

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: P265711

Luminaire Tested: **ARCH-L-AF72-240-D-U-T3-7027**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P265711
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29465)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-L-AF72-240-D-U-T3-7027
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE
(3) 70 CRI, 2700K, 1030mA LIGHT ENGINES WITH 24 LEDS AND TYPE III OPTICS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 23984.4 lumens
Efficiency: N/A
Efficacy: 99.1 lumens/watt
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')
IES Classification: Type III - Short - Non-Cutoff
BUG Rating: B3 - U0 - G4

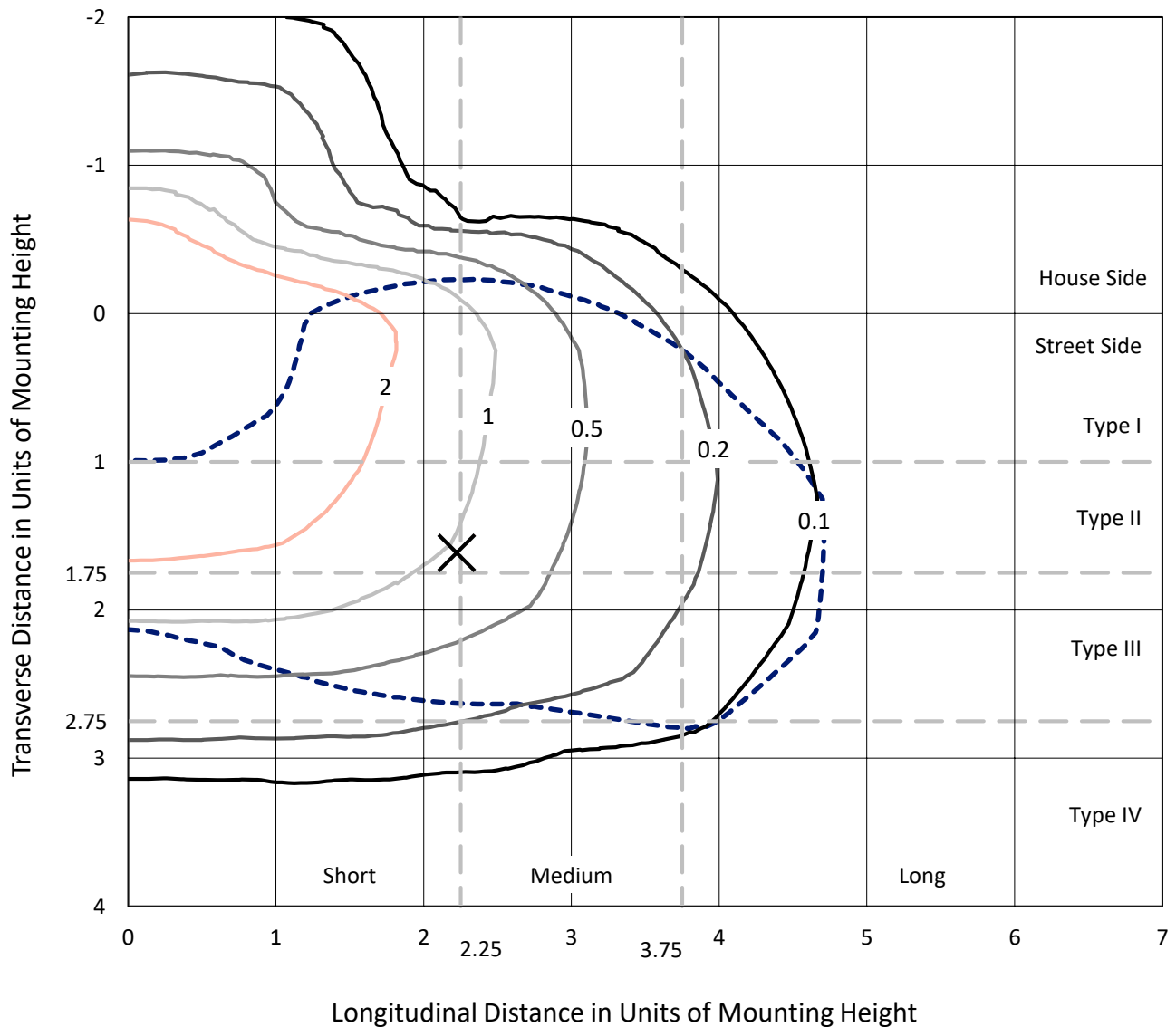
Input Watts (W): 242
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



