

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: P638147

Luminaire Tested: **IFLD-M-SA4D-735-U-77-VI**

Issue Date: 01/17/2023

**Test Information**

Test Method: LM-79-08  
Report Number: P638147  
Test Lab: INNOVATION CENTER(G2)  
Issue Date: 01/17/2023  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: IFLD-M-SA4D-735-U-77-VI  
Description: Infrastructure Flood – Middle Tier Light Square Luminaire w/ Nema 7 distribution lens and Visor  
Light Source: (64) 3500K CCT, 70 CRI LEDs  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

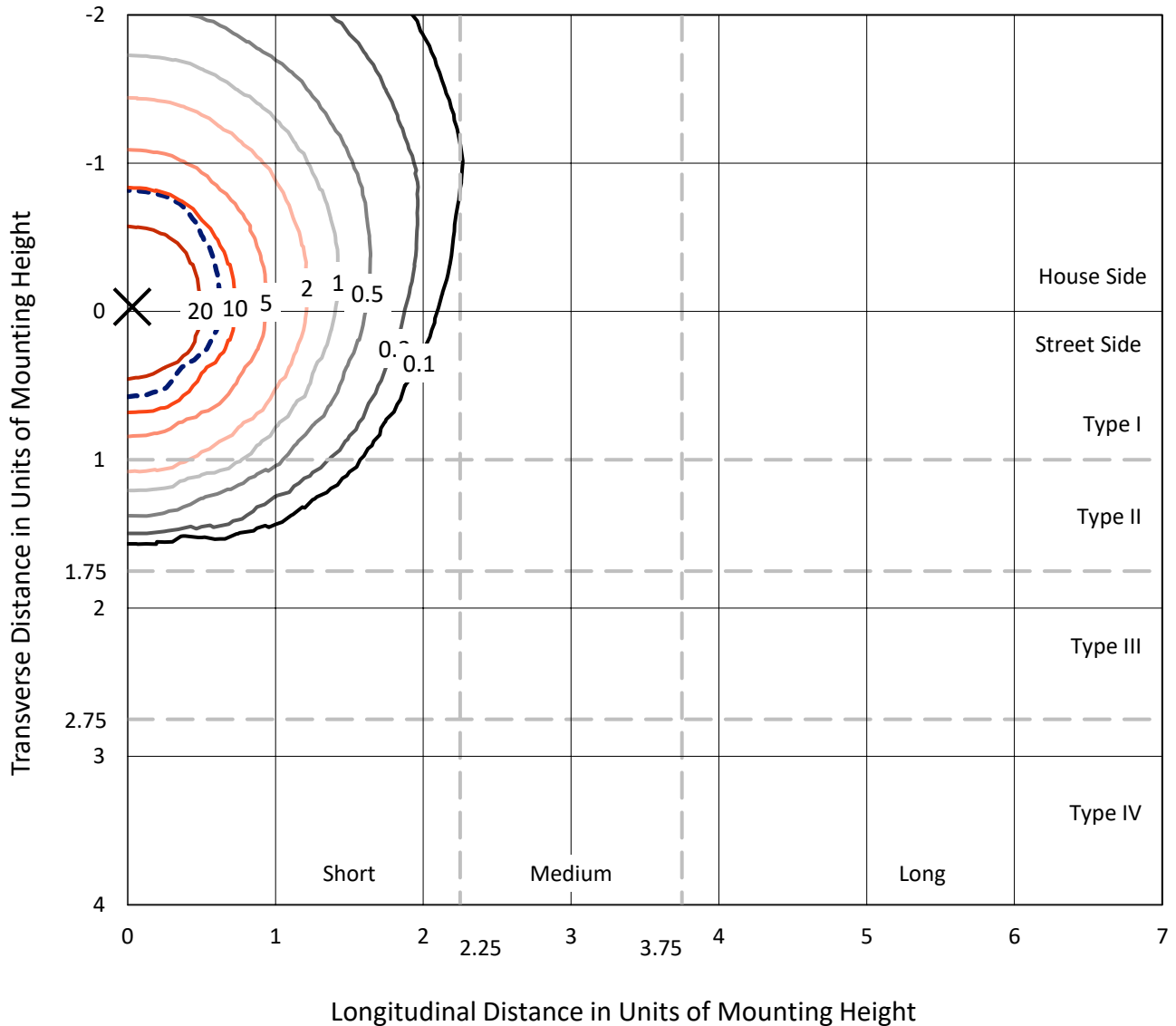
Lumens per Lamp: N/A  
Luminaire Lumens: 23733.4 lumens  
Efficiency: N/A  
Efficacy: 95.0 lumens/watt  
Luminous Opening: Rectangular (W 2' x L: 0.5' x H: 0')  
IES Classification: Type I - Short  
BUG Rating: B5 - U0 - G3  
  
