

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: STREETWORKS

Report Number: P236878

Luminaire Tested: **ARCH-L-AF72-250-D-U-T2R-7050**

Issue Date: 2/14/2018

Test Information

Test Method: LM-79-08
Report Number: P236878
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29635)
Test Lab: INNOVATION CENTER-P2
Issue Date: 2/14/2018
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-L-AF72-250-D-U-T2R-7050
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE
(3) 70 CRI, 5000K, 1070mA LIGHT ENGINES WITH 24 LEDS AND TYPE II ROADWAY OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 28436 lumens
Efficiency: N/A
Efficacy: 113.3 lumens/watt
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')
IES Classification: Type II - Medium
BUG Rating: B3 - U0 - G4

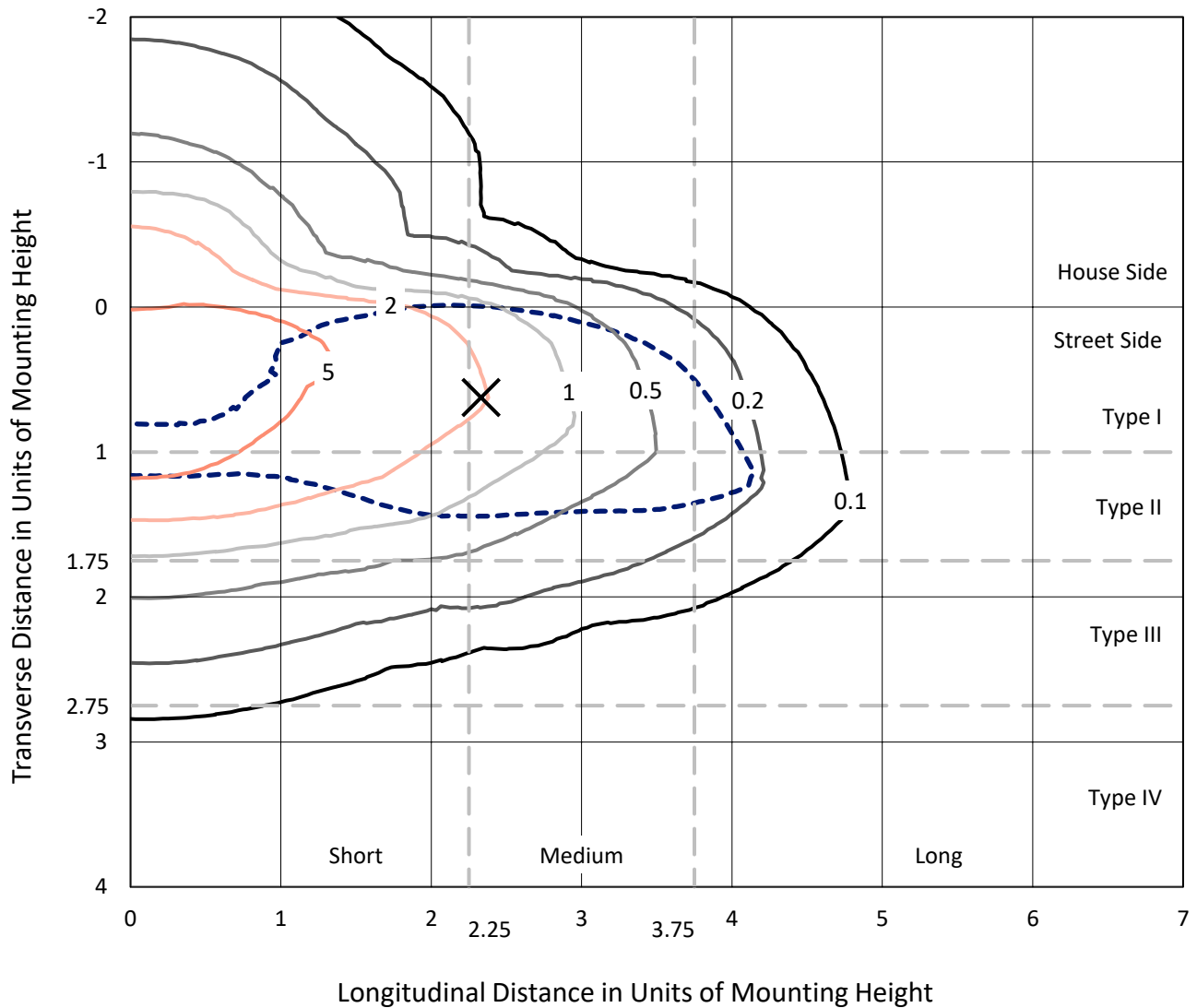
Input Watts (W): 251
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

