

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: P400144

Luminaire Tested: **ARCH-L-PA3-240-730-U-T4W**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P400144  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-568-11)  
Test Lab: INNOVATION CENTER  
Issue Date: 5/19/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-L-PA3-240-730-U-T4W  
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE  
(3) 70 CRI, 3000K, 1030mA LIGHT ENGINES WITH 24 LEDS AND TYPE IV WIDE OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 29749 lumens  
Efficiency: N/A  
Efficacy: 122.9 lumens/watt  
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')  
IES Classification: Type IV - Medium  
BUG Rating: B3 - U0 - G5

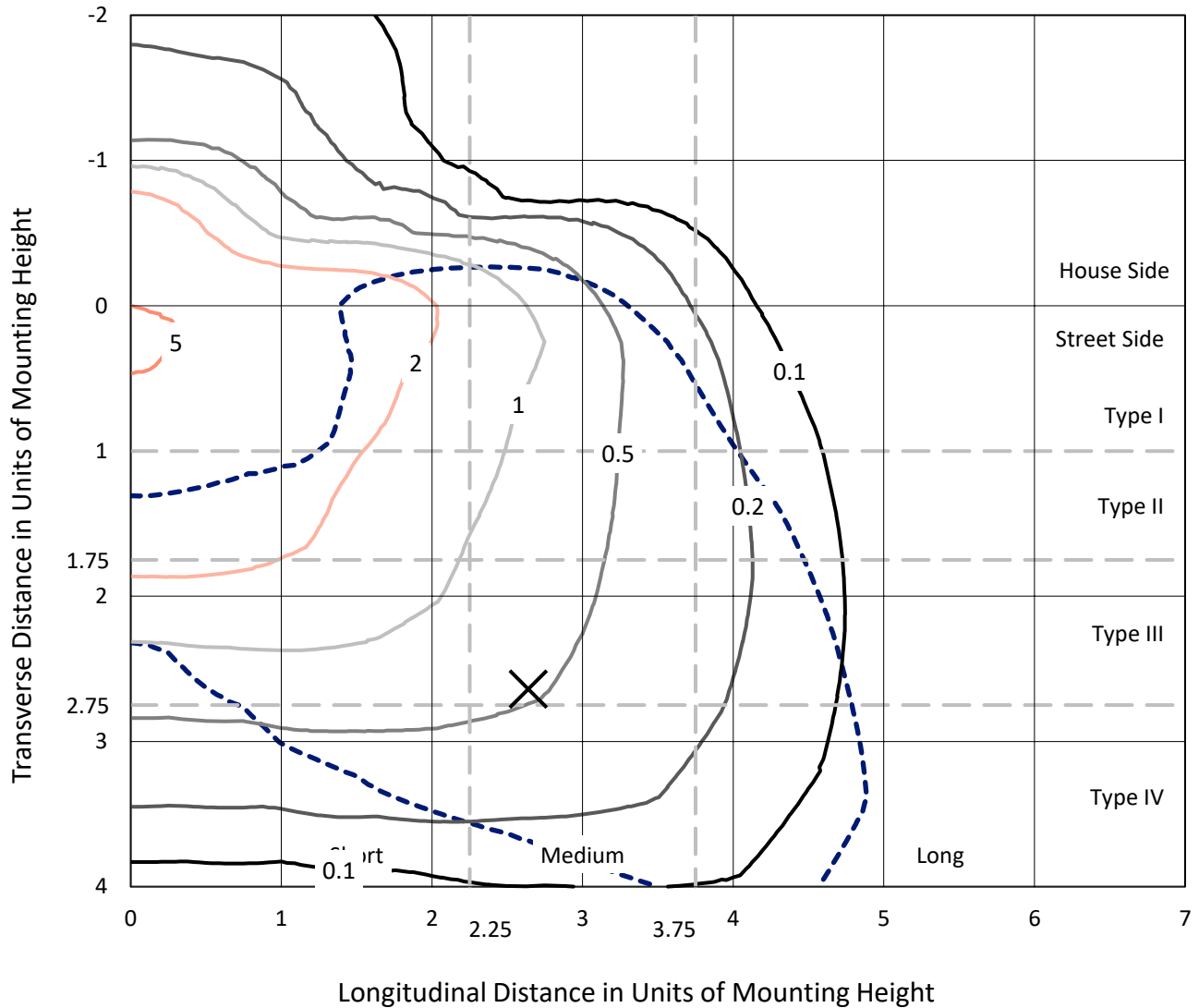
Input Watts (W): 242  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

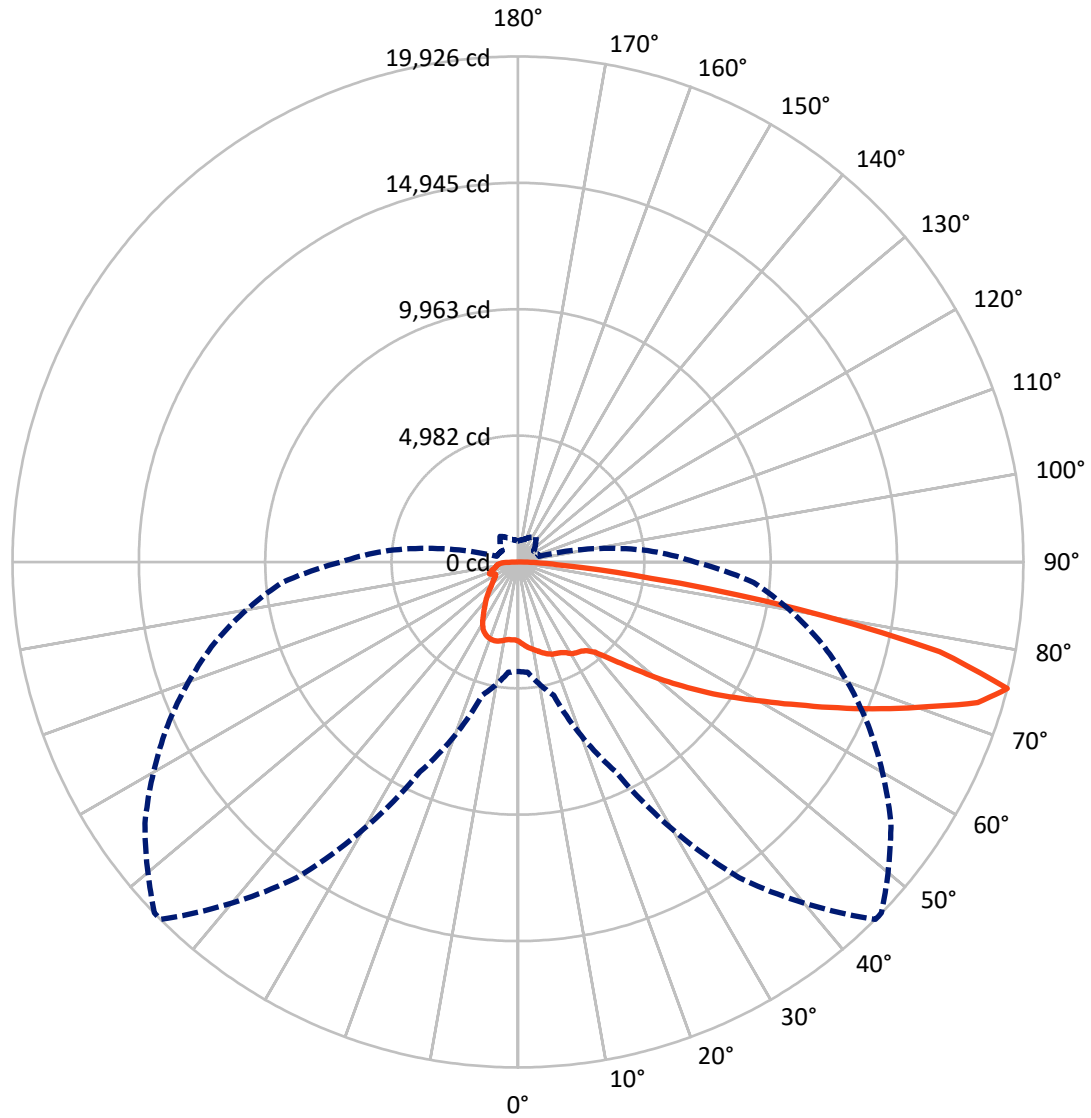
× Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 5.9 fc  
 Type IV - Medium - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral    - - - Horizontal Cone Through 75-Deg Vertical

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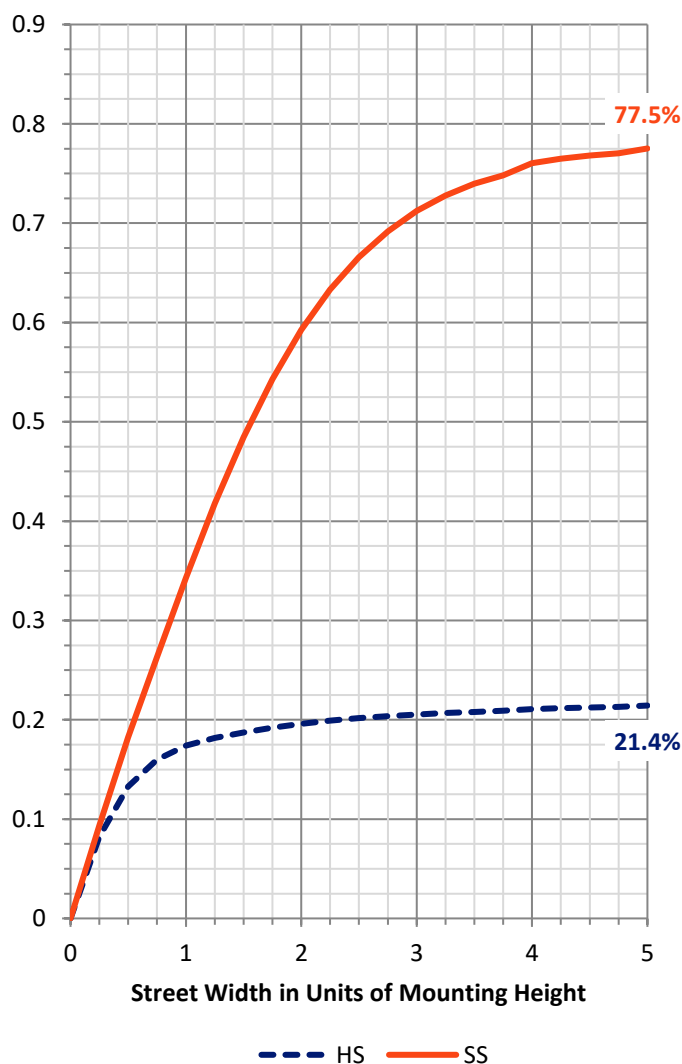
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	6574.4	0.0	6574.4
	% Fixture	22.1	0.0	22.1
<b>Street Side</b>	Lumens	23174.6	0.0	23174.6
	% Fixture	77.9	0.0	77.9