Input Watts (W): 249.7  
Input Voltage (V): 120  
Input Current (Ain): NR  
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: 25 FT



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### Iso-Footcandle Lines of Horizontal Illumination

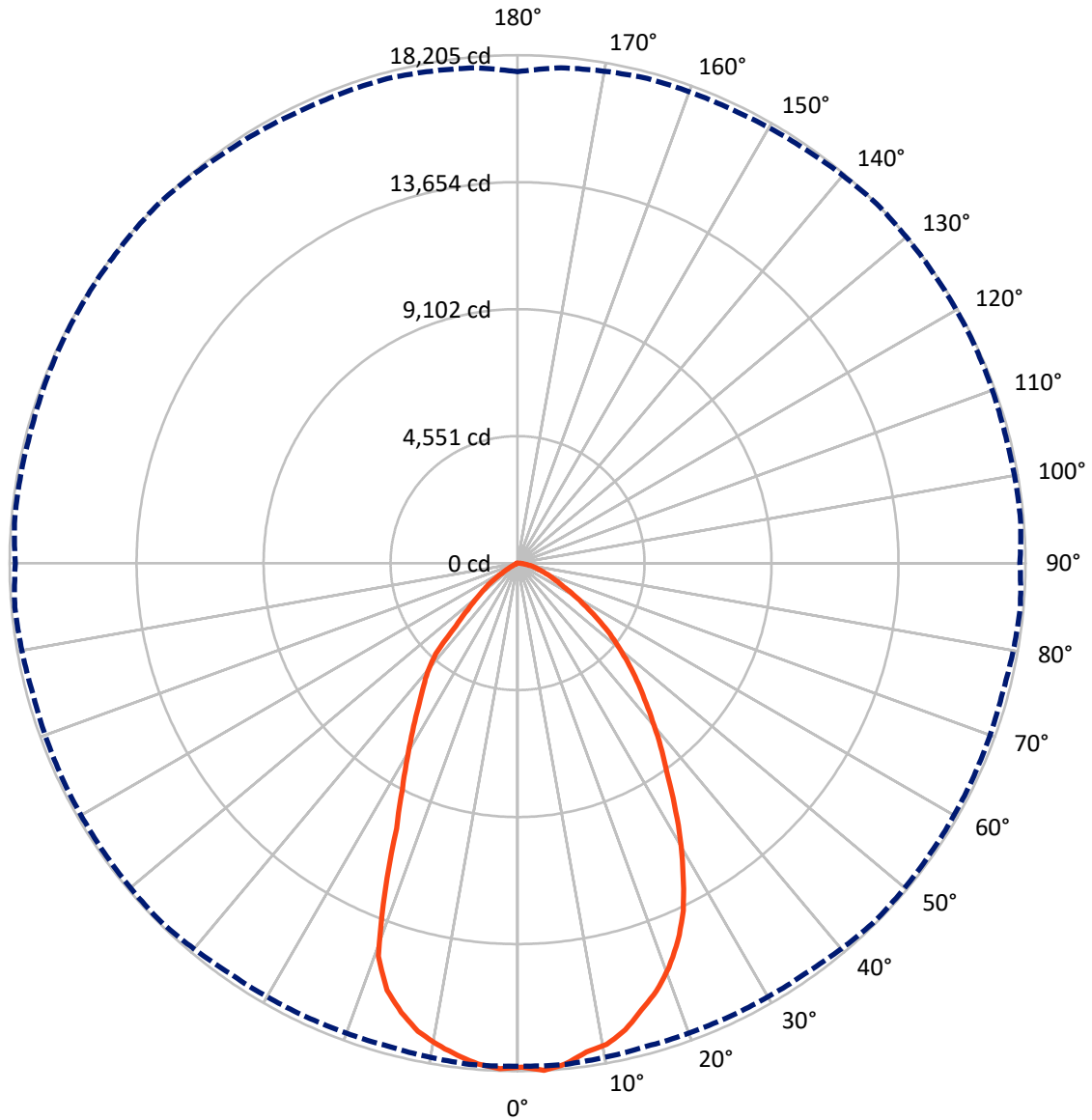
× Max cd  
 - - - 1/2 Max cd



Based on 20 foot mounting height. Maximum calculated value = 45.2 fc  
 Type I - Short - N/A