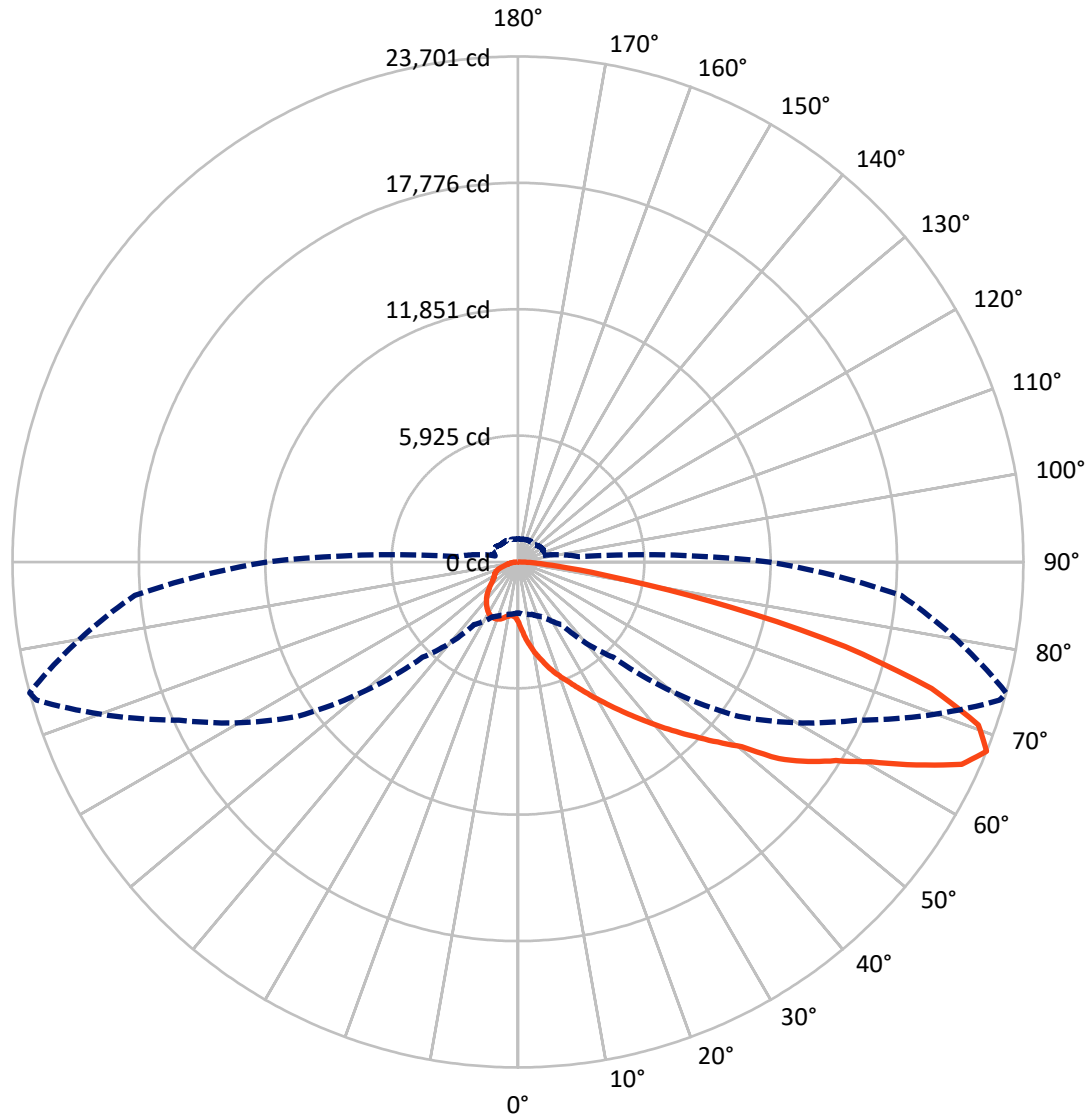
✕ Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 9.4 fc
 Type II - Medium - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 75-Deg Lateral - - - Horizontal Cone Through 67.5-Deg Vertical

