

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: P400081

Luminaire Tested: **ARCH-L-PA3-230-740-U-T4W**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P400081  
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-PA3-230-740-U-T4W  
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE  
(3) 70 CRI, 4000K, 980mA LIGHT ENGINES WITH 24 LEDS AND TYPE IV WIDE OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 31598 lumens  
Efficiency: N/A  
Efficacy: 138.0 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

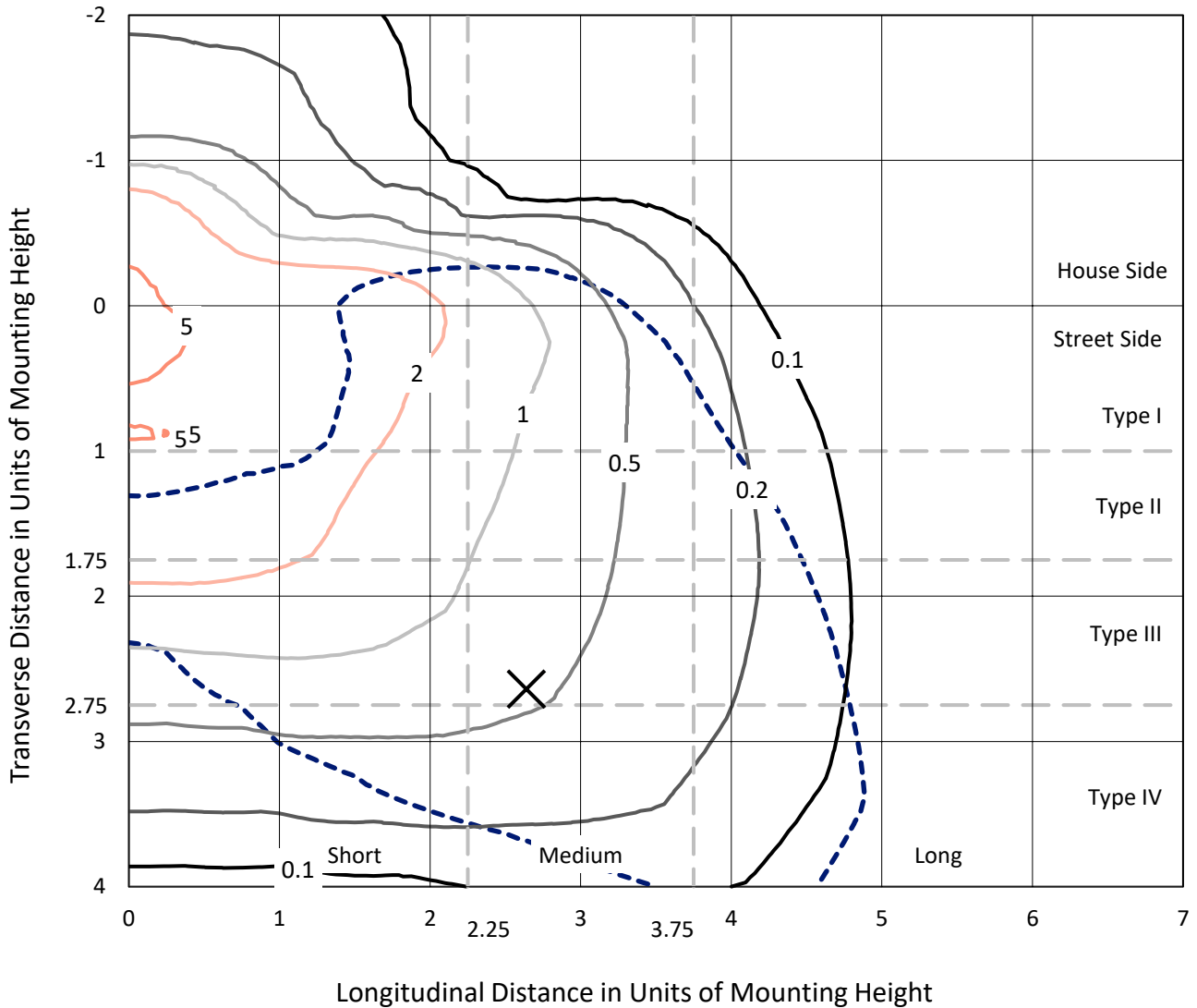
Input Watts (W): 229  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

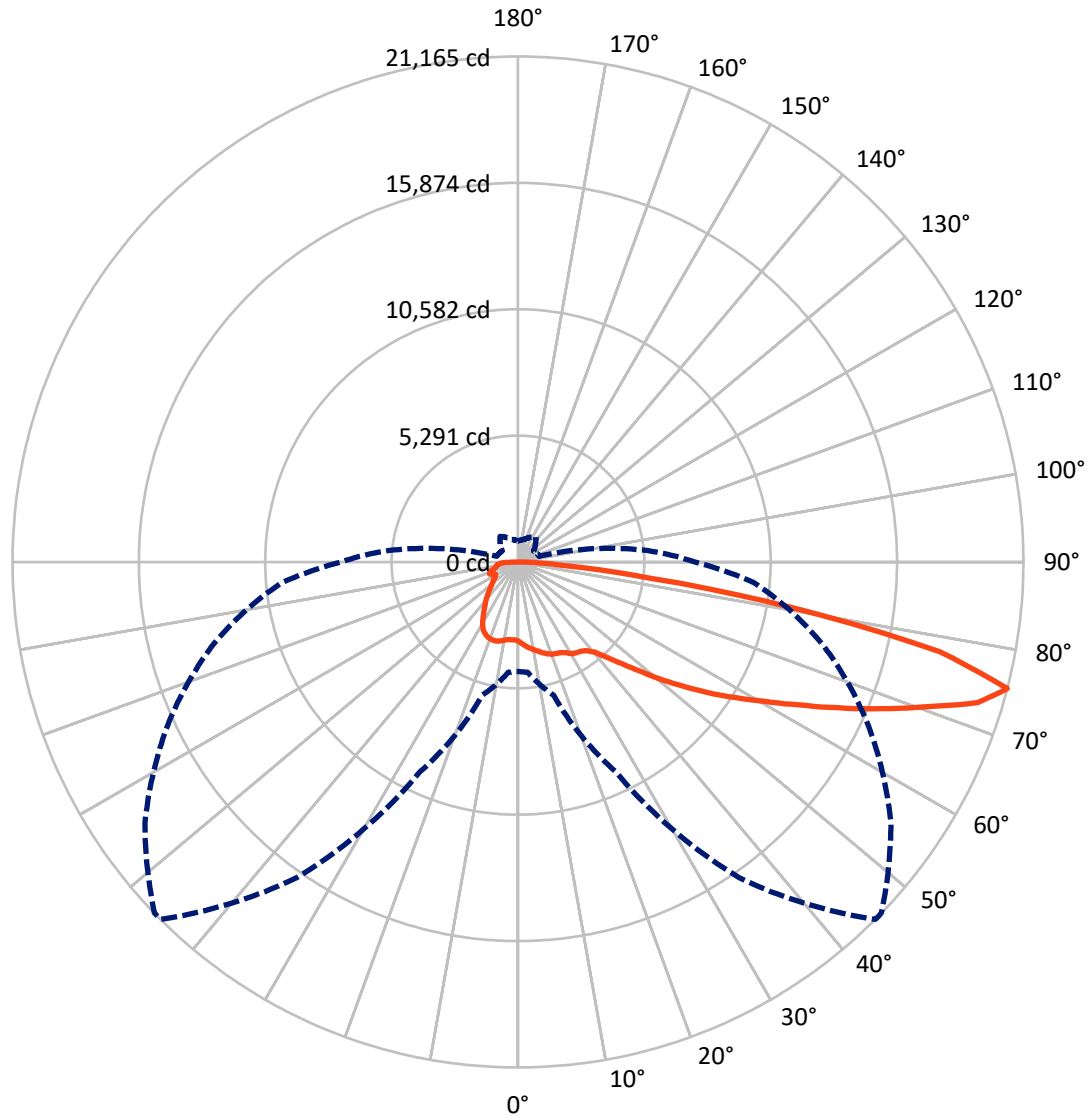
✕ Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 6.3 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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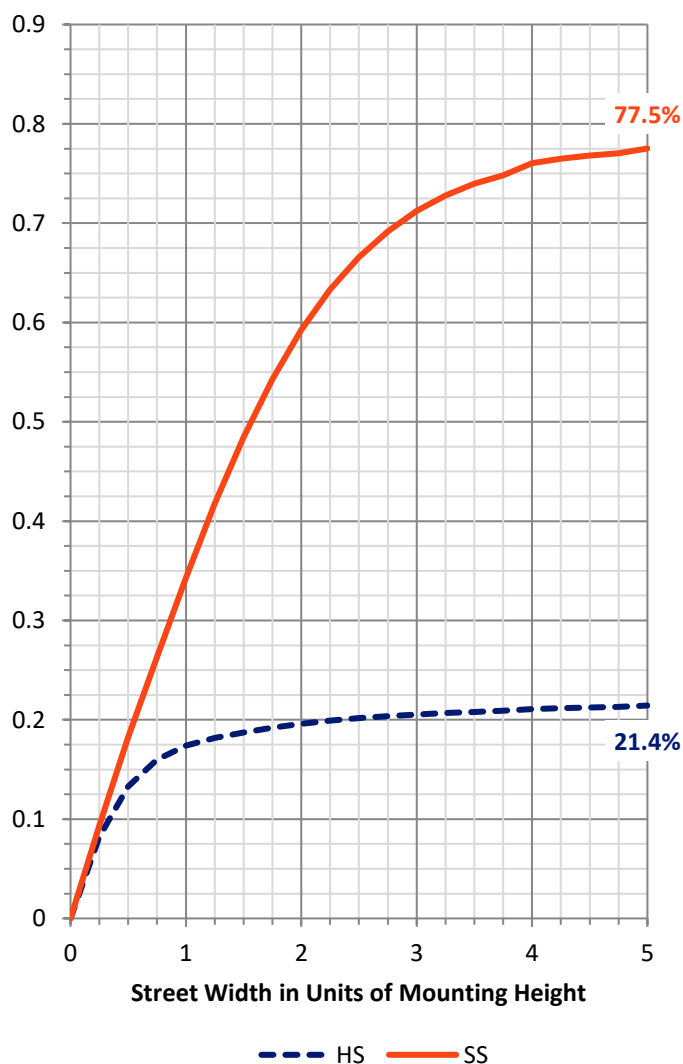
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	6983.0	0.0	6983.0
	% Fixture	22.1	0.0	22.1
<b>Street Side</b>	Lumens	24615.0	0.0	24615.0
	% Fixture	77.9	0.0	77.9
<b>Total</b>	Lumens	31598.0	0.0	31598.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	328.3	1.0
10°-20°	1044.4	3.3
20°-30°	1780.6	5.6
30°-40°	2494.8	7.9
40°-50°	3665.2	11.6
50°-60°	5833.3	18.5
60°-70°	8297.8	26.3
70°-80°	6947.8	22.0
