

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: P348766

Luminaire Tested: **ARCH-N-PA1-20-740-U-T2R-HSS**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P348766
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1903-205-9)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: ARCH-N-PA1-20-740-U-T2R-HSS
Description: ARCHEON ROADWAY AND AREA LUMINAIRE
(1) 70 CRI, 4000K, 420mA LIGHT ENGINE WITH 16 LEDS AND
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2704 lumens
Efficiency: N/A
Efficacy: 112.7 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')
IES Classification: Type II - Medium - Full Cutoff
BUG Rating: B0 - U0 - G1

Input Watts (W): 24
Input Voltage (V): NR
Input Current (A_{in}): 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

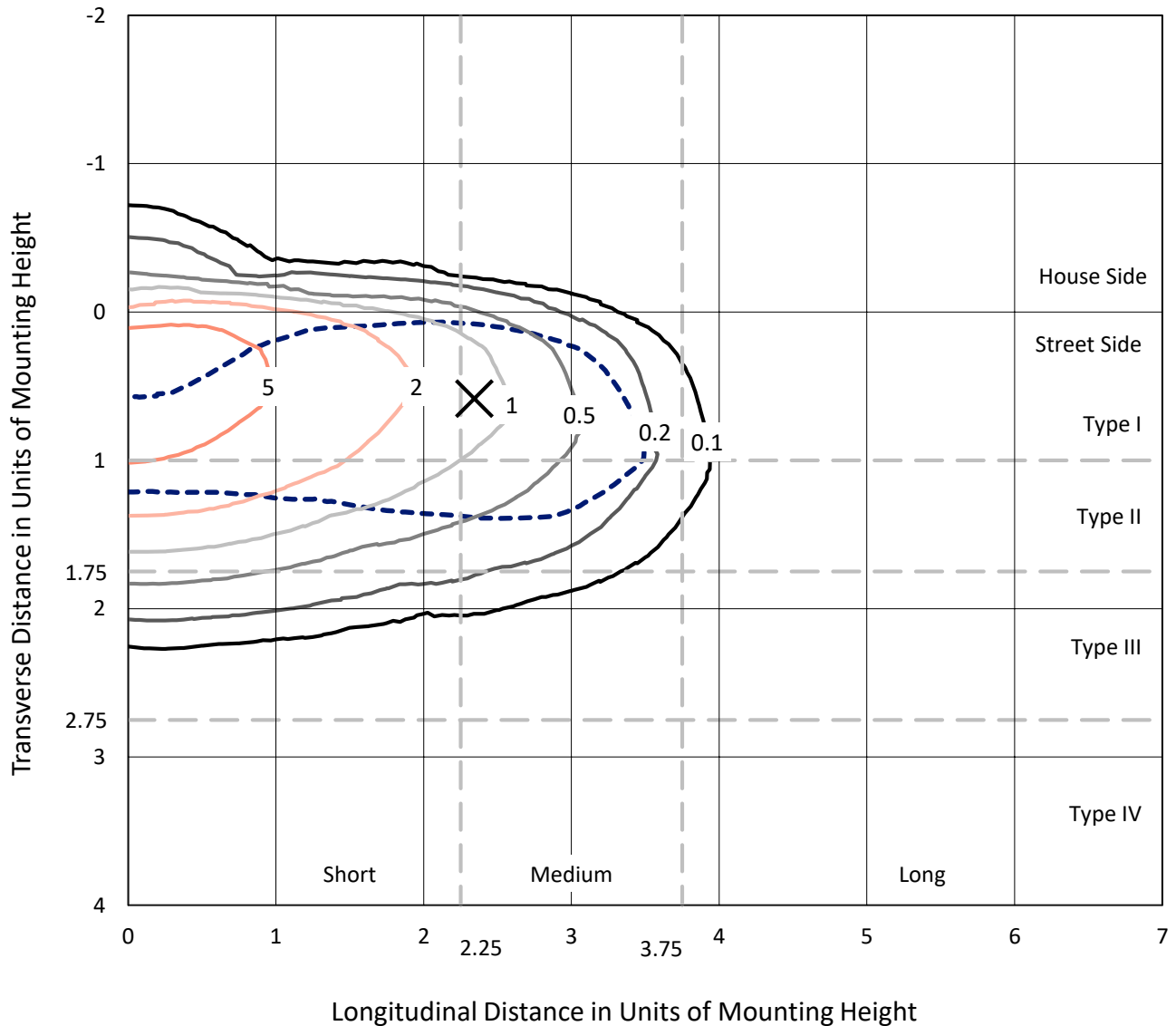


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Iso-Footcandle Lines of Horizontal Illumination

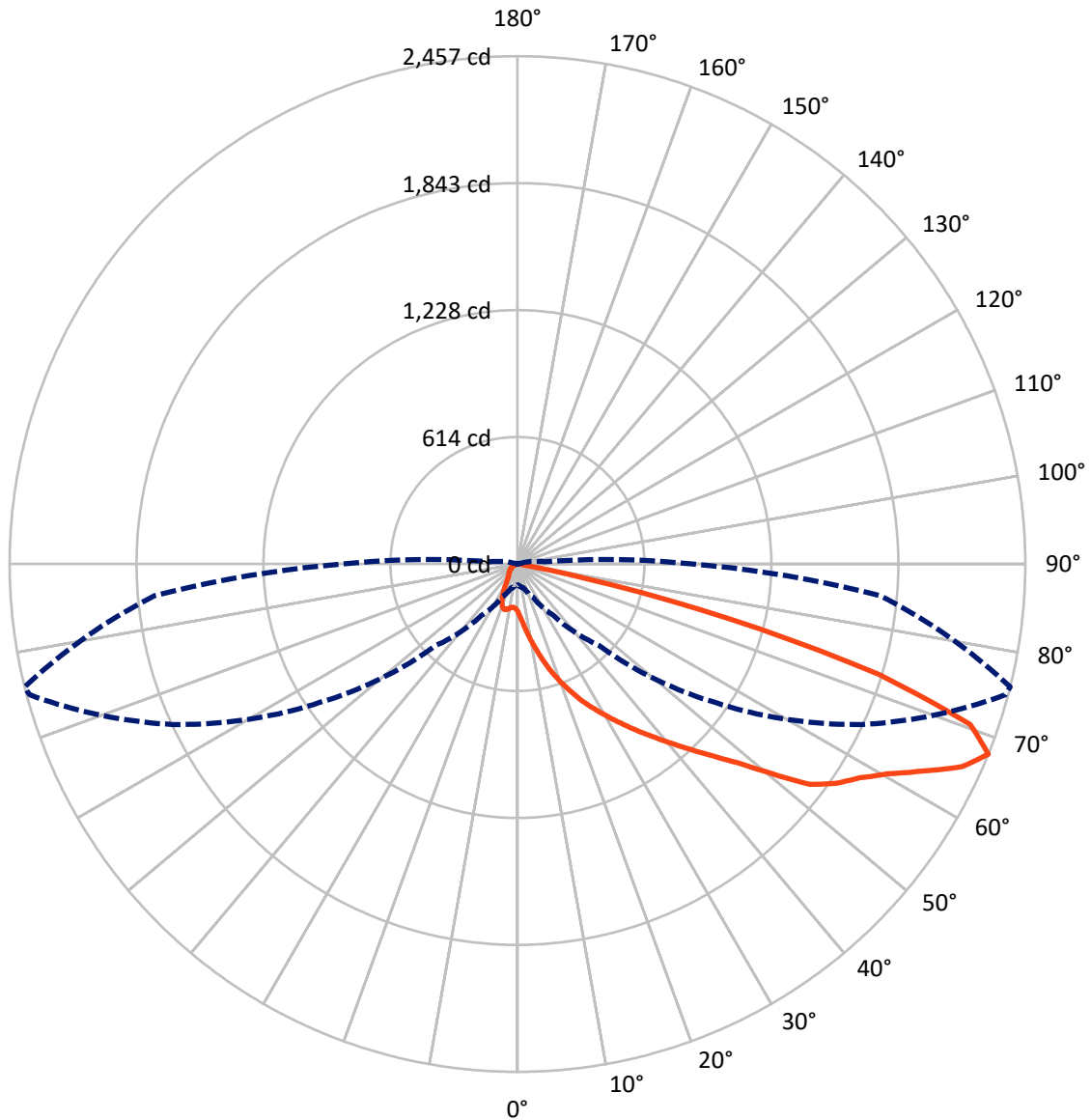
× Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 8.1 fc
 Type II - Medium - Full Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 76-Deg Lateral - - - Horizontal Cone Through 67.5-Deg Vertical