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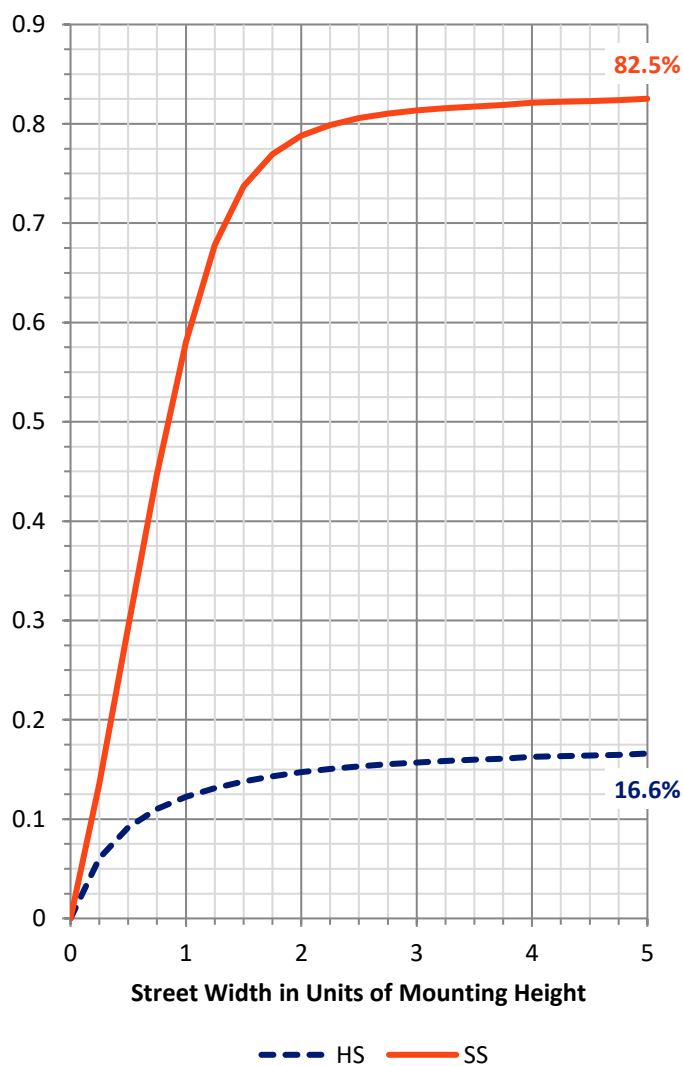
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	4855.8	0.0	4855.8
	% Fixture	17.1	0.0	17.1
Street Side	Lumens	23580.2	0.0	23580.2
	% Fixture	82.9	0.0	82.9
Total	Lumens	28436.0	0.0	28436.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	331.0	1.2
10°-20°	1196.3	4.2
20°-30°	2181.9	7.7
30°-40°	3581.4	12.6
40°-50°	5179.2	18.2
50°-60°	6103.8	21.5
60°-70°	5931.4	20.9
70°-80°	3297.0	11.6
80°-90°	634.0	2.2
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°	28436.0	100.0
0°-180°	28436.0	100.0

