

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: P399672

Luminaire Tested: **ARCH-L-PA3-170-827-U-T2U**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P399672  
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-PA3-170-827-U-T2U  
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE  
(3) 80 CRI, 2700K, 750mA LIGHT ENGINES WITH 24 LEDS AND TYPE II U OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 19143 lumens  
Efficiency: N/A  
Efficacy: 110.7 lumens/watt  
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')  
IES Classification: Type II - Short  
BUG Rating: B3 - U0 - G3

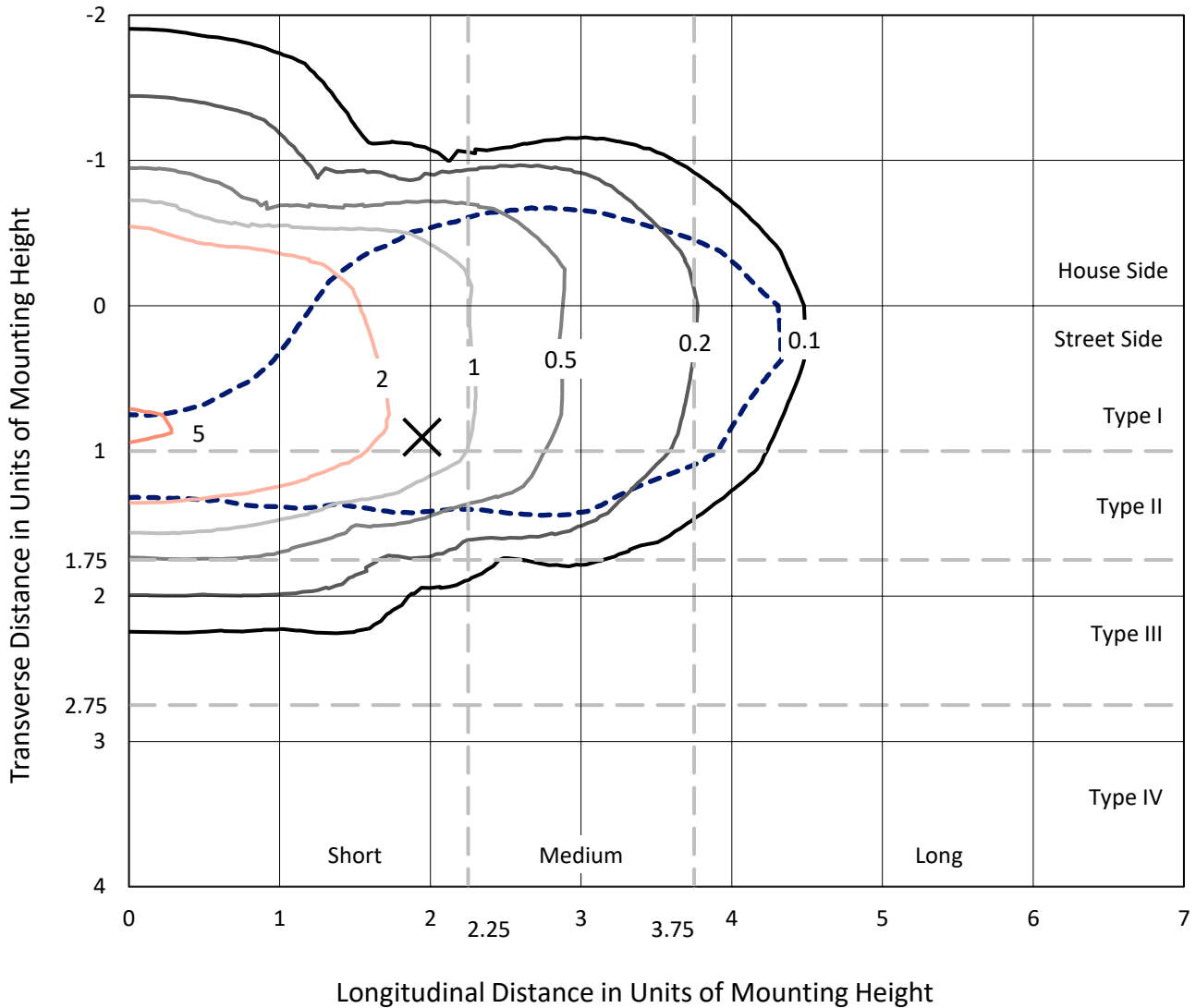
Input Watts (W): 173  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

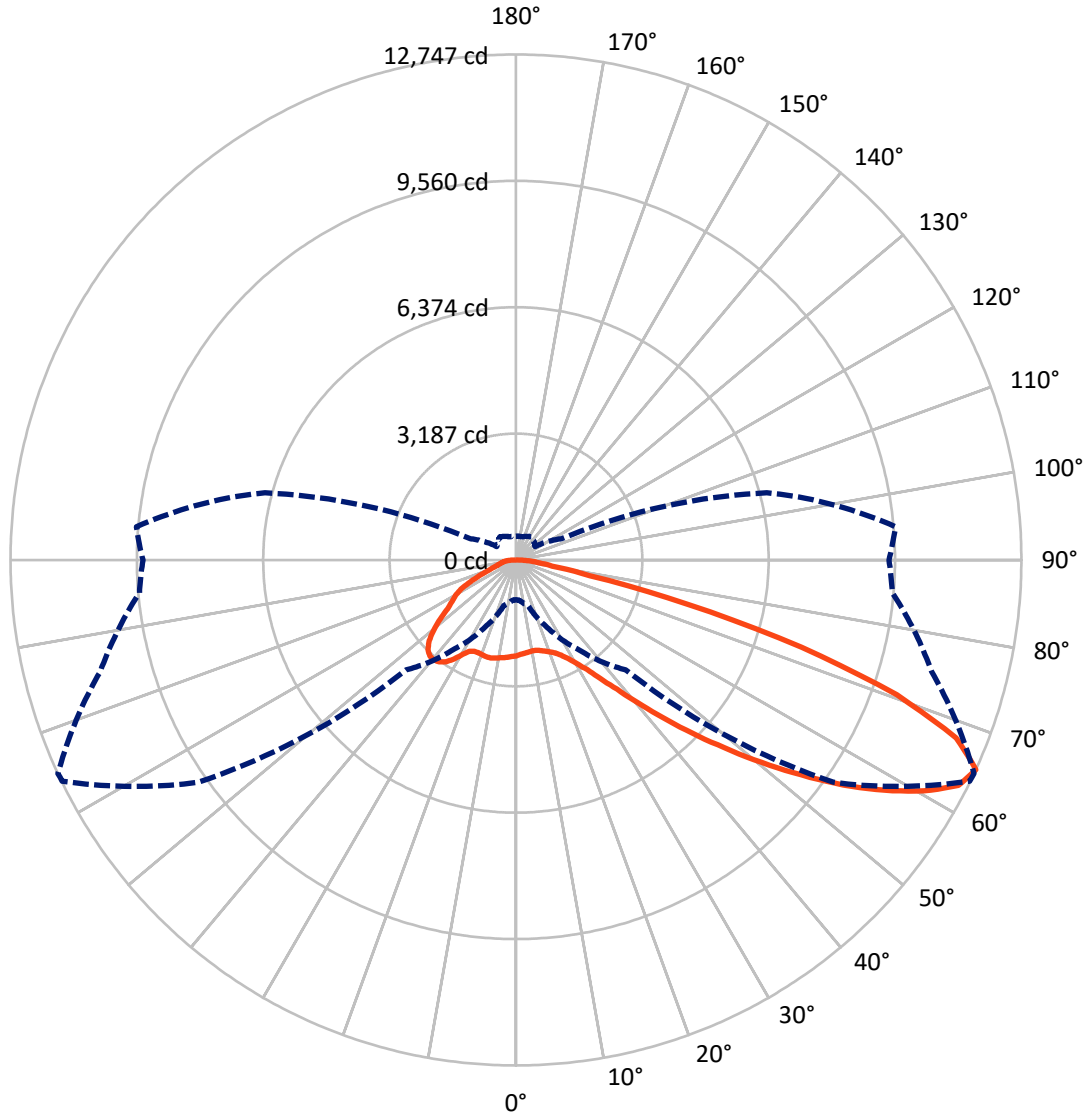
✕ Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 5.3 fc  
 Type II - Short - N/A

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### Luminous Intensity Polar Plot



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

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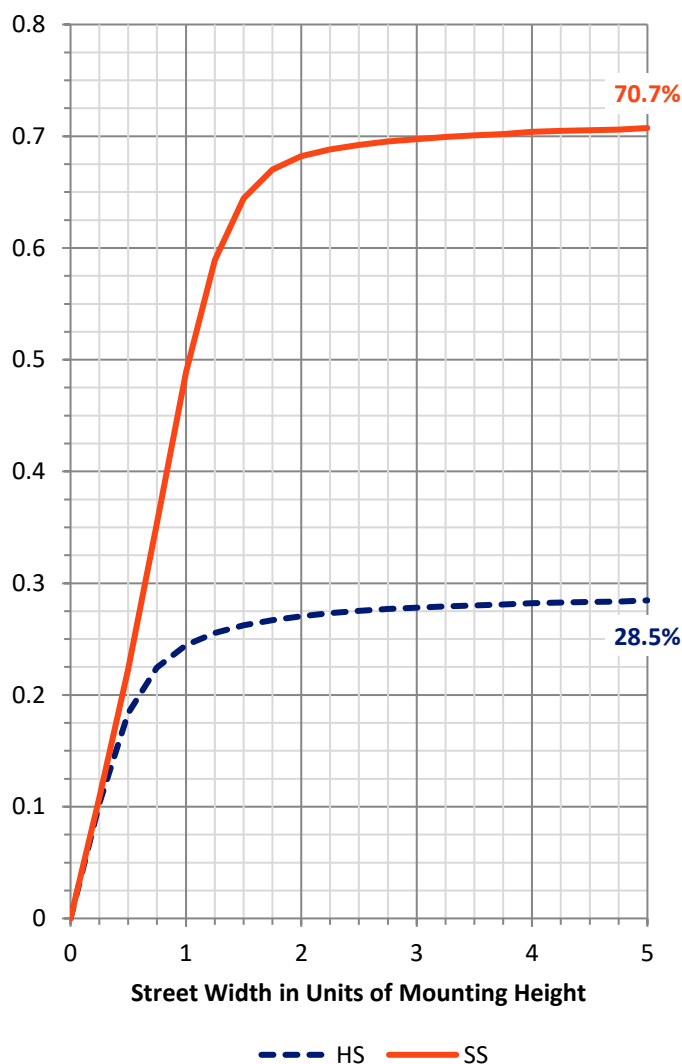
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	5534.5	0.0	5534.5
	% Fixture	28.9	0.0	28.9
<b>Street Side</b>	Lumens	13608.5	0.0	13608.5
	% Fixture	71.1	0.0	71.1
<b>Total</b>	Lumens	19143.0	0.0	19143.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	230.4	1.2
