

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: P572846

Luminaire Tested: **ARCH-S-PA2-120-750-U-T3-HSS**

Issue Date: 10/13/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P572846  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2108-332-18)  
Test Lab: INNOVATION CENTER  
Issue Date: 10/13/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-S-PA2-120-750-U-T3-HSS  
Description: ARCHEON ROADWAY AND AREA LUMINAIRE  
(2) 70 CRI, 5000K, 1200mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE III OPTICS WITH HOUSE SIDE SHIELD  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 11632 lumens  
Efficiency: N/A  
Efficacy: 95.0 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')  
IES Classification: Type III - Short  
BUG Rating: B1 - U0 - G2

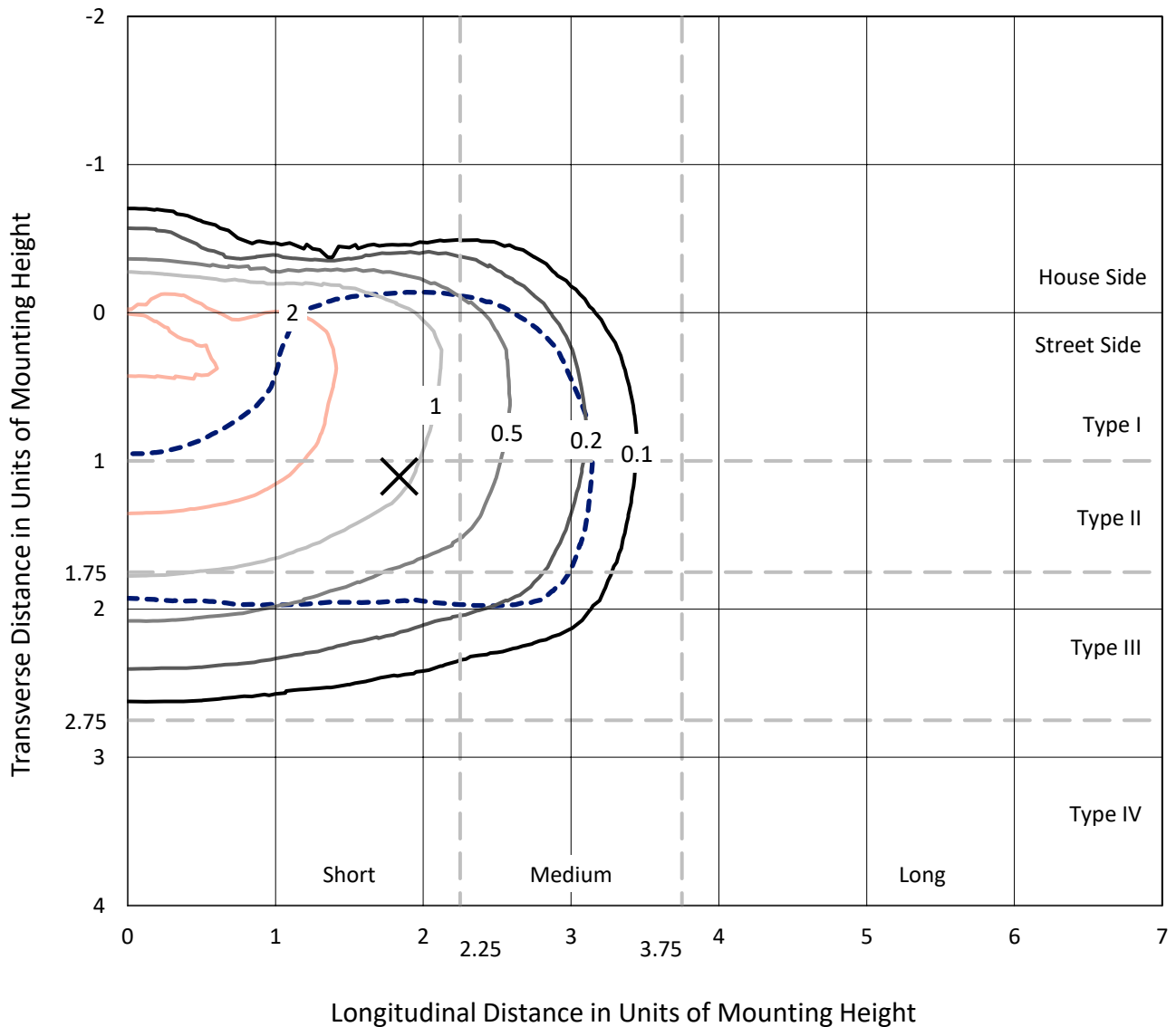
Input Watts (W): 122.4  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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### Iso-Footcandle Lines of Horizontal Illumination

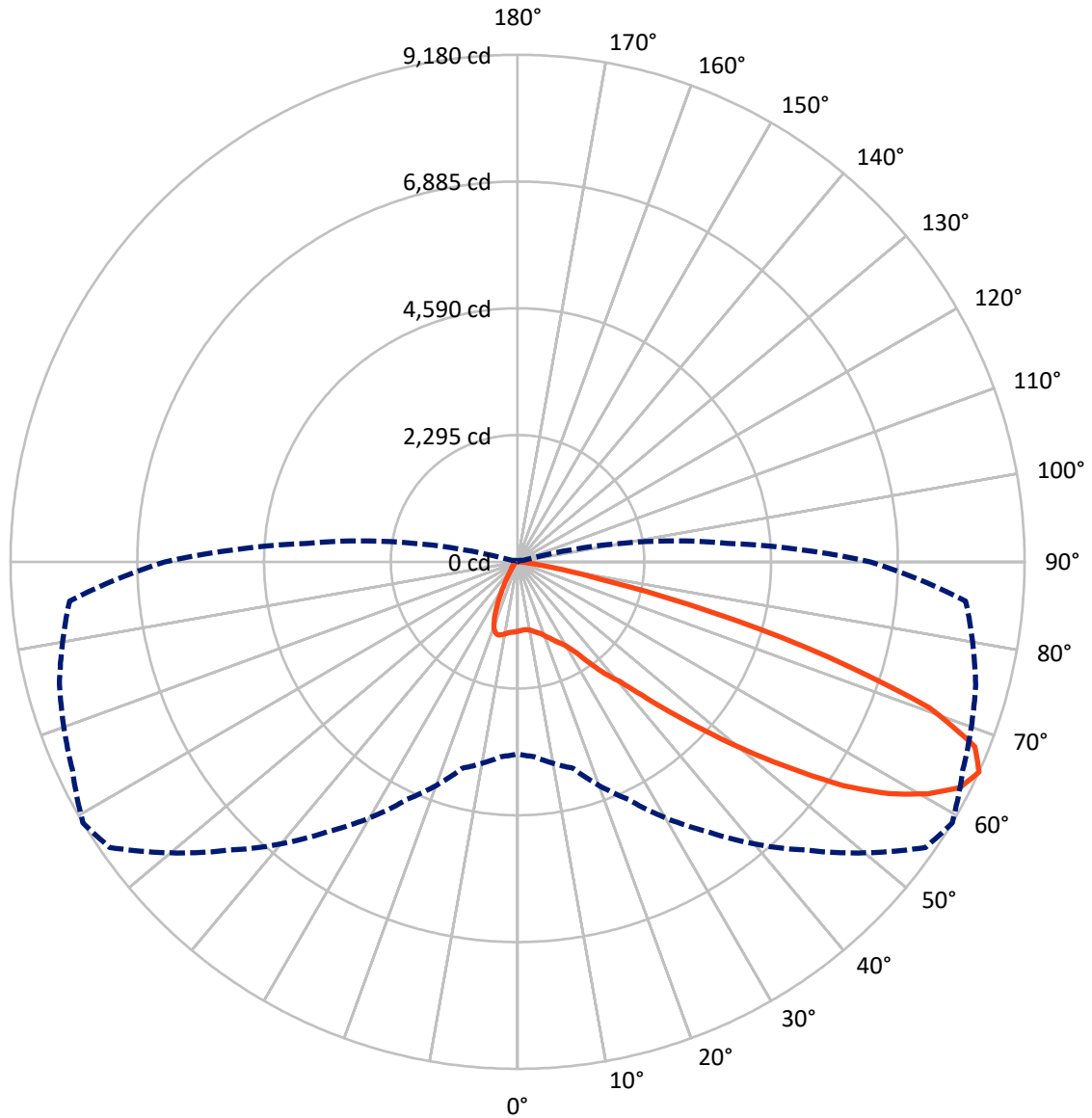
× Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 2.8 fc  
 Type III - Short - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 59-Deg Lateral      - - - Horizontal Cone Through 65-Deg Vertical

