

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: P348883

Luminaire Tested: **ARCH-N-PA1-10-750-U-T4W-HSS**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P348883  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1903-205-19)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-N-PA1-10-750-U-T4W-HSS  
Description: ARCHEON ROADWAY AND AREA LUMINAIRE  
(1) 70 CRI, 5000K, 270mA LIGHT ENGINE WITH 16 LEDS AND  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1592 lumens  
Efficiency: N/A  
Efficacy: 113.7 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')  
IES Classification: Type IV - Short - Semi-Cutoff  
BUG Rating: B0 - U0 - G1

Input Watts (W): 14  
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

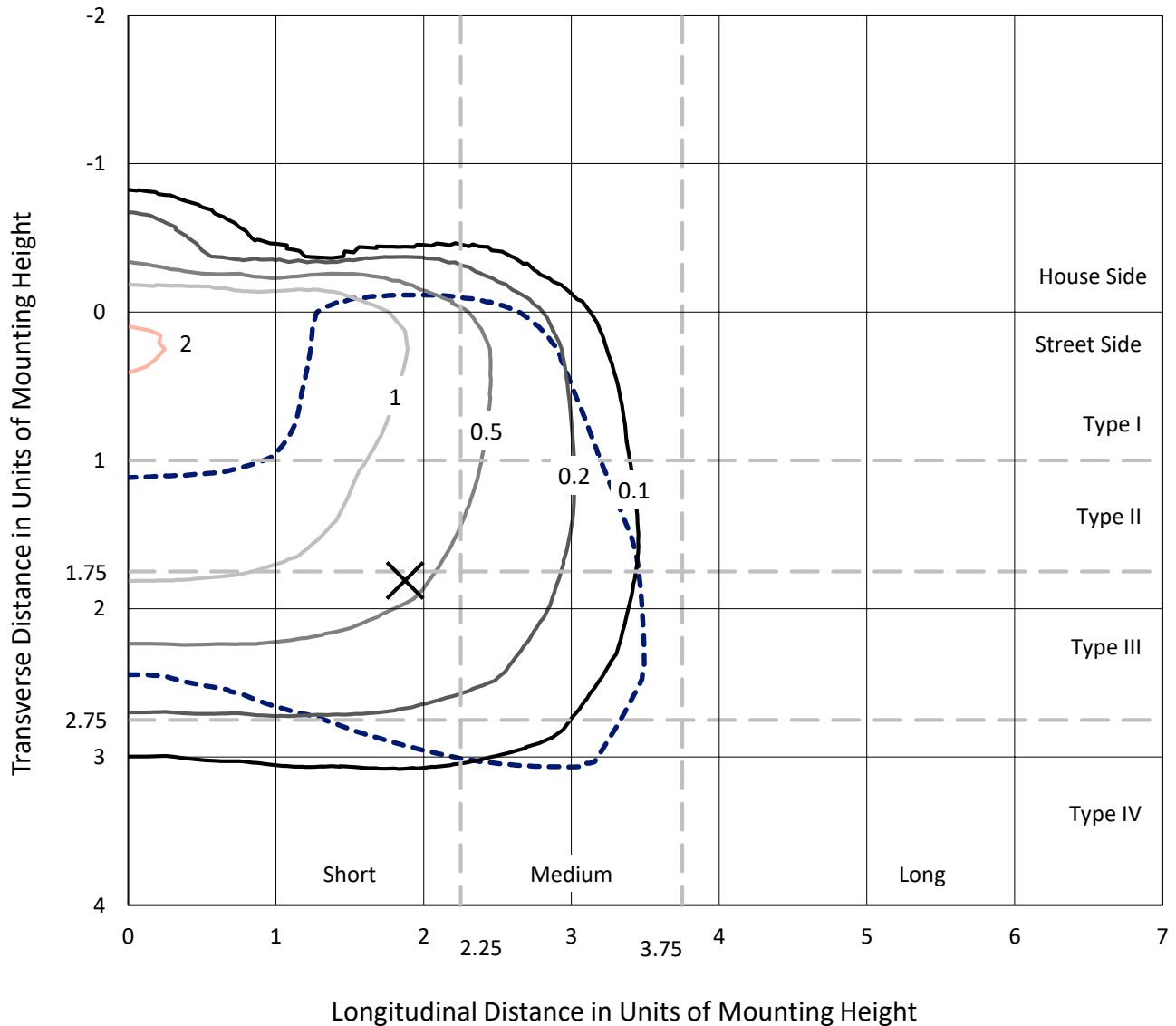


REPORT NUMBER: P348883

CATALOG NUMBER: ARCH-N-PA1-10-750-U-T4W-HSS

### Iso-Footcandle Lines of Horizontal Illumination

× Max cd  
 - - - 1/2 Max cd

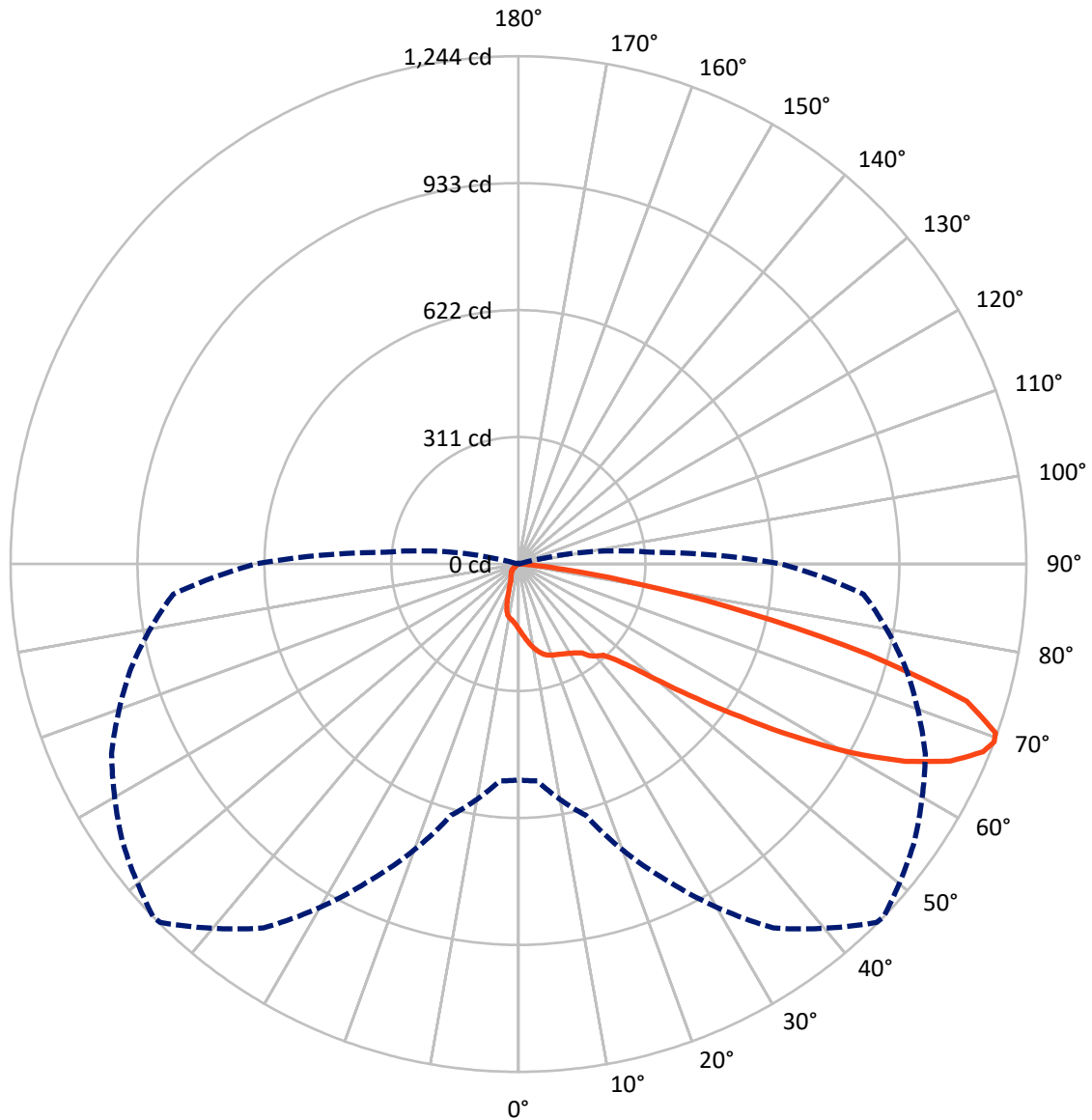


Based on 10 foot mounting height. Maximum calculated value = 2.3 fc  
 Type IV - Short - Semi-Cutoff

