

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: P275949

Luminaire Tested: **24CZ2-35-UNV-L83050-W2A1-U-4000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P275949  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-5)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ2-35-UNV-L83050-W2A1-U-4000K  
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER WITH RIBBED LENS  
Light Source: (168) 80 CRI LEDS TUNED TO 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3533.0 lumens  
Efficiency: N/A  
Efficacy: 132.8 lumens/watt  
Spacing Criteria (0/90/45): 1.21 / 1.27 / 1.37  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

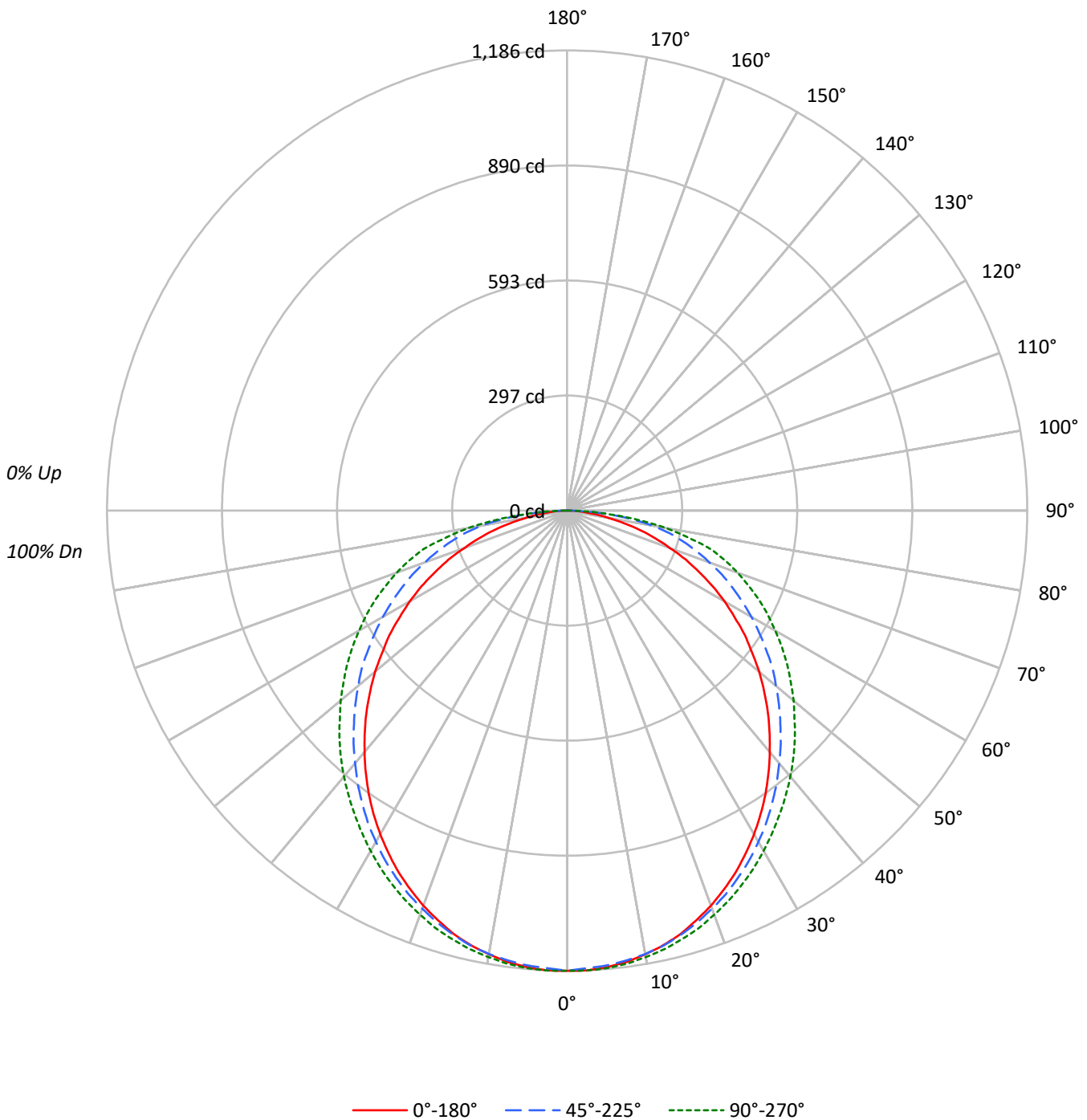
Input Watts (W): 26.598  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	89	86	84	82
2	98	89	82	76	95	87	80	75	83	78	73	80	75	71	77	73	70	67
3	89	78	69	62	86	76	68	62	73	66	61	70	64	60	68	63	58	56
4	81	69	59	52	79	67	59	52	65	57	51	62	56	51	60	55	50	48
5	74	61	52	45	72	60	51	45	58	50	44	56	49	44	54	48	43	41
6	69	55	46	39	67	54	45	39	52	44	39	50	44	38	49	43	38	36
7	64	50	41	35	62	49	40	34	47	40	34	46	39	34	45	38	34	32
8	59	45	37	31	58	45	36	31	43	36	30	42	35	30	41	35	30	28
9	55	42	33	28	54	41	33	28	40	33	27	39	32	27	38	32	27	25
10	52	38	30	25	51	38	30	25	37	30	25	36	29	25	35	29	25	23

