

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: P198672

Luminaire Tested: **XNV-AF-01-LED-U-AFL-1200-HSS**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P198672
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24283)
Test Lab: INNOVATION CENTER P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: XNV-AF-01-LED-U-AFL-1200-HSS
Description: XNV ROADWAY AND AREA LUMINAIRE
(1) 70 CRI, 4000K, 1200mA LIGHTSQUARE WITH 16 LEDS EACH AND AUTOMOTIVE FRONTLINE OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5697.8 lumens
Efficiency: N/A
Efficacy: 86.3 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type II - Short - Full Cutoff
BUG Rating: B1 - U0 - G1

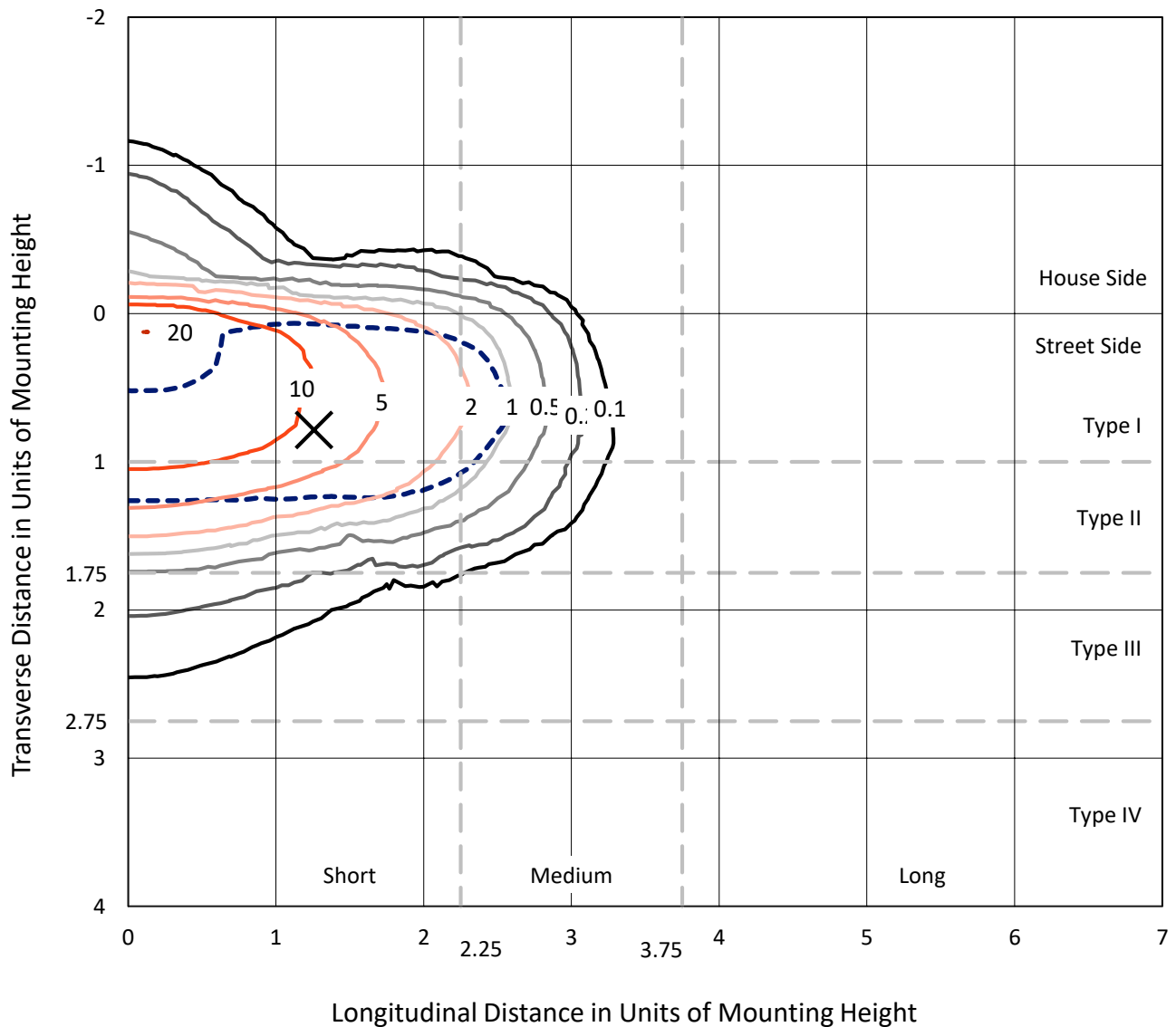
Input Watts (W): 66
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

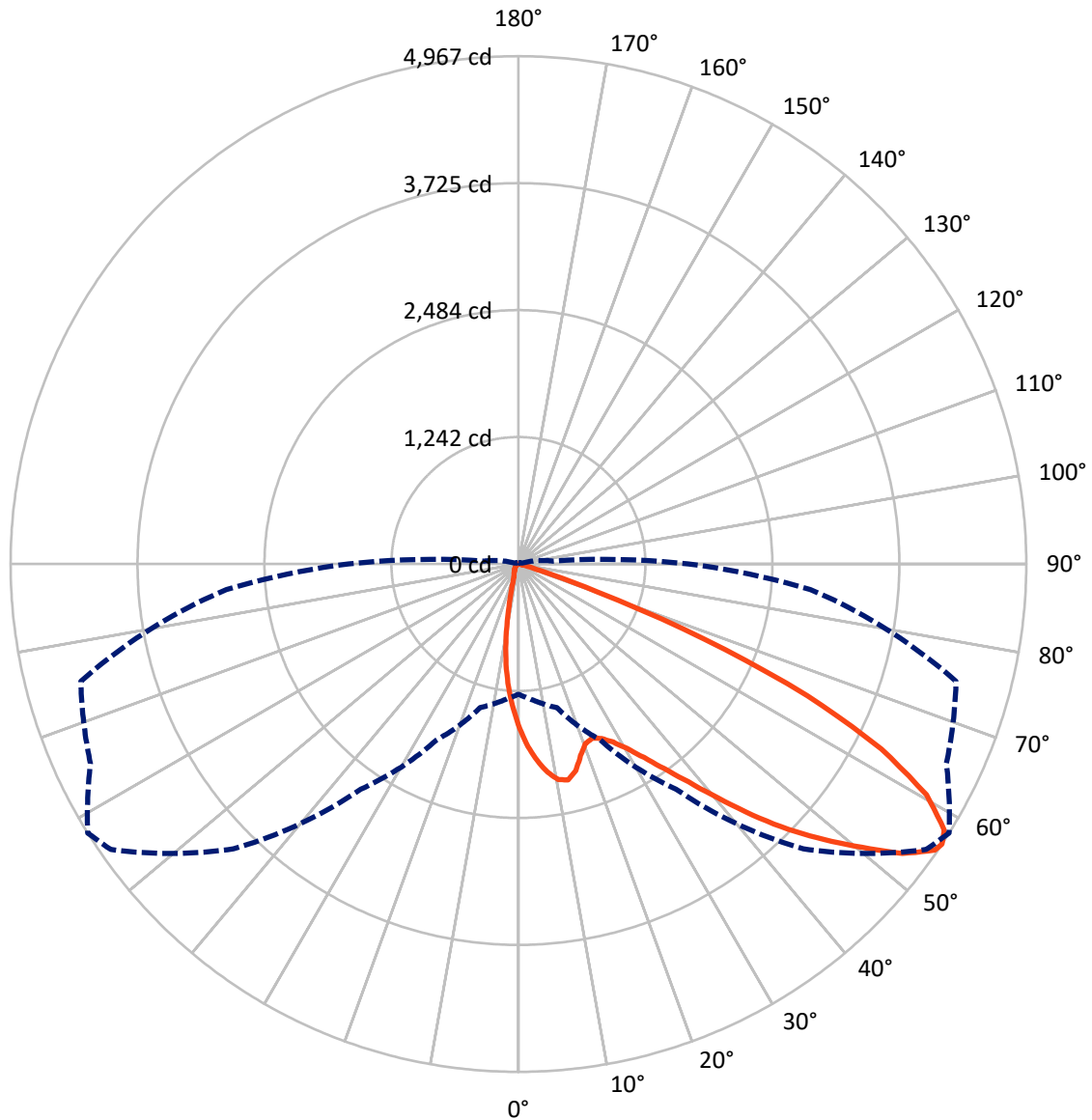
✕ Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 20.1 fc
 Type II - Short - Full Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 58-Deg Lateral - - - Horizontal Cone Through 56-Deg Vertical

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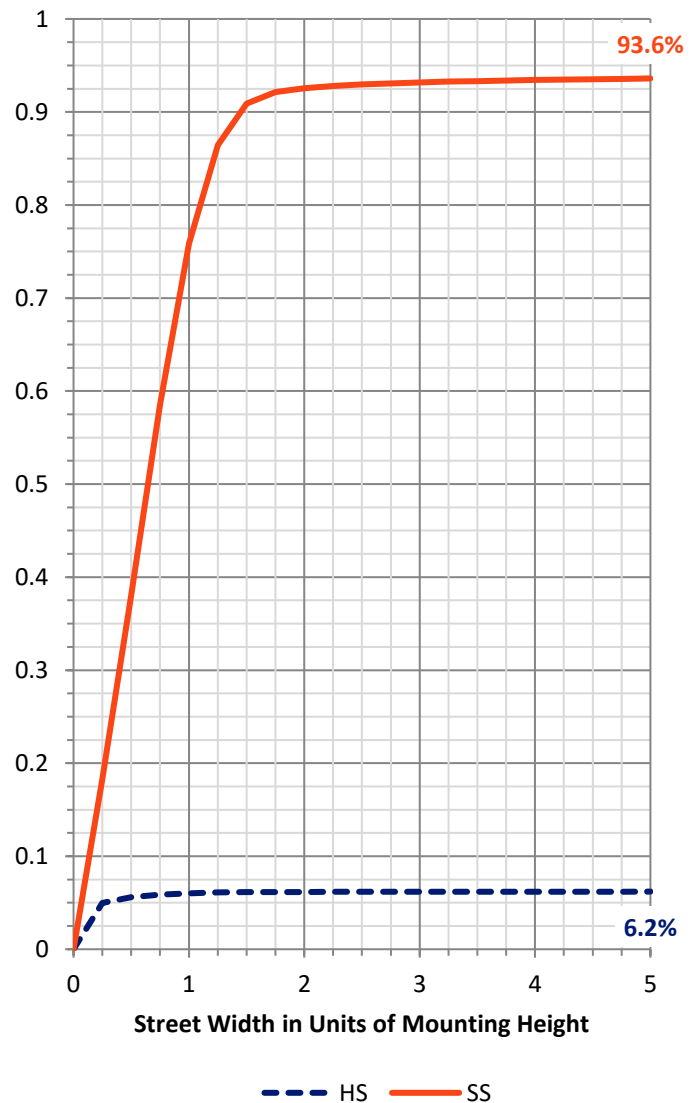
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	355.6	0.0	355.6
	% Fixture	6.2	0.0	6.2
Street Side	Lumens	5342.2	0.0	5342.2