<b>Total</b>	Lumens	29749.0	0.0	29749.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	309.1	1.0
10°-20°	983.3	3.3
20°-30°	1676.4	5.6
30°-40°	2348.8	7.9
40°-50°	3450.8	11.6
50°-60°	5491.9	18.5
60°-70°	7812.3	26.3
70°-80°	6541.2	22.0
80°-90°	1135.2	3.8
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°	29749.0	100.0
0°-180°	29749.0	100.0

**Coefficient of Utilization**



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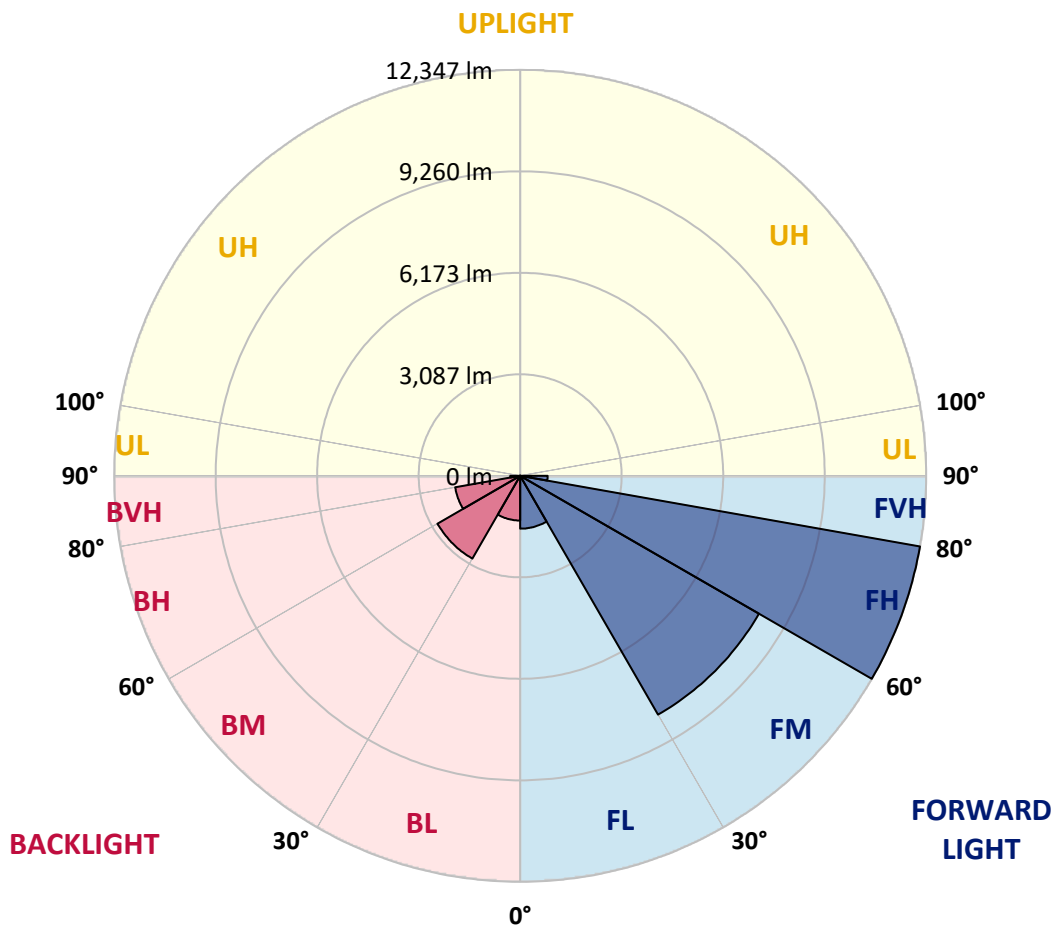
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1608.1	5.4			
FM (30°-60°)	8385.3	28.2			
FH (60°-80°)	12346.6	41.5			G5
FVH (80°-90°)	834.6	2.8			G5
BL (0°-30°)	1360.6	4.6	B3/2500		
BM (30°-60°)	2906.2	9.8	B3/5000		
BH (60°-80°)	2006.9	6.7	B3/2500		G3/2500
BVH (80°-90°)	300.6	1.0			G3/500
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





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	46°	55°	65°	75°	85°
0°	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3
2.5°	3303.2	3287.3	3279.3	3279.3	3247.5	3227.6	3223.7	3195.8	3172.0	3148.1	3128.3
5°	3494.0	3482.0	3458.2	3438.3	3394.6	3338.9	3331.0	3271.4	3211.7	3156.1	3108.4
7.5°	3668.9	3645.0	3617.2	3577.4	3505.9	3430.4	3418.4	3335.0	3251.5	3168.0	3104.4
10°	3815.9	3792.1	3752.3	3696.7	3605.3	3513.8	3501.9	3414.5	3327.0	3227.6	3136.2
12.5°	3955.1	3935.2	3875.6	3800.0	3692.7	3609.2	3597.3	3521.8	3430.4	3319.1	3199.8
