

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: P400535

Luminaire Tested: **ARCH-L-PA3-90-827-U-T2U-HSS**

Issue Date: 5/19/2020

Test Information

Test Method: LM-79-08
Report Number: P400535
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-568-16)
Test Lab: INNOVATION CENTER
Issue Date: 5/19/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-L-PA3-90-827-U-T2U-HSS
Description: ARCHEON-L ROADWAY AND AREA LUMINAIRE
(3) 80 CRI, 2700K, 400mA LIGHT ENGINES WITH 24 LEDS AND TYPE II U OPTICS
WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7892 lumens
Efficiency: N/A
Efficacy: 84.9 lumens/watt
Luminous Opening: Rectangular (W 0.75' x L: 1.5' x H: 0')
IES Classification: Type II - Short
BUG Rating: B1 - U0 - G2

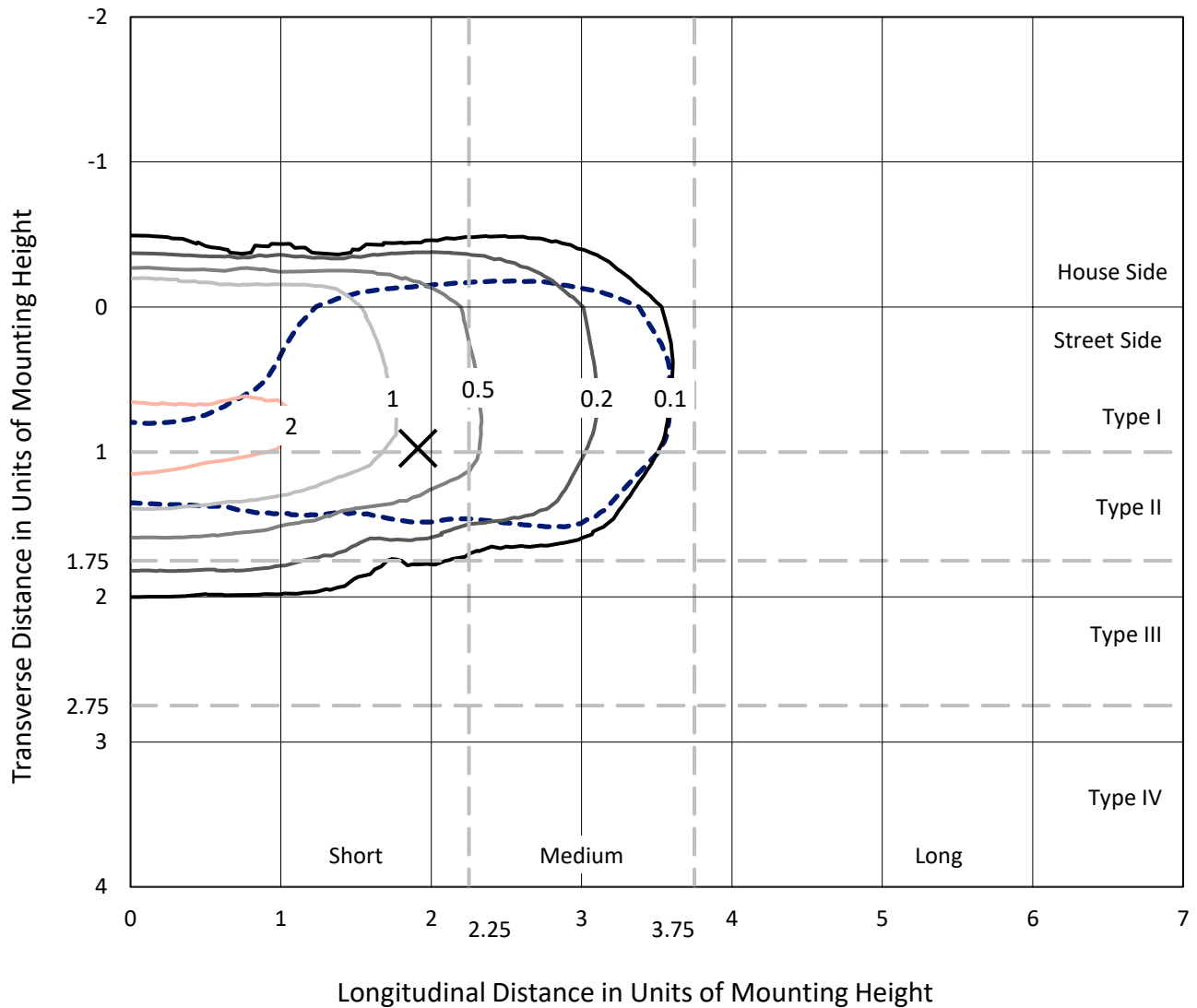
Input Watts (W): 93
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

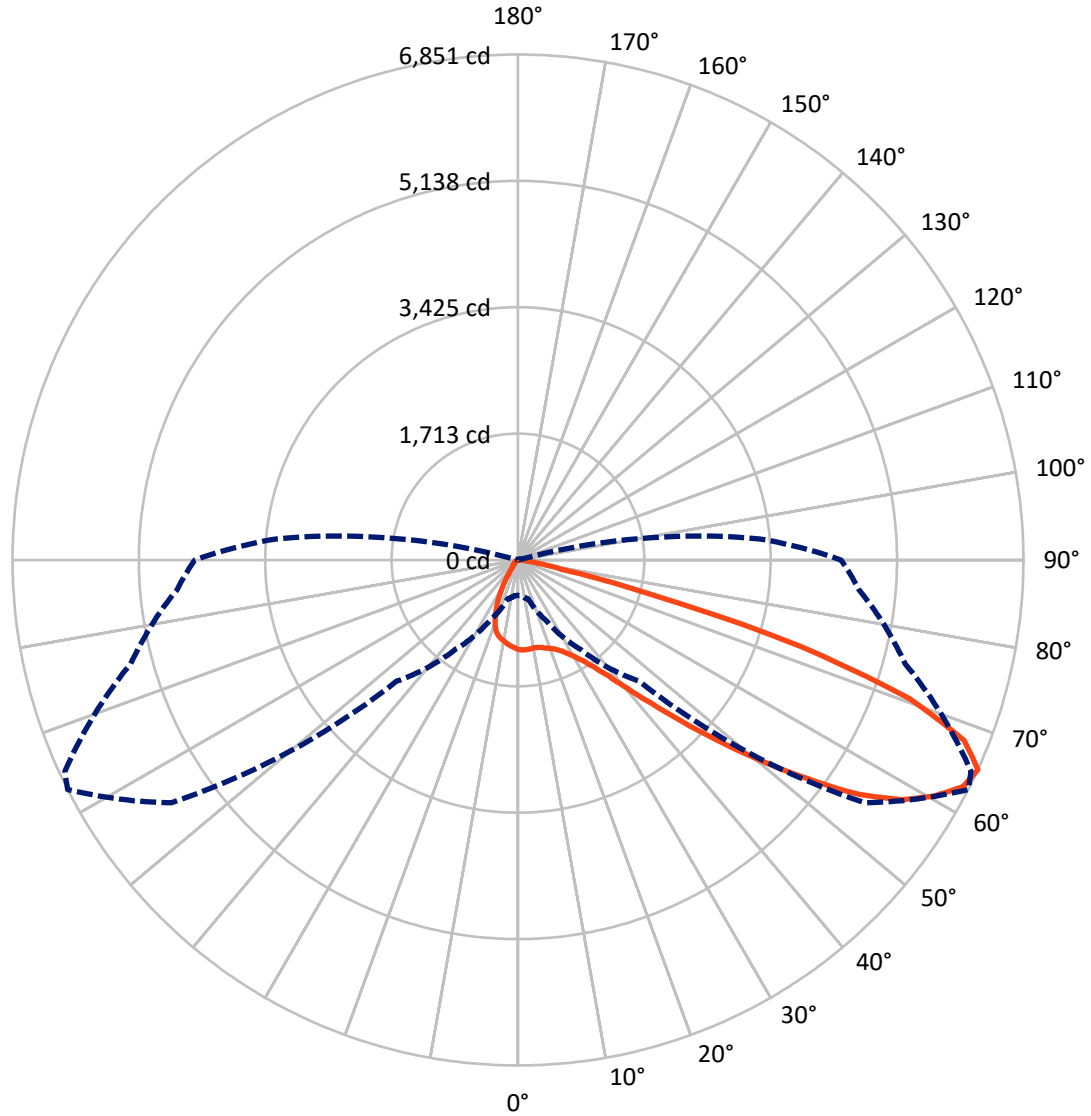
✕ Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 2.7 fc
 Type II - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 63-Deg Lateral - - - Horizontal Cone Through 65-Deg Vertical

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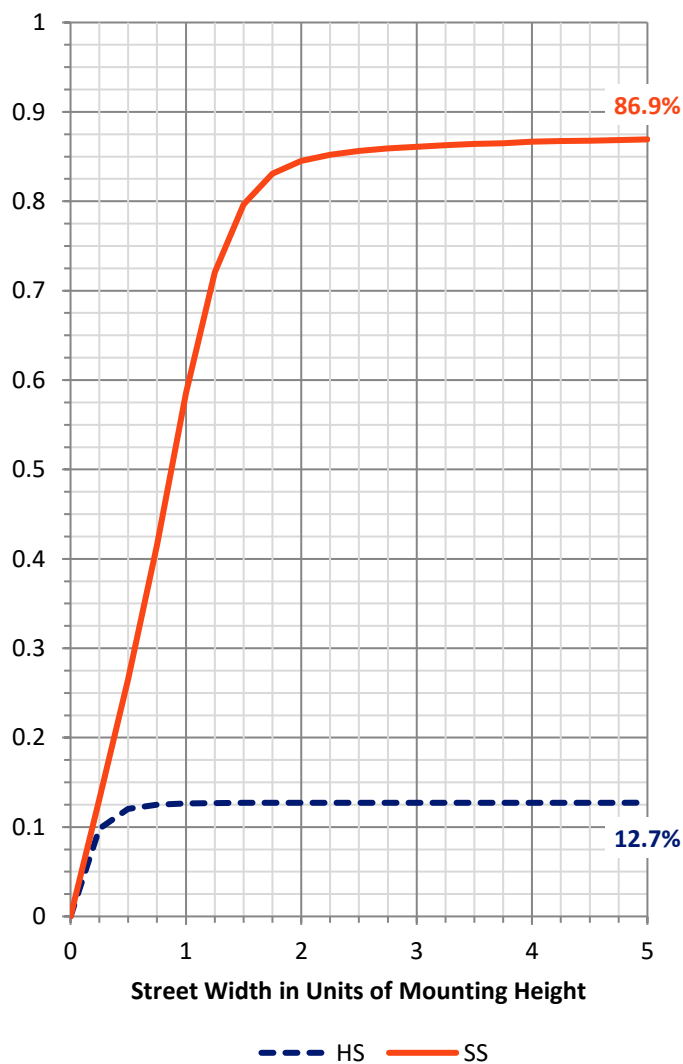
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1015.7	0.0	1015.7
