

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: P510743

Luminaire Tested: **CST-CA8-230-750-U-T5N**

Issue Date: 4/6/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P510743  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2102-151-13)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 4/6/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: CST-CA8-230-750-U-T5N  
Description: CELESTEON HIGH MAST LUMINAIRE  
Light Source: (8) 5000K CCT, 70 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 38903 lumens  
Efficiency: N/A  
Efficacy: 170.3 lumens/watt  
Luminous Opening: Circular (Dia: 2.08' x H: 0')  
IES Classification: Type V - Short  
BUG Rating: B5 - U0 - G3

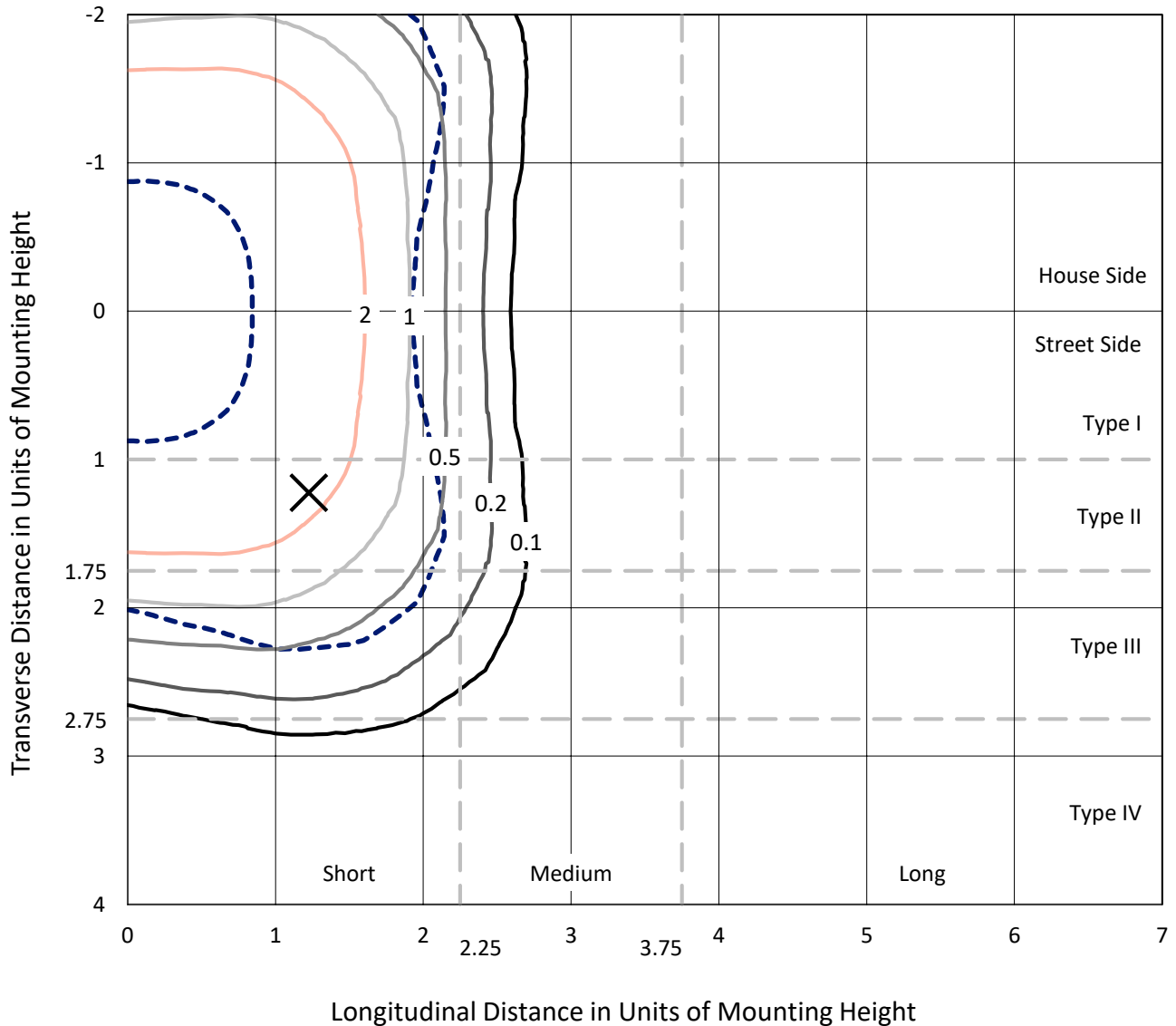
Input Watts (W): 228.4  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