80°-90°	1205.8	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°	31598.0	100.0
0°-180°	31598.0	100.0

**Coefficient of Utilization**



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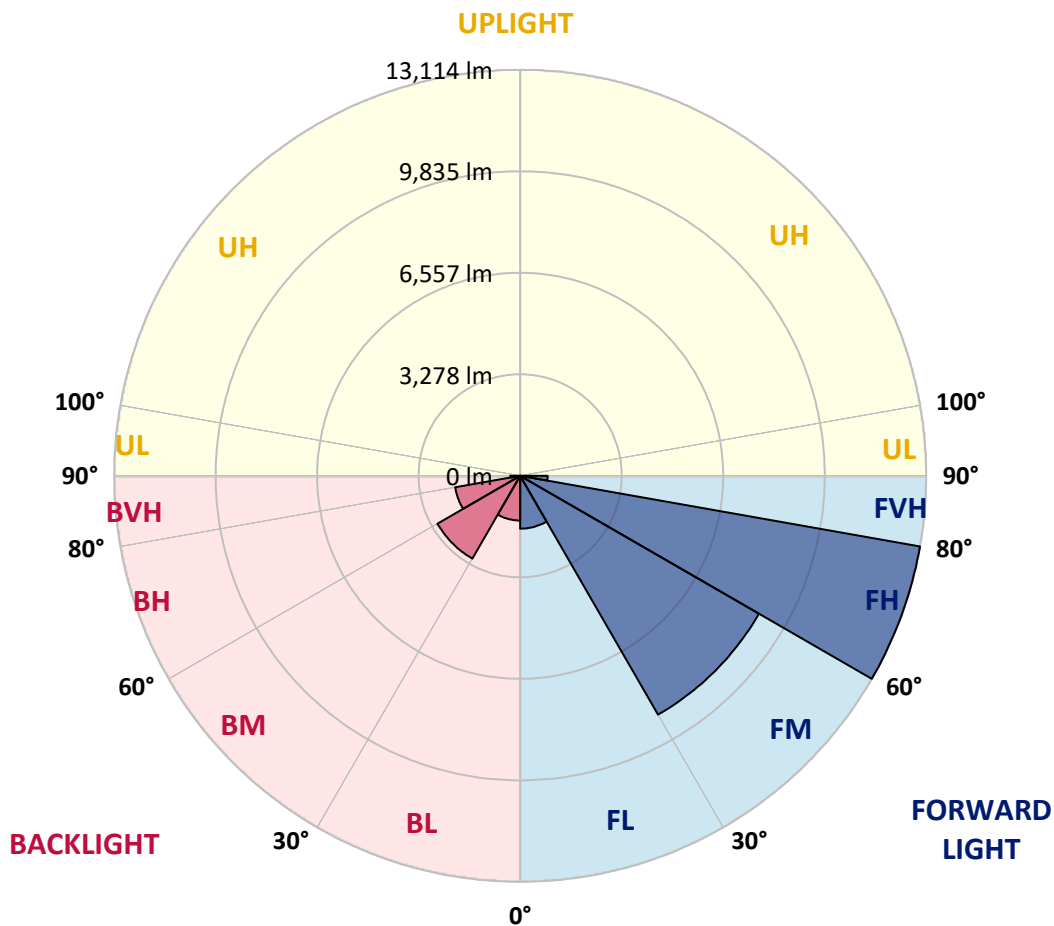
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1708.1	5.4			
FM (30°-60°)	8906.5	28.2			
FH (60°-80°)	13114.0	41.5			G5
FVH (80°-90°)	886.5	2.8			G5
BL (0°-30°)	1445.2	4.6	B3/2500		
BM (30°-60°)	3086.8	9.8	B3/5000		
BH (60°-80°)	2131.7	6.7	B3/2500		G3/2500
BVH (80°-90°)	319.3	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°	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5
2.5°	3508.5	3491.6	3483.1	3483.1	3449.4	3428.3	3424.0	3394.5	3369.1	3343.8	3322.7
5°	3711.1	3698.5	3673.1	3652.0	3605.6	3546.5	3538.0	3474.7	3411.4	3352.3	3301.6
7.5°	3896.9	3871.6	3842.0	3799.8	3723.8	3643.6	3630.9	3542.2	3453.6	3364.9	3297.4
10°	4053.1	4027.8	3985.6	3926.4	3829.3	3732.2	3719.6	3626.7	3533.8	3428.3	3331.1
12.5°	4200.9	4179.8	4116.4	4036.2	3922.2	3833.6	3820.9	3740.7	3643.6	3525.4	3398.7
15°	4327.5	4306.4	4238.9	4146.0	4015.1	3947.6	3930.7	3854.7	3757.6	3630.9	3500.0
17.5°	4390.9	4390.9	4319.1	4217.8	4095.3	4044.7	4032.0	3939.1	3850.5	3728.0	3597.1
20°	4412.0	4420.4	4369.8	4247.3	4141.8	4120.7	4108.0	4032.0	3930.7	3812.5	3690.0
