

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: P284554

Luminaire Tested: **4SNLED-LD5-57HL-SLW-UNV-L840-CD1-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: P284554
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P#)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U
Description: 4FT LINEAR SNLED LED FIXTURE
SQUARE FROSTED LENS
Light Source: -
Ballast/Driver: -

Luminaire Equipment: Sample No. Condition Description

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5796.0 lumens
Efficiency: N/A
Efficacy: 120.8 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.56 / 1.59
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.12')
CIE Type: Semi-Direct

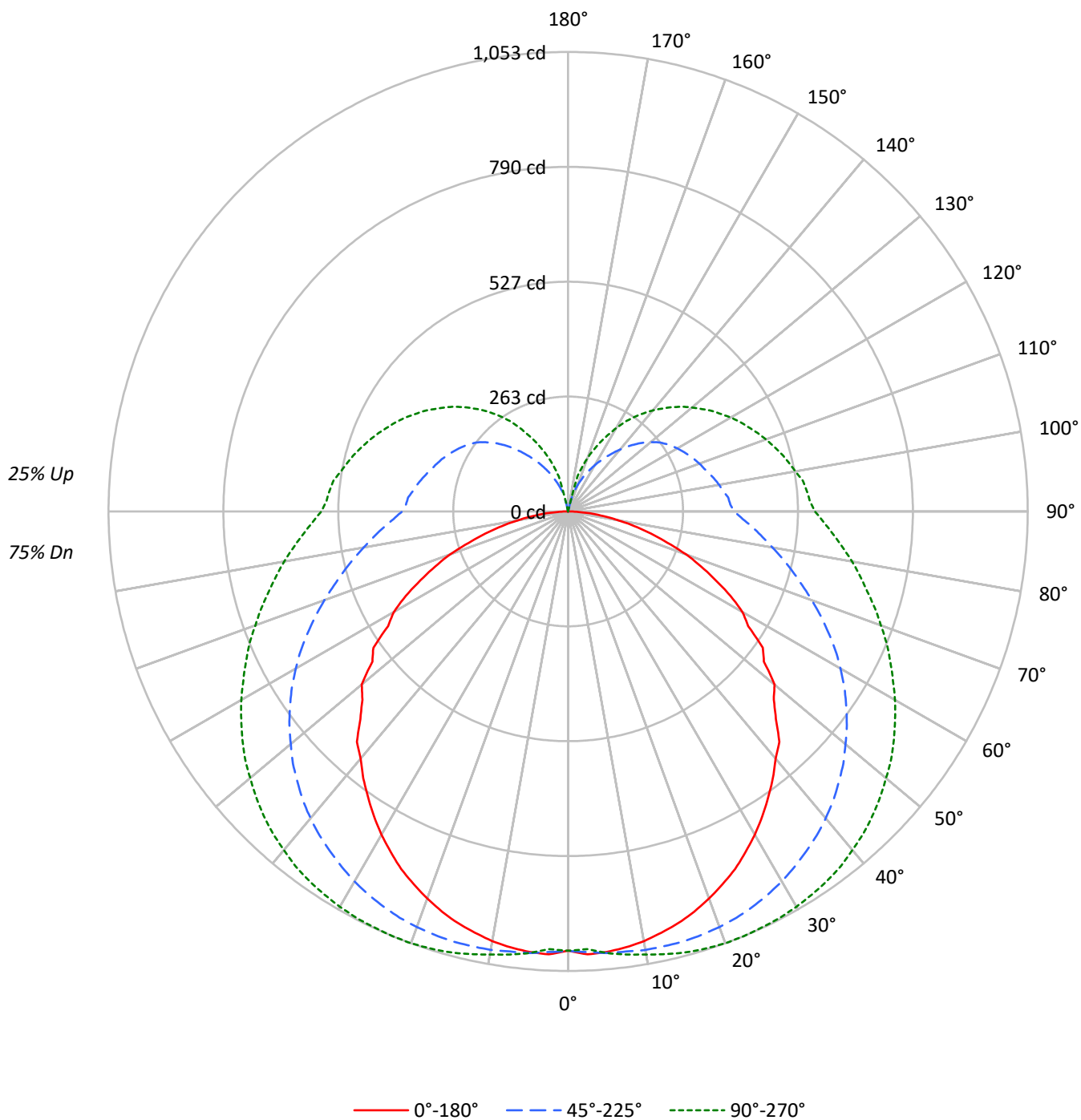
Input Watts (W): 48
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P284554