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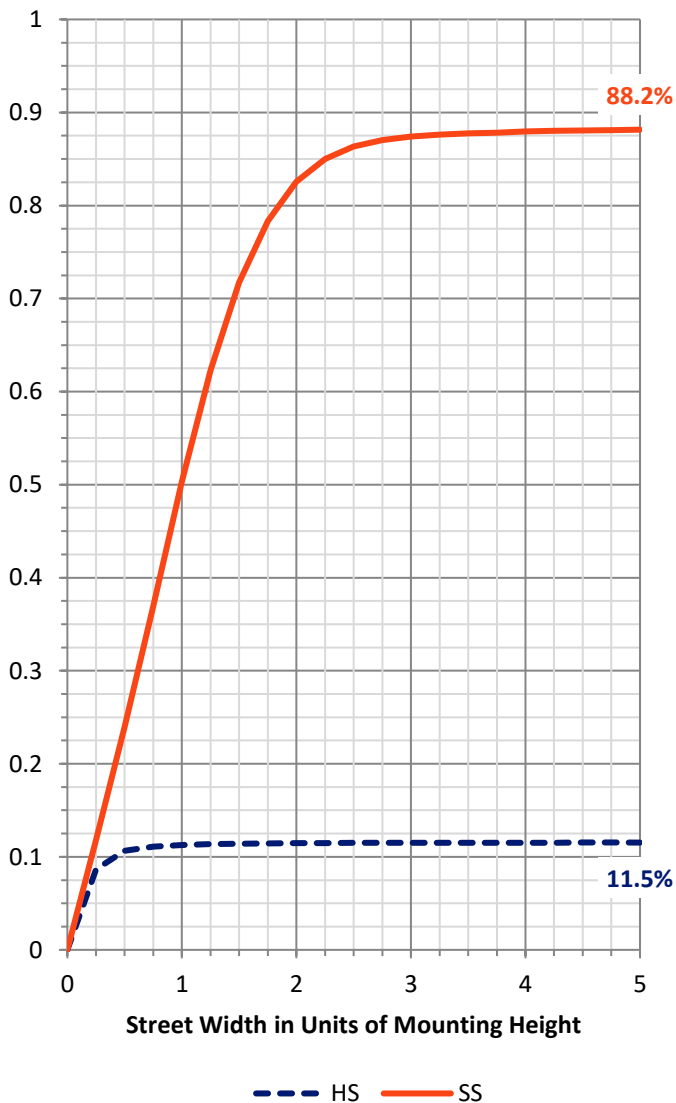
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	1357.0	0.0	1357.0
	% Fixture	11.7	0.0	11.7
<b>Street Side</b>	Lumens	10275.0	0.0	10275.0
	% Fixture	88.3	0.0	88.3
<b>Total</b>	Lumens	11632.0	0.0	11632.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	118.8	1.0
10°-20°	337.4	2.9
20°-30°	573.1	4.9
30°-40°	1015.2	8.7
40°-50°	1915.1	16.5
50°-60°	3240.3	27.9
60°-70°	3368.9	29.0
70°-80°	1010.2	8.7
80°-90°	53.0	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°	11632.0	100.0
0°-180°	11632.0	100.0

**Coefficient of Utilization**

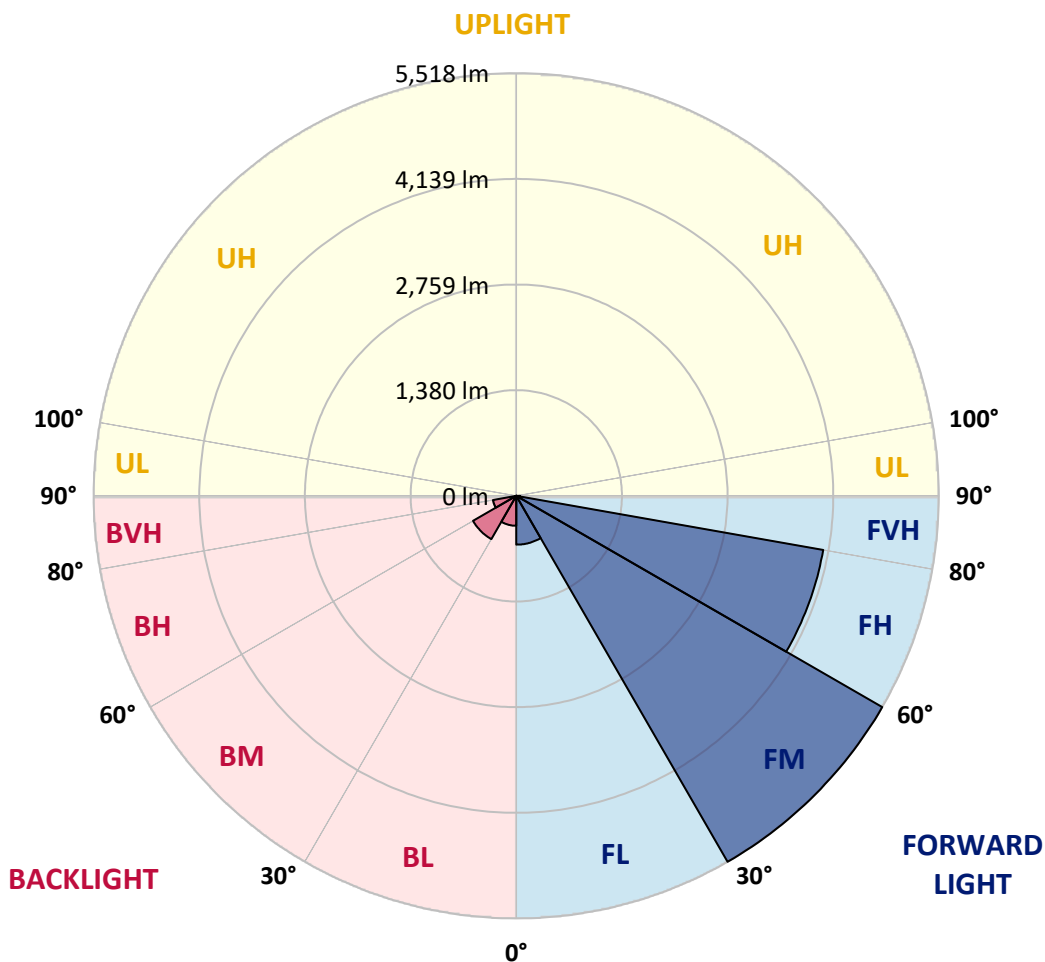


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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	637.9	5.5			
FM	(30°-60°)	5518.3	47.4			
FH	(60°-80°)	4070.4	35.0			G2/5000
FVH	(80°-90°)	48.5	0.4			G1/100
BL	(0°-30°)	391.4	3.4	B1/500		
BM	(30°-60°)	652.3	5.6	B1/1000		
BH	(60°-80°)	308.8	2.7	B1/500		G1/500
BVH	(80°-90°)	4.5	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-G2**  
 Type III Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	59°	65°	75°	85°
0°	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0
2.5°	1223.1	1218.9	1218.9	1227.3	1231.6	1235.8	1244.3	1244.3	1244.3	1252.7	1257.0
5°	1163.8	1163.8	1168.1	1176.5	1193.5	1206.2	1231.6	1235.8	1240.0	1261.2	1269.6
