

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: P237476

Luminaire Tested: **ARCH-L-AF72-230-D-U-T4W-7050-HSS**

Issue Date: 2/14/2018

Test Information

Test Method: LM-79-08
Report Number: P237476
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29625)
Test Lab: INNOVATION CENTER-P2
Issue Date: 2/14/2018
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-L-AF72-230-D-U-T4W-7050-HSS
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE
(3) 70 CRI, 5000K, 980mA LIGHT ENGINES WITH 24 LEDS AND TYPE IV WIDE OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 19250 lumens
Efficiency: N/A
Efficacy: 84.1 lumens/watt
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')
IES Classification: Type IV - Medium
BUG Rating: B1 - U0 - G4

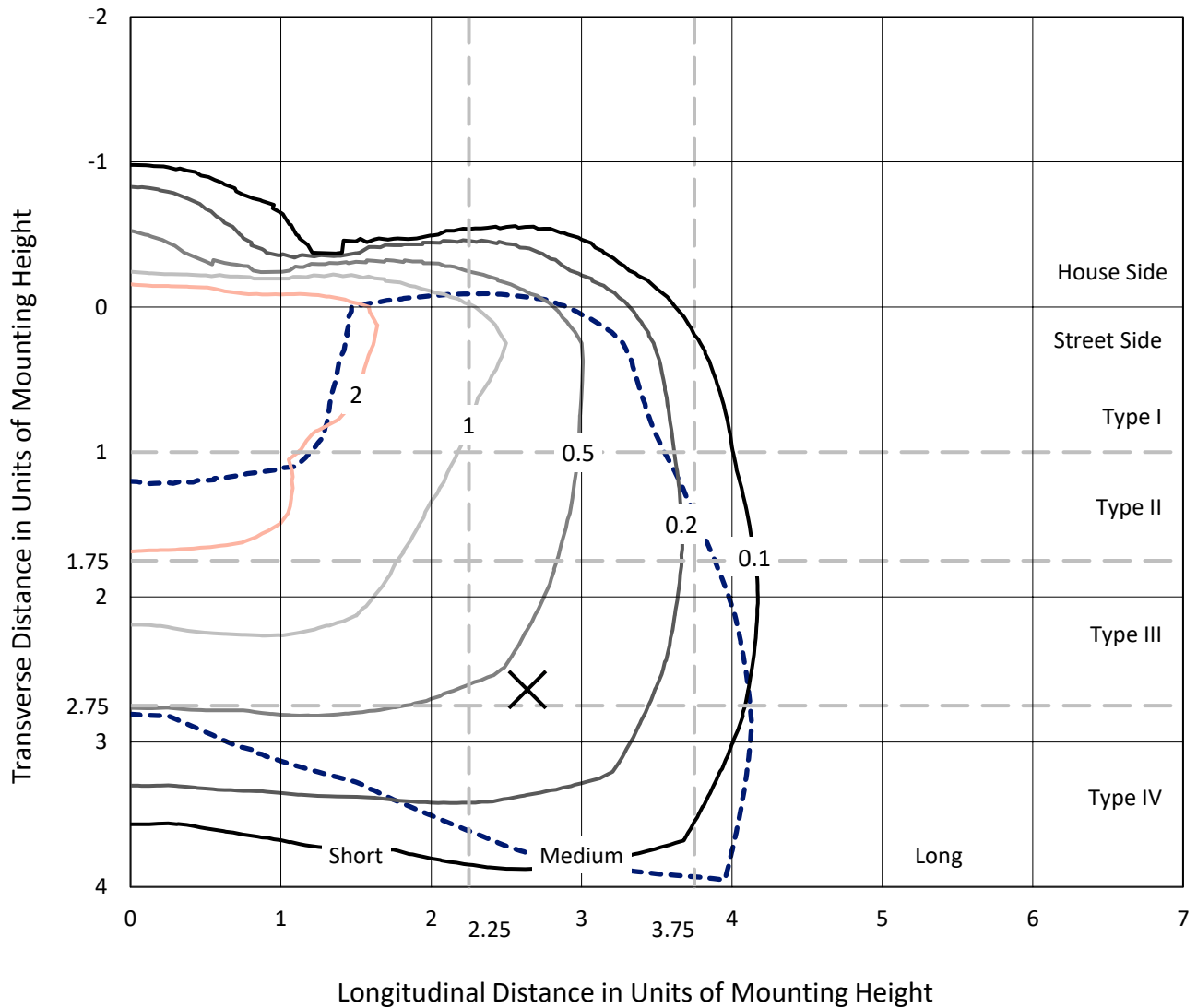
Input Watts (W): 229
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