10°-20°	688.0	3.6
20°-30°	1222.2	6.4
30°-40°	2067.6	10.8
40°-50°	3599.3	18.8
50°-60°	4651.4	24.3
60°-70°	4070.2	21.3
70°-80°	2213.9	11.6
80°-90°	400.0	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°	19143.0	100.0
0°-180°	19143.0	100.0

**Coefficient of Utilization**



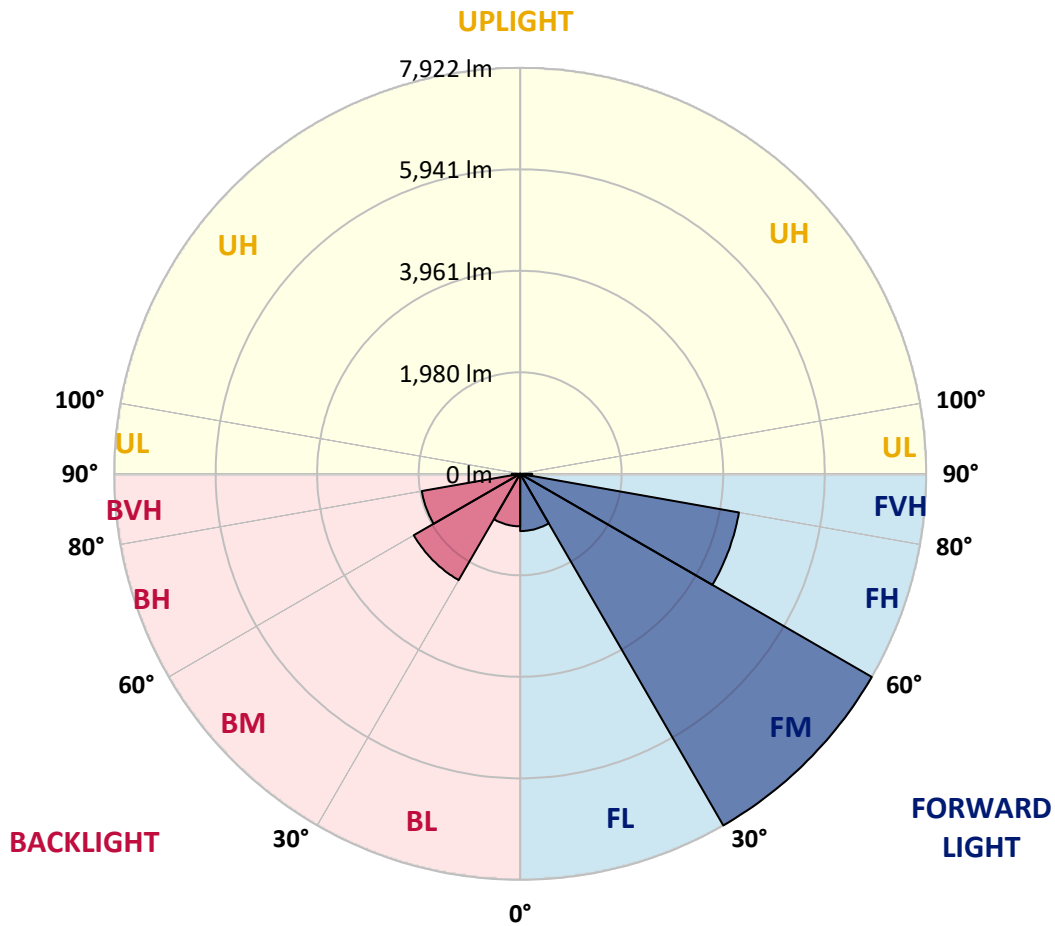
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1116.9	5.8			
FM (30°-60°)	7921.9	41.4			
FH (60°-80°)	4334.2	22.6			G2/5000
FVH (80°-90°)	235.4	1.2			G3/500
BL (0°-30°)	1023.7	5.3	B3/2500		
BM (30°-60°)	2396.3	12.5	B2/2500		
BH (60°-80°)	1949.9	10.2	B3/2500		G3/2500
BVH (80°-90°)	164.6	0.9			G2/225
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B3-U0-G3**

Type II Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	64°	65°	75°	85°
0°	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9
2.5°	2376.1	2373.5	2368.5	2373.5	2376.1	2381.1	2378.6	2383.6	2381.1	2388.7	2401.3
5°	2315.6	2310.6	2308.0	2320.6	2328.2	2340.8	2345.8	2363.5	2360.9	2373.5	2393.7
7.5°	2247.6	2247.6	2245.0	2260.2	2270.2	2292.9	2310.6	2340.8	2343.3	2366.0	2388.7
10°	2194.7	2197.2	2194.7	2207.2	2222.4	2250.1	2280.3	2323.2	2325.7	2358.4	2381.1
12.5°	2174.5	2174.5	2174.5	2192.1	2212.3	2250.1	2285.4	2330.7	2335.8	2371.0	2391.2
