

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: P198870

Luminaire Tested: **XNV-AF-01-LED-U-SL3-7050-HSS**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P198870
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24263)
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-SL3-7050-HSS
Description: XNV ROADWAY AND AREA LUMINAIRE
(1) 70 CRI, 5000K, 1050mA LIGHTSQUARE WITH 16 LEDS EACH AND TYPE III
SPILL LIGHT ELIMINATOR OPTICS WITH HOUSE SIDE SHIELD
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5134 lumens
Efficiency: N/A
Efficacy: 88.5 lumens/watt
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')
IES Classification: Type III - Medium - Non-Cutoff
BUG Rating: B1 - U0 - G2

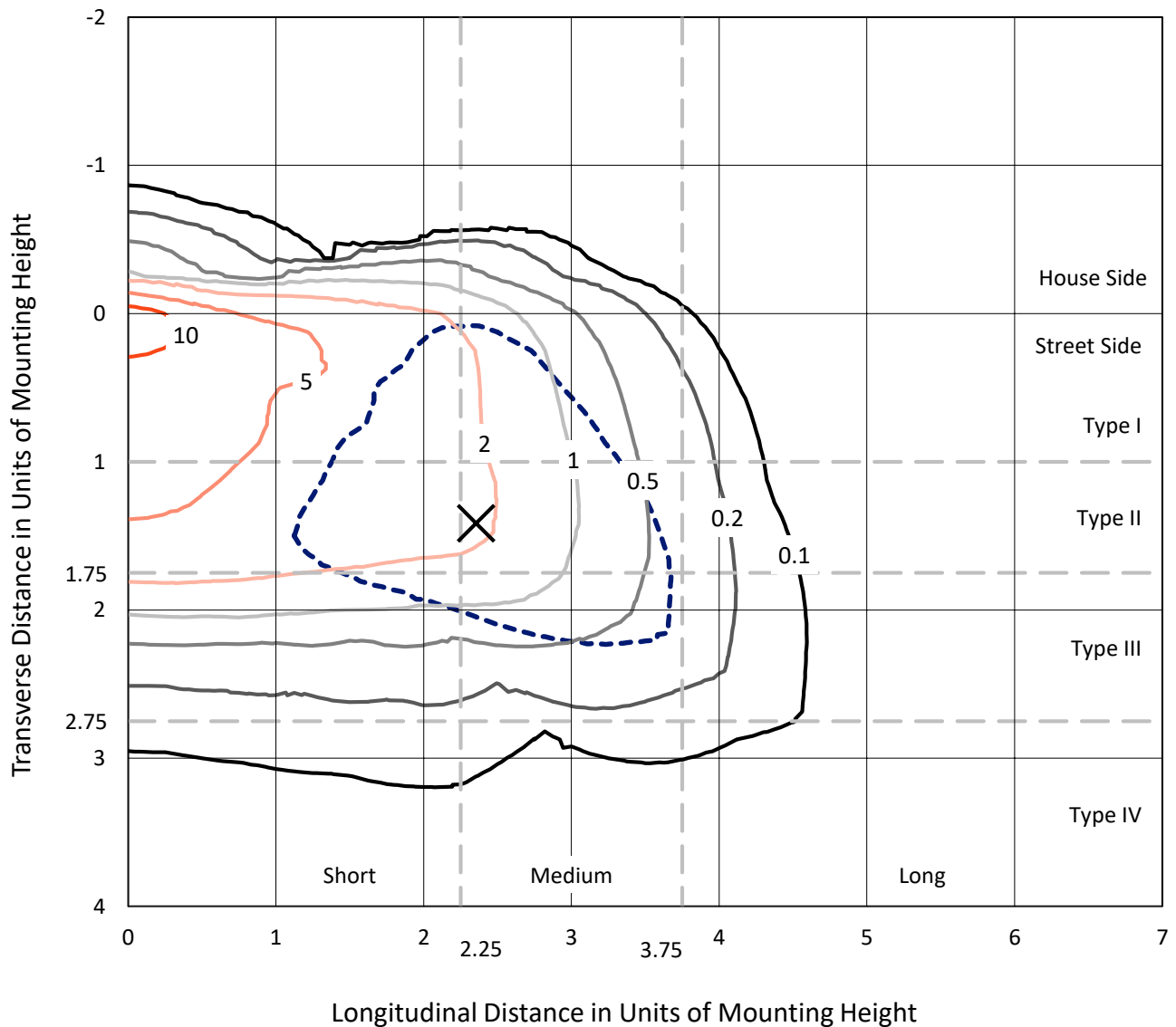
Input Watts (W): 58
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 28.75 FT



