

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: P459026

Luminaire Tested: **GALN-SA5B-735-U-T2R**

Issue Date: 1/4/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P459026  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2011-042-6)  
Test Lab: INNOVATION CENTER  
Issue Date: 1/4/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: MCGRAW-EDISON  
Catalog Number: GALN-SA5B-735-U-T2R  
Description: GALLEON AREA AND ROADWAY LUMINAIRE  
(5) 70 CRI, 3500K, 800mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE II  
ROADWAY OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 27053 lumens  
Efficiency: N/A  
Efficacy: 132.6 lumens/watt  
Luminous Opening: Rectangular (W 1.5' x L: 1' x H: 0')  
IES Classification: Type II - Short  
BUG Rating: B3 - U0 - G3

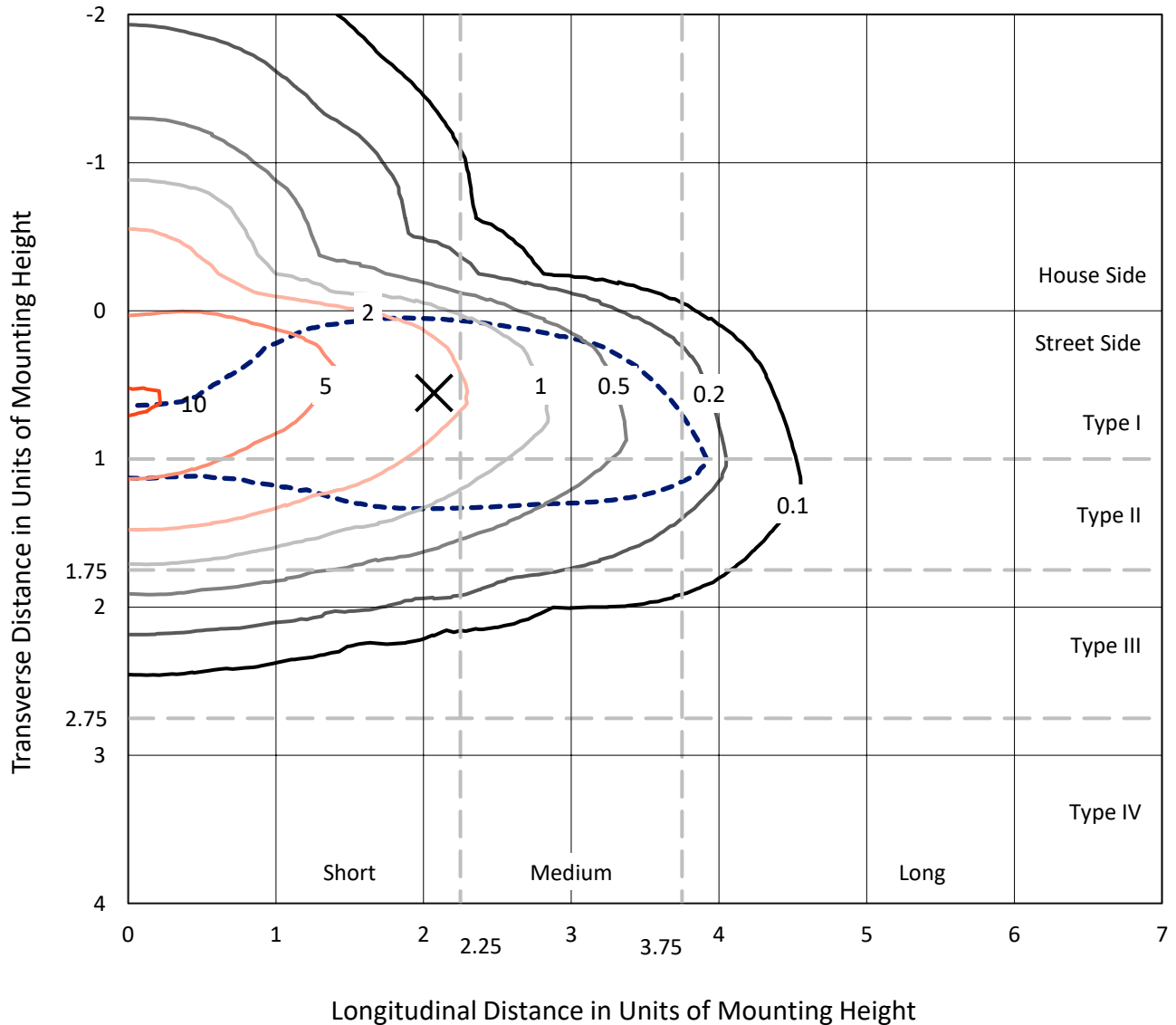
Input Watts (W): 204  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



