

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: P276839

Luminaire Tested: **24CZ2-60HE-RDP-UNV-L93050-W2A1-U-4000K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P276839
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1808-918-19)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ2-60HE-RDP-UNV-L93050-W2A1-U-4000K
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER WITH RDP LENS
Light Source: (336) 90 CRI LEDS TUNED TO 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3523.1 lumens
Efficiency: N/A
Efficacy: 77.6 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.3 / 1.41
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

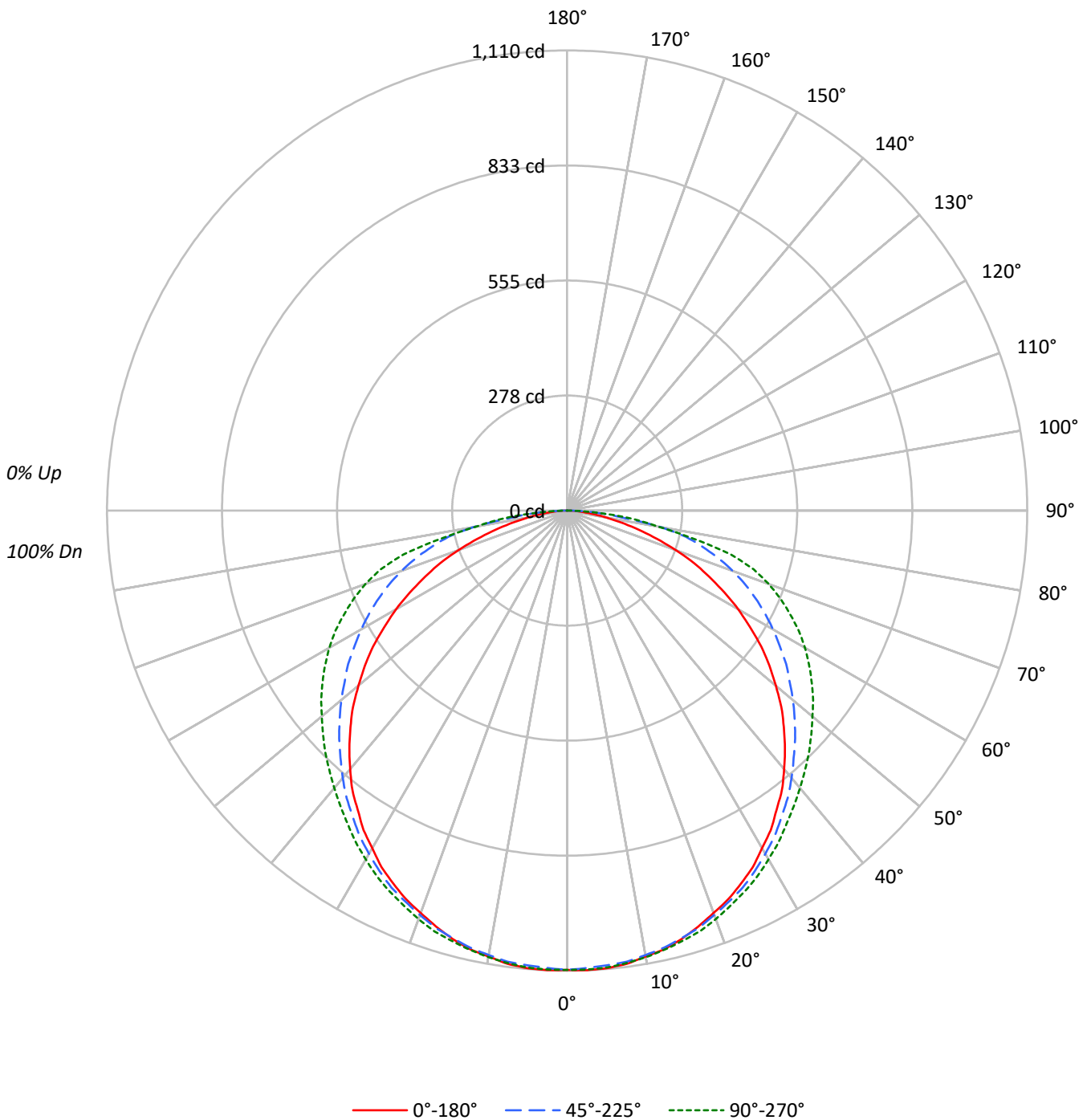
Input Watts (W): 45.418968
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	108	103	98	94	105	100	96	92	96	93	89	92	89	87	88	86	84	82
2	97	89	81	75	95	87	80	74	83	77	72	80	75	71	77	73	69	67
3	88	77	68	62	86	76	67	61	72	66	60	70	64	59	67	62	58	56
4	81	68	59	52	78	67	58	51	64	57	51	62	55	50	59	54	49	47
5	74	60	51	44	72	59	51	44	57	49	43	55	48	43	53	47	42	40
6	68	54	45	38	66	53	45	38	51	44	38	50	43	37	48	42	37	35
7	63	49	40	34	61	48	40	34	47	39	33	45	38	33	44	38	33	31
8	59	45	36	30	57	44	36	30	43	35	30	41	34	29	40	34	29	27
9	55	41	33	27	53	40	32	27	39	32	27	38	31	26	37	31	26	24
10	51	38	30	24	50	37	29	24	36	29	24	35	29	24	34	28	24	22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1491	1491	1491
5°	1496	1487	1494
10°	1492	1487	1495
15°	1490	1487	1497
20°	1479	1486	1501
25°	1474	1489	1505
30°	1461	1485	1510
35°	1447	1481	1516
40°	1430	1479	1535
45°	1407	1480	1569
50°	1375	1489	1617
55°	1340	1513	1689
60°	1284	1542	1782
65°	1202	1597	1892
70°	1093	1670	2035
75°	926	1762	2126
80°	731	1774	1719
85°	540	1349	1511



