

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: P397917

Luminaire Tested: **ARCH-S-PA1-60-740-U-T2U**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P397917  
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-S-PA1-60-740-U-T2U  
Description: ARCHEON ROADWAY AND AREA LUMINAIRE  
(1) 70 CRI, 4000K, 800mA LIGHT ENGINE WITH 24 LEDS AND TYPE II U OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 9052 lumens  
Efficiency: N/A  
Efficacy: 141.4 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')  
IES Classification: Type II - Short - Non-Cutoff  
BUG Rating: B2 - U0 - G2

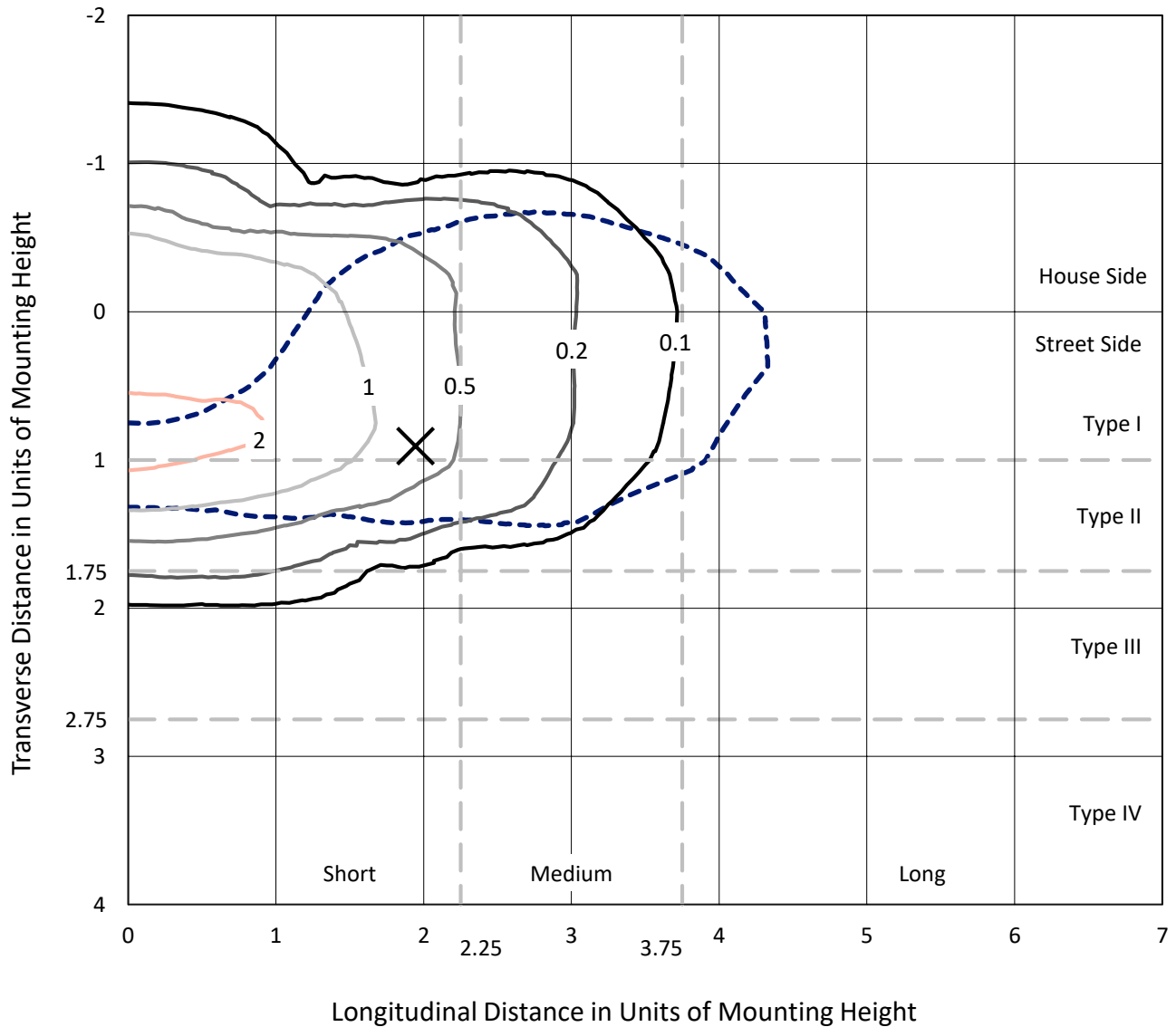
Input Watts (W): 64  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