REPORT NUMBER: P459026  
 CATALOG NUMBER: GALN-SA5B-735-U-T2R

### Iso-Footcandle Lines of Horizontal Illumination

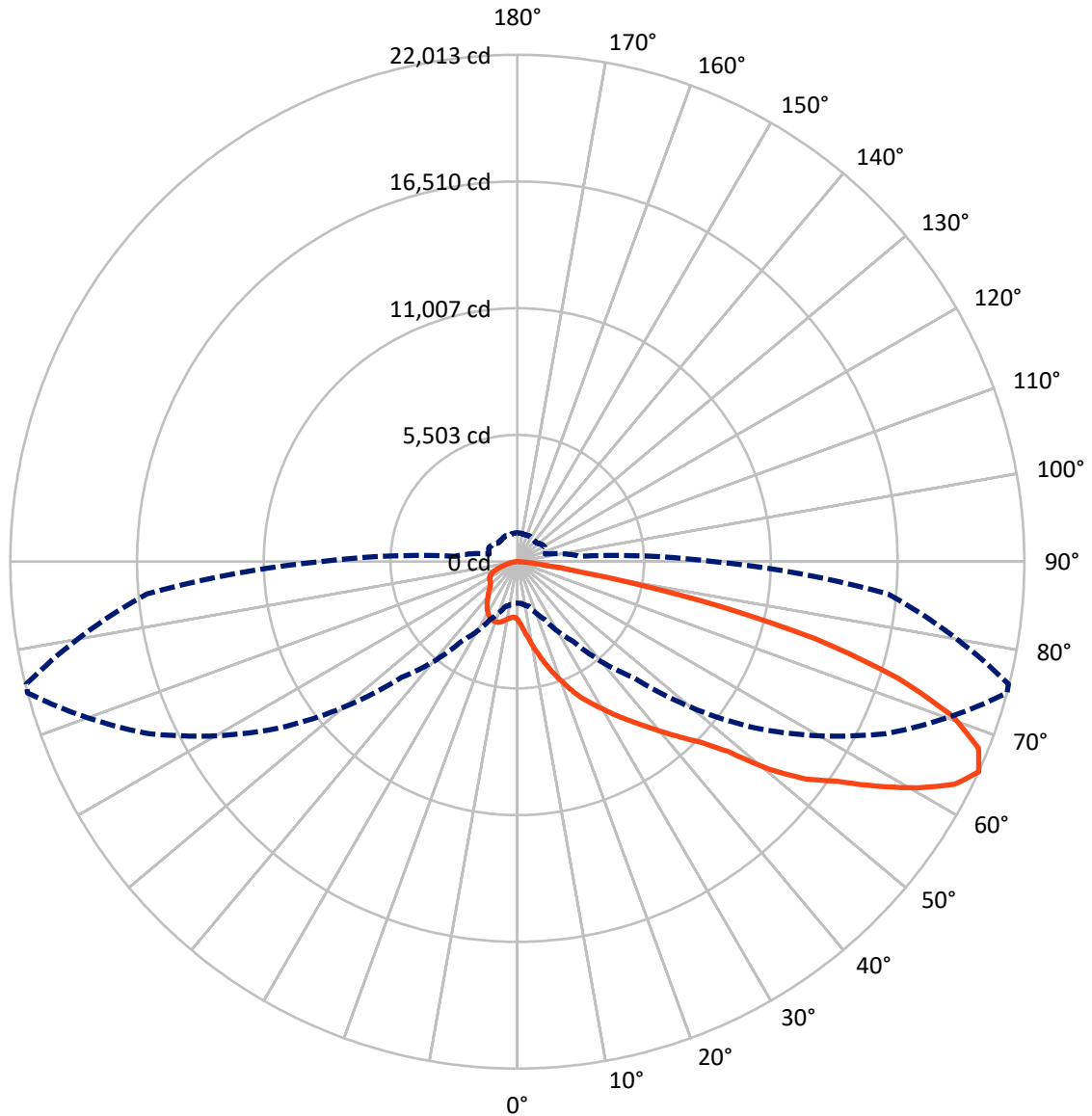
× Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 10.4 fc  
 Type II - Short - N/A

