

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: P400473

Luminaire Tested: **ARCH-L-PA3-280-830-U-T2U**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P400473  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-568-12)  
Test Lab: INNOVATION CENTER  
Issue Date: 5/19/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-L-PA3-280-830-U-T2U  
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE  
(3) 80 CRI, 3000K, 1180mA LIGHT ENGINES WITH 24 LEDS AND TYPE II U OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 28376 lumens  
Efficiency: N/A  
Efficacy: 101.7 lumens/watt  
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')  
IES Classification: Type II - Short  
BUG Rating: B4 - U0 - G4

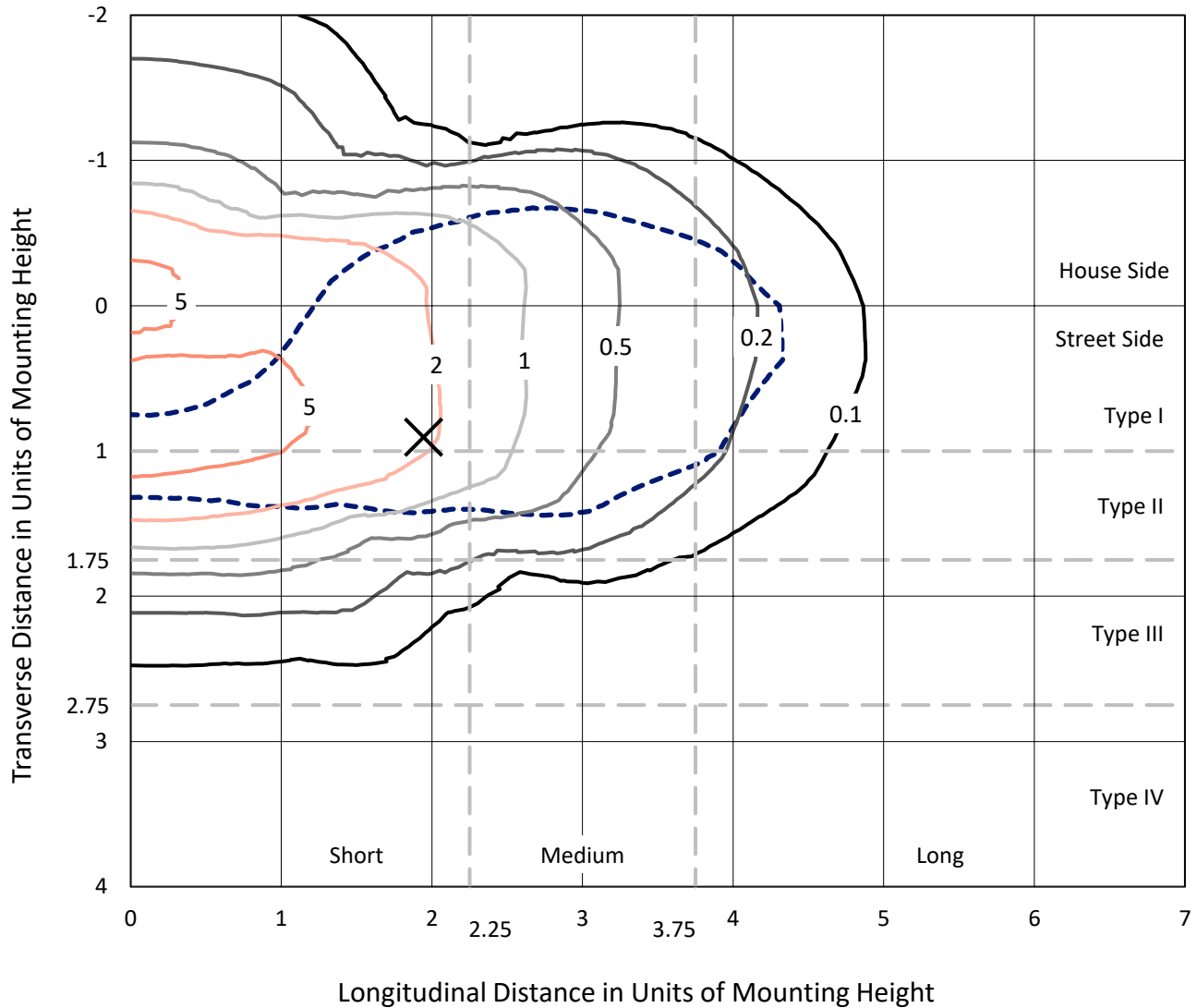
Input Watts (W): 279  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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 CATALOG NUMBER: ARCH-L-PA3-280-830-U-T2U

