

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: P459271

Luminaire Tested: **GALN-SA7C-735-U-AFL**

Issue Date: 1/4/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P459271  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2011-042-24)  
Test Lab: INNOVATION CENTER  
Issue Date: 1/4/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: MCGRAW-EDISON  
Catalog Number: GALN-SA7C-735-U-AFL  
Description: GALLEON AREA AND ROADWAY LUMINAIRE  
(7) 70 CRI, 3500K, 1050mA LIGHTSQUARES WITH 16 LEDS EACH AND AUTOMOTIVE FRONTLINE OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 46063 lumens  
Efficiency: N/A  
Efficacy: 122.2 lumens/watt  
Luminous Opening: Rectangular (W 1.5' x L: 1.5' x H: 0')  
IES Classification: Type II - Short  
BUG Rating: B3 - U0 - G3

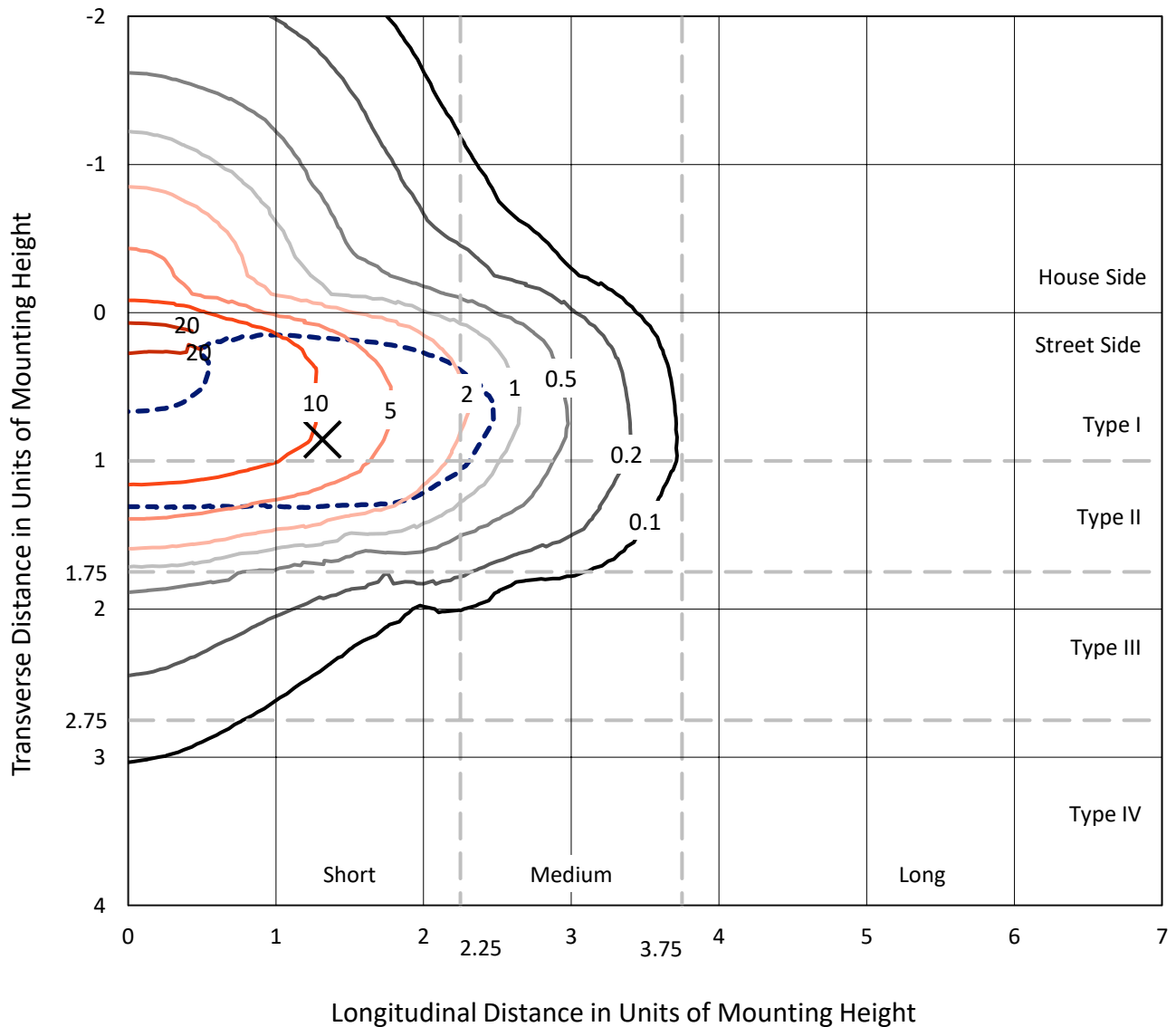
Input Watts (W): 377  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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### Iso-Footcandle Lines of Horizontal Illumination

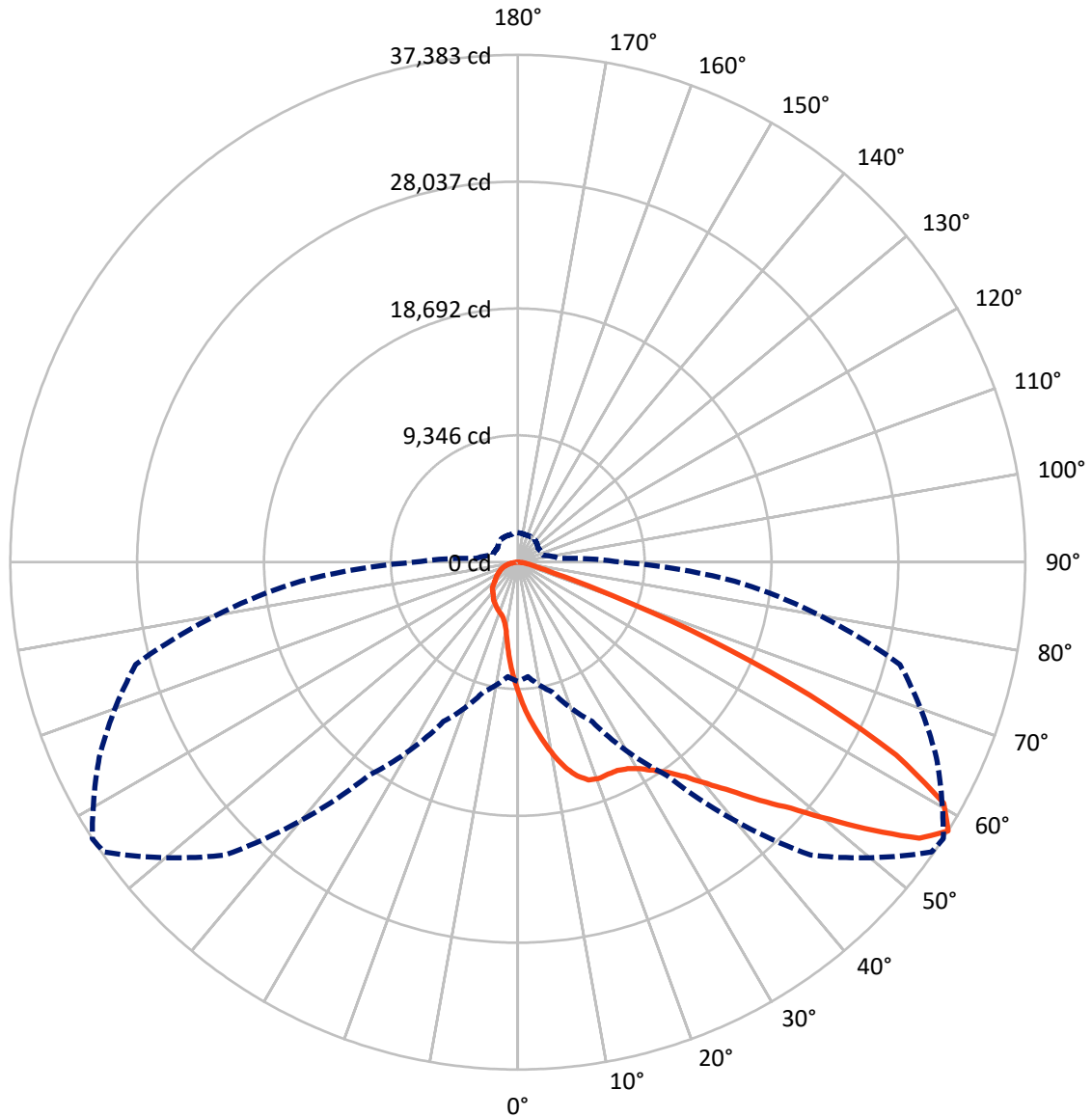
✕ Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 23.6 fc  
 Type II - Short - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 57-Deg Lateral      - - - Horizontal Cone Through 57.5-Deg Vertical

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**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	7004.9	0.0	7004.9
	% Fixture	15.2	0.0	15.2
