

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: P263255

Luminaire Tested: **24CZ-LD5-45-SQP-UNV-L82765-W2A1-U-5500K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P263255  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25695)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 24CZ-LD5-45-SQP-UNV-L82765-W2A1-U-5500K  
Description: CRUZE 2x4 TUNABLE WHITE LED TROFFER  
WITH SQP LENS  
Light Source: (336) 80 CRI LEDS TUNED AT 5500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3088.0 lumens  
Efficiency: N/A  
Efficacy: 95.7 lumens/watt  
Spacing Criteria (0/90/45): 1.27 / 1.31 / 1.42  
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')  
CIE Type: Direct

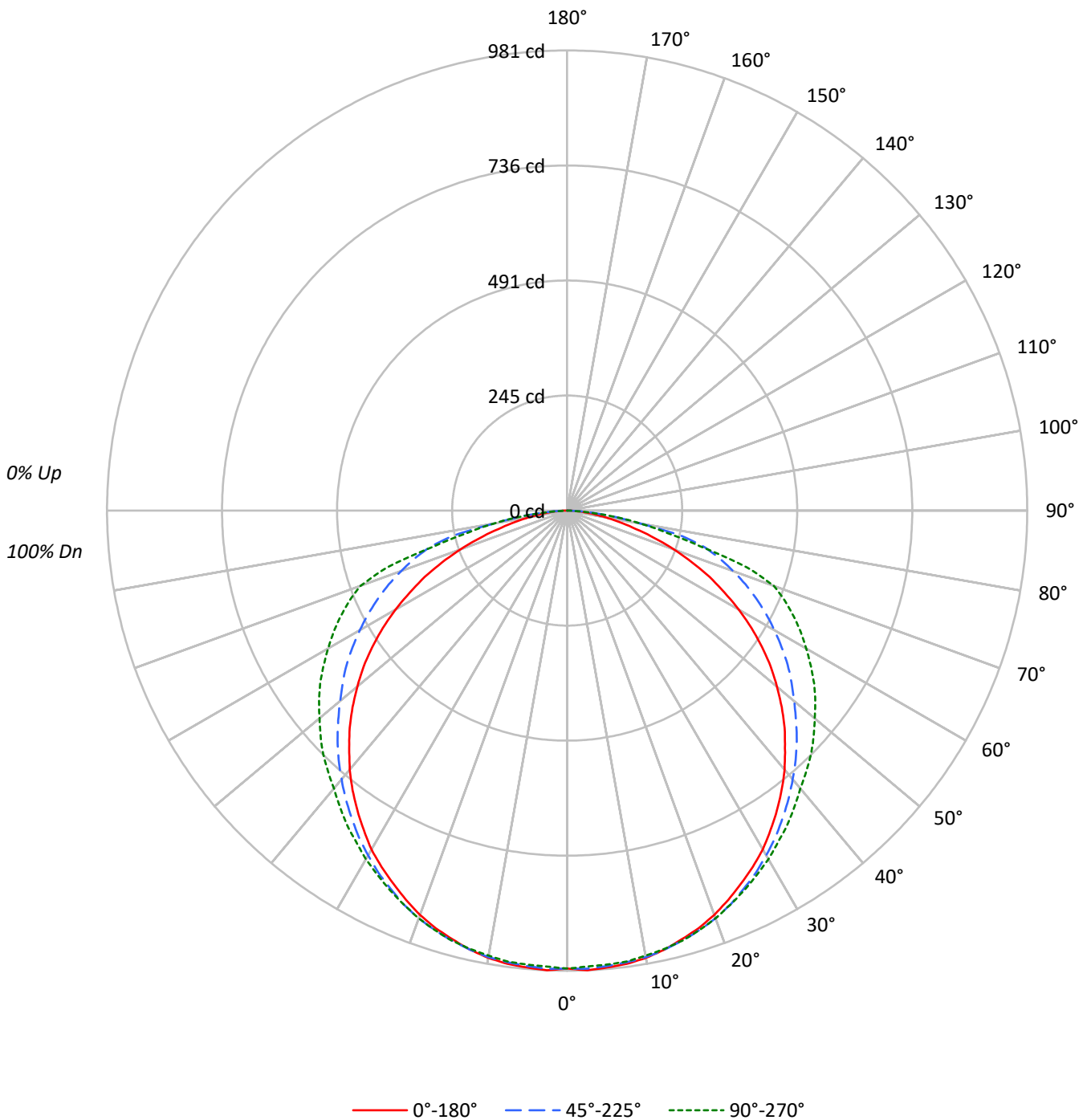
Input Watts (W): 32.271  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	98	94	105	101	97	93	96	93	90	92	90	87	89	87	84	82					82			
2	98	89	82	76	95	87	80	75	83	78	73	80	75	71	77	73	70	67					67			
3	89	78	69	62	86	76	68	62	73	66	60	70	64	59	67	63	58	56					56			
4	81	68	59	52	79	67	58	52	64	57	51	62	56	50	60	54	50	47					47			
5	74	61	51	45	72	60	51	44	57	50	44	55	49	43	54	48	43	41					41			
6	68	55	45	39	66	54	45	38	52	44	38	50	43	38	48	42	37	35					35			
7	63	49	40	34	62	49	40	34	47	39	34	45	39	33	44	38	33	31					31			
8	59	45	36	30	57	44	36	30	43	35	30	42	35	30	40	34	29	28					28			
9	55	41	33	27	54	41	33	27	39	32	27	38	32	27	37	31	27	25					25			
10	51	38	30	24	50	37	30	24	36	29	24	35	29	24	35	28	24	22					22			

