

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: P276195

Luminaire Tested: **24CZ2-40HE-UNV-L92765-W2A1-U-2700K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P276195  
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: 24CZ2-40HE-UNV-L92765-W2A1-U-2700K  
Description: CRUZE 2.0 2x4 TUNABLE WHITE LED TROFFER WITH RIBBED LENS  
Light Source: (336) 90 CRI LEDS TUNED TO 2700K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3019.6 lumens  
Efficiency: N/A  
Efficacy: 107.2 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

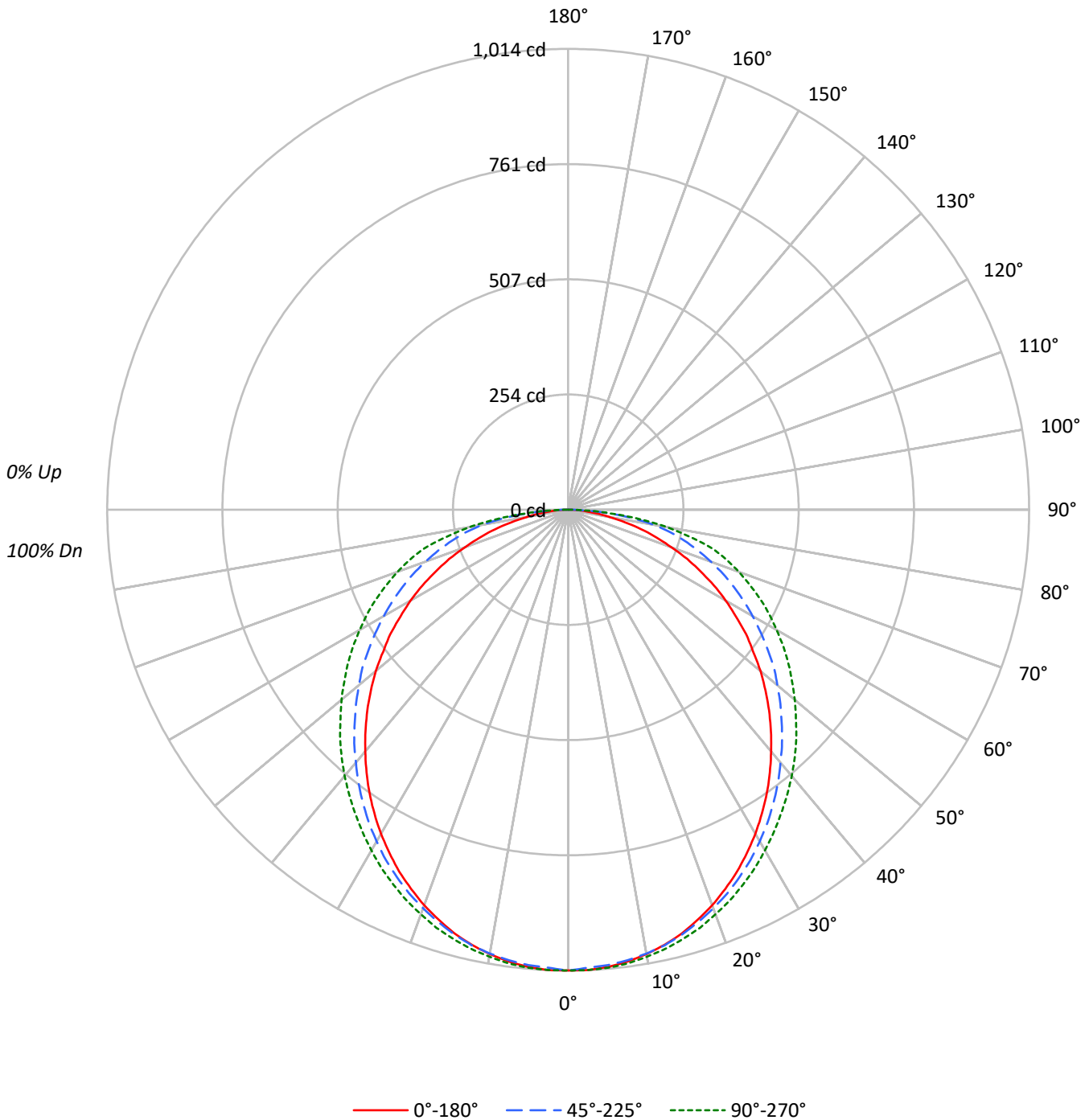
Input Watts (W): 28.179  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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°	1364	1364	1364
5°	1364	1358	1367
10°	1356	1355	1364
15°	1345	1348	1362
20°	1326	1336	1356
25°	1305	1324	1351
30°	1279	1309	1345
35°	1251	1293	1341
40°	1220	1276	1343
45°	1189	1264	1350
50°	1156	1257	1363
55°	1121	1255	1388
60°	1077	1261	1424
65°	1020	1280	1486
70°	948	1312	1570
75°	865	1378	1703
80°	711	1484	1702
85°	545	1369	1462