Coefficient of Utilization



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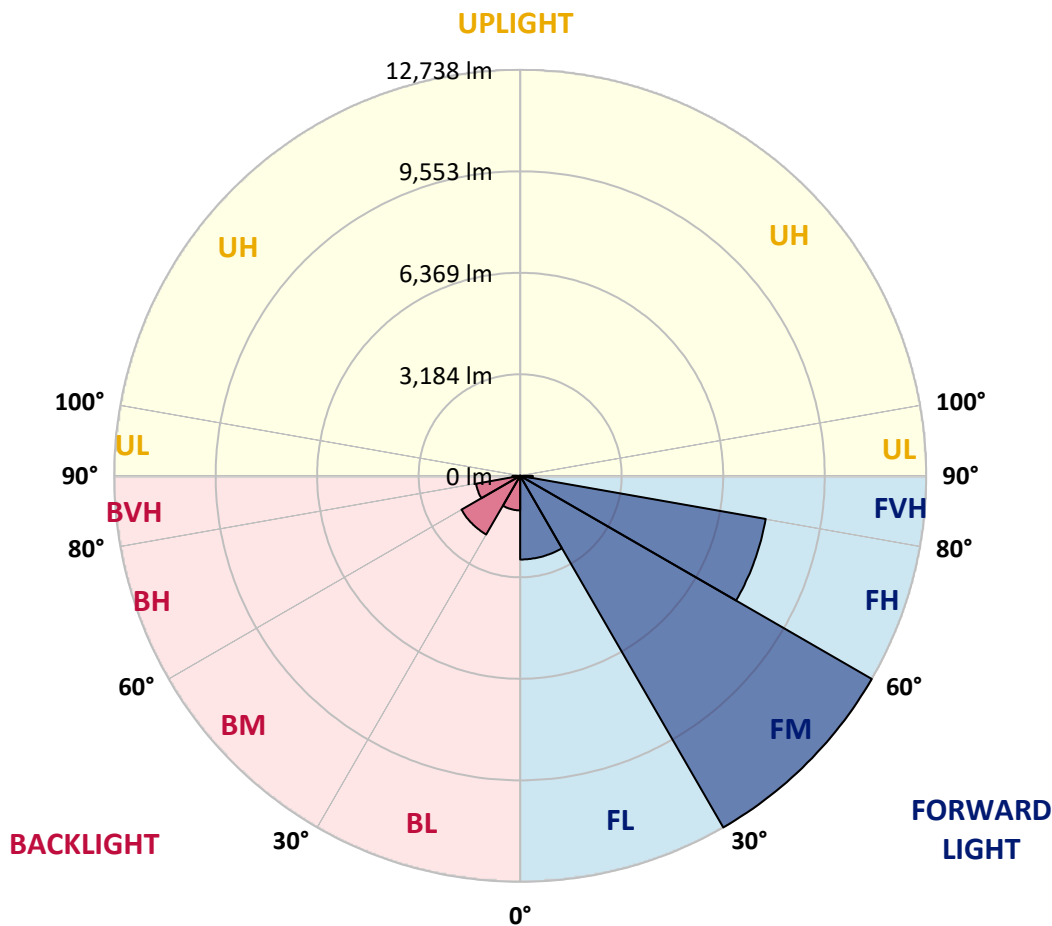
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	2625.4	9.2			
FM (30°-60°)	12737.8	44.8			
FH (60°-80°)	7822.4	27.5			G4/12000
FVH (80°-90°)	394.6	1.4			G3/500
BL (0°-30°)	1083.8	3.8	B3/2500		
BM (30°-60°)	2126.6	7.5	B2/2500		
BH (60°-80°)	1406.0	4.9	B3/2500		G3/2500
BVH (80°-90°)	239.4	0.8			G3/500
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G4

