

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: P284632

Luminaire Tested: **4SNLED-LD5-57HL-SLW-UNV-L930-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: P284632
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-L930-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: 4510.0 lumens
Efficiency: N/A
Efficacy: 94.0 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

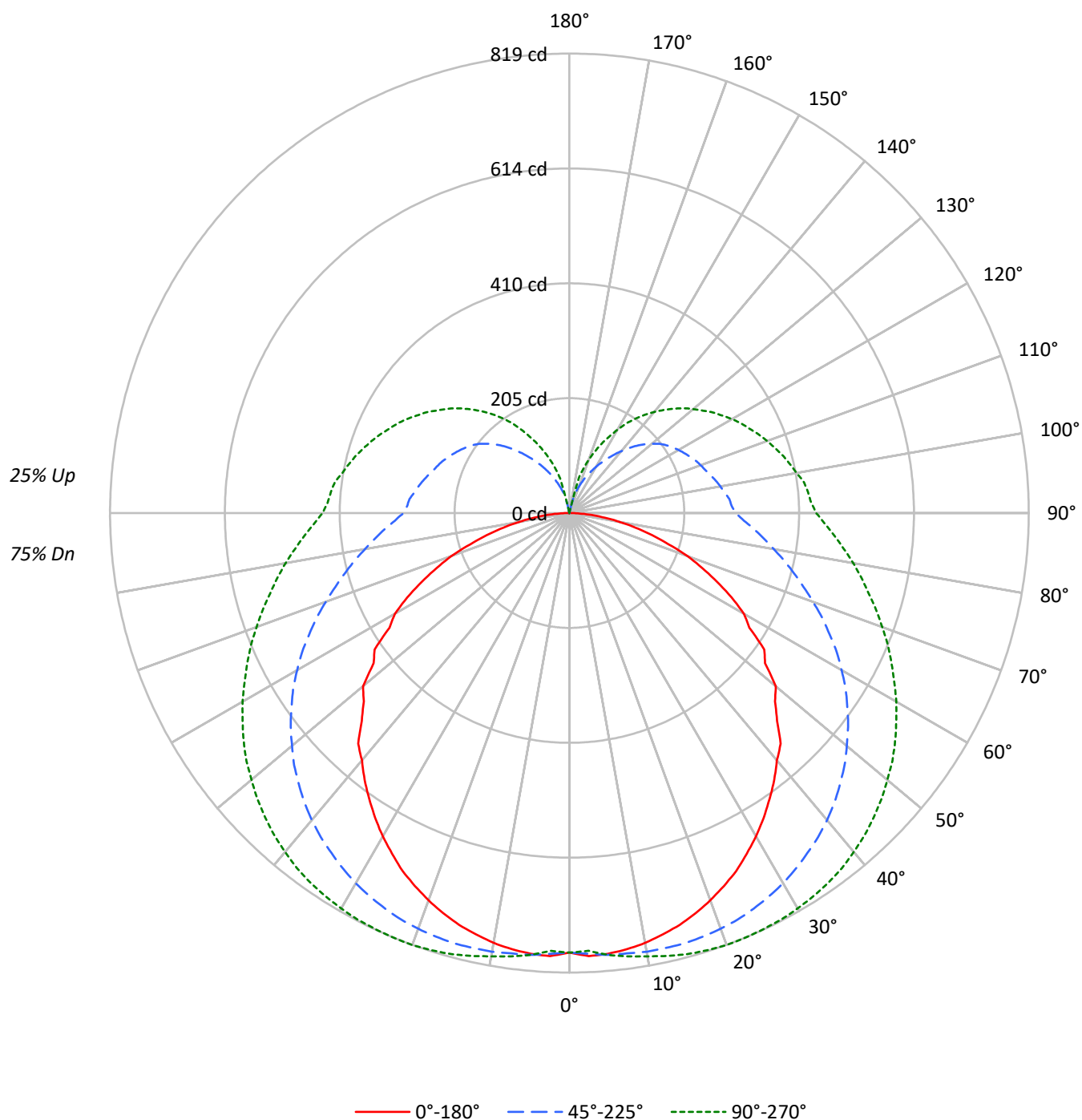
Input Watts (W): 48
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P284632