15°	4074.3	4054.4	3990.8	3903.4	3780.2	3716.6	3700.7	3629.1	3537.7	3418.4	3295.2
17.5°	4133.9	4133.9	4066.4	3971.0	3855.7	3808.0	3796.1	3708.6	3625.1	3509.9	3386.6
20°	4153.8	4161.8	4114.1	3998.8	3899.4	3879.5	3867.6	3796.1	3700.7	3589.4	3474.1
22.5°	4165.7	4181.6	4141.9	4010.7	3927.2	3915.3	3907.4	3859.7	3784.1	3676.8	3561.5
25°	4205.5	4205.5	4177.7	4030.6	3963.0	3959.0	3959.0	3931.2	3879.5	3788.1	3672.8
27.5°	4265.1	4261.1	4225.4	4074.3	4042.5	4054.4	4050.5	4046.5	4010.7	3919.3	3796.1
30°	4364.5	4364.5	4324.7	4161.8	4141.9	4193.6	4197.5	4205.5	4149.8	4006.7	3907.4
32.5°	4515.5	4499.6	4459.9	4249.2	4217.4	4265.1	4273.1	4269.1	4221.4	4086.2	4038.5
35°	4980.6	4944.8	4801.7	4444.0	4285.0	4312.8	4316.8	4336.7	4344.6	4237.3	4213.4
37.5°	5795.4	5747.8	5529.1	4905.1	4499.6	4432.0	4428.1	4479.7	4523.5	4428.1	4428.1
40°	6681.9	6642.1	6514.9	5700.1	4897.1	4674.5	4658.6	4706.3	4762.0	4694.4	4714.3
42.5°	7445.0	7476.8	7488.8	6542.7	5493.4	5127.7	5083.9	5016.4	5103.8	5044.2	5123.7
45°	8017.4	8001.5	8220.2	7405.3	6264.5	5696.1	5636.5	5453.6	5564.9	5560.9	5735.8
47.5°	8625.6	8597.8	8689.2	8216.2	7143.0	6391.7	6300.3	6030.0	6196.9	6312.2	6602.4
50°	9202.0	9209.9	9241.7	8856.1	8096.9	7238.3	7123.1	6761.4	6999.9	7242.3	7651.7
52.5°	9953.2	9897.6	9857.8	9603.4	9166.2	8120.8	8045.3	7631.9	7965.8	8252.0	8796.5
55°	10609.1	10573.3	10549.5	10537.5	10060.6	9094.6	9015.1	8585.9	9066.8	9269.5	10072.5