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### Luminous Intensity Polar Plot



— Vertical Plane Through 135-Deg Lateral    - - - Horizontal Cone Through 2.5-Deg Vertical

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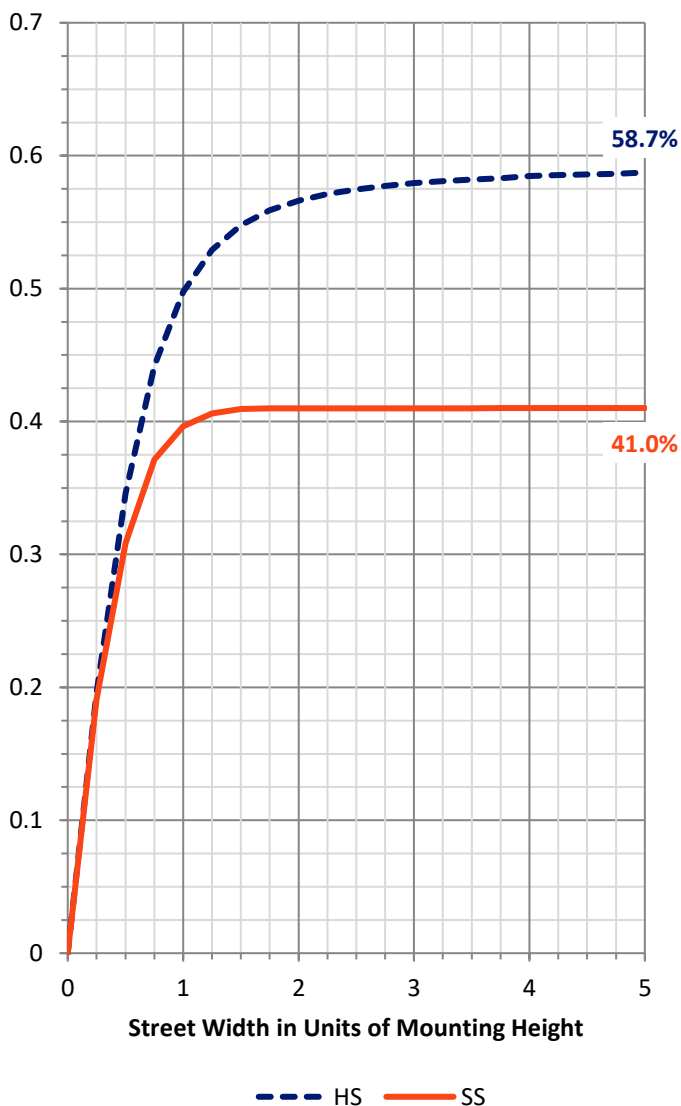
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	14056.2	0.0	14056.2
	% Fixture	59.2	0.0	59.2
<b>Street Side</b>	Lumens	9677.3	0.0	9677.3
	% Fixture	40.8	0.0	40.8
<b>Total</b>	Lumens	23733.4	0.0	23733.4
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	1693.8	7.1
10°-20°	4542.1	19.1
20°-30°	5539.4	23.3
30°-40°	5057.4	21.3
40°-50°	3654.9	15.4
50°-60°	1995.6	8.4
60°-70°	825.1	3.5
70°-80°	334.2	1.4
80°-90°	90.9	0.4
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°	23733.4	100.0
0°-180°	23733.4	100.0



