°	6453.3	6453.3	6464.7	6484.5	6504.4	6541.2	6581.0	6632.0	6683.1	6725.6	6762.5
10°	6348.4	6354.0	6368.2	6402.2	6436.3	6493.0	6546.9	6620.7	6691.6	6762.5	6819.2
12.5°	6285.9	6294.5	6320.0	6371.0	6427.8	6504.4	6586.6	6680.2	6759.7	6844.8	6901.5
15°	6305.8	6311.5	6348.4	6410.8	6484.5	6581.0	6691.6	6802.2	6895.8	6986.6	7063.2
17.5°	6416.4	6424.9	6467.5	6538.4	6615.0	6728.5	6847.6	6972.4	7088.7	7190.8	7284.4
20°	6615.0	6623.5	6677.4	6754.0	6844.8	6961.1	7080.2	7210.7	7341.2	7449.0	7553.9
22.5°	6895.8	6910.0	6961.1	7037.6	7139.8	7264.6	7406.4	7545.4	7670.2	7769.5	7863.1
25°	7264.6	7295.8	7344.0	7429.1	7536.9	7650.4	7803.5	7945.4	8064.5	8158.1	8226.2
27.5°	7786.5	7829.1	7865.9	7948.2	8053.2	8161.0	8314.1	8438.9	8552.4	8643.2	8694.2
30°	8478.7	8521.2	8558.1	8637.5	8733.9	8836.1	8980.7	9091.4	9162.3	9233.2	9230.4
32.5°	9318.3	9363.7	9377.9	9463.0	9562.2	9672.9	9803.4	9865.8	9922.5	9931.0	9879.9
35°	10257.2	10279.9	10336.6	10450.1	10563.6	10654.3	10779.1	10810.4	10810.4	10767.8	10654.3
37.5°	11286.9	11301.1	11380.5	11508.2	11624.5	11718.1	11803.2	11865.6	11834.4	11743.6	11553.5
40°	12415.9	12441.4	12554.9	12668.3	12798.8	12886.8	12977.5	12988.9	12957.7	12824.4	12566.2
42.5°	13493.8	13516.5	13630.0	13808.7	13978.9	14100.8	14185.9	14202.9	14103.7	13981.7	13661.2
45°	14421.4	14480.9	14628.4	14838.3	15085.1	15258.2	15374.5	15422.7	15334.8	15175.9	14804.3
47.5°	15156.1	15215.6	15425.5	15675.2	15981.5	16262.3	16455.2	16557.3	16534.6	16415.5	16009.9
50°	15695.0	15751.7	15978.7	16285.0	16642.4	16991.3	17320.4	17564.3	17649.4	17595.5	17223.9
52.5°	15757.4	15851.0	16117.7	16529.0	16994.2	17470.7	17938.8	18352.9	18633.7	18676.3	18401.1
55°	14886.6	14980.2	15348.9	15958.8	16650.9	17428.2	18177.0	18874.9	19428.0	19711.7	19567.0
57.5°	12832.9	13000.2	13388.8	14103.7	15122.0	16285.0	17479.2	18718.8	19845.0	20596.7	20741.4
60°	9834.6	10033.1	10424.6	11184.8	12319.4	13706.5	15300.7	17133.2	19121.6	20812.3	21822.1
62.5°	6308.6	6495.9	6907.2	7568.1	8492.8	9996.2	11706.7	13882.4	16554.5	19223.8	21629.2
65°	3242.3	3344.4	3560.0	3959.9	4680.4	5803.7	7338.3	9508.3	12563.4	15856.7	19334.4
67.5°	2053.7	2073.6	2121.8	2178.5	2362.9	2751.5	3466.3	4819.4	7332.7	10767.8	14838.3
70°	1775.7	1775.7	1753.0	1744.5	1767.2	1821.1	1931.7	2246.6	3094.8	5111.6	8558.1
72.5°	1625.4	1608.4	1568.6	1537.4	1531.8	1531.8	1554.5	1602.7	1738.8	2082.1	3350.0
75°	1497.7	1449.5	1395.6	1358.7	1344.6	1330.4	1327.5	1336.0	1364.4	1418.3	1599.9
77.5°	1341.7	1279.3	1216.9	1180.0	1163.0	1143.2	1126.1	1106.3	1092.1	1109.1	1188.5
80°	1154.5	1083.6	1035.4	1012.7	995.7	967.3	930.4	896.4	865.2	859.5	907.7
82.5°	930.4	848.1	851.0	859.5	828.3	788.6	748.9	712.0	658.1	629.7	658.1
85°	751.7	709.2	689.3	743.2	697.8	638.2	575.8	510.6	425.5	357.4	388.6
87.5°	292.2	292.2	436.8	672.3	604.2	493.6	422.7	360.3	224.1	173.0	175.9
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: P300592

