

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: P348964

Luminaire Tested: **ARCH-N-PA1-40-830-U-T2U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P348964
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1908-474-1)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-N-PA1-40-830-U-T2U
Description: ARCHEON ROADWAY AND AREA LUMINAIRE
(1) 80 CRI, 3000K, 740mA LIGHT ENGINE WITH 16 LEDS AND
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4401 lumens
Efficiency: N/A
Efficacy: 107.3 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')
IES Classification: Type II - Short - Semi-Cutoff
BUG Rating: B1 - U0 - G1

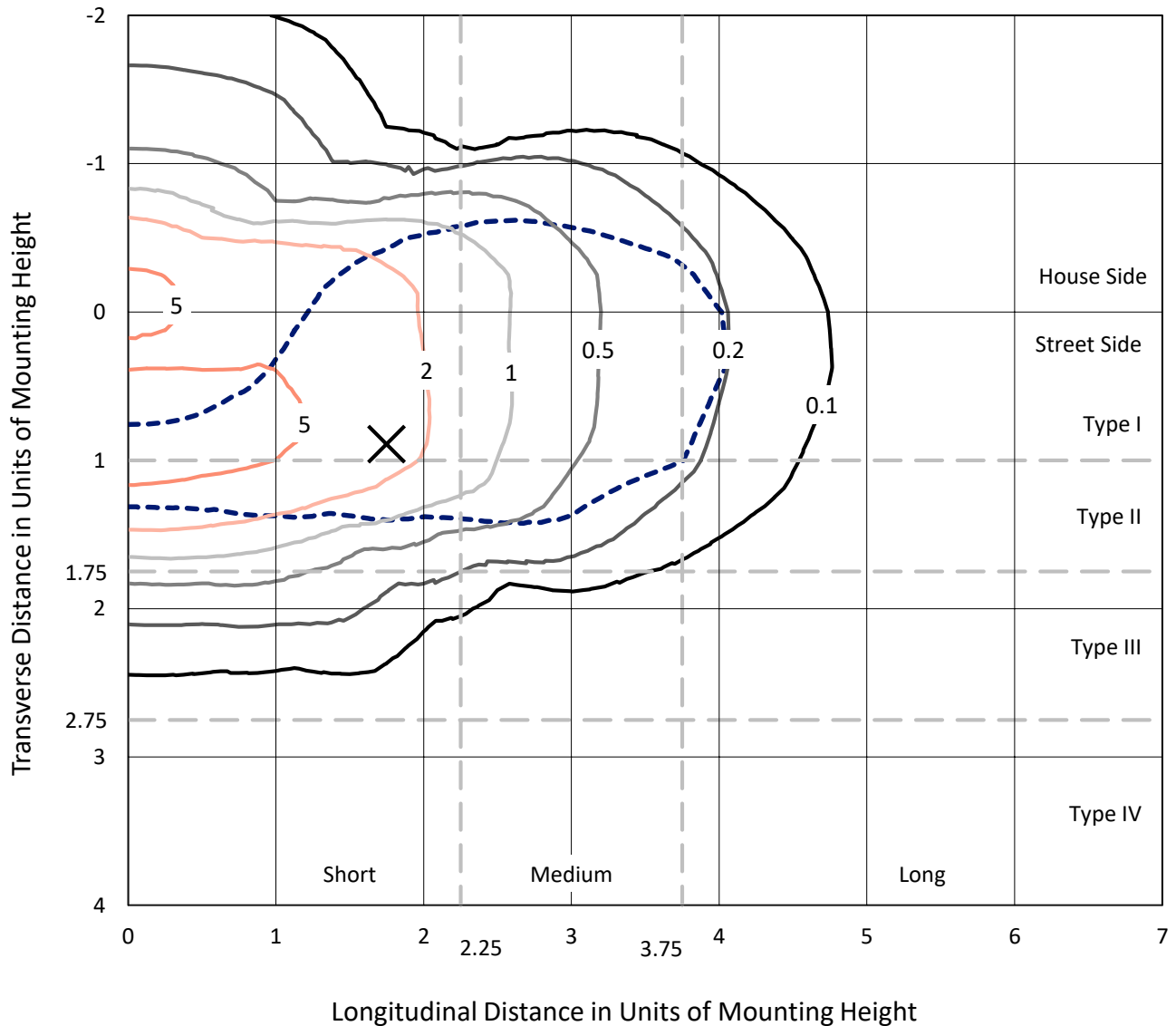
Input Watts (W): 41
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