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Iso-Footcandle Lines of Horizontal Illumination

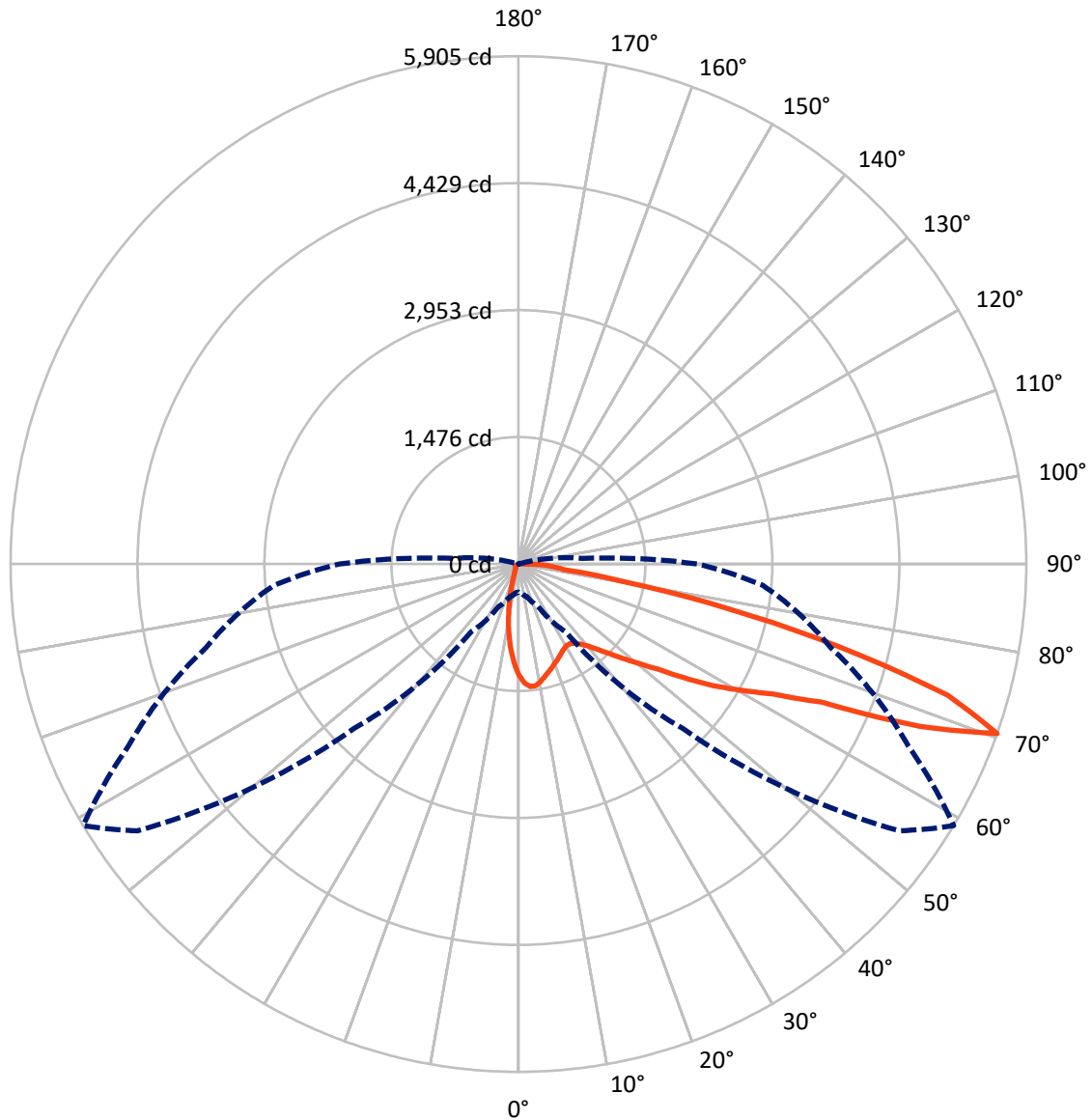
✕ Max cd
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 13.8 fc
 Type III - Medium - Non-Cutoff

