

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: P456391

Luminaire Tested: **GALN-SA7C-827-U-T3R**

Issue Date: 1/4/2021

Test Information

Test Method: LM-79-08
Report Number: P456391
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2011-042-8)
Test Lab: INNOVATION CENTER
Issue Date: 1/4/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: GALN-SA7C-827-U-T3R
Description: GALLEON AREA AND ROADWAY LUMINAIRE
(7) 80 CRI, 2700K, 1050mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE III
ROADWAY OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 36837 lumens
Efficiency: N/A
Efficacy: 97.7 lumens/watt
Luminous Opening: Rectangular (W 1.5' x L: 1.5' x H: 0')
IES Classification: Type IV - Medium
BUG Rating: B3 - U0 - G5

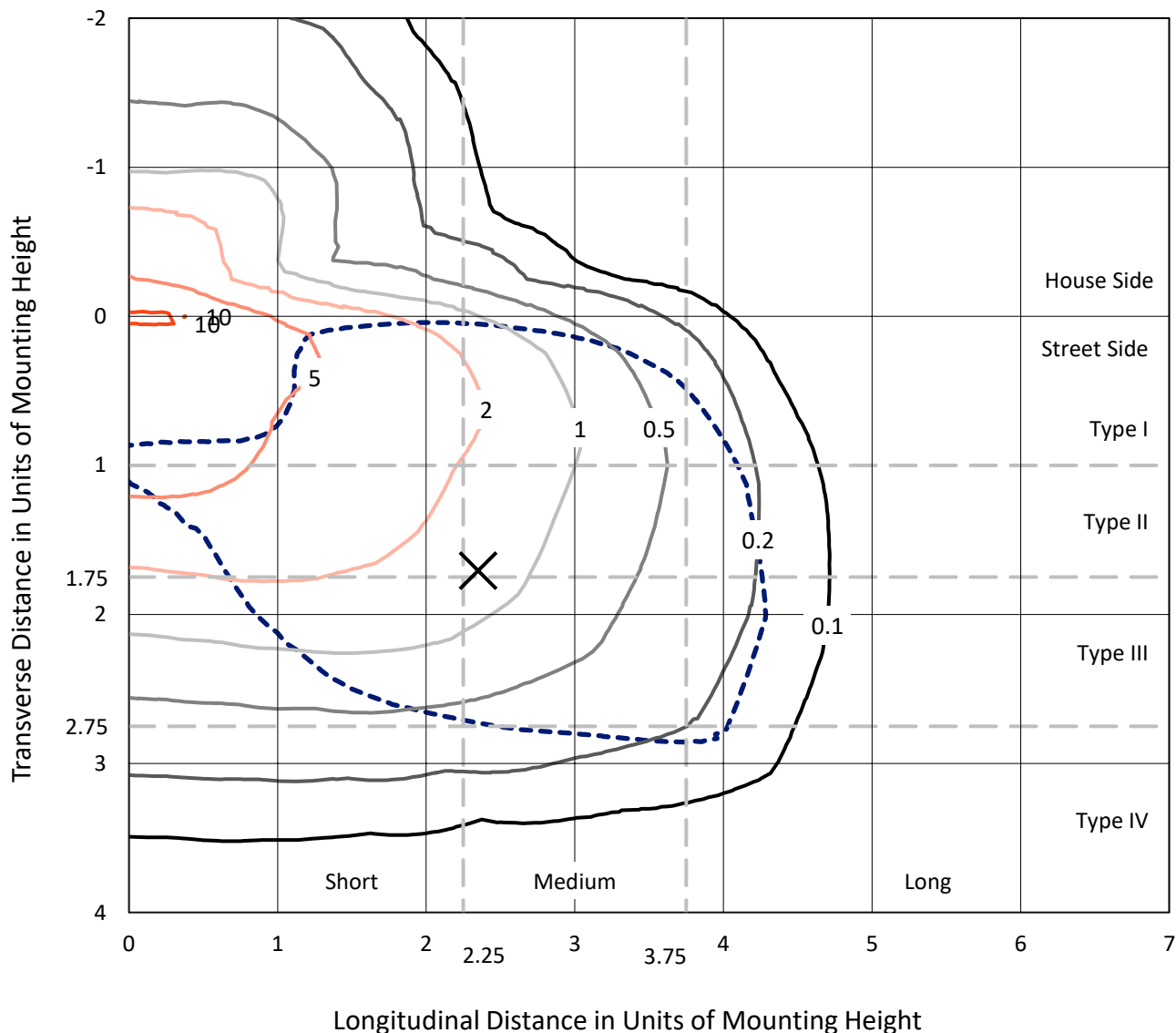
Input Watts (W): 377
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



