

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: P348994

Luminaire Tested: **ARCH-N-PA1-60-740-U-T2U-HSS**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P348994  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1908-474-2)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-N-PA1-60-740-U-T2U-HSS  
Description: ARCHEON ROADWAY AND AREA LUMINAIRE  
(1) 70 CRI, 4000K, 1160mA LIGHT ENGINE WITH 16 LEDS AND  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 5464 lumens  
Efficiency: N/A  
Efficacy: 88.1 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')  
IES Classification: Type II - Short - Full Cutoff  
BUG Rating: B1 - U0 - G1

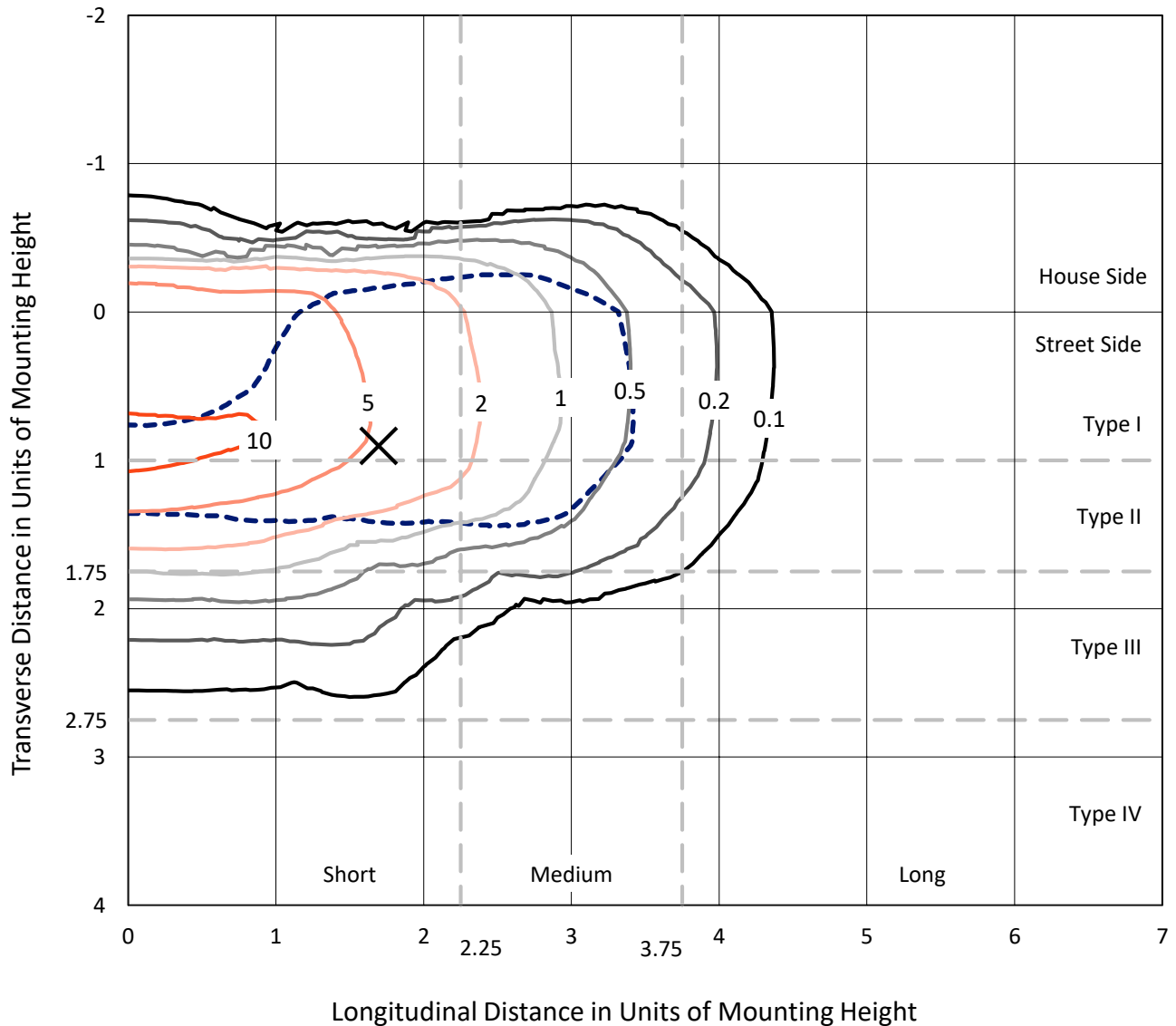
Input Watts (W): 62  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

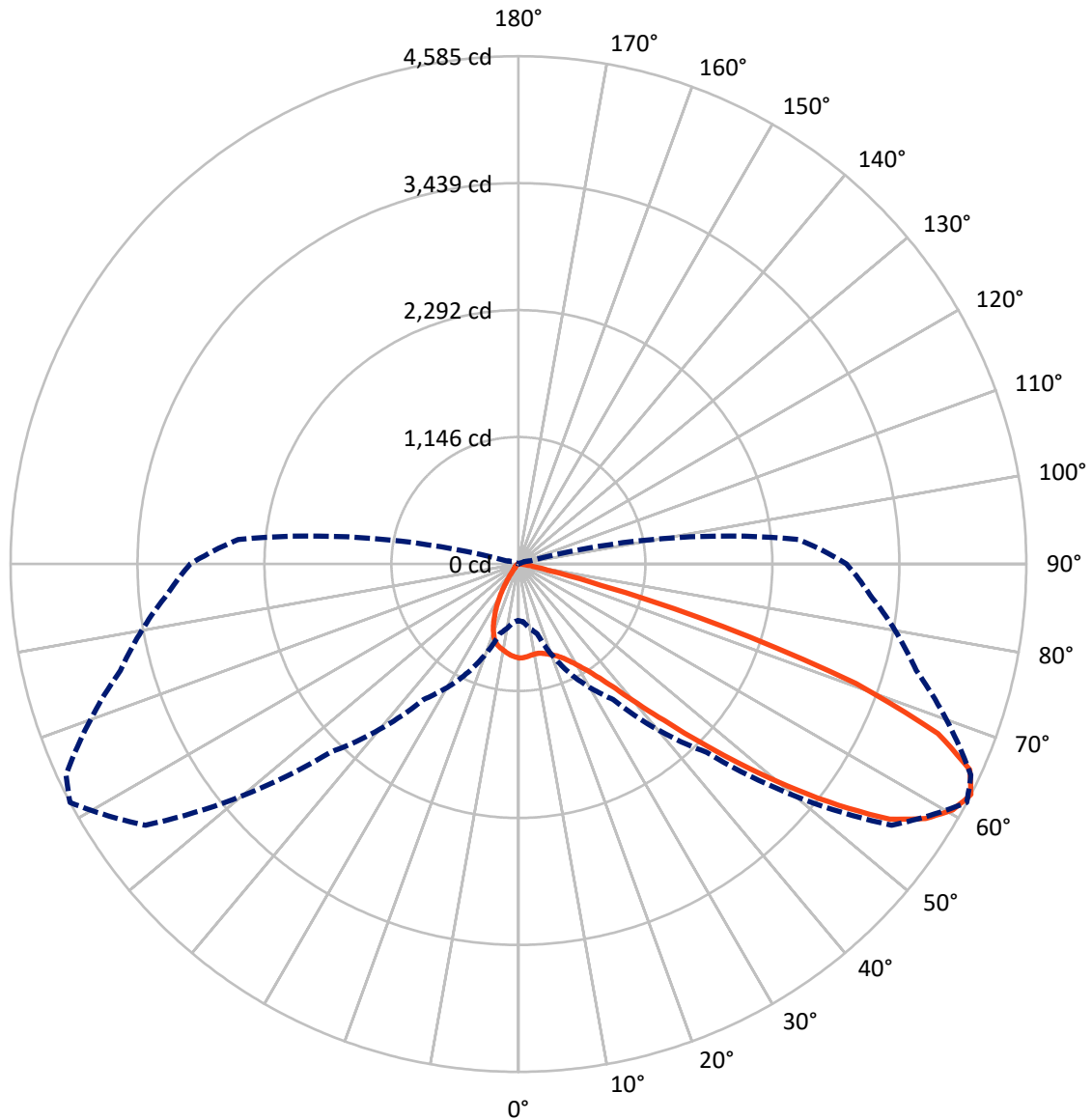
× Max cd  
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 12.1 fc  
 Type II - Short - Full Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 62-Deg Lateral    - - - Horizontal Cone Through 62.5-Deg Vertical



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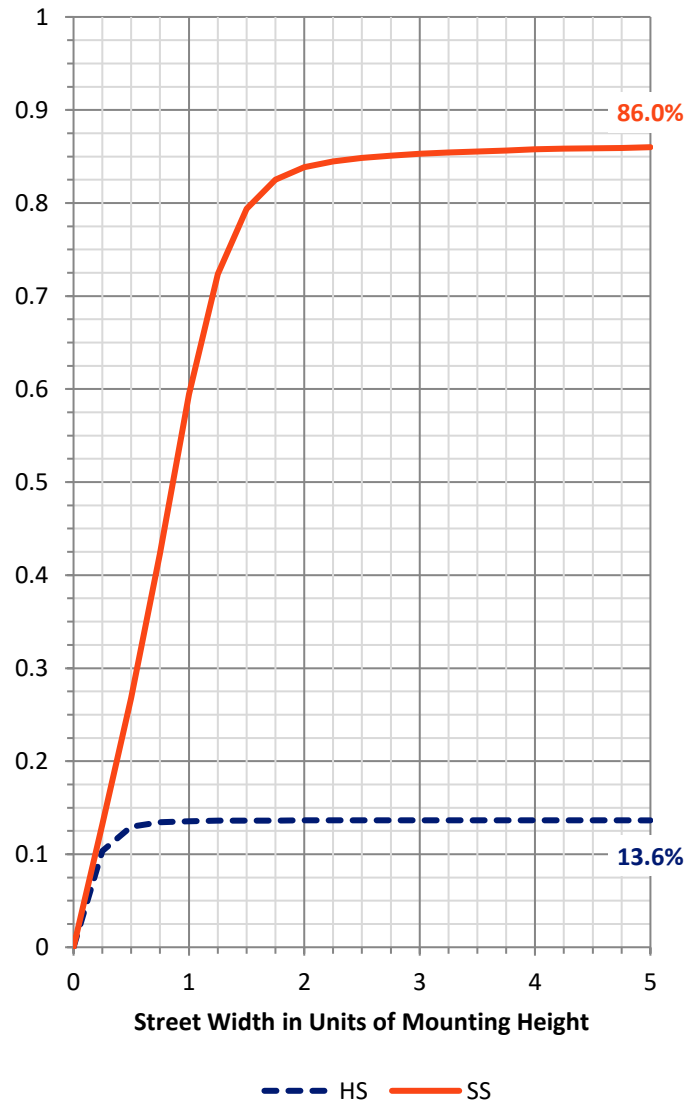
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	754.4	0.0	754.4