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Luminous Intensity Polar Plot



— Vertical Plane Through 59-Deg Lateral - - - Horizontal Cone Through 70-Deg Vertical

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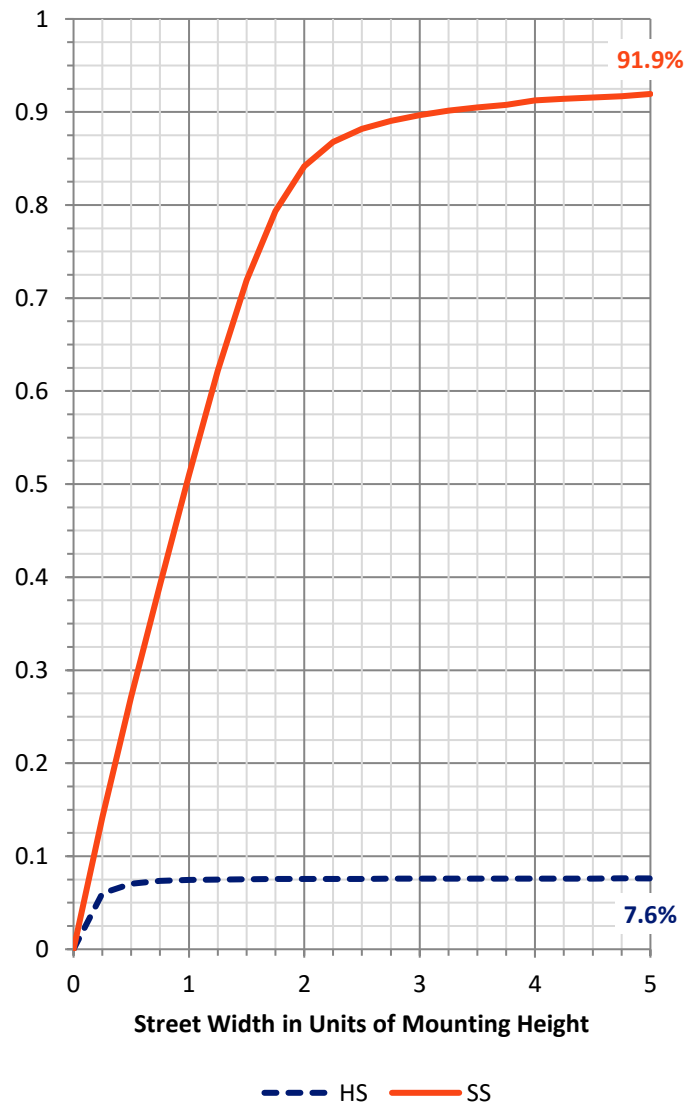
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	394.7	0.0	394.7
	% Fixture	7.7	0.0	7.7
Street Side	Lumens	4739.3	0.0	4739.3
	% Fixture	92.3	0.0	92.3
Total	Lumens	5134.0	0.0	5134.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	106.8	2.1
10°-20°	223.9	4.4
20°-30°	303.1	5.9
30°-40°	437.4	8.5
40°-50°	726.4	14.1
50°-60°	1111.2	21.6
60°-70°	1382.0	26.9
70°-80°	764.0	14.9
80°-90°	79.2	1.5
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°	5134.0	100.0
0°-180°	5134.0	100.0