### Iso-Footcandle Lines of Horizontal Illumination

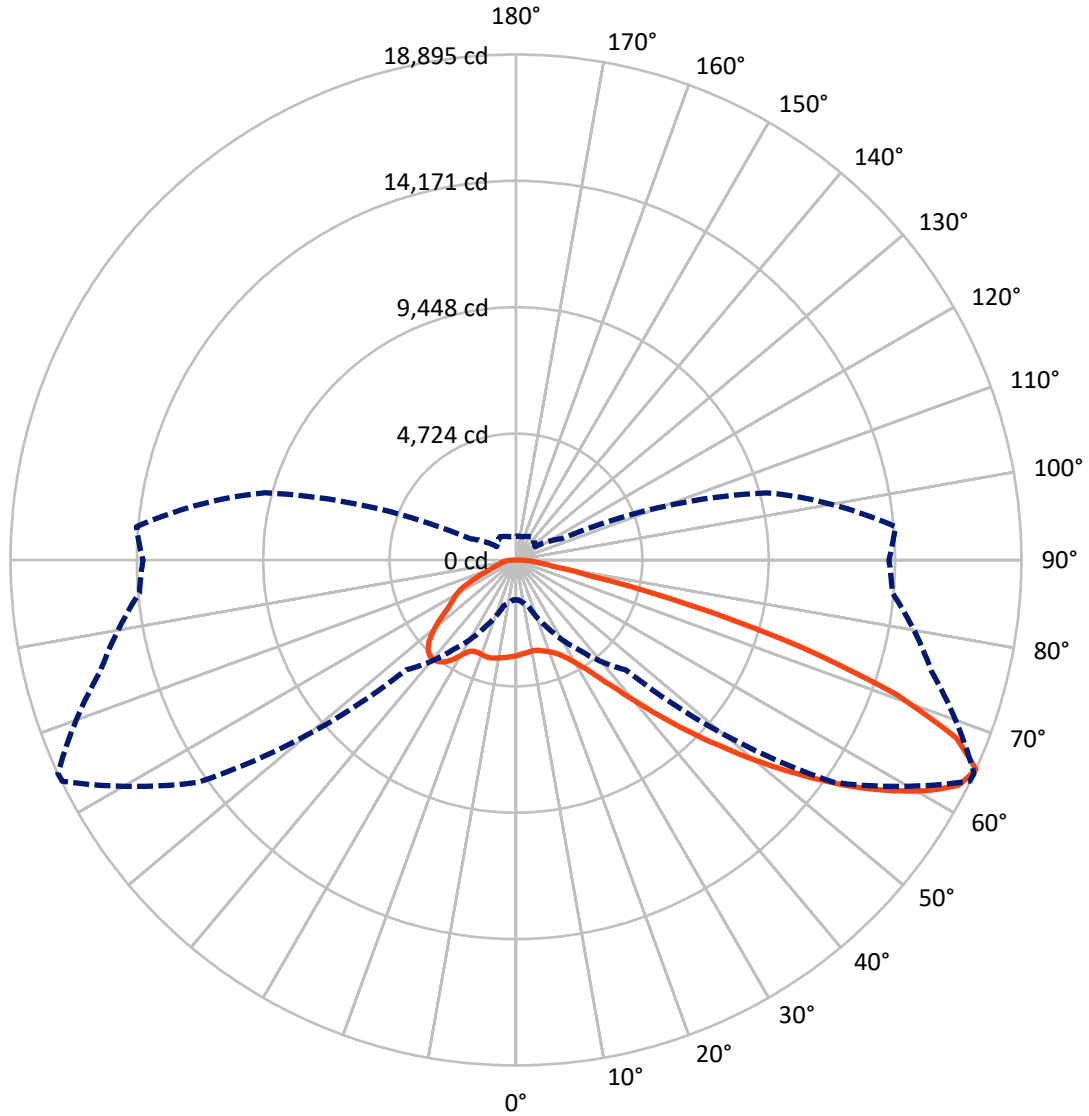
✕ Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 7.8 fc  
 Type II - Short - N/A

