

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: P573238

Luminaire Tested: **ARCH-S-PA2-50-740-U-T2R-HSS**

Issue Date: 10/13/2021

Test Information

Test Method: LM-79-08
Report Number: P573238
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2108-332-14)
Test Lab: INNOVATION CENTER
Issue Date: 10/13/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-S-PA2-50-740-U-T2R-HSS
Description: ARCHEON ROADWAY AND AREA LUMINAIRE
(2) 70 CRI, 4000K, 520mA LIGHTSQUARES WITH 16 LEDS EACH AND TYPE II
ROADWAY OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 6166 lumens
Efficiency: N/A
Efficacy: 115.0 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 1' x H: 0')
IES Classification: Type II - Short
BUG Rating: B0 - U0 - G1

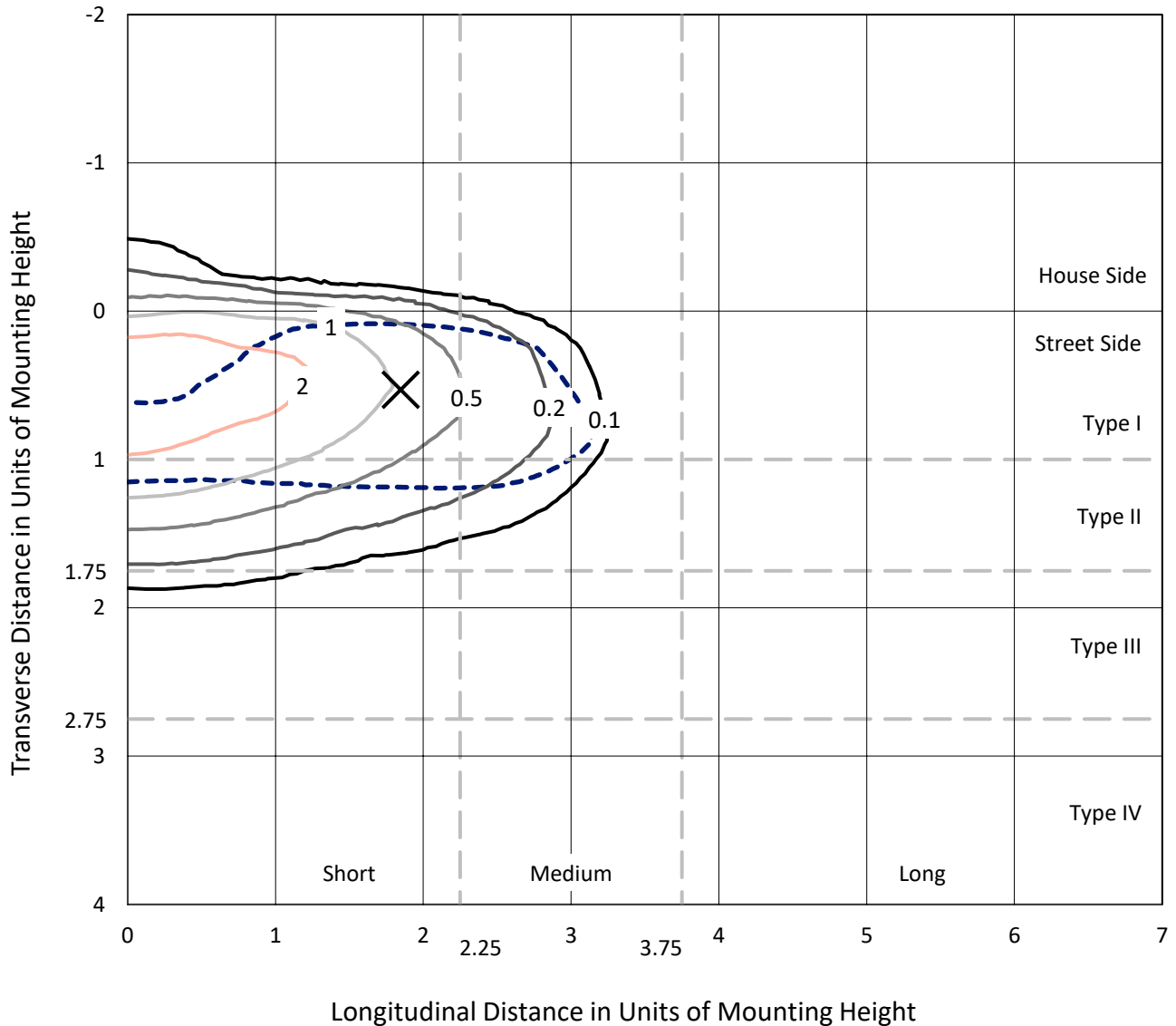
Input Watts (W): 53.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



