

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: P489248

Luminaire Tested: **CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90**

Issue Date: 3/11/2021

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: P489248  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P387254)  
Test Lab: INNOVATION CENTER  
Issue Date: 3/11/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: FAIL-SAFE  
Catalog Number: CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90  
Description: 2X2 CLM LED LUMINAIRE WITH P12125 LENS  
Light Source: -  
Ballast/Driver: -

Luminaire Equipment: Sample No.    Condition    Description

**Summary**

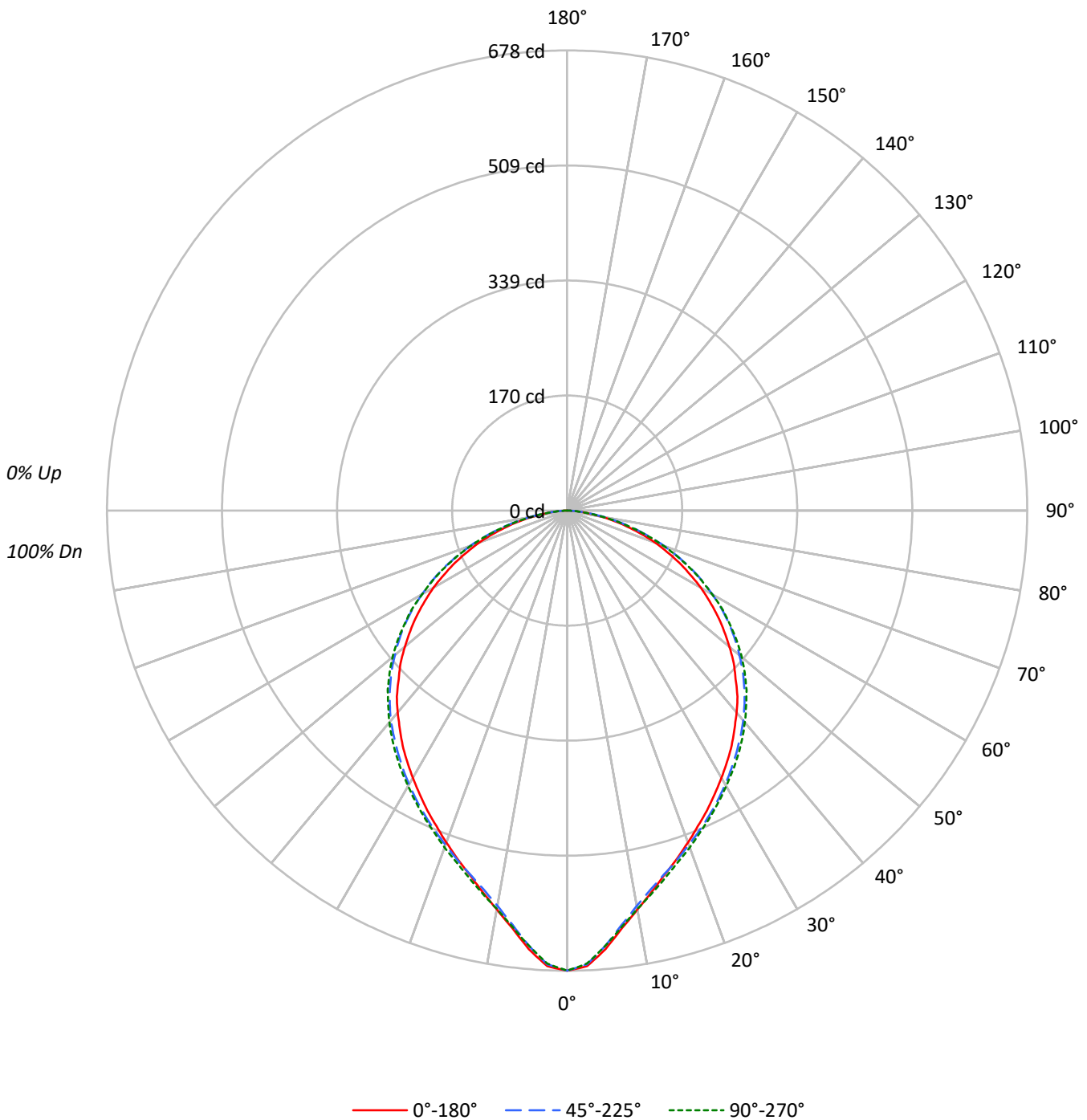
Lumens per Lamp: N/A  
Luminaire Lumens: 1574.7 lumens  
Efficiency: N/A  
Efficacy: 94.9 lumens/watt  
Spacing Criteria (0/90/45): 1.01 / 1.04 / 1.24  
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')  
CIE Type: Direct

Input Watts (W): 16.6  
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: P489248