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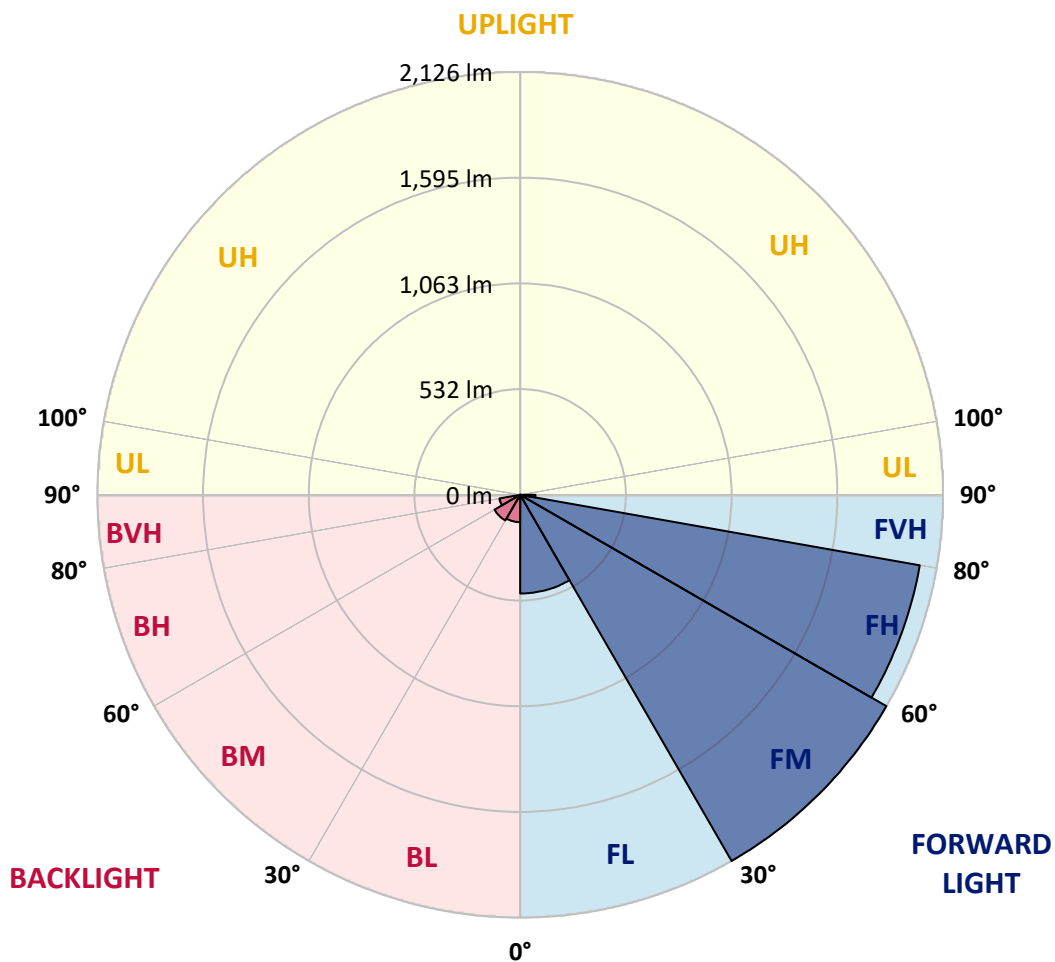
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	496.2	9.7			
FM	(30°-60°)	2126.0	41.4			
FH	(60°-80°)	2040.1	39.7			G2/5000
FVH	(80°-90°)	76.9	1.5			G1/100
BL	(0°-30°)	137.5	2.7	B1/500		
BM	(30°-60°)	149.0	2.9	B0/220		
BH	(60°-80°)	105.9	2.1	B0/110		G0/110
BVH	(80°-90°)	2.3	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-G2