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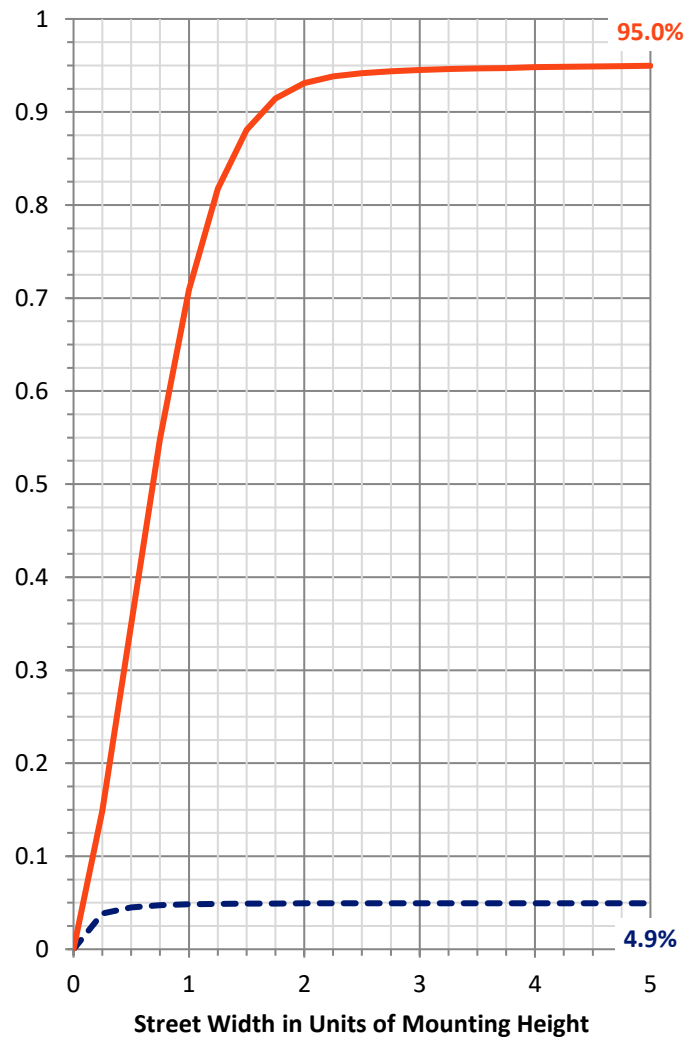
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	134.3	0.0	134.3
	% Fixture	5.0	0.0	5.0
Street Side	Lumens	2569.7	0.0	2569.7
	% Fixture	95.0	0.0	95.0
Total	Lumens	2704.0	0.0	2704.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	28.5	1.1
10°-20°	113.1	4.2
20°-30°	230.1	8.5
30°-40°	399.3	14.8
40°-50°	564.2	20.9
50°-60°	639.8	23.7
60°-70°	530.6	19.6
70°-80°	192.2	7.1
80°-90°	6.2	0.2
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°	2704.0	100.0
0°-180°	2704.0	100.0



--- HS — SS

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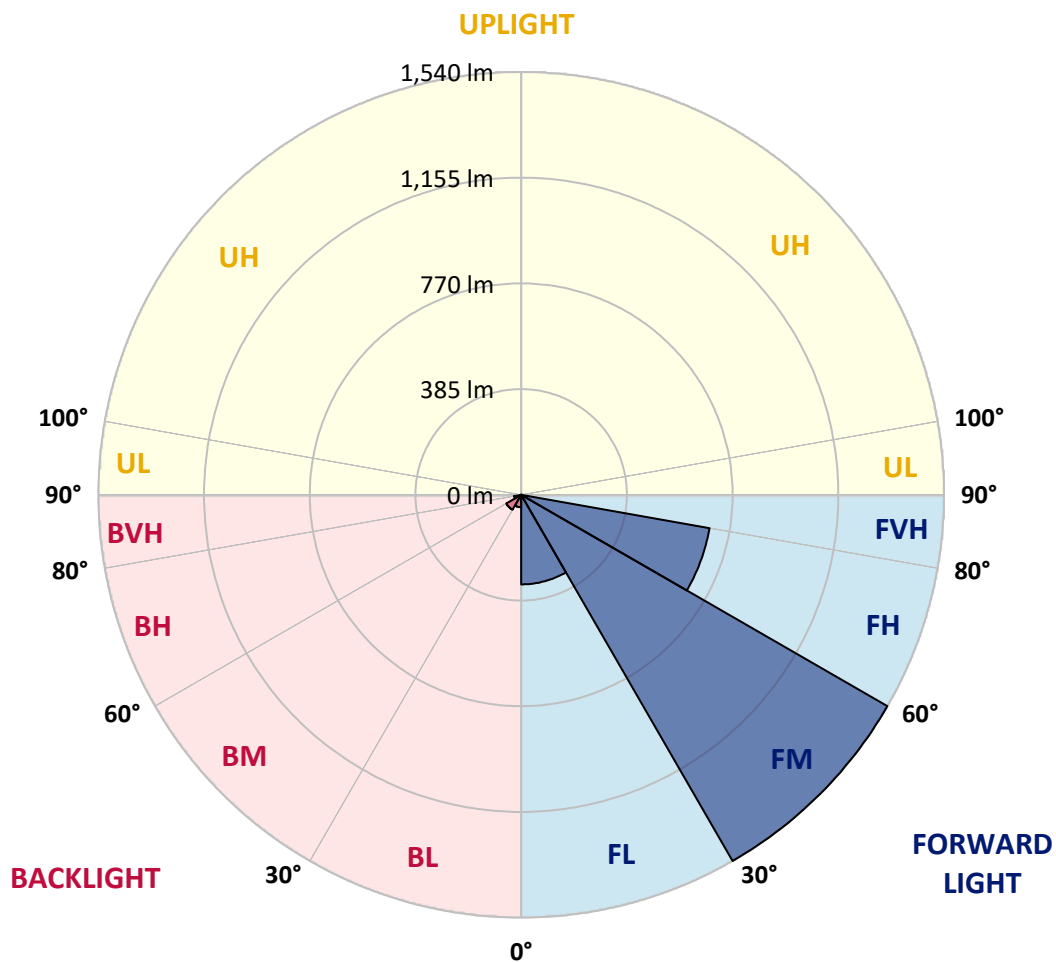
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	326.4	12.1			
FM	(30°-60°)	1540.4	57.0			
FH	(60°-80°)	696.9	25.8			G1/1800
FVH	(80°-90°)	6.0	0.2			G0/10
BL	(0°-30°)	45.3	1.7	B0/110		
BM	(30°-60°)	62.8	2.3	B0/220		
BH	(60°-80°)	25.9	1.0	B0/110		G0/110
BVH	(80°-90°)	0.2	0.0			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 Medium





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	76°	85°
0°	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4
2.5°	342.4	334.7	336.5	331.5	322.5	304.0	288.3	273.3	255.9	255.3	241.0