57.5°	11308.7	11288.8	11416.0	11618.7	11427.9	10084.4	10000.9	9587.5	10124.1	10267.2	11455.8
60°	11821.4	11833.4	12183.2	12699.9	12568.7	11157.6	11058.3	10692.6	11153.7	11280.9	12839.0
62.5°	11825.4	11944.7	12755.6	13681.7	13832.8	12393.8	12278.6	11881.1	12211.0	12211.0	14079.2
65°	10696.5	10831.7	12652.2	13924.2	15112.7	13864.6	13753.3	13129.2	13252.4	13085.5	15243.9
67.5°	9571.6	9730.6	11443.8	13944.1	16011.0	15438.6	15307.5	14377.3	14166.7	13745.3	16058.7
70°	8824.3	8935.6	10366.6	13685.7	16551.6	17084.3	16984.9	15561.9	14886.1	14297.8	15887.8
72.5°	7429.1	7389.4	8756.8	12457.4	16853.7	18952.5	18869.0	16849.7	15510.2	14035.5	13550.5
75°	4312.8	4360.5	5433.7	9126.4	15192.2	19926.3	19918.4	17950.8	15235.9	12397.8	9337.1
77.5°	1244.2	1279.9	1784.7	4010.7	9607.4	16996.8	17541.4	16416.5	12878.8	8836.3	4841.5
80°	544.6	572.4	775.1	1335.6	4137.9	11102.0	11579.0	11102.0	7767.0	4054.4	1900.0
82.5°	322.0	341.8	504.8	826.8	1983.5	5282.7	5926.6	5175.4	3350.9	1721.1	787.0
85°	182.8	190.8	290.2	524.7	1248.1	1848.3	2074.9	1943.7	1633.7	977.8	413.4
87.5°	83.5	87.4	143.1	246.4	699.6	624.1	647.9	858.6	946.0	596.2	206.7
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°	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3	3124.3
2.5°	3120.3	3108.4	3084.5	3076.6	3064.7	3068.6	3072.6	3072.6	3076.6	3064.7	3064.7