	% Fixture	93.8	0.0	93.8
Total	Lumens	5697.8	0.0	5697.8
	% Fixture	100.0	0.0	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	137.6	2.4
10°-20°	320.2	5.6
20°-30°	538.8	9.5
30°-40°	922.7	16.2
40°-50°	1392.3	24.4
50°-60°	1447.3	25.4
60°-70°	812.5	14.3
70°-80°	111.3	2.0
80°-90°	15.1	0.3
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°	5697.8	100.0
0°-180°	5697.8	100.0

Coefficient of Utilization



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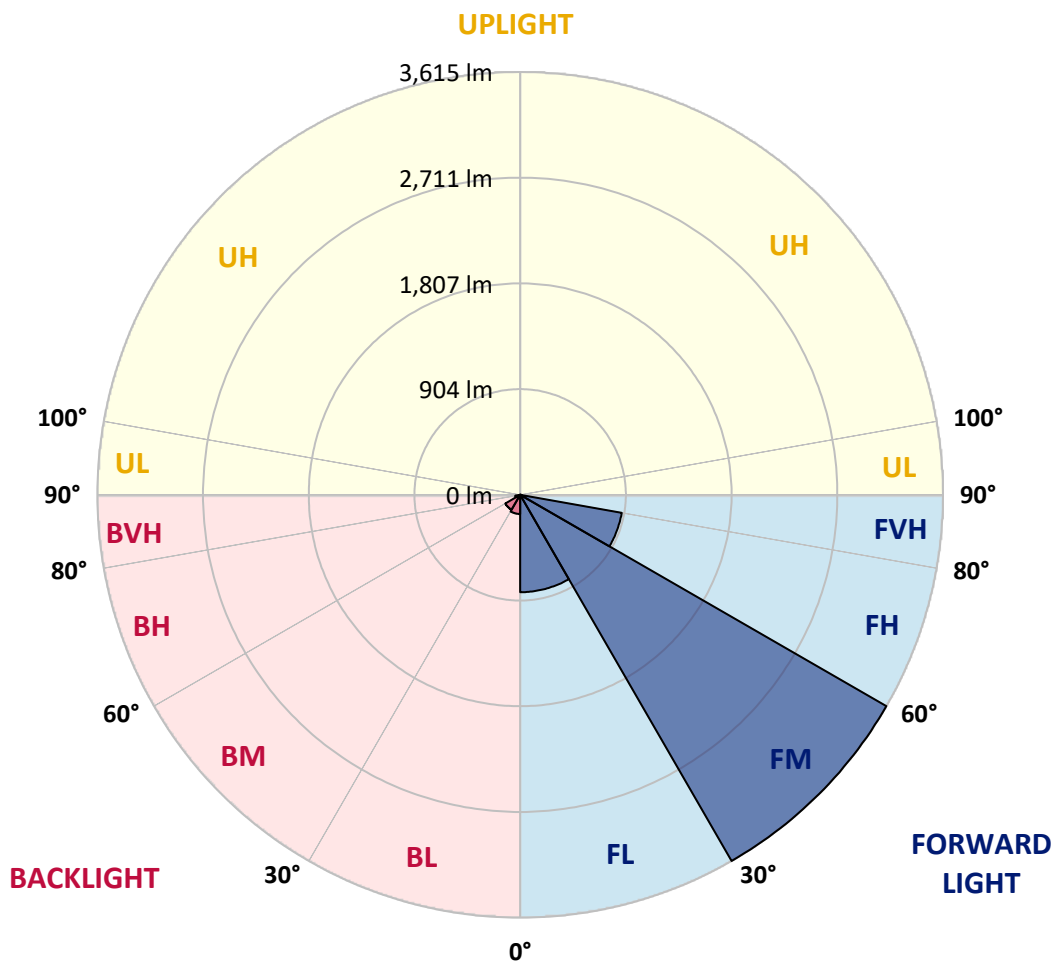
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	832.6	14.6			
FM	(30°-60°)	3614.9	63.4			
FH	(60°-80°)	881.6	15.5			G1/1800
FVH	(80°-90°)	13.0	0.2			G1/100
BL	(0°-30°)	164.1	2.9	B1/500		
BM	(30°-60°)	147.3	2.6	B0/220		
BH	(60°-80°)	42.2	0.7	B0/110		G0/110
BVH	(80°-90°)	2.1	0.0			G0/10
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

BUG Rating: B1-U0-G1

Type II Short





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	58°	65°	75°	85°
0°	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2
2.5°	1941.0	1929.3	1917.1	1894.5	1873.6	1841.4	1797.1	1786.3	1751.5	1694.1	1640.6
5°	2108.4	2106.2	2098.0	2079.7	2057.1	2018.0	1968.0	1934.5	1880.6	1790.2	1687.2
7.5°	2009.3	2027.5	2057.5	2100.1	2128.8	2124.9	2086.6	2057.5	2004.1	1880.6	1732.8