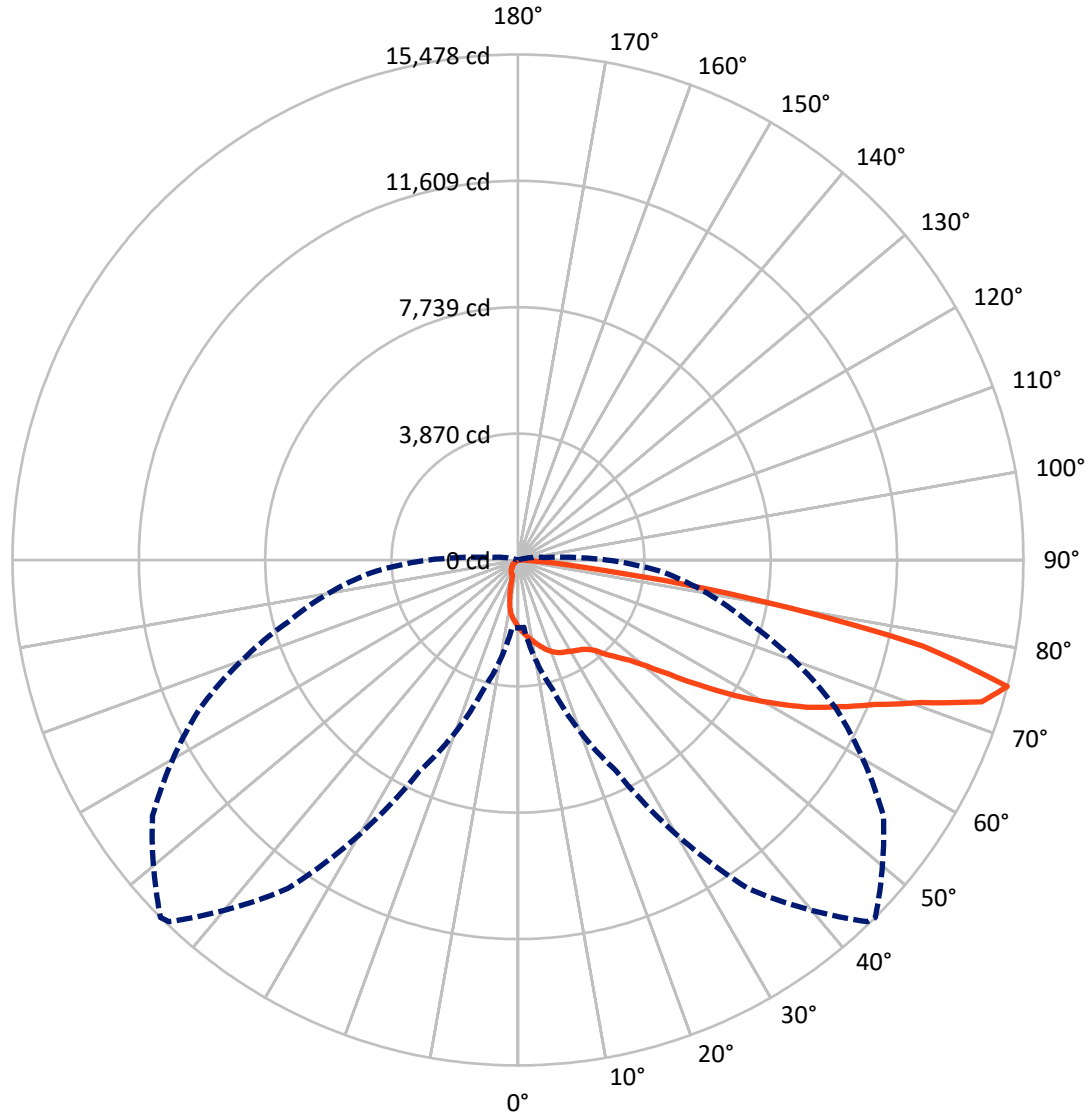
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 4.4 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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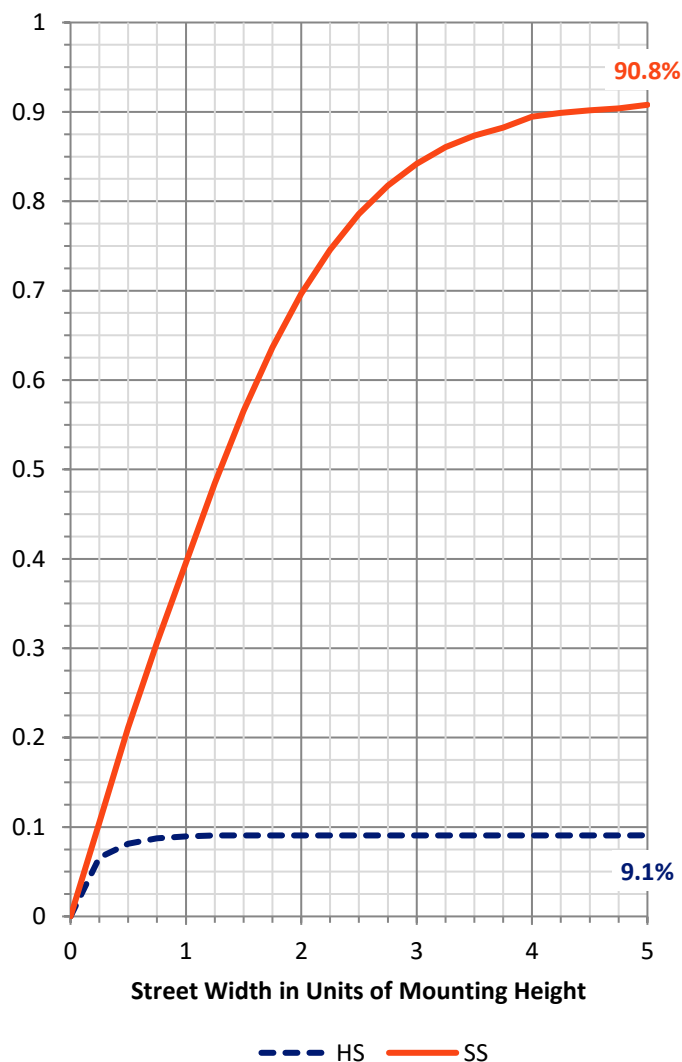
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1760.8	0.0	1760.8
	% Fixture	9.1	0.0	9.1
Street Side	Lumens	17489.2	0.0	17489.2
	% Fixture	90.9	0.0	90.9
Total	Lumens	19250.0	0.0	19250.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	194.3	1.0
10°-20°	550.5	2.9
20°-30°	911.7	4.7
30°-40°	1319.4	6.9
40°-50°	2160.5	11.2
50°-60°	3849.6	20.0
60°-70°	5659.4	29.4
70°-80°	4269.5	22.2
80°-90°	335.0	1.7
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°	19250.0	100.0
0°-180°	19250.0	100.0