✕ Max cd
 - - - 1/2 Max cd

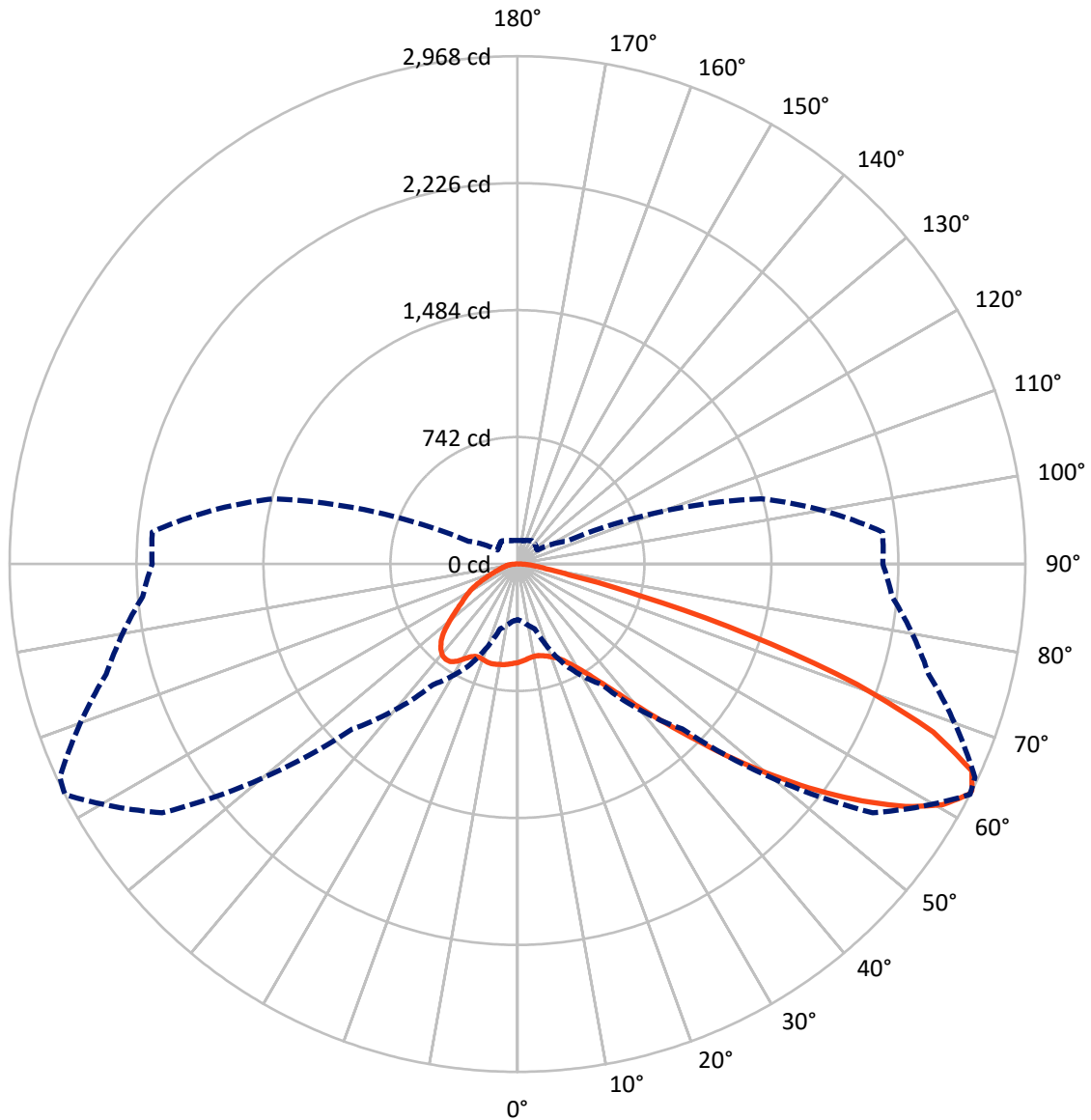


Based on 10 foot mounting height. Maximum calculated value = 7.6 fc
 Type II - Short - Semi-Cutoff

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Luminous Intensity Polar Plot