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U

Luminous Intensity Polar Plot





TEST NUMBER: P284554

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U

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
RCR																	
0	113	113	113	113	107	107	107	107	97	97	97	88	88	88	79	79	79
1	100	94	89	84	95	89	84	80	80	76	73	72	69	66	64	62	60
2	90	80	72	66	85	76	69	63	68	63	58	61	57	53	55	51	48
3	81	69	60	53	76	66	58	51	59	53	47	53	48	43	47	43	39
4	74	61	51	44	69	58	49	43	52	45	39	47	41	36	42	37	33
5	67	54	44	37	63	51	43	36	46	39	33	42	35	31	37	32	28
6	62	48	39	32	58	46	37	31	41	34	29	37	31	27	34	28	24
7	57	43	34	28	54	41	33	27	37	30	25	34	28	23	30	25	21
8	53	39	31	25	50	37	29	24	34	27	22	31	25	21	28	23	19
9	49	36	27	22	47	34	26	21	31	24	20	28	23	18	26	21	17
10	46	33	25	20	44	31	24	19	29	22	18	26	21	16	24	19	15

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	8135	8135	8135
5°	8197	8038	7978
10°	8158	7968	7934
15°	8102	7925	7951
20°	8025	7888	7967
25°	7949	7860	7979
30°	7839	7835	8022
35°	7717	7808	8077
40°	7602	7803	8129
45°	7457	7783	8194
50°	7480	7767	8259
55°	7346	7767	8356
60°	7077	7772	8470
65°	6684	7782	8627
70°	6254	7839	8870
75°	5489	8020	9229
80°	4633	8406	9822
85°	3443	9191	10692



TEST NUMBER: P284554

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	96.7	1.7
10°-20°	286.7	4.9
20°-30°	455.7	7.9
30°-40°	584.9	10.1
40°-50°	660.5	11.4
50°-60°	673.9	11.6
60°-70°	624.3	10.8
70°-80°	528.6	9.1
80°-90°	421.9	7.3
90°-100°	358.3	6.2
100°-110°	319.2	5.5
110°-120°	271.9	4.7
120°-130°	215.9	3.7
130°-140°	153.2	2.6
140°-150°	91.5	1.6
150°-160°	42.6	0.7
160°-170°	10.1	0.2
170°-180°	0.0	0.0
0°-30°	839.2	14.5
0°-40°	1424.0	24.6
0°-60°	2758.4	47.6
0°-90°	4333.3	74.8
90°-120°	949.4	16.4
90°-150°	1410.0	24.3
90°-180°	1463.0	25.2
0°-180°	5796.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1007	1007	1007	1007	1007	
5°	1013	1005	1016	1016	1016	96
15°	976	985	1020	1039	1046	275
25°	904	934	1000	1035	1052	416
35°	799	858	951	1009	1034	500
45°	673	764	877	953	986	523
55°	545	636	778	873	911	478
65°	373	497	658	771	814	370
75°	196	347	532	663	710	209
85°	50	224	425	562	610	55
90°	3	183	380	518	565	4
95°	0	172	368	502	549	0
105°	0	158	335	462	507	0
115°	0	147	305	415	456	0
125°	0	127	271	366	402	0
135°	0	94	218	309	338	0
145°	0	61	152	232	264	1
155°	2	38	94	142	176	1
165°	2	21	42	58	83	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P284554