REPORT NUMBER: P459026  
CATALOG NUMBER: GALN-SA5B-735-U-T2R

### Luminous Intensity Polar Plot



— Vertical Plane Through 75-Deg Lateral    - - - Horizontal Cone Through 65-Deg Vertical

REPORT NUMBER: P459026

CATALOG NUMBER: GALN-SA5B-735-U-T2R

**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	4548.0	0.0	4548.0
	% Fixture	16.8	0.0	16.8
<b>Street Side</b>	Lumens	22505.0	0.0	22505.0
	% Fixture	83.2	0.0	83.2
<b>Total</b>	Lumens	27053.0	0.0	27053.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	305.4	1.1
10°-20°	1196.2	4.4
20°-30°	2310.6	8.5
30°-40°	3753.1	13.9
40°-50°	5162.7	19.1
50°-60°	6095.4	22.5
60°-70°	5340.6	19.7
70°-80°	2549.7	9.4
80°-90°	339.3	1.3
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°	27053.0	100.0
0°-180°	27053.0	100.0

**Coefficient of Utilization**



REPORT NUMBER: P459026

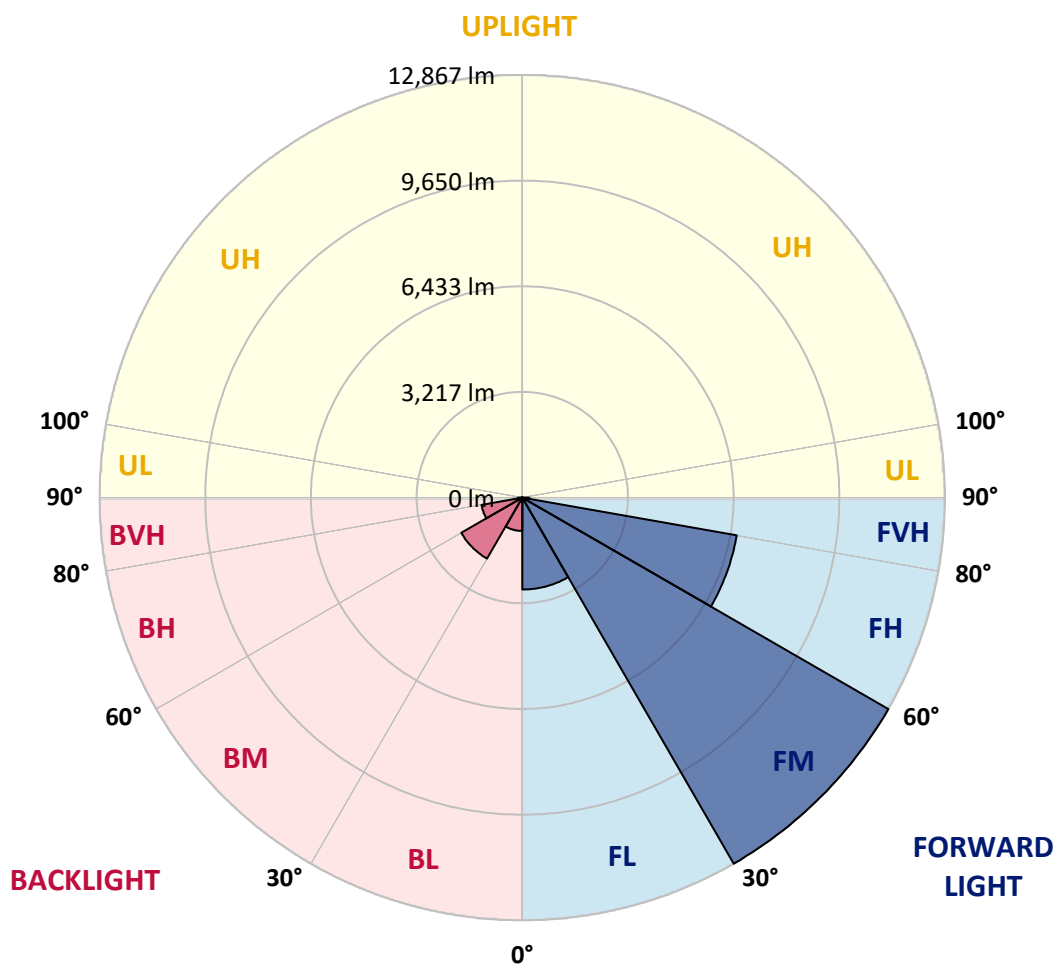
CATALOG NUMBER: GALN-SA5B-735-U-T2R

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

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	2796.8	10.3			
FM	(30°-60°)	12867.0	47.6			
FH	(60°-80°)	6629.2	24.5			G3/7500
FVH	(80°-90°)	212.0	0.8			G2/225
BL	(0°-30°)	1015.3	3.8	B3/2500		
BM	(30°-60°)	2144.3	7.9	B2/2500		
BH	(60°-80°)	1261.1	4.7	B3/2500		G3/2500
BVH	(80°-90°)	127.2	0.5			G2/225
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