15°	2202.2	2204.7	2199.7	2217.3	2240.0	2285.4	2318.1	2366.0	2371.0	2403.8	2416.4
17.5°	2300.5	2310.6	2298.0	2308.0	2303.0	2338.3	2368.5	2416.4	2418.9	2446.6	2451.7
20°	2494.5	2504.6	2484.4	2471.8	2426.5	2423.9	2436.5	2474.3	2474.3	2492.0	2479.4
22.5°	2794.3	2804.4	2769.1	2721.3	2612.9	2560.0	2532.3	2549.9	2547.4	2555.0	2522.2
25°	3192.4	3189.9	3147.1	3058.9	2885.0	2756.5	2688.5	2660.8	2660.8	2645.7	2605.4
27.5°	3686.3	3648.5	3572.9	3467.1	3225.2	3046.3	2900.2	2829.6	2817.0	2771.7	2696.1
30°	4212.9	4185.2	4076.9	3923.2	3643.5	3414.2	3172.3	3031.2	3023.6	2925.4	2812.0
32.5°	4832.8	4787.4	4666.5	4482.5	4147.4	3824.9	3522.5	3308.4	3295.8	3139.5	2983.3
35°	5629.0	5591.2	5356.9	5172.9	4742.1	4318.7	3961.0	3676.2	3666.1	3474.7	3275.6
37.5°	6584.0	6485.7	6258.9	5913.7	5460.2	4958.8	4505.2	4147.4	4134.8	3923.2	3671.2
40°	7435.6	7347.4	7145.8	6828.4	6342.1	5785.2	5170.4	4737.0	4724.4	4467.4	4149.9
42.5°	8065.5	8005.1	7874.0	7690.1	7342.4	7004.7	6019.5	5450.1	5427.4	5094.8	4699.2
45°	8430.9	8383.0	8307.4	8352.8	8347.7	8284.7	7032.5	6299.2	6226.2	5795.3	5311.5
47.5°	8342.7	8299.9	8330.1	8682.9	9169.2	9534.5	8211.7	7168.5	7070.3	6508.4	5964.1
50°	7705.2	7722.9	7881.6	8556.9	9647.9	10459.2	9519.4	8158.8	8027.7	7226.5	6584.0
52.5°	6543.6	6586.5	6972.0	7916.9	9595.0	11058.9	10701.1	9181.8	9007.9	7926.9	7148.4