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

	0°	45°	90°
0°	1596	1596	1596
5°	1596	1589	1599
10°	1587	1585	1596
15°	1573	1577	1593
20°	1552	1563	1587
25°	1526	1549	1581
30°	1497	1531	1574
35°	1464	1513	1569
40°	1427	1493	1572
45°	1391	1478	1580
50°	1353	1471	1594
55°	1311	1469	1624
60°	1260	1475	1666
65°	1194	1498	1738
70°	1109	1535	1837
75°	1012	1612	1992
80°	831	1736	1991
85°	638	1602	1711



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	112.2	3.2
10°-20°	320.3	9.1
20°-30°	482.0	13.6
30°-40°	577.6	16.3
40°-50°	601.9	17.0
50°-60°	560.0	15.9
60°-70°	461.2	13.1
70°-80°	314.1	8.9
80°-90°	103.7	2.9
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°	914.4	25.9
0°-40°	1492.0	42.2
0°-60°	2653.9	75.1
0°-90°	3533.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3533.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1186	1186	1186	1186	1186	
5°	1182	1182	1177	1183	1184	112
15°	1130	1131	1132	1143	1144	318
25°	1028	1033	1044	1061	1065	473
35°	891	902	921	946	955	557
45°	731	746	777	816	830	564
55°	559	578	626	676	692	498
65°	375	407	470	526	546	372
75°	195	238	310	366	383	205
85°	41	80	104	111	111	51
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1186.2	1186.2	1186.2	1186.2	1186.2
2.5°	1186.2	1186.2	1180.3	1186.2	1186.2
5°	1181.5	1181.5	1176.8	1182.7	1183.8
7.5°	1173.2	1174.4	1169.7	1176.8	1177.9
10°	1161.4	1162.6	1160.3	1167.3	1168.5
12.5°	1147.3	1148.5	1148.5	1156.7	1157.9
15°	1129.6	1130.8	1132.0	1142.6	1143.7
17.5°	1107.2	1110.7	1113.1	1126.1	1128.4
20°	1083.6	1087.1	1091.9	1106.0	1108.4
22.5°	1056.5	1061.2	1069.5	1084.8	1088.3
25°	1028.2	1032.9	1043.5	1061.2	1064.7
27.5°	996.4	1003.4	1016.4	1035.3	1040.0
30°	963.3	970.4	985.7	1005.8	1012.9
32.5°	928.0	937.4	955.1	977.5	984.6
35°	891.4	902.0	920.9	945.7	955.1
37.5°	852.5	864.3	886.7	913.8	925.6
40°	812.4	826.6	850.1	882.0	895.0
42.5°	772.3	785.3	814.8	849.0	863.1
45°	731.1	746.4	777.0	815.9	830.1
47.5°	688.6	703.9	740.5	781.8	794.7
50°	646.2	661.5	702.8	746.4	761.7
52.5°	600.2	620.2	667.4	711.0	726.3
55°	558.9	577.8	626.1	675.6	692.1
57.5°	511.7	534.1	587.2	639.1	656.8
60°	468.1	491.7	548.3	601.4	619.0
62.5°	423.3	449.2	509.4	563.6	583.7
65°	375.0	406.8	470.5	525.9	545.9
67.5°	331.3	364.3	431.6	488.2	505.8
70°	281.8	321.9	390.3	446.9	466.9
72.5°	239.4	279.5	351.4	406.8	426.8
75°	194.6	238.2	310.1	365.5	383.2
77.5°	149.7	198.1	270.0	312.5	318.4
80°	107.3	158.0	224.0	248.8	257.0
82.5°	75.5	121.4	165.1	181.6	186.3
85°	41.3	80.2	103.8	110.8	110.8
87.5°	17.7	34.2	41.3	42.4	43.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)