	% Fixture	12.9	0.0	12.9
Street Side	Lumens	6876.3	0.0	6876.3
	% Fixture	87.1	0.0	87.1
Total	Lumens	7892.0	0.0	7892.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	110.9	1.4
10°-20°	273.7	3.5
20°-30°	405.6	5.1
30°-40°	753.1	9.5
40°-50°	1595.5	20.2
50°-60°	2206.1	28.0
60°-70°	1766.1	22.4
70°-80°	733.8	9.3
80°-90°	47.1	0.6
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°	7892.0	100.0
0°-180°	7892.0	100.0

Coefficient of Utilization



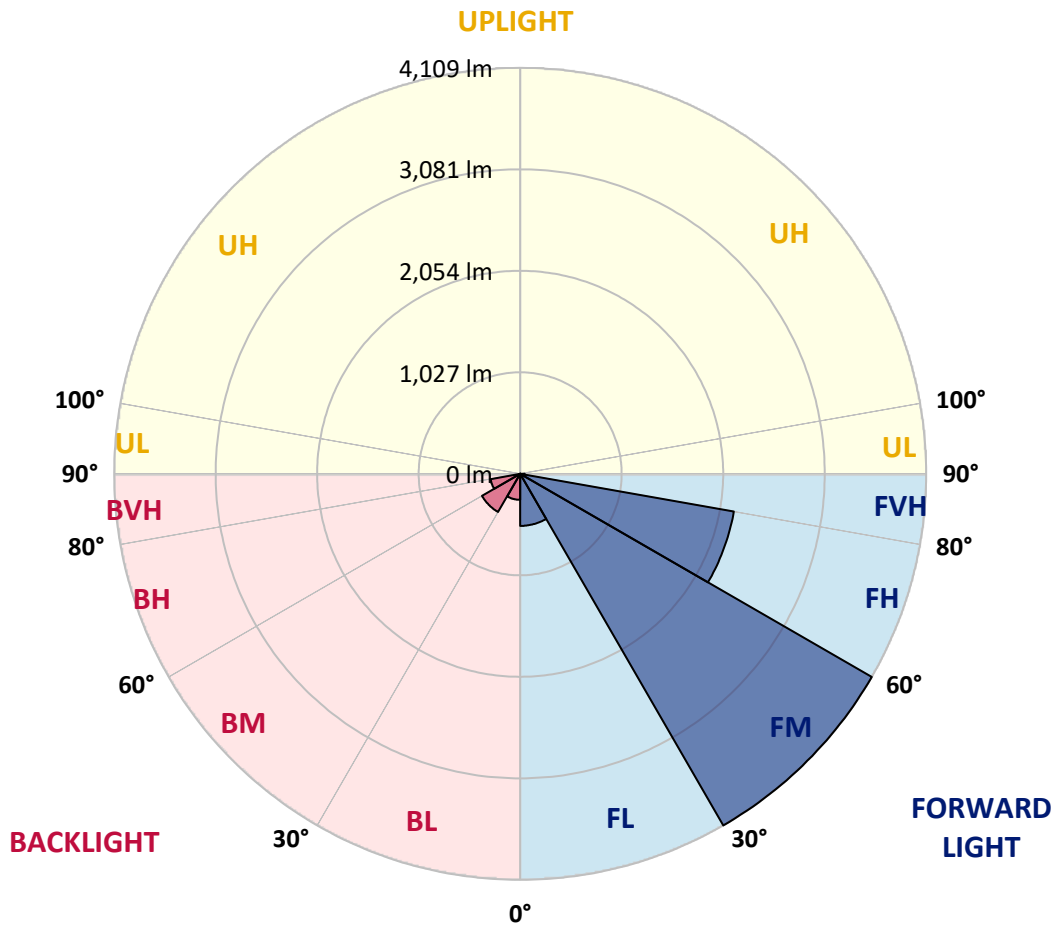
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	527.0	6.7			
FM (30°-60°)	4108.6	52.1			
FH (60°-80°)	2195.7	27.8			G2/5000
FVH (80°-90°)	45.0	0.6			G1/100
BL (0°-30°)	263.2	3.3	B1/500		
BM (30°-60°)	446.2	5.7	B1/1000		
BH (60°-80°)	304.1	3.9	B1/500		G1/500
BVH (80°-90°)	2.1	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 II Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	63°	65°	75°	85°
0°	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8
2.5°	1236.6	1233.6	1230.7	1229.2	1229.2	1227.7	1221.7	1220.2	1217.3	1214.3	1211.3
5°	1224.7	1220.2	1218.7	1220.2	1221.7	1224.7	1221.7	1221.7	1218.7	1215.8	1209.8
7.5°	1194.9	1191.9	1193.4	1197.9	1199.4	1209.8	1211.3	1215.8	1215.8	1212.8	1208.3