	% Fixture	13.8	0.0	13.8
<b>Street Side</b>	Lumens	4709.6	0.0	4709.6
	% Fixture	86.2	0.0	86.2
<b>Total</b>	Lumens	5464.0	0.0	5464.0
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	77.3	1.4
10°-20°	194.1	3.6
20°-30°	289.8	5.3
30°-40°	552.1	10.1
40°-50°	1151.3	21.1
50°-60°	1529.5	28.0
60°-70°	1192.3	21.8
70°-80°	450.6	8.2
80°-90°	27.0	0.5
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°	5464.0	100.0
0°-180°	5464.0	100.0



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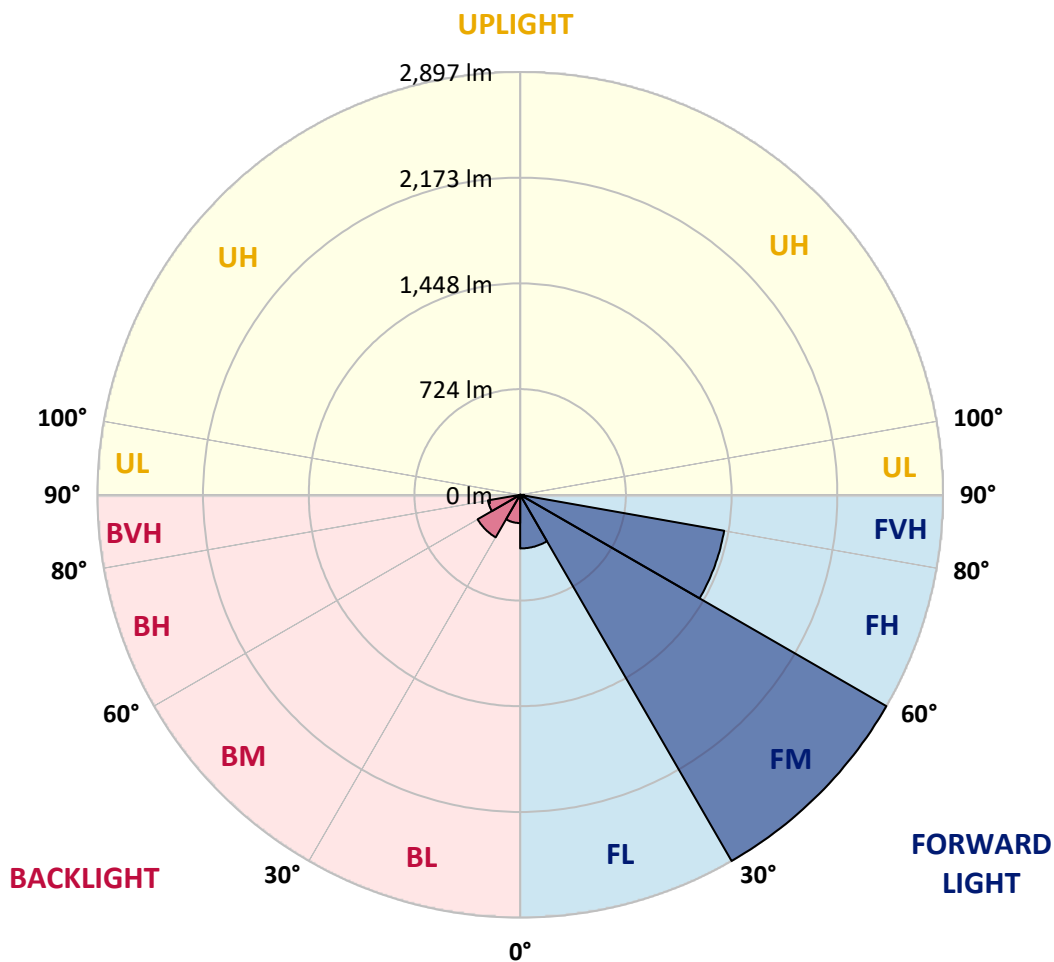
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	367.7	6.7			
FM	(30°-60°)	2897.0	53.0			
FH	(60°-80°)	1419.2	26.0			G1/1800
FVH	(80°-90°)	25.7	0.5			G1/100
BL	(0°-30°)	193.5	3.5	B1/500		
BM	(30°-60°)	335.9	6.1	B1/1000		
BH	(60°-80°)	223.8	4.1	B1/500		G1/500
BVH	(80°-90°)	1.3	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-G1**

Type II Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	62°	65°	75°	85°
0°	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9
2.5°	846.0	844.6	848.2	848.2	847.4	848.9	847.4	846.7	846.0	844.6	843.2
5°	823.9	823.9	828.9	831.0	833.2	837.5	838.9	840.3	839.6	841.0	841.7
