

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: P510657

Luminaire Tested: **CST-CA6-230-730-U-T2**

Issue Date: 4/6/2021

Test Information

Test Method: LM-79-08
Report Number: P510657
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2102-151-10)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 4/6/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: CST-CA6-230-730-U-T2
Description: CELESTEON HIGH MAST LUMINAIRE
Light Source: (6) 3000K CCT, 70 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 33582 lumens
Efficiency: N/A
Efficacy: 147.4 lumens/watt
Luminous Opening: Circular (Dia: 2.08' x H: 0')
IES Classification: Type II - Short
BUG Rating: B3 - U0 - G4

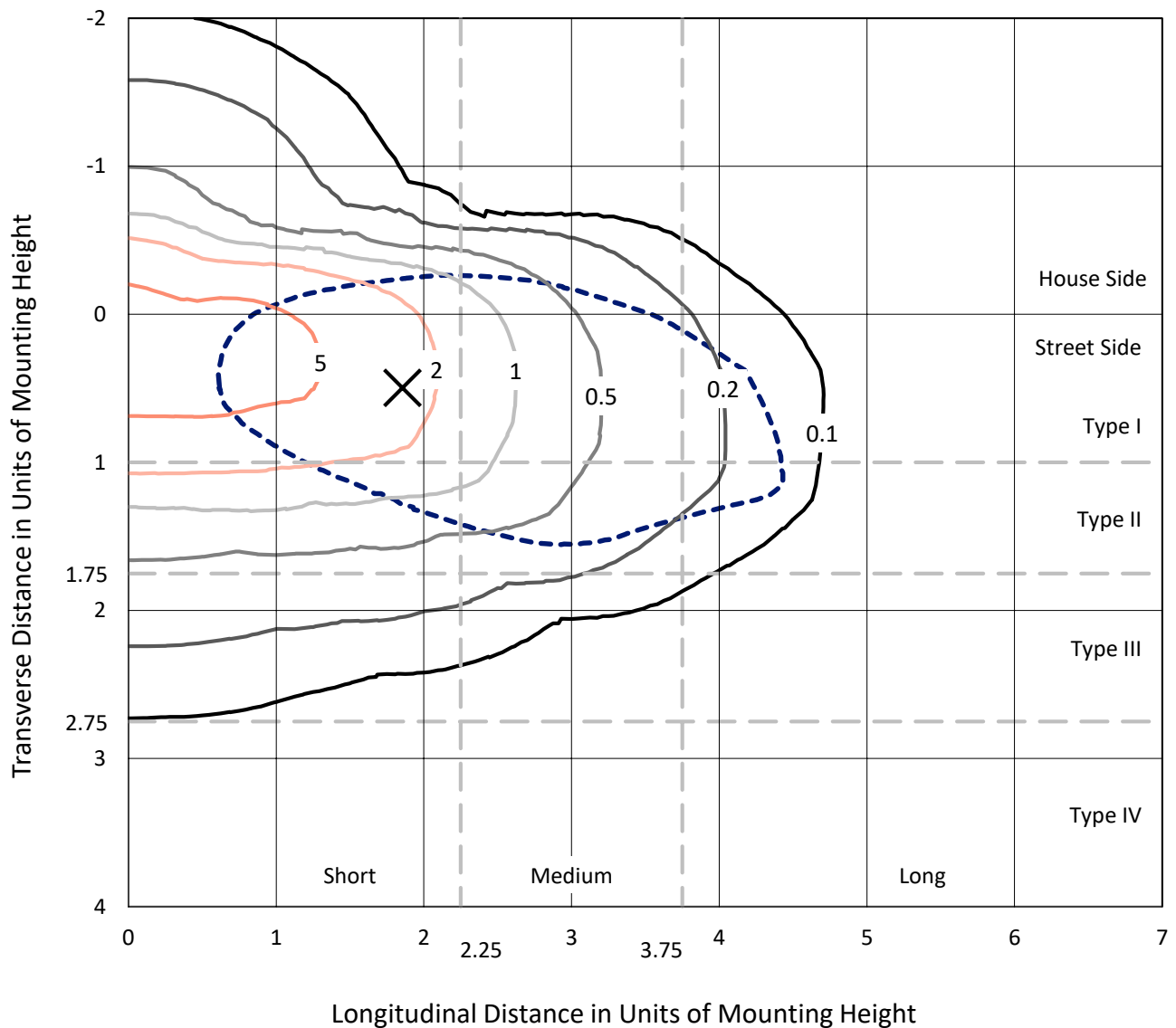
Input Watts (W): 227.8
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 24 FT



