

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: P299673

Luminaire Tested: **GLNA-AF-07-LED-E1-5MQ-8030-800**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P299673
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24142)
Test Lab: INNOVATION CENTER P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: GLNA-AF-07-LED-E1-5MQ-8030-800
Description: GALLEONNAIRE AREA AND ROADWAY LUMINAIRE
(7) 80 CRI, 3000K CCT 800mA LIGHTSQUARE WITH 16 LEDS EACH AND Type III
w/Spill Control OPTICS
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 29060.5 lumens
Efficiency: N/A
Efficacy: 98.5 lumens/watt
Luminous Opening: Rectangular (W 2' x L: 1' x H: 0')
IES Classification: Type V - Short - Full Cutoff
BUG Rating: B5 - U0 - G3

Input Watts (W): 295
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



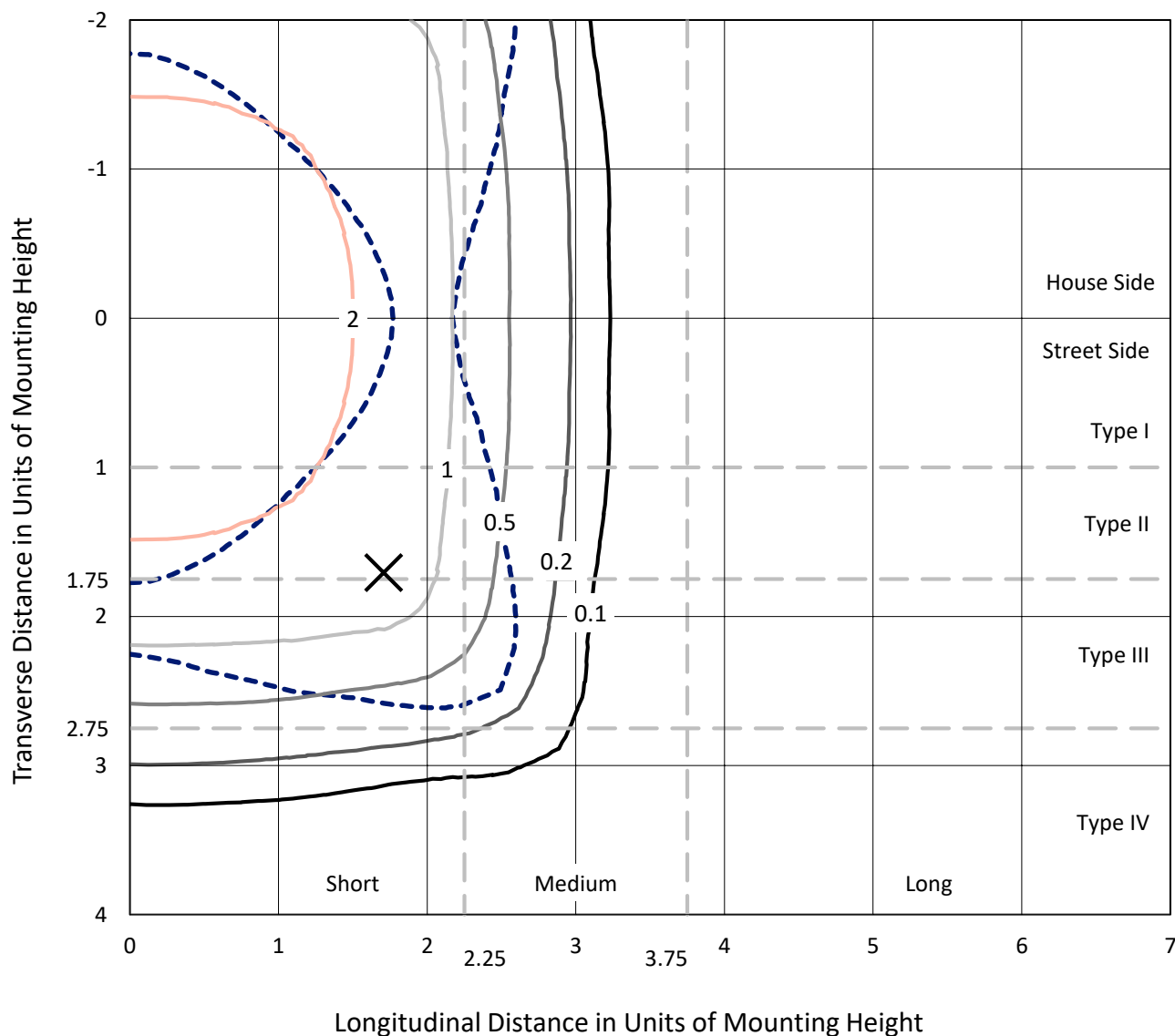
REPORT NUMBER: P299673

CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

Iso-Footcandle Lines of Horizontal Illumination

× Max cd

--- 1/2 Max cd

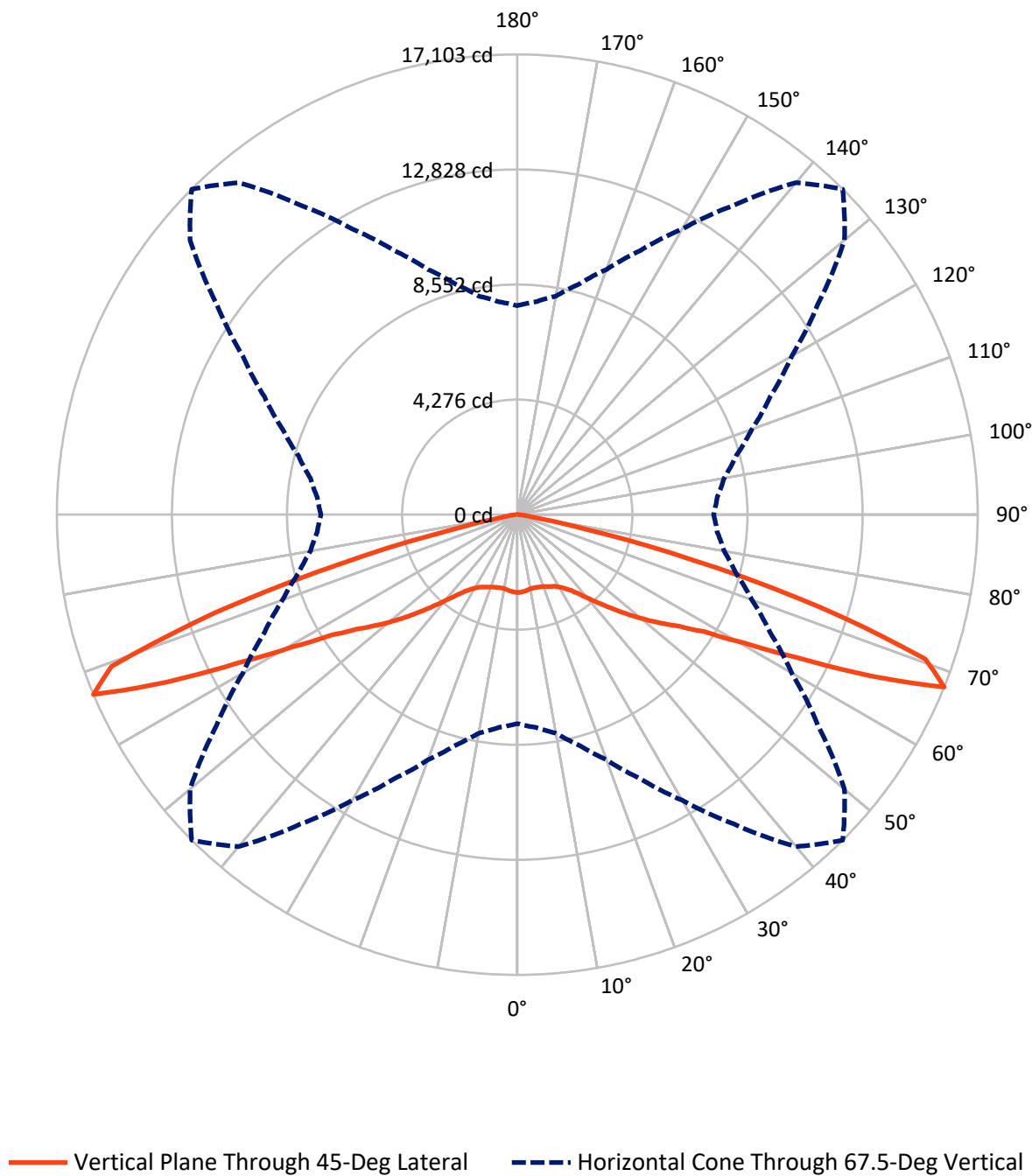


Based on 25 foot mounting height. Maximum calculated value = 4.6 fc
Type V - Short - Full Cutoff