REPORT NUMBER: P265711
 CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

Iso-Footcandle Lines of Horizontal Illumination

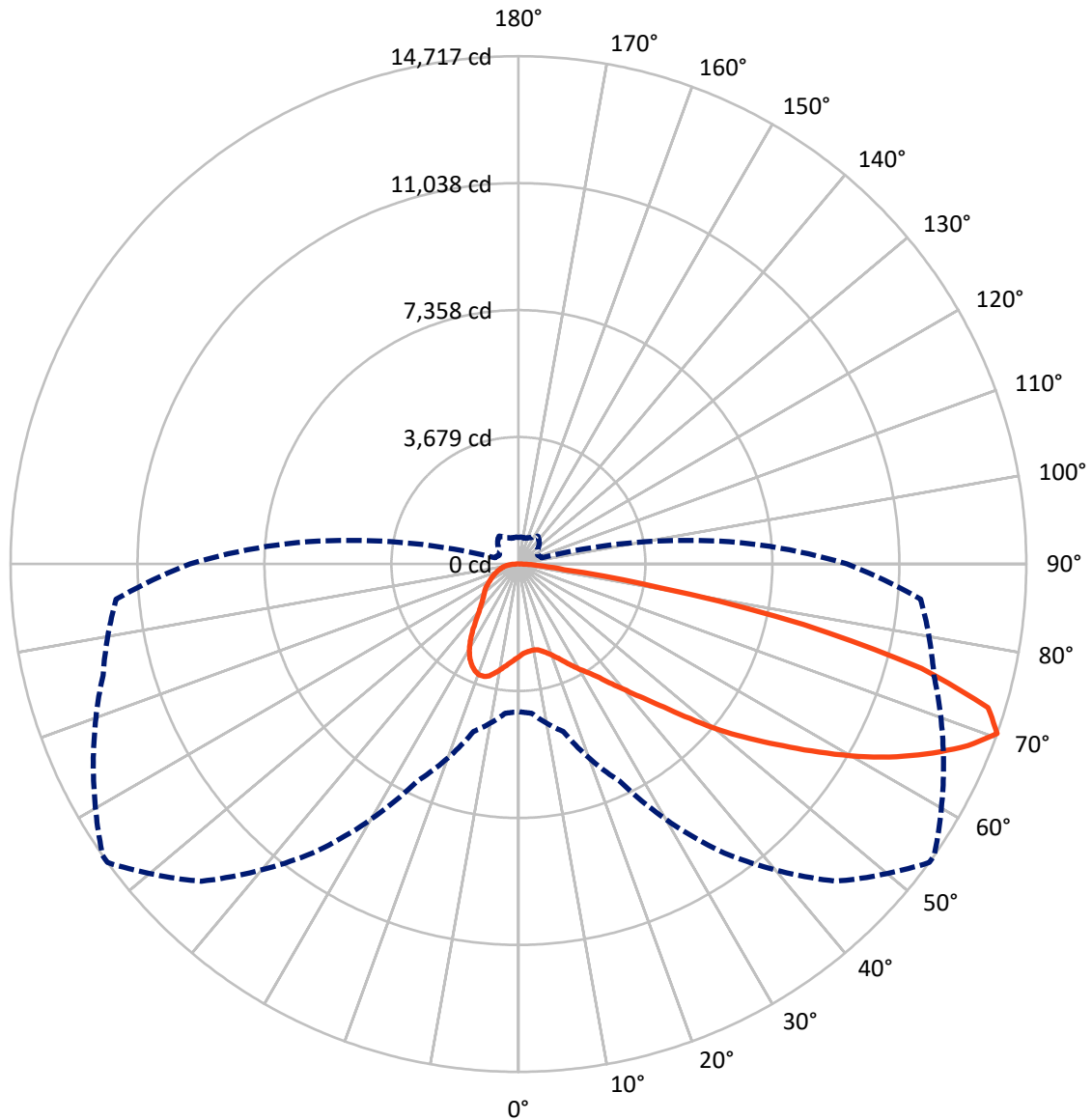
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 5 fc
 Type III - Short - Non-Cutoff

REPORT NUMBER: P265711
CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

Luminous Intensity Polar Plot



— Vertical Plane Through 54-Deg Lateral - - - Horizontal Cone Through 70-Deg Vertical