REPORT NUMBER: P459026

CATALOG NUMBER: GALN-SA5B-735-U-T2R

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	76°	85°
0°	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6
2.5°	3339.7	3317.7	3294.2	3229.6	3160.7	3082.9	2971.4	2864.3	2721.9	2717.5	2611.9
5°	4265.6	4250.9	4146.7	4086.6	3926.6	3713.9	3533.4	3253.1	2993.4	2962.6	2757.1
7.5°	5116.6	5059.4	5019.8	4911.2	4752.7	4479.8	4130.6	3752.0	3317.7	3276.6	2936.2
10°	5757.9	5752.0	5731.5	5637.5	5518.7	5247.2	4859.9	4316.9	3728.5	3647.8	3153.3
12.5°	6237.7	6242.1	6239.2	6237.7	6152.6	5922.2	5502.6	4930.3	4143.8	4086.6	3404.2
15°	6553.2	6597.2	6614.8	6688.2	6695.5	6541.4	6180.5	5523.1	4611.9	4526.8	3674.2
17.5°	6761.5	6783.5	6865.7	6990.4	7091.7	7063.8	6742.5	6071.9	5090.2	4947.9	3954.5
20°	6961.1	6999.2	7062.3	7232.6	7411.6	7493.7	7267.8	6633.9	5564.2	5473.2	4264.1
22.5°	7376.4	7430.6	7452.7	7539.2	7691.8	7837.1	7734.4	7172.4	6083.6	5960.4	4592.8
25°	8079.2	8136.4	8074.8	8054.3	8104.2	8176.1	8154.0	7680.1	6573.7	6397.6	4903.9
27.5°	8994.8	9002.2	8881.9	8767.4	8644.1	8607.5	8540.0	8130.6	6999.2	6852.5	5216.4
30°	9978.0	9942.7	9743.2	9536.3	9327.9	9122.5	8928.8	8564.9	7473.2	7304.5	5523.1
32.5°	10890.6	10871.6	10650.0	10328.7	9976.5	9782.8	9391.0	9003.6	7980.9	7818.0	5838.6
35°	11574.4	11602.3	11358.7	11008.0	10623.6	10451.9	9957.4	9464.4	8506.2	8328.7	6181.9
37.5°	12060.1	12045.5	11829.8	11526.0	11188.5	11038.9	10619.2	9967.7	9071.1	8900.9	6557.6
40°	12233.3	12224.5	12064.5	11843.0	11628.7	11575.9	11311.8	10510.6	9718.2	9518.7	7009.5
42.5°	12123.2	12142.3	12036.6	11976.5	11936.9	11975.0	12000.0	11222.3	10424.0	10240.6	7499.6