7.5°	798.2	799.6	805.3	808.2	811.8	820.3	825.3	831.0	831.7	836.7	839.6
10°	776.8	778.2	783.9	787.5	792.5	803.9	814.6	824.6	826.0	835.3	837.5
12.5°	762.5	763.9	769.6	774.6	785.3	799.6	814.6	826.0	829.6	841.0	841.0
15°	756.8	758.2	765.3	773.9	788.2	806.8	825.3	837.5	844.6	853.9	849.6
17.5°	754.6	757.5	769.6	782.5	798.2	818.2	841.0	853.9	861.0	871.0	861.7
20°	761.1	764.6	780.3	798.2	814.6	835.3	860.3	874.6	881.7	888.1	870.3
22.5°	783.9	789.6	803.2	823.2	836.0	861.0	886.0	902.4	910.3	909.6	886.0
25°	838.9	846.0	852.4	863.2	868.9	898.9	925.3	941.7	947.4	945.3	918.1
27.5°	968.8	978.1	955.3	931.7	918.8	946.7	976.0	993.1	998.1	993.8	952.4
30°	1188.0	1188.7	1136.6	1062.3	1007.4	1004.5	1040.2	1063.1	1063.1	1054.5	1000.9
32.5°	1507.1	1484.3	1418.6	1287.2	1163.0	1098.0	1125.2	1147.3	1147.3	1136.6	1075.2
35°	1908.4	1891.2	1782.7	1624.9	1403.6	1248.0	1242.3	1263.7	1264.4	1261.5	1191.6
37.5°	2316.7	2274.6	2183.9	1994.8	1734.9	1478.6	1410.0	1425.0	1435.7	1434.3	1347.2
40°	2696.6	2654.4	2578.0	2396.0	2141.8	1818.4	1654.2	1654.2	1654.9	1647.8	1542.8
42.5°	2995.0	2975.7	2918.6	2792.2	2595.9	2353.2	1983.3	1929.1	1917.6	1910.5	1772.7
45°	3188.5	3168.5	3137.8	3111.4	3047.8	2960.7	2425.3	2283.2	2264.6	2194.7	2026.9
