

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: FAIL-SAFE

Report Number: P580428

Luminaire Tested: **HVSL4-1-LD4-1LO-30-UNV-O-EDD**

Issue Date: 12/16/2022



Test Information

Test Method: LM-79-08
Report Number: P580428
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2102-135-6)
Test Lab: INNOVATION CENTER
Issue Date: 12/16/2022
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: HVSL4-1-LD4-1LO-30-UNV-O-EDD
Description: 1 FOOT, 4INCH WIDE, HVSL LED LUMINAIRE, WITH 3000K, 80 CRI LEDS
Light Source: -
Ballast/Driver: -

Summary

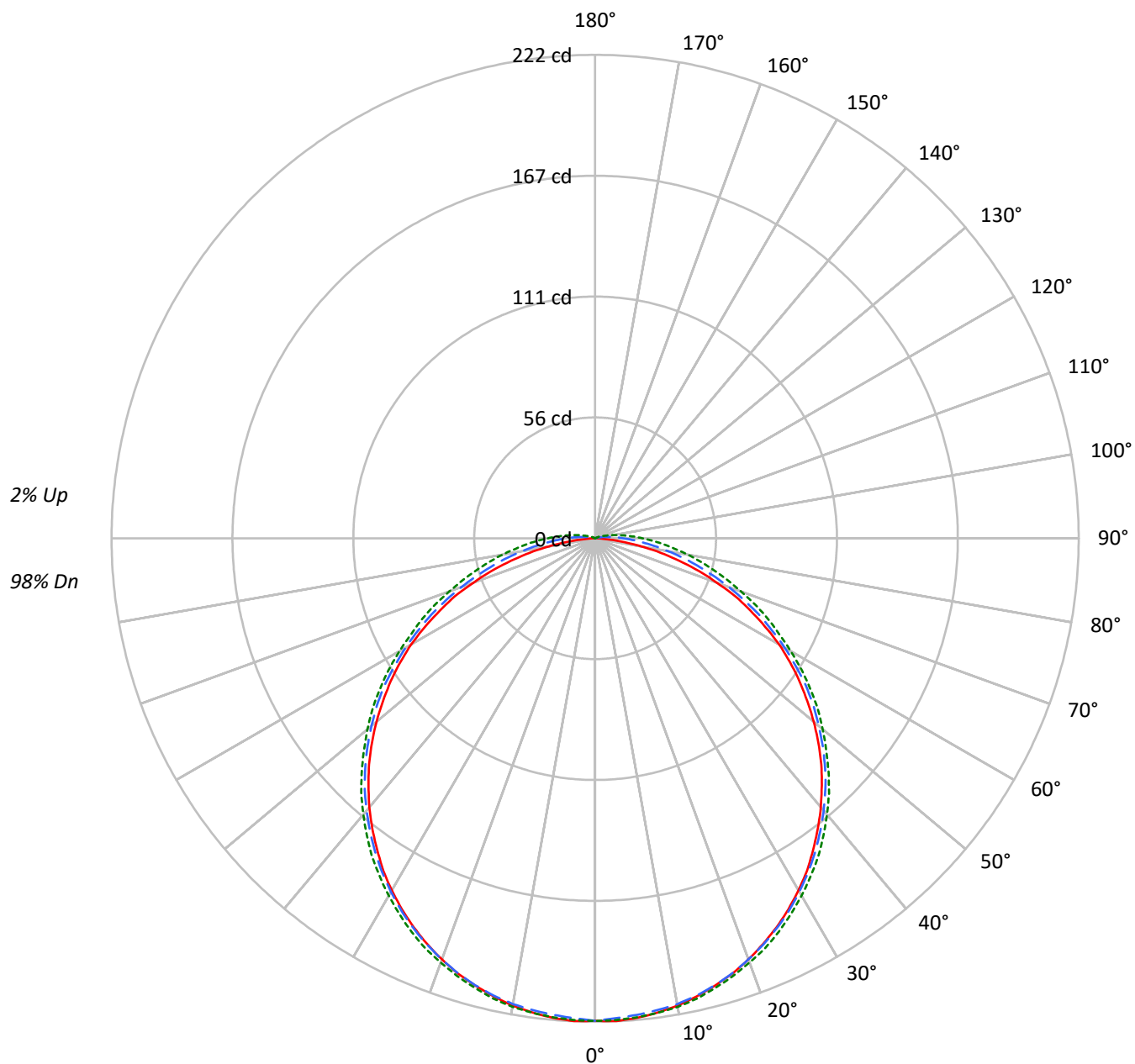
Lumens per Lamp: N/A
Luminaire Lumens: 670.0 lumens
Efficiency: N/A
Efficacy: 115.5 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.27 / 1.38
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 1' x H: 0.17')
CIE Type: Direct

Input Watts (W): 5.8
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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10
RCR																				
0	119	119	119	119	116	116	116	116	110	110	110	105	105	105	101	101	101			98
1	108	102	98	94	105	100	96	92	95	92	89	91	88	86	87	85	83			81
2	98	89	82	76	95	87	80	75	83	77	73	79	75	71	76	72	69			67
3	89	78	69	63	86	76	68	62	73	66	61	70	64	59	67	62	58			56
4	81	69	60	53	79	67	59	52	65	57	52	62	56	51	60	54	50			47
5	75	61	52	45	72	60	52	45	58	50	44	56	49	44	54	48	43			41
6	69	55	46	40	67	54	46	39	52	45	39	50	44	38	49	43	38			36
7	64	50	41	35	62	49	41	35	47	40	34	46	39	34	44	38	34			32
8	59	46	37	31	58	45	37	31	43	36	31	42	35	30	41	35	30			28
9	55	42	34	28	54	41	33	28	40	33	28	39	32	27	38	32	27			25
10	52	39	31	25	51	38	30	25	37	30	25	36	29	25	35	29	25			23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7156	7156	7156
5°	7064	6839	6857
10°	6941	6575	6584
15°	6807	6307	6300
20°	6668	6036	6027
25°	6516	5769	5761
30°	6350	5495	5483
35°	6160	5216	5212
40°	5961	4929	4917
45°	5746	4633	4612
50°	5490	4310	4293
55°	5211	3973	3961
60°	4886	3573	3589
65°	4430	3150	3226
70°	3834	2678	2824
75°	3069	2193	2451
80°	2055	1726	2094
85°	880	1270	1738