5°	461.7	455.2	454.4	444.3	428.0	396.6	366.0	331.2	292.3	289.4	259.0
7.5°	570.0	564.8	562.9	550.9	520.5	489.9	450.1	398.9	338.1	332.9	283.3
10°	653.2	650.7	651.2	642.6	616.6	588.1	535.9	470.6	390.2	382.1	312.4
12.5°	716.2	716.8	721.1	715.9	701.3	680.2	624.4	547.0	447.7	436.7	345.7
15°	762.5	765.5	773.3	779.8	778.8	760.5	709.3	624.6	508.9	496.7	382.8
17.5°	792.5	795.8	807.2	821.7	834.9	830.7	791.3	699.5	570.7	556.6	422.5
20°	818.8	822.7	834.9	854.0	878.8	884.1	858.3	772.1	632.4	615.3	463.5
22.5°	875.8	875.7	883.2	894.3	917.9	931.6	915.3	839.6	693.5	675.6	505.3
25°	978.9	975.0	972.4	963.6	968.8	977.3	968.2	902.6	754.8	736.7	547.7
27.5°	1101.4	1103.8	1082.7	1059.1	1040.8	1032.1	1017.2	961.0	813.8	793.9	589.2
30°	1230.7	1231.4	1206.5	1176.4	1136.2	1102.9	1077.1	1016.8	874.5	852.8	629.5
32.5°	1347.2	1342.6	1318.0	1277.0	1226.3	1188.8	1135.2	1079.1	938.7	917.7	674.3
35°	1439.7	1434.2	1404.2	1366.9	1314.3	1276.6	1212.1	1141.3	1006.3	985.8	719.2
37.5°	1507.2	1500.8	1470.0	1431.6	1386.2	1364.3	1301.3	1209.0	1079.9	1057.9	766.4
40°	1530.6	1525.1	1505.8	1477.7	1441.2	1436.2	1395.9	1286.8	1160.2	1136.7	820.0
42.5°	1516.7	1511.2	1504.3	1494.9	1479.7	1484.4	1485.3	1375.6	1249.3	1226.2	879.1