7.5°	1125.8	1125.8	1130.0	1146.9	1168.1	1197.7	1231.6	1240.0	1252.7	1282.3	1303.5
10°	1121.5	1117.3	1125.8	1142.7	1168.1	1206.2	1244.3	1257.0	1282.3	1320.4	1350.1
12.5°	1134.2	1130.0	1138.5	1155.4	1180.8	1218.9	1269.6	1290.8	1320.4	1371.2	1413.5
15°	1142.7	1138.5	1146.9	1168.1	1197.7	1244.3	1303.5	1328.9	1367.0	1438.9	1481.3
17.5°	1168.1	1163.8	1168.1	1185.0	1214.6	1265.4	1341.6	1367.0	1430.5	1510.9	1557.4
20°	1282.3	1278.1	1252.7	1244.3	1248.5	1295.0	1392.4	1434.7	1510.9	1612.5	1646.3
22.5°	1519.3	1502.4	1455.9	1379.7	1328.9	1345.8	1455.9	1502.4	1604.0	1718.3	1743.7
25°	1836.8	1824.1	1756.3	1625.2	1481.3	1438.9	1527.8	1591.3	1714.0	1841.0	1832.5
27.5°	2196.5	2171.1	2107.6	1925.6	1731.0	1591.3	1616.7	1671.7	1807.1	1942.6	1900.2
30°	2509.7	2501.2	2429.3	2276.9	2048.4	1841.0	1752.1	1781.7	1904.5	2048.4	1997.6
32.5°	2797.5	2772.1	2712.8	2568.9	2357.3	2145.7	1968.0	1968.0	2069.5	2238.8	2162.6
35°	3114.9	3097.9	3026.0	2882.1	2679.0	2429.3	2268.4	2251.5	2336.2	2526.6	2361.5
37.5°	3440.8	3398.4	3364.6	3216.4	3013.3	2797.5	2602.8	2564.7	2607.0	2746.7	2543.5
40°	3847.0	3847.0	3770.9	3635.4	3445.0	3216.4	2945.6	2848.2	2835.6	3017.5	2860.9
42.5°	4321.0	4308.3	4244.9	4117.9	3935.9	3724.3	3381.5	3292.6	3284.2	3504.2	3318.0
