

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: P35054

Luminaire Tested: **24EN-LD2-74HP-UNV-L835-CD1-U**

Test Date: 09/11/16

Test Information

Test Method: LM-79-08
Report Number: P35054
Test Lab: INNOVATION CENTER-P3
Test Date: 09/11/16
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24EN-LD2-74HP-UNV-L835-CD1-U
Description: ENCOUNTER 2X4 LED TROFFER
Light Source: (392) EATON 3500K LEDS
EL232N098E835
Ballast/Driver: (1) PHILIPS ELECTRONIC DRIVER w/ 5.01K RES
XI054C150V054DNT1

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7474.9 lumens
Efficiency: N/A
Efficacy: 132.8 lumens/watt
Spacing Criteria (0/90/45): 1.39 / 1.4 / 1.42
Luminous Opening: Rectangular (W 1.83' x L: 3.83' x H: 0')
CIE Type: Direct

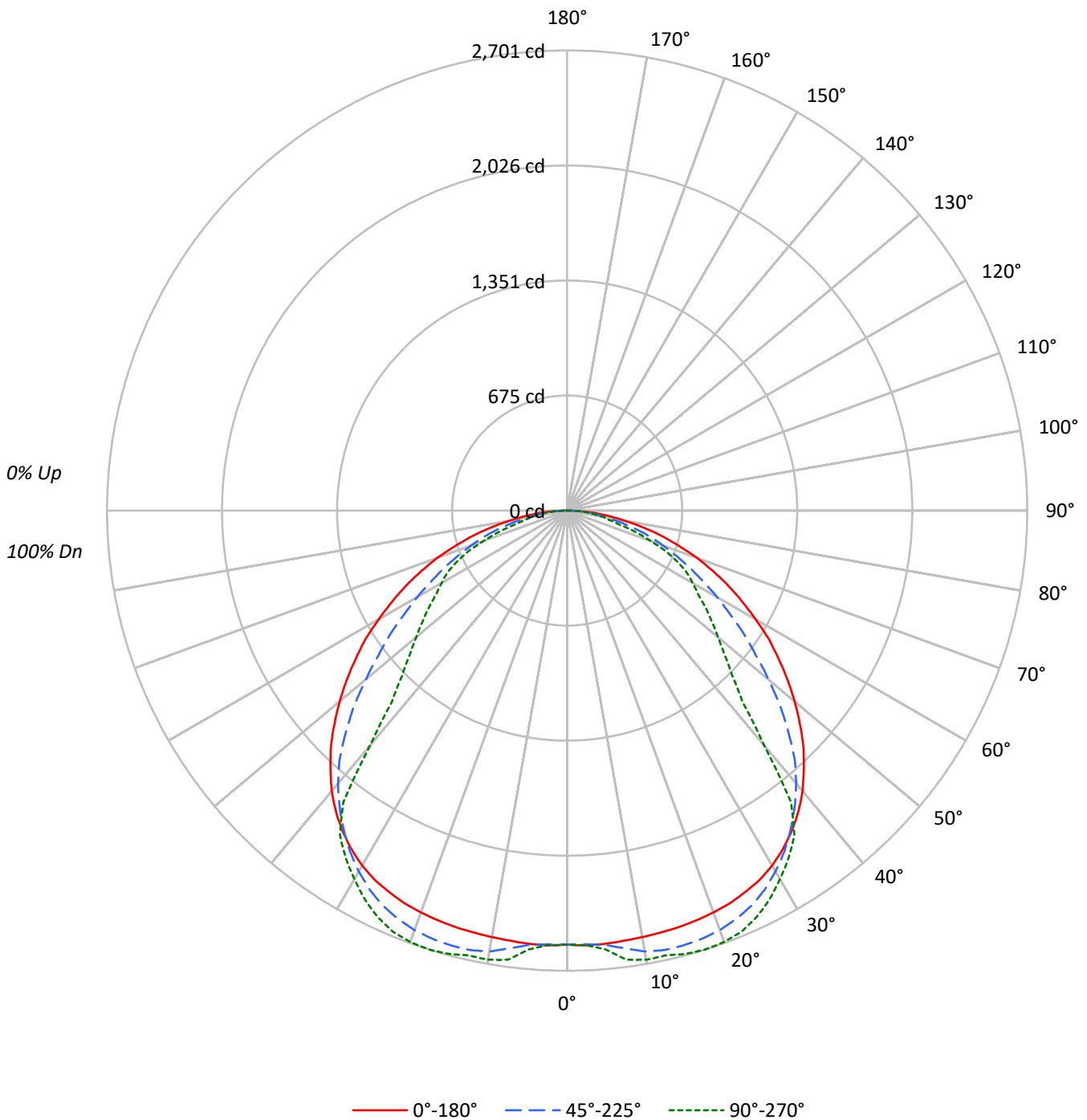
Input Watts (W): 56.3
Input Voltage (V): 120.0
Input Current (Ain): 0.473
Voltage Rise (V): NR
Power Factor: 0.9982
Total Harmonic Distortion (THDi): 11.7%
Frequency (hertz): 60
Stabilization Time: 0.5 HR
Operation Time: 5 HR
Ambient Temperature (°C): 24.2
Test Distance: 25 FT