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L930-CD1-U

Luminous Intensity Polar Plot





TEST NUMBER: P284632

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L930-CD1-U

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20					20					20					20
RC	80				70					50					30					0
RW	70	50	30	10	70	50	30	10	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	75		
1	100	94	89	84	95	89	84	80	80	76	73	72	69	66	64	62	60	56		
2	90	80	72	66	85	76	69	63	68	63	58	61	57	53	55	51	48	44		
3	81	69	60	53	76	66	58	51	59	53	47	53	48	43	47	43	39	36		
4	74	61	51	44	69	58	49	43	52	45	39	47	41	36	42	37	33	30		
5	67	54	44	37	63	51	43	36	46	39	33	42	35	31	37	32	28	25		
6	62	48	39	32	58	46	37	31	41	34	29	37	31	27	34	28	24	22		
7	57	43	34	28	54	41	33	27	37	30	25	34	28	23	30	25	21	19		
8	53	39	31	25	50	37	29	24	34	27	22	31	25	21	28	23	19	17		
9	49	36	27	22	47	34	26	21	31	24	20	28	23	18	26	21	17	15		
10	46	33	25	20	44	31	24	19	29	22	18	26	21	16	24	19	15	13		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	6330	6330	6330
5°	6378	6255	6209
10°	6348	6200	6174
15°	6305	6167	6187
20°	6245	6138	6199
25°	6185	6116	6209
30°	6100	6097	6242
35°	6005	6075	6285
40°	5915	6071	6325
45°	5803	6057	6376
50°	5820	6044	6426
55°	5716	6043	6502
60°	5507	6047	6590
65°	5202	6055	6713
70°	4865	6100	6902
75°	4270	6241	7181
80°	3605	6542	7643
85°	2678	7151	8319



TEST NUMBER: P284632

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L930-CD1-U

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	75.3	1.7
10°-20°	223.1	4.9
20°-30°	354.6	7.9
30°-40°	455.1	10.1
40°-50°	513.9	11.4
50°-60°	524.4	11.6
60°-70°	485.8	10.8
70°-80°	411.3	9.1
80°-90°	328.3	7.3
90°-100°	278.8	6.2
100°-110°	248.4	5.5
110°-120°	211.6	4.7
120°-130°	168.0	3.7
130°-140°	119.2	2.6
140°-150°	71.2	1.6
150°-160°	33.2	0.7
160°-170°	7.9	0.2
170°-180°	0.0	0.0
0°-30°	653.0	14.5
0°-40°	1108.1	24.6
0°-60°	2146.4	47.6
0°-90°	3371.8	74.8
90°-120°	738.7	16.4
90°-150°	1097.1	24.3
90°-180°	1138.0	25.2
0°-180°	4510.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	783	783	783	783	783	
5°	788	782	790	790	790	75
15°	760	766	794	808	814	214
25°	704	727	778	805	818	324
35°	622	668	740	785	804	389
45°	524	595	682	742	767	407
55°	424	495	605	679	709	372
65°	290	387	512	600	634	288
75°	153	270	414	516	552	162
85°	39	174	331	438	475	43
90°	2	142	296	403	440	3
95°	0	134	286	391	427	0
105°	0	123	261	359	394	0
115°	0	114	237	323	355	0
125°	0	99	211	285	313	0
135°	0	73	170	240	263	0
145°	0	48	119	180	206	0
155°	1	30	73	110	137	1
165°	1	16	33	46	65	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P284632

