

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: P474222

Luminaire Tested: **24CZ2-45HE-RDP-UNV-L835-CD1-U**

Issue Date: 01/28/2021

Test Information

Test Method: LM-79-08
Report Number: P474222
Test Lab: INNOVATION CENTER(G3)
Issue Date: 01/28/2021
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 24CZ2-45HE-RDP-UNV-L835-CD1-U
Description: 2'X4' TROFFER LED MODULE, HIGH EFFICIENCY,SMOOTH LENS W/ RDP INSERT
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3157.1 lumens
Efficiency: N/A
Efficacy: 89.4 lumens/watt
Spacing Criteria (0/90/45): 1.26 / 1.3 / 1.41
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

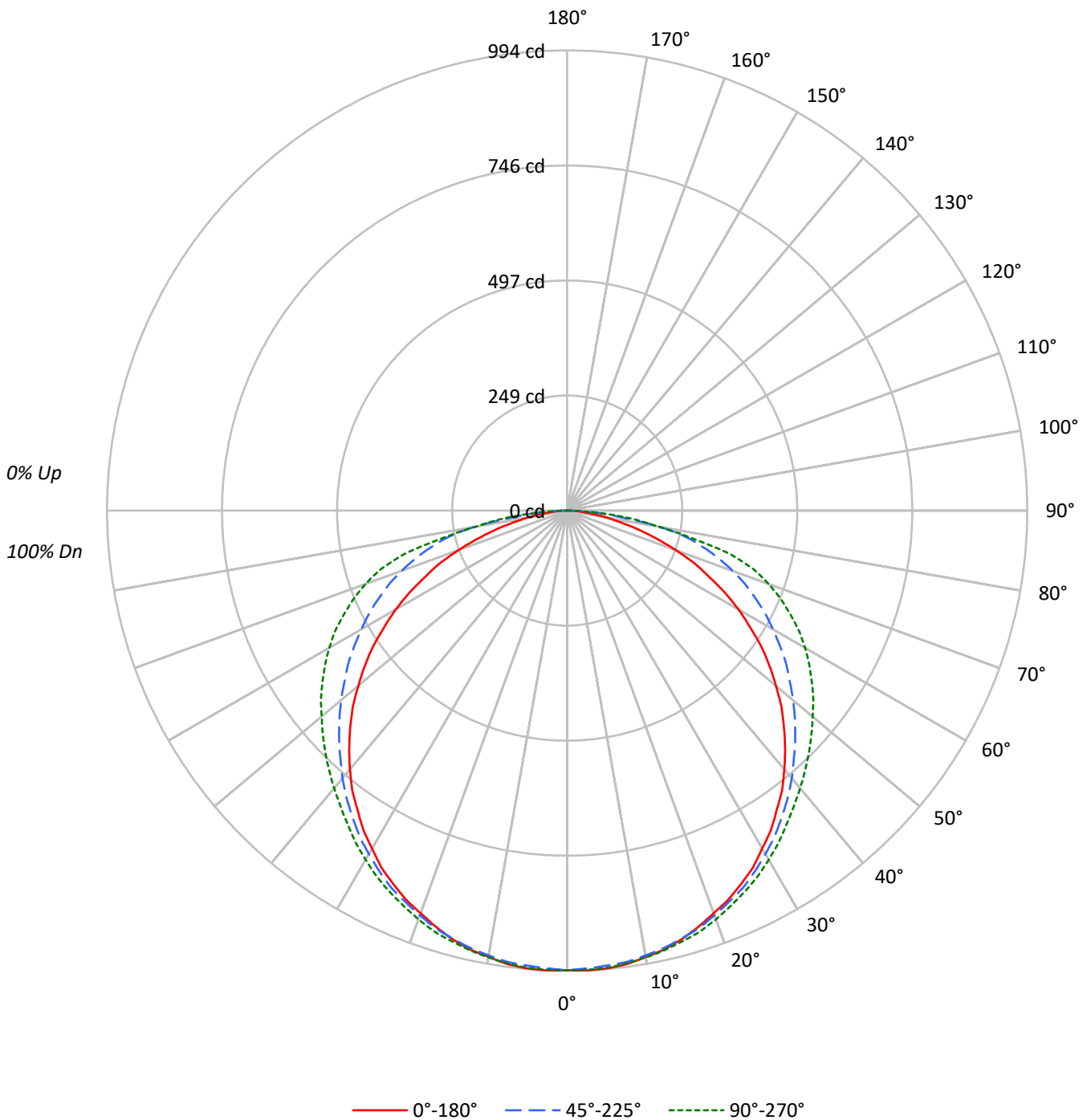
Input Watts (W): 35.3
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	88	86	84	82
2	97	89	81	75	95	87	80	74	83	77	72	80	75	71	77	73	69	67
3	88	77	68	62	86	76	67	61	72	66	60	70	64	59	67	62	58	56
4	81	68	59	52	78	67	58	51	64	57	51	62	55	50	59	54	49	47
5	74	60	51	44	72	59	51	44	57	49	43	55	48	43	53	47	42	40
6	68	54	45	38	66	53	45	38	51	44	38	50	43	37	48	42	37	35
7	63	49	40	34	61	48	40	34	47	39	33	45	38	33	44	38	33	31
8	59	45	36	30	57	44	36	30	43	35	30	41	34	29	40	34	29	27
9	55	41	33	27	53	40	32	27	39	32	27	38	31	26	37	31	26	24
10	51	38	30	24	50	37	29	24	36	29	24	35	29	24	34	28	24	22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1336	1336	1336
5°	1341	1333	1339
10°	1337	1333	1339
15°	1335	1333	1342
20°	1325	1332	1345
25°	1321	1334	1348
30°	1309	1331	1353
35°	1296	1327	1358
40°	1282	1326	1375
45°	1260	1326	1406
50°	1232	1334	1449
55°	1201	1355	1514
60°	1151	1382	1597
65°	1077	1430	1695
70°	980	1497	1823
75°	830	1579	1905
80°	656	1589	1540
85°	483	1209	1354