Type III Medium





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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	59°	65°	75°	85°
0°	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2
2.5°	1467.5	1465.1	1455.4	1453.5	1442.7	1421.0	1395.8	1385.7	1365.2	1332.7	1296.7
5°	1491.9	1493.0	1493.8	1489.5	1488.0	1470.2	1442.3	1430.3	1402.8	1349.3	1283.5
7.5°	1400.4	1403.5	1413.2	1417.5	1436.1	1443.1	1437.2	1429.5	1407.8	1344.7	1252.1
10°	1304.0	1309.8	1320.3	1327.3	1350.1	1368.7	1392.3	1394.3	1389.6	1329.2	1216.9
12.5°	1221.1	1226.6	1238.2	1252.1	1275.4	1299.4	1334.6	1347.0	1362.5	1319.1	1191.7
15°	1149.9	1151.4	1162.7	1180.1	1210.7	1243.6	1285.4	1303.6	1333.8	1315.2	1172.3
17.5°	1087.5	1087.9	1095.3	1111.1	1148.3	1191.7	1240.5	1264.5	1302.9	1309.8	1155.3
20°	1046.5	1046.1	1046.5	1055.0	1087.9	1139.4	1198.7	1223.8	1273.0	1303.2	1137.9
22.5°	1032.5	1030.6	1021.7	1018.6	1039.5	1084.8	1155.7	1188.6	1246.3	1301.3	1125.1
25°	1049.6	1048.4	1029.4	1011.6	1013.5	1041.8	1111.9	1152.2	1225.4	1308.3	1122.0
27.5°	1104.6	1102.2	1073.2	1038.3	1016.3	1021.3	1079.4	1121.6	1208.7	1325.3	1126.2
30°	1176.6	1177.0	1146.0	1103.8	1051.9	1023.2	1062.0	1101.8	1197.5	1350.9	1135.5
32.5°	1256.8	1256.4	1234.3	1185.5	1119.3	1058.9	1069.7	1103.4	1199.1	1388.4	1153.4
35°	1339.6	1335.4	1328.0	1285.0	1207.6	1121.2	1104.9	1129.7	1215.3	1438.0	1183.6
37.5°	1435.3	1433.8	1441.1	1395.8	1316.8	1213.0	1166.9	1183.6	1256.4	1511.2	1232.4
40°	1587.5	1579.0	1582.5	1520.9	1440.0	1336.5	1253.7	1257.9	1321.8	1608.0	1309.4
42.5°	1877.6	1843.1	1778.4	1663.0	1575.5	1473.6	1367.1	1359.8	1414.4	1725.4	1410.9
45°	2224.2	2184.7	2021.7	1819.9	1711.1	1620.8	1507.3	1487.6	1528.3	1865.2	1541.8
47.5°	2513.5	2470.9	2254.8	1983.7	1848.9	1772.6	1662.6	1639.4	1664.6	2027.5	1699.1
50°	2612.3	2588.7	2398.9	2120.0	1988.0	1943.0	1857.5	1818.7	1824.9	2202.5	1882.6
52.5°	2567.0	2558.8	2431.8	2213.4	2116.6	2131.3	2070.9	2030.2	2023.2	2393.9	2085.6
55°	2471.3	2467.4	2405.5	2265.3	2230.0	2303.6	2370.2	2335.0	2269.1	2597.2	2253.3
57.5°	2334.6	2349.3	2393.9	2365.2	2369.5	2485.6	2648.3	2666.5	2568.1	2759.1	2377.6
60°	1969.4	2008.9	2213.0	2472.5	2671.2	2788.5	2946.1	2980.2	2821.4	2869.8	2521.3
62.5°	1455.8	1512.4	1803.2	2280.0	2837.3	3364.4	3342.3	3327.2	3063.1	3018.2	2782.7
65°	855.1	921.4	1167.3	1781.5	2586.7	3734.7	4082.1	3872.9	3431.4	3326.5	3199.0
67.5°	426.0	426.4	537.6	940.3	1911.7	3476.3	5161.8	5041.0	4214.5	3780.7	3363.2
70°	327.6	336.6	397.7	546.5	966.7	2707.6	5409.3	5905.4	5001.5	3760.6	2853.6
72.5°	277.7	283.5	354.0	475.6	722.7	1486.4	4682.8	5219.9	4772.6	3177.3	2103.4
75°	199.8	204.5	313.3	431.4	665.4	737.4	3212.2	3871.4	3580.9	2235.1	1157.6