REPORT NUMBER: P299673

CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

Luminous Intensity Polar Plot



REPORT NUMBER: P299673

CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	14530.2	0.0	14530.2
	% Fixture	50.0	0.0	50.0
Street Side	Lumens	14530.2	0.0	14530.2
	% Fixture	50.0	0.0	50.0
Total	Lumens	29060.5	0.0	29060.5
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	271.1	0.9
10°-20°	786.5	2.7
20°-30°	1337.1	4.6
30°-40°	2185.8	7.5
40°-50°	3902.0	13.4
50°-60°	6578.8	22.6
60°-70°	10209.4	35.1
70°-80°	3587.1	12.3
80°-90°	202.7	0.7
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°	29060.5	100.0
0°-180°	29060.5	100.0

Coefficient of Utilization



REPORT NUMBER: P299673

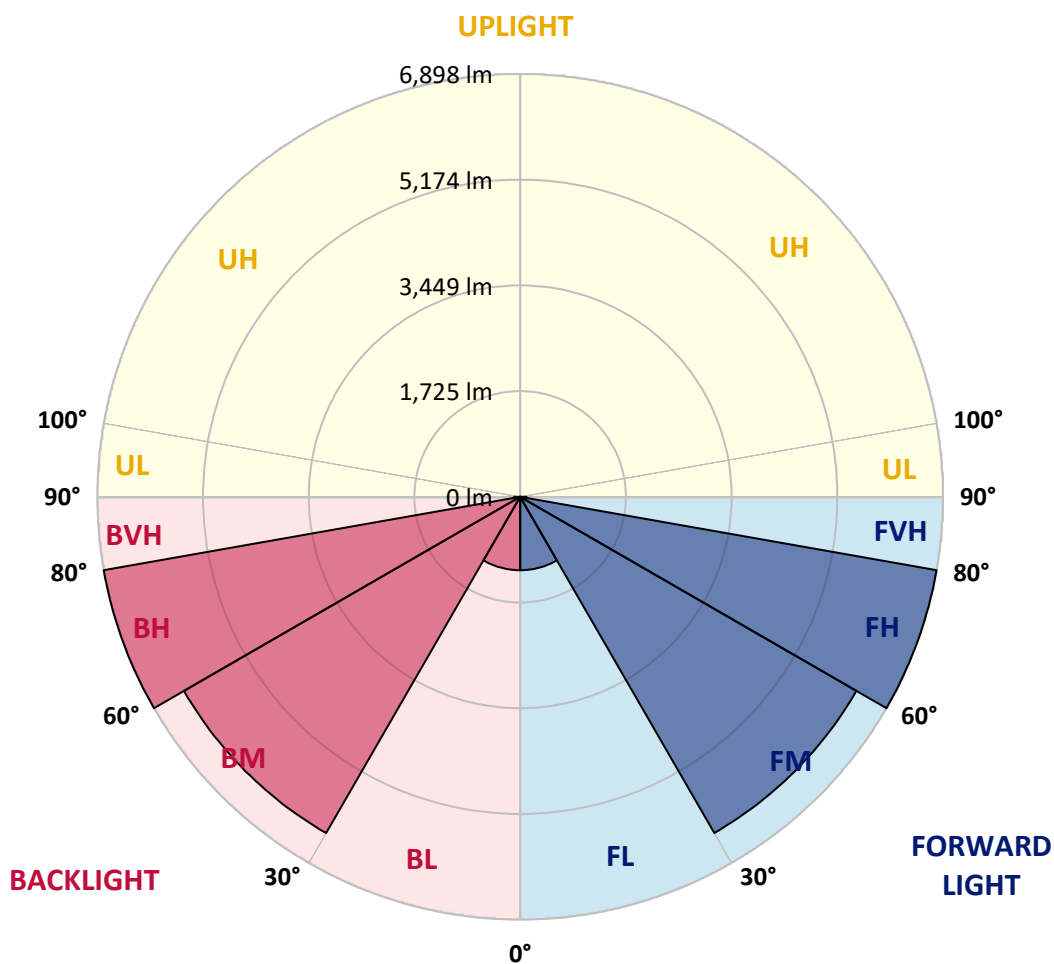
CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1197.4	4.1			
FM	(30°-60°)	6333.3	21.8			
FH	(60°-80°)	6898.3	23.7			G3/7500
FVH	(80°-90°)	101.4	0.3			G2/225
BL	(0°-30°)	1197.4	4.1	B3/2500		
BM	(30°-60°)	6333.3	21.8	B4/8500		
BH	(60°-80°)	6898.3	23.7	B5		G3/7500
BVH	(80°-90°)	101.4	0.3			G2/225
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B5-U0-G3