× Max cd  
 - - - 1/2 Max cd

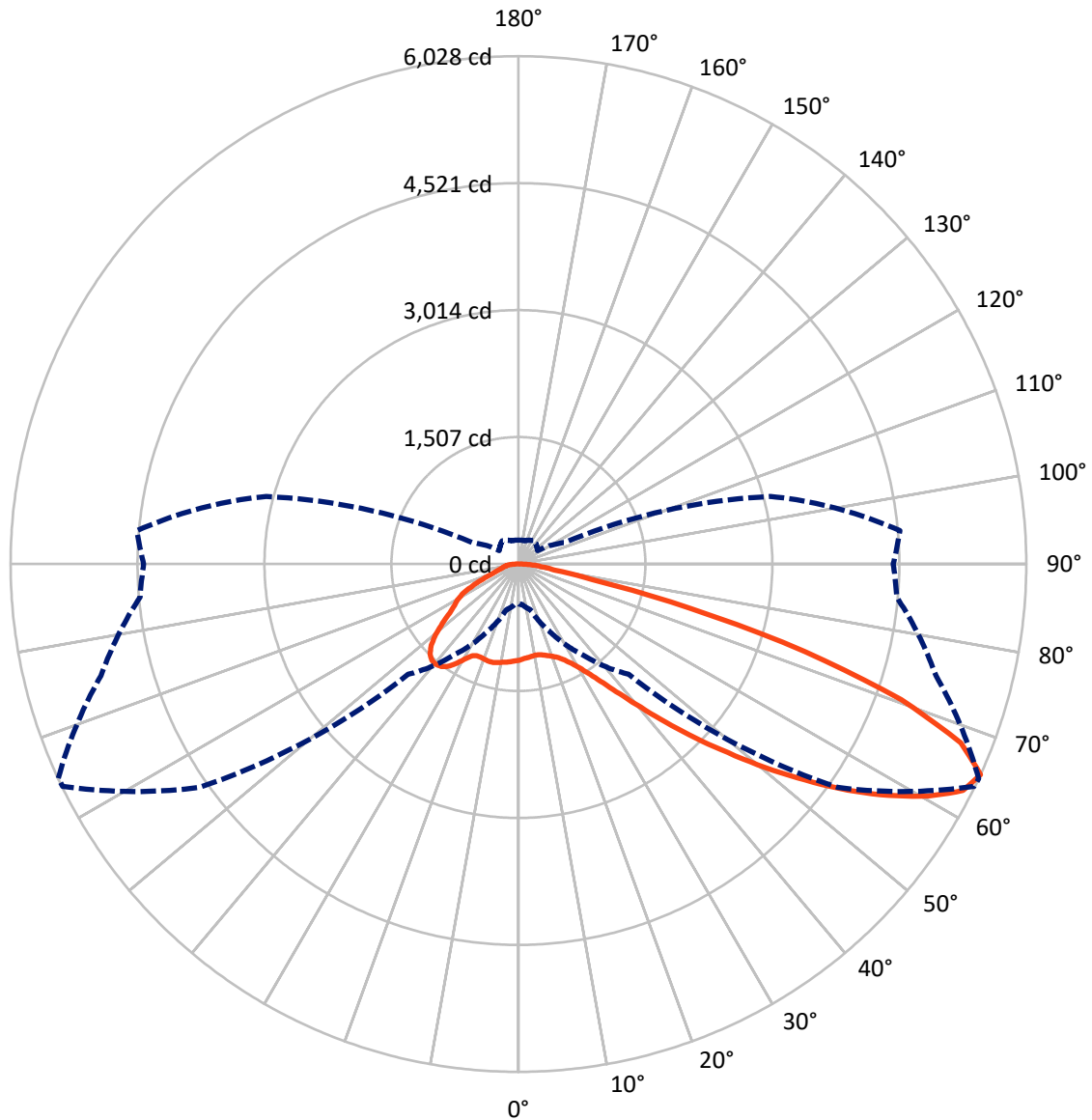


Based on 25 foot mounting height. Maximum calculated value = 2.5 fc  
 Type II - Short - Non-Cutoff

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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	2617.1	0.0	2617.1
	% Fixture	28.9	0.0	28.9
<b>Street Side</b>	Lumens	6434.9	0.0	6434.9
	% Fixture	71.1	0.0	71.1
<b>Total</b>	Lumens	9052.0	0.0	9052.0
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	109.0	1.2
10°-20°	325.3	3.6
20°-30°	577.9	6.4
30°-40°	977.7	10.8
40°-50°	1702.0	18.8
50°-60°	2199.5	24.3
60°-70°	1924.7	21.3
70°-80°	1046.9	11.6
80°-90°	189.1	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°	9052.0	100.0
0°-180°	9052.0	100.0