REPORT NUMBER: P265711

CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

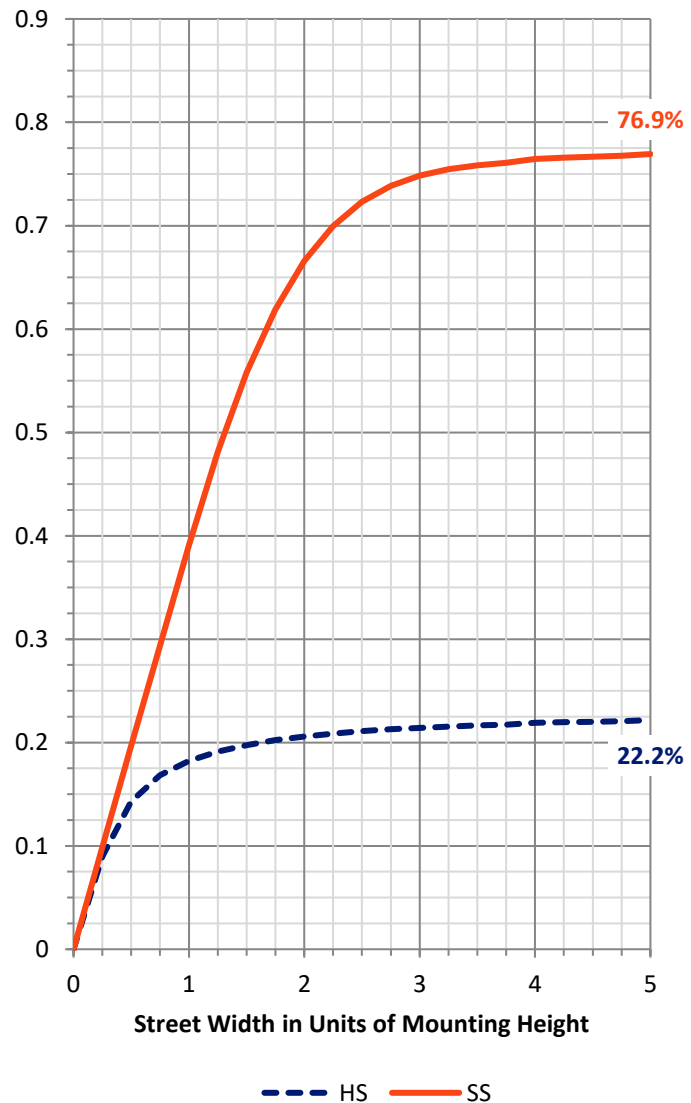
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	5439.6	0.0	5439.6
	% Fixture	22.7	0.0	22.7
Street Side	Lumens	18544.9	0.0	18544.9
	% Fixture	77.3	0.0	77.3
Total	Lumens	23984.4	0.0	23984.4
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	263.3	1.1
10°-20°	841.4	3.5
20°-30°	1461.9	6.1
30°-40°	2136.3	8.9
40°-50°	3352.9	14.0
50°-60°	5156.0	21.5
60°-70°	6299.4	26.3
70°-80°	3905.7	16.3
80°-90°	567.4	2.4
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°	23984.4	100.0
0°-180°	23984.4	100.0