Coefficient of Utilization



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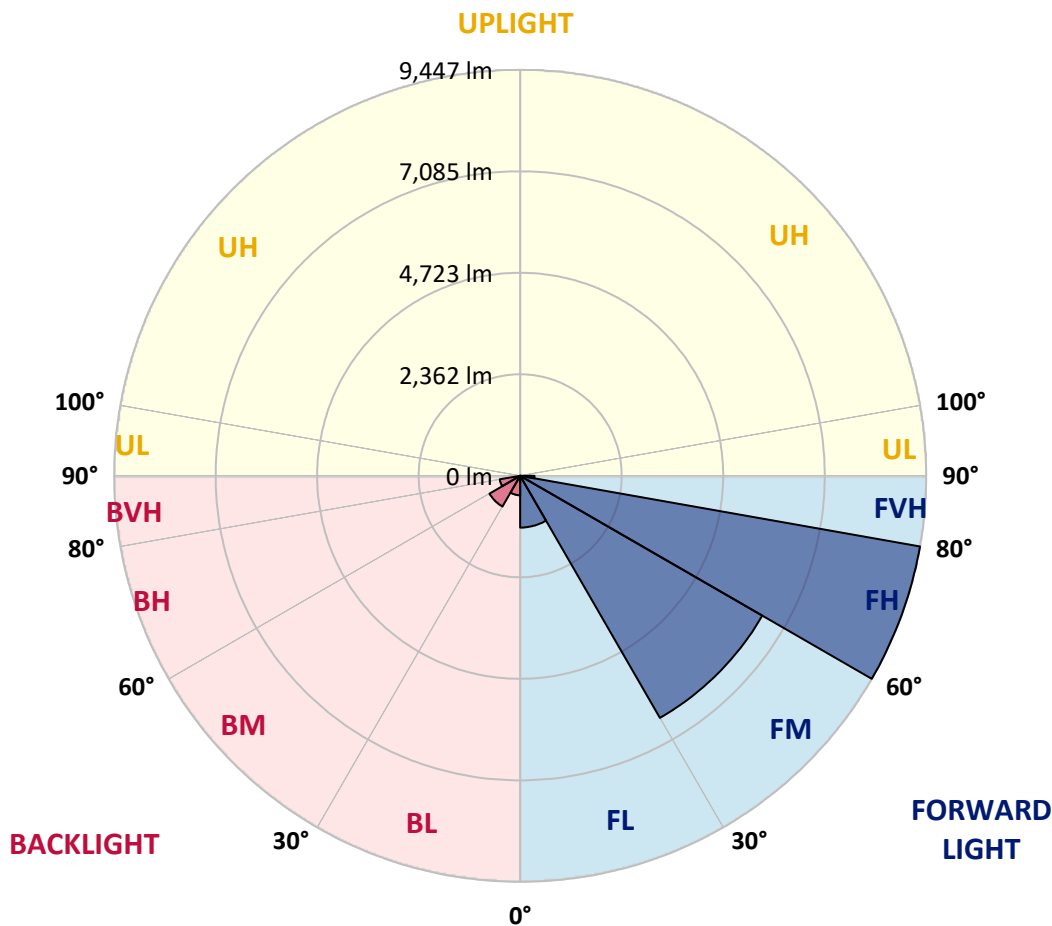
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1204.0	6.3			
FM (30°-60°)	6504.5	33.8			
FH (60°-80°)	9446.7	49.1			G4/12000
FVH (80°-90°)	334.0	1.7			G3/500
BL (0°-30°)	452.5	2.4	B1/500		
BM (30°-60°)	825.1	4.3	B1/1000		
BH (60°-80°)	482.3	2.5	B1/500		G1/500
BVH (80°-90°)	0.9	0.0			G0/10
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G4