<b>Street Side</b>	Lumens	39058.1	0.0	39058.1
	% Fixture	84.8	0.0	84.8
<b>Total</b>	Lumens	46063.0	0.0	46063.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	930.1	2.0
10°-20°	2741.0	6.0
20°-30°	4551.5	9.9
30°-40°	6855.9	14.9
40°-50°	10293.4	22.3
50°-60°	11537.7	25.0
60°-70°	6752.4	14.7
70°-80°	1997.3	4.3
80°-90°	403.7	0.9
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°	46063.0	100.0
0°-180°	46063.0	100.0

**Coefficient of Utilization**



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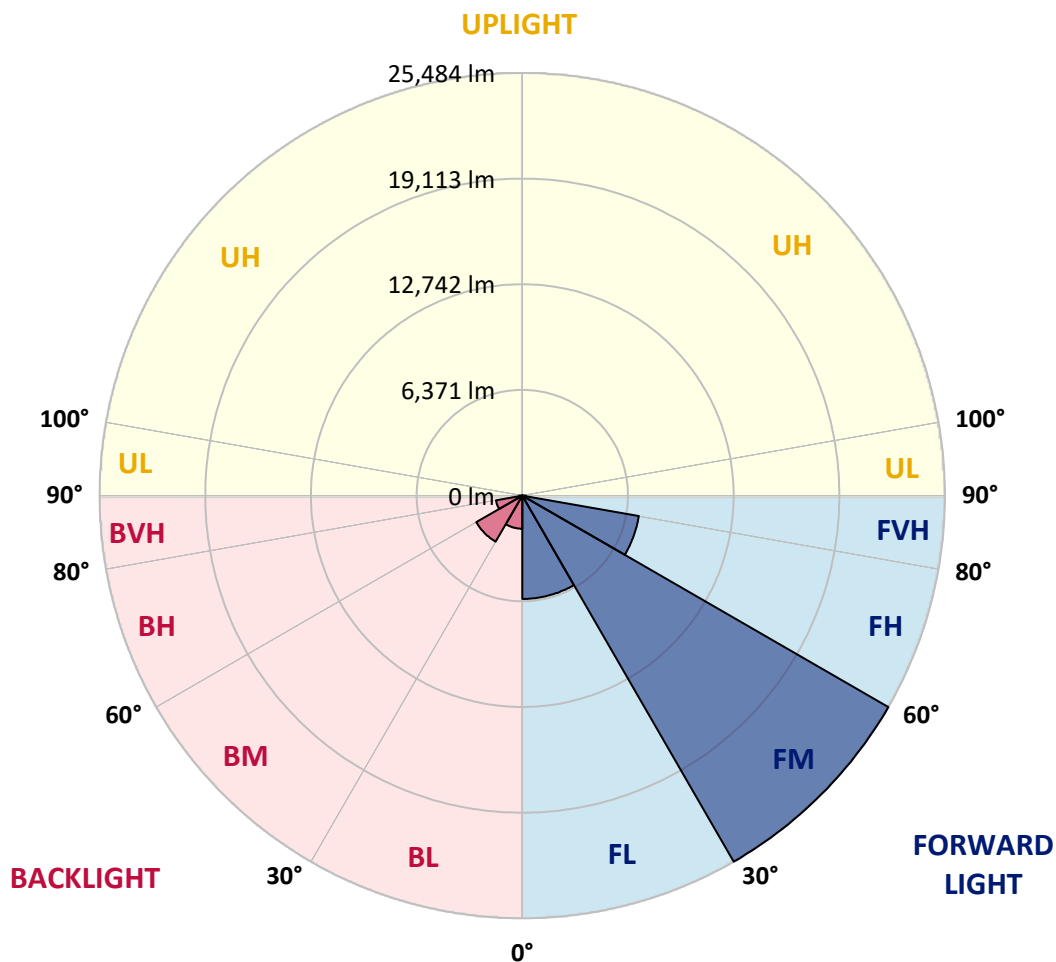
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	6226.7	13.5			
FM	(30°-60°)	25484.1	55.3			
FH	(60°-80°)	7137.9	15.5			G3/7500
FVH	(80°-90°)	209.5	0.5			G2/225
BL	(0°-30°)	1995.9	4.3	B3/2500		
BM	(30°-60°)	3202.9	7.0	B3/5000		
BH	(60°-80°)	1611.8	3.5	B3/2500		G3/2500
BVH	(80°-90°)	194.2	0.4			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





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	57°	65°	75°	85°
0°	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3
2.5°	12024.8	11893.7	11790.3	11699.5	11581.0	11260.8	10940.6	10935.5	10680.8	10287.5	9884.1
5°	13983.9	13807.4	13830.1	13547.7	13265.3	12801.4	12123.1	12087.8	11545.7	10809.4	10060.6
7.5°	15259.8	15262.3	15191.7	15030.3	14725.2	14198.3	13429.2	13255.2	12501.3	11384.3	10262.3
10°	15194.2	15262.3	15380.8	15519.5	15612.8	15353.1	14652.1	14440.3	13459.5	12080.2	10486.7