77.5°	49.6	49.2	109.2	350.1	595.3	614.2	1843.1	2482.5	2054.6	915.2	297.4
80°	22.1	21.3	24.8	73.6	553.8	579.8	810.6	1253.7	788.1	148.3	91.0
82.5°	15.5	14.7	15.5	27.1	185.1	537.9	489.9	543.4	288.5	50.7	38.7
85°	5.0	4.6	8.5	22.9	51.9	310.2	477.9	405.9	214.6	21.7	25.9
87.5°	0.8	0.8	3.1	12.4	15.1	103.4	280.4	281.2	96.4	12.8	11.6
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°	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2	1298.2
2.5°	1278.5	1255.6	1223.5	1191.3	1162.3	1132.4	1108.4	1097.2	1092.2	1085.2	1070.1
5°	1249.0	1207.6	1137.1	1067.8	1003.1	941.1	888.1	857.9	825.3	823.8	807.9
7.5°	1201.8	1142.9	1031.7	924.1	825.3	730.8	649.5	596.8	560.8	538.3	522.8
10°	1149.1	1073.6	926.4	775.0	640.6	514.3	409.8	341.6	300.2	279.2	267.2
12.5°	1107.3	1012.4	822.6	632.1	463.6	318.7	221.5	172.0	149.9	141.4	137.5
15°	1071.3	956.2	725.4	504.3	309.4	183.2	128.2	111.9	108.4	108.4	108.1
17.5°	1034.8	902.0	630.9	378.8	194.8	120.1	101.1	98.8	99.1	100.3	100.3
20°	1000.4	850.5	539.9	269.9	127.8	96.0	91.8	91.0	92.2	93.7	93.3
22.5°	972.5	805.2	454.7	185.5	98.4	87.1	84.4	83.3	84.0	85.2	84.8
25°	952.7	766.5	376.4	129.4	85.6	79.4	76.3	74.7	74.0	74.7	74.4
27.5°	940.7	733.9	302.9	97.2	76.7	71.6	67.8	64.7	62.7	62.7	62.0
30°	933.0	703.3	237.4	80.6	69.3	63.9	58.5	54.2	51.1	50.3	50.0
32.5°	932.6	677.0	177.4	71.3	62.4	56.2	49.6	44.2	40.7	39.9	39.5
35°	942.3	655.7	130.5	64.3	56.2	48.8	41.4	35.6	32.5	32.5	32.1
37.5°	967.5	643.3	98.8	58.9	51.1	42.6	34.9	29.4	26.7	27.5	27.5
40°	1014.3	641.0	80.6	54.6	46.9	37.2	28.3	24.0	22.9	24.0	24.0
42.5°	1086.0	653.4	71.6	51.5	43.0	31.8	23.6	20.5	20.1	21.3	21.3
45°	1179.3	677.8	66.6	48.8	38.7	26.3	19.8	17.8	17.4	19.0	19.0
47.5°	1292.4	710.7	62.0	45.7	34.5	21.7	16.7	15.1	15.1	16.7	17.0
50°	1426.4	755.2	57.3	42.6	31.0	18.2	13.9	12.8	13.2	14.7	15.1
52.5°	1580.5	809.8	53.1	39.9	27.1	14.7	11.6	10.8	11.2	12.8	13.2
55°	1713.4	857.5	48.0	37.2	22.1	12.0	9.7	9.3	9.7	11.6	11.6
57.5°	1829.2	903.2	43.4	32.9	17.4	9.7	7.7	7.7	8.5	10.5	10.8
60°	1982.9	975.2	39.5	27.9	13.2	7.4	6.2	6.6	7.7	9.3	9.7
62.5°	2255.2	1097.6	34.5	23.2	9.7	5.8	5.0	5.4	7.0	8.9	9.3
65°	2596.0	1213.4	28.7	19.4	7.4	4.3	3.9	5.0	7.0	8.9	9.3
67.5°	2561.2	1055.4	22.5	15.5	5.4	3.5	3.1	4.6	6.6	8.9	9.3
70°	2077.0	739.7	16.7	10.5	4.3	3.1	3.1	4.6	6.6	8.5	8.9
72.5°	1440.7	411.7	12.8	7.0	3.9	3.1	2.7	4.3	6.2	8.5	8.9
75°	685.5	126.3	10.1	5.0	3.5	2.7	2.3	4.3	6.2	8.5	8.9
77.5°	131.7	32.1	8.1	4.3	3.1	2.7	2.3	3.9	6.2	8.1	8.5
80°	44.5	14.3	6.6	3.9	3.1	2.7	2.3	3.9	5.8	7.7	8.1
82.5°	24.4	8.1	5.8	3.5	3.1	2.3	1.9	3.5	5.4	7.7	8.1
85°	19.0	5.8	4.6	3.5	3.1	2.3	1.9	3.5	5.4	7.4	7.7
87.5°	9.7	4.3	3.9	3.5	3.1	2.3	1.9	3.1	5.0	7.0	7.7
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)