45°	1461.2	1456.4	1463.5	1477.3	1496.2	1519.6	1566.8	1470.9	1348.8	1324.1	947.5
47.5°	1379.6	1376.0	1395.7	1430.3	1485.4	1550.1	1641.3	1571.2	1460.5	1437.6	1032.8
50°	1263.5	1262.9	1302.2	1365.4	1450.1	1564.8	1718.3	1685.1	1615.7	1591.7	1151.4
52.5°	1082.7	1083.9	1161.2	1262.3	1388.1	1554.8	1767.8	1831.6	1796.3	1771.3	1254.1
55°	910.5	917.6	972.5	1118.2	1293.1	1517.8	1784.9	1899.9	1895.9	1872.2	1311.2
57.5°	741.9	754.8	807.7	943.8	1154.4	1432.7	1775.5	1929.6	1970.1	1952.0	1386.6
60°	559.2	565.2	626.0	753.3	976.3	1277.2	1707.7	1945.7	2071.5	2058.9	1495.9
62.5°	355.8	370.6	424.6	547.4	760.2	1061.3	1593.2	1945.4	2198.4	2205.3	1637.0
65°	187.4	204.7	233.4	339.2	522.4	820.2	1421.1	1927.2	2354.1	2363.7	1747.3
67.5°	101.1	106.0	121.2	176.1	303.0	555.7	1168.1	1837.2	2444.2	2456.9	1762.7
70°	73.9	76.7	82.3	97.4	152.5	322.7	852.3	1633.0	2328.0	2323.3	1566.2
72.5°	56.8	61.0	65.3	71.3	87.7	172.3	530.7	1278.8	1857.5	1826.3	1170.7
75°	44.8	45.5	51.5	57.0	65.8	98.1	235.7	744.8	1133.7	1059.7	607.1
77.5°	35.8	36.3	39.8	44.5	52.8	64.5	73.0	293.0	362.0	323.0	131.7
80°	21.2	22.4	29.6	34.4	43.8	40.6	26.7	63.6	56.5	51.2	22.2