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	783.3	783.3	783.3	783.3	783.3
2.5°	790.5	782.2	786.4	785.3	781.0
5°	788.4	782.2	790.5	790.5	790.5
7.5°	784.2	779.9	791.6	795.9	797.0
10°	777.9	777.9	793.9	800.2	802.2
12.5°	769.3	772.4	793.9	803.3	808.5
15°	759.9	766.1	793.9	808.5	813.9
17.5°	748.1	758.7	791.6	809.6	817.0
20°	734.4	750.4	788.4	809.6	819.3
22.5°	719.5	739.8	784.2	807.6	819.3
25°	703.8	727.0	777.9	805.3	818.2
27.5°	684.6	714.4	770.4	802.2	817.0
30°	665.5	699.5	761.9	797.9	813.9
32.5°	644.3	683.5	751.3	791.6	809.6
35°	622.0	667.8	739.8	785.3	804.5
37.5°	599.7	648.6	728.1	776.7	797.9
40°	575.4	629.4	714.4	766.1	788.4
42.5°	557.4	609.4	699.5	755.6	779.0
45°	523.6	594.6	682.4	741.8	767.3
47.5°	497.0	566.0	665.5	728.1	754.4
50°	480.2	542.5	645.5	712.1	739.8
52.5°	439.8	526.8	626.3	696.4	725.8
55°	423.8	495.0	605.1	679.2	708.9
57.5°	380.4	472.7	584.0	660.3	690.9
60°	359.2	441.8	560.5	641.2	672.9
62.5°	326.3	415.5	537.4	620.0	652.9
65°	290.3	386.9	511.9	599.7	633.7
67.5°	256.5	358.3	487.6	578.5	614.6
70°	223.6	328.6	462.1	557.4	593.4
72.5°	185.3	298.9	437.6	537.4	573.4
75°	152.7	270.3	414.4	516.2	552.2
77.5°	120.7	242.8	392.1	497.0	533.1
80°	91.2	216.2	369.8	477.0	513.9
82.5°	63.5	193.9	349.8	457.9	493.9
85°	39.2	173.9	330.6	437.6	474.7
87.5°	18.0	155.9	311.4	418.7	456.7
90°	2.0	142.1	295.7	402.7	439.8
92.5°	1.1	137.8	289.4	395.2	431.3
95°	0.0	133.6	286.3	390.9	427.0
97.5°	0.0	129.3	278.8	384.6	421.8
100°	0.0	127.3	273.4	375.2	411.2
102.5°	0.0	124.1	267.1	366.6	402.7
105°	0.0	123.0	260.8	359.2	394.4
107.5°	0.0	120.7	254.2	349.8	384.6
110°	0.0	118.7	249.1	341.2	375.2



TEST NUMBER: P284632

CATALOG NUMBER: 4SNLED-LD5-57HL-SLW-UNV-L930-CD1-U

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0.0	116.7	243.7	332.9	365.5
115°	0.0	114.4	237.4	323.2	354.9
117.5°	0.0	111.2	231.1	313.7	345.5
120°	0.0	107.0	224.8	305.1	334.9
122.5°	0.0	102.7	218.2	294.6	323.2
125°	0.0	98.7	210.8	285.1	312.6
127.5°	0.0	92.1	202.5	274.5	300.0
130°	0.0	85.8	191.9	264.0	288.3
132.5°	1.1	79.5	181.3	252.2	276.5
135°	0.0	73.2	169.6	240.5	262.8
137.5°	0.0	67.8	156.7	227.9	249.1
140°	0.0	61.5	144.1	213.1	235.4
142.5°	0.0	54.1	131.6	197.0	220.5
145°	0.0	47.8	118.7	180.2	205.6
147.5°	1.1	42.3	107.0	162.2	189.6
150°	1.1	38.0	95.5	144.1	171.6
152.5°	1.1	34.0	83.8	127.3	153.6
155°	1.1	29.7	73.2	110.1	136.7
157.5°	1.1	25.5	61.5	93.2	118.7
160°	1.1	22.3	50.9	78.4	101.8
162.5°	1.1	19.2	41.5	61.5	83.8
165°	1.1	16.0	32.9	45.5	64.6
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)