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	95.9	3.2
10°-20°	273.7	9.1
20°-30°	411.9	13.6
30°-40°	493.7	16.3
40°-50°	514.4	17.0
50°-60°	478.6	15.9
60°-70°	394.2	13.1
70°-80°	268.5	8.9
80°-90°	88.6	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°	781.6	25.9
0°-40°	1275.2	42.2
0°-60°	2268.3	75.1
0°-90°	3019.6	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3019.6	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1014	1014	1014	1014	1014	
5°	1010	1010	1006	1011	1012	96
15°	966	966	968	976	978	272
25°	879	883	892	907	910	405
35°	762	771	787	808	816	476
45°	625	638	664	697	710	482
55°	478	494	535	578	592	426
65°	320	348	402	450	467	318
75°	166	204	265	312	328	175
85°	35	68	89	95	95	44
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	1013.8	1013.8	1013.8	1013.8	1013.8
2.5°	1013.8	1013.8	1008.8	1013.8	1013.8
5°	1009.8	1009.8	1005.8	1010.8	1011.8
7.5°	1002.7	1003.8	999.7	1005.8	1006.8
10°	992.7	993.7	991.7	997.7	998.7
12.5°	980.6	981.6	981.6	988.6	989.6
15°	965.5	966.5	967.5	976.5	977.6
17.5°	946.3	949.3	951.3	962.4	964.4
20°	926.2	929.2	933.2	945.3	947.3
22.5°	903.0	907.0	914.1	927.2	930.2
25°	878.8	882.8	891.9	907.0	910.0
27.5°	851.6	857.6	868.7	884.8	888.9
30°	823.4	829.4	842.5	859.6	865.7
32.5°	793.1	801.2	816.3	835.5	841.5
35°	761.9	771.0	787.1	808.2	816.3
37.5°	728.6	738.7	757.9	781.0	791.1
40°	694.4	706.5	726.6	753.8	764.9
42.5°	660.1	671.2	696.4	725.6	737.7
45°	624.8	637.9	664.1	697.4	709.5
47.5°	588.5	601.6	632.9	668.2	679.2
50°	552.3	565.4	600.6	637.9	651.0
52.5°	513.0	530.1	570.4	607.7	620.8
55°	477.7	493.8	535.1	577.5	591.6
57.5°	437.4	456.5	501.9	546.2	561.3
60°	400.1	420.2	468.6	514.0	529.1
62.5°	361.8	384.0	435.4	481.7	498.9
65°	320.5	347.7	402.1	449.5	466.6
67.5°	283.2	311.4	368.8	417.2	432.3
70°	240.9	275.1	333.6	382.0	399.1
72.5°	204.6	238.8	300.3	347.7	364.8
75°	166.3	203.6	265.0	312.4	327.5
77.5°	128.0	169.3	230.8	267.1	272.1
80°	91.7	135.0	191.5	212.6	219.7
82.5°	64.5	103.8	141.1	155.2	159.2
85°	35.3	68.5	88.7	94.7	94.7
87.5°	15.1	29.2	35.3	36.3	37.3
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)