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1006.7	1006.7	1006.7	1006.7	1006.7
2.5°	1015.8	1005.2	1010.7	1009.2	1003.7
5°	1013.3	1005.2	1015.8	1015.8	1015.8
7.5°	1007.8	1002.2	1017.3	1022.8	1024.3
10°	999.7	999.7	1020.3	1028.3	1030.9
12.5°	988.6	992.7	1020.3	1032.4	1039.0
15°	976.5	984.6	1020.3	1039.0	1046.0
17.5°	961.4	975.0	1017.3	1040.5	1050.0
20°	943.8	964.4	1013.3	1040.5	1053.0
22.5°	924.7	950.8	1007.8	1037.9	1053.0
25°	904.5	934.3	999.7	1035.0	1051.5
27.5°	879.9	918.1	990.1	1030.9	1050.0
30°	855.2	899.0	979.1	1025.4	1046.0
32.5°	828.0	878.4	965.5	1017.3	1040.5
35°	799.4	858.2	950.8	1009.2	1033.9
37.5°	770.7	833.6	935.7	998.2	1025.4
40°	739.5	808.9	918.1	984.6	1013.3
42.5°	716.3	783.2	899.0	971.0	1001.1
45°	672.9	764.1	876.9	953.4	986.1
47.5°	638.8	727.3	855.2	935.7	969.5
50°	617.1	697.2	829.5	915.1	950.8
52.5°	565.3	677.0	804.9	894.9	932.8
55°	544.7	636.2	777.7	872.9	911.1
57.5°	488.8	607.5	750.5	848.6	887.9
60°	461.6	567.8	720.4	824.0	864.8
62.5°	419.3	534.0	690.6	796.8	839.1
65°	373.0	497.3	657.9	770.7	814.4
67.5°	329.7	460.5	626.6	743.5	789.8
70°	287.4	422.3	593.9	716.3	762.6
72.5°	238.2	384.1	562.3	690.6	736.9
75°	196.3	347.3	532.5	663.4	709.7
77.5°	155.1	312.0	503.9	638.8	685.1
80°	117.2	277.9	475.2	613.0	660.4
82.5°	81.6	249.2	449.5	588.4	634.7
85°	50.4	223.5	424.9	562.3	610.1
87.5°	23.2	200.3	400.2	538.1	586.9
90°	2.6	182.7	380.0	517.5	565.3
92.5°	1.5	177.1	371.9	507.9	554.2
95°	0.0	171.6	367.9	502.4	548.7
97.5°	0.0	166.1	358.3	494.3	542.1
100°	0.0	163.5	351.4	482.2	528.5
102.5°	0.0	159.5	343.3	471.2	517.5
105°	0.0	158.0	335.2	461.6	506.8
107.5°	0.0	155.1	326.7	449.5	494.3
110°	0.0	152.5	320.1	438.5	482.2



TEST NUMBER: P284554

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L840-CD1-U

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	150.0	313.1	427.8	469.7
115°	0.0	147.0	305.0	415.3	456.1
117.5°	0.0	143.0	297.0	403.2	444.0
120°	0.0	137.5	288.9	392.2	430.4
122.5°	0.0	131.9	280.4	378.6	415.3
125°	0.0	126.8	270.9	366.4	401.7
127.5°	0.0	118.3	260.2	352.8	385.5
130°	0.0	110.3	246.6	339.2	370.5
132.5°	1.5	102.2	233.0	324.2	355.4
135°	0.0	94.1	217.9	309.1	337.8
137.5°	0.0	87.1	201.4	292.9	320.1
140°	0.0	79.0	185.2	273.8	302.5
142.5°	0.0	69.5	169.1	253.2	283.4
145°	0.0	61.4	152.5	231.5	264.3
147.5°	1.5	54.4	137.5	208.4	243.7
150°	1.5	48.9	122.8	185.2	220.5
152.5°	1.5	43.7	107.7	163.5	197.4
155°	1.5	38.2	94.1	141.5	175.7
157.5°	1.5	32.7	79.0	119.8	152.5
160°	1.5	28.7	65.4	100.7	130.8
162.5°	1.5	24.6	53.3	79.0	107.7
165°	1.5	20.6	42.3	58.4	83.1
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

(END OF REPORT)