12.5°	14321.8	14427.7	14596.6	14944.6	15506.9	15935.5	15696.0	15524.5	14568.9	12773.6	10733.8
15°	13777.2	13840.2	13933.5	14168.0	14773.2	15799.4	16419.7	16328.9	15615.3	13557.8	11011.2
17.5°	13610.8	13673.8	13704.1	13847.8	14278.9	15330.4	16704.6	16866.0	16543.2	14278.9	11291.0
20°	13777.2	13807.4	13807.4	13893.2	14231.0	15055.6	16692.0	17017.2	17304.7	15143.8	11553.3
22.5°	14213.4	14226.0	14208.3	14238.6	14490.7	15131.2	16573.5	16976.9	17919.9	15877.5	11757.5
25°	14921.9	14942.1	14826.1	14755.5	14939.6	15464.0	16639.0	17009.7	18401.5	16578.5	11893.7
27.5°	15726.3	15751.5	15610.3	15446.4	15532.1	15875.0	16896.2	17229.0	18762.1	17269.4	11979.4
30°	16712.1	16722.2	16485.2	16288.5	16233.1	16487.7	17334.9	17645.1	19210.9	18083.8	12108.0
32.5°	17720.7	17796.4	17491.3	17213.9	17120.6	17198.8	17983.0	18283.0	19745.4	18958.8	12314.7
35°	19092.4	19105.0	18739.4	18401.5	18093.9	18194.8	18812.5	19029.4	20484.2	19969.9	12607.2
37.5°	20804.4	20920.4	20416.1	19785.8	19407.6	19261.3	19816.0	20053.1	21520.5	21210.4	13048.5
40°	22705.6	22748.5	22317.3	21924.0	21233.1	20809.5	21192.8	21449.9	22798.9	22690.5	13560.3
42.5°	23900.8	23994.1	24026.9	23986.5	23467.1	22756.0	22902.3	23023.3	24311.8	24079.8	14084.8
45°	24304.2	24442.9	24911.9	25905.3	25960.8	25259.8	24919.4	25035.4	25960.8	25481.7	14586.6
47.5°	23636.0	23873.0	24737.9	26775.2	28300.7	28353.7	27327.4	27072.8	27463.6	26644.1	14949.7