REPORT NUMBER: P348883

CATALOG NUMBER: ARCH-N-PA1-10-750-U-T4W-HSS

### Luminous Intensity Polar Plot



— Vertical Plane Through 46-Deg Lateral    - - - Horizontal Cone Through 69-Deg Vertical

REPORT NUMBER: P348883

CATALOG NUMBER: ARCH-N-PA1-10-750-U-T4W-HSS

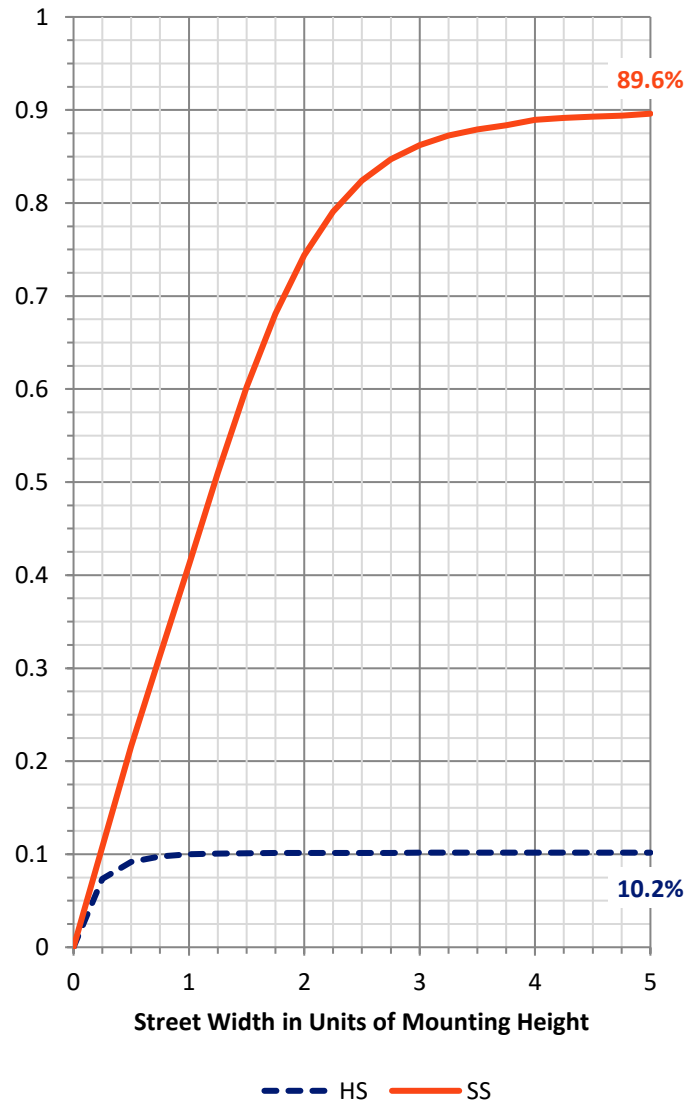
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	163.4	0.0	163.4
	% Fixture	10.3	0.0	10.3
<b>Street Side</b>	Lumens	1428.6	0.0	1428.6
	% Fixture	89.7	0.0	89.7
<b>Total</b>	Lumens	1592.0	0.0	1592.0
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	15.9	1.0
10°-20°	48.2	3.0
20°-30°	75.7	4.8
30°-40°	108.6	6.8
40°-50°	187.8	11.8
50°-60°	370.9	23.3
60°-70°	518.4	32.6
70°-80°	250.4	15.7
80°-90°	16.1	1.0
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°	1592.0	100.0
0°-180°	1592.0	100.0