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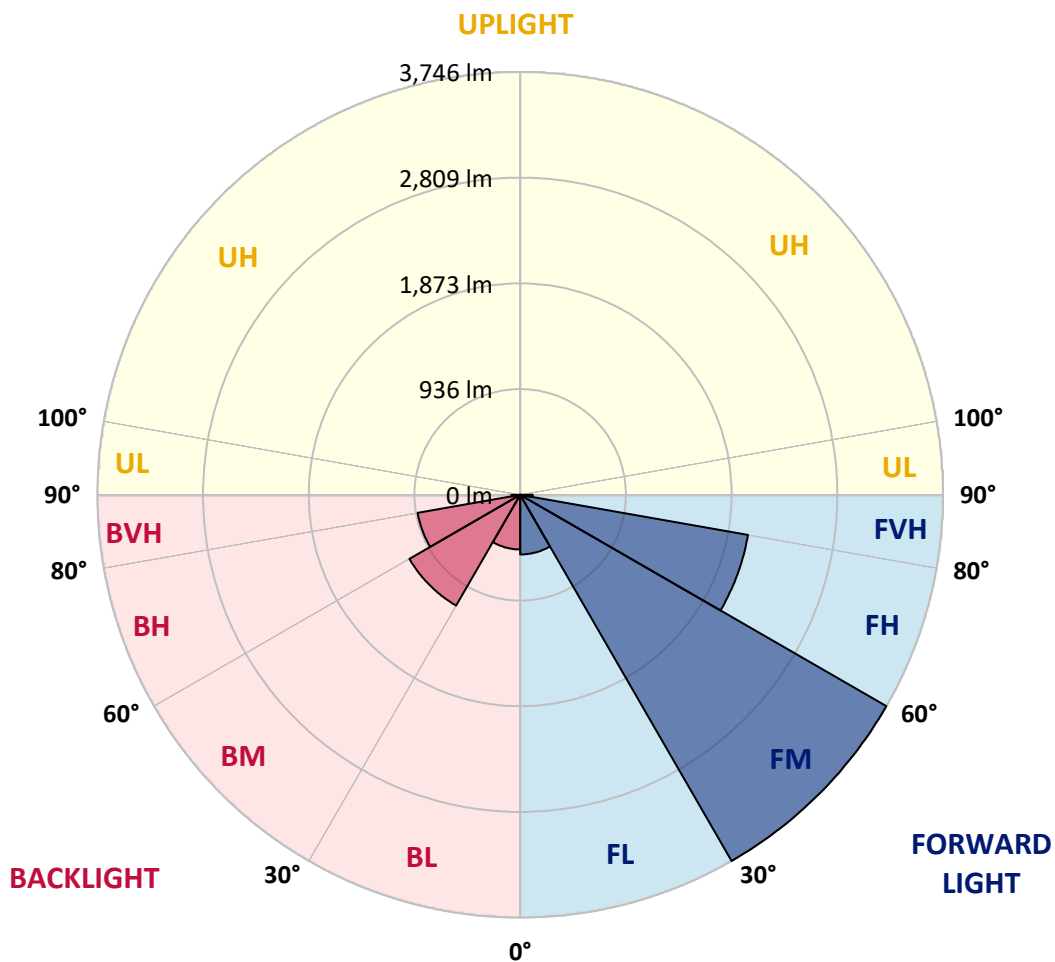
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	528.2	5.8			
FM	(30°-60°)	3746.0	41.4			
FH	(60°-80°)	2049.5	22.6			G2/5000
FVH	(80°-90°)	111.3	1.2			G2/225
BL	(0°-30°)	484.1	5.3	B1/500		
BM	(30°-60°)	1133.1	12.5	B2/2500		
BH	(60°-80°)	922.0	10.2	B2/1000		G2/1000
BVH	(80°-90°)	77.8	0.9			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B2-U0-G2**