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	94.2	3.0
10°-20°	271.1	8.6
20°-30°	414.5	13.1
30°-40°	506.7	16.0
40°-50°	540.0	17.1
50°-60°	516.3	16.4
60°-70°	437.4	13.9
70°-80°	294.0	9.3
80°-90°	82.9	2.6
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°	779.7	24.7
0°-40°	1286.4	40.7
0°-60°	2342.8	74.2
0°-90°	3157.1	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3157.1	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	993	993	993	993	993	
5°	993	991	987	991	991	94
15°	958	958	957	965	963	270
25°	890	893	899	907	908	410
35°	789	795	808	824	827	494
45°	662	673	697	727	739	511
55°	512	531	578	623	645	456
65°	338	373	449	509	532	336
75°	160	218	304	356	366	171
85°	31	64	78	85	88	39
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	992.9	992.9	992.9	992.9	992.9
2.5°	994.4	994.4	989.7	992.9	992.9
5°	992.9	991.3	986.6	991.3	991.3
7.5°	988.2	986.6	983.5	988.2	986.6
10°	978.8	978.8	975.6	980.3	980.3
12.5°	970.9	969.4	967.8	974.1	972.5
15°	958.4	958.4	956.8	964.7	963.1
17.5°	942.7	944.3	945.9	952.1	953.7
20°	925.5	928.6	930.2	939.6	939.6
22.5°	909.8	911.4	914.5	923.9	923.9
25°	889.5	892.6	898.9	906.7	908.3
27.5°	869.1	870.7	878.5	889.5	891.0
30°	842.5	847.2	856.6	869.1	870.7
32.5°	819.0	823.7	834.6	847.2	850.3
35°	789.2	795.4	808.0	823.7	826.8
37.5°	762.5	767.2	782.9	800.1	804.8
40°	729.8	739.0	754.7	775.1	782.9
42.5°	696.9	706.3	725.1	751.6	761.0
45°	662.4	673.4	696.9	726.7	739.0
47.5°	628.0	640.5	667.1	701.6	715.7
50°	588.8	604.5	637.4	676.5	692.2
52.5°	551.2	570.0	606.0	649.9	670.3
55°	512.0	530.8	577.8	623.3	645.2
57.5°	468.2	493.2	544.9	596.6	620.1
60°	427.6	450.9	513.6	570.0	593.5
62.5°	383.7	415.0	482.3	541.8	565.3
65°	338.3	372.7	449.3	508.9	532.4
67.5°	297.5	335.1	416.6	476.0	499.5
70°	249.0	296.0	380.6	439.9	463.5
72.5°	203.5	255.2	343.0	400.9	422.9
75°	159.7	217.6	303.8	355.5	366.5
77.5°	119.1	180.0	263.1	285.0	277.2
80°	84.6	144.1	205.1	194.1	198.8
82.5°	54.8	109.7	126.9	144.1	148.7
85°	31.3	64.2	78.3	84.6	87.7
87.5°	14.1	23.5	31.3	31.3	29.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)