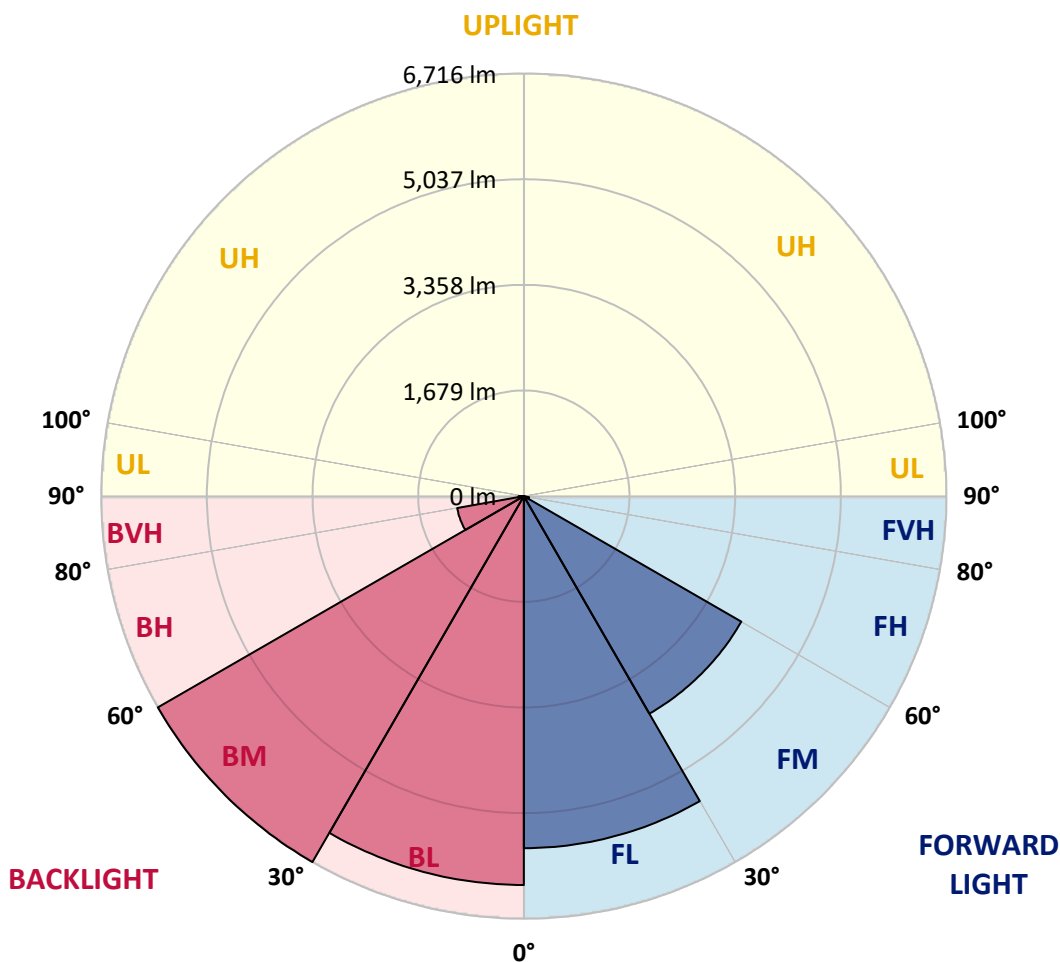
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	5594.8	23.6			
FM (30°-60°)	3991.5	16.8			
FH (60°-80°)	83.6	0.4			G0/660
FVH (80°-90°)	7.3	0.0			G0/10
BL (0°-30°)	6180.5	26.0	B5		
BM (30°-60°)	6716.4	28.3	B4/8500		
BH (60°-80°)	1075.6	4.5	B3/2500		G3/2500
BVH (80°-90°)	83.6	0.4			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B5-U0-G3**