47.5°	3199.2	3168.5	3189.2	3289.1	3432.6	3477.6	2970.7	2695.8	2646.6	2520.2	2281.8
50°	2960.7	2963.6	3044.2	3287.0	3674.7	3931.0	3549.0	3149.9	3072.1	2819.4	2506.6
52.5°	2522.4	2550.9	2675.9	3049.2	3686.1	4220.8	4052.3	3618.3	3464.0	3087.8	2665.1
55°	1974.8	2000.5	2204.7	2608.7	3408.4	4262.2	4418.6	4066.6	3862.4	3274.8	2807.2
57.5°	1396.5	1445.0	1698.5	2069.7	2878.6	3946.0	4518.5	4335.1	4137.3	3456.9	2940.7
60°	848.9	873.2	1136.6	1568.5	2169.7	3284.1	4401.4	4506.4	4346.5	3614.7	3065.7
62.5°	510.5	524.7	651.1	1080.2	1492.9	2404.6	4111.6	4584.9	4506.4	3719.6	3185.6
65°	302.0	311.3	370.5	652.5	994.5	1475.0	3485.5	4477.1	4540.7	3810.3	3255.6
67.5°	217.8	220.6	242.0	351.3	667.5	790.3	2423.8	4084.5	4322.2	3840.3	3214.2
70°	187.8	191.3	212.0	247.0	472.6	466.2	1261.5	3232.7	3663.9	3683.9	3039.2
72.5°	142.1	148.5	182.8	232.0	339.1	331.3	475.5	1927.6	2487.4	3024.3	2620.2
75°	96.4	100.0	135.6	197.0	264.9	247.0	249.2	773.9	1216.6	1896.2	1800.6
77.5°	60.7	63.5	82.8	141.4	227.0	174.2	176.3	274.9	439.1	803.9	771.8
80°	41.4	42.8	50.0	91.4	153.5	151.4	113.5	143.5	163.5	247.7	166.3
82.5°	25.0	25.0	32.8	54.3	92.8	119.9	71.4	79.2	87.1	92.1	37.8
85°	8.6	9.3	20.0	33.6	57.1	60.0	40.7	47.1	49.3	53.5	17.8