REPORT NUMBER: P510743  
 CATALOG NUMBER: CST-CA8-230-750-U-T5N

### Iso-Footcandle Lines of Horizontal Illumination

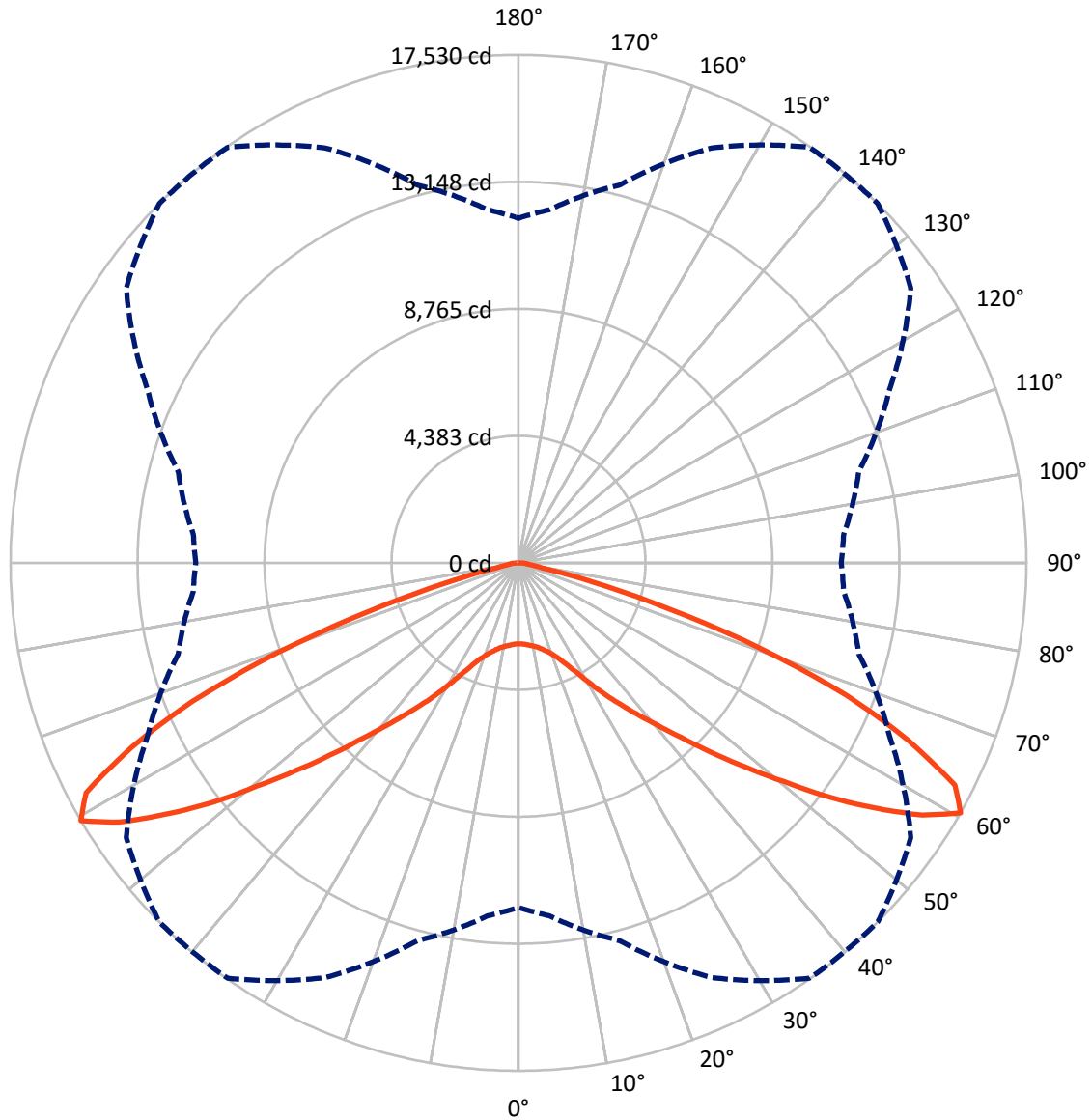
✕ Max cd  
 - - - 1/2 Max cd



Based on 30 foot mounting height. Maximum calculated value = 4.3 fc  
 Type V - Short - N/A