REPORT NUMBER: P348883

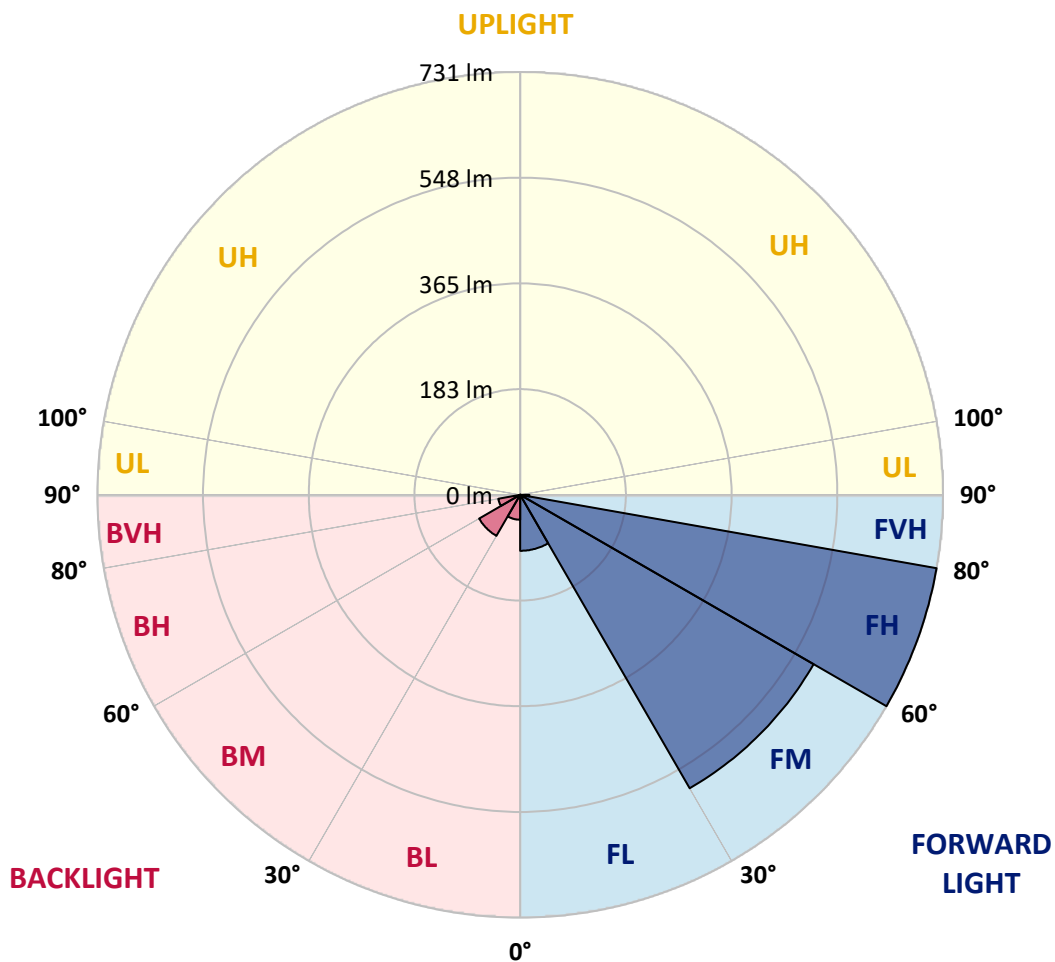
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	96.7	6.1			
FM	(30°-60°)	585.4	36.8			
FH	(60°-80°)	730.5	45.9			G1/1800
FVH	(80°-90°)	16.0	1.0			G1/100
BL	(0°-30°)	43.1	2.7	B0/110		
BM	(30°-60°)	81.9	5.1	B0/220		
BH	(60°-80°)	38.3	2.4	B0/110		G0/110
BVH	(80°-90°)	0.1	0.0			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B0-U0-G1**

