

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: METALUX

Report Number: P#

Luminaire Tested: **VT4S-LD5-15-PCF-L840-CD2-U**

Issue Date: 3/3/2020

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.

**Test Information**

Test Method: LM-79-08  
Report Number: P#  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1801-511-7)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: VT4S-LD5-15-PCF-L840-CD2-U  
Description: VT4S VAPORTIGHT FIXTURE WITH 4000K LED AND FROSTED POLYCARBONATE LENS  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.    Condition    Description

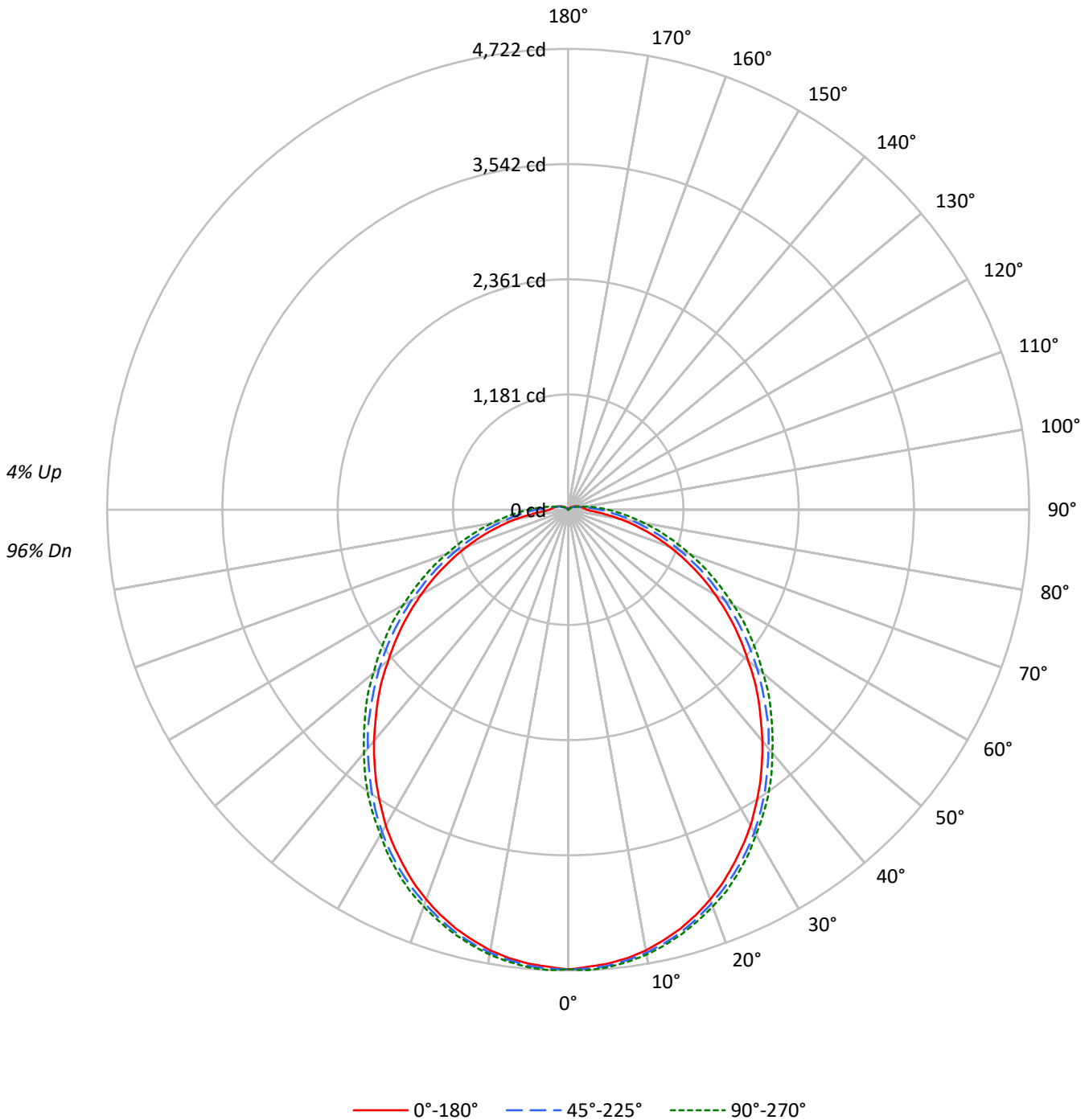
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 13439.1 lumens  
Efficiency: N/A  
Efficacy: 124.1 lumens/watt  
Spacing Criteria (0/90/45): 1.18 / 1.22 / 1.32  
Luminous Opening: Rectangular w/ Sides (W: 1.08' x L: 2.08' x H: 0.25')  
CIE Type: Direct  
  