Coefficient of Utilization



REPORT NUMBER: P265711

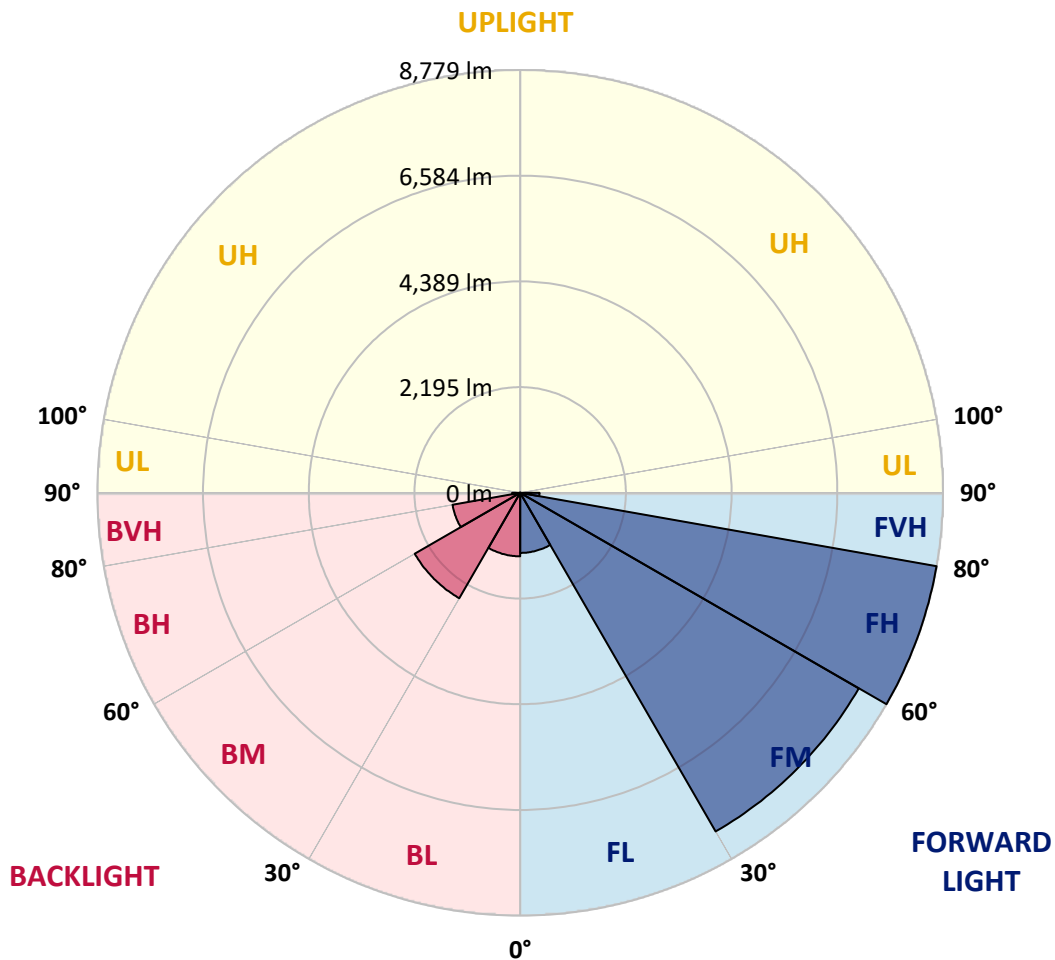
CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	1247.9	5.2			
FM	(30°-60°)	8117.6	33.8			
FH	(60°-80°)	8778.7	36.6			G4/12000
FVH	(80°-90°)	400.6	1.7			G3/500
BL	(0°-30°)	1318.8	5.5	B3/2500		
BM	(30°-60°)	2527.7	10.5	B3/5000		
BH	(60°-80°)	1426.4	5.9	B3/2500		G3/2500
BVH	(80°-90°)	166.7	0.7			G2/225
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G4