REPORT NUMBER: P510743  
CATALOG NUMBER: CST-CA8-230-750-U-T5N

### Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral      - - - Horizontal Cone Through 60-Deg Vertical

REPORT NUMBER: P510743  
 CATALOG NUMBER: CST-CA8-230-750-U-T5N

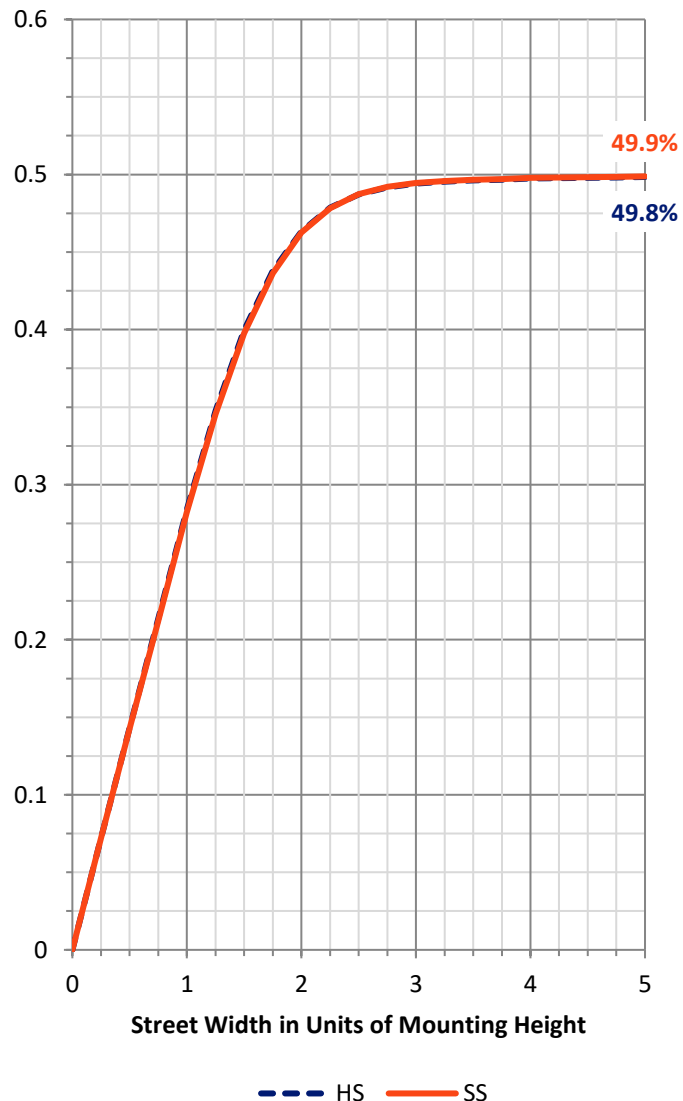
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	19451.5	0.0	19451.5
	% Fixture	50.0	0.0	50.0
<b>Street Side</b>	Lumens	19451.5	0.0	19451.5
	% Fixture	50.0	0.0	50.0
<b>Total</b>	Lumens	38903.0	0.0	38903.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	273.4	0.7
10°-20°	891.2	2.3
20°-30°	1892.8	4.9
30°-40°	4013.4	10.3
40°-50°	7632.4	19.6
50°-60°	12108.4	31.1
60°-70°	10234.8	26.3
70°-80°	1683.8	4.3
80°-90°	172.7	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°	38903.0	100.0
0°-180°	38903.0	100.0