10°	1159.2	1157.7	1157.7	1165.1	1172.6	1187.5	1197.9	1209.8	1211.3	1211.3	1203.8
12.5°	1132.3	1130.8	1135.3	1144.3	1159.2	1178.5	1196.4	1214.3	1217.3	1218.7	1206.8
15°	1115.9	1115.9	1121.9	1139.8	1160.6	1187.5	1208.3	1232.2	1235.1	1233.6	1217.3
17.5°	1101.0	1102.5	1114.5	1144.3	1168.1	1203.8	1229.2	1256.0	1257.5	1256.0	1229.2
20°	1095.1	1098.1	1115.9	1154.7	1181.5	1221.7	1254.5	1281.3	1282.8	1276.9	1241.1
22.5°	1111.5	1113.0	1135.3	1177.0	1202.4	1247.1	1288.8	1314.1	1315.6	1306.7	1259.0
25°	1168.1	1168.1	1187.5	1223.2	1245.6	1290.3	1335.0	1364.8	1364.8	1354.3	1299.2
27.5°	1300.7	1288.8	1284.3	1294.7	1302.2	1349.9	1397.5	1434.8	1433.3	1418.4	1351.3
30°	1557.0	1527.2	1479.5	1425.8	1399.0	1431.8	1476.5	1524.2	1522.7	1498.8	1415.4
32.5°	1987.5	1944.3	1831.1	1689.6	1574.8	1537.6	1579.3	1631.5	1632.9	1604.6	1518.2
35°	2591.0	2522.4	2319.8	2123.1	1860.9	1719.4	1731.3	1787.9	1805.8	1790.9	1691.0
37.5°	3172.0	3109.4	2915.8	2643.1	2287.0	1998.0	1947.3	1996.5	2017.3	2017.3	1911.6
40°	3757.6	3684.5	3513.2	3239.1	2863.6	2433.0	2251.3	2291.5	2313.8	2318.3	2179.7
42.5°	4226.9	4179.2	4048.1	3835.0	3483.4	3195.9	2689.3	2666.9	2687.8	2671.4	2491.1
45°	4551.7	4514.4	4423.5	4343.1	4171.7	4027.2	3274.8	3124.3	3137.8	3081.1	2841.3