Input Watts (W): 108.3  
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: 25 FT



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### Luminous Intensity Polar Plot





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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	118	118	118	118	115	115	115	115	109	109	109	104	104	104	99	99	99	96
1	107	102	97	93	104	99	95	91	94	91	88	90	87	85	86	83	81	79
2	97	89	82	76	94	87	80	75	82	77	72	79	74	70	75	71	68	66
3	89	78	70	63	86	76	68	62	73	66	61	69	64	59	66	62	58	55
4	81	69	60	53	79	67	59	53	65	57	52	62	56	51	59	54	50	47
5	75	62	53	46	72	60	52	46	58	50	45	56	49	44	53	48	43	41
6	69	56	47	40	67	55	46	40	52	45	39	50	44	39	48	43	38	36
7	64	51	42	36	62	50	41	35	48	40	35	46	39	34	44	38	34	32
8	60	46	38	32	58	45	37	32	44	36	31	42	36	31	41	35	30	28
9	56	42	34	29	54	42	34	28	40	33	28	39	32	28	38	32	27	26
10	52	39	31	26	51	38	31	26	37	30	26	36	30	25	35	29	25	23

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	22473	22473	22473
5°	22126	21986	22094
10°	21754	21395	21550
15°	21263	20741	20934
20°	20686	19993	20268
25°	19982	19224	19559
30°	19250	18385	18698
35°	18403	17439	17911
40°	17508	16461	16979
45°	16616	15451	16101
50°	15611	14466	15153
55°	14721	13414	14289
60°	13738	12348	13300
65°	12706	11253	12309
70°	11540	10096	11285
75°	10237	8902	10349
80°	8616	7774	9424
85°	6786	6780	8697