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Iso-Footcandle Lines of Horizontal Illumination

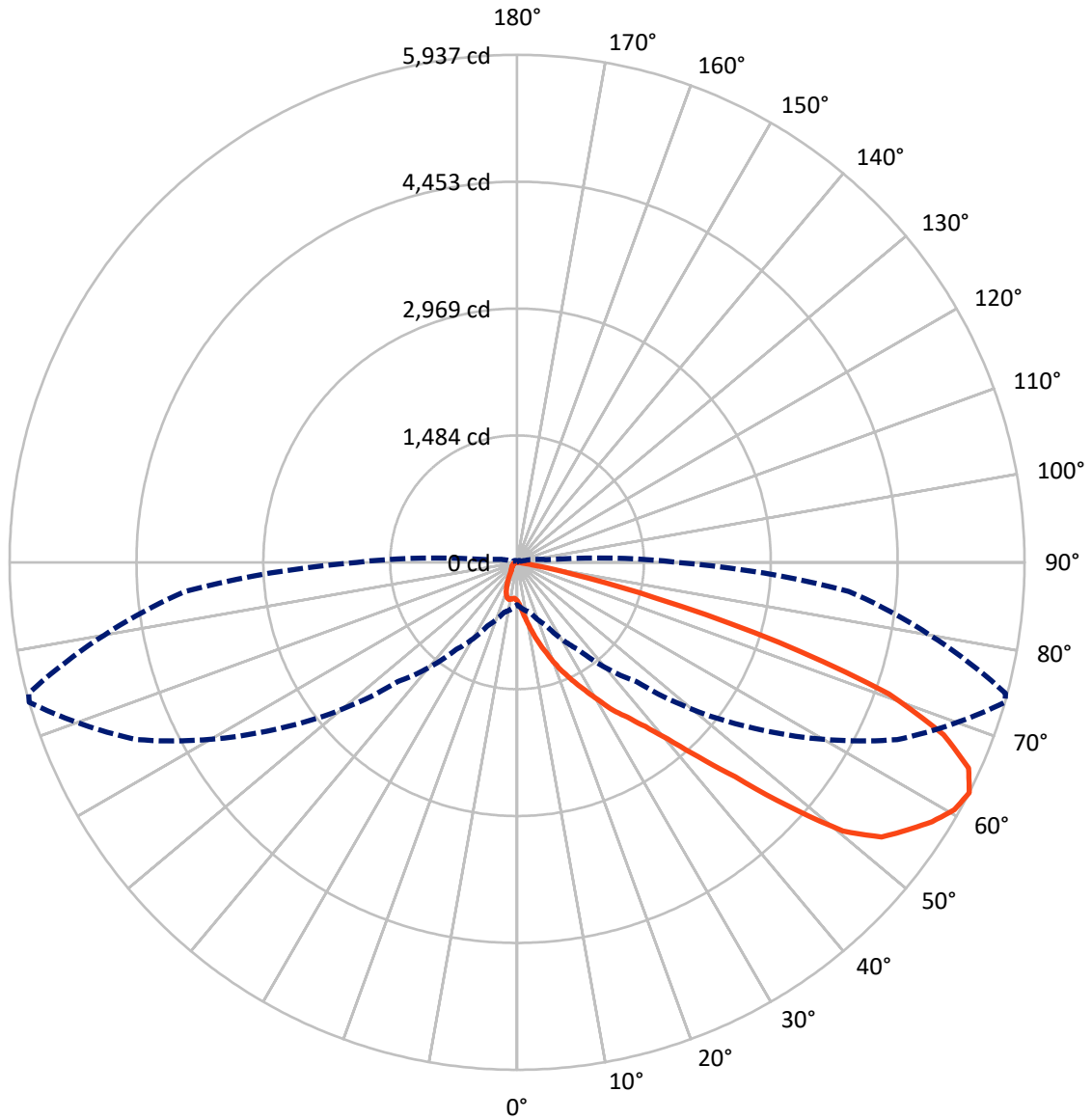
× Max cd
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 2.9 fc
 Type II - Short - N/A