REPORT NUMBER: P456391
 CATALOG NUMBER: GALN-SA7C-827-U-T3R

Iso-Footcandle Lines of Horizontal Illumination

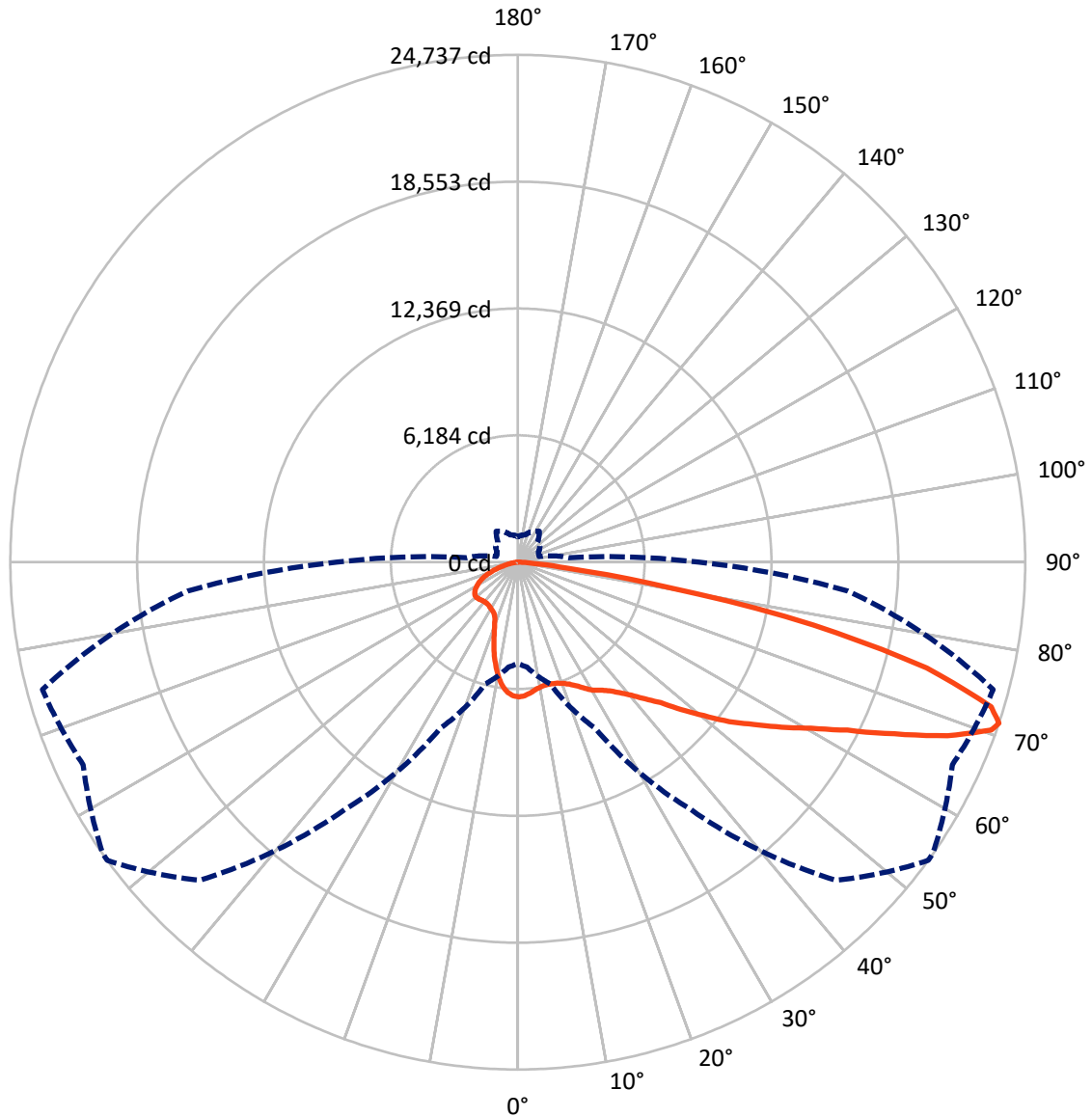
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 10.6 fc
 Type IV - Medium - N/A

