

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: P260826

Luminaire Tested: **24CZ-LD5-45SE-UNV-L82765-W2A1-U-5700K**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P260826
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25697)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ-LD5-45SE-UNV-L82765-W2A1-U-5700K
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER
WITH RIBBED LENS
Light Source: (168) 80 CRI LEDS TUNED AT 5700K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 4725.0 lumens
Efficiency: N/A
Efficacy: 131.3 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.25 / 1.35
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

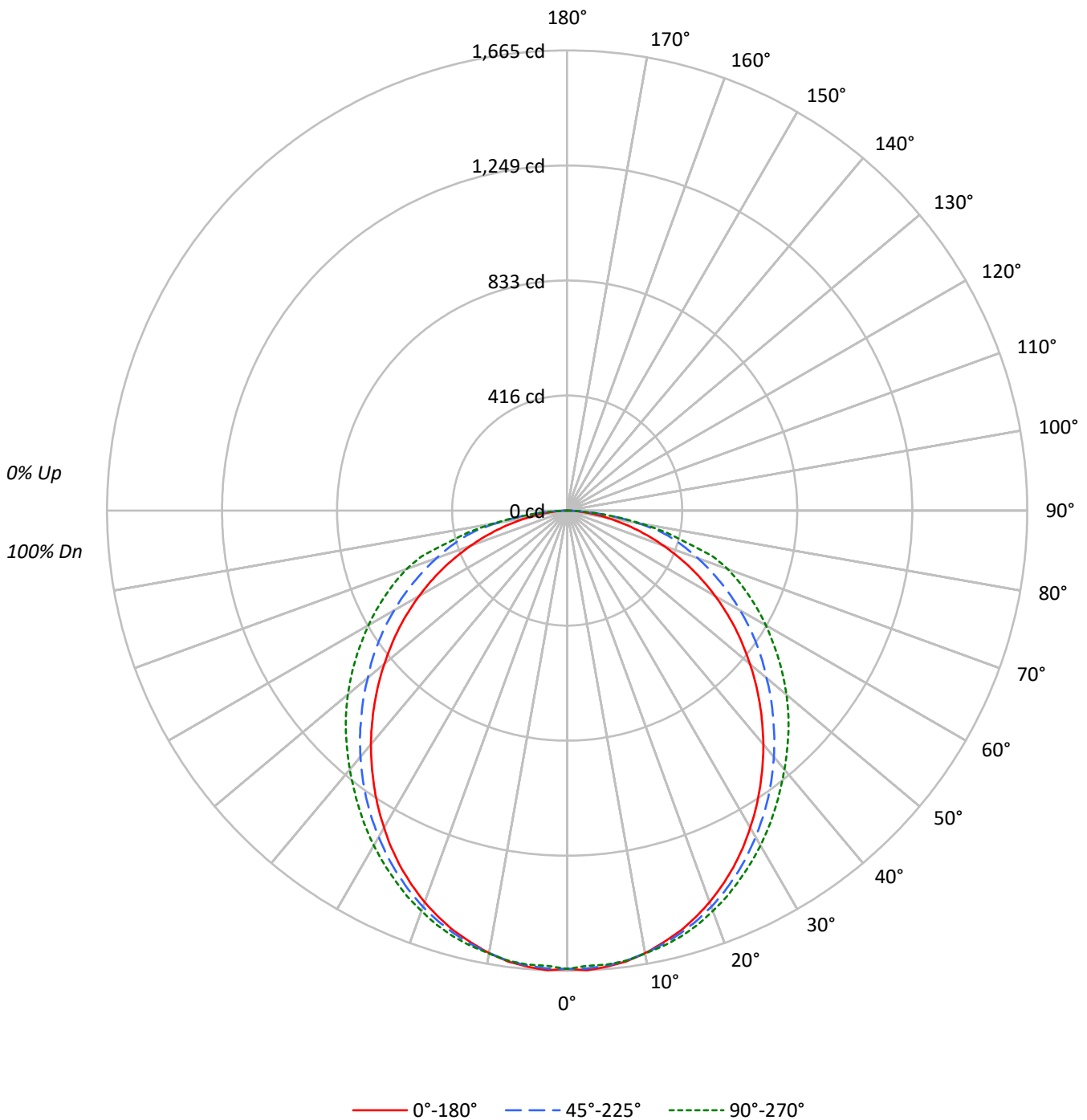
Input Watts (W): 35.991
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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	108	103	99	95	106	101	97	93	97	93	90	93	90	88	89	87	85	83					83			
2	98	90	83	77	95	88	81	76	84	79	74	81	76	72	78	74	71	68					68			
3	89	78	70	63	87	77	69	63	74	67	62	71	65	61	68	64	60	57					57			
4	82	69	60	54	79	68	60	53	66	58	52	63	57	52	61	56	51	49					49			
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42					42			
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37					37			
7	64	51	42	35	63	50	41	35	48	41	35	47	40	35	45	39	35	32					32			
8	60	46	38	32	58	45	37	32	44	37	31	43	36	31	42	36	31	29					29			
9	56	42	34	28	54	42	34	28	41	33	28	40	33	28	38	32	28	26					26			
10	52	39	31	26	51	39	31	26	38	31	26	37	30	25	36	30	25	24					24			