45°	4867.0	4858.5	4782.3	4676.5	4549.6	4316.8	3978.2	3889.4	3838.6	4092.5	3872.4
47.5°	5366.4	5336.8	5311.4	5324.1	5252.1	4989.7	4672.3	4566.5	4562.3	4761.2	4477.6
50°	5709.2	5692.3	5781.1	5865.8	6001.2	5836.2	5459.5	5366.4	5294.4	5556.8	5108.2
52.5°	5933.5	5925.0	6102.8	6344.0	6623.3	6610.6	6276.3	6221.3	6162.0	6234.0	5671.1
55°	6022.4	6022.4	6234.0	6678.4	7169.3	7380.9	7224.3	7148.1	6940.8	6792.6	6289.0
57.5°	5916.6	5903.9	6179.0	6758.8	7507.9	7943.8	8011.5	7922.6	7596.7	7431.7	6974.6
60°	5468.0	5476.4	5802.3	6534.5	7482.5	8172.3	8608.2	8527.8	8201.9	7956.5	7550.2
62.5°	4630.0	4701.9	5044.7	5840.4	6940.8	7990.3	8951.0	8993.4	8642.1	8337.4	8062.3
65°	3478.8	3542.3	3868.2	4748.5	5954.7	7380.9	9014.5	9179.6	8896.0	8587.1	8142.7
67.5°	2116.1	2137.2	2535.1	3199.5	4384.5	6149.3	8570.1	8929.9	8726.7	8218.9	7347.0
70°	986.1	1041.1	1235.8	1747.9	2776.3	4528.4	7406.3	7914.1	7685.6	7055.0	5586.5
72.5°	385.1	402.1	524.8	808.3	1472.8	2848.2	5527.2	5865.8	5709.2	5010.9	3330.7
75°	190.4	203.1	253.9	385.1	672.9	1176.5	3377.3	3597.3	3339.2	2518.1	1409.3
77.5°	139.7	139.7	169.3	237.0	368.2	435.9	1422.0	1595.5	1506.7	973.4	385.1
80°	93.1	101.6	118.5	160.8	232.8	211.6	537.5	639.1	533.3	300.5	135.4
82.5°	55.0	59.3	88.9	114.3	156.6	122.7	182.0	203.1	220.1	148.1	63.5
85°	29.6	29.6	59.3	84.6	84.6	55.0	63.5	71.9	84.6	88.9	33.9