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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	0
RW	70	50	30	10	70	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
1	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84
2	99	91	85	79	97	90	83	78	86	81	76	83	78	75	80	76	73	71
3	91	81	73	66	88	79	72	66	76	70	64	73	68	63	71	66	62	60
4	83	72	63	56	81	70	62	56	68	61	55	65	59	54	63	58	54	52
5	77	64	55	49	75	63	55	48	61	54	48	59	52	47	57	51	47	45
6	71	58	49	43	69	57	49	42	55	48	42	53	47	42	52	46	41	39
7	66	52	44	38	64	52	43	38	50	43	37	49	42	37	47	41	37	35
8	61	48	40	34	60	47	39	34	46	39	33	45	38	33	44	37	33	31
9	57	44	36	30	56	43	36	30	42	35	30	41	35	30	40	34	30	28
10	54	41	33	28	52	40	33	27	39	32	27	38	32	27	37	31	27	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	3903	3903	3903
5°	3925	3934	3974
10°	3953	4087	4163
15°	4013	4189	4272
20°	4091	4270	4391
25°	4176	4325	4448
30°	4255	4326	4418
35°	4297	4276	4347
40°	4299	4183	3595
45°	4248	3975	2970
50°	4153	3677	2754
55°	4043	3391	2644
60°	3912	3112	2607
65°	3784	2870	2602
70°	3623	2673	2347
75°	3385	2456	1894
80°	3008	2002	1870
85°	2847	2003	1880



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	246.7	3.3
10°-20°	742.4	9.9
20°-30°	1176.1	15.7
30°-40°	1426.0	19.1
40°-50°	1347.8	18.0
50°-60°	1118.9	15.0
60°-70°	823.9	11.0
70°-80°	456.6	6.1
80°-90°	136.4	1.8
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°	2165.3	29.0
0°-40°	3591.2	48.0
0°-60°	6058.0	81.0
0°-90°	7474.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7474.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2548	2548	2548	2548	2548	
5°	2553	2549	2559	2569	2585	243
15°	2531	2570	2642	2669	2694	716
25°	2471	2504	2559	2607	2632	1141
35°	2298	2272	2287	2322	2325	1436
45°	1961	1888	1835	1574	1371	1509
55°	1514	1428	1270	1043	990	1354
65°	1044	951	792	709	718	1032
75°	572	497	415	344	320	604
85°	162	131	114	106	107	176
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	2548	2548	2548	2548	2548
2.5°	2555	2548	2548	2545	2553
5°	2553	2549	2559	2569	2585
7.5°	2547	2553	2591	2636	2659
10°	2542	2561	2628	2665	2677
12.5°	2537	2568	2642	2660	2674
15°	2531	2570	2642	2669	2694
17.5°	2522	2566	2635	2673	2701
20°	2510	2555	2620	2665	2694
22.5°	2495	2535	2594	2645	2675
25°	2471	2504	2559	2607	2632
27.5°	2445	2463	2509	2553	2573
30°	2406	2411	2446	2484	2498
32.5°	2357	2346	2372	2408	2419
35°	2298	2272	2287	2322	2325
37.5°	2229	2190	2194	2191	2158
40°	2150	2097	2092	1979	1798
42.5°	2056	1992	1976	1763	1524
45°	1961	1888	1835	1574	1371
47.5°	1853	1784	1696	1412	1253
50°	1743	1666	1543	1272	1156
52.5°	1630	1550	1397	1157	1070
55°	1514	1428	1270	1043	990
57.5°	1402	1310	1135	944	910
60°	1277	1191	1016	862	851
62.5°	1159	1069	901	788	794
65°	1044	951	792	709	718
67.5°	924	830	694	626	631
70°	809	719	597	536	524
72.5°	687	602	513	439	425
75°	572	497	415	344	320
77.5°	458	405	323	257	249
80°	341	324	227	209	212
82.5°	246	227	173	159	160
85°	162	131	114	106	107
87.5°	69	63	57	56	59
90°	0	0	0	0	0

(END OF REPORT)