10°	1693.7	1697.2	1738.4	1828.0	1969.7	2101.9	2151.9	2144.0	2094.9	1959.7	1772.8
12.5°	1582.4	1584.6	1594.1	1622.8	1715.0	1899.3	2125.8	2166.6	2162.7	2035.4	1815.3
15°	1591.1	1592.3	1595.0	1604.1	1630.2	1722.8	1993.6	2097.5	2206.2	2107.1	1857.1
17.5°	1659.7	1658.9	1650.6	1641.9	1650.2	1680.6	1858.8	1968.4	2197.1	2167.5	1891.4
20°	1793.6	1797.9	1770.1	1731.4	1711.5	1712.8	1792.3	1874.5	2145.7	2214.5	1917.1
22.5°	1981.9	1984.9	1939.3	1872.3	1813.6	1784.0	1806.2	1849.7	2086.6	2258.0	1938.0
25°	2206.6	2206.6	2142.7	2047.5	1956.7	1891.8	1872.7	1889.3	2064.0	2307.1	1958.8
27.5°	2449.1	2457.8	2374.4	2249.7	2129.7	2034.9	1974.9	1971.8	2081.4	2368.7	1982.3
30°	2713.1	2720.8	2621.7	2469.2	2327.0	2205.8	2113.6	2093.6	2147.9	2451.8	2016.6
32.5°	2975.7	2982.1	2872.7	2717.0	2551.3	2408.7	2287.5	2255.7	2267.5	2573.1	2067.1
35°	3309.5	3310.8	3172.2	2986.9	2810.0	2642.6	2489.1	2457.8	2444.9	2726.1	2139.7
37.5°	3575.1	3564.7	3476.8	3301.7	3098.6	2923.9	2743.5	2702.6	2671.3	2941.3	2252.2
40°	3637.7	3637.7	3624.6	3572.0	3410.8	3242.5	3067.8	3007.0	2937.8	3194.7	2403.5
42.5°	3474.7	3485.1	3571.2	3685.5	3686.8	3579.0	3408.2	3356.9	3235.2	3483.4	2568.7
45°	3110.0	3113.0	3319.5	3628.1	3837.7	3899.4	3773.4	3702.5	3533.8	3783.3	2720.0