87.5°	8.5	8.5	38.1	50.8	33.9	29.6	33.9	33.9	38.1	46.6	16.9
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°	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0	1257.0
2.5°	1261.2	1261.2	1265.4	1265.4	1269.6	1269.6	1269.6	1269.6	1273.9	1278.1	1278.1
5°	1273.9	1278.1	1278.1	1278.1	1278.1	1269.6	1265.4	1261.2	1261.2	1265.4	1265.4
7.5°	1307.7	1312.0	1307.7	1299.3	1286.6	1269.6	1252.7	1252.7	1248.5	1252.7	1248.5
10°	1358.5	1358.5	1354.3	1333.1	1312.0	1278.1	1244.3	1218.9	1201.9	1197.7	1189.2
12.5°	1422.0	1422.0	1409.3	1371.2	1333.1	1269.6	1180.8	1096.1	1028.4	998.8	990.3
15°	1485.5	1485.5	1468.6	1413.5	1337.4	1185.0	998.8	821.0	719.5	677.1	651.8
17.5°	1561.7	1553.2	1523.6	1447.4	1290.8	1015.7	715.2	533.3	452.8	414.8	414.8
20°	1642.1	1633.6	1578.6	1451.6	1172.3	727.9	465.5	368.2	347.0	338.6	338.6
22.5°	1731.0	1709.8	1625.2	1417.8	922.6	495.2	351.3	325.9	317.4	313.2	313.2
25°	1802.9	1769.0	1659.0	1324.7	660.2	347.0	308.9	300.5	283.6	279.3	270.9
27.5°	1857.9	1807.1	1671.7	1125.8	435.9	287.8	275.1	258.2	241.2	224.3	224.3
30°	1929.9	1866.4	1680.2	876.1	296.3	249.7	237.0	215.8	194.7	177.8	177.8
32.5°	2073.8	1980.7	1684.4	613.7	245.5	220.1	194.7	169.3	148.1	139.7	135.4
35°	2230.4	2103.4	1637.8	397.8	215.8	186.2	156.6	135.4	114.3	110.0	110.0
37.5°	2403.9	2285.4	1536.3	270.9	190.4	156.6	127.0	105.8	93.1	88.9	88.9