REPORT NUMBER: P400473  
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### Luminous Intensity Polar Plot



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

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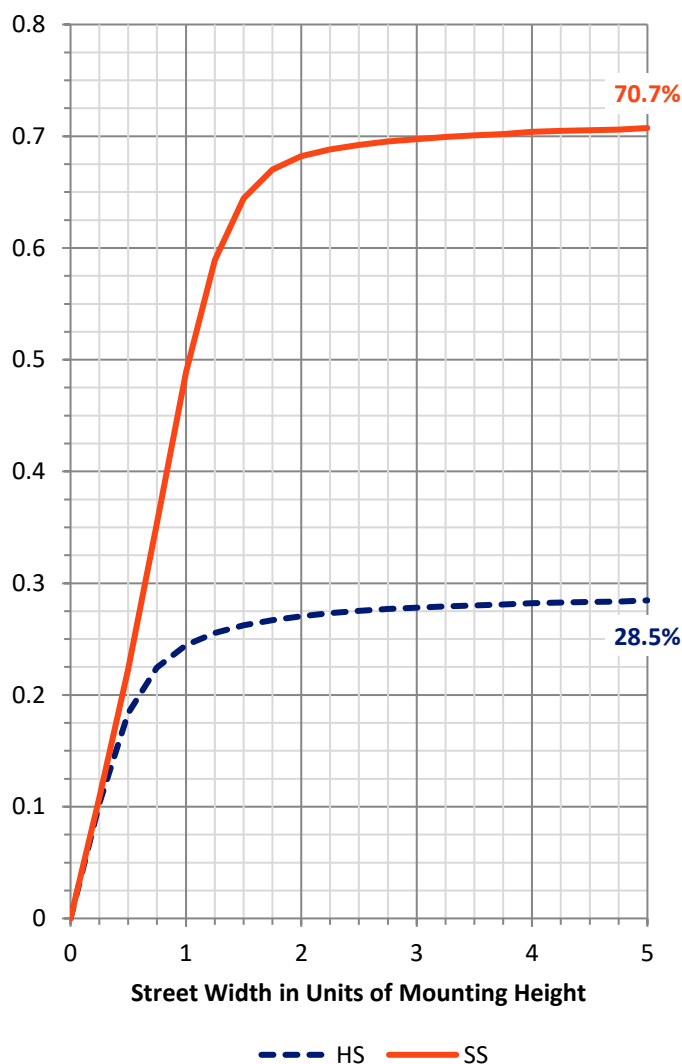
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	8203.9	0.0	8203.9
	% Fixture	28.9	0.0	28.9
<b>Street Side</b>	Lumens	20172.1	0.0	20172.1
	% Fixture	71.1	0.0	71.1
<b>Total</b>	Lumens	28376.0	0.0	28376.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	341.6	1.2
10°-20°	1019.9	3.6
20°-30°	1811.6	6.4
30°-40°	3064.8	10.8
40°-50°	5335.2	18.8
50°-60°	6894.8	24.3
60°-70°	6033.4	21.3
70°-80°	3281.7	11.6
80°-90°	592.9	2.1
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°	28376.0	100.0
0°-180°	28376.0	100.0