55°	5198.1	5306.5	5805.4	6798.1	8904.6	11101.8	11593.1	10209.8	10018.3	8584.6	7639.7
57.5°	3845.0	4006.3	4583.3	5495.4	7581.7	10424.0	12039.1	11192.5	10960.7	9237.2	8158.8
60°	2439.1	2537.3	3202.5	4278.4	5802.8	8766.0	11981.1	12029.0	11827.4	9887.3	8700.5
62.5°	1557.2	1605.0	1940.2	3051.3	4056.7	6490.7	11348.7	12661.4	12525.4	10479.4	9214.5
65°	1000.3	1020.5	1191.8	1877.2	2761.6	3918.1	9773.9	12729.5	12747.1	10849.8	9532.0
67.5°	813.9	823.9	886.9	1159.1	1952.8	2164.4	6808.2	11761.9	11976.1	10754.0	9423.6
70°	740.8	753.4	818.9	924.7	1511.8	1494.2	3295.8	9841.9	10192.1	10202.2	8942.4
72.5°	624.9	642.5	730.7	874.3	1169.1	1179.2	1395.9	7009.8	7526.3	9118.8	8219.2
75°	521.6	531.7	607.2	771.0	990.2	942.4	980.2	3716.5	4462.4	7312.1	7450.7
77.5°	423.3	433.4	488.8	614.8	879.4	733.2	771.0	1539.5	1902.4	4963.8	6090.1
80°	302.4	312.4	375.4	478.7	665.2	660.2	572.0	849.1	922.2	2683.5	3955.9
82.5°	216.7	224.3	284.7	342.7	461.1	662.7	430.9	577.0	604.7	1189.3	1595.0
85°	146.1	146.1	196.5	226.8	297.3	418.3	347.7	390.6	408.2	564.4	430.9
87.5°	63.0	63.0	105.8	115.9	156.2	194.0	259.5	196.5	201.6	304.9	176.4
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°	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9	2418.9
2.5°	2408.8	2411.3	2416.4	2431.5	2441.6	2456.7	2464.3	2474.3	2474.3	2469.3	2471.8
5°	2403.8	2411.3	2429.0	2456.7	2474.3	2502.1	2522.2	2537.3	2542.4	2537.3	2539.8