REPORT NUMBER: P510657
 CATALOG NUMBER: CST-CA6-230-730-U-T2

Iso-Footcandle Lines of Horizontal Illumination

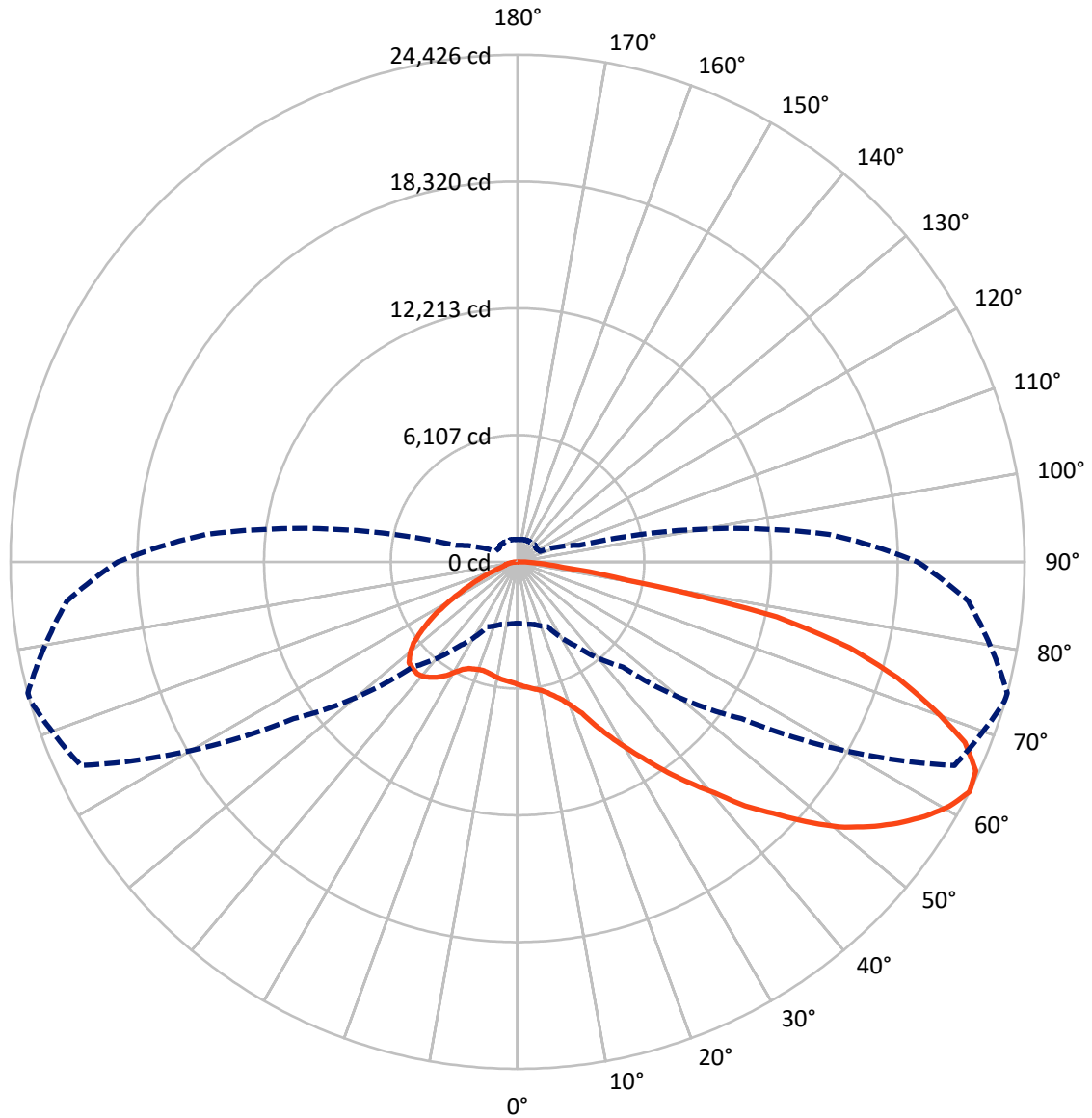
✕ Max cd
 - - - 1/2 Max cd



Based on 30 foot mounting height. Maximum calculated value = 7.7 fc
 Type II - Short - N/A

