

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: P397991

Luminaire Tested: **ARCH-S-PA1-70-740-U-T3**

Issue Date: 5/19/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P397991  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-568-10)  
Test Lab: INNOVATION CENTER  
Issue Date: 5/19/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ARCH-S-PA1-70-740-U-T3  
Description: ARCHEON ROADWAY AND AREA LUMINAIRE  
(1) 70 CRI, 4000K, 930mA LIGHT ENGINE WITH 24 LEDS AND TYPE III OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 10071 lumens  
Efficiency: N/A  
Efficacy: 136.1 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.75' x H: 0')  
IES Classification: Type IV - Medium - Non-Cutoff  
BUG Rating: B2 - U0 - G3

Input Watts (W): 74  
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

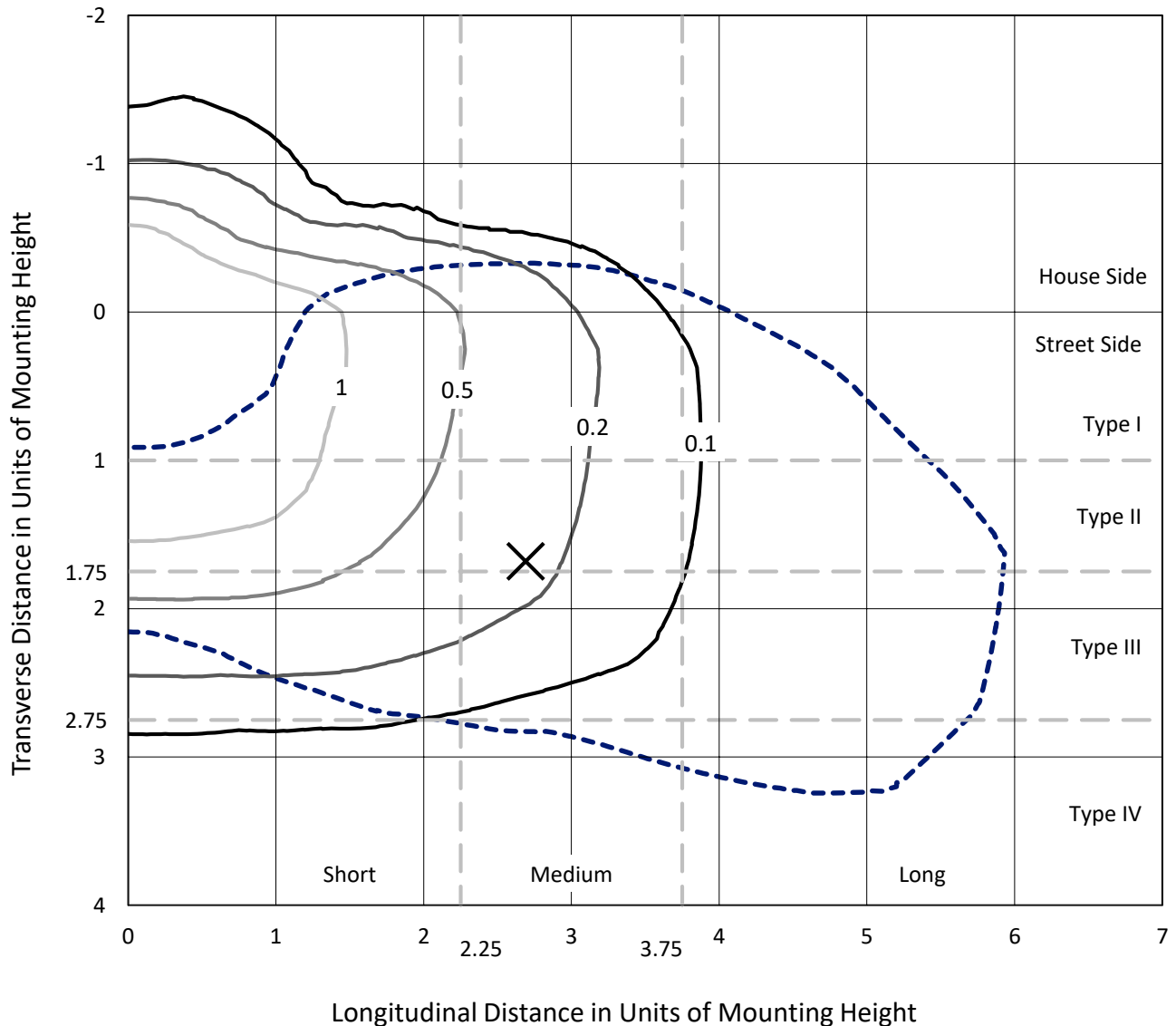


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### Iso-Footcandle Lines of Horizontal Illumination