**Coefficient of Utilization**



REPORT NUMBER: P400473

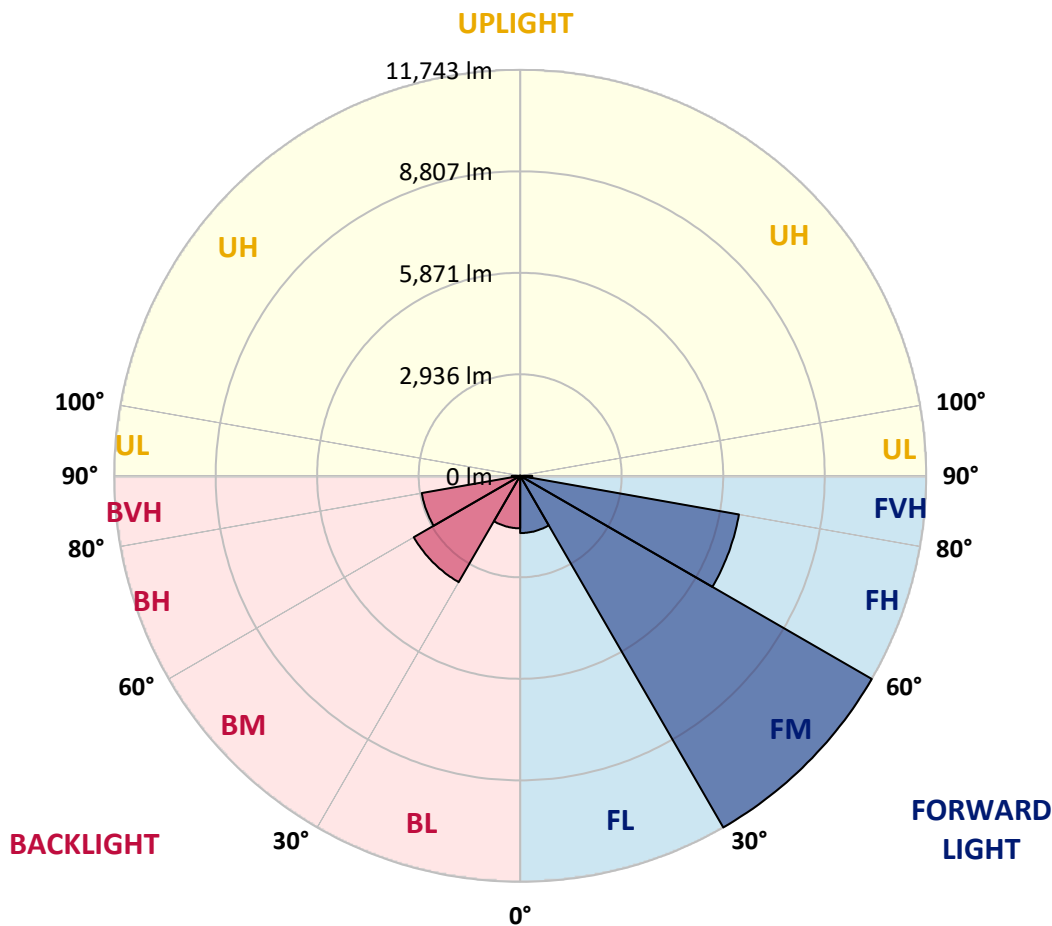
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1655.7	5.8			
FM (30°-60°)	11742.8	41.4			
FH (60°-80°)	6424.7	22.6			G3/7500
FVH (80°-90°)	348.9	1.2			G3/500
BL (0°-30°)	1517.4	5.3	B3/2500		
BM (30°-60°)	3552.1	12.5	B3/5000		
BH (60°-80°)	2890.3	10.2	B4/5000		G4/5000
BVH (80°-90°)	244.0	0.9			G3/500
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B4-U0-G4**