Type II Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	64°	65°	75°	85°
0°	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8
2.5°	1123.6	1122.4	1120.0	1122.4	1123.6	1125.9	1124.7	1127.1	1125.9	1129.5	1135.5
5°	1095.0	1092.6	1091.4	1097.3	1100.9	1106.9	1109.3	1117.6	1116.4	1122.4	1131.9
7.5°	1062.8	1062.8	1061.6	1068.7	1073.5	1084.2	1092.6	1106.9	1108.1	1118.8	1129.5
10°	1037.8	1039.0	1037.8	1043.7	1050.9	1064.0	1078.3	1098.5	1099.7	1115.2	1125.9
12.5°	1028.2	1028.2	1028.2	1036.6	1046.1	1064.0	1080.7	1102.1	1104.5	1121.2	1130.7
15°	1041.3	1042.5	1040.1	1048.5	1059.2	1080.7	1096.1	1118.8	1121.2	1136.7	1142.6
17.5°	1087.8	1092.6	1086.6	1091.4	1089.0	1105.7	1120.0	1142.6	1143.8	1156.9	1159.3
20°	1179.6	1184.3	1174.8	1168.8	1147.4	1146.2	1152.1	1170.0	1170.0	1178.4	1172.4
22.5°	1321.3	1326.1	1309.4	1286.8	1235.6	1210.5	1197.4	1205.8	1204.6	1208.1	1192.7
25°	1509.6	1508.4	1488.1	1446.4	1364.2	1303.5	1271.3	1258.2	1258.2	1251.0	1232.0
27.5°	1743.1	1725.2	1689.5	1639.5	1525.1	1440.5	1371.4	1338.0	1332.1	1310.6	1274.9
30°	1992.1	1979.0	1927.8	1855.1	1722.9	1614.4	1500.1	1433.3	1429.8	1383.3	1329.7
32.5°	2285.2	2263.8	2206.6	2119.6	1961.2	1808.6	1665.7	1564.4	1558.4	1484.6	1410.7
35°	2661.7	2643.9	2533.1	2446.1	2242.3	2042.2	1873.0	1738.3	1733.6	1643.0	1548.9
37.5°	3113.3	3066.8	2959.6	2796.4	2581.9	2344.8	2130.3	1961.2	1955.2	1855.1	1736.0
40°	3516.0	3474.3	3379.0	3228.9	2998.9	2735.6	2444.9	2240.0	2234.0	2112.5	1962.3
42.5°	3813.9	3785.3	3723.3	3636.4	3471.9	3312.3	2846.4	2577.1	2566.4	2409.1	2222.1
45°	3986.6	3964.0	3928.3	3949.7	3947.3	3917.5	3325.4	2978.7	2944.1	2740.4	2511.6
47.5°	3944.9	3924.7	3939.0	4105.8	4335.7	4508.5	3883.0	3389.7	3343.3	3077.6	2820.2
50°	3643.5	3651.8	3726.9	4046.2	4562.1	4945.8	4501.4	3858.0	3796.0	3417.1	3113.3
52.5°	3094.2	3114.5	3296.8	3743.6	4537.1	5229.3	5060.2	4341.7	4259.5	3748.4	3380.2
55°	2458.0	2509.2	2745.1	3214.6	4210.6	5249.6	5481.9	4827.8	4737.3	4059.3	3612.5
57.5°	1818.2	1894.4	2167.3	2598.6	3585.1	4929.1	5692.8	5292.5	5182.9	4367.9	3858.0
60°	1153.3	1199.8	1514.4	2023.1	2743.9	4145.1	5665.4	5688.1	5592.7	4675.3	4114.1
62.5°	736.3	759.0	917.4	1442.9	1918.3	3069.2	5366.4	5987.1	5922.8	4955.3	4357.2
65°	473.0	482.5	563.6	887.6	1305.8	1852.7	4621.7	6019.3	6027.6	5130.5	4507.3
67.5°	384.8	389.6	419.4	548.1	923.4	1023.5	3219.3	5561.8	5663.0	5085.2	4456.1
70°	350.3	356.2	387.2	437.3	714.9	706.5	1558.4	4653.9	4819.5	4824.2	4228.5
72.5°	295.5	303.8	345.5	413.4	552.8	557.6	660.1	3314.7	3558.9	4311.9	3886.6
75°	246.6	251.4	287.1	364.6	468.2	445.6	463.5	1757.4	2110.1	3457.6	3523.2
77.5°	200.2	204.9	231.1	290.7	415.8	346.7	364.6	728.0	899.6	2347.2	2879.8
80°	143.0	147.7	177.5	226.4	314.5	312.2	270.5	401.5	436.1	1268.9	1870.6
82.5°	102.5	106.0	134.6	162.0	218.0	313.4	203.7	272.8	286.0	562.4	754.2
85°	69.1	69.1	92.9	107.2	140.6	197.8	164.4	184.7	193.0	266.9	203.7