50°	21908.8	21959.3	23283.0	26233.1	29397.5	31311.3	30249.8	29775.8	28890.7	27503.9	15199.3
52.5°	19236.1	19294.1	20403.5	23714.2	28721.8	33378.9	33668.9	32821.7	30340.6	28172.1	15363.2
55°	14278.9	14614.3	15834.7	19034.4	25519.6	33184.7	36387.0	35905.4	32093.0	28701.6	15620.4
57.5°	8779.7	8472.1	9919.4	12950.1	19193.2	30517.1	37226.6	37383.0	34021.9	29145.4	16051.5
60°	4039.4	4099.9	4697.5	6679.3	11699.5	23873.0	35063.2	36051.6	35088.4	29130.3	16159.9
62.5°	2783.7	2728.2	2576.9	2932.4	5335.4	15098.4	29616.9	31291.1	32950.3	28225.1	15728.8
65°	2488.7	2433.2	2140.7	2042.4	2450.8	6581.0	21530.6	23643.6	27743.5	25940.6	14654.6
67.5°	2324.8	2249.1	1946.6	1754.9	1749.9	2619.8	12695.5	15239.6	20577.5	21931.5	12698.0
70°	2153.3	2092.8	1792.7	1580.9	1490.2	1646.5	5580.0	7304.6	13361.1	15804.4	9891.6
72.5°	1981.9	1911.3	1641.5	1414.5	1296.0	1233.0	2138.2	2781.2	7549.2	9475.6	6064.1
75°	1732.2	1696.9	1467.5	1280.9	1152.3	996.0	1356.5	1548.2	3610.7	4352.0	3043.4
77.5°	1515.4	1477.6	1303.6	1119.5	1026.2	809.4	963.2	1051.4	1523.0	1765.0	1374.2
80°	1109.4	1147.3	1099.4	988.4	915.3	635.4	648.0	721.1	905.2	1001.0	839.6
82.5°	703.5	774.1	847.2	761.5	693.4	501.8	448.8	476.6	617.8	655.6	373.2
85°	295.0	300.1	491.7	463.9	395.9	297.5	269.8	284.9	330.3	345.4	174.0
87.5°	113.5	110.9	174.0	161.4	123.6	85.7	85.7	95.8	131.1	121.0	55.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3	9677.3
2.5°	9710.1	9531.1	9175.5	8734.3	8411.5	8048.5	7728.2	7498.8	7413.1	7372.7	7297.1