REPORT NUMBER: P510657
CATALOG NUMBER: CST-CA6-230-730-U-T2

Luminous Intensity Polar Plot



— Vertical Plane Through 75-Deg Lateral - - - Horizontal Cone Through 62.5-Deg Vertical

REPORT NUMBER: P510657
 CATALOG NUMBER: CST-CA6-230-730-U-T2

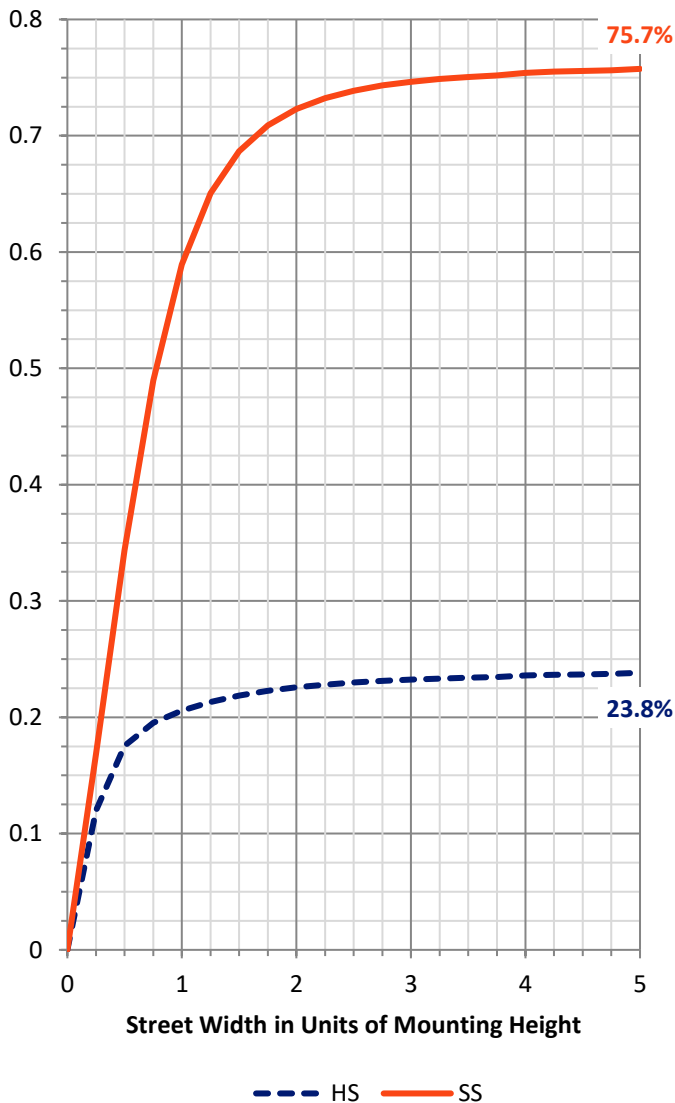
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	8136.3	0.0	8136.3
	% Fixture	24.2	0.0	24.2
Street Side	Lumens	25445.7	0.0	25445.7
	% Fixture	75.8	0.0	75.8
Total	Lumens	33582.0	0.0	33582.0
	% Fixture	100.0	0.0	100.0

Coefficient of Utilization

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	569.5	1.7
10°-20°	1728.4	5.1
20°-30°	2981.0	8.9
30°-40°	4395.6	13.1
40°-50°	5794.3	17.3
50°-60°	6819.4	20.3
60°-70°	6784.7	20.2
70°-80°	3956.6	11.8
80°-90°	552.5	1.6
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°	33582.0	100.0
0°-180°	33582.0	100.0