Type II Medium





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	74°	75°	85°
0°	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7
2.5°	3994.8	4006.6	3982.9	3929.4	3852.1	3709.4	3584.6	3364.6	3168.5	3144.7	2936.6
5°	4696.2	4708.1	4678.4	4613.0	4529.8	4375.2	4202.8	3917.5	3602.4	3543.0	3103.1
7.5°	5177.7	5183.7	5148.0	5082.6	5017.2	4862.7	4690.3	4369.3	3982.9	3935.3	3317.1
10°	5587.9	5599.8	5552.2	5510.6	5439.3	5284.7	5106.4	4767.5	4369.3	4303.9	3537.0
12.5°	5968.4	5980.2	5950.5	5914.9	5891.1	5748.4	5552.2	5148.0	4720.0	4648.7	3798.6
15°	6224.0	6235.9	6241.8	6289.4	6319.1	6218.0	6021.9	5582.0	5100.4	5035.1	4107.7
17.5°	6152.6	6182.4	6271.5	6443.9	6628.2	6634.1	6473.6	6010.0	5475.0	5403.6	4422.8
20°	5944.6	5968.4	6075.4	6336.9	6699.5	6907.6	6895.7	6443.9	5825.7	5748.4	4714.0
22.5°	6117.0	6146.7	6146.7	6307.2	6663.9	7050.3	7204.8	6871.9	6176.4	6105.1	5005.3
25°	6854.1	6871.9	6747.1	6681.7	6812.5	7169.2	7460.4	7335.6	6604.4	6521.2	5320.4
27.5°	7882.5	7852.8	7698.2	7436.7	7294.0	7389.1	7686.3	7775.5	7097.8	6996.8	5647.3
30°	8905.0	8887.1	8708.8	8358.1	8037.1	7835.0	7936.0	8167.8	7632.8	7513.9	5962.4
32.5°	9862.1	9832.3	9636.2	9226.0	8863.4	8488.9	8292.7	8524.5	8203.5	8066.8	6313.1
35°	10741.8	10664.6	10468.4	10040.4	9665.9	9309.2	8827.7	8863.4	8821.8	8679.1	6699.5
37.5°	11455.2	11395.8	11181.7	10783.5	10385.2	10046.3	9541.0	9249.8	9487.5	9350.8	7145.4
40°	12085.3	12019.9	11800.0	11401.7	11033.1	10712.1	10313.8	9719.4	10236.6	10082.0	7644.7
42.5°	12560.9	12513.3	12335.0	11942.7	11586.0	11294.7	11098.5	10313.8	11015.3	10866.7	8191.6
45°	12816.5	12768.9	12673.8	12358.8	12031.8	11805.9	11823.8	11021.2	11829.7	11704.9	8839.6
47.5°	12501.4	12537.1	12620.3	12560.9	12358.8	12251.8	12471.7	11752.4	12739.2	12620.3	9541.0
50°	11657.3	11693.0	12025.9	12436.1	12507.4	12638.2	13054.3	12596.6	13702.2	13607.1	10409.0
52.5°	9582.7	9778.8	10700.2	11681.1	12352.8	12893.8	13702.2	13850.9	15325.1	15325.1	11942.7
55°	7240.5	7412.9	8465.1	10177.1	11752.4	12917.6	14177.8	14700.9	16496.2	16520.0	12745.2
57.5°	5867.3	5974.3	6491.5	8245.1	10492.2	12620.3	14742.5	15432.1	17471.1	17578.1	13779.5
60°	4761.6	4821.1	5159.9	6378.5	8750.4	11817.8	15146.8	16478.4	18862.1	19010.8	15099.2
62.5°	3828.3	3887.8	4113.6	4844.8	6866.0	10313.8	15075.4	17566.2	20716.8	20960.6	16829.1
65°	3055.5	3120.9	3269.5	3721.3	5088.6	8447.2	14344.3	18125.0	22636.9	22874.7	17976.4
67.5°	2383.8	2443.2	2544.3	2841.5	3584.6	6319.1	12614.4	17536.5	23498.9	23701.0	18035.8
70°	1801.2	1830.9	1914.2	2104.4	2562.1	4196.9	9873.9	15562.9	22726.1	22910.4	16846.9
72.5°	1397.0	1391.0	1438.6	1533.7	1789.3	2889.1	6545.0	12656.0	20092.7	20282.9	14374.0
75°	1141.4	1135.4	1165.1	1194.9	1295.9	1937.9	3864.0	9529.2	16216.8	15854.2	10783.5
77.5°	963.0	957.1	986.8	992.7	1034.4	1337.5	2199.5	6271.5	10819.1	10194.9	6075.4
80°	814.4	808.5	844.1	856.0	885.7	980.9	1266.2	3394.4	5433.3	5148.0	2901.0
82.5°	612.3	636.1	701.5	731.2	766.9	725.2	784.7	1498.0	2520.5	2407.6	1260.3
85°	297.2	350.7	529.1	588.5	630.1	457.7	535.0	707.4	1135.4	1081.9	511.2
