

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: P580574

Luminaire Tested: **HVSL4-4-LD4-1LO-35-UNV-O-EDD**

Issue Date: 12/16/2022



Test Information

Test Method: LM-79-08
Report Number: P580574
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: HVSL4-4-LD4-1LO-35-UNV-O-EDD
Description: 4 FOOT, 4INCH WIDE, HVSL LED LUMINAIRE, WITH 3500K, 80 CRI LEDS
Light Source: -
Ballast/Driver: -

Summary

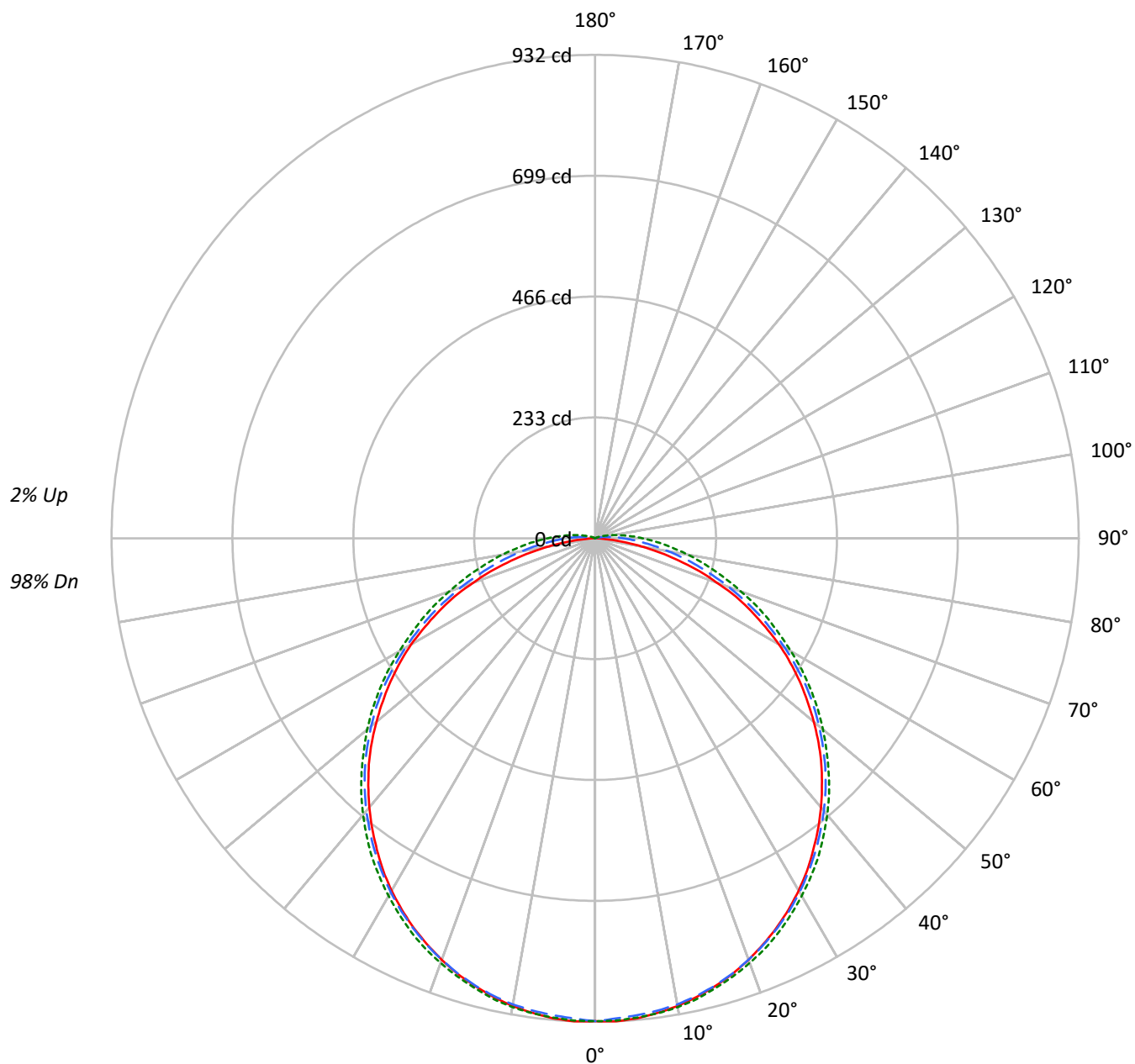
Lumens per Lamp: N/A
Luminaire Lumens: 2815.0 lumens
Efficiency: N/A
Efficacy: 121.9 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.27 / 1.38
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.17')
CIE Type: Direct