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	105.1	3.0
10°-20°	302.5	8.6
20°-30°	462.5	13.1
30°-40°	565.4	16.0
40°-50°	602.6	17.1
50°-60°	576.2	16.4
60°-70°	488.1	13.9
70°-80°	328.1	9.3
80°-90°	92.5	2.6
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°	870.1	24.7
0°-40°	1435.5	40.7
0°-60°	2614.4	74.2
0°-90°	3523.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3523.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1108	1108	1108	1108	1108	
5°	1108	1106	1101	1106	1106	105
15°	1070	1070	1068	1076	1075	302
25°	993	996	1003	1012	1014	457
35°	881	888	902	919	923	552
45°	739	751	778	811	825	570
55°	571	592	645	696	720	509
65°	378	416	502	568	594	375
75°	178	243	339	397	409	191
85°	35	72	87	94	98	43
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1107.9	1107.9	1107.9	1107.9	1107.9
2.5°	1109.7	1109.7	1104.4	1107.9	1107.9
5°	1107.9	1106.2	1100.9	1106.2	1106.2
7.5°	1102.7	1100.9	1097.4	1102.7	1100.9
10°	1092.2	1092.2	1088.7	1093.9	1093.9
12.5°	1083.5	1081.7	1080.0	1087.0	1085.2
15°	1069.5	1069.5	1067.7	1076.5	1074.7
17.5°	1052.0	1053.7	1055.5	1062.5	1064.2
20°	1032.8	1036.3	1038.0	1048.5	1048.5
22.5°	1015.3	1017.1	1020.5	1031.0	1031.0
25°	992.6	996.1	1003.1	1011.8	1013.6
27.5°	969.9	971.6	980.4	992.6	994.3
30°	940.2	945.4	955.9	969.9	971.6
32.5°	913.9	919.2	931.4	945.4	948.9
35°	880.7	887.7	901.7	919.2	922.7
37.5°	851.0	856.3	873.8	893.0	898.2
40°	814.3	824.8	842.3	865.0	873.8
42.5°	777.6	788.1	809.1	838.8	849.3
45°	739.2	751.4	777.6	810.8	824.8
47.5°	700.8	714.7	744.4	782.9	798.6
50°	657.1	674.5	711.2	754.9	772.4
52.5°	615.1	636.1	676.3	725.2	747.9
55°	571.4	592.4	644.8	695.5	720.0
57.5°	522.5	550.5	608.1	665.8	692.0
60°	477.1	503.3	573.2	636.1	662.3
62.5°	428.1	463.1	538.2	604.6	630.9
65°	377.5	415.9	501.5	567.9	594.2
67.5°	332.0	374.0	464.8	531.2	557.5
70°	277.9	330.3	424.6	491.1	517.3
72.5°	227.2	284.8	382.7	447.4	471.8
75°	178.2	242.9	339.0	396.7	408.9
77.5°	132.8	201.0	293.6	318.0	309.3
80°	94.4	160.8	228.9	216.7	221.9
82.5°	61.2	122.3	141.5	160.8	166.0
85°	35.0	71.6	87.4	94.4	97.9
87.5°	15.7	26.2	35.0	35.0	33.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)