REPORT NUMBER: P456391
CATALOG NUMBER: GALN-SA7C-827-U-T3R

Luminous Intensity Polar Plot



— Vertical Plane Through 54-Deg Lateral - - - Horizontal Cone Through 71-Deg Vertical

REPORT NUMBER: P456391

CATALOG NUMBER: GALN-SA7C-827-U-T3R

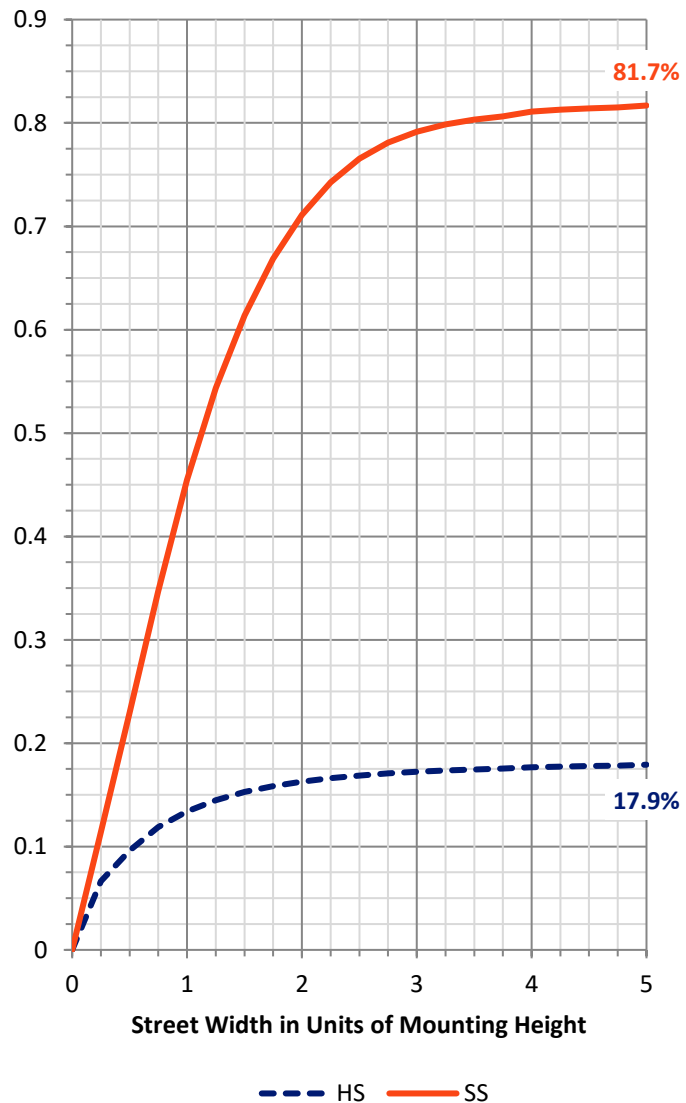
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	6650.7	0.0	6650.7
	% Fixture	18.1	0.0	18.1
Street Side	Lumens	30186.3	0.0	30186.3
	% Fixture	81.9	0.0	81.9
Total	Lumens	36837.0	0.0	36837.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	585.7	1.6
10°-20°	1546.5	4.2
20°-30°	2575.0	7.0
30°-40°	3807.6	10.3
40°-50°	5363.1	14.6
50°-60°	7181.5	19.5
60°-70°	9051.7	24.6
70°-80°	6182.3	16.8
80°-90°	543.7	1.5
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°	36837.0	100.0
0°-180°	36837.0	100.0