× Max cd  
 - - - 1/2 Max cd

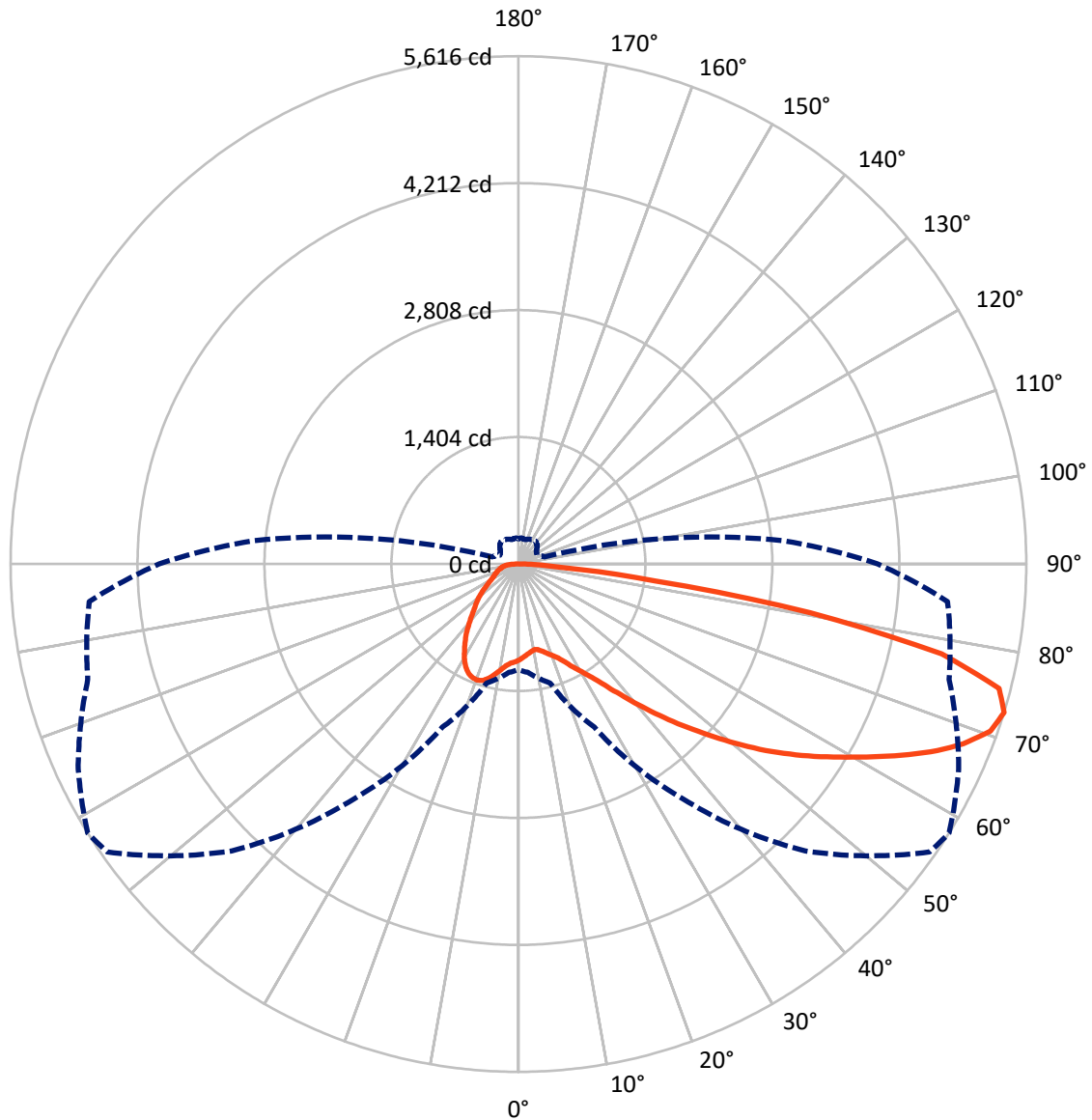


Based on 25 foot mounting height. Maximum calculated value = 2 fc  
 Type IV - Medium - Non-Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 58-Deg Lateral    - - - Horizontal Cone Through 72.5-Deg Vertical