47.5°	4618.7	4577.0	4557.6	4669.4	4791.6	4827.3	3994.4	3668.2	3654.8	3529.6	3204.8
50°	4326.7	4331.2	4402.7	4721.5	5231.1	5552.9	4828.8	4282.0	4232.8	3954.2	3543.0
52.5°	3696.5	3768.0	3948.3	4465.3	5365.2	6080.3	5663.1	4933.1	4857.1	4366.9	3796.3
55°	2891.9	2984.3	3280.8	3875.3	5085.1	6315.7	6366.4	5609.5	5436.7	4676.8	3993.0
57.5°	2149.9	2178.2	2523.9	3066.2	4422.1	6084.8	6726.9	6131.0	5909.0	4924.2	4188.1
60°	1339.4	1357.3	1722.3	2334.7	3349.3	5231.1	6726.9	6490.0	6278.5	5146.2	4366.9
62.5°	832.9	838.8	975.9	1600.2	2276.6	3879.7	6448.3	6768.7	6598.8	5305.6	4520.4
65°	479.8	485.7	549.8	904.4	1481.0	2322.8	5736.2	6850.6	6774.6	5432.2	4639.6
67.5°	350.1	353.1	378.4	508.1	968.4	1193.4	4308.8	6521.3	6616.7	5494.8	4636.6
70°	303.9	308.4	341.2	396.3	698.8	733.0	2193.1	5631.9	5898.6	5405.4	4498.0
72.5°	233.9	239.9	289.0	372.5	512.5	527.4	794.1	4007.9	4411.6	4846.7	4118.1
75°	160.9	166.9	216.0	306.9	423.1	394.8	436.5	1844.5	2327.2	3251.0	3134.8
77.5°	102.8	104.3	135.6	223.5	365.0	280.1	299.5	601.9	844.8	1470.5	1479.5
80°	68.5	70.0	83.4	144.5	250.3	259.2	184.7	278.6	305.4	429.1	298.0
82.5°	41.7	41.7	56.6	90.9	152.0	214.5	120.7	146.0	156.4	165.4	77.5
85°	16.4	16.4	34.3	59.6	95.4	99.8	76.0	84.9	89.4	96.8	35.8
87.5°	4.5	4.5	19.4	32.8	41.7	46.2	46.2	41.7	44.7	55.1	17.9