5°	9702.5	9349.5	8613.3	7841.7	7221.4	6586.0	6048.9	5701.0	5670.7	5438.8	5416.1
7.5°	9705.0	9165.5	7993.0	6858.3	5912.8	5262.3	4818.5	4702.5	4563.8	4528.5	4546.2
10°	9712.6	8931.0	7327.3	5885.1	4969.8	4543.6	4377.2	4331.8	4336.9	4352.0	4354.5
12.5°	9722.7	8704.0	6636.4	5146.3	4440.3	4263.8	4246.1	4286.5	4329.3	4362.1	4369.7
15°	9735.3	8444.3	5963.2	4551.2	4175.5	4160.4	4218.4	4286.5	4347.0	4394.9	4402.4
17.5°	9720.2	8141.7	5398.4	4185.6	4029.3	4102.4	4198.2	4283.9	4339.4	4384.8	4389.8
20°	9684.9	7803.9	4853.8	3928.4	3938.5	4057.0	4160.4	4241.1	4301.6	4324.3	4341.9
22.5°	9548.7	7400.4	4379.8	3729.2	3830.1	3994.0	4117.5	4165.4	4097.3	4049.4	4062.0
25°	9316.7	6876.0	3938.5	3567.8	3731.7	3905.7	4031.8	3915.8	3860.3	3840.2	3850.2
27.5°	9026.8	6301.1	3605.7	3398.9	3605.7	3807.4	3772.1	3751.9	3726.7	3693.9	3701.5
30°	8714.1	5738.8	3323.3	3267.8	3469.5	3585.5	3600.6	3633.4	3605.7	3555.2	3575.4
32.5°	8424.2	5209.3	3108.9	3156.9	3373.7	3356.0	3469.5	3507.3	3378.7	3209.8	3217.4
35°	8177.0	4717.6	2947.6	3048.4	3209.8	3217.4	3330.8	3199.7	3061.0	2980.3	2985.4
37.5°	7990.5	4334.4	2841.7	2955.1	3000.5	3096.3	3035.8	2967.7	2950.1	2894.6	2897.1
40°	7879.5	3999.0	2773.6	2882.0	2874.4	2940.0	2745.9	2813.9	2839.1	2821.5	2824.0
42.5°	7768.6	3762.0	2703.0	2781.2	2778.6	2650.0	2607.2	2665.2	2730.7	2738.3	2733.2
45°	7680.3	3577.9	2629.9	2627.3	2677.8	2476.1	2463.5	2498.8	2592.0	2637.4	2634.9