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Luminous Intensity Polar Plot



— Vertical Plane Through 74-Deg Lateral - - - Horizontal Cone Through 62.5-Deg Vertical

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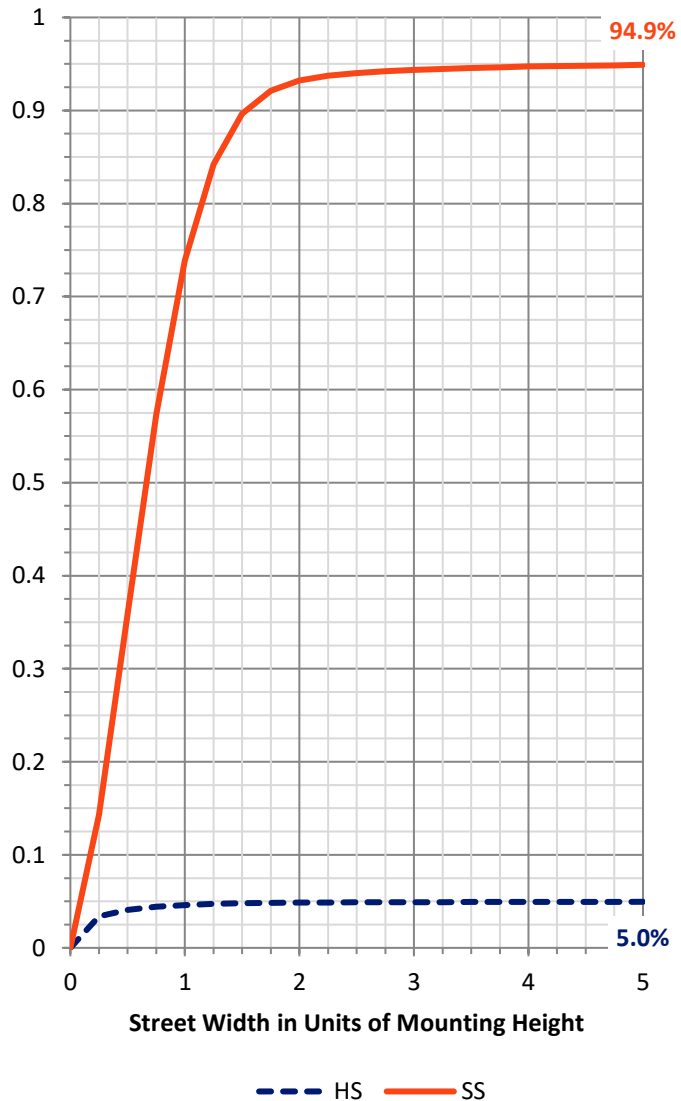
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	307.5	0.0	307.5
	% Fixture	5.0	0.0	5.0
Street Side	Lumens	5858.5	0.0	5858.5
	% Fixture	95.0	0.0	95.0
Total	Lumens	6166.0	0.0	6166.0
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	56.4	0.9
10°-20°	237.1	3.8
20°-30°	508.8	8.3
30°-40°	892.4	14.5
40°-50°	1383.5	22.4
50°-60°	1595.0	25.9
60°-70°	1120.5	18.2
70°-80°	349.1	5.7
80°-90°	23.1	0.4
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°	6166.0	100.0
0°-180°	6166.0	100.0