Type I Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°
0°	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1
2.5°	18027.7	18051.0	17924.0	17937.4	17960.8	18131.3	18087.8	18047.7	17990.9	18087.8
5°	18004.3	18017.6	17883.9	17837.2	17857.2	18010.9	17870.6	17870.6	17857.2	17840.5
7.5°	17823.8	17830.5	17726.9	17643.3	17696.8	17767.0	17663.4	17713.5	17640.0	17696.8
10°	17553.1	17509.6	17386.0	17362.6	17422.7	17489.6	17419.4	17466.2	17399.3	17442.8
12.5°	17155.3	17088.5	16988.2	16958.2	17061.8	17152.0	17095.2	17068.5	16981.6	17088.5
15°	15621.3	15571.2	15798.4	16196.1	16553.8	16630.6	16570.5	16597.2	16416.7	16446.8
17.5°	12857.3	12763.7	13007.7	13950.2	15293.8	16002.3	15948.8	15775.0	15507.7	15567.8
20°	11684.2	11657.5	11630.7	11854.7	12793.8	14942.8	15016.4	14575.2	14194.2	14110.6
22.5°	11022.5	11012.4	10985.7	11035.8	11283.2	12663.5	13505.7	13098.0	12844.0	12820.6
25°	10417.5	10400.8	10320.6	10384.1	10384.1	10464.3	11543.8	11791.2	11567.2	11540.5
27.5°	9802.6	9772.5	9759.1	9789.2	9635.5	9094.0	9368.1	10574.6	10457.6	10464.3
30°	9137.5	9127.5	9090.7	9154.2	8679.6	8007.8	7834.0	9471.7	9495.1	9488.4
32.5°	8148.2	8191.7	8358.8	8428.9	7646.9	7092.1	6801.3	8195.0	8672.9	8662.9
35°	5919.0	5919.0	6463.8	7476.4	6701.0	6283.3	6126.2	6948.4	7860.8	7894.2
37.5°	4866.2	4882.9	4989.9	5451.1	5782.0	5634.9	5588.1	5848.8	6818.0	6871.5
40°	4378.2	4378.2	4378.2	4187.7	4177.7	5076.8	5050.0	4966.5	5888.9	6005.9
42.5°	3933.7	3943.8	3950.4	3469.2	3201.8	4388.3	4328.1	4201.1	5056.7	5193.7
45°	3475.9	3492.6	3512.6	2901.0	2784.0	3158.3	3663.0	3522.6	4234.5	4411.7
47.5°	2122.3	2149.0	2603.5	2459.8	2473.2	2436.4	2987.9	2964.5	3472.5	3723.2
50°	1433.8	1443.8	1487.3	1560.8	2122.3	1915.1	2115.6	2453.2	2637.0	3018.0
52.5°	1203.2	1219.9	1112.9	1012.7	1393.7	1497.3	1477.2	1821.5	1895.0	2366.3
55°	845.6	899.0	848.9	838.9	792.1	1163.1	1119.6	1400.4	1447.2	1798.1
57.5°	86.9	100.3	173.8	625.0	518.0	658.4	798.8	1026.0	1072.8	1326.8
60°	6.7	6.7	16.7	86.9	377.7	394.4	551.5	631.7	721.9	925.8
62.5°	0.0	3.3	6.7	13.4	60.2	210.6	277.4	330.9	434.5	598.2
65°	0.0	0.0	3.3	10.0	13.4	80.2	106.9	173.8	237.3	371.0
67.5°	0.0	0.0	3.3	6.7	10.0	20.1	36.8	63.5	127.0	210.6
70°	0.0	0.0	3.3	6.7	10.0	16.7	26.7	40.1	56.8	113.6
72.5°	0.0	0.0	3.3	3.3	6.7	16.7	20.1	26.7	40.1	56.8
75°	0.0	0.0	3.3	3.3	10.0	20.1	16.7	20.1	26.7	36.8
77.5°	0.0	0.0	3.3	6.7	10.0	20.1	16.7	20.1	20.1	23.4
80°	0.0	0.0	3.3	6.7	13.4	23.4	20.1	20.1	16.7	16.7
82.5°	0.0	0.0	3.3	10.0	13.4	30.1	30.1	26.7	13.4	10.0
85°	0.0	0.0	6.7	13.4	20.1	33.4	33.4	26.7	10.0	6.7
87.5°	0.0	0.0	6.7	10.0	16.7	23.4	33.4	26.7	10.0	3.3
90°	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°
18061.1	0°	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1	18061.1
18004.3	2.5°	18094.5	18074.4	18141.3	18168.0	18204.8	18064.4	17977.5	17980.9	17820.4
17800.4	5°	17907.3	17910.7	17997.6	17990.9	18027.7	17950.8	17917.4	17860.5	17720.2