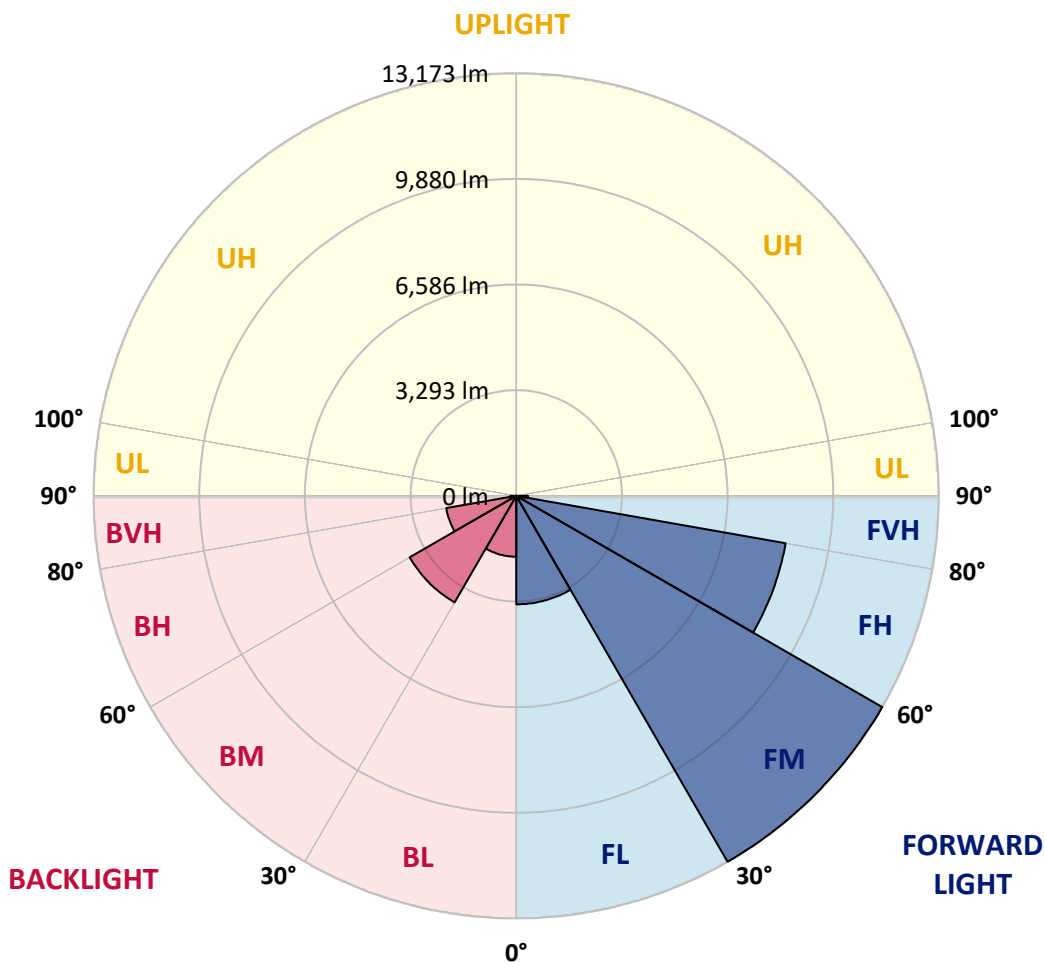


REPORT NUMBER: P510657
 CATALOG NUMBER: CST-CA6-230-730-U-T2

LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	3381.6	10.1			
FM (30°-60°)	13172.8	39.2			
FH (60°-80°)	8524.7	25.4			G4/12000
FVH (80°-90°)	366.6	1.1			G3/500
BL (0°-30°)	1897.3	5.6	B3/2500		
BM (30°-60°)	3836.5	11.4	B3/5000		
BH (60°-80°)	2216.6	6.6	B3/2500		G3/2500
BVH (80°-90°)	185.9	0.6			G2/225
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