Type V Short



REPORT NUMBER: P299673

CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0
2.5°	2885.3	2888.0	2888.0	2888.0	2886.6	2886.6	2884.0	2886.6	2885.3	2881.3	2882.6
5°	2861.3	2863.9	2863.9	2862.6	2866.6	2865.3	2861.3	2863.9	2862.6	2859.9	2861.3
7.5°	2826.5	2830.5	2830.5	2829.2	2833.2	2831.9	2829.2	2830.5	2830.5	2826.5	2826.5
10°	2787.8	2790.4	2790.4	2789.1	2795.8	2795.8	2794.4	2798.4	2799.8	2795.8	2793.1
12.5°	2751.7	2755.7	2755.7	2761.0	2767.7	2770.4	2777.1	2782.4	2787.8	2786.4	2781.1
15°	2730.3	2733.0	2738.3	2745.0	2755.7	2765.0	2775.7	2787.8	2798.4	2801.1	2793.1
17.5°	2716.9	2720.9	2728.9	2738.3	2753.0	2769.0	2785.1	2801.1	2815.8	2821.2	2811.8
20°	2712.9	2715.6	2723.6	2739.6	2759.7	2783.7	2806.5	2825.2	2845.2	2851.9	2845.2
22.5°	2720.9	2726.3	2735.6	2754.3	2781.1	2811.8	2838.5	2863.9	2889.3	2901.3	2892.0
25°	2757.0	2762.4	2774.4	2798.4	2827.8	2859.9	2890.7	2920.1	2942.8	2954.8	2948.1
27.5°	2823.8	2830.5	2845.2	2869.3	2901.3	2936.1	2969.5	2993.6	3012.3	3016.3	3008.3
30°	2924.1	2938.8	2956.1	2982.9	3020.3	3049.7	3083.1	3104.5	3127.2	3127.2	3120.5
32.5°	3080.4	3095.1	3113.8	3139.2	3168.6	3200.7	3230.1	3248.8	3272.9	3274.2	3258.2
35°	3314.3	3321.0	3337.0	3353.1	3379.8	3407.8	3433.2	3445.3	3465.3	3466.6	3451.9
37.5°	3623.0	3624.3	3635.0	3640.4	3664.4	3695.2	3719.2	3727.2	3746.0	3743.3	3728.6
40°	3982.5	3989.2	3993.2	4001.2	4026.6	4056.0	4081.4	4085.4	4105.5	4101.4	4082.7
42.5°	4398.1	4400.8	4423.5	4435.5	4459.6	4474.3	4506.4	4510.4	4534.4	4523.7	4502.4
45°	4864.5	4888.6	4910.0	4934.0	4959.4	4976.8	5002.2	4996.8	5012.9	4996.8	4984.8
47.5°	5355.0	5372.4	5420.5	5457.9	5499.3	5514.0	5550.1	5534.1	5550.1	5527.4	5523.4
50°	5894.9	5925.6	5967.1	6009.8	6053.9	6078.0	6124.8	6104.7	6126.1	6104.7	6092.7
52.5°	6426.8	6434.8	6525.7	6588.5	6650.0	6678.0	6706.1	6696.7	6698.1	6696.7	6684.7
55°	6932.0	6950.7	7041.5	7127.1	7234.0	7312.8	7360.9	7355.6	7343.6	7331.5	7311.5
57.5°	7501.3	7520.0	7624.2	7729.8	7851.4	7963.7	8061.2	8161.5	8200.2	8210.9	8166.8
60°	8271.0	8269.7	8408.7	8537.0	8710.7	8877.8	9091.6	9309.4	9559.3	9675.6	9521.9
62.5°	9054.2	9086.2	9286.7	9513.9	9872.1	10220.9	10615.1	11002.7	11398.2	11720.3	11378.2
65°	8960.6	9083.6	9381.6	9896.1	10557.6	11343.4	12193.4	13092.8	13905.3	14464.0	13837.2
67.5°	7765.9	7940.9	8244.3	8869.8	9697.0	10830.3	12257.5	14036.3	16103.7	17103.4	15864.5
70°	5629.0	5826.7	6144.8	6755.6	7574.8	8651.9	10202.2	12337.7	15074.7	16082.4	14717.9
72.5°	2801.1	2908.0	3104.5	3493.4	4113.5	4987.5	6393.4	8446.1	10867.7	11792.5	10545.6
75°	951.5	1001.0	1034.4	1161.3	1357.8	1701.2	2400.2	3692.5	5633.0	6752.9	5552.8
77.5°	549.3	550.6	573.3	596.0	629.4	666.9	760.4	998.3	1726.6	2452.3	1786.8
80°	355.5	354.1	372.9	390.2	413.0	431.7	437.0	462.4	533.2	632.1	565.3
82.5°	184.4	207.1	248.6	271.3	314.1	322.1	311.4	302.0	319.4	331.4	339.4
85°	101.6	88.2	132.3	171.1	189.8	192.4	192.4	181.8	188.4	184.4	200.5
87.5°	46.8	42.8	52.1	84.2	89.5	76.2	80.2	70.8	50.8	49.4	56.1
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: P299673

