

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: P#

Luminaire Tested: **24CZ-LD5-30-UNV-L840-CD1-U**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P#
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P25689)
Test Lab: INNOVATION CENTER-P2
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ-LD5-30-UNV-L840-CD1-U
Description: CRUZE 2x4 LED TROFFER

Light Source: -
Ballast/Driver: -

Summary

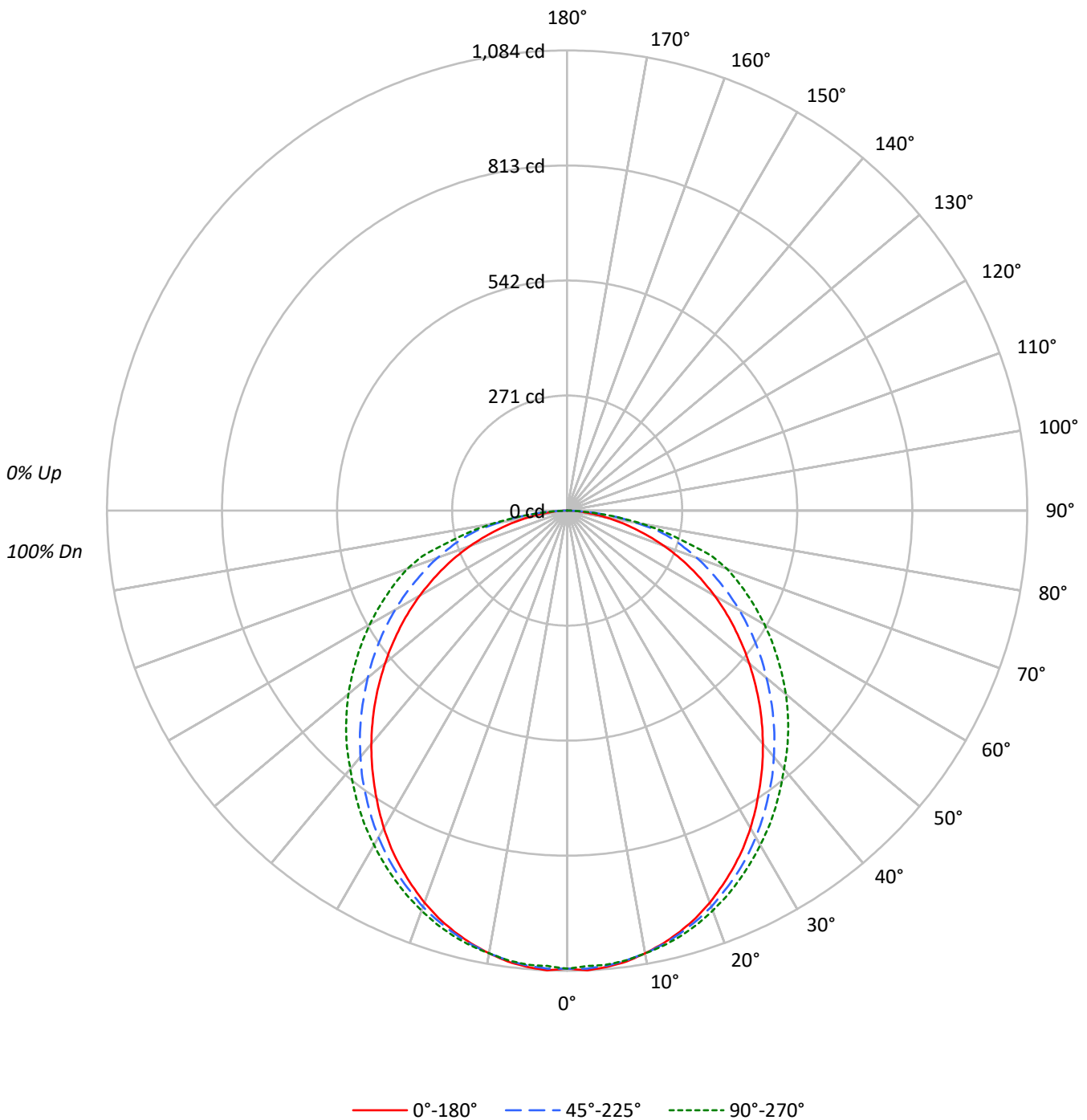
Lumens per Lamp: N/A
Luminaire Lumens: 3070.2 lumens
Efficiency: N/A
Efficacy: 142.0 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.26 / 1.35
Luminous Opening: Rectangular w/ Sides (W: 2' x L: 4' x H: 0.1')
CIE Type: Direct