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	2231	2231	2231
5°	2237	2231	2227
10°	2221	2221	2224
15°	2195	2206	2222
20°	2159	2184	2207
25°	2114	2154	2190
30°	2059	2119	2174
35°	2001	2083	2158
40°	1941	2043	2148
45°	1875	2004	2155
50°	1808	1971	2167
55°	1742	1958	2190
60°	1663	1946	2233
65°	1576	1947	2308
70°	1458	1979	2431
75°	1304	2069	2313
80°	1090	1980	2118
85°	824	1524	1448



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	156.7	3.3
10°-20°	446.0	9.4
20°-30°	666.7	14.1
30°-40°	790.9	16.7
40°-50°	814.1	17.2
50°-60°	746.8	15.8
60°-70°	603.8	12.8
70°-80°	391.9	8.3
80°-90°	108.1	2.3
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°	1269.4	26.9
0°-40°	2060.3	43.6
0°-60°	3621.2	76.6
0°-90°	4725.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4725.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1658	1658	1658	1658	1658	
5°	1657	1645	1652	1650	1648	157
15°	1576	1569	1584	1590	1595	444
25°	1424	1425	1451	1464	1475	655
35°	1218	1228	1268	1296	1314	762
45°	985	1001	1053	1103	1132	760
55°	743	765	835	903	934	663
65°	495	524	612	692	725	489
75°	251	298	398	445	445	267
85°	53	91	99	95	94	65
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1658.2	1658.2	1658.2	1658.2	1658.2
2.5°	1664.7	1651.8	1658.2	1656.6	1648.5
5°	1656.6	1645.3	1651.8	1650.1	1648.5
7.5°	1645.3	1634.0	1642.1	1640.4	1642.1
10°	1625.9	1616.2	1625.9	1627.5	1627.5
12.5°	1601.6	1593.5	1606.5	1609.7	1612.9
15°	1575.7	1569.3	1583.8	1590.3	1595.1
17.5°	1543.4	1538.5	1556.3	1564.4	1570.9
20°	1507.8	1506.2	1525.6	1533.7	1541.7
22.5°	1467.3	1467.3	1490.0	1499.7	1511.0
25°	1423.7	1425.3	1451.2	1464.1	1475.4
27.5°	1376.7	1378.4	1409.1	1425.3	1438.2
30°	1325.0	1331.4	1363.8	1384.8	1399.4
32.5°	1273.2	1281.3	1316.9	1341.1	1357.3
35°	1218.2	1227.9	1268.3	1295.8	1313.6
37.5°	1161.6	1172.9	1216.6	1247.3	1268.3
40°	1104.9	1117.9	1163.2	1198.8	1223.0
42.5°	1045.1	1059.6	1109.8	1151.9	1177.7
45°	985.2	1001.4	1053.2	1103.3	1132.4
47.5°	925.4	944.8	999.8	1054.8	1085.5
50°	863.9	883.3	941.6	1004.6	1035.4
52.5°	802.4	825.1	889.8	954.5	985.2
55°	742.6	765.2	834.8	902.7	933.5
57.5°	681.1	703.7	779.8	851.0	881.7
60°	618.0	643.9	723.1	796.0	829.9
62.5°	556.5	584.0	668.1	745.8	778.2
65°	495.0	524.2	611.5	692.4	724.8
67.5°	431.9	465.9	556.5	639.0	673.0
70°	370.5	407.7	503.1	585.6	618.0
72.5°	310.6	351.1	449.7	533.9	553.3
75°	250.8	297.7	398.0	444.9	444.9
77.5°	194.1	245.9	339.7	357.5	367.2
80°	140.7	197.4	255.6	276.6	273.4
82.5°	93.8	150.5	182.8	182.8	178.0
85°	53.4	90.6	98.7	95.4	93.8
87.5°	22.6	34.0	30.7	24.3	21.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)