40°	2695.9	2556.2	1367.0	215.8	165.1	131.2	105.8	88.9	80.4	76.2	76.2
42.5°	3114.9	2873.6	1155.4	186.2	143.9	110.0	84.6	71.9	67.7	63.5	63.5
45°	3597.3	3229.1	909.9	169.3	127.0	93.1	71.9	63.5	59.3	55.0	55.0
47.5°	4151.8	3597.3	719.5	148.1	110.0	80.4	63.5	55.0	50.8	46.6	46.6
50°	4676.5	3885.1	541.7	131.2	97.3	67.7	55.0	50.8	46.6	42.3	42.3
52.5°	5108.2	4079.8	410.5	114.3	84.6	59.3	50.8	46.6	38.1	38.1	38.1
55°	5628.8	4232.2	313.2	101.6	76.2	55.0	46.6	38.1	33.9	29.6	29.6
57.5°	6081.6	4287.2	228.5	88.9	67.7	50.8	42.3	33.9	25.4	21.2	21.2
60°	6386.3	4240.6	165.1	76.2	59.3	42.3	33.9	25.4	16.9	12.7	12.7
62.5°	6602.2	4139.1	127.0	67.7	50.8	38.1	29.6	21.2	12.7	8.5	8.5
65°	6386.3	3825.9	101.6	59.3	42.3	33.9	21.2	16.9	8.5	4.2	4.2
67.5°	5523.0	3208.0	80.4	50.8	38.1	29.6	21.2	12.7	4.2	0.0	0.0
70°	3969.8	2289.6	67.7	46.6	33.9	25.4	16.9	8.5	4.2	0.0	0.0
72.5°	2213.4	1180.8	63.5	42.3	33.9	25.4	16.9	8.5	4.2	0.0	0.0
75°	897.2	406.3	59.3	42.3	33.9	21.2	16.9	8.5	4.2	0.0	0.0
77.5°	262.4	139.7	50.8	38.1	33.9	25.4	16.9	8.5	4.2	0.0	0.0
80°	93.1	63.5	38.1	33.9	25.4	21.2	16.9	12.7	4.2	0.0	0.0
82.5°	42.3	25.4	16.9	12.7	12.7	12.7	12.7	8.5	4.2	0.0	0.0
85°	16.9	12.7	8.5	4.2	4.2	4.2	4.2	4.2	4.2	0.0	0.0
87.5°	12.7	8.5	4.2	4.2	4.2	4.2	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)