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



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FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1256.4	0.0	1256.4
	% Fixture	28.5	0.0	28.5
Street Side	Lumens	3144.6	0.0	3144.6
	% Fixture	71.5	0.0	71.5
Total	Lumens	4401.0	0.0	4401.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	54.7	1.2
10°-20°	161.3	3.7
20°-30°	283.3	6.4
30°-40°	477.5	10.9
40°-50°	836.5	19.0
50°-60°	1081.2	24.6
60°-70°	935.9	21.3
70°-80°	485.9	11.0
80°-90°	84.7	1.9
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°	4401.0	100.0
0°-180°	4401.0	100.0



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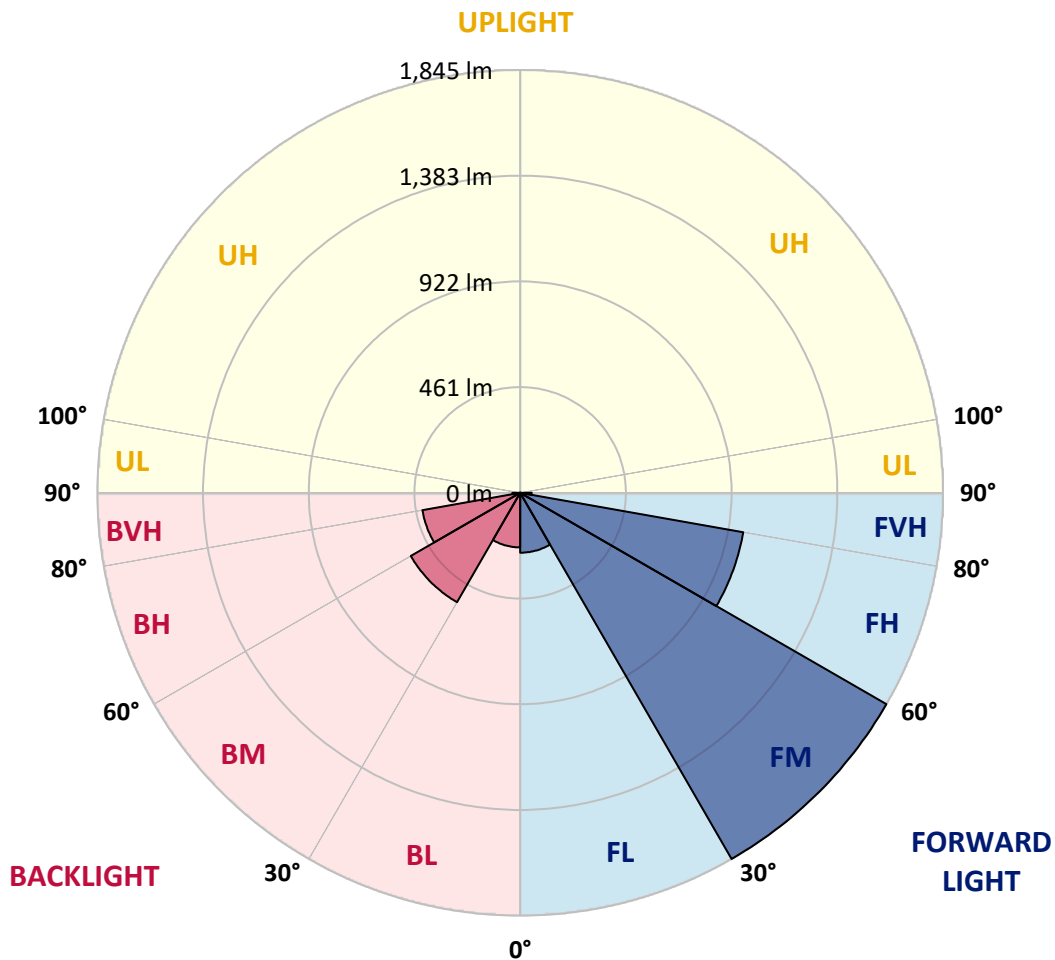
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	261.3	5.9			
FM	(30°-60°)	1844.5	41.9			
FH	(60°-80°)	988.3	22.5			G1/1800
FVH	(80°-90°)	50.4	1.1			G1/100
BL	(0°-30°)	238.0	5.4	B1/500		
BM	(30°-60°)	550.8	12.5	B1/1000		
BH	(60°-80°)	433.4	9.8	B1/500		G1/500
BVH	(80°-90°)	34.2	0.8			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G1