CATALOG NUMBER: GLNA-AF-10-LED-E1-RW

**CANDELA DISTRIBUTION (continued):**

	55°	60°	65°	70°	75°	80°	85°	90°
0°	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5	6657.5
2.5°	6668.9	6674.6	6671.7	6668.9	6668.9	6666.1	6668.9	6668.9
5°	6719.9	6734.1	6734.1	6739.8	6739.8	6742.6	6745.5	6742.6
7.5°	6796.5	6822.1	6839.1	6858.9	6861.8	6864.6	6870.3	6864.6
10°	6873.1	6924.2	6961.1	6997.9	7015.0	7020.6	7026.3	7026.3
12.5°	6969.6	7040.5	7105.7	7171.0	7202.2	7219.2	7219.2	7230.5
15°	7128.4	7199.3	7275.9	7363.9	7417.8	7446.1	7454.6	7454.6
17.5°	7352.5	7414.9	7480.2	7565.3	7633.3	7670.2	7678.7	7675.9
20°	7613.5	7673.1	7709.9	7763.8	7823.4	7865.9	7877.3	7877.3
22.5°	7911.3	7945.4	7951.0	7968.1	8016.3	8073.0	8098.5	8104.2
25°	8240.4	8248.9	8226.2	8226.2	8257.4	8311.3	8336.8	8339.7
27.5°	8665.9	8623.3	8566.6	8546.7	8566.6	8629.0	8660.2	8671.5
30°	9196.3	9094.2	8963.7	8892.8	8881.5	8963.7	9020.4	9029.0
32.5°	9803.4	9655.8	9482.8	9338.1	9301.3	9352.3	9420.4	9417.6
35°	10523.9	10348.0	10138.1	9953.7	9868.6	9919.7	10016.1	10027.4
37.5°	11355.0	11125.2	10884.1	10651.5	10518.2	10532.4	10634.5	10668.5
40°	12282.6	11984.7	11681.2	11369.2	11179.1	11142.2	11267.0	11286.9
42.5°	13275.4	12892.4	12509.5	12123.7	11879.8	11823.0	11967.7	11959.2
45°	14333.4	13845.5	13397.3	12971.9	12682.5	12597.4	12716.6	12716.6
47.5°	15470.9	14869.6	14336.3	13854.0	13539.2	13417.2	13530.7	13539.2
50°	16676.5	16038.2	15411.3	14875.2	14498.0	14341.9	14489.4	14512.1
52.5°	17876.4	17255.1	16622.6	16009.9	15553.2	15363.1	15533.3	15607.1
55°	19093.3	18483.4	17879.2	17280.7	16738.9	16514.8	16696.3	16789.9
57.5°	20378.3	19813.8	19237.9	18633.7	18111.8	17762.9	17955.8	18080.6
60°	21884.5	21402.3	20803.8	20137.2	19609.5	19255.0	19365.6	19476.2
62.5°	23075.9	23263.1	22755.4	21983.8	21305.8	20852.0	20959.8	21076.1
65°	22500.1	24420.4	24871.5	24091.4	23152.5	22446.2	22400.8	22460.3
67.5°	18806.8	22536.9	25257.2	26000.4	25214.7	24233.2	24051.7	24139.6
70°	12580.4	17226.8	22026.3	25600.5	26550.7	26170.6	25991.9	26045.8
72.5°	6042.0	10033.1	14943.3	19694.6	22588.0	23915.5	24341.0	24548.1
75°	2209.7	3982.6	7202.2	10852.9	13102.3	15167.4	16514.8	17065.1
77.5°	1333.2	1608.4	2300.5	3463.5	3923.0	4391.1	4209.5	4300.3
80°	987.1	1114.8	1262.3	1418.3	1469.4	1469.4	1412.6	1367.2
82.5°	692.1	774.4	845.3	930.4	953.1	910.6	748.9	595.7
85°	445.3	482.2	513.4	567.3	553.1	527.6	354.6	314.9
87.5°	204.2	232.6	243.9	269.5	258.1	246.8	175.9	147.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)