22.5°	4424.6	4441.5	4399.3	4260.0	4171.3	4158.7	4150.2	4099.5	4019.3	3905.3	3782.9
25°	4466.9	4466.9	4437.3	4281.1	4209.3	4205.1	4205.1	4175.5	4120.7	4023.6	3901.1
27.5°	4530.2	4526.0	4488.0	4327.5	4293.8	4306.4	4302.2	4298.0	4260.0	4162.9	4032.0
30°	4635.7	4635.7	4593.5	4420.4	4399.3	4454.2	4458.4	4466.9	4407.8	4255.8	4150.2
32.5°	4796.2	4779.3	4737.1	4513.3	4479.5	4530.2	4538.6	4534.4	4483.7	4340.2	4289.5
35°	5290.1	5252.2	5100.2	4720.2	4551.3	4580.9	4585.1	4606.2	4614.6	4500.6	4475.3
37.5°	6155.7	6105.0	5872.8	5209.9	4779.3	4707.5	4703.3	4758.2	4804.6	4703.3	4703.3
40°	7097.2	7054.9	6919.8	6054.3	5201.5	4965.1	4948.2	4998.8	5057.9	4986.2	5007.3
42.5°	7907.8	7941.6	7954.2	6949.4	5834.8	5446.4	5399.9	5328.1	5421.0	5357.7	5442.1
45°	8515.7	8498.9	8731.1	7865.6	6653.9	6050.1	5986.8	5792.6	5910.8	5906.6	6092.3
47.5°	9161.7	9132.2	9229.3	8726.8	7586.9	6789.0	6691.8	6404.8	6582.1	6704.5	7012.7
50°	9773.9	9782.3	9816.1	9406.6	8600.2	7688.2	7565.8	7181.6	7434.9	7692.5	8127.3
52.5°	10571.9	10512.7	10470.5	10200.3	9735.9	8625.5	8545.3	8106.2	8460.9	8764.8	9343.3
55°	11268.5	11230.5	11205.2	11192.5	10685.8	9659.9	9575.5	9119.5	9630.4	9845.7	10698.5
57.5°	12011.6	11990.4	12125.5	12340.9	12138.2	10711.2	10622.5	10183.4	10753.4	10905.4	12167.8
60°	12556.2	12568.9	12940.4	13489.2	13349.9	11851.1	11745.6	11357.1	11846.9	11982.0	13637.0