47.5°	2978.6	2988.2	3076.0	3453.4	3849.0	4158.9	4123.7	4026.3	3810.3	4057.2	2861.3
50°	2777.0	2788.7	2896.1	3196.0	3747.3	4325.4	4458.8	4354.5	4061.9	4285.4	2931.3
52.5°	2294.5	2312.7	2464.4	2855.7	3493.0	4332.4	4765.8	4703.2	4319.8	4407.6	2923.0
55°	1578.9	1592.3	1769.3	2229.2	2980.0	4119.8	4898.0	4941.0	4549.8	4435.0	2883.1
56°	1273.7	1324.1	1453.7	1899.3	2687.8	3939.0	4867.5	4967.0	4618.0	4430.6	2865.7
57.5°	842.1	851.6	992.9	1376.3	2158.3	3546.4	4730.1	4911.4	4705.8	4408.4	2853.0
60°	396.0	400.4	451.2	635.2	1168.1	2584.4	4283.7	4584.6	4738.0	4362.0	2852.6
62.5°	258.2	259.1	265.1	303.0	477.7	1407.6	3551.2	3984.2	4471.5	4356.7	2844.3
65°	212.6	214.7	207.4	212.2	250.0	530.8	2504.8	3106.1	3845.9	4234.1	2751.3
67.5°	187.4	187.8	177.8	172.2	183.0	233.0	1262.0	1959.3	2876.5	3597.7	2266.1
70°	170.8	170.4	159.1	146.1	146.5	154.8	411.2	813.8	1591.5	2136.2	1301.1
72.5°	151.7	152.6	146.1	127.8	121.7	109.6	154.8	219.5	541.7	686.0	343.0
75°	133.0	131.2	124.8	113.0	101.7	73.4	77.8	93.5	141.3	139.9	73.9
77.5°	100.9	99.1	102.2	96.5	79.6	51.2	42.6	48.7	63.9	59.5	30.0
80°	76.9	76.1	69.6	82.6	72.6	38.7	29.2	30.0	34.8	31.7	14.7
82.5°	55.6	55.2	52.6	50.8	46.0	28.2	22.2	23.4	26.1	22.2	10.8
85°	21.3	21.3	41.3	34.8	31.7	19.1	15.7	17.0	19.9	16.1	7.4