82.5°	11.8	12.8	16.7	27.1	30.6	19.4	13.3	17.2	13.3	12.9	6.3
85°	0.0	0.6	10.8	16.8	12.4	4.3	5.6	5.7	3.9	3.7	2.5
87.5°	0.0	0.0	3.3	3.2	0.5	0.7	1.3	1.9	1.5	1.5	1.3
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°	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4	229.4
2.5°	233.9	227.5	215.4	203.5	193.6	185.4	178.1	175.1	172.7	172.4	170.5
5°	244.3	231.4	208.3	189.3	176.7	167.6	159.9	155.2	151.5	150.1	148.8
7.5°	260.1	240.5	207.3	185.5	170.4	155.2	141.0	125.6	116.0	112.3	110.2
10°	279.3	252.6	210.9	184.5	157.9	125.9	102.4	82.8	74.9	72.3	71.6
12.5°	301.7	267.6	217.1	177.8	131.4	89.5	70.6	64.0	62.2	61.4	61.4
15°	327.4	284.1	221.4	158.6	97.2	67.7	61.1	58.1	56.2	55.1	55.2
17.5°	353.7	300.2	219.3	130.8	71.7	60.2	55.3	52.0	49.4	48.3	48.1
20°	380.2	315.2	207.5	97.4	60.7	54.6	49.2	45.5	42.9	41.8	41.6
22.5°	407.7	327.8	186.6	71.4	54.5	48.5	43.1	39.5	37.0	36.0	35.5
25°	434.5	338.1	157.5	57.8	48.7	42.7	37.6	34.1	31.9	30.9	30.8
27.5°	459.5	344.7	123.7	51.1	43.6	37.4	32.8	29.7	27.8	27.1	27.0
30°	482.0	345.3	91.5	46.1	39.1	32.9	28.7	25.9	24.3	23.6	23.3
32.5°	504.7	340.3	66.6	41.6	35.0	29.0	24.9	22.7	21.6	21.0	21.0
35°	526.2	328.8	51.9	37.7	30.9	25.2	21.9	20.4	19.7	19.1	19.1