Type II Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	63°	65°	75°	85°
0°	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2
2.5°	562.6	561.0	563.9	565.1	564.7	567.2	567.2	567.6	567.6	569.6	571.7
5°	546.2	545.3	548.2	550.3	551.9	555.6	558.1	559.3	560.6	563.5	568.4
7.5°	530.5	529.3	533.4	535.0	537.5	542.9	548.6	551.9	553.6	559.7	566.7
10°	517.7	517.3	520.6	522.3	525.1	533.0	541.2	548.2	549.4	557.7	564.3
12.5°	511.6	510.7	514.4	516.5	521.4	530.9	540.4	549.0	551.1	560.6	566.3
15°	516.5	517.3	520.6	521.0	526.8	536.7	547.4	556.0	558.1	567.6	571.7
17.5°	540.0	539.6	541.6	540.8	542.9	547.8	559.3	566.3	568.8	575.8	579.1
20°	582.4	581.2	582.8	577.5	568.4	565.9	572.9	580.8	581.6	585.7	583.6
22.5°	647.1	648.3	644.6	631.0	609.2	598.9	594.3	596.8	599.7	599.3	593.1
25°	731.5	735.6	728.6	704.7	668.1	644.2	627.7	624.0	626.1	620.3	610.8
27.5°	842.3	845.6	830.3	793.3	743.9	708.4	675.5	662.7	662.7	650.4	633.1
30°	964.2	966.3	942.0	895.0	837.8	785.0	736.4	711.7	709.7	685.4	658.2
32.5°	1112.5	1106.7	1077.9	1019.8	947.7	875.2	812.6	775.2	771.0	734.4	699.8
35°	1304.0	1304.0	1244.3	1178.0	1090.2	998.0	915.6	857.5	853.4	811.8	766.9
37.5°	1512.0	1511.2	1457.2	1365.8	1260.8	1147.9	1037.9	965.4	956.0	911.5	861.2
40°	1719.2	1712.2	1668.5	1581.6	1469.6	1340.7	1189.1	1104.7	1100.1	1036.7	973.7
42.5°	1870.8	1864.2	1843.6	1785.5	1711.8	1618.7	1385.6	1271.5	1264.9	1185.0	1108.0
45°	1954.4	1944.9	1942.0	1942.8	1951.1	1950.7	1628.2	1468.8	1445.7	1353.0	1250.5
47.5°	1935.4	1913.2	1942.8	2019.0	2147.1	2231.2	1910.7	1703.1	1660.3	1527.7	1402.5
50°	1782.6	1771.9	1835.3	1990.6	2253.8	2451.1	2221.7	1946.5	1886.0	1692.8	1546.2
52.5°	1514.5	1535.1	1613.3	1834.1	2234.4	2584.1	2504.2	2199.4	2115.4	1850.2	1671.0
55°	1205.6	1231.5	1341.9	1575.9	2055.3	2585.8	2708.1	2444.5	2369.5	2012.9	1798.7
57.5°	877.3	914.0	1051.9	1266.5	1741.0	2409.1	2808.6	2673.9	2588.3	2173.1	1923.5
60°	551.1	577.0	727.4	976.2	1330.8	2019.0	2783.5	2857.6	2786.8	2324.2	2066.0
62.5°	355.0	367.4	432.5	696.9	928.0	1480.7	2597.7	2963.1	2932.6	2462.2	2173.5
63°	325.4	336.1	391.7	644.2	860.4	1364.1	2535.1	2968.4	2950.3	2488.2	2198.6
65°	232.7	244.2	273.1	442.8	635.1	915.2	2172.3	2918.6	2938.8	2531.4	2232.8
67.5°	183.7	187.4	200.6	269.0	450.6	519.8	1461.8	2620.8	2709.3	2485.3	2182.1
70°	164.3	167.2	182.1	206.4	341.0	336.9	762.4	2107.2	2290.5	2327.9	2054.5
72.5°	143.3	145.4	163.5	194.4	260.3	257.4	331.6	1416.9	1639.7	2039.6	1877.8
75°	118.6	120.7	135.9	172.6	220.4	203.5	207.6	740.6	939.9	1598.9	1646.7
77.5°	97.6	98.9	111.6	138.8	194.0	156.9	160.6	311.4	456.8	1089.8	1300.3
80°	70.8	71.3	83.2	105.4	148.3	141.7	119.4	169.7	207.2	597.2	818.0
82.5°	49.4	49.8	62.2	73.7	102.1	141.3	86.9	113.7	124.4	275.1	364.1
85°	34.6	33.8	42.4	48.6	64.7	85.7	66.3	72.9	77.0	119.0	98.0
