

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: P258907

Luminaire Tested: **14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P258907  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P35909)  
Test Lab: INNOVATION CENTER-P3  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K  
Description: CRUZE 1x4 TUNABLE WHITE LED TROFFER  
WITH RDP LENS  
Light Source: (168) 90 CRI LEDS TUNED AT 3000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 1283.0 lumens  
Efficiency: N/A  
Efficacy: 68.6 lumens/watt  
Spacing Criteria (0/90/45): 1.27 / 1.28 / 1.4  
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')  
CIE Type: Direct

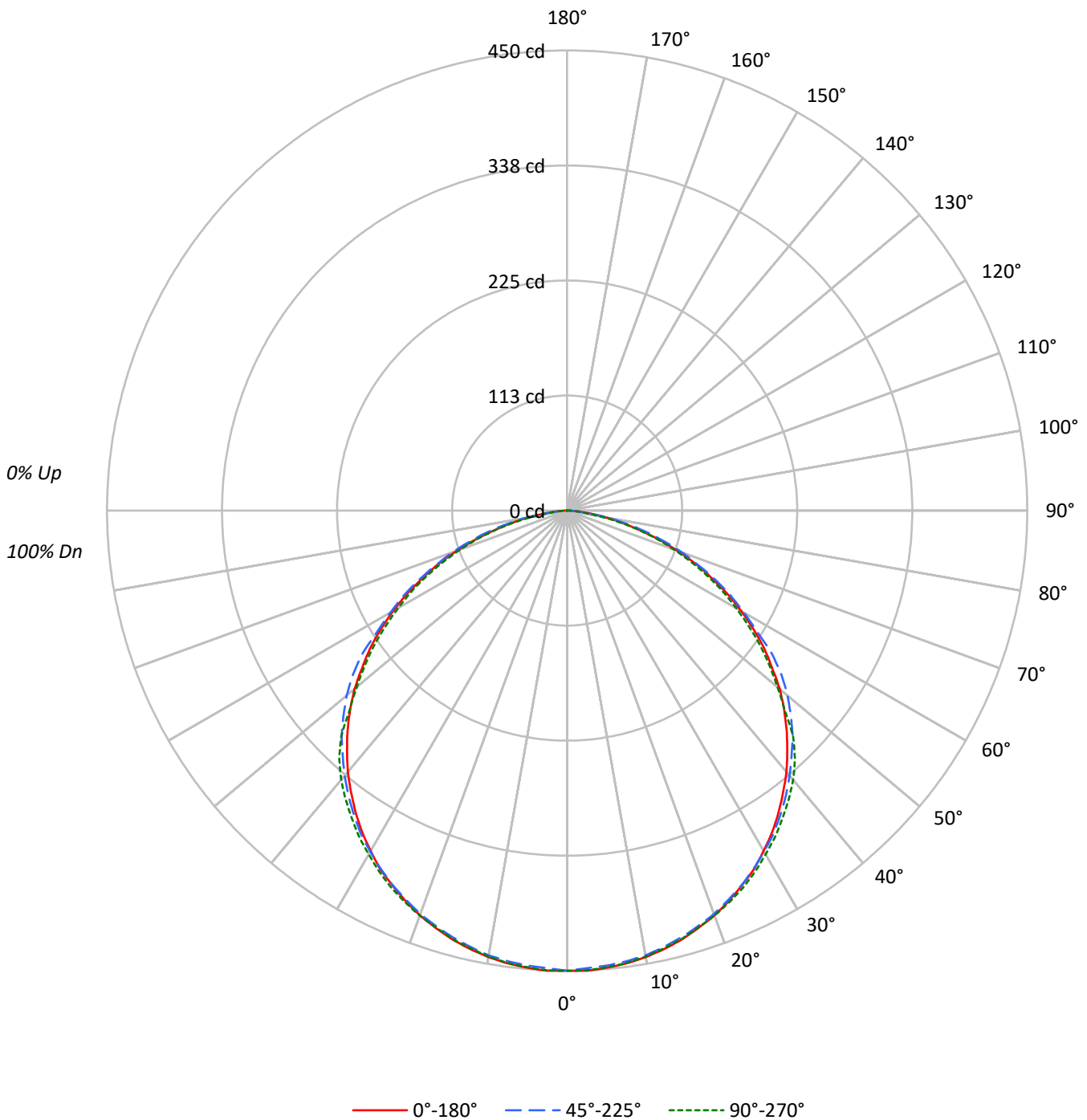
Input Watts (W): 18.693  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P258907