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	444.9	3.3
10°-20°	1261.2	9.4
20°-30°	1873.2	13.9
30°-40°	2192.4	16.3
40°-50°	2203.1	16.4
50°-60°	1953.2	14.5
60°-70°	1515.4	11.3
70°-80°	988.6	7.4
80°-90°	516.3	3.8
90°-100°	246.9	1.8
100°-110°	128.6	1.0
110°-120°	70.0	0.5
120°-130°	33.0	0.2
130°-140°	10.1	0.1
140°-150°	1.4	0.0
150°-160°	0.3	0.0
160°-170°	0.3	0.0
170°-180°	0.1	0.0
0°-30°	3579.3	26.6
0°-40°	5771.7	42.9
0°-60°	9928.0	73.9
0°-90°	12948.3	96.3
90°-120°	445.5	3.3
90°-150°	490.0	3.6
90°-180°	491.0	3.7
0°-180°	13439.1	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	4710	4710	4710	4710	4710	
5°	4668	4674	4690	4701	4706	443
15°	4443	4454	4478	4493	4500	1252
25°	4008	4033	4074	4106	4115	1846
35°	3425	3460	3514	3557	3572	2141
45°	2758	2795	2858	2913	2937	2125
55°	2073	2111	2184	2258	2284	1854
65°	1415	1454	1527	1609	1630	1403
75°	804	842	930	1016	1045	853
85°	294	376	475	558	578	291
90°	190	245	325	387	402	107
95°	165	176	219	264	275	130
105°	121	115	118	120	126	128
115°	82	68	69	65	70	82
125°	50	41	29	30	37	46
135°	26	20	5	6	11	21
145°	7	4	0	0	0	5
155°	2	2	0	0	0	1
165°	2	2	1	0	0	1
175°	3	2	1	0	0	0
180°	1	1	1	1	1	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	4709.9	4709.9	4709.9	4709.9	4709.9
2.5°	4687.9	4693.9	4706.9	4719.9	4721.9
5°	4667.9	4673.9	4689.9	4700.9	4705.9
7.5°	4633.9	4639.9	4654.9	4669.9	4671.9
10°	4584.9	4592.9	4608.9	4625.9	4628.9
12.5°	4517.9	4530.9	4550.9	4565.9	4569.9
15°	4442.9	4453.9	4477.9	4492.9	4499.9
17.5°	4352.9	4366.9	4391.9	4409.9	4417.9
20°	4251.9	4265.9	4292.9	4323.9	4326.9
22.5°	4137.9	4159.9	4188.9	4218.9	4230.9
25°	4007.9	4032.9	4073.9	4105.9	4114.9
27.5°	3875.9	3899.9	3949.9	3982.9	3989.9
30°	3735.9	3761.9	3814.9	3840.9	3845.9
32.5°	3579.9	3609.9	3666.9	3702.9	3711.9
35°	3424.9	3459.9	3513.9	3556.9	3571.9
37.5°	3260.9	3299.9	3351.9	3406.9	3418.9
40°	3093.9	3134.9	3192.9	3243.9	3253.9
42.5°	2919.9	2964.9	3036.9	3077.9	3096.9
45°	2757.9	2794.9	2857.9	2912.9	2936.9
47.5°	2586.9	2623.9	2689.9	2754.9	2781.9
50°	2403.9	2453.9	2524.9	2587.9	2602.9
52.5°	2241.9	2289.9	2351.9	2421.9	2444.9
55°	2072.9	2110.9	2183.9	2257.9	2283.9
57.5°	1904.9	1945.9	2012.9	2087.9	2126.9
60°	1738.9	1777.9	1849.9	1927.9	1950.9
62.5°	1578.0	1618.0	1683.0	1767.9	1790.9
65°	1415.0	1454.0	1527.0	1609.0	1630.0
67.5°	1257.0	1294.0	1369.0	1456.0	1482.0
70°	1100.0	1148.0	1217.0	1298.0	1322.0
72.5°	952.0	994.0	1073.0	1155.0	1183.0
75°	804.0	842.0	930.0	1016.0	1045.0
77.5°	665.0	714.0	800.0	894.0	917.0
80°	527.0	579.0	681.0	771.0	792.0
82.5°	402.0	469.0	573.0	662.0	675.0
85°	294.0	376.0	475.0	558.0	578.0
87.5°	221.0	301.0	398.0	467.0	485.0
90°	190.0	245.0	325.0	387.0	402.0
92.5°	177.0	204.0	267.0	322.0	332.0
95°	165.0	176.0	219.0	264.0	275.0
97.5°	153.0	157.0	184.0	216.0	225.0
100°	142.0	143.0	155.0	178.0	184.0
102.5°	131.0	128.0	133.0	145.0	150.0
105°	121.0	115.0	118.0	120.0	126.0
107.5°	111.0	102.0	104.0	102.0	105.0
110°	101.0	89.0	91.0	88.0	91.0



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	91.0	78.0	80.0	76.0	80.0
115°	82.0	68.0	69.0	65.0	70.0
117.5°	74.0	61.0	58.0	55.0	61.0
120°	65.0	53.0	48.0	46.0	53.0
122.5°	58.0	47.0	38.0	38.0	45.0
125°	50.0	41.0	29.0	30.0	37.0
127.5°	44.0	35.0	21.0	24.0	30.0
130°	38.0	30.0	13.0	18.0	24.0
132.5°	31.0	24.0	8.0	12.0	17.0
135°	26.0	20.0	5.0	6.0	11.0
137.5°	21.0	15.0	2.0	1.0	5.0
140°	16.0	11.0	1.0	0.0	0.0
142.5°	11.0	7.0	0.0	0.0	0.0
145°	7.0	4.0	0.0	0.0	0.0
147.5°	4.0	2.0	0.0	0.0	0.0
150°	2.0	1.0	0.0	0.0	0.0
152.5°	2.0	1.0	0.0	0.0	0.0
155°	2.0	2.0	0.0	0.0	0.0
157.5°	2.0	2.0	1.0	0.0	0.0
160°	2.0	2.0	1.0	0.0	0.0
162.5°	2.0	2.0	1.0	0.0	0.0
165°	2.0	2.0	1.0	0.0	0.0
167.5°	2.0	2.0	1.0	0.0	0.0
170°	2.0	2.0	1.0	0.0	0.0
172.5°	2.0	2.0	1.0	0.0	0.0
175°	3.0	2.0	1.0	0.0	0.0
177.5°	3.0	2.0	1.0	0.0	0.0
180°	1.0	1.0	1.0	1.0	1.0

(END OF REPORT)