62.5°	12560.4	12687.1	13548.4	14532.1	14692.5	13164.2	13041.7	12619.5	12969.9	12969.9	14954.3
65°	11361.4	11504.9	13438.6	14789.6	16052.0	14726.3	14608.1	13945.2	14076.1	13898.8	16191.3
67.5°	10166.5	10335.4	12155.1	14810.7	17006.2	16398.2	16258.9	15270.9	15047.2	14599.6	17056.8
70°	9372.8	9491.0	11010.9	14536.3	17580.4	18146.1	18040.5	16529.1	15811.3	15186.5	16875.3
72.5°	7890.9	7848.7	9301.0	13231.7	17901.2	20130.4	20041.8	17897.0	16474.2	14907.8	14392.8
75°	4580.9	4631.5	5771.5	9693.7	16136.4	21164.8	21156.4	19066.5	16182.9	13168.4	9917.4
77.5°	1321.5	1359.5	1895.7	4260.0	10204.5	18053.2	18631.6	17436.8	13679.2	9385.5	5142.4
80°	578.4	608.0	823.3	1418.6	4395.1	11792.0	12298.6	11792.0	8249.8	4306.4	2018.1
82.5°	342.0	363.1	536.2	878.2	2106.8	5611.0	6295.0	5497.0	3559.1	1828.1	836.0
85°	194.2	202.7	308.2	557.3	1325.7	1963.2	2203.9	2064.6	1735.2	1038.6	439.1
87.5°	88.7	92.9	152.0	261.8	743.1	662.9	688.2	911.9	1004.8	633.3	219.5
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°	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5	3318.5
2.5°	3314.3	3301.6	3276.3	3267.8	3255.2	3259.4	3263.6	3263.6	3267.8	3255.2	3255.2
5°	3280.5	3259.4	3234.0	3234.0	3234.0	3267.8	3297.4	3314.3	3322.7	3322.7	3314.3
7.5°	3267.8	3242.5	3212.9	3221.4	3229.8	3272.0	3326.9	3381.8	3398.7	3398.7	3390.3