87.5°	3.5	3.5	27.8	23.0	14.3	9.5	10.0	10.8	11.8	9.5	5.6
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°	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2	1613.2
2.5°	1608.9	1579.7	1515.8	1454.1	1400.2	1341.1	1311.1	1276.3	1263.2	1237.2	1239.8
5°	1625.4	1564.5	1436.3	1301.1	1177.2	1051.2	961.6	877.3	830.3	783.8	783.8
7.5°	1642.3	1549.4	1351.1	1135.1	926.4	710.3	557.3	434.8	366.4	320.8	319.5
10°	1654.1	1529.7	1254.1	942.4	634.6	366.0	220.9	173.9	156.9	149.6	149.1
12.5°	1669.4	1510.2	1143.8	715.6	352.5	173.9	137.8	130.4	127.4	125.6	125.6
15°	1682.3	1482.4	1009.9	481.2	185.2	130.4	118.7	116.1	115.6	115.2	115.6
17.5°	1685.4	1442.9	849.5	281.7	134.3	113.9	108.6	106.5	106.5	106.1	106.1
20°	1678.5	1390.7	672.1	173.9	116.1	104.8	99.1	96.5	96.1	96.1	96.1
22.5°	1664.1	1324.1	496.8	131.8	105.7	96.5	89.1	86.5	86.5	87.0	87.4
25°	1646.2	1245.4	341.3	113.4	97.8	87.8	80.4	77.8	78.7	79.6	80.0
27.5°	1623.6	1151.5	223.4	98.2	87.4	79.1	72.6	70.9	72.6	74.4	75.2
30°	1601.0	1048.5	151.3	85.2	75.6	69.6	65.7	65.2	67.8	71.7	72.1
32.5°	1586.3	942.9	114.4	76.5	66.5	61.3	59.5	60.5	64.3	68.6	69.6
35°	1585.0	839.8	97.4	69.6	60.5	55.6	54.7	57.4	61.7	65.2	66.1
37.5°	1605.4	743.4	88.3	64.3	55.6	50.8	49.5	54.3	58.2	61.7	62.6