47.5°	7582.0	3424.1	2518.9	2448.3	2463.5	2367.6	2347.5	2362.6	2476.1	2549.2	2569.4
50°	7458.4	3270.3	2380.2	2284.4	2221.4	2266.8	2271.8	2274.3	2387.8	2471.0	2488.7
52.5°	7360.1	3154.3	2221.4	2150.8	2075.1	2176.0	2213.8	2218.9	2287.0	2355.0	2367.6
55°	7418.1	3088.8	2065.1	2014.6	1946.6	2082.7	2155.8	2165.9	2181.1	2231.5	2239.0
57.5°	7592.1	3103.9	1939.0	1873.4	1823.0	1971.8	2095.3	2102.9	2092.8	2153.3	2163.4
60°	7645.0	3096.3	1845.7	1717.1	1686.8	1853.3	2007.1	2022.2	2019.7	2107.9	2125.6
62.5°	7423.1	3000.5	1752.4	1586.0	1565.8	1732.2	1883.5	1944.0	1956.6	2082.7	2105.4
65°	6901.2	2803.8	1628.9	1447.3	1447.3	1603.6	1765.0	1848.2	1883.5	2052.5	2077.7
67.5°	6212.8	2571.9	1502.8	1328.8	1323.8	1480.1	1638.9	1724.7	1780.1	2009.6	2024.7
70°	5156.4	2259.2	1346.5	1200.2	1200.2	1341.4	1485.1	1588.5	1669.2	1928.9	1928.9
72.5°	3532.5	1878.5	1157.3	1054.0	1056.5	1187.6	1333.8	1449.8	1545.6	1767.5	1772.6
75°	2234.0	1467.5	950.6	897.6	907.7	1031.3	1182.6	1303.6	1495.2	1747.4	1754.9
77.5°	1187.6	1031.3	756.4	743.8	756.4	869.9	1038.8	1205.3	1500.3	1515.4	1490.2
80°	769.0	731.2	597.6	572.4	577.4	701.0	925.4	1144.7	1205.3	1220.4	1164.9
82.5°	418.6	463.9	423.6	398.4	398.4	547.2	789.2	910.2	864.9	718.6	685.8
85°	179.0	216.8	219.4	191.6	184.1	337.9	529.5	496.7	461.4	441.3	436.2
87.5°	50.4	70.6	70.6	53.0	40.3	93.3	105.9	30.3	0.0	2.5	5.0
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)