Type IV Medium





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	44°	45°	55°	65°	75°	85°
0°	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9
2.5°	2236.5	2236.5	2232.0	2227.4	2204.7	2181.9	2177.3	2163.7	2122.7	2095.3	2068.0
5°	2423.3	2427.9	2418.7	2396.0	2345.9	2295.8	2291.2	2254.8	2177.3	2122.7	2063.4
7.5°	2600.9	2610.1	2587.3	2546.3	2487.1	2414.2	2409.6	2341.3	2241.1	2163.7	2077.1
10°	2751.3	2751.3	2719.4	2669.3	2605.5	2528.1	2519.0	2441.5	2327.6	2232.0	2118.1
12.5°	2915.2	2910.7	2865.1	2796.8	2723.9	2651.1	2646.5	2550.8	2441.5	2318.5	2177.3
15°	3065.6	3056.5	2997.2	2933.5	2856.0	2778.6	2774.0	2678.4	2564.5	2418.7	2263.9
17.5°	3147.6	3143.0	3088.3	3024.6	2960.8	2901.6	2897.0	2796.8	2673.8	2523.5	2350.4
20°	3161.2	3165.8	3120.2	3065.6	3029.1	2997.2	2997.2	2906.1	2774.0	2614.6	2441.5
22.5°	3165.8	3179.4	3147.6	3074.7	3065.6	3070.1	3079.2	3006.3	2869.7	2719.4	2537.2
25°	3197.7	3215.9	3193.1	3106.6	3097.4	3129.3	3138.4	3106.6	2983.6	2833.3	2646.5
27.5°	3261.4	3279.7	3261.4	3152.1	3138.4	3170.3	3179.4	3197.7	3106.6	2942.6	2760.4
30°	3389.0	3393.5	3352.5	3215.9	3188.5	3229.5	3243.2	3293.3	3220.4	3047.3	2869.7
32.5°	3612.2	3566.6	3443.6	3261.4	3238.7	3284.2	3297.9	3352.5	3325.2	3147.6	2983.6
35°	4067.7	3830.8	3548.4	3325.2	3302.4	3348.0	3366.2	3443.6	3457.3	3288.8	3124.8
37.5°	4063.1	3849.0	3794.4	3448.2	3416.3	3448.2	3471.0	3566.6	3621.3	3475.5	3329.8
40°	4350.1	4259.0	4259.0	3680.5	3575.7	3621.3	3644.1	3739.7	3835.4	3721.5	3571.2
42.5°	5252.0	5192.8	5129.0	4126.9	3798.9	3926.5	3940.1	3999.4	4113.2	4076.8	3899.1
45°	6258.7	6204.0	5958.0	4883.0	4181.6	4204.3	4236.2	4331.9	4495.9	4564.2	4354.6
47.5°	7046.7	6992.0	6782.5	5794.0	4778.3	4577.8	4577.8	4764.6	5019.7	5192.8	4992.4
50°	7679.8	7616.1	7488.5	6764.3	5757.6	5115.3	5088.0	5306.7	5684.7	5953.5	5816.8
52.5°	8294.8	8108.0	8030.6	7766.4	6864.5	5894.3	5821.4	5976.3	6500.1	6832.6	6718.7
55°	8704.7	8677.4	8595.4	8686.5	8026.0	6841.7	6777.9	6809.8	7465.8	7689.0	7547.8
57.5°	9087.4	9082.8	9265.0	9688.6	9292.3	7925.8	7825.6	7775.5	8399.5	8344.9	8467.9
60°	9561.1	9479.1	9902.7	10508.5	10453.9	8982.6	8868.7	8768.5	9114.7	8959.8	9570.2
62.5°	9583.9	9561.1	10422.0	11292.0	11606.3	10057.6	9925.5	9565.6	9738.7	9561.1	10622.4
65°	8713.8	8827.7	10640.6	11706.5	12572.0	11000.5	10841.1	10280.8	10294.5	10176.0	11861.4
67.5°	8518.0	8577.2	10039.4	12152.9	13268.9	11952.5	11802.2	11105.3	10941.3	10950.4	12594.8
70°	8030.6	8121.7	9292.3	12121.0	13820.1	13223.4	13073.1	12316.9	11920.6	11478.8	12029.9
72.5°	6135.7	6290.6	7830.2	10627.0	13669.8	14886.0	14845.0	13852.0	12312.4	10540.4	9101.0
75°	2077.1	2072.6	4113.2	7137.8	12280.5	15396.1	15478.1	13660.7	10740.9	7269.9	4518.6
77.5°	446.4	451.0	847.2	2892.5	8158.1	12362.5	12676.8	10303.6	6928.3	3238.7	1034.0
80°	218.6	223.2	350.7	765.3	3261.4	6932.8	7424.8	5297.5	2559.9	646.8	173.1