Input Watts (W): 21.62
Input Voltage (V): NR
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	99	95	106	101	97	93	97	93	90	93	90	88	89	87	85	83
2	98	90	83	77	96	88	81	76	84	79	74	81	76	72	78	74	71	68
3	89	79	70	63	87	77	69	63	74	67	62	71	65	61	69	64	60	57
4	82	69	60	54	79	68	60	53	66	58	52	63	57	52	61	56	51	49
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37
7	64	51	42	35	63	50	41	35	48	41	35	47	40	35	45	39	35	33
8	60	46	38	32	58	45	37	32	44	37	31	43	36	31	42	36	31	29
9	56	42	34	28	55	42	34	28	41	33	28	40	33	28	39	32	28	26
10	52	39	31	26	51	39	31	26	38	31	26	37	30	26	36	30	25	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1452	1452	1452
5°	1454	1446	1444
10°	1441	1434	1434
15°	1421	1416	1426
20°	1395	1395	1410
25°	1361	1369	1392
30°	1323	1340	1374
35°	1278	1307	1358
40°	1234	1273	1340
45°	1188	1240	1334
50°	1138	1207	1329
55°	1088	1180	1324
60°	1035	1153	1329
65°	972	1129	1345
70°	892	1115	1384
75°	780	1111	1272
80°	638	977	1078
85°	439	632	616



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	102.0	3.3
10°-20°	290.4	9.5
20°-30°	434.1	14.1
30°-40°	514.7	16.8
40°-50°	529.3	17.2
50°-60°	484.2	15.8
60°-70°	390.5	12.7
70°-80°	253.5	8.3
80°-90°	71.4	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°	826.5	26.9
0°-40°	1341.2	43.7
0°-60°	2354.8	76.7
0°-90°	3070.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3070.2	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1079	1079	1079	1079	1079	
5°	1079	1072	1076	1074	1074	102
15°	1027	1022	1031	1035	1037	289
25°	928	928	945	952	960	427
35°	792	799	825	842	855	495
45°	640	652	686	718	736	493
55°	480	496	541	584	605	430
65°	322	340	395	446	468	318
75°	164	194	256	287	290	175
85°	37	61	66	65	63	44
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1078.9	1078.9	1078.9	1078.9	1078.9
2.5°	1084.1	1075.8	1079.9	1077.9	1073.7
5°	1078.9	1071.6	1075.8	1073.7	1073.7
7.5°	1071.6	1064.3	1068.5	1068.5	1068.5
10°	1059.1	1052.8	1059.1	1059.1	1059.1
12.5°	1044.4	1039.2	1046.5	1047.6	1049.7
15°	1026.7	1021.5	1030.9	1035.0	1037.1
17.5°	1006.8	1002.7	1013.1	1018.3	1021.5
20°	982.8	979.7	993.3	998.5	1002.7
22.5°	955.7	955.7	969.2	975.5	982.8
25°	927.5	927.5	945.2	952.5	959.8
27.5°	897.2	898.2	918.1	928.5	935.8
30°	863.7	867.9	888.8	901.3	909.7
32.5°	828.2	833.5	857.5	873.1	883.6
35°	791.7	799.0	825.1	841.8	855.4
37.5°	755.1	764.5	792.7	811.5	825.1
40°	717.5	728.0	757.2	779.1	794.8
42.5°	678.9	690.4	722.7	747.8	766.6
45°	640.2	651.7	686.2	717.5	736.3
47.5°	599.5	613.1	649.6	686.2	705.0
50°	559.8	574.4	613.1	652.8	672.6
52.5°	520.1	536.8	577.6	619.3	639.2
55°	480.4	496.1	541.0	583.8	604.7
57.5°	440.8	457.5	504.5	549.4	571.3
60°	401.1	418.8	467.9	514.9	536.8
62.5°	360.3	379.1	431.4	480.4	502.4
65°	321.7	340.5	394.8	446.0	467.9
67.5°	282.0	302.9	359.3	411.5	434.5
70°	242.3	265.3	324.8	377.0	400.0
72.5°	202.6	228.7	289.3	341.5	358.2
75°	164.0	194.3	255.9	287.2	290.4
77.5°	128.5	159.8	218.3	230.8	237.1
80°	94.0	128.5	164.0	179.6	178.6
82.5°	62.7	98.2	118.0	120.1	118.0
85°	36.6	60.6	65.8	64.8	62.7
87.5°	15.7	24.0	20.9	17.8	14.6
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)