37.5°	547.1	312.3	44.1	34.2	27.1	22.0	19.3	18.4	17.8	17.2	17.2
40°	568.5	291.6	40.0	31.0	24.1	19.5	17.2	16.4	15.8	15.3	15.2
42.5°	594.7	267.6	37.4	28.1	21.3	17.3	15.2	14.2	13.7	13.3	13.0
45°	625.0	247.0	35.3	25.1	19.1	15.4	13.2	12.2	11.5	10.9	10.8
47.5°	668.7	232.1	32.5	21.9	16.9	13.4	11.4	10.3	9.2	8.6	8.5
50°	724.5	219.8	28.8	19.1	14.8	11.4	9.5	8.2	7.2	6.6	6.6
52.5°	752.2	203.7	25.5	16.6	12.4	9.6	7.7	6.2	5.7	5.1	5.1
55°	763.4	191.3	22.2	14.1	10.3	7.9	6.0	4.7	4.4	4.0	3.9
57.5°	794.6	187.8	19.3	12.0	8.5	6.3	4.6	3.6	3.3	2.8	2.8
60°	845.0	189.6	16.7	10.2	6.9	4.9	3.4	2.7	2.5	2.0	2.0
62.5°	899.4	187.3	14.1	8.8	5.3	3.6	2.4	2.0	2.0	1.2	1.1
65°	909.8	166.8	12.1	7.2	4.1	2.6	1.5	1.3	1.8	0.2	0.0
67.5°	844.4	129.4	10.4	5.6	3.1	2.0	1.2	0.6	1.5	0.0	0.0
70°	675.2	82.2	8.4	4.0	2.4	1.7	0.9	0.2	1.2	0.0	0.0
72.5°	477.5	47.7	6.6	2.8	2.0	1.3	0.7	0.0	0.7	0.0	0.0
75°	241.5	25.5	4.1	2.1	1.5	0.9	0.5	0.0	0.1	0.0	0.0
77.5°	52.2	11.8	2.6	1.5	1.1	0.6	0.2	0.0	0.0	0.0	0.0
80°	11.4	5.2	1.7	0.9	0.6	0.4	0.0	0.0	0.0	0.0	0.0
82.5°	4.1	2.7	0.8	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0
85°	2.3	1.4	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	1.2	0.5	0.1	0.1	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)