CATALOG NUMBER: 14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K

### Luminous Intensity Polar Plot





TEST NUMBER: P258907

CATALOG NUMBER: 14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K

**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	109	104	100	96	106	102	98	95	98	95	92	94	91	89	90	88	86	84					84			
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	73	70					70			
3	90	80	72	65	88	78	71	65	75	69	64	73	67	63	70	65	61	59					59			
4	83	71	62	55	80	69	61	55	67	60	54	65	58	53	62	57	53	51					51			
5	76	63	54	48	74	62	54	47	60	53	47	58	51	46	56	50	46	44					44			
6	70	57	48	42	68	56	47	41	54	47	41	52	46	41	51	45	40	38					38			
7	65	52	43	37	63	51	42	36	49	42	36	48	41	36	46	40	36	34					34			
8	61	47	38	33	59	46	38	33	45	38	32	44	37	32	43	36	32	30					30			
9	57	43	35	29	55	43	35	29	41	34	29	40	34	29	39	33	29	27					27			
10	53	40	32	27	52	39	32	26	38	31	26	37	31	26	36	30	26	24					24			

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

	0°	45°	90°
0°	1211	1211	1211
5°	1212	1206	1211
10°	1211	1207	1210
15°	1209	1204	1208
20°	1206	1202	1207
25°	1201	1200	1208
30°	1194	1197	1206
35°	1184	1194	1206
40°	1172	1188	1207
45°	1155	1187	1189
50°	1136	1178	1124
55°	1104	1148	1083
60°	1058	1074	1026
65°	991	1017	964
70°	902	938	872
75°	752	821	739
80°	597	629	511
85°	386	337	296



TEST NUMBER: P258907

CATALOG NUMBER: 14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	42.6	3.3
10°-20°	122.3	9.5
20°-30°	186.8	14.6
30°-40°	227.7	17.7
40°-50°	238.4	18.6
50°-60°	212.1	16.5
60°-70°	156.5	12.2
70°-80°	80.9	6.3
80°-90°	15.7	1.2
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°	351.7	27.4
0°-40°	579.4	45.2
0°-60°	1029.9	80.3
0°-90°	1283.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1283.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	450	450	450	450	450	
5°	449	448	447	448	448	43
15°	434	434	432	434	434	123
25°	404	404	404	407	407	186
35°	360	361	363	368	367	225
45°	304	306	312	315	312	234
55°	235	240	245	234	231	210
65°	156	166	160	154	151	154
75°	72	80	79	73	71	78
85°	12	14	11	10	10	16
90°	0	0	0	0	0	



TEST NUMBER: P258907

CATALOG NUMBER: 14CZ-LD5-25-RDP-UNV-L93050-W2A1-U-3000K

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	450.0	450.0	450.0	450.0	450.0
2.5°	450.4	450.0	447.9	450.0	450.0
5°	448.7	448.3	446.6	448.3	448.3
7.5°	446.6	446.2	444.5	446.2	446.2
10°	443.3	442.8	441.6	443.3	442.8
12.5°	439.1	439.1	437.0	439.1	438.2
15°	434.1	433.6	432.0	433.6	433.6
17.5°	427.8	427.4	426.1	428.2	427.4
20°	421.1	420.7	419.8	421.9	421.5
22.5°	413.2	413.2	411.9	414.4	414.4
25°	404.4	404.4	404.0	406.9	406.9
27.5°	395.6	394.8	394.8	397.7	398.1
30°	384.3	384.3	385.1	388.5	388.1
32.5°	373.0	373.4	375.1	378.0	378.4
35°	360.5	360.9	363.4	367.6	367.2
37.5°	347.1	348.3	351.3	355.9	355.9
40°	333.7	334.5	338.3	343.3	343.7
42.5°	318.6	320.7	324.9	330.8	329.9
45°	303.6	305.7	312.0	314.9	312.4
47.5°	287.7	290.2	296.5	296.9	288.5
50°	271.4	274.3	281.4	273.1	268.5
52.5°	252.6	258.0	264.3	252.6	249.6
55°	235.4	240.4	244.6	234.2	230.8
57.5°	216.2	222.9	220.0	214.9	210.8
60°	196.5	203.6	199.5	194.4	190.7
62.5°	176.5	184.4	180.2	175.2	171.9
65°	155.6	166.4	159.7	154.3	151.4
67.5°	135.9	146.4	138.4	134.2	131.3
70°	114.6	123.4	119.2	113.7	110.8
72.5°	93.7	100.4	99.1	93.3	91.2
75°	72.3	79.9	79.0	72.8	71.1
77.5°	54.4	61.5	59.0	53.9	51.9
80°	38.5	43.1	40.6	34.7	33.0
82.5°	23.4	27.2	23.0	19.7	18.0
85°	12.5	13.8	10.9	10.0	9.6
87.5°	4.6	4.6	4.6	4.2	4.2
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)