87.5°	3.6	2.9	10.7	18.6	24.3	27.8	23.6	21.4	23.6	31.4	7.9
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°	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9	848.9
2.5°	843.9	841.0	841.0	840.3	836.0	833.9	831.7	826.0	829.6	825.3	822.5
5°	839.6	837.5	833.9	830.3	820.3	811.8	808.2	801.0	800.3	794.6	791.8
7.5°	838.9	833.9	828.2	816.0	801.0	787.5	775.3	763.2	758.2	751.8	748.2
10°	835.3	828.9	818.2	798.9	776.8	755.3	728.2	694.7	669.7	655.4	653.3
12.5°	836.0	828.9	812.5	783.9	754.6	707.5	634.7	558.3	495.5	469.1	464.8
15°	841.7	833.9	808.9	770.3	720.4	616.8	483.3	366.3	284.9	255.6	249.2
17.5°	848.9	835.3	801.0	751.1	654.7	478.3	304.1	192.1	146.4	129.9	127.1
20°	853.2	834.6	788.2	721.8	554.7	319.8	165.6	112.8	99.2	95.7	94.2
22.5°	863.9	836.7	777.5	676.1	429.1	192.8	104.9	87.8	80.0	75.7	75.0
25°	886.0	851.0	778.2	616.8	300.6	116.4	85.0	71.4	64.3	60.0	58.5
27.5°	918.1	876.7	791.8	543.3	185.6	87.8	70.7	57.8	50.0	46.4	45.7
30°	958.8	908.1	807.5	447.6	115.7	73.5	57.1	45.0	39.3	37.1	36.4
32.5°	1023.1	962.4	821.0	334.8	80.0	60.7	45.0	35.7	32.1	30.0	30.0
35°	1129.5	1055.9	843.2	224.2	63.5	48.5	36.4	29.3	26.4	25.0	25.0
37.5°	1279.4	1189.4	853.9	139.2	52.1	37.8	29.3	24.3	22.1	20.7	20.7