87.5°	101.1	89.2	315.1	374.5	410.2	208.1	297.2	392.3	469.6	428.0	160.5
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°	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7	2817.7
2.5°	2847.5	2758.3	2627.5	2526.4	2461.1	2407.6	2383.8	2377.8	2365.9	2360.0	2360.0
5°	2906.9	2746.4	2544.3	2437.3	2407.6	2383.8	2395.7	2401.6	2401.6	2401.6	2401.6
7.5°	2996.1	2770.2	2526.4	2455.1	2449.2	2449.2	2484.8	2502.7	2514.6	2514.6	2514.6
10°	3115.0	2811.8	2556.2	2496.7	2514.6	2526.4	2568.1	2591.8	2603.7	2609.7	2615.6
12.5°	3275.5	2901.0	2615.6	2568.1	2591.8	2597.8	2627.5	2639.4	2651.3	2657.2	2657.2
15°	3489.5	3031.7	2710.7	2651.3	2657.2	2651.3	2651.3	2639.4	2633.4	2633.4	2645.3
17.5°	3709.4	3156.6	2794.0	2710.7	2686.9	2639.4	2603.7	2574.0	2556.2	2544.3	2550.2
20°	3929.4	3269.5	2841.5	2722.6	2657.2	2579.9	2514.6	2472.9	2449.2	2425.4	2437.3
22.5°	4149.3	3376.5	2859.3	2686.9	2591.8	2478.9	2407.6	2342.2	2288.7	2253.0	2258.9
25°	4393.0	3495.4	2859.3	2645.3	2502.7	2383.8	2294.6	2187.6	2110.3	2080.6	2092.5
27.5°	4636.8	3596.5	2829.6	2568.1	2401.6	2282.7	2151.9	2027.1	1979.5	1961.7	1967.7
30°	4880.5	3673.7	2764.2	2472.9	2294.6	2163.8	1991.4	1908.2	1848.8	1801.2	1807.2
32.5°	5124.2	3727.2	2675.1	2354.1	2181.7	2015.2	1872.5	1777.4	1670.4	1611.0	1616.9
35°	5403.6	3768.9	2568.1	2235.2	2056.8	1884.4	1777.4	1622.9	1509.9	1462.4	1450.5
37.5°	5694.9	3798.6	2455.1	2104.4	1932.0	1789.3	1682.3	1492.1	1385.1	1319.7	1313.8
40°	6010.0	3810.5	2318.4	1967.7	1813.1	1729.9	1557.5	1414.8	1230.5	1188.9	1188.9
42.5°	6384.5	3804.5	2181.7	1830.9	1682.3	1593.1	1468.3	1402.9	1242.4	1200.8	1177.0
45°	6812.5	3804.5	2033.0	1670.4	1551.5	1420.8	1367.3	1325.6	1218.6	1236.5	1248.4
47.5°	7299.9	3792.6	1854.7	1539.6	1444.5	1331.6	1301.9	1212.7	1171.1	1183.0	1194.9
50°	7971.7	3810.5	1694.2	1432.6	1367.3	1272.1	1236.5	1188.9	1171.1	1177.0	1171.1
52.5°	8905.0	3751.0	1539.6	1367.3	1307.8	1183.0	1183.0	1177.0	1183.0	1177.0	1177.0
55°	9416.2	3620.2	1426.7	1331.6	1266.2	1141.4	1165.1	1177.0	1188.9	1183.0	1183.0
57.5°	10141.4	3531.1	1337.5	1307.8	1242.4	1129.5	1153.2	1177.0	1183.0	1177.0	1177.0
60°	10997.5	3471.6	1278.1	1313.8	1224.6	1129.5	1159.2	1177.0	1171.1	1165.1	1165.1
62.5°	11990.2	3447.9	1236.5	1331.6	1206.7	1135.4	1159.2	1177.0	1153.2	1147.3	1147.3
65°	12364.7	3233.8	1183.0	1343.5	1218.6	1135.4	1153.2	1159.2	1129.5	1123.5	1117.6
67.5°	11788.1	2865.3	1105.7	1319.7	1254.3	1135.4	1135.4	1129.5	1093.8	1087.9	1076.0
70°	10498.1	2377.8	986.8	1242.4	1278.1	1141.4	1111.6	1081.9	1046.2	1046.2	1022.5
72.5°	8595.9	1872.5	832.2	1105.7	1260.3	1159.2	1064.1	1022.5	980.9	980.9	957.1
75°	6194.2	1397.0	665.8	921.4	1183.0	1153.2	1004.6	951.1	903.6	897.6	867.9
77.5°	3531.1	980.9	541.0	719.3	1052.2	1123.5	951.1	867.9	814.4	796.6	778.7
80°	1813.1	659.8	439.9	564.7	873.9	1040.3	909.5	772.8	713.3	683.6	653.9
82.5°	862.0	439.9	338.8	416.1	659.8	909.5	856.0	665.8	600.4	564.7	529.1
85°	386.4	261.6	225.9	267.5	469.6	707.4	755.0	546.9	469.6	588.5	434.0
87.5°	124.8	118.9	118.9	124.8	225.9	309.1	552.8	404.2	374.5	309.1	261.6
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)