7.5°	2401.3	2413.9	2444.1	2484.4	2509.6	2544.9	2572.6	2590.2	2602.8	2597.8	2600.3
10°	2393.7	2413.9	2451.7	2502.1	2539.8	2575.1	2600.3	2607.9	2615.4	2610.4	2607.9
12.5°	2403.8	2426.5	2466.8	2527.2	2570.1	2597.8	2605.4	2592.8	2575.1	2565.0	2562.5
15°	2423.9	2446.6	2486.9	2549.9	2587.7	2597.8	2580.2	2539.8	2499.5	2476.9	2474.3
17.5°	2451.7	2466.8	2499.5	2555.0	2585.2	2572.6	2537.3	2489.5	2459.2	2441.6	2444.1
20°	2469.3	2469.3	2494.5	2537.3	2562.5	2552.4	2509.6	2456.7	2408.8	2386.1	2378.6
22.5°	2494.5	2481.9	2484.4	2522.2	2557.5	2542.4	2451.7	2358.4	2290.4	2265.2	2262.7
25°	2562.5	2527.2	2504.6	2527.2	2610.4	2486.9	2305.5	2197.2	2134.2	2111.5	2114.0
27.5°	2645.7	2597.8	2549.9	2587.7	2653.2	2360.9	2119.1	1995.6	1957.8	1940.2	1947.7
30°	2728.8	2665.8	2602.8	2738.9	2623.0	2164.4	1879.7	1758.7	1726.0	1713.4	1723.5
32.5°	2882.5	2779.2	2703.6	2940.5	2529.8	1940.2	1620.2	1509.3	1479.1	1463.9	1458.9
35°	3139.5	3008.5	2932.9	3116.9	2398.7	1690.7	1383.3	1305.2	1272.4	1239.7	1234.6
37.5°	3509.9	3351.2	3283.2	3217.6	2214.8	1443.8	1201.9	1149.0	1101.1	1050.7	1048.2
40°	3953.4	3746.8	3696.4	3263.0	1960.3	1212.0	1075.9	1025.5	965.0	917.2	919.7
42.5°	4464.9	4200.3	4092.0	3250.4	1645.4	1088.5	985.2	929.8	876.9	834.0	831.5
45°	5011.7	4711.8	4462.4	3162.2	1332.9	1002.8	929.8	864.3	811.3	763.5	758.4