Type III Short





REPORT NUMBER: P265711

CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	54°	55°	65°	75°	85°
0°	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3
2.5°	2578.0	2569.2	2569.2	2582.4	2586.8	2600.0	2600.0	2604.4	2617.5	2639.5	2665.8
5°	2498.9	2494.6	2498.9	2516.5	2525.2	2551.6	2560.3	2564.8	2591.2	2626.3	2665.8
7.5°	2419.9	2415.5	2424.3	2450.7	2476.9	2516.5	2538.4	2542.8	2582.4	2630.6	2683.3
10°	2393.5	2389.1	2402.2	2424.3	2450.7	2494.6	2529.6	2534.1	2591.2	2648.3	2722.9
12.5°	2428.7	2424.3	2437.5	2459.4	2485.7	2516.5	2555.9	2560.3	2635.1	2709.7	2788.8
15°	2516.5	2516.5	2520.9	2534.1	2560.3	2586.8	2622.0	2626.3	2705.3	2793.2	2872.2
17.5°	2652.7	2643.8	2643.8	2639.5	2657.0	2670.2	2714.0	2718.5	2802.0	2881.0	2960.1
20°	2819.5	2815.1	2797.5	2775.7	2771.2	2780.0	2823.9	2828.4	2911.8	2977.6	3052.4
22.5°	3021.5	3025.9	2986.4	2938.0	2916.2	2929.4	2968.9	2973.2	3034.7	3091.7	3157.7
25°	3289.5	3276.3	3219.2	3148.9	3105.0	3105.0	3144.4	3144.4	3201.6	3236.8	3280.7
27.5°	3544.2	3517.9	3465.1	3364.2	3293.8	3307.0	3346.5	3346.5	3399.2	3412.4	3434.4
30°	3820.9	3794.5	3728.7	3601.2	3509.0	3500.2	3548.6	3544.2	3614.4	3610.1	3592.5
32.5°	4159.1	4145.9	4036.1	3873.5	3750.6	3719.8	3763.8	3768.1	3812.0	3798.9	3741.8
35°	4633.3	4629.0	4527.9	4242.4	4079.9	4022.9	4049.2	4049.2	4079.9	4044.8	3948.2
37.5°	5230.7	5239.4	5151.6	4729.9	4501.5	4405.0	4409.3	4405.0	4413.7	4374.1	4273.1
40°	5827.9	5849.9	5845.5	5336.0	5046.1	4879.2	4817.8	4808.9	4830.9	4813.4	4716.8
42.5°	6614.0	6666.7	6543.8	6082.7	5757.6	5476.5	5309.6	5287.8	5336.0	5358.0	5265.8
45°	7430.9	7413.4	7220.0	6886.2	6592.0	6231.9	5915.7	5880.6	5915.7	5981.6	5884.9
47.5°	7856.8	7843.7	7795.4	7628.5	7584.6	7171.8	6693.1	6662.3	6596.4	6688.7	6574.4
50°	8559.6	8572.7	8375.1	8357.6	8542.1	8313.6	7571.5	7501.1	7382.6	7457.2	7360.6
52.5°	9069.0	9011.9	8889.0	9042.7	9618.1	9495.1	8397.0	8366.4	8256.5	8239.0	8195.1
55°	9275.4	9275.4	9297.4	9653.1	10474.3	10312.0	9293.0	9323.8	9174.4	9051.4	9108.5
57.5°	9337.0	9363.3	9552.0	10140.6	11480.1	10948.7	10281.1	10325.1	10109.9	9863.8	10043.9
60°	9033.9	9112.9	9565.3	10417.4	12046.6	11625.1	11322.0	11335.3	11023.5	10663.2	10979.4
62.5°	8256.5	8353.2	9161.3	10531.5	11954.5	12318.9	12305.7	12336.6	11910.4	11462.6	11857.7
65°	7303.5	7400.1	8261.0	10210.9	11884.1	12815.2	13206.2	13289.5	12740.5	12138.8	12406.9
67.5°	5902.6	6030.0	6846.8	9130.6	11541.7	13223.6	14049.3	14137.2	13381.7	12490.3	12358.4
70°	4277.5	4339.1	5024.2	6939.0	10145.0	12999.6	14716.8	14712.5	13592.6	12463.9	11699.6
72.5°	2059.8	2108.1	2700.9	4308.4	7255.3	11032.2	14233.7	14317.1	13302.7	12081.8	10193.2
75°	847.6	895.9	1093.5	1818.2	3807.6	7290.4	12064.1	12261.9	12081.8	10843.4	7975.5
77.5°	527.0	544.6	641.2	939.8	1739.2	3403.6	8445.3	8713.3	9574.0	8686.9	5265.8
80°	395.3	408.4	478.6	658.7	1098.0	1256.0	4194.1	4532.3	5801.6	4984.6	2384.7
82.5°	329.4	333.8	382.0	478.6	746.6	720.3	1343.9	1497.7	2705.3	1901.6	821.3
85°	307.4	316.3	342.6	342.6	474.3	452.3	557.8	584.1	786.1	650.0	285.5
87.5°	158.1	149.3	303.1	268.0	246.0	219.5	237.2	254.7	294.3	311.8	127.4
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: P265711