82.5°	109.3	113.9	182.2	405.4	1207.1	2464.3	2632.8	1949.6	733.4	364.4	86.5
85°	41.0	41.0	91.1	241.4	551.2	578.5	710.6	564.8	441.8	296.1	22.8
87.5°	9.1	9.1	50.1	118.4	246.0	182.2	182.2	173.1	268.7	200.4	9.1
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°	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9	2058.9
2.5°	2054.3	2036.1	2004.2	1972.3	1949.6	1922.2	1908.6	1894.9	1890.4	1885.8	1894.9
5°	2031.6	2004.2	1945.0	1894.9	1849.4	1812.9	1785.6	1758.3	1744.6	1735.5	1740.0
7.5°	2031.6	1990.6	1904.0	1826.6	1753.7	1676.3	1598.8	1539.6	1494.1	1466.7	1471.3
10°	2054.3	1999.7	1885.8	1781.0	1644.4	1480.4	1311.9	1184.3	1097.8	1047.7	1047.7
12.5°	2104.4	2031.6	1890.4	1726.4	1494.1	1207.1	952.0	797.1	733.4	696.9	701.5
15°	2172.8	2086.2	1913.1	1653.5	1284.5	897.3	665.0	564.8	564.8	573.9	578.5
17.5°	2250.2	2154.5	1931.3	1544.2	1015.8	642.3	523.8	514.7	528.4	551.2	551.2
20°	2327.6	2222.9	1940.5	1371.1	760.7	510.2	496.5	496.5	505.6	528.4	532.9
22.5°	2423.3	2309.4	1931.3	1157.0	569.4	482.8	478.3	478.3	478.3	505.6	505.6
25°	2523.5	2409.6	1894.9	929.2	482.8	464.6	460.1	455.5	455.5	478.3	482.8
27.5°	2637.4	2514.4	1808.4	710.6	455.5	446.4	441.8	432.7	432.7	451.0	451.0
30°	2751.3	2632.8	1676.3	537.5	432.7	428.2	419.1	410.0	400.8	419.1	419.1
32.5°	2874.2	2755.8	1503.2	428.2	400.8	400.8	396.3	382.6	373.5	382.6	387.2
35°	3038.2	2897.0	1307.3	373.5	359.9	359.9	359.9	355.3	337.1	346.2	346.2
37.5°	3256.9	3092.9	1079.6	346.2	328.0	318.9	318.9	318.9	305.2	309.7	309.7
40°	3534.7	3320.6	860.9	323.4	305.2	282.4	273.3	277.9	268.7	268.7	264.2
42.5°	3912.8	3566.6	646.8	305.2	287.0	255.1	236.9	232.3	223.2	218.6	218.6
45°	4454.9	3867.3	464.6	287.0	273.3	223.2	205.0	191.3	168.5	154.9	154.9
47.5°	5156.3	4208.9	346.2	268.7	259.6	195.9	173.1	145.8	113.9	104.8	104.8
50°	6012.7	4591.5	291.5	241.4	236.9	173.1	136.7	95.7	63.8	54.7	59.2
52.5°	6846.3	4951.4	259.6	214.1	209.5	150.3	100.2	50.1	27.3	27.3	27.3
55°	7547.8	5206.4	236.9	191.3	182.2	118.4	54.7	22.8	13.7	13.7	13.7
57.5°	8180.9	5352.2	214.1	168.5	145.8	82.0	22.8	9.1	9.1	4.6	4.6
60°	8759.4	5438.8	186.8	145.8	113.9	45.6	9.1	4.6	4.6	0.0	0.0
62.5°	9328.8	5502.5	159.4	118.4	86.5	18.2	4.6	4.6	0.0	0.0	0.0
65°	9761.5	5479.7	127.5	95.7	54.7	9.1	4.6	0.0	0.0	0.0	0.0
67.5°	9747.9	5170.0	95.7	72.9	27.3	4.6	0.0	0.0	0.0	0.0	0.0
70°	8718.4	4354.6	63.8	45.6	9.1	4.6	0.0	0.0	0.0	0.0	0.0
72.5°	6185.8	2792.3	41.0	27.3	4.6	0.0	0.0	0.0	0.0	0.0	0.0
75°	2723.9	847.2	22.8	13.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0
77.5°	532.9	195.9	13.7	9.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0
80°	127.5	22.8	4.6	4.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	54.7	9.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	13.7	4.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	9.1	4.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
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)