**Coefficient of Utilization**

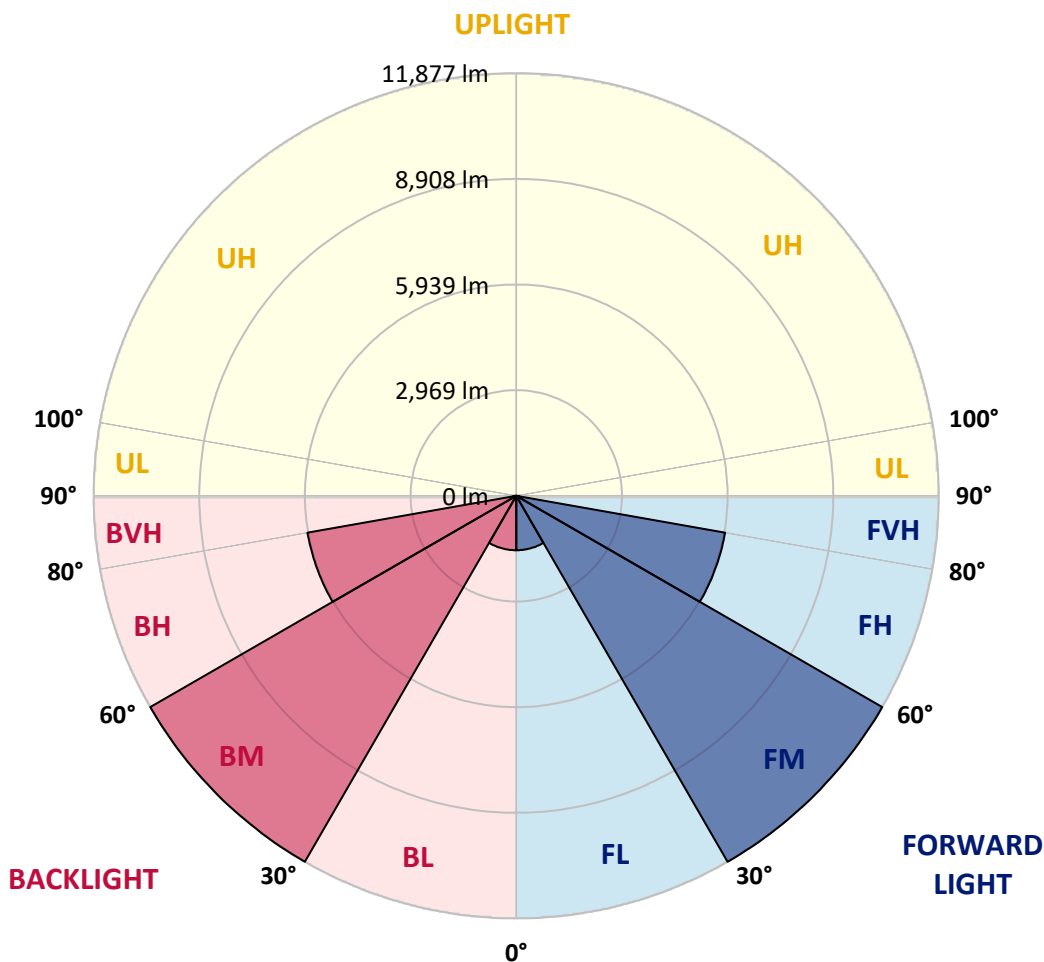


REPORT NUMBER: P510743  
 CATALOG NUMBER: CST-CA8-230-750-U-T5N

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

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	1528.7	3.9			
FM (30°-60°)	11877.2	30.5			
FH (60°-80°)	5959.3	15.3			G3/7500
FVH (80°-90°)	86.3	0.2			G1/100
BL (0°-30°)	1528.7	3.9	B3/2500		
BM (30°-60°)	11877.2	30.5	B5		
BH (60°-80°)	5959.3	15.3	B5		G3/7500
BVH (80°-90°)	86.3	0.2			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 V Short