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°	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8	1215.8
2.5°	1209.8	1205.3	1199.4	1193.4	1187.5	1183.0	1178.5	1178.5	1175.5	1171.1	1168.1
5°	1206.8	1199.4	1186.0	1175.5	1159.2	1147.2	1138.3	1130.8	1126.4	1115.9	1114.5
7.5°	1202.4	1193.4	1174.0	1153.2	1126.4	1105.5	1084.7	1069.8	1054.9	1042.9	1040.0
10°	1194.9	1184.5	1156.2	1126.4	1089.1	1050.4	1001.2	944.6	892.5	862.7	853.7
12.5°	1194.9	1181.5	1144.3	1104.0	1050.4	955.0	829.9	704.7	607.9	564.7	552.8
15°	1202.4	1184.5	1135.3	1080.2	980.4	786.7	584.0	418.7	312.9	280.1	272.7
17.5°	1209.8	1184.5	1121.9	1047.4	852.2	570.6	332.3	220.5	186.2	178.8	178.8
20°	1212.8	1181.5	1104.0	986.3	680.9	354.6	198.2	165.4	152.0	147.5	147.5
22.5°	1224.7	1183.0	1090.6	898.4	494.7	208.6	156.4	138.6	125.2	120.7	120.7
25°	1254.5	1200.9	1093.6	786.7	317.4	157.9	132.6	114.7	101.3	95.4	95.4
27.5°	1302.2	1241.1	1110.0	657.1	199.6	135.6	111.7	92.4	81.9	76.0	76.0
30°	1355.8	1285.8	1117.4	508.1	149.0	114.7	90.9	73.0	65.6	61.1	59.6
32.5°	1449.7	1363.3	1111.5	348.6	122.2	96.8	73.0	58.1	52.1	50.7	50.7
35°	1600.2	1498.8	1099.6	219.0	101.3	77.5	58.1	47.7	43.2	41.7	40.2
37.5°	1804.3	1697.0	1063.8	144.5	83.4	61.1	47.7	40.2	35.8	34.3	34.3