40°	1462.2	1351.5	838.9	86.4	43.6	30.7	24.3	20.7	18.6	17.8	17.8
42.5°	1672.8	1537.8	791.8	61.4	36.4	25.0	20.7	17.8	16.4	15.7	15.7
45°	1908.4	1742.0	706.8	51.4	30.7	21.4	17.8	15.0	14.3	13.6	13.6
47.5°	2143.3	1949.1	596.9	44.3	25.7	17.8	15.0	12.9	12.1	11.4	11.4
50°	2348.2	2130.4	480.5	38.6	21.4	15.7	12.9	10.7	10.0	9.3	9.3
52.5°	2465.2	2238.2	372.0	32.1	18.6	13.6	10.0	8.6	7.9	7.1	7.1
55°	2591.6	2328.2	277.7	27.1	15.0	11.4	7.9	6.4	5.7	5.0	5.0
57.5°	2709.4	2408.8	206.3	22.1	12.9	8.6	6.4	5.0	4.3	3.6	3.6
60°	2823.6	2477.4	152.8	17.8	10.7	7.1	5.0	3.6	2.9	2.1	2.1
62.5°	2962.9	2540.2	112.1	14.3	9.3	5.0	3.6	2.1	1.4	0.7	0.7
65°	3066.4	2572.3	84.2	10.7	7.9	3.6	2.1	1.4	0.0	0.0	0.0
67.5°	3065.7	2510.2	61.4	7.9	5.7	2.9	1.4	0.0	0.0	0.0	0.0
70°	2922.2	2321.7	42.8	6.4	4.3	2.1	0.7	0.0	0.0	0.0	0.0
72.5°	2505.9	1836.3	27.8	4.3	3.6	1.4	0.7	0.0	0.0	0.0	0.0
75°	1691.3	932.4	16.4	3.6	2.9	1.4	0.7	0.0	0.0	0.0	0.0
77.5°	723.2	366.3	8.6	2.1	2.1	0.7	0.0	0.0	0.0	0.0	0.0
80°	151.4	88.5	3.6	1.4	1.4	0.7	0.0	0.0	0.0	0.0	0.0
82.5°	25.7	12.9	1.4	1.4	0.7	0.0	0.0	0.0	0.0	0.0	0.0
85°	6.4	3.6	0.7	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	2.9	1.4	0.7	0.7	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)