BUG Rating: B3-U0-G4
 Type II Short





REPORT NUMBER: P510657
 CATALOG NUMBER: CST-CA6-230-730-U-T2

CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	74°	75°	85°
0°	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7
2.5°	6243.9	6218.3	6221.8	6203.8	6176.8	6156.8	6104.3	6047.6	6013.7	6011.0	5962.6
5°	6557.7	6566.0	6568.0	6510.7	6454.0	6389.7	6309.6	6200.3	6111.2	6097.4	6003.4
7.5°	6843.8	6843.1	6839.0	6807.2	6780.9	6685.5	6525.2	6353.8	6208.6	6195.5	6042.8
10°	7136.9	7134.8	7093.3	7040.1	6980.7	6892.9	6755.3	6550.1	6315.1	6297.8	6079.4
12.5°	7456.2	7433.4	7407.1	7342.8	7272.3	7120.3	6975.8	6752.6	6507.2	6476.1	6144.4
15°	7719.5	7696.0	7659.4	7615.8	7541.9	7425.8	7272.3	7007.6	6744.3	6713.9	6290.2
17.5°	7980.1	7969.0	7942.7	7896.4	7839.8	7739.5	7598.6	7373.9	7029.0	6991.7	6532.8
20°	8193.6	8167.4	8148.0	8169.4	8174.3	8100.3	8022.9	7834.2	7454.1	7396.7	6830.7
22.5°	8315.3	8309.8	8415.5	8494.3	8526.1	8542.7	8518.5	8366.4	8022.2	7922.0	7245.4
25°	8430.7	8421.7	8565.5	8762.5	8949.8	9045.1	9109.4	9129.5	8813.6	8723.1	7912.3
27.5°	8434.2	8459.0	8667.8	8998.1	9283.6	9574.6	9882.8	9918.1	9640.9	9569.0	8671.2
30°	8452.8	8463.9	8670.5	9050.0	9644.4	10110.9	10512.5	10710.8	10471.7	10438.5	9506.8
32.5°	8215.8	8230.3	8551.7	9140.5	9916.7	10665.9	11198.8	11493.2	11433.8	11391.6	10398.4
35°	7969.0	7981.5	8354.7	9012.0	10119.2	11169.8	11818.7	12397.2	12505.8	12474.0	11393.0
37.5°	7582.0	7623.4	8014.6	8858.5	10154.4	11540.2	12410.4	13297.8	13625.4	13530.0	12444.9
40°	7161.7	7192.2	7647.6	8537.1	10115.0	11783.5	12991.6	14294.5	14691.2	14640.0	13489.3
42.5°	6630.9	6712.5	7168.7	8126.6	9912.5	11934.9	13529.4	15424.5	16000.9	16069.3	14448.6
45°	6183.8	6181.7	6605.4	7532.2	9545.5	11970.8	14024.2	16567.0	17410.2	17281.6	15716.9
47.5°	5657.8	5679.2	6121.6	6940.6	9004.4	11856.8	14409.9	17917.5	18771.1	18701.3	16757.0
50°	4440.7	4594.8	5432.5	6431.9	8272.4	11538.8	14731.3	19232.8	20047.6	20079.4	17702.5
52.5°	3828.3	3887.7	4350.1	5919.7	7622.7	11005.3	15083.8	20712.5	21281.3	21200.5	18775.9
55°	3582.9	3614.7	3836.6	4999.8	6994.5	10179.3	15253.1	22063.7	22243.4	22230.3	19659.2
57.5°	3405.3	3429.5	3587.1	4172.5	6304.7	9119.1	15110.0	22942.9	23222.1	23136.4	20492.7
60°	3148.9	3168.3	3403.2	3759.9	5594.9	8048.5	14230.2	23341.7	23931.9	23900.1	21229.5
62.5°	2956.1	2989.2	3120.6	3455.1	4988.8	7166.6	13181.7	23217.3	24397.8	24426.1	21792.1
65°	2752.2	2781.9	2893.2	3185.5	4439.3	6586.7	12051.0	22593.8	24183.5	24258.8	21883.3
67.5°	2500.6	2523.4	2655.4	2908.4	3797.2	6006.8	10775.8	21491.5	22994.7	23237.3	20975.2
70°	2184.0	2192.3	2354.1	2526.2	3153.0	5132.5	8568.2	19686.8	21274.4	21279.3	19260.4
72.5°	1738.3	1745.2	1788.0	1918.6	2368.6	4061.9	6297.8	16449.5	19183.0	19147.7	17117.8
75°	1181.9	1242.7	1391.3	1515.7	1708.5	2852.4	3916.8	11082.7	16252.5	16529.0	14060.9
77.5°	933.7	939.3	1000.8	1114.8	1281.4	2130.8	2195.1	6131.9	12116.6	12773.9	11052.3
80°	651.1	660.7	627.6	655.2	893.7	1458.3	1282.8	2668.5	5053.0	5395.2	6635.8
82.5°	310.3	321.4	369.1	342.8	444.4	620.0	677.3	1378.9	2182.7	2240.0	2583.5
85°	204.6	204.6	205.3	194.2	259.2	270.2	307.6	588.2	1065.8	1101.7	1095.5
87.5°	65.7	72.6	70.5	82.2	99.5	89.9	94.0	184.5	365.6	362.2	302.7
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: P510657
 CATALOG NUMBER: CST-CA6-230-730-U-T2