Type II Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	64°	65°	75°	85°
0°	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6
2.5°	3522.1	3518.4	3510.9	3518.4	3522.1	3529.6	3525.8	3533.3	3529.6	3540.8	3559.4
5°	3432.4	3425.0	3421.2	3439.9	3451.1	3469.8	3477.3	3503.4	3499.7	3518.4	3548.2
7.5°	3331.6	3331.6	3327.9	3350.3	3365.2	3398.8	3425.0	3469.8	3473.5	3507.1	3540.8
10°	3253.2	3256.9	3253.2	3271.8	3294.3	3335.3	3380.2	3443.7	3447.4	3495.9	3529.6
12.5°	3223.3	3223.3	3223.3	3249.4	3279.3	3335.3	3387.6	3454.9	3462.3	3514.6	3544.5
15°	3264.4	3268.1	3260.6	3286.8	3320.4	3387.6	3436.2	3507.1	3514.6	3563.2	3581.8
17.5°	3410.0	3425.0	3406.3	3421.2	3413.8	3466.1	3510.9	3581.8	3585.6	3626.7	3634.1
20°	3697.6	3712.6	3682.7	3664.0	3596.8	3593.1	3611.7	3667.8	3667.8	3693.9	3675.2
22.5°	4142.1	4157.0	4104.7	4033.8	3873.2	3794.7	3753.7	3779.8	3776.1	3787.3	3738.7
25°	4732.2	4728.5	4665.0	4534.3	4276.6	4086.1	3985.2	3944.1	3944.1	3921.7	3862.0
27.5°	5464.3	5408.3	5296.2	5139.3	4780.8	4515.6	4299.0	4194.4	4175.7	4108.5	3996.4
30°	6244.9	6203.8	6043.2	5815.4	5400.8	5060.9	4702.3	4493.2	4482.0	4336.3	4168.2
32.5°	7163.7	7096.5	6917.2	6644.5	6147.8	5669.7	5221.5	4904.0	4885.4	4653.8	4422.2
35°	8343.9	8287.9	7940.6	7667.9	7029.2	6401.8	5871.4	5449.3	5434.4	5150.5	4855.5
37.5°	9759.5	9613.8	9277.7	8766.0	8093.7	7350.4	6678.1	6147.8	6129.1	5815.4	5441.9
40°	11021.9	10891.2	10592.4	10121.8	9400.9	8575.5	7664.2	7021.8	7003.1	6622.1	6151.5
42.5°	11955.7	11866.0	11671.8	11399.2	10883.7	10383.2	8922.9	8078.8	8045.1	7552.1	6965.7
45°	12497.2	12426.3	12314.2	12381.5	12374.0	12280.6	10424.3	9337.5	9229.1	8590.5	7873.3
47.5°	12366.5	12303.0	12347.8	12870.7	13591.6	14133.2	12172.3	10626.0	10480.4	9647.5	8840.7
50°	11421.6	11447.7	11683.0	12684.0	14301.2	15503.9	14110.8	12093.9	11899.6	10711.9	9759.5
52.5°	9699.7	9763.2	10334.7	11735.3	14222.8	16392.8	15862.5	13610.3	13352.6	11750.2	10596.1
55°	7705.3	7865.9	8605.4	10077.0	13199.4	16456.3	17184.6	15134.1	14850.3	12725.1	11324.5
57.5°	5699.6	5938.6	6793.9	8146.0	11238.6	15451.6	17845.7	16590.8	16247.2	13692.4	12093.9
60°	3615.5	3761.1	4747.2	6342.0	8601.7	12994.0	17759.8	17830.8	17532.0	14656.1	12896.9
62.5°	2308.2	2379.2	2875.9	4523.1	6013.3	9621.3	16822.4	18768.3	18566.6	15533.8	13658.8
65°	1482.8	1512.7	1766.6	2782.6	4093.5	5807.9	14488.0	18869.1	18895.3	16082.8	14129.4
67.5°	1206.4	1221.3	1314.7	1718.1	2894.6	3208.3	10091.9	17434.9	17752.4	15940.9	13968.8
70°	1098.1	1116.8	1213.9	1370.7	2241.0	2214.8	4885.4	14588.8	15108.0	15122.9	13255.4
72.5°	926.3	952.4	1083.1	1296.0	1733.0	1748.0	2069.2	10390.7	11156.4	13516.9	12183.5
75°	773.1	788.1	900.1	1142.9	1467.8	1396.9	1452.9	5509.1	6614.6	10838.9	11044.3
77.5°	627.5	642.4	724.6	911.3	1303.5	1086.9	1142.9	2282.1	2819.9	7357.9	9027.4
80°	448.2	463.1	556.5	709.6	986.0	978.6	847.8	1258.7	1367.0	3977.8	5863.9
82.5°	321.2	332.4	422.1	508.0	683.5	982.3	638.7	855.3	896.4	1762.9	2364.2
85°	216.6	216.6	291.3	336.1	440.7	620.0	515.4	578.9	605.1	836.6	638.7
87.5°	93.4	93.4	156.9	171.8	231.6	287.6	384.7	291.3	298.8	451.9	261.4
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: P400473