Type IV Short





REPORT NUMBER: P348883

CATALOG NUMBER: ARCH-N-PA1-10-750-U-T4W-HSS

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	46°	55°	65°	75°	85°
0°	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5
2.5°	177.2	177.0	175.9	175.5	172.9	171.5	170.9	169.0	166.3	163.6	160.6
5°	197.4	197.3	195.3	193.5	188.7	184.2	183.4	179.1	173.0	167.3	161.7
7.5°	218.0	217.0	215.0	211.5	204.5	197.4	196.7	190.6	182.0	173.8	165.6
10°	235.4	234.8	232.3	226.8	218.7	210.6	209.7	202.2	192.5	182.4	172.1
12.5°	249.0	248.6	245.2	238.4	229.8	221.3	220.2	213.5	203.1	191.8	179.6
15°	257.3	257.1	253.0	245.7	237.2	229.9	228.9	223.0	213.4	201.6	187.8
17.5°	259.2	259.3	255.1	247.7	240.7	235.5	234.8	230.3	222.2	210.5	196.0
20°	254.9	255.8	252.0	245.7	241.3	238.6	238.0	235.3	228.5	217.4	202.6
22.5°	248.8	249.2	246.6	242.4	240.6	241.1	240.8	239.3	233.6	223.4	209.1
25°	245.1	245.1	243.5	239.9	241.1	244.3	244.4	244.1	239.5	230.7	217.0
27.5°	244.9	244.5	242.7	240.0	243.3	248.2	248.5	250.5	247.7	239.6	226.8
30°	250.9	250.4	246.5	243.0	247.2	252.5	253.3	257.7	256.2	249.2	237.8
32.5°	264.8	263.0	254.5	248.8	251.9	258.3	259.2	266.3	268.5	261.1	248.4
35°	283.9	278.0	265.9	259.7	260.0	266.6	267.5	277.8	284.5	272.0	256.6
37.5°	310.3	307.4	287.6	271.0	272.4	282.4	285.1	296.3	294.4	278.0	266.0
40°	368.1	363.5	342.5	302.8	284.2	295.3	296.1	302.1	302.2	291.5	285.4
42.5°	446.7	444.9	422.7	360.5	307.6	303.9	305.4	315.4	326.7	320.0	319.7
45°	533.8	532.9	509.4	437.1	354.9	332.0	333.9	347.4	369.0	370.5	379.9
47.5°	603.9	603.5	590.0	522.6	427.2	379.7	380.3	394.6	432.6	451.3	466.4
50°	667.8	670.0	659.3	615.1	525.7	454.4	453.0	462.6	523.5	554.2	573.0
52.5°	756.7	759.7	729.8	701.3	629.1	547.1	546.0	556.0	632.8	655.7	659.1
55°	835.1	829.9	806.2	798.0	755.2	661.6	661.3	670.1	738.4	748.2	754.4
57.5°	869.7	867.7	879.1	898.0	887.2	797.0	796.3	789.6	833.0	834.1	853.1
60°	891.6	894.1	929.1	987.1	1013.9	942.6	938.3	897.3	923.3	921.0	941.4
62.5°	875.2	880.0	943.0	1039.7	1108.7	1069.7	1063.6	996.0	1000.5	992.5	1011.5
65°	788.0	795.5	898.8	1029.8	1155.7	1169.1	1162.9	1083.1	1061.8	1048.7	1038.1
67.5°	639.8	644.3	752.1	943.4	1134.5	1228.3	1227.1	1159.4	1108.1	1039.2	957.5
69°	528.8	533.2	636.9	852.5	1087.8	1241.0	1243.5	1183.9	1099.3	981.6	848.4
70°	447.9	452.6	549.2	774.6	1033.7	1235.1	1239.5	1181.6	1074.0	914.8	752.6
72.5°	234.9	238.9	338.1	533.6	842.7	1134.1	1147.5	1081.7	910.4	664.4	445.0
75°	73.8	76.1	132.0	278.9	577.0	881.8	884.9	848.5	646.5	365.5	185.3
77.5°	28.1	27.5	44.0	102.8	291.7	555.3	574.0	530.3	339.3	129.2	42.8
80°	15.2	15.2	22.8	42.5	124.8	285.4	301.2	257.0	120.5	40.3	9.9
82.5°	6.6	6.9	12.8	22.5	57.3	105.2	113.2	94.2	46.1	27.1	3.7
85°	1.4	1.6	6.2	12.2	23.4	29.6	31.0	30.5	29.3	21.0	1.4
87.5°	0.0	0.0	2.8	4.4	5.9	6.7	5.9	7.7	16.2	14.2	0.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P348883