40°	1646.7	656.8	82.1	59.5	51.8	46.0	45.2	49.1	53.0	57.0	58.2
42.5°	1698.4	576.0	75.2	54.7	47.4	40.8	40.0	43.1	47.0	52.6	53.5
45°	1743.2	500.8	67.8	49.5	42.6	35.2	34.8	38.3	41.3	46.5	47.4
47.5°	1781.1	438.2	60.9	43.9	36.5	31.3	30.9	32.6	34.4	39.1	40.0
50°	1761.0	385.1	53.9	36.1	29.6	26.9	26.5	26.5	28.6	33.5	34.4
52.5°	1711.9	352.1	47.4	30.0	24.3	23.0	21.7	22.2	24.3	26.5	26.9
55°	1672.3	336.4	41.7	26.5	20.5	19.1	17.8	17.4	17.8	17.0	16.1
56°	1662.8	334.7	40.4	25.7	19.5	17.8	16.1	15.2	14.7	13.0	12.6
57.5°	1658.4	334.7	38.3	23.9	18.2	16.1	13.9	12.2	10.4	9.1	9.1
60°	1654.9	336.9	35.6	20.9	15.7	13.0	10.0	7.4	6.0	6.0	6.0
62.5°	1647.6	336.0	32.6	17.4	13.5	10.0	6.0	4.8	4.3	4.8	5.2
65°	1564.5	312.1	28.6	13.9	10.4	7.0	3.5	3.5	3.9	4.8	5.2
67.5°	1260.7	236.5	23.4	10.8	7.4	5.2	3.1	3.1	3.9	4.8	5.2
70°	692.5	124.8	19.9	7.8	5.6	4.3	3.1	2.6	3.9	4.8	5.2
72.5°	169.1	52.2	18.2	6.0	5.2	3.9	2.6	2.6	3.9	4.8	5.2
75°	41.7	39.1	14.7	4.8	4.3	3.5	2.6	2.6	3.9	4.8	5.2
77.5°	19.5	51.8	10.0	4.3	3.9	3.1	2.6	2.6	3.9	4.8	4.8
80°	11.8	39.1	6.0	3.9	3.5	3.1	2.6	2.6	3.9	4.8	5.2
82.5°	7.0	11.3	4.3	3.9	3.5	2.6	2.6	2.6	3.9	4.8	5.2
85°	6.0	5.6	4.3	3.9	3.5	3.1	2.6	2.6	4.3	5.2	5.2
87.5°	4.8	4.3	3.9	3.5	3.5	3.1	2.6	2.6	3.9	4.8	5.2
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)