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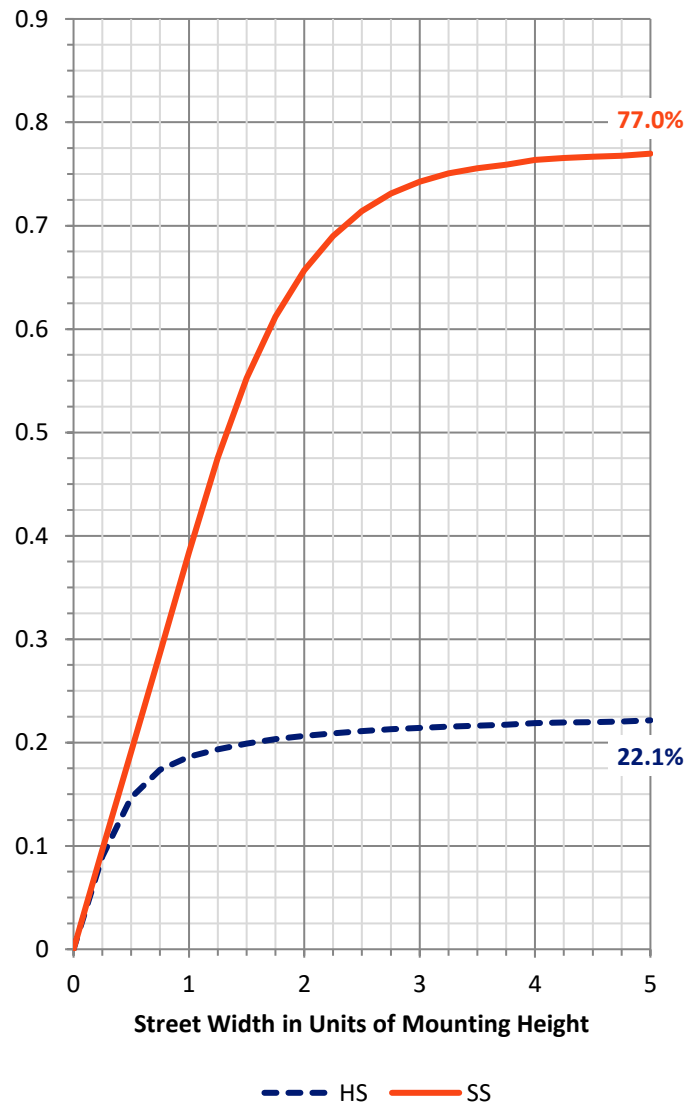
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	2284.0	0.0	2284.0
	% Fixture	22.7	0.0	22.7
<b>Street Side</b>	Lumens	7787.0	0.0	7787.0
	% Fixture	77.3	0.0	77.3
<b>Total</b>	Lumens	10071.0	0.0	10071.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	102.3	1.0
10°-20°	325.0	3.2
20°-30°	582.1	5.8
30°-40°	875.7	8.7
40°-50°	1418.1	14.1
50°-60°	2134.7	21.2
60°-70°	2512.3	24.9
70°-80°	1781.4	17.7
80°-90°	339.4	3.4
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°	10071.0	100.0
0°-180°	10071.0	100.0