87.5°	29.8	29.8	50.0	54.8	73.9	91.7	122.7	92.9	95.3	144.2	83.4
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°	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8	1143.8
2.5°	1139.0	1140.2	1142.6	1149.8	1154.5	1161.7	1165.3	1170.0	1170.0	1167.6	1168.8
5°	1136.7	1140.2	1148.6	1161.7	1170.0	1183.1	1192.7	1199.8	1202.2	1199.8	1201.0
7.5°	1135.5	1141.4	1155.7	1174.8	1186.7	1203.4	1216.5	1224.8	1230.8	1228.4	1229.6
10°	1131.9	1141.4	1159.3	1183.1	1201.0	1217.7	1229.6	1233.2	1236.7	1234.4	1233.2
12.5°	1136.7	1147.4	1166.4	1195.0	1215.3	1228.4	1232.0	1226.0	1217.7	1212.9	1211.7
15°	1146.2	1156.9	1176.0	1205.8	1223.6	1228.4	1220.1	1201.0	1181.9	1171.2	1170.0
17.5°	1159.3	1166.4	1181.9	1208.1	1222.4	1216.5	1199.8	1177.2	1162.9	1154.5	1155.7
20°	1167.6	1167.6	1179.6	1199.8	1211.7	1207.0	1186.7	1161.7	1139.0	1128.3	1124.7
22.5°	1179.6	1173.6	1174.8	1192.7	1209.3	1202.2	1159.3	1115.2	1083.0	1071.1	1069.9
25°	1211.7	1195.0	1184.3	1195.0	1234.4	1176.0	1090.2	1039.0	1009.2	998.4	999.6
27.5°	1251.0	1228.4	1205.8	1223.6	1254.6	1116.4	1002.0	943.6	925.8	917.4	921.0
30°	1290.4	1260.6	1230.8	1295.1	1240.3	1023.5	888.8	831.6	816.2	810.2	815.0
32.5°	1363.0	1314.2	1278.4	1390.4	1196.2	917.4	766.1	713.7	699.4	692.2	689.9
35°	1484.6	1422.6	1386.9	1473.8	1134.3	799.5	654.1	617.2	601.7	586.2	583.8
37.5°	1659.7	1584.6	1552.5	1521.5	1047.3	682.7	568.3	543.3	520.7	496.8	495.6
40°	1869.4	1771.7	1747.9	1542.9	927.0	573.1	508.8	484.9	456.3	433.7	434.9
42.5°	2111.3	1986.2	1934.9	1537.0	778.0	514.7	465.9	439.7	414.6	394.4	393.2
45°	2369.8	2228.0	2110.1	1495.3	630.3	474.2	439.7	408.7	383.7	361.0	358.6
47.5°	2655.8	2497.3	2272.1	1414.3	520.7	445.6	424.2	380.1	357.4	343.1	343.1
50°	2944.1	2754.7	2421.1	1291.5	456.3	424.2	401.5	364.6	346.7	334.8	334.8
52.5°	3190.7	3022.7	2543.8	1145.0	415.8	406.3	386.0	357.4	338.4	327.7	326.5
55°	3430.2	3271.8	2653.4	999.6	382.5	382.5	382.5	351.5	330.0	320.5	319.3
57.5°	3668.5	3533.9	2767.8	904.3	352.7	362.2	375.3	344.3	322.9	314.5	313.4
60°	3937.8	3848.4	2900.0	837.6	326.5	340.8	365.8	336.0	311.0	303.8	302.6
62.5°	4223.7	4223.7	3020.4	743.5	302.6	322.9	351.5	325.3	300.2	294.3	293.1
65°	4447.7	4544.3	3097.8	602.9	278.8	305.0	334.8	311.0	286.0	284.8	282.4
67.5°	4474.0	4625.3	3049.0	455.1	257.4	286.0	318.1	295.5	271.7	271.7	268.1
70°	4285.7	4439.4	2896.5	340.8	241.9	266.9	296.7	276.4	253.8	256.2	250.2
72.5°	3971.2	4009.3	2517.6	269.3	224.0	246.6	270.5	255.0	234.7	234.7	226.4
75°	3556.5	3344.4	1828.9	225.2	202.5	222.8	244.3	231.1	213.3	207.3	202.5
77.5°	2830.9	2423.4	1062.8	194.2	184.7	200.2	214.5	204.9	189.4	176.3	176.3
80°	1725.2	1420.2	469.4	168.0	163.2	175.1	184.7	174.0	160.8	147.7	144.2
82.5°	656.5	548.1	227.6	144.2	143.0	150.1	157.3	146.6	137.0	131.1	113.2
85°	179.9	165.6	156.1	120.3	118.0	116.8	125.1	120.3	107.2	88.2	78.6
87.5°	67.9	77.4	84.6	73.9	78.6	72.7	83.4	76.3	67.9	44.1	39.3
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)