

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: P474795

Luminaire Tested: **22CZ2-20HE-UNV-L835-CD1-U**

Issue Date: 02/10/2021

Test Information

Test Method: LM-79-08
Report Number: P474795
Test Lab: INNOVATION CENTER(G3)
Issue Date: 02/10/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 22CZ2-20HE-UNV-L835-CD1-U
Description: 2'X2' TROFFER LED MODULE, HIGH EFFICIENCY,RIBBED LENS
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2029.9 lumens
Efficiency: N/A
Efficacy: 135.3 lumens/watt
Spacing Criteria (0/90/45): 1.18 / 1.25 / 1.33
Luminous Opening: Rectangular (W 2' x L: 2' x H: 0')
CIE Type: Direct

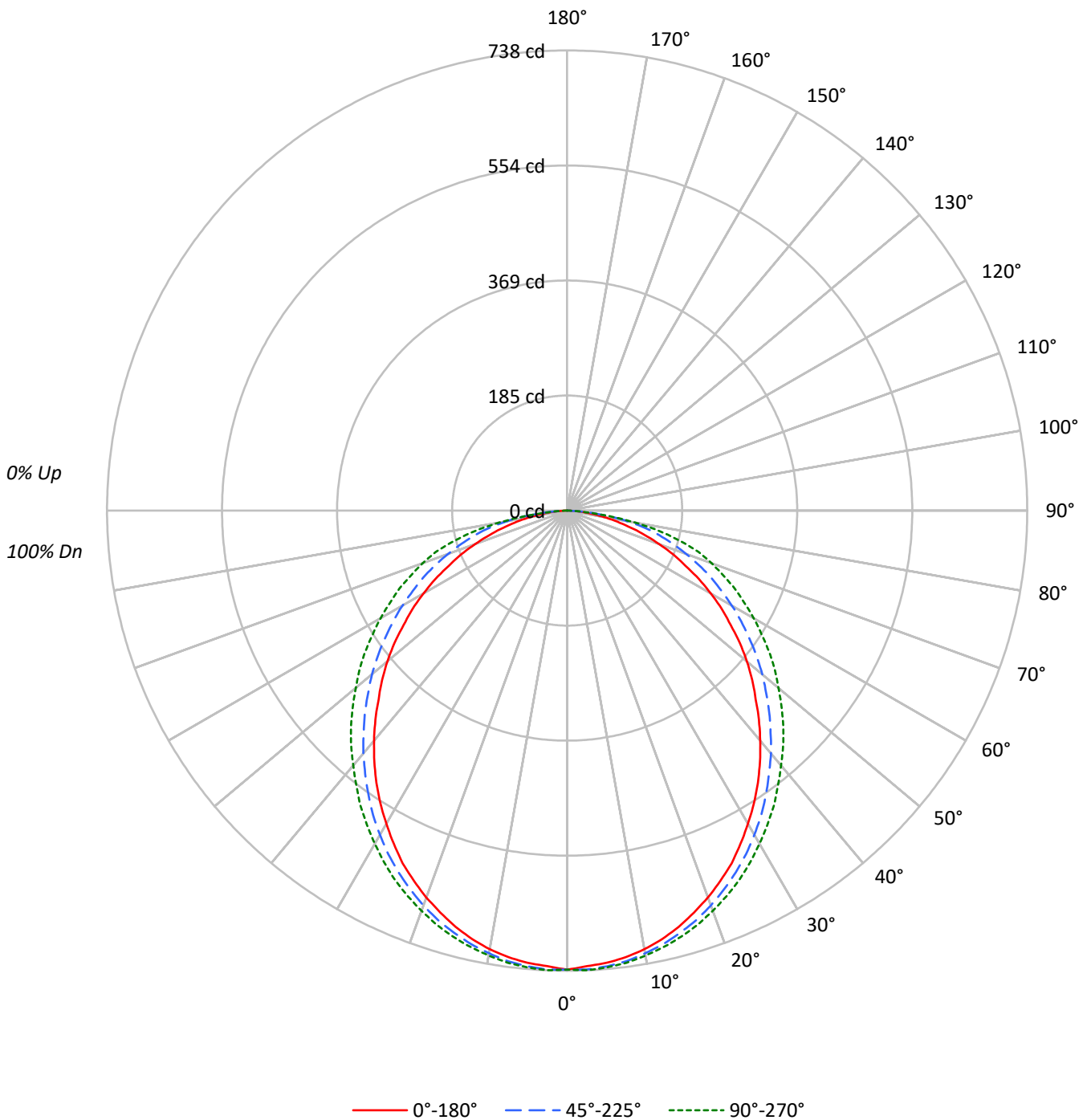
Input Watts (W): 15
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20			20				20			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
RCR																				
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100	100	100
1	109	104	99	95	106	101	97	94	97	94	91	93	91	88	90	87	85	83	83	83
2	99	90	83	77	96	88	82	77	85	79	75	81	77	73	78	75	71	69	69	69
3	90	79	71	64	87	78	70	64	75	68	63	72	66	61	69	64	60	58	58	58
4	82	70	61	54	80	69	60	54	66	59	53	64	58	53	62	56	52	50	50	50
5	76	63	54	47	73	62	53	47	59	52	46	57	51	46	56	50	45	43	43	43
6	70	56	47	41	68	55	47	41	54	46	40	52	45	40	50	44	40	38	38	38
7	65	51	42	36	63	50	42	36	49	41	36	47	41	36	46	40	35	33	33	33
8	60	47	38	32	59	46	38	32	45	37	32	43	37	32	42	36	32	30	30	30
9	56	43	35	29	55	42	34	29	41	34	29	40	33	29	39	33	29	27	27	27
10	53	40	32	26	52	39	31	26	38	31	26	37	31	26	36	30	26	24	24	24