**Coefficient of Utilization**



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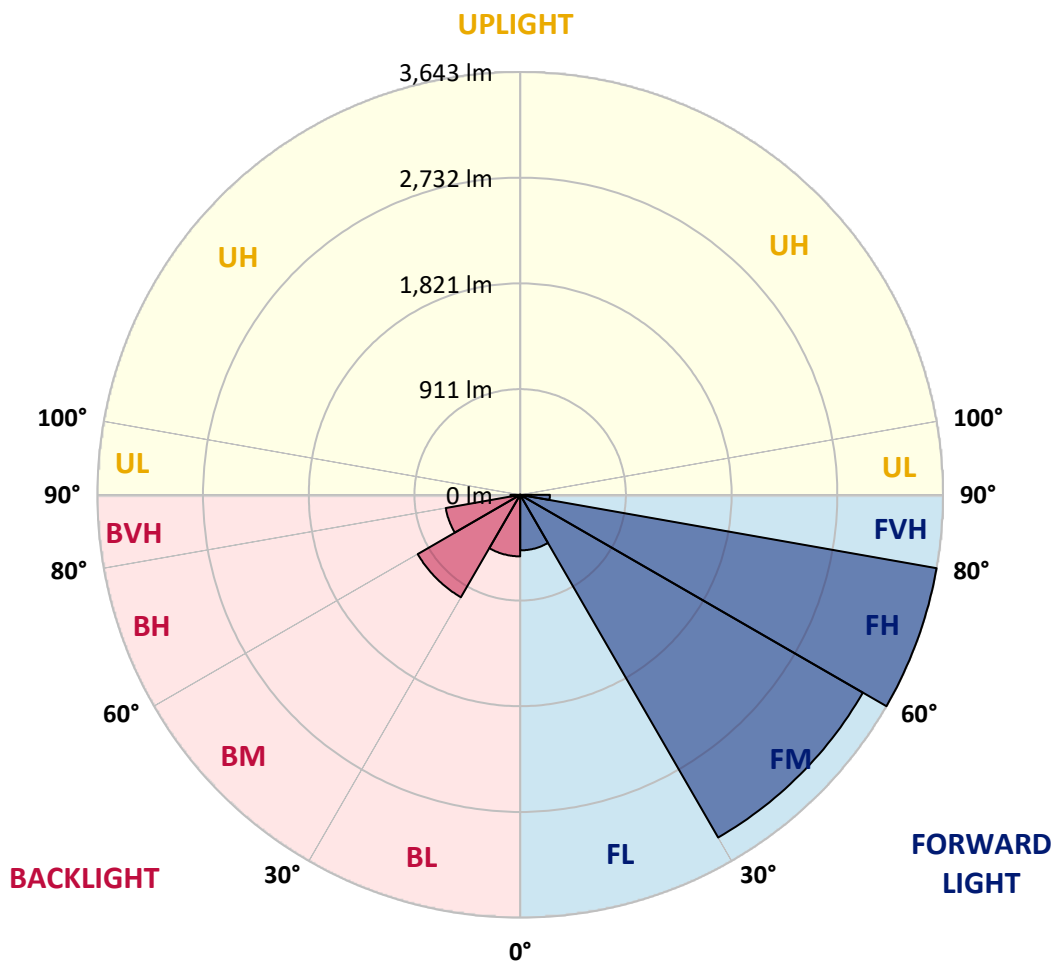
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	478.9	4.8			
FM	(30°-60°)	3409.3	33.9			
FH	(60°-80°)	3642.7	36.2			G2/5000
FVH	(80°-90°)	256.0	2.5			G3/500
BL	(0°-30°)	530.5	5.3	B2/1000		
BM	(30°-60°)	1019.1	10.1	B2/2500		
BH	(60°-80°)	651.0	6.5	B2/1000		G2/1000
BVH	(80°-90°)	83.4	0.8			G1/100
UL	(90°-100°)	0.0	0.0		U0/0	
UH	(100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B2-U0-G3**