5°	3088.5	3068.6	3044.8	3044.8	3044.8	3076.6	3104.4	3120.3	3128.3	3128.3	3120.3
7.5°	3076.6	3052.7	3024.9	3032.9	3040.8	3080.6	3132.2	3183.9	3199.8	3199.8	3191.9
10°	3100.4	3076.6	3056.7	3068.6	3088.5	3120.3	3160.1	3207.8	3247.5	3251.5	3247.5
12.5°	3156.1	3128.3	3108.4	3132.2	3156.1	3176.0	3195.8	3215.7	3267.4	3275.3	3275.3
15°	3247.5	3219.7	3195.8	3215.7	3223.7	3223.7	3223.7	3223.7	3275.3	3283.3	3283.3
17.5°	3338.9	3315.1	3291.2	3295.2	3271.4	3239.6	3227.6	3223.7	3251.5	3275.3	3279.3
20°	3426.4	3406.5	3382.7	3342.9	3283.3	3223.7	3203.8	3203.8	3219.7	3255.5	3255.5
22.5°	3521.8	3497.9	3458.2	3366.8	3267.4	3183.9	3164.0	3176.0	3195.8	3243.5	3239.6
25°	3629.1	3597.3	3529.7	3358.8	3215.7	3116.3	3120.3	3156.1	3191.9	3243.5	3243.5
27.5°	3748.4	3704.6	3569.5	3295.2	3100.4	3005.0	3040.8	3124.3	3176.0	3231.6	3239.6
30°	3879.5	3839.8	3601.3	3183.9	2913.6	2826.2	2913.6	3048.8	3128.3	3179.9	3191.9
32.5°	4038.5	4006.7	3629.1	3040.8	2671.2	2595.6	2722.8	2889.8	3017.0	3076.6	3088.5
35°	4237.3	4205.5	3664.9	2877.9	2444.6	2365.1	2480.4	2651.3	2818.2	2893.7	2917.6
37.5°	4495.6	4447.9	3696.7	2703.0	2253.8	2162.4	2218.0	2373.0	2524.1	2627.4	2655.3
40°	4825.6	4750.0	3724.5	2504.2	2086.8	1983.5	2003.4	2078.9	2166.3	2257.8	2293.5
42.5°	5290.6	5139.6	3728.5	2293.5	1915.9	1820.5	1812.6	1836.4	1836.4	1836.4	1848.3
45°	5938.5	5652.4	3736.4	2094.8	1741.0	1641.6	1617.8	1609.8	1550.2	1435.0	1427.0