Coefficient of Utilization

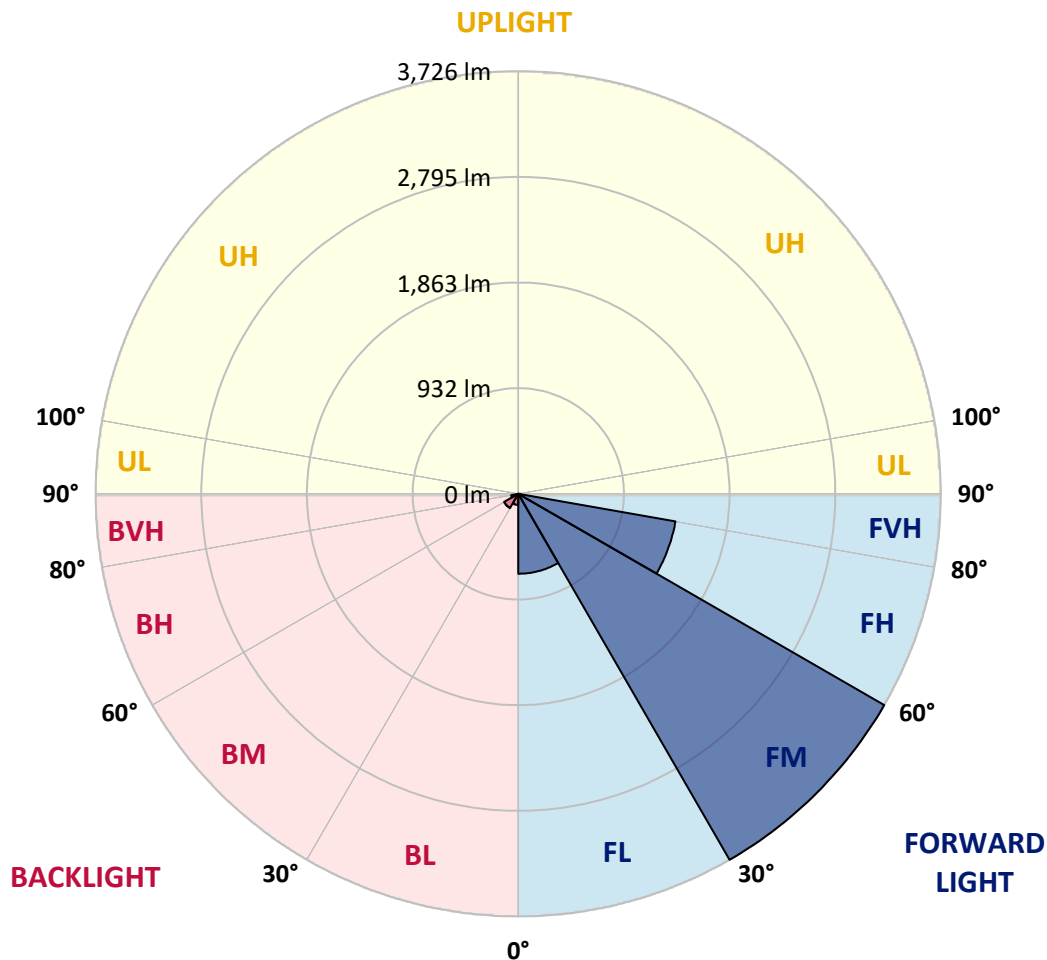


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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	704.8	11.4			
FM (30°-60°)	3726.4	60.4			
FH (60°-80°)	1407.4	22.8			G1/1800
FVH (80°-90°)	19.9	0.3			G1/100
BL (0°-30°)	97.6	1.6	B0/110		
BM (30°-60°)	144.5	2.3	B0/220		
BH (60°-80°)	62.2	1.0	B0/110		G0/110
BVH (80°-90°)	3.2	0.1			G0/10
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B0-U0-G1
 Type II Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	74°	75°	85°
0°	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4
2.5°	627.1	616.3	603.3	592.4	570.7	555.5	536.0	514.3	490.4	488.3	468.7
5°	878.9	846.3	846.3	818.1	785.6	727.0	672.7	605.4	555.5	551.2	499.1
7.5°	1137.1	1111.1	1095.9	1052.5	1000.4	935.3	848.5	735.6	644.5	629.3	544.7
10°	1378.0	1358.5	1330.2	1295.5	1249.9	1143.6	1035.1	887.5	742.2	731.3	598.9
12.5°	1564.6	1540.7	1527.7	1512.5	1453.9	1369.3	1228.2	1041.6	868.0	844.1	653.2
15°	1705.7	1694.8	1681.8	1681.8	1651.4	1568.9	1423.6	1206.5	989.5	961.3	722.6
17.5°	1818.5	1805.5	1803.3	1816.3	1807.7	1749.1	1612.3	1365.0	1115.4	1093.7	794.2
20°	1944.4	1927.0	1927.0	1937.9	1935.7	1903.1	1783.8	1547.2	1263.0	1223.9	876.7
22.5°	2122.3	2111.5	2102.8	2085.4	2072.4	2042.0	1937.9	1725.2	1404.0	1367.1	961.3
25°	2361.0	2348.0	2308.9	2278.6	2222.1	2176.6	2087.6	1883.6	1547.2	1506.0	1043.8
27.5°	2593.2	2567.2	2530.3	2491.2	2428.3	2350.2	2239.5	2033.3	1697.0	1653.6	1128.4
30°	2838.4	2818.9	2773.3	2710.4	2632.3	2545.5	2413.1	2213.4	1868.4	1820.7	1219.6
32.5°	3033.7	3003.3	2962.1	2901.4	2821.1	2760.3	2617.1	2410.9	2065.9	2003.0	1315.0
35°	3190.0	3166.1	3111.8	3053.3	2992.5	2975.1	2818.9	2571.5	2224.3	2165.7	1417.0
37.5°	3289.8	3265.9	3220.4	3161.8	3137.9	3168.3	3066.3	2790.7	2437.0	2363.2	1534.2
40°	3367.9	3339.7	3302.8	3276.8	3268.1	3352.7	3341.9	3075.0	2716.9	2673.5	1694.8