CATALOG NUMBER: ARCH-L-AF72-240-D-U-T3-7027

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3	2683.3
2.5°	2674.7	2687.8	2709.7	2731.7	2758.1	2788.8	2806.3	2828.4	2845.9	2837.0	2832.6
5°	2687.8	2709.7	2758.1	2802.0	2854.6	2916.2	2955.7	2999.6	3034.7	3043.5	3030.3
7.5°	2709.7	2749.3	2815.1	2894.2	2964.4	3043.5	3105.0	3166.4	3210.5	3219.2	3219.2
10°	2762.5	2806.3	2894.2	2999.6	3083.1	3166.4	3236.8	3285.0	3324.5	3342.1	3342.1
12.5°	2837.0	2889.8	2995.2	3122.6	3214.8	3293.8	3333.4	3355.3	3372.9	3390.5	3394.9
15°	2924.9	2982.1	3109.4	3245.5	3342.1	3381.7	3381.7	3377.3	3377.3	3386.0	3394.9
17.5°	3012.7	3074.2	3206.1	3350.9	3412.4	3390.5	3359.8	3346.5	3337.7	3333.4	3346.5
20°	3105.0	3166.4	3298.2	3434.4	3416.9	3324.5	3280.7	3249.9	3223.6	3210.5	3228.0
22.5°	3206.1	3263.2	3399.2	3491.4	3359.8	3219.2	3135.8	3087.5	3043.5	3017.1	3034.7
25°	3324.5	3381.7	3513.5	3509.0	3258.7	3061.1	2929.4	2850.2	2802.0	2775.7	2775.7
27.5°	3465.1	3513.5	3640.8	3465.1	3118.1	2850.2	2657.0	2582.4	2569.2	2547.2	2547.2
30°	3610.1	3649.5	3759.3	3364.2	2924.9	2573.6	2362.8	2327.7	2332.0	2310.1	2314.5
32.5°	3759.3	3798.9	3829.7	3214.8	2674.7	2261.8	2121.3	2094.8	2090.4	2072.8	2055.3
35°	3970.1	4027.2	3838.4	3012.7	2371.5	2002.6	1901.6	1875.3	1848.9	1787.4	1787.4
37.5°	4290.8	4352.3	3816.4	2762.5	2059.8	1800.7	1708.3	1673.3	1629.3	1567.8	1546.0
40°	4729.9	4729.9	3768.1	2481.4	1809.5	1638.1	1550.2	1506.4	1458.0	1396.5	1383.4
42.5°	5248.2	5125.2	3693.6	2195.8	1624.9	1528.3	1449.2	1400.9	1343.9	1273.5	1264.9
45°	5854.3	5520.4	3588.1	1941.1	1488.9	1462.5	1414.1	1330.7	1234.1	1159.4	1146.2
47.5°	6442.7	5876.3	3487.1	1761.0	1374.6	1436.1	1396.5	1256.0	1124.3	1018.9	1005.7
50°	7088.3	6192.3	3368.6	1611.7	1286.8	1418.6	1374.6	1146.2	1001.3	926.6	917.9
52.5°	7733.9	6513.0	3241.2	1453.6	1212.2	1383.4	1321.9	1067.1	996.8	895.9	882.8
55°	8414.7	6886.2	3091.7	1278.0	1124.3	1313.1	1251.7	1062.9	1027.8	895.9	865.2
57.5°	9077.8	7299.2	2850.2	1106.7	1027.8	1207.7	1225.3	1036.5	961.7	887.2	852.0
60°	9811.3	7738.3	2450.7	961.7	944.2	1119.8	1190.2	979.3	887.2	860.8	843.1
62.5°	10399.8	8133.6	1914.7	860.8	874.1	1049.6	1146.2	944.2	856.4	834.4	830.0
65°	10654.4	8142.3	1374.6	772.9	803.8	983.7	1102.3	913.4	830.0	821.3	816.9
67.5°	10386.6	7694.4	966.1	689.4	729.1	922.3	1045.3	882.8	803.8	808.0	799.3
70°	9521.3	6750.1	707.1	610.5	658.7	856.4	983.7	843.1	772.9	781.7	768.6
72.5°	7966.7	5261.4	566.6	544.6	601.7	786.1	922.3	799.3	724.7	729.1	702.7
75°	5884.9	3487.1	474.3	487.5	535.7	720.3	843.1	742.2	671.9	654.3	636.8
77.5°	3500.2	1791.8	390.9	425.9	478.6	641.2	755.4	671.9	614.8	584.1	571.0
80°	1445.0	724.7	320.5	360.1	417.3	571.0	667.5	588.5	549.0	518.2	500.6
82.5°	575.4	355.6	254.7	294.3	351.3	496.3	584.1	518.2	478.6	456.8	408.4
85°	219.5	175.7	171.2	206.4	263.6	382.0	483.1	434.8	404.1	346.9	333.8
87.5°	87.9	79.1	79.1	101.0	149.3	241.6	346.9	303.1	316.3	250.4	254.7
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)