47.5°	5616.4	5281.3	4805.0	2990.9	1101.1	942.4	897.0	803.8	755.9	725.7	725.7
50°	6226.2	5825.5	5120.0	2731.3	965.0	897.0	849.1	771.0	733.2	708.0	708.0
52.5°	6747.7	6392.5	5379.5	2421.4	879.4	859.2	816.4	755.9	715.6	692.9	690.4
55°	7254.2	6919.1	5611.3	2114.0	808.8	808.8	808.8	743.3	698.0	677.8	675.3
57.5°	7758.1	7473.4	5853.2	1912.4	745.8	766.0	793.7	728.2	682.8	665.2	662.7
60°	8327.6	8138.6	6132.9	1771.3	690.4	720.6	773.5	710.6	657.6	642.5	640.0
62.5°	8932.3	8932.3	6387.4	1572.3	640.0	682.8	743.3	687.9	635.0	622.4	619.8
65°	9406.0	9610.1	6551.2	1275.0	589.6	645.0	708.0	657.6	604.7	602.2	597.2
67.5°	9461.4	9781.4	6447.9	962.5	544.3	604.7	672.8	624.9	574.5	574.5	566.9
70°	9063.3	9388.4	6125.4	720.6	511.5	564.4	627.4	584.6	536.7	541.7	529.1
72.5°	8398.1	8478.8	5324.1	569.4	473.7	521.6	572.0	539.2	496.4	496.4	478.7
75°	7521.3	7072.8	3867.7	476.2	428.3	471.2	516.5	488.8	451.0	438.4	428.3
77.5°	5986.8	5125.0	2247.6	410.7	390.6	423.3	453.5	433.4	400.6	372.9	372.9
80°	3648.5	3003.5	992.8	355.3	345.2	370.4	390.6	367.9	340.2	312.4	304.9
82.5°	1388.3	1159.1	481.3	304.9	302.4	317.5	332.6	309.9	289.8	277.2	239.4
85°	380.5	350.2	330.1	254.5	249.4	246.9	264.6	254.5	226.8	186.5	166.3
87.5°	143.6	163.8	178.9	156.2	166.3	153.7	176.4	161.3	143.6	93.2	83.1
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)