17543.0	7.5°	17670.0	17640.0	17723.5	17787.0	17693.4	17746.9	17670.0	17696.8	17613.2
17315.8	10°	17486.2	17416.0	17492.9	17536.4	17539.7	17486.2	17412.7	17342.5	17312.4
16961.5	12.5°	17078.5	16988.2	17118.6	17178.7	17168.7	17065.1	16981.6	16998.3	16901.3
16339.9	15°	16517.0	16520.3	16613.9	16670.7	16617.3	16593.9	16600.5	16560.4	16476.9
15480.9	17.5°	15658.1	15708.2	15955.5	16092.5	16122.6	16075.8	16052.4	16005.6	15922.1
14110.6	20°	14227.6	14528.4	14969.6	15394.0	15477.6	15464.2	15380.7	15360.6	15313.8
12753.7	22.5°	12971.0	13194.9	13706.2	14368.0	14708.9	14742.3	14642.0	14612.0	14561.8
11540.5	25°	11670.9	11911.5	12372.7	13091.3	13796.5	13940.2	13923.5	13833.2	13779.8
10464.3	27.5°	10574.6	10815.3	11233.0	11881.4	12636.7	13098.0	13141.4	12997.7	12994.3
9505.1	30°	9585.3	9916.2	10233.7	10761.8	11493.7	12185.5	12259.1	12158.8	12168.8
8626.1	32.5°	8810.0	9084.0	9354.7	9709.0	10317.3	11122.7	11410.2	11316.6	11279.8
7894.2	35°	8017.9	8205.0	8482.4	8806.6	9221.0	10019.8	10517.8	10447.6	10410.9
6904.9	37.5°	7115.5	7436.3	7636.9	8001.2	8325.3	8960.4	9662.2	9652.2	9575.3
6062.7	40°	6189.7	6527.3	6831.4	7199.0	7449.7	7954.4	8733.1	8729.7	8739.8
5190.4	42.5°	5350.8	5661.6	6029.3	6430.3	6671.0	7038.6	7874.1	7920.9	7977.8
4471.8	45°	4592.1	4872.9	5213.8	5701.7	5992.5	6203.1	6945.0	7158.9	7155.6
3830.1	47.5°	3910.3	4174.4	4461.8	4936.4	5307.4	5497.9	6112.8	6417.0	6396.9
3141.6	50°	3282.0	3516.0	3816.8	4161.0	4659.0	4826.1	5284.0	5685.0	5654.9
2503.3	52.5°	2640.3	2964.5	3218.5	3532.7	4057.4	4221.2	4575.4	4966.5	4943.1
1878.3	55°	2058.8	2372.9	2680.4	2951.1	3392.3	3636.3	3890.3	4291.3	4284.7
1470.6	57.5°	1557.5	1901.7	2192.5	2449.8	2800.7	3101.5	3305.4	3669.7	3716.5
1006.0	60°	1153.0	1417.1	1731.2	2018.7	2296.1	2606.9	2743.9	3101.5	3121.6
688.5	62.5°	785.4	1076.2	1383.7	1644.3	1851.6	2172.4	2296.1	2590.2	2626.9
441.2	65°	544.8	731.9	1082.9	1270.0	1524.0	1798.1	1921.7	2155.7	2229.2
254.0	67.5°	361.0	521.4	845.6	1016.0	1266.7	1453.8	1610.9	1801.4	1881.6
160.4	70°	197.2	384.3	604.9	802.1	1019.4	1199.8	1353.6	1507.3	1577.5
73.5	72.5°	133.7	257.3	421.1	635.0	822.2	999.3	1136.3	1250.0	1253.3
43.4	75°	66.8	173.8	320.8	491.3	641.7	815.5	939.1	1006.0	925.8
26.7	77.5°	40.1	127.0	260.7	394.4	521.4	658.4	728.6	765.4	635.0
20.1	80°	23.4	90.2	203.9	314.2	361.0	484.6	551.5	561.5	424.5
13.4	82.5°	16.7	66.8	160.4	230.6	220.6	340.9	414.4	401.1	270.7
10.0	85°	10.0	46.8	100.3	143.7	133.7	223.9	240.6	247.3	157.1
6.7	87.5°	6.7	26.7	53.5	76.9	63.5	96.9	96.9	117.0	76.9
0.0	90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0





180°  
18061.1  
*17613.2*  
17686.8  
17472.9  
17178.7  
16817.8  
16393.3  
15885.3  
15206.9  
14548.5  
13722.9  
12987.7  
12118.7  
11283.2  
10360.7  
9638.8  
8739.8  
7947.7  
7162.3  
6403.6  
5681.7  
4993.2  
4301.4  
3696.4  
3151.7  
2633.6  
2212.5  
1871.6  
1550.8  
1223.2  
865.6  
611.6  
397.7  
250.7  
143.7  
66.8  
0.0

(END OF REPORT)