Input Watts (W): 23.1
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

TEST NUMBER: P580574

CATALOG NUMBER: HVSL4-4-LD4-1LO-35-UNV-O-EDD

Luminous Intensity Polar Plot





TEST NUMBER: P580574

CATALOG NUMBER: HVSL4-4-LD4-1LO-35-UNV-O-EDD

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°	7516	7516	7516
5°	7502	7238	7201
10°	7452	7006	6916
15°	7387	6767	6616
20°	7318	6518	6331
25°	7236	6270	6053
30°	7140	6014	5760
35°	7020	5746	5474
40°	6895	5470	5164
45°	6759	5178	4844
50°	6583	4856	4511
55°	6394	4512	4159
60°	6167	4099	3771
65°	5801	3650	3388
70°	5271	3147	2968
75°	4521	2615	2575
80°	3399	2097	2200
85°	1819	1584	1825



TEST NUMBER: P580574

CATALOG NUMBER: HVSL4-4-LD4-1LO-35-UNV-O-EDD

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	88.1	3.1
10°-20°	252.7	9.0
20°-30°	383.5	13.6
30°-40°	463.7	16.5
40°-50°	483.8	17.2
50°-60°	442.3	15.7
60°-70°	344.8	12.2
70°-80°	215.7	7.7
80°-90°	98.0	3.5
90°-100°	32.8	1.2
100°-110°	8.2	0.3
110°-120°	1.3	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°	724.3	25.7
0°-40°	1188.0	42.2
0°-60°	2114.1	75.1
0°-90°	2772.6	98.5
90°-120°	42.4	1.5
90°-150°	42.4	1.5
90°-180°	42.0	1.5
0°-180°	2815.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	931	931	931	931	931	
5°	929	927	923	928	928	88
15°	894	895	893	898	898	252
25°	828	829	830	837	838	382
35°	733	736	739	747	750	459
45°	617	622	627	633	636	475
55°	481	487	496	503	507	430
65°	331	336	348	362	368	327
75°	168	178	204	228	237	179
85°	29	54	92	122	132	37
90°	0	20	54	81	91	1
95°	0	5	28	51	59	0
105°	0	1	5	14	18	0
115°	1	1	1	2	4	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	



TEST NUMBER: P580574

CATALOG NUMBER: HVSL4-4-LD4-1LO-35-UNV-O-EDD

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	931.0	931.0	931.0	931.0	931.0
2.5°	932.1	930.8	926.6	930.8	930.6
5°	929.1	927.3	923.1	927.5	927.5
7.5°	922.9	922.3	918.5	923.6	923.6
10°	915.7	915.4	912.4	917.9	918.1
12.5°	905.6	906.5	903.6	908.9	909.5
15°	893.7	895.3	892.8	897.9	897.7
17.5°	880.8	881.6	879.9	885.6	885.4
20°	864.7	865.8	864.5	870.5	871.1
22.5°	847.0	848.5	848.3	854.4	856.2
25°	828.1	828.8	829.6	836.7	838.0
27.5°	807.2	808.3	809.9	816.2	817.6
30°	784.4	786.2	787.9	794.5	796.3
32.5°	760.3	762.0	764.2	772.8	773.7
35°	733.1	736.4	739.4	746.9	750.0
37.5°	705.8	710.0	712.9	720.8	723.2
40°	677.1	681.3	685.9	694.2	695.7
42.5°	647.0	651.9	657.3	664.8	667.4
45°	616.7	622.2	627.3	633.4	636.5
47.5°	584.0	589.5	595.7	602.7	604.7
50°	550.2	556.6	563.2	569.8	573.3
52.5°	515.6	523.2	530.7	537.7	541.0
55°	481.3	487.0	496.0	503.3	506.6
57.5°	445.8	450.6	458.7	470.6	472.3
60°	409.5	413.9	422.3	431.9	435.9
62.5°	369.6	375.5	384.3	396.6	400.1
65°	330.8	336.5	348.1	361.9	367.6
67.5°	293.2	295.2	310.1	324.6	333.8
70°	248.9	256.4	273.7	291.5	298.5
72.5°	210.7	218.2	237.3	258.1	266.9
75°	167.5	177.8	203.7	228.0	236.6
77.5°	129.5	140.9	172.9	197.5	207.4
80°	90.4	108.2	143.1	170.8	181.5
82.5°	56.8	78.8	116.1	145.1	154.5
85°	29.0	53.6	92.0	121.6	132.3
87.5°	7.7	34.7	71.6	99.9	110.8
90°	0.2	20.0	54.2	81.4	91.3
92.5°	0.2	11.2	40.4	64.7	74.8
95°	0.2	5.3	28.1	50.9	58.8
97.5°	0.2	2.2	19.3	38.4	46.3
100°	0.2	1.1	12.3	27.9	34.7
102.5°	0.4	0.7	7.7	20.0	25.5
105°	0.4	0.7	4.6	13.6	18.2



TEST NUMBER: P580574

CATALOG NUMBER: HVSL4-4-LD4-1LO-35-UNV-O-EDD

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.7	0.7	0.9	3.7	5.5
115°	0.7	0.7	0.9	2.4	3.5
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°	0.4	0.7	2.6	9.2	12.5
110°	0.7	0.7	1.5	5.7	8.3



(END OF REPORT)