40°	2053.1	1923.5	995.3	110.3	71.5	49.2	40.2	34.3	31.3	29.8	29.8
42.5°	2337.7	2175.3	886.5	95.4	59.6	41.7	34.3	28.3	26.8	25.3	25.3
45°	2649.1	2439.0	736.0	84.9	50.7	34.3	28.3	25.3	22.3	22.3	20.9
47.5°	2979.8	2704.2	566.2	74.5	43.2	29.8	25.3	20.9	19.4	17.9	17.9
50°	3298.7	2941.1	397.8	64.1	35.8	25.3	20.9	17.9	16.4	14.9	14.9
52.5°	3523.6	3084.1	281.6	55.1	29.8	22.3	16.4	13.4	11.9	11.9	11.9
55°	3703.9	3173.5	196.7	46.2	25.3	19.4	13.4	10.4	10.4	8.9	8.9
57.5°	3873.8	3231.6	144.5	38.7	20.9	14.9	10.4	7.4	7.4	6.0	6.0
60°	4049.6	3262.9	110.3	31.3	17.9	11.9	7.4	6.0	4.5	4.5	4.5
62.5°	4226.9	3282.3	84.9	25.3	14.9	8.9	6.0	4.5	3.0	1.5	1.5
65°	4381.8	3288.2	65.6	19.4	11.9	6.0	4.5	1.5	0.0	0.0	0.0
67.5°	4428.0	3219.7	50.7	14.9	8.9	4.5	3.0	0.0	0.0	0.0	0.0
70°	4302.9	3037.9	38.7	11.9	7.4	3.0	1.5	0.0	0.0	0.0	0.0
72.5°	3818.6	2547.7	29.8	7.4	6.0	3.0	1.5	0.0	0.0	0.0	0.0
75°	2732.5	1358.8	20.9	6.0	4.5	1.5	0.0	0.0	0.0	0.0	0.0
77.5°	1257.5	525.9	14.9	4.5	3.0	1.5	0.0	0.0	0.0	0.0	0.0
80°	245.8	131.1	6.0	3.0	1.5	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	56.6	22.3	3.0	3.0	1.5	0.0	0.0	0.0	0.0	0.0	0.0
85°	19.4	7.4	1.5	1.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	7.4	3.0	1.5	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)