CATALOG NUMBER: GLNA-AF-07-LED-E1-5MQ-8030-800

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°
0°	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0	2896.0
2.5°	2882.6	2884.0	2884.0	2888.0	2889.3	2892.0	2894.7	2896.0
5°	2859.9	2863.9	2861.3	2865.3	2865.3	2867.9	2867.9	2869.3
7.5°	2826.5	2830.5	2830.5	2830.5	2829.2	2833.2	2833.2	2833.2
10°	2791.8	2794.4	2793.1	2790.4	2787.8	2791.8	2790.4	2789.1
12.5°	2781.1	2774.4	2769.0	2766.4	2761.0	2762.4	2758.3	2758.3
15°	2787.8	2775.7	2766.4	2762.4	2757.0	2754.3	2751.7	2753.0
17.5°	2805.1	2790.4	2778.4	2771.7	2765.0	2761.0	2755.7	2757.0
20°	2835.9	2818.5	2801.1	2787.8	2775.7	2769.0	2765.0	2763.7
22.5°	2881.3	2855.9	2830.5	2810.5	2794.4	2785.1	2781.1	2778.4
25°	2933.4	2905.4	2876.0	2853.2	2837.2	2825.2	2817.2	2817.2
27.5°	2998.9	2976.2	2949.5	2922.7	2908.0	2896.0	2890.7	2888.0
30°	3108.5	3087.1	3065.7	3040.3	3021.6	3009.6	3000.2	2992.2
32.5°	3248.8	3231.4	3214.1	3195.4	3178.0	3161.9	3147.2	3140.6
35°	3446.6	3433.2	3421.2	3399.8	3393.1	3383.8	3375.8	3369.1
37.5°	3719.2	3713.9	3713.9	3691.2	3685.8	3681.8	3673.8	3675.1
40°	4077.4	4082.7	4076.0	4068.0	4064.0	4053.3	4053.3	4062.7
42.5°	4501.0	4505.0	4519.7	4506.4	4521.1	4507.7	4499.7	4506.4
45°	4992.8	5007.5	5036.9	5023.6	5032.9	5010.2	4982.1	4983.5
47.5°	5544.8	5558.1	5570.2	5560.8	5562.1	5524.7	5487.3	5477.9
50°	6118.1	6123.4	6130.1	6116.7	6119.4	6078.0	6035.2	6036.6
52.5°	6684.7	6710.1	6736.8	6700.8	6692.7	6646.0	6585.8	6561.8
55°	7332.9	7369.0	7338.2	7275.4	7212.6	7149.8	7070.9	7057.6
57.5°	8132.1	8070.6	7974.4	7855.4	7768.5	7680.3	7600.2	7566.8
60°	9243.9	9012.7	8839.0	8662.6	8551.7	8443.4	8337.9	8321.8
62.5°	10815.6	10416.0	10069.8	9705.0	9407.0	9174.5	8988.7	8936.6
65°	12785.4	11840.6	11021.4	10256.9	9592.7	9091.6	8776.2	8637.2
67.5°	13632.7	11767.1	10362.5	9277.4	8408.7	7802.0	7461.2	7291.5
70°	11979.6	9758.5	8230.9	7144.4	6353.3	5706.5	5397.8	5216.0
72.5°	8241.6	6207.6	4908.6	4006.6	3374.4	2833.2	2619.4	2603.3
75°	3700.5	2451.0	1689.2	1301.7	1095.9	952.9	908.8	875.3
77.5°	1035.7	765.8	682.9	638.8	596.0	546.6	527.9	531.9
80°	503.8	475.8	457.1	429.0	390.2	348.8	330.1	338.1
82.5°	334.1	330.1	342.1	322.1	265.9	225.9	189.8	173.7
85°	203.1	205.8	209.8	211.2	179.1	125.6	85.5	96.2
87.5°	80.2	92.2	100.2	104.2	97.6	60.1	48.1	49.4
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)