CATALOG NUMBER: ARCH-N-PA1-10-750-U-T4W-HSS

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5	159.5
2.5°	159.7	158.3	156.0	153.5	151.7	149.8	148.3	147.6	146.9	146.4	147.0
5°	159.4	156.8	152.3	147.9	144.8	142.3	140.2	139.4	138.5	137.9	137.9
7.5°	162.0	158.3	151.5	145.1	140.3	136.8	134.0	132.8	131.8	131.4	131.0
10°	167.0	162.3	153.1	144.8	138.5	132.7	126.6	121.9	118.8	117.4	116.9
12.5°	173.5	167.6	156.2	146.4	137.3	126.1	113.1	101.9	94.6	92.3	90.8
15°	181.1	173.8	160.3	148.4	132.6	112.2	90.2	75.5	68.8	67.5	66.0
17.5°	188.4	180.3	165.3	148.8	122.5	89.6	66.1	56.1	53.5	54.4	54.6
20°	194.8	186.8	170.1	145.5	104.1	67.3	51.1	48.7	49.6	51.4	51.7
22.5°	201.3	193.1	174.6	136.8	80.5	51.1	46.1	46.7	47.6	49.3	49.6
25°	209.2	200.7	178.8	120.9	60.4	43.4	43.7	44.6	45.6	47.2	47.3
27.5°	218.3	210.3	181.5	100.2	44.8	39.9	40.9	42.2	43.2	44.7	45.0
30°	230.4	223.0	182.4	78.8	37.5	36.8	37.2	38.9	40.3	41.7	41.9
32.5°	241.8	235.6	179.4	59.5	34.8	33.9	33.9	34.9	36.5	37.8	38.1
35°	252.2	248.2	169.9	43.5	32.7	31.2	30.5	30.5	31.5	32.5	32.8
37.5°	266.0	265.9	154.4	34.7	30.7	29.0	27.4	26.2	25.8	26.1	26.2
40°	289.7	289.9	134.3	31.1	29.0	26.6	24.3	22.1	20.1	19.4	19.3
42.5°	326.6	323.3	113.2	29.4	27.5	24.3	20.7	17.8	14.6	13.7	13.6
45°	385.3	365.4	90.8	27.8	25.9	21.6	17.1	13.1	10.6	9.9	9.9
47.5°	470.8	420.7	70.3	26.1	23.8	18.5	12.9	9.5	7.8	7.4	7.5
50°	559.2	474.9	53.9	24.0	21.3	15.3	9.6	6.9	5.9	5.9	6.0
52.5°	637.5	514.6	42.0	21.6	18.1	12.0	7.2	5.4	4.9	4.9	4.9
55°	710.9	540.2	32.2	19.0	14.4	9.0	5.5	4.4	4.1	4.0	3.9
57.5°	781.7	552.9	24.1	15.3	10.5	6.5	4.4	3.7	3.4	3.2	3.1
60°	828.8	542.6	16.6	11.3	7.2	4.7	3.7	3.2	2.8	2.6	2.5
62.5°	855.3	514.4	10.7	8.1	5.2	3.5	2.9	2.7	2.2	1.9	1.9
65°	844.6	468.0	7.5	5.8	3.7	2.6	2.2	2.2	1.6	1.3	1.2
67.5°	748.4	395.4	5.7	4.3	2.7	1.9	1.6	1.9	1.0	0.6	0.6
69°	643.9	327.7	4.9	3.6	2.2	1.6	1.4	1.7	0.7	0.4	0.4
70°	559.7	282.7	4.4	3.1	1.9	1.3	1.3	1.6	0.7	0.4	0.3
72.5°	334.8	157.6	3.4	2.2	1.2	1.0	1.0	1.9	0.7	0.4	0.3
75°	135.3	55.5	2.5	1.6	0.9	0.9	1.3	2.4	0.6	0.3	0.2
77.5°	30.7	12.2	1.4	1.0	0.6	0.9	1.5	1.9	0.4	0.1	0.0
80°	7.5	3.0	0.9	0.6	0.4	0.7	1.1	1.0	0.1	0.0	0.0
82.5°	2.5	1.0	0.4	0.3	0.1	0.2	0.5	0.3	0.0	0.0	0.0
85°	1.0	0.6	0.1	0.1	0.0	0.0	0.1	0.0	0.0	0.0	0.0
87.5°	0.7	0.2	0.0	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)