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7	5919.7
2.5°	5928.0	5899.7	5833.3	5775.3	5717.9	5674.4	5637.1	5587.3	5563.8	5542.4	5587.3
5°	5945.3	5894.9	5776.0	5657.1	5547.9	5467.7	5418.7	5382.7	5350.2	5350.2	5365.4
7.5°	5965.4	5896.9	5726.9	5558.3	5394.5	5303.2	5233.4	5187.8	5161.5	5162.9	5195.4
10°	5978.5	5873.4	5670.9	5443.5	5265.2	5118.7	5050.3	4984.6	4934.8	4905.1	4938.3
12.5°	5993.7	5865.8	5595.6	5339.2	5122.1	4956.3	4813.9	4764.8	4716.4	4679.1	4697.1
15°	6087.7	5894.9	5532.7	5206.5	4954.9	4748.2	4561.6	4471.8	4457.9	4432.4	4438.6
17.5°	6241.1	5973.0	5491.9	5044.0	4753.8	4509.8	4273.4	4157.3	4129.6	4116.5	4123.4
20°	6469.9	6121.6	5504.4	4930.0	4527.1	4254.1	3948.6	3812.4	3720.5	3726.0	3753.0
22.5°	6819.6	6361.4	5572.1	4804.9	4281.7	3923.7	3615.4	3430.2	3337.6	3317.5	3348.0
25°	7376.7	6747.7	5646.7	4685.3	4044.6	3567.0	3225.6	3025.2	2906.3	2898.7	2932.6
27.5°	8090.7	7340.1	5809.2	4581.7	3750.2	3138.5	2799.2	2627.8	2501.3	2486.1	2475.0
30°	8821.2	7998.0	6102.9	4424.1	3406.7	2696.2	2401.1	2267.0	2125.3	2067.9	2080.4
32.5°	9595.3	8611.1	6447.1	4313.5	3022.4	2307.1	2050.7	1922.8	1792.9	1709.9	1690.6
35°	10374.9	9220.7	6736.7	4148.3	2658.2	1998.1	1752.8	1620.8	1507.4	1439.7	1434.8
37.5°	11287.2	9855.2	6968.9	3972.8	2280.1	1756.2	1461.1	1385.1	1330.5	1271.0	1277.3
40°	12201.0	10594.7	7154.8	3682.5	1966.3	1496.3	1243.4	1258.6	1270.3	1220.6	1216.4
42.5°	12959.8	11216.1	7239.8	3306.5	1688.5	1270.3	1147.3	1216.4	1267.6	1235.1	1230.9
45°	13730.5	11739.3	7206.7	2840.0	1457.6	1162.5	1139.7	1210.2	1275.9	1268.3	1264.8
47.5°	14568.2	12424.9	7149.3	2308.5	1292.5	1152.2	1156.3	1189.5	1272.4	1286.2	1280.7
50°	15592.4	13055.9	6809.9	1797.7	1212.3	1168.7	1193.6	1176.3	1246.8	1275.2	1280.0
52.5°	16611.9	13541.8	6355.9	1557.9	1180.5	1184.6	1245.5	1186.7	1217.8	1242.7	1265.5
55°	17398.4	14036.7	5621.2	1413.4	1170.1	1192.2	1260.0	1208.8	1208.1	1208.1	1215.7
57.5°	18203.6	14699.5	4886.5	1320.1	1152.2	1200.5	1242.7	1213.0	1203.3	1189.5	1180.5
60°	18764.2	14944.8	3942.3	1258.6	1133.5	1188.8	1194.3	1190.2	1160.4	1147.3	1136.9
62.5°	19261.8	15078.2	3069.4	1188.1	1107.9	1161.1	1132.1	1123.1	1105.8	1074.1	1079.6
65°	19128.4	14792.1	2338.9	1108.6	1090.0	1128.0	1077.5	1056.1	1057.5	1024.3	1035.3
67.5°	18270.0	13508.6	1679.5	987.0	1040.9	1062.3	1015.3	999.4	975.9	959.3	974.5
70°	16535.9	11974.9	1132.8	819.0	928.9	975.2	944.1	916.5	879.8	868.8	885.4
72.5°	13917.8	9996.2	781.7	658.7	801.7	861.9	850.1	821.8	795.5	822.5	855.0
75°	11433.8	7395.4	637.9	539.8	616.5	718.1	752.7	761.0	839.8	1102.4	1129.3
77.5°	8230.3	4584.4	573.7	438.9	492.1	574.3	643.5	671.8	1025.7	982.1	980.1
80°	4798.7	2672.0	437.5	346.3	398.1	420.9	503.2	788.6	884.7	758.9	740.2
82.5°	2189.6	1179.1	304.8	277.2	276.5	278.5	342.8	758.9	678.7	597.8	575.7
85°	805.2	414.7	185.2	160.3	183.8	159.7	224.6	556.4	393.3	387.0	322.8
87.5°	198.4	85.0	62.9	52.5	42.9	40.8	68.4	183.2	96.1	87.8	84.3
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)