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1981	1981	1981
5°	1967	1982	1986
10°	1952	1970	1980
15°	1925	1953	1971
20°	1891	1930	1956
25°	1853	1901	1940
30°	1802	1866	1917
35°	1752	1827	1898
40°	1692	1786	1875
45°	1628	1745	1866
50°	1575	1710	1852
55°	1501	1673	1856
60°	1434	1644	1861
65°	1333	1622	1890
70°	1232	1600	1937
75°	1102	1593	1949
80°	924	1509	1702
85°	716	1034	966



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	69.5	3.4
10°-20°	197.4	9.7
20°-30°	294.4	14.5
30°-40°	347.5	17.1
40°-50°	354.2	17.4
50°-60°	319.4	15.7
60°-70°	251.0	12.4
70°-80°	157.2	7.7
80°-90°	39.2	1.9
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°	561.4	27.7
0°-40°	908.9	44.8
0°-60°	1582.5	78.0
0°-90°	2029.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2029.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	736	736	736	736	736	
5°	728	730	734	735	735	69
15°	691	694	701	706	707	195
25°	624	629	640	650	653	287
35°	533	540	556	571	578	333
45°	428	437	459	481	490	331
55°	320	330	356	384	396	287
65°	209	222	255	283	297	209
75°	106	122	153	181	188	113
85°	23	30	34	34	31	28
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	736.2	736.2	736.2	736.2	736.2
2.5°	731.4	733.2	736.6	737.9	737.9
5°	728.0	729.7	733.6	735.3	735.3
7.5°	722.4	724.1	728.9	731.0	731.4
10°	714.3	716.4	721.1	724.6	724.6
12.5°	704.0	706.1	712.1	716.4	716.8
15°	691.1	694.1	701.0	706.1	707.4
17.5°	676.1	680.8	688.5	695.0	696.3
20°	660.2	664.9	673.9	681.2	683.0
22.5°	642.6	646.9	657.6	666.7	668.8
25°	624.2	628.9	640.1	649.9	653.4
27.5°	602.3	607.9	621.2	632.3	635.8
30°	580.0	586.9	600.6	613.0	616.9
32.5°	557.3	563.7	579.1	592.4	597.6
35°	533.2	540.1	556.0	571.4	577.9
37.5°	507.9	514.8	532.0	549.5	555.5
40°	481.8	489.9	508.4	527.2	533.7
42.5°	455.2	463.7	483.0	504.1	512.6
45°	427.7	437.1	458.6	480.9	490.3
47.5°	402.8	410.5	432.9	457.3	466.3
50°	376.2	383.5	408.4	432.9	442.3
52.5°	349.2	356.1	382.7	408.4	420.0
55°	320.0	329.9	356.5	383.9	395.5
57.5°	294.3	303.3	330.8	358.6	369.8
60°	266.4	275.8	305.4	333.8	345.8
62.5°	238.5	248.8	278.8	309.3	320.5
65°	209.3	222.2	254.8	283.1	296.9
67.5°	184.5	196.9	229.1	258.7	270.7
70°	156.6	171.2	203.3	233.4	246.2
72.5°	130.4	145.0	178.0	208.1	220.9
75°	106.0	121.8	153.2	180.6	187.5
77.5°	82.4	97.4	128.7	144.6	151.9
80°	59.6	74.2	97.4	108.1	109.8
82.5°	40.3	52.8	66.1	69.1	67.4
85°	23.2	29.6	33.5	33.5	31.3
87.5°	9.4	9.4	8.2	5.1	3.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)