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

	0°	45°	90°
0°	1313	1313	1313
5°	1321	1316	1312
10°	1323	1321	1316
15°	1318	1322	1322
20°	1313	1325	1325
25°	1302	1321	1326
30°	1296	1318	1333
35°	1281	1315	1344
40°	1266	1314	1359
45°	1247	1317	1399
50°	1222	1322	1442
55°	1190	1347	1508
60°	1137	1373	1584
65°	1067	1417	1696
70°	954	1481	1845
75°	788	1584	1526
80°	642	1223	1236
85°	517	812	763



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	92.7	3.0
10°-20°	267.5	8.7
20°-30°	408.9	13.2
30°-40°	500.1	16.2
40°-50°	535.1	17.3
50°-60°	512.4	16.6
60°-70°	433.4	14.0
70°-80°	274.7	8.9
80°-90°	63.2	2.0
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°	769.1	24.9
0°-40°	1269.2	41.1
0°-60°	2316.6	75.0
0°-90°	3088.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3088.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	976	976	976	976	976	
5°	978	973	975	973	971	93
15°	946	944	949	949	949	267
25°	877	877	890	893	893	405
35°	780	785	801	812	818	488
45°	656	667	692	721	735	505
55°	507	523	574	622	643	452
65°	335	367	445	506	533	330
75°	152	214	305	303	294	165
85°	34	51	53	48	49	40
90°	0	0	0	0	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	976.2	976.2	976.2	976.2	976.2
2.5°	981.0	976.2	977.8	976.2	973.0
5°	977.8	973.0	974.6	973.0	971.4
7.5°	974.6	969.8	971.4	969.8	969.8
10°	968.2	963.4	966.6	965.0	963.4
12.5°	958.6	955.4	958.6	957.0	957.0
15°	945.9	944.3	949.1	949.1	949.1
17.5°	933.1	931.5	937.9	937.9	937.9
20°	917.2	915.6	925.1	925.1	925.1
22.5°	898.0	896.4	909.2	909.2	909.2
25°	877.3	877.3	890.0	893.2	893.2
27.5°	856.5	856.5	870.9	875.7	875.7
30°	834.2	834.2	848.6	855.0	858.1
32.5°	807.1	810.3	826.2	834.2	837.4
35°	780.0	784.8	800.7	811.9	818.3
37.5°	751.3	756.1	775.2	788.0	795.9
40°	721.0	727.3	748.1	764.0	773.6
42.5°	687.5	697.0	721.0	741.7	754.5
45°	655.6	666.7	692.3	721.0	735.3
47.5°	620.5	633.2	661.9	698.6	713.0
50°	583.8	596.6	631.6	673.1	689.1
52.5°	547.1	561.5	602.9	647.6	666.7
55°	507.2	523.2	574.2	622.1	642.8
57.5°	465.8	484.9	542.3	593.4	615.7
60°	422.7	446.6	510.4	564.7	588.6
62.5°	378.0	406.7	478.5	535.9	561.5
65°	335.0	366.9	445.0	505.6	532.7
67.5°	288.7	328.6	411.5	476.9	502.4
70°	242.4	288.7	376.4	443.4	468.9
72.5°	196.2	252.0	341.3	402.0	402.0
75°	151.5	213.7	304.7	303.1	293.5
77.5°	114.8	178.6	250.4	213.7	215.3
80°	82.9	143.6	157.9	157.9	159.5
82.5°	55.8	110.1	102.1	100.5	103.7
85°	33.5	51.0	52.6	47.9	49.4
87.5°	16.0	17.5	14.4	9.6	9.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)