REPORT NUMBER: P456391

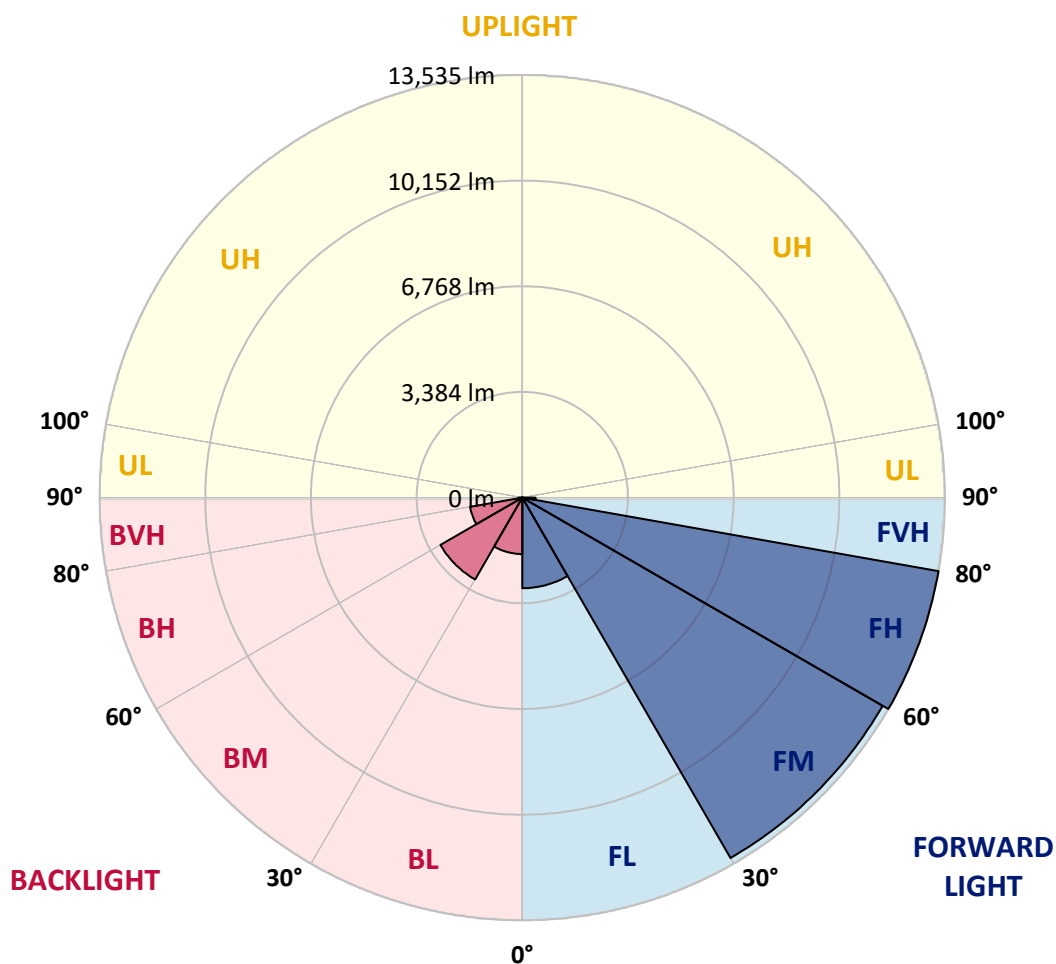
CATALOG NUMBER: GALN-SA7C-827-U-T3R

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	2899.7	7.9			
FM	(30°-60°)	13326.3	36.2			
FH	(60°-80°)	13535.4	36.7			G5
FVH	(80°-90°)	425.0	1.2			G3/500
BL	(0°-30°)	1807.5	4.9	B3/2500		
BM	(30°-60°)	3025.9	8.2	B3/5000		
BH	(60°-80°)	1698.6	4.6	B3/2500		G3/2500
BVH	(80°-90°)	118.7	0.3			G2/225
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 Medium





REPORT NUMBER: P456391

CATALOG NUMBER: GALN-SA7C-827-U-T3R

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	54°	55°	65°	75°	85°
0°	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3
2.5°	6349.4	6379.3	6387.2	6407.1	6448.9	6482.7	6516.6	6512.6	6560.3	6580.2	6598.1
5°	6066.9	6074.8	6104.7	6144.5	6218.1	6311.6	6403.1	6405.1	6522.5	6616.0	6661.8
7.5°	5859.9	5885.8	5905.7	5947.5	6025.1	6126.6	6271.8	6283.7	6492.7	6677.7	6775.2
10°	5724.6	5754.5	5776.4	5828.1	5905.7	6019.1	6176.3	6198.2	6470.8	6775.2	6946.3
12.5°	5601.3	5631.1	5651.0	5718.6	5820.1	5959.4	6136.5	6162.4	6478.7	6888.6	7133.4
15°	5676.9	5700.7	5692.8	5712.7	5780.3	5939.5	6152.4	6178.3	6508.6	6998.1	7318.4
17.5°	6013.1	6033.0	5967.4	5891.8	5859.9	5977.3	6202.2	6230.0	6568.3	7111.5	7507.5
20°	6508.6	6562.3	6419.1	6249.9	6096.7	6112.6	6305.6	6335.5	6651.9	7224.9	7700.5