87.5°	15.2	14.8	23.9	25.9	32.5	39.5	52.7	38.3	40.8	57.7	30.9
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°	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2	576.2
2.5°	572.1	573.7	576.2	579.9	582.8	584.0	586.5	586.9	590.6	587.3	587.8
5°	571.3	573.3	578.7	585.3	589.8	593.1	599.3	601.3	605.1	603.4	603.0
7.5°	570.0	573.7	581.6	591.0	598.0	603.4	609.2	612.9	616.6	615.8	614.9
10°	568.4	572.9	584.0	593.5	603.4	609.2	613.3	613.7	614.9	614.1	612.1
12.5°	569.6	574.6	587.3	596.8	607.1	611.2	610.0	603.8	598.5	593.9	593.1
15°	573.7	579.5	591.5	600.1	608.3	605.9	598.5	584.9	575.0	569.2	569.6
17.5°	577.9	582.8	591.9	598.9	603.0	595.6	584.0	572.5	568.0	563.5	562.6
20°	581.6	582.4	588.2	594.3	593.9	588.2	577.5	563.5	554.4	547.0	547.4
22.5°	587.3	584.0	584.5	588.2	592.7	587.3	562.2	537.9	524.3	515.7	515.3
25°	600.5	593.5	586.9	589.0	606.3	572.1	529.7	498.0	486.0	478.2	479.0
27.5°	618.6	609.2	596.0	607.1	616.6	542.0	483.1	450.6	442.4	434.1	436.2
30°	638.4	624.8	608.8	646.2	605.1	494.3	425.5	395.8	388.4	380.6	382.2
32.5°	673.8	653.7	632.6	693.2	578.3	436.2	364.9	338.2	333.2	328.3	328.7
35°	732.7	708.8	686.2	729.0	543.7	375.6	310.6	291.6	287.5	281.7	281.7
37.5°	819.6	782.2	770.2	748.0	496.3	319.2	270.6	257.8	249.2	241.4	241.4
40°	920.6	876.1	866.6	753.7	434.5	272.3	242.6	231.5	219.9	208.4	209.2
42.5°	1043.3	983.2	961.3	745.9	359.6	242.2	222.8	210.1	198.9	189.1	187.4
45°	1181.7	1105.5	1050.3	723.3	291.6	223.7	210.1	194.8	180.8	172.2	170.5
47.5°	1323.0	1238.1	1129.0	678.0	243.8	210.5	201.4	180.0	170.1	164.3	163.5
50°	1458.1	1369.5	1194.0	606.7	216.2	201.0	188.6	173.0	164.8	159.8	159.4
52.5°	1577.9	1494.3	1248.8	533.0	197.7	193.2	182.9	169.7	161.0	156.5	155.7
55°	1692.0	1620.7	1303.2	467.1	181.6	180.0	180.0	166.4	156.9	152.8	152.0
57.5°	1817.2	1764.5	1358.0	418.9	167.2	170.5	176.3	162.7	152.4	148.7	148.3
60°	1961.8	1930.9	1415.6	376.5	154.5	160.2	170.9	157.7	147.0	144.2	143.3
62.5°	2109.6	2110.5	1465.5	325.4	143.7	152.4	164.8	153.2	142.1	140.0	139.6
63°	2135.6	2143.0	1472.5	314.3	141.3	150.7	163.1	151.6	140.9	138.8	138.4
65°	2199.4	2232.0	1478.2	267.3	132.2	144.6	156.9	146.2	135.5	135.1	134.3
67.5°	2184.2	2237.3	1442.4	209.6	121.9	135.9	148.3	138.4	128.9	128.9	127.3
70°	2070.5	2105.1	1332.4	161.9	114.1	126.9	138.0	130.2	120.3	121.1	117.8
72.5°	1896.3	1858.4	1096.0	126.4	104.6	116.6	126.0	119.4	110.8	110.0	106.3
75°	1640.9	1516.1	785.0	102.1	93.1	103.0	112.9	107.9	100.1	95.6	94.7
77.5°	1250.5	1076.2	470.4	86.5	83.2	91.4	97.6	93.9	87.7	82.4	82.8
80°	744.7	620.7	212.1	73.3	72.1	78.3	83.2	80.3	76.2	69.6	68.0
82.5°	301.5	240.1	95.1	59.3	61.0	65.5	70.0	67.5	64.3	62.6	53.1
85°	78.3	75.4	55.6	44.5	47.0	49.0	55.2	55.2	52.3	42.8	39.5
87.5°	22.2	29.7	30.9	28.0	31.7	32.1	38.3	38.3	39.1	26.4	23.9
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)