REPORT NUMBER: P510743  
 CATALOG NUMBER: CST-CA8-230-750-U-T5N

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1	2793.1
2.5°	2813.3	2806.3	2804.1	2801.2	2802.6	2803.4	2807.4	2807.8	2807.8	2811.4	2817.7
5°	2844.8	2835.6	2832.3	2828.7	2830.5	2832.3	2836.0	2838.2	2837.8	2840.0	2845.5
7.5°	2878.9	2875.6	2871.6	2869.4	2869.4	2874.5	2871.9	2876.0	2875.6	2878.2	2881.5
10°	2929.5	2922.2	2921.8	2917.8	2919.6	2924.0	2924.7	2924.0	2924.7	2926.2	2933.9
12.5°	2993.7	2991.8	2992.9	2989.6	2988.5	2993.3	2994.4	2999.2	3000.6	3005.0	3009.8
15°	3097.0	3085.3	3083.8	3083.5	3085.7	3093.0	3095.2	3104.0	3108.0	3114.3	3124.9
17.5°	3214.0	3218.0	3210.7	3210.0	3209.6	3215.5	3221.3	3240.8	3247.0	3261.3	3270.5
20°	3400.6	3393.3	3388.9	3371.3	3366.9	3377.2	3398.4	3424.1	3436.2	3458.9	3476.2
22.5°	3649.9	3637.5	3607.4	3586.5	3577.7	3595.3	3618.4	3659.5	3708.2	3736.5	3744.2
25°	4010.4	3961.2	3923.8	3886.8	3873.6	3899.6	3937.0	4002.3	4063.5	4120.0	4146.0
27.5°	4449.2	4418.1	4343.6	4285.3	4262.2	4284.2	4362.0	4454.0	4566.2	4624.9	4633.7
30°	5006.5	4990.4	4895.4	4786.2	4745.1	4783.2	4874.9	5000.3	5156.5	5277.1	5298.4
32.5°	5696.6	5614.8	5482.8	5357.8	5313.8	5360.3	5452.4	5632.4	5842.8	5976.3	6021.8
35°	6487.8	6395.4	6197.0	6004.9	5948.1	5953.9	6101.3	6355.0	6642.9	6829.1	6880.1
37.5°	7360.4	7266.2	7032.2	6734.2	6602.5	6612.4	6805.3	7135.3	7529.8	7732.9	7800.4
40°	8291.7	8194.1	7952.9	7617.0	7400.7	7356.7	7614.5	8016.3	8417.1	8662.0	8688.0
42.5°	9202.0	9086.5	8892.6	8556.7	8359.5	8241.4	8552.7	8916.8	9320.8	9541.6	9558.8
45°	10015.3	9992.9	9837.1	9593.6	9431.2	9326.7	9548.9	9910.4	10192.7	10332.4	10383.4
47.5°	10801.3	10787.4	10737.5	10652.5	10692.8	10519.0	10625.7	10789.6	10944.7	11047.4	11087.0
50°	11490.3	11504.9	11602.8	11747.7	12039.5	11863.5	11830.1	11653.8	11658.2	11666.3	11707.3
52.5°	12059.3	12137.0	12383.4	12820.5	13450.7	13446.7	12941.8	12476.2	12265.7	12172.2	12180.7
55°	12555.4	12688.5	13095.4	13997.8	14899.7	14944.8	14258.1	13226.7	12832.2	12632.7	12658.8
57.5°	12829.3	13032.0	13720.9	15090.7	16376.2	16430.4	15665.6	14057.9	13154.5	12649.6	12671.2
60°	11889.2	12230.5	13500.6	15795.8	17505.4	17530.4	16526.1	14123.1	12157.9	11264.4	11133.5
62.5°	9729.3	10202.2	11994.0	15249.5	16982.2	16904.9	15987.5	12900.4	9987.4	8903.6	8793.6
65°	7308.3	7753.1	9629.2	13057.3	14900.8	14798.9	13864.7	10195.6	7322.3	6171.7	6036.4
67.5°	3955.4	4627.1	6382.5	9974.2	11878.5	12224.3	10930.0	7106.3	4261.1	3089.3	2970.6
70°	1366.1	1765.4	3254.3	6261.2	8567.7	8914.6	7453.5	3811.3	1864.8	1165.9	1046.8
72.5°	485.1	559.1	1223.5	3023.7	4877.8	5404.7	4021.7	1532.9	594.3	433.0	424.2
75°	342.4	353.4	434.8	985.9	2111.9	2586.7	1585.7	508.9	370.7	346.5	344.3
77.5°	305.8	312.0	352.3	401.5	645.3	826.0	488.0	369.2	321.9	308.3	303.6
80°	290.7	295.5	307.2	329.2	365.9	380.6	329.2	315.7	292.9	287.1	285.2
82.5°	254.1	253.0	256.3	265.5	281.9	285.6	264.4	247.5	247.9	240.9	237.6
85°	172.0	182.2	174.5	165.0	204.6	205.7	191.8	143.7	163.2	159.9	146.3
87.5°	52.1	58.7	46.6	32.3	44.4	34.5	31.2	32.3	30.8	26.8	24.2
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)