CATALOG NUMBER: ARCH-L-PA3-280-830-U-T2U

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6	3585.6
2.5°	3570.6	3574.4	3581.8	3604.3	3619.2	3641.6	3652.8	3667.8	3667.8	3660.3	3664.0
5°	3563.2	3574.4	3600.5	3641.6	3667.8	3708.8	3738.7	3761.1	3768.6	3761.1	3764.9
7.5°	3559.4	3578.1	3622.9	3682.7	3720.0	3772.3	3813.4	3839.6	3858.2	3850.8	3854.5
10°	3548.2	3578.1	3634.1	3708.8	3764.9	3817.1	3854.5	3865.7	3876.9	3869.4	3865.7
12.5°	3563.2	3596.8	3656.5	3746.2	3809.7	3850.8	3862.0	3843.3	3817.1	3802.2	3798.5
15°	3593.1	3626.7	3686.4	3779.8	3835.8	3850.8	3824.6	3764.9	3705.1	3671.5	3667.8
17.5°	3634.1	3656.5	3705.1	3787.3	3832.1	3813.4	3761.1	3690.2	3645.3	3619.2	3622.9
20°	3660.3	3660.3	3697.6	3761.1	3798.5	3783.5	3720.0	3641.6	3570.6	3537.0	3525.8
22.5°	3697.6	3679.0	3682.7	3738.7	3791.0	3768.6	3634.1	3495.9	3395.1	3357.7	3354.0
25°	3798.5	3746.2	3712.6	3746.2	3869.4	3686.4	3417.5	3256.9	3163.5	3129.9	3133.6
27.5°	3921.7	3850.8	3779.8	3835.8	3932.9	3499.7	3141.1	2958.1	2902.1	2875.9	2887.1
30°	4045.0	3951.6	3858.2	4059.9	3888.1	3208.3	2786.3	2607.0	2558.5	2539.8	2554.7
32.5°	4272.8	4119.7	4007.6	4358.7	3749.9	2875.9	2401.6	2237.3	2192.4	2170.0	2162.6
35°	4653.8	4459.6	4347.5	4620.2	3555.7	2506.2	2050.5	1934.7	1886.2	1837.6	1830.1
37.5°	5202.8	4967.5	4866.7	4769.6	3283.0	2140.1	1781.6	1703.2	1632.2	1557.5	1553.8
40°	5860.2	5553.9	5479.2	4836.8	2905.8	1796.5	1594.8	1520.1	1430.5	1359.5	1363.3
42.5°	6618.4	6226.2	6065.6	4818.1	2438.9	1613.5	1460.4	1378.2	1299.8	1236.3	1232.5
45°	7428.9	6984.4	6614.6	4687.4	1975.8	1486.5	1378.2	1281.1	1202.7	1131.7	1124.2
47.5°	8325.3	7828.5	7122.6	4433.4	1632.2	1396.9	1329.7	1191.5	1120.5	1075.7	1075.7
50°	9229.1	8635.3	7589.5	4048.7	1430.5	1329.7	1258.7	1142.9	1086.9	1049.5	1049.5
52.5°	10002.3	9475.6	7974.2	3589.3	1303.5	1273.6	1210.1	1120.5	1060.7	1027.1	1023.4
55°	10753.0	10256.3	8317.8	3133.6	1198.9	1198.9	1198.9	1101.8	1034.6	1004.7	1001.0
57.5°	11500.0	11078.0	8676.4	2834.8	1105.6	1135.4	1176.5	1079.4	1012.2	986.0	982.3
60°	12344.1	12064.0	9090.9	2625.7	1023.4	1068.2	1146.6	1053.3	974.8	952.4	948.7
62.5°	13240.5	13240.5	9468.2	2330.6	948.7	1012.2	1101.8	1019.6	941.2	922.5	918.8
65°	13942.7	14245.2	9710.9	1889.9	874.0	956.2	1049.5	974.8	896.4	892.7	885.2
67.5°	14024.9	14499.2	9557.8	1426.8	806.8	896.4	997.2	926.3	851.6	851.6	840.4
70°	13434.7	13916.5	9079.7	1068.2	758.2	836.6	930.0	866.5	795.6	803.0	784.3
72.5°	12448.7	12568.2	7892.0	844.1	702.2	773.1	847.8	799.3	735.8	735.8	709.6
75°	11148.9	10484.1	5733.2	705.9	634.9	698.4	765.7	724.6	668.6	649.9	634.9
77.5°	8874.3	7596.9	3331.6	608.8	578.9	627.5	672.3	642.4	593.9	552.8	552.8
80°	5408.3	4452.1	1471.6	526.6	511.7	549.0	578.9	545.3	504.2	463.1	451.9
82.5°	2058.0	1718.1	713.4	451.9	448.2	470.6	493.0	459.4	429.5	410.8	354.8
85°	564.0	519.2	489.3	377.2	369.8	366.0	392.2	377.2	336.1	276.4	246.5
87.5°	212.9	242.8	265.2	231.6	246.5	227.8	261.4	239.0	212.9	138.2	123.3
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)