10°	3293.1	3267.8	3246.7	3259.4	3280.5	3314.3	3356.5	3407.1	3449.4	3453.6	3449.4
12.5°	3352.3	3322.7	3301.6	3326.9	3352.3	3373.4	3394.5	3415.6	3470.5	3478.9	3478.9
15°	3449.4	3419.8	3394.5	3415.6	3424.0	3424.0	3424.0	3424.0	3478.9	3487.4	3487.4
17.5°	3546.5	3521.1	3495.8	3500.0	3474.7	3440.9	3428.3	3424.0	3453.6	3478.9	3483.1
20°	3639.4	3618.2	3592.9	3550.7	3487.4	3424.0	3402.9	3402.9	3419.8	3457.8	3457.8
22.5°	3740.7	3715.3	3673.1	3576.0	3470.5	3381.8	3360.7	3373.4	3394.5	3445.1	3440.9
25°	3854.7	3820.9	3749.1	3567.6	3415.6	3310.0	3314.3	3352.3	3390.3	3445.1	3445.1
27.5°	3981.3	3934.9	3791.3	3500.0	3293.1	3191.8	3229.8	3318.5	3373.4	3432.5	3440.9
30°	4120.7	4078.4	3825.1	3381.8	3094.7	3001.8	3094.7	3238.3	3322.7	3377.6	3390.3
32.5°	4289.5	4255.8	3854.7	3229.8	2837.2	2757.0	2892.1	3069.4	3204.5	3267.8	3280.5
35°	4500.6	4466.9	3892.7	3056.7	2596.5	2512.1	2634.5	2816.1	2993.4	3073.6	3098.9
37.5°	4775.1	4724.4	3926.4	2871.0	2393.9	2296.8	2355.9	2520.5	2681.0	2790.7	2820.3
40°	5125.5	5045.3	3956.0	2659.9	2216.5	2106.8	2127.9	2208.1	2301.0	2398.1	2436.1
42.5°	5619.5	5459.0	3960.2	2436.1	2035.0	1933.7	1925.2	1950.6	1950.6	1950.6	1963.2
45°	6307.6	6003.7	3968.7	2225.0	1849.2	1743.7	1718.3	1709.9	1646.6	1524.1	1515.7
47.5°	7177.4	6717.2	4006.7	2047.7	1655.0	1562.1	1528.4	1494.6	1376.4	1249.7	1224.4