42.5°	3424.3	3396.1	3372.3	3370.1	3426.5	3591.4	3713.0	3472.1	3107.5	3018.5	1901.0
45°	3352.7	3328.9	3341.9	3417.8	3554.5	3814.9	4162.2	4034.1	3578.4	3515.5	2230.8
47.5°	3153.1	3137.9	3196.5	3335.4	3589.3	3951.7	4596.2	4650.4	4251.1	4155.6	2658.3
50°	2840.6	2838.4	2931.7	3120.5	3480.8	4003.7	4815.3	5242.8	4941.2	4843.5	3005.5
52.5°	2417.4	2408.8	2545.5	2808.0	3224.7	3906.1	4856.6	5479.4	5340.5	5225.5	3224.7
55°	1937.9	1918.3	2081.1	2369.7	2847.1	3621.8	4745.9	5531.5	5531.5	5427.3	3387.4
57.5°	1362.8	1393.2	1527.7	1874.9	2380.5	3196.5	4472.5	5483.7	5724.6	5635.6	3606.6
60°	859.3	872.4	1019.9	1299.9	1805.5	2627.9	3984.2	5277.6	5878.7	5826.6	3782.4
62.5°	494.8	536.0	609.8	822.4	1245.6	1974.7	3380.9	4906.5	5937.3	5915.6	3897.4
65°	301.6	306.0	340.7	464.4	766.0	1347.6	2706.1	4390.0	5804.9	5824.4	3875.7
67.5°	225.7	225.7	236.5	293.0	436.2	857.2	1996.4	3762.9	5381.7	5444.7	3671.7
70°	195.3	195.3	197.5	214.8	269.1	507.8	1319.4	3033.7	4613.5	4607.0	3033.7
72.5°	154.1	160.6	173.6	182.3	204.0	297.3	772.5	2120.1	3205.2	3281.1	1953.0
75°	123.7	125.9	143.2	158.4	171.4	201.8	364.6	1178.3	1681.8	1681.8	859.3
77.5°	95.5	99.8	110.7	125.9	143.2	143.2	151.9	455.7	651.0	629.3	253.9
80°	60.8	62.9	80.3	99.8	119.4	102.0	82.5	151.9	177.9	171.4	69.4
82.5°	36.9	39.1	52.1	80.3	80.3	56.4	52.1	62.9	56.4	52.1	28.2
85°	10.9	13.0	36.9	52.1	45.6	21.7	26.0	28.2	26.0	23.9	15.2
87.5°	2.2	2.2	10.9	13.0	10.9	10.9	8.7	10.9	10.9	10.9	6.5
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°	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4	451.4
2.5°	457.9	449.2	431.8	418.8	408.0	397.1	388.4	386.3	381.9	381.9	379.8
5°	477.4	457.9	425.3	403.6	386.3	371.1	358.1	345.0	340.7	336.4	338.5
7.5°	507.8	477.4	431.8	399.3	368.9	334.2	306.0	282.1	264.7	260.4	253.9
10°	546.9	501.3	442.7	390.6	334.2	273.4	234.4	210.5	201.8	191.0	193.1
12.5°	585.9	529.5	451.4	366.7	275.6	214.8	182.3	167.1	160.6	158.4	160.6