Type IV Medium





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	58°	65°	75°	85°
0°	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3
2.5°	1022.4	1017.1	1018.4	1018.4	1023.7	1026.4	1027.7	1031.7	1034.4	1041.0	1050.3
5°	974.5	970.5	971.9	973.2	982.5	991.8	999.8	1005.1	1013.1	1023.7	1037.0
7.5°	940.0	937.3	938.6	941.3	949.3	959.9	973.2	981.2	993.1	1013.1	1035.7
10°	914.7	914.7	916.0	921.3	929.3	942.6	953.3	962.6	986.5	1022.4	1057.0
12.5°	894.8	894.8	898.7	909.4	922.7	936.0	961.2	971.9	1003.8	1053.0	1094.2
15°	893.4	894.8	896.1	905.4	920.0	949.3	986.5	1002.4	1041.0	1099.5	1147.4
17.5°	914.7	916.0	910.7	913.4	930.7	971.9	1021.1	1039.7	1088.9	1152.7	1201.9
20°	979.8	979.8	963.9	949.3	961.2	1006.4	1062.3	1080.9	1135.4	1205.9	1255.1
22.5°	1112.8	1119.4	1082.2	1050.3	1031.7	1057.0	1107.5	1127.4	1188.6	1264.4	1313.6
25°	1273.7	1280.3	1229.8	1184.6	1150.0	1146.0	1179.3	1200.5	1251.1	1329.5	1370.7
27.5°	1429.2	1417.3	1370.7	1328.2	1284.3	1248.4	1273.7	1292.3	1350.8	1410.6	1435.9
30°	1551.5	1542.2	1497.0	1466.4	1425.2	1378.7	1364.1	1384.0	1431.9	1487.7	1501.0
32.5°	1687.1	1680.5	1635.3	1595.4	1560.8	1517.0	1485.1	1494.4	1521.0	1560.8	1568.8
35°	1860.0	1874.6	1826.7	1745.6	1707.1	1664.5	1641.9	1644.6	1664.5	1689.8	1676.5
37.5°	2042.1	2059.4	2062.1	1934.4	1882.6	1844.0	1820.1	1829.4	1853.3	1870.6	1829.4
40°	2379.8	2362.5	2293.4	2199.0	2119.2	2082.0	2048.8	2047.4	2064.7	2095.3	2020.9
42.5°	2827.9	2811.9	2672.3	2550.0	2423.7	2381.1	2316.0	2288.1	2296.1	2334.6	2230.9
45°	3257.3	3250.6	3139.0	2996.7	2845.1	2762.7	2613.8	2546.0	2539.4	2569.9	2446.3
47.5°	3638.9	3609.6	3528.5	3418.2	3402.2	3186.8	2913.0	2821.2	2789.3	2806.6	2668.3
50°	4047.0	3947.3	3835.6	3767.8	3883.5	3682.7	3214.7	3119.0	3040.6	3052.5	2909.0
52.5°	4263.7	4096.2	4023.1	4043.0	4198.6	4121.5	3543.1	3426.1	3299.8	3317.1	3148.3
55°	4077.6	4076.3	4108.2	4231.8	4448.5	4359.5	3855.6	3724.0	3585.7	3589.7	3423.5
57.5°	3822.3	3874.2	4039.0	4311.6	4758.3	4609.4	4162.7	4023.1	3896.8	3876.8	3735.9
60°	3589.7	3646.8	3886.2	4298.3	4866.0	4838.1	4455.2	4332.9	4230.5	4172.0	4064.3
62.5°	3236.0	3278.6	3617.6	4213.2	4775.6	5002.9	4751.7	4667.9	4590.8	4469.8	4418.0
65°	2819.9	2834.5	3192.1	3932.7	4662.6	5066.8	5046.8	5009.6	4935.1	4757.0	4767.6
67.5°	2369.2	2398.4	2712.2	3484.6	4415.3	5037.5	5275.5	5306.1	5218.3	4951.1	4991.0
70°	1889.2	1925.1	2163.1	2865.1	3995.2	4911.2	5486.9	5536.1	5367.2	5014.9	5032.2
72.5°	1168.6	1203.2	1362.7	1990.3	3166.9	4487.1	5552.0	5615.8	5371.2	4929.8	4763.6
75°	404.2	408.2	533.1	954.6	1879.9	3387.6	5339.3	5489.5	5202.4	4620.0	4145.4
77.5°	184.8	191.4	236.7	393.5	833.6	1828.1	4408.6	4784.9	4689.2	4136.1	3190.8
80°	127.6	130.3	163.5	235.3	481.3	643.5	2782.7	3273.2	3440.8	3202.8	2044.8
82.5°	95.7	98.4	126.3	159.5	347.0	312.4	1059.6	1521.0	1890.6	1856.0	854.9
85°	91.7	90.4	98.4	106.4	231.3	186.1	343.0	470.6	737.9	631.5	215.4