45°	11785.7	11775.5	11760.8	11859.1	12082.1	12333.1	12680.8	11894.3	11191.5	11044.7	8157.0
47.5°	11182.7	11256.0	11292.7	11564.2	12051.3	12645.6	13464.4	12795.3	12305.2	12177.5	9159.2
50°	10338.9	10397.6	10614.8	11097.5	11823.9	12763.0	14230.3	14268.5	14162.8	13923.7	10248.0
52.5°	9021.2	9112.2	9559.8	10444.6	11357.3	12714.6	14694.0	15531.9	15671.3	15492.2	11320.6
55°	7546.6	7674.2	8146.7	9307.4	10714.6	12450.4	15013.9	16264.1	16820.2	16654.4	12353.6
57.5°	6102.7	6237.7	6723.4	7847.4	9593.5	11866.4	15223.7	17079.9	18384.4	18168.7	13639.0
60°	4573.7	4714.6	5131.3	6289.0	7997.0	10724.8	15081.4	17787.2	19947.1	19854.7	14925.9
62.5°	2950.8	3106.4	3468.8	4427.0	6146.7	9165.0	14319.8	18177.5	21300.0	21188.5	15865.0
65°	1797.5	1815.1	2014.7	2748.3	4206.9	7096.1	12578.1	17659.5	22013.1	21979.4	16151.1
67.5°	1162.1	1190.0	1281.0	1646.4	2522.4	4928.8	10057.2	15950.1	21596.4	21584.7	15559.7
70°	981.7	990.5	1031.5	1110.8	1465.9	2989.0	7062.3	13225.2	20013.1	20013.1	14137.9
72.5°	877.5	889.2	903.9	928.8	1046.2	1693.3	4214.2	10294.9	17279.5	17393.9	12033.7
75°	796.8	793.8	802.6	807.0	892.1	1106.4	2179.0	7614.1	13367.5	13138.6	8714.6
77.5°	682.3	686.7	682.3	701.4	788.0	842.3	1106.4	5109.3	8101.2	7804.8	4374.2
80°	560.5	567.9	575.2	586.9	673.5	639.8	664.7	2328.7	2996.3	2933.2	1351.4
82.5°	421.1	431.4	443.1	471.0	529.7	422.6	419.7	994.9	1081.4	990.5	497.4
85°	170.2	201.0	303.7	331.6	333.1	231.8	258.3	415.3	441.7	431.4	195.2
87.5°	39.6	47.0	98.3	148.2	136.5	86.6	95.4	135.0	154.1	142.3	66.0
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: P459026