47.5°	6757.4	6324.1	3772.2	1927.8	1558.2	1470.7	1438.9	1407.1	1295.8	1176.6	1152.7
50°	7806.8	7103.2	3843.8	1768.8	1403.2	1343.5	1303.8	1228.3	1105.0	1013.6	989.8
52.5°	9015.1	8029.4	3911.3	1601.9	1287.9	1248.1	1200.4	1109.0	977.8	922.2	914.2
55°	10402.4	9062.8	4046.5	1454.8	1188.5	1160.7	1117.0	1029.5	930.1	890.4	886.4
57.5°	11821.4	10219.5	4237.3	1323.7	1093.1	1077.2	1077.2	1001.7	938.1	922.2	922.2
60°	13188.8	11213.3	4090.2	1200.4	1005.7	1013.6	1089.1	1069.3	1021.6	1041.4	1053.4
62.5°	14250.1	11797.6	3319.1	1101.1	942.1	1013.6	1208.4	1208.4	1152.7	1144.8	1144.8
65°	14703.3	11789.6	2333.3	1025.5	918.2	1113.0	1347.5	1283.9	1136.8	1081.2	1069.3
67.5°	14588.0	11272.9	1609.8	973.9	910.3	1216.3	1411.1	1232.2	1065.3	1017.6	981.8
70°	13574.4	10179.8	1240.2	926.2	898.3	1172.6	1391.2	1172.6	1009.6	965.9	934.1
72.5°	10950.9	8164.5	1029.5	878.5	850.6	1085.2	1323.7	1117.0	965.9	918.2	886.4
75°	6984.0	5135.6	870.5	814.9	759.2	973.9	1232.2	1061.3	918.2	854.6	830.8
77.5°	3358.8	2214.0	759.2	739.3	683.7	902.3	1140.8	989.8	854.6	802.9	787.0
80°	1359.4	1013.6	659.8	663.8	628.0	858.6	1077.2	922.2	791.0	735.4	707.5
82.5°	707.5	588.3	556.5	572.4	572.4	818.8	1029.5	866.5	735.4	711.5	620.1
85°	381.6	365.7	429.3	461.1	496.9	739.3	958.0	806.9	671.8	576.4	556.5
87.5°	186.8	238.5	242.5	278.2	345.8	592.3	806.9	675.7	560.5	465.1	457.1
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)