22.5°	7153.3	7193.1	7018.0	6739.4	6456.9	6311.6	6460.8	6478.7	6777.2	7372.2	7911.4
25°	7911.4	7935.3	7692.5	7334.4	6926.4	6651.9	6673.7	6705.6	6984.2	7539.3	8098.4
27.5°	8647.6	8723.2	8442.7	8004.9	7467.7	7010.0	6966.2	6986.1	7209.0	7632.8	8227.8
30°	9521.1	9515.2	9218.7	8711.3	8022.8	7400.0	7242.8	7238.8	7330.4	7678.6	8321.3
32.5°	10217.6	10299.1	10008.6	9455.5	8657.6	7803.9	7433.8	7425.9	7423.9	7758.2	8460.6
35°	11009.5	11021.4	10754.8	10197.7	9344.0	8311.3	7700.5	7660.7	7614.9	7929.3	8649.6
37.5°	11717.9	11773.6	11528.8	10904.0	10018.6	8838.6	8066.6	8040.7	7901.4	8225.8	8952.1
40°	12271.0	12312.8	12165.6	11570.6	10683.2	9407.7	8532.2	8484.5	8315.3	8711.3	9356.0
42.5°	12452.1	12537.6	12595.4	12302.9	11447.2	10082.3	9105.3	9045.6	8916.2	9447.5	9821.6
45°	12466.0	12601.3	12905.8	12919.7	12215.3	10890.1	9773.8	9732.0	9722.1	10390.7	10476.2
47.5°	12360.6	12497.9	13009.2	13285.8	12899.8	11705.9	10738.9	10673.2	10679.2	11556.7	11210.5
50°	12105.9	12269.0	12889.8	13520.6	13435.0	12553.6	11757.7	11735.8	11859.1	12887.8	11972.5
52.5°	11626.3	11823.3	12766.5	13667.8	13833.0	13283.8	12915.7	12854.0	13166.4	14332.4	12806.3
55°	10299.1	10595.6	12314.8	13749.4	14211.1	13982.2	13958.4	14069.8	14483.7	15908.3	13723.6