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	21.0	3.1
10°-20°	60.1	9.0
20°-30°	91.3	13.6
30°-40°	110.4	16.5
40°-50°	115.1	17.2
50°-60°	105.3	15.7
60°-70°	82.1	12.2
70°-80°	51.3	7.7
80°-90°	23.3	3.5
90°-100°	7.8	1.2
100°-110°	2.0	0.3
110°-120°	0.3	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°-30°	172.4	25.7
0°-40°	282.8	42.2
0°-60°	503.2	75.1
0°-90°	659.9	98.5
90°-120°	10.1	1.5
90°-150°	10.1	1.5
90°-180°	10.0	1.5
0°-180°	670.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	222	222	222	222	222	
5°	221	221	220	221	221	21
15°	213	213	212	214	214	60
25°	197	197	198	199	199	91
35°	174	175	176	178	178	109
45°	147	148	149	151	152	113
55°	115	116	118	120	121	102
65°	79	80	83	86	88	78
75°	40	42	48	54	56	42
85°	7	13	22	29	32	9
90°	0	5	13	19	22	0
95°	0	1	7	12	14	0
105°	0	0	1	3	4	0
115°	0	0	0	1	1	0
125°	0	0	0	0	0	0
135°	0	0	0	0	0	0
145°	0	0	0	0	0	0
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	221.6	221.6	221.6	221.6	221.6
2.5°	221.9	221.5	220.6	221.5	221.5
5°	221.1	220.7	219.7	220.8	220.8
7.5°	219.7	219.5	218.6	219.8	219.8
10°	217.9	217.9	217.2	218.5	218.5
12.5°	215.5	215.7	215.1	216.3	216.5
15°	212.7	213.1	212.5	213.7	213.7
17.5°	209.6	209.8	209.4	210.8	210.7
20°	205.8	206.1	205.8	207.2	207.3
22.5°	201.6	202.0	201.9	203.4	203.8
25°	197.1	197.3	197.5	199.1	199.4
27.5°	192.1	192.4	192.8	194.3	194.6
30°	186.7	187.1	187.5	189.1	189.5
32.5°	181.0	181.4	181.9	183.9	184.1
35°	174.5	175.3	176.0	177.8	178.5
37.5°	168.0	169.0	169.7	171.6	172.1
40°	161.2	162.1	163.2	165.2	165.6
42.5°	154.0	155.1	156.5	158.2	158.9
45°	146.8	148.1	149.3	150.8	151.5
47.5°	139.0	140.3	141.8	143.4	143.9
50°	131.0	132.5	134.0	135.6	136.4
52.5°	122.7	124.5	126.3	128.0	128.8
55°	114.6	115.9	118.1	119.8	120.6
57.5°	106.1	107.2	109.2	112.0	112.4
60°	97.5	98.5	100.5	102.8	103.7
62.5°	88.0	89.4	91.5	94.4	95.2
65°	78.7	80.1	82.9	86.1	87.5
67.5°	69.8	70.3	73.8	77.3	79.5
70°	59.2	61.0	65.1	69.4	71.0
72.5°	50.1	51.9	56.5	61.4	63.5
75°	39.9	42.3	48.5	54.3	56.3
77.5°	30.8	33.5	41.2	47.0	49.4
80°	21.5	25.8	34.1	40.6	43.2
82.5°	13.5	18.8	27.6	34.5	36.8
85°	6.9	12.7	21.9	28.9	31.5
87.5°	1.8	8.3	17.0	23.8	26.4
90°	0.1	4.8	12.9	19.4	21.7
92.5°	0.1	2.7	9.6	15.4	17.8
95°	0.1	1.3	6.7	12.1	14.0
97.5°	0.1	0.5	4.6	9.1	11.0
100°	0.1	0.3	2.9	6.6	8.3
102.5°	0.1	0.2	1.8	4.8	6.1
105°	0.1	0.2	1.1	3.2	4.3



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CATALOG NUMBER: HVSL4-1-LD4-1LO-30-UNV-O-EDD

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.2	0.2	0.2	0.9	1.3
115°	0.2	0.2	0.2	0.6	0.8
117.5°	0.0	0.0	0.0	0.0	0.0
120°	0.0	0.0	0.0	0.0	0.0
122.5°	0.0	0.0	0.0	0.0	0.0
125°	0.0	0.0	0.0	0.0	0.0
127.5°	0.0	0.0	0.0	0.0	0.0
130°	0.0	0.0	0.0	0.0	0.0
132.5°	0.0	0.0	0.0	0.0	0.0
135°	0.0	0.0	0.0	0.0	0.0
137.5°	0.0	0.0	0.0	0.0	0.0
140°	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0



Report Generated By 670246072 / DESKTOP-MV3F9LC





— 0°-180° - - 45°-225° - - - 90°-270°







107.5°	0.1	0.2	0.6	2.2	3.0
110°	0.2	0.2	0.4	1.4	2.0



(END OF REPORT)