87.5°	39.9	43.9	101.0	59.8	121.0	86.4	148.9	174.2	224.7	195.4	77.1
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°	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3	1062.3
2.5°	1054.3	1057.0	1064.9	1076.9	1083.5	1096.8	1106.2	1111.5	1115.5	1116.8	1116.8
5°	1045.0	1050.3	1067.6	1087.5	1106.2	1134.1	1159.3	1174.0	1184.6	1188.6	1189.9
7.5°	1047.7	1060.9	1086.2	1115.5	1139.4	1175.3	1205.9	1235.1	1259.0	1268.4	1268.4
10°	1072.9	1091.5	1126.1	1164.6	1195.2	1232.5	1264.4	1289.6	1317.5	1333.5	1336.2
12.5°	1111.5	1134.1	1179.3	1221.8	1256.4	1285.6	1314.9	1333.5	1346.8	1358.8	1361.4
15°	1166.0	1193.9	1239.1	1283.0	1313.6	1332.2	1340.1	1340.1	1338.8	1340.1	1342.8
17.5°	1220.5	1247.1	1292.3	1336.2	1350.8	1340.1	1330.8	1328.2	1326.8	1324.2	1325.5
20°	1273.7	1298.9	1337.5	1370.7	1358.8	1321.5	1309.6	1308.2	1304.2	1301.6	1298.9
22.5°	1326.8	1345.5	1377.4	1389.3	1341.5	1288.3	1273.7	1265.7	1260.4	1253.7	1247.1
25°	1388.0	1393.3	1417.3	1398.6	1298.9	1227.1	1205.9	1193.9	1188.6	1181.9	1176.6
27.5°	1445.2	1445.2	1449.2	1384.0	1236.4	1146.0	1114.1	1092.9	1091.5	1090.2	1088.9
30°	1497.0	1490.4	1477.1	1340.1	1155.3	1046.3	998.5	977.2	985.2	991.8	993.1
32.5°	1558.2	1544.9	1507.7	1280.3	1058.3	934.6	876.1	866.8	876.1	884.1	878.8
35°	1653.9	1630.0	1539.6	1211.2	965.2	832.3	776.4	763.1	760.5	759.1	748.5
37.5°	1790.8	1749.6	1564.8	1136.7	873.5	741.9	700.7	672.7	647.5	620.9	616.9
40°	1958.4	1887.9	1582.1	1051.6	776.4	666.1	622.2	586.3	543.8	497.2	491.9
42.5°	2141.8	2036.8	1590.1	957.2	691.3	603.6	549.1	503.9	456.0	420.1	413.5
45°	2339.9	2197.7	1583.4	866.8	622.2	550.4	489.3	440.1	401.5	376.3	370.9
47.5°	2532.7	2382.5	1564.8	795.0	569.0	505.2	442.7	397.5	368.3	340.4	333.7
50°	2780.0	2559.3	1542.2	739.2	510.5	460.0	413.5	365.6	332.4	319.1	316.4
52.5°	3053.9	2736.1	1515.6	668.7	453.4	424.1	394.9	352.3	341.7	316.4	312.4
55°	3350.4	2946.2	1510.3	579.7	402.8	398.9	376.3	364.3	366.9	316.4	309.8
57.5°	3662.8	3170.9	1522.3	490.6	361.6	376.3	384.2	374.9	370.9	323.1	309.8
60°	3988.5	3387.6	1486.4	408.2	329.7	357.6	393.5	369.6	340.4	320.4	311.1
62.5°	4304.9	3569.7	1330.8	349.7	305.8	352.3	388.2	349.7	316.4	316.4	312.4
65°	4534.9	3650.8	1041.0	307.1	289.8	345.7	378.9	336.4	309.8	319.1	313.8
67.5°	4561.5	3567.1	699.3	273.9	276.5	333.7	357.6	324.4	303.1	327.1	319.1
70°	4398.0	3349.0	428.1	248.6	259.3	312.4	339.0	312.4	293.8	320.4	308.4
72.5°	3973.9	2942.2	301.8	227.3	240.6	292.5	321.7	301.8	280.5	289.8	277.9
75°	3260.0	2280.1	239.3	207.4	222.0	273.9	307.1	285.8	264.6	260.6	252.6
77.5°	2309.4	1461.1	192.8	191.4	202.1	251.3	287.2	267.2	246.0	238.0	232.7
80°	1328.2	716.6	166.2	172.8	183.5	228.7	263.2	246.0	226.0	214.1	206.1
82.5°	507.9	249.9	146.2	150.2	162.2	204.7	239.3	224.7	204.7	215.4	180.8
85°	164.9	136.9	119.7	123.6	135.6	170.2	211.4	199.4	176.8	156.9	144.9
87.5°	73.1	74.5	63.8	70.5	85.1	113.0	154.2	146.2	129.0	107.7	103.7
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)