15°	631.5	559.9	447.0	323.3	221.3	173.6	154.1	147.6	143.2	143.2	141.1
17.5°	677.1	585.9	431.8	266.9	177.9	147.6	138.9	132.4	128.0	125.9	125.9
20°	727.0	609.8	397.1	212.7	147.6	134.5	125.9	117.2	112.8	112.8	112.8
22.5°	779.0	627.1	351.5	169.3	132.4	119.4	110.7	104.2	99.8	99.8	99.8
25°	824.6	635.8	297.3	141.1	121.5	108.5	99.8	93.3	91.1	89.0	89.0
27.5°	868.0	633.7	240.9	123.7	108.5	97.7	89.0	84.6	80.3	80.3	80.3
30°	911.4	620.6	191.0	112.8	99.8	86.8	80.3	76.0	73.8	71.6	71.6
32.5°	948.3	598.9	149.7	104.2	91.1	78.1	71.6	67.3	67.3	65.1	65.1
35°	985.2	566.4	125.9	97.7	82.5	71.6	65.1	62.9	60.8	60.8	60.8
37.5°	1024.3	525.2	110.7	89.0	73.8	65.1	60.8	58.6	56.4	54.3	54.3
40°	1072.0	483.9	104.2	82.5	67.3	58.6	54.3	52.1	49.9	49.9	49.9
42.5°	1148.0	449.2	97.7	73.8	60.8	54.3	49.9	45.6	45.6	43.4	43.4
45°	1291.2	436.2	91.1	67.3	56.4	47.7	45.6	41.2	39.1	39.1	39.1
47.5°	1477.8	438.3	84.6	60.8	52.1	43.4	41.2	39.1	34.7	34.7	34.7
50°	1631.9	427.5	78.1	56.4	45.6	41.2	36.9	34.7	32.6	32.6	32.6
52.5°	1692.6	408.0	71.6	52.1	43.4	36.9	34.7	32.6	30.4	30.4	30.4
55°	1753.4	399.3	65.1	45.6	39.1	36.9	32.6	30.4	28.2	26.0	26.0
57.5°	1864.1	403.6	58.6	43.4	36.9	34.7	30.4	26.0	21.7	19.5	19.5
60°	1922.7	388.4	54.3	39.1	34.7	32.6	26.0	19.5	15.2	13.0	13.0
62.5°	1872.8	345.0	49.9	36.9	32.6	28.2	19.5	15.2	10.9	6.5	6.5
65°	1733.9	284.3	45.6	34.7	28.2	21.7	17.4	10.9	6.5	4.3	4.3
67.5°	1558.1	223.5	41.2	32.6	26.0	19.5	15.2	8.7	4.3	2.2	2.2
70°	1258.6	160.6	39.1	30.4	23.9	17.4	13.0	8.7	4.3	2.2	2.2
72.5°	811.6	104.2	34.7	28.2	21.7	17.4	10.9	6.5	4.3	2.2	2.2
75°	375.4	69.4	32.6	26.0	21.7	15.2	10.9	8.7	4.3	2.2	2.2
77.5°	110.7	49.9	30.4	23.9	19.5	15.2	10.9	8.7	4.3	2.2	2.2
80°	45.6	34.7	23.9	21.7	19.5	15.2	10.9	8.7	4.3	2.2	2.2
82.5°	21.7	15.2	10.9	8.7	10.9	10.9	8.7	8.7	4.3	2.2	2.2
85°	10.9	6.5	4.3	4.3	4.3	2.2	2.2	4.3	4.3	2.2	2.2
87.5°	6.5	4.3	4.3	4.3	2.2	2.2	2.2	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)