CATALOG NUMBER: GALN-SA5B-735-U-T2R

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6	2513.6
2.5°	2563.5	2512.1	2424.1	2356.6	2308.1	2265.6	2239.2	2223.0	2217.2	2215.7	2217.2
5°	2650.0	2559.1	2419.7	2331.6	2283.2	2255.3	2239.2	2237.7	2239.2	2240.6	2236.2
7.5°	2768.9	2638.3	2456.3	2374.2	2337.5	2316.9	2309.6	2306.7	2308.1	2306.7	2306.7
10°	2927.4	2748.3	2528.2	2443.1	2412.3	2388.8	2377.1	2369.8	2363.9	2358.0	2355.1
12.5°	3102.0	2870.1	2606.0	2523.8	2479.8	2443.1	2416.7	2397.6	2384.4	2371.2	2368.3
15°	3297.1	2999.3	2692.6	2578.1	2515.0	2460.7	2415.3	2384.4	2361.0	2341.9	2340.4
17.5°	3483.5	3121.0	2751.3	2603.1	2510.6	2434.3	2374.2	2331.6	2302.3	2277.3	2274.4
20°	3683.0	3237.0	2777.7	2586.9	2466.6	2374.2	2294.9	2243.6	2209.8	2181.9	2177.5
22.5°	3884.1	3335.3	2774.8	2535.6	2390.3	2281.7	2198.1	2143.8	2104.2	2076.3	2066.0
25°	4076.3	3414.5	2738.1	2453.4	2284.7	2171.7	2086.6	2036.7	2001.5	1967.7	1967.7
27.5°	4249.4	3461.5	2669.1	2353.6	2176.1	2057.2	1989.7	1944.2	1912.0	1889.9	1876.7
30°	4419.6	3483.5	2575.2	2227.4	2061.6	1960.4	1906.1	1879.7	1850.3	1825.4	1822.4
32.5°	4572.3	3479.1	2457.8	2104.2	1953.0	1881.1	1859.1	1838.6	1807.8	1772.6	1763.8
35°	4720.5	3449.7	2318.4	1969.2	1862.1	1834.2	1840.1	1810.7	1754.9	1710.9	1703.6
37.5°	4881.9	3396.9	2165.8	1859.1	1785.8	1812.2	1826.8	1762.3	1671.3	1602.3	1586.2
40°	5068.2	3336.7	2007.3	1749.1	1725.6	1791.6	1791.6	1672.8	1548.1	1505.5	1493.8
42.5°	5286.9	3286.9	1875.3	1656.6	1675.7	1741.7	1734.4	1553.9	1502.6	1480.6	1474.7
45°	5633.1	3269.2	1738.8	1575.9	1634.6	1683.0	1622.9	1512.8	1483.5	1465.9	1460.0
47.5°	6180.5	3289.8	1618.5	1515.8	1587.7	1624.4	1498.2	1485.0	1464.4	1439.5	1436.5
50°	6688.2	3270.7	1533.4	1482.0	1546.6	1553.9	1446.8	1451.2	1439.5	1411.6	1405.7
52.5°	7103.4	3210.6	1479.1	1464.4	1511.4	1430.7	1398.4	1414.5	1410.1	1374.9	1369.0
55°	7559.8	3173.9	1452.7	1464.4	1487.9	1323.5	1352.9	1376.4	1370.5	1345.6	1344.1
57.5°	8113.0	3181.2	1433.6	1468.8	1464.4	1269.3	1307.4	1335.3	1333.8	1326.5	1326.5
60°	8679.4	3184.1	1404.3	1467.3	1436.5	1226.7	1260.5	1300.1	1303.0	1307.4	1307.4
62.5°	8867.2	3056.5	1347.0	1440.9	1374.9	1185.6	1216.4	1270.7	1267.8	1279.5	1281.0
65°	8516.5	2702.9	1261.9	1380.8	1295.7	1156.3	1182.7	1232.6	1216.4	1247.2	1253.1
67.5°	7752.0	2236.2	1129.9	1272.2	1207.6	1125.5	1160.7	1179.7	1150.4	1210.6	1212.0
70°	6699.9	1746.1	962.6	1118.1	1107.8	1093.2	1143.1	1113.7	1072.6	1146.0	1131.3
72.5°	5602.3	1333.8	768.9	914.2	974.3	1044.8	1112.2	1028.6	971.4	993.4	967.0
75°	4208.4	986.1	617.8	716.1	811.4	975.8	1084.4	925.9	837.9	817.3	811.4
77.5°	2145.3	644.2	462.2	535.6	608.9	881.9	1046.2	805.6	694.1	661.8	647.1
80°	766.0	400.6	325.8	369.8	410.9	758.6	914.2	666.2	538.5	532.6	538.5
82.5°	355.1	258.3	218.6	242.1	243.6	506.2	697.0	497.4	409.4	622.2	525.3
85°	152.6	129.1	123.3	120.3	111.5	226.0	391.8	267.1	416.7	186.4	171.7
87.5°	45.5	51.4	45.5	33.7	24.9	24.9	39.6	14.7	10.3	7.3	7.3
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)