CATALOG NUMBER: CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90

### Luminous Intensity Polar Plot





TEST NUMBER: P489248

CATALOG NUMBER: CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90

**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	50	30	10	50	30	10	0		
RCR																										
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100					100			
1	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84					84			
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	72	70					70			
3	90	80	72	65	88	78	71	65	75	69	64	73	67	62	70	65	61	59					59			
4	83	71	62	55	81	70	61	55	67	60	54	65	59	54	63	57	53	51					51			
5	76	63	54	48	74	62	54	48	60	53	47	58	52	46	56	51	46	44					44			
6	70	57	48	42	68	56	48	42	54	47	41	53	46	41	51	45	40	38					38			
7	65	52	43	37	64	51	43	37	49	42	37	48	41	36	47	41	36	34					34			
8	61	47	39	33	59	47	39	33	45	38	33	44	37	33	43	37	32	30					30			
9	57	43	35	30	55	43	35	30	42	35	30	41	34	29	40	34	29	27					27			
10	53	40	32	27	52	40	32	27	39	32	27	38	31	27	37	31	27	25					25			

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

	0°	45°	90°
0°	1824	1824	1824
5°	1752	1739	1739
10°	1630	1615	1628
15°	1547	1544	1559
20°	1490	1501	1513
25°	1447	1471	1480
30°	1413	1447	1456
35°	1388	1429	1443
40°	1364	1419	1431
45°	1336	1405	1422
50°	1306	1388	1406
55°	1270	1368	1373
60°	1224	1330	1327
65°	1161	1279	1270
70°	1083	1193	1179
75°	957	1056	1046
80°	776	862	818
85°	540	550	528



TEST NUMBER: P489248

CATALOG NUMBER: CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	59.9	3.8
10°-20°	156.9	10.0
20°-30°	228.2	14.5
30°-40°	271.5	17.2
40°-50°	281.9	17.9
50°-60°	255.4	16.2
60°-70°	192.7	12.2
70°-80°	105.0	6.7
80°-90°	23.1	1.5
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	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°	445.0	28.3
0°-40°	716.5	45.5
0°-60°	1253.9	79.6
0°-90°	1574.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1574.7	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	678	678	678	678	678	
5°	648	647	644	644	644	60
15°	555	554	554	558	560	157
25°	488	492	496	500	498	225
35°	423	428	435	442	439	264
45°	351	357	369	373	374	271
55°	271	277	292	294	293	242
65°	182	188	201	201	200	180
75°	92	96	102	102	101	98
85°	18	18	18	18	17	22
90°	0	0	0	0	0	



TEST NUMBER: P489248

CATALOG NUMBER: CLM-24-2-INS-P12125-LD4-1STD-50-120-EDD-90

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	677.9	677.9	677.9	677.9	677.9
2.5°	672.0	671.3	669.1	668.3	668.1
5°	648.5	646.9	643.9	643.5	643.9
7.5°	620.3	618.6	615.6	616.8	618.3
10°	596.6	592.4	591.2	592.9	595.8
12.5°	575.4	572.1	571.0	575.4	577.5
15°	555.3	553.9	554.3	558.0	559.7
17.5°	537.8	537.0	539.2	542.1	542.9
20°	520.4	522.1	524.1	527.2	528.2
22.5°	503.3	506.5	509.9	514.0	512.6
25°	487.5	491.6	495.5	499.6	498.4
27.5°	470.8	475.5	480.9	485.3	483.6
30°	454.7	460.6	465.8	471.3	468.7
32.5°	438.7	444.3	450.6	457.2	454.3
35°	422.6	427.7	435.0	441.6	439.4
37.5°	404.9	411.1	419.4	425.2	423.7
40°	388.3	394.0	404.0	407.7	407.4
42.5°	371.5	376.2	386.7	391.0	390.3
45°	351.0	357.3	369.3	373.4	373.7
47.5°	332.9	338.1	351.0	354.2	354.9
50°	312.0	318.6	331.5	335.4	335.9
52.5°	291.5	298.6	311.9	314.6	315.1
55°	270.7	277.1	291.5	293.6	292.7
57.5°	248.8	256.6	269.9	270.9	271.7
60°	227.5	234.3	247.1	248.5	246.6
62.5°	204.3	211.2	224.5	224.8	223.3
65°	182.3	187.5	200.9	200.6	199.5
67.5°	159.2	165.7	175.5	175.8	175.0
70°	137.7	142.1	151.6	151.8	149.8
72.5°	114.5	119.3	126.9	125.9	125.4
75°	92.0	95.7	101.6	102.3	100.6
77.5°	71.3	74.0	78.4	77.9	76.1
80°	50.1	52.3	55.6	54.9	52.8
82.5°	32.0	33.4	35.4	34.6	33.7
85°	17.5	17.6	17.8	17.6	17.1
87.5°	6.4	6.6	6.6	6.4	5.9
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)