57.5°	9606.7	9829.5	11333.8	13763.4	14688.6	14794.1	15176.1	15204.0	15928.2	17581.8	14760.2
60°	9228.6	9425.6	10796.6	13671.8	15355.2	15798.9	16421.7	16521.2	17339.0	19394.5	15834.7
62.5°	8898.3	9067.5	10474.2	13355.4	16107.3	17289.3	18035.4	18083.2	18940.8	21396.2	16895.3
65°	8120.3	8313.3	9825.6	13039.1	16756.0	19151.7	20176.4	20120.7	20646.0	23123.3	17559.9
67.5°	7071.7	7316.4	8613.8	11946.7	17076.4	21187.3	22588.1	22518.4	22329.4	24255.5	17750.9
70°	5732.6	5863.9	7063.7	10058.4	15796.9	22255.8	24492.3	24418.7	23372.0	24404.7	16847.5
71°	4932.7	5137.6	6150.4	8934.1	14732.4	21929.4	24737.0	24717.1	23374.0	23992.9	16167.0
72.5°	3850.2	3975.6	4871.0	6922.5	12521.7	20075.0	24132.1	24207.7	22866.6	22848.7	14764.2
75°	2435.5	2491.2	3056.3	4075.1	6870.7	14217.0	20600.3	20805.2	20303.8	18702.0	10979.6
77.5°	1414.7	1486.4	1830.6	2401.7	2968.8	7716.4	14740.3	14963.2	14107.6	10297.1	4494.9
80°	823.8	903.4	1205.8	1394.8	1363.0	2863.3	7505.5	7885.5	6108.6	2600.7	1261.5
82.5°	457.7	511.4	847.6	849.6	726.3	935.2	2361.9	2471.3	1743.1	1048.6	515.4
85°	332.3	376.1	547.2	495.5	348.2	401.9	821.8	861.6	704.4	441.7	167.1
87.5°	117.4	167.1	300.5	238.8	95.5	83.6	236.8	193.0	179.1	123.4	37.8
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: P456391
 CATALOG NUMBER: GALN-SA7C-827-U-T3R