50°	8292.0	7544.7	4082.7	1878.8	1490.4	1427.0	1384.8	1304.6	1173.7	1076.6	1051.3
52.5°	9575.5	8528.4	4154.4	1701.5	1367.9	1325.7	1275.0	1177.9	1038.6	979.5	971.1
55°	11048.9	9626.1	4298.0	1545.2	1262.4	1232.8	1186.4	1093.5	987.9	945.7	941.5
57.5°	12556.2	10854.7	4500.6	1405.9	1161.0	1144.2	1144.2	1063.9	996.4	979.5	979.5
60°	14008.6	11910.2	4344.4	1275.0	1068.2	1076.6	1156.8	1135.7	1085.1	1106.2	1118.8
62.5°	15135.8	12530.9	3525.4	1169.5	1000.6	1076.6	1283.5	1283.5	1224.4	1215.9	1215.9
65°	15617.1	12522.4	2478.3	1089.3	975.3	1182.2	1431.3	1363.7	1207.5	1148.4	1135.7
67.5°	15494.7	11973.6	1709.9	1034.4	966.8	1291.9	1498.8	1308.8	1131.5	1080.8	1042.8
70°	14418.1	10812.5	1317.3	983.7	954.2	1245.5	1477.7	1245.5	1072.4	1025.9	992.2
72.5°	11631.6	8672.0	1093.5	933.1	903.5	1152.6	1405.9	1186.4	1025.9	975.3	941.5
75°	7418.0	5454.8	924.6	865.5	806.4	1034.4	1308.8	1127.3	975.3	907.7	882.4
77.5°	3567.6	2351.6	806.4	785.3	726.2	958.4	1211.7	1051.3	907.7	852.8	836.0
80°	1443.9	1076.6	700.8	705.1	667.1	911.9	1144.2	979.5	840.2	781.1	751.5
82.5°	751.5	624.9	591.1	608.0	608.0	869.7	1093.5	920.4	781.1	755.7	658.6
85°	405.3	388.4	456.0	489.8	527.7	785.3	1017.5	857.1	713.5	612.2	591.1
87.5°	198.4	253.3	257.5	295.5	367.3	629.1	857.1	717.7	595.3	494.0	485.5
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)