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3	6572.3
2.5°	6608.1	6612.1	6592.2	6556.3	6520.5	6474.8	6423.0	6383.2	6365.3	6363.3	6361.3
5°	6679.7	6689.7	6614.1	6502.6	6379.3	6228.0	6098.7	5951.5	5913.6	5854.0	5871.9
7.5°	6795.1	6789.2	6639.9	6403.1	6114.6	5794.3	5523.6	5366.5	5203.3	5157.5	5159.5
10°	6960.3	6922.5	6639.9	6200.2	5718.6	5243.1	4865.0	4626.3	4496.9	4389.5	4349.7
12.5°	7135.4	7039.9	6576.2	5915.6	5209.3	4626.3	4220.3	3898.0	3814.4	3726.9	3728.9
15°	7302.5	7143.3	6450.9	5515.7	4660.1	3967.6	3573.7	3380.6	3354.8	3364.7	3362.7
17.5°	7453.7	7217.0	6259.9	5070.0	4019.4	3402.5	3193.6	3207.5	3277.2	3326.9	3332.9
20°	7607.0	7260.7	5975.3	4473.0	3414.5	3060.3	3068.3	3177.7	3283.1	3350.8	3360.8
22.5°	7752.2	7280.6	5641.0	3896.0	2976.7	2915.0	3032.4	3149.8	3253.3	3319.0	3328.9
25°	7847.7	7234.9	5167.5	3293.1	2761.8	2863.3	2986.7	3086.2	3173.7	3241.4	3257.3
27.5°	7873.6	7087.6	4580.5	2805.6	2662.3	2813.6	2927.0	3000.6	3068.3	3131.9	3143.9
30°	7859.7	6870.7	3935.8	2519.1	2604.6	2755.9	2843.4	2897.1	2978.7	3028.5	3038.4
32.5°	7837.8	6618.0	3263.3	2365.9	2556.9	2702.1	2753.9	2801.6	2799.6	2779.7	2793.7
35°	7845.7	6315.6	2718.0	2274.3	2515.1	2662.3	2706.1	2646.4	2475.3	2467.3	2459.4
37.5°	7887.5	6017.1	2322.1	2210.7	2493.2	2656.4	2680.2	2405.7	2254.4	2184.8	2166.9
40°	7995.0	5668.9	2061.4	2162.9	2491.2	2702.1	2562.8	2284.3	1993.8	1858.5	1848.5
42.5°	8138.2	5326.7	1902.2	2133.1	2515.1	2771.8	2515.1	2113.2	1796.8	1717.2	1705.2
45°	8351.1	4934.7	1814.7	2119.1	2550.9	2797.6	2499.2	1987.8	1717.2	1653.5	1653.5
47.5°	8591.9	4560.6	1766.9	2109.2	2596.7	2779.7	2357.9	1948.0	1679.4	1687.3	1725.1
50°	8830.7	4236.3	1731.1	2087.3	2636.5	2769.8	2300.2	1946.0	1689.3	1790.8	1858.5
52.5°	9107.3	4007.4	1687.3	2051.5	2636.5	2706.1	2282.3	1985.8	1717.2	1747.0	1776.9
55°	9441.5	3935.8	1631.6	1973.9	2588.7	2546.9	2272.3	2043.5	1737.1	1667.4	1679.4
57.5°	9883.3	4051.2	1577.9	1876.4	2479.3	2381.8	2268.4	2059.4	1691.3	1633.6	1621.7
60°	10396.6	4280.0	1562.0	1776.9	2330.0	2240.5	2244.5	2013.7	1627.6	1568.0	1577.9
62.5°	10756.8	4417.3	1552.0	1701.3	2166.9	2085.3	2186.8	1958.0	1599.8	1548.1	1558.0
65°	10756.8	4250.2	1460.5	1585.9	1956.0	1898.3	2117.1	1888.3	1564.0	1504.3	1494.3
67.5°	10348.9	3762.7	1321.2	1412.7	1723.2	1685.3	2019.6	1804.7	1510.2	1464.5	1440.6
70°	9286.3	2853.4	1146.1	1209.8	1428.7	1462.5	1894.3	1691.3	1420.7	1365.0	1329.2
71°	8818.7	2485.2	1072.5	1106.3	1315.2	1365.0	1834.6	1643.6	1380.9	1301.3	1237.6
72.5°	7917.4	2093.3	961.1	975.0	1124.2	1213.8	1709.2	1552.0	1305.3	1191.9	1120.3
75°	6015.1	1528.2	774.0	766.1	831.7	963.1	1446.6	1382.9	1144.1	990.9	949.1
77.5°	2598.7	831.7	579.0	585.0	565.1	730.3	1138.2	1187.9	981.0	805.9	768.1
80°	788.0	479.5	396.0	403.9	378.1	489.5	801.9	931.2	788.0	626.8	575.0
82.5°	403.9	286.5	270.6	266.6	240.8	276.6	485.5	636.7	563.1	392.0	346.2
85°	175.1	153.2	133.3	129.3	113.4	99.5	173.1	318.4	298.5	218.9	208.9
87.5°	43.8	39.8	25.9	23.9	13.9	2.0	0.0	0.0	0.0	0.0	0.0
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)