

Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: METALUX

Report Number: 112P106

Luminaire Tested: **DCI-240**

Issue Date: 3/3/2020



Test Information

Test Method: LM-41-14
Report Number: 112P106
Test Lab:
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: DCI-240
Description: Heavy-duty Industrial with edge wipe tomb stone sockets.
Light Source: Two-F40CW, 3150 Lumens ea., 40 Watts ea.
Ballast/Driver: -

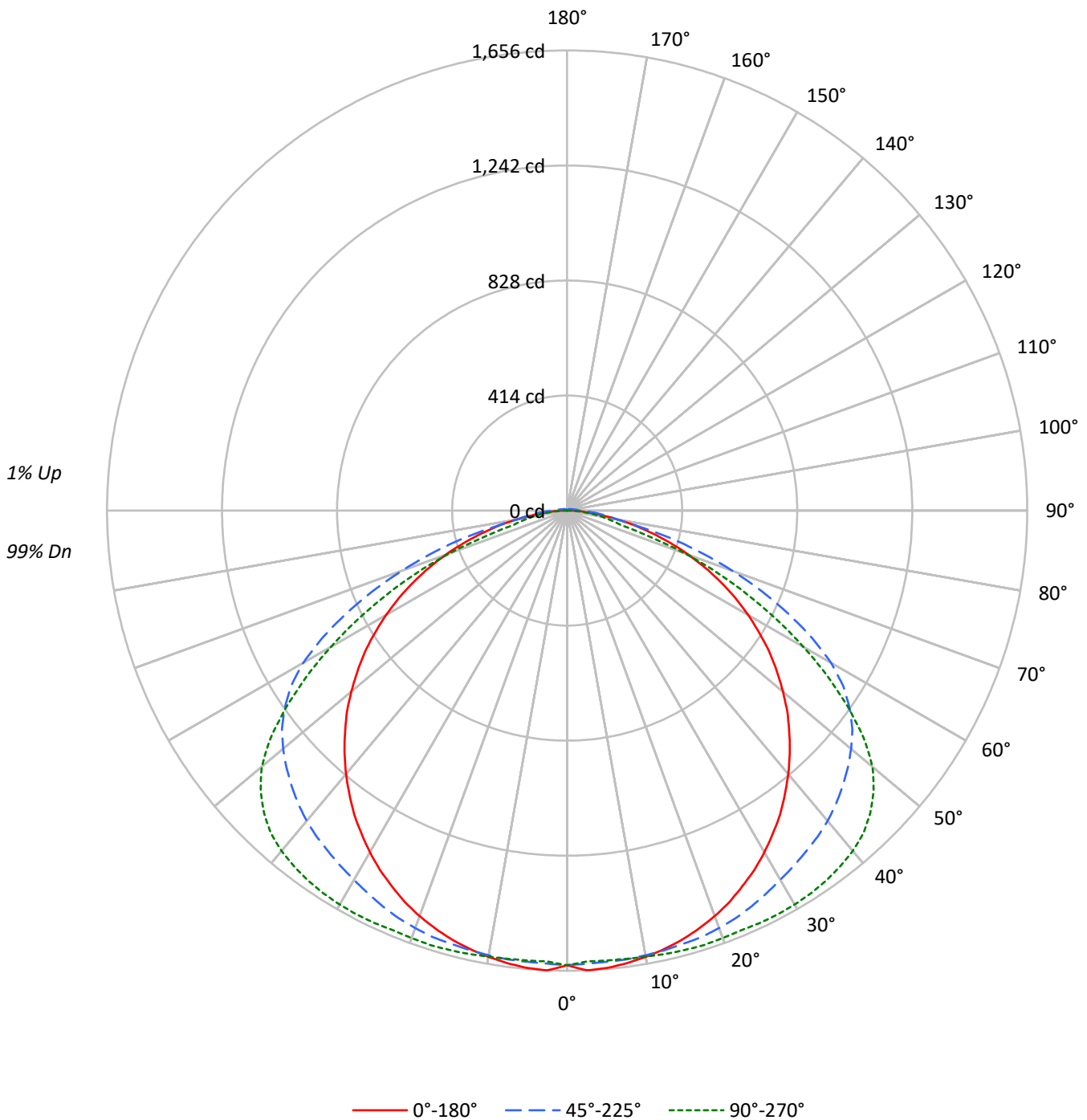
Summary

Lumens per Lamp: 3150 (2 lamps)
Luminaire Lumens: 5679.6 lumens
Efficiency: 90.2%
Efficacy: 64.5 lumens/watt
Spacing Criteria (0/90/45): 1.29 / 1.52 / 1.58
Luminous Opening: Rectangular (W 1.09' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 88.1
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

TEST NUMBER: 112P106
CATALOG NUMBER: DCI-240

Luminous Intensity Polar Plot





TEST NUMBER: 112P106
 CATALOG NUMBER: DCI-240

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	107	107	107	107	105	105	105	105	100	100	100	95	95	95	91	91	91	89
1	98	93	89	85	95	91	87	84	87	84	81	83	81	79	80	78	76	74
2	88	81	74	69	86	79	73	68	75	71	66	72	68	65	69	66	63	61
3	80	70	63	57	78	69	62	56	66	60	55	63	58	54	61	57	53	51
4	73	62	54	47	71	61	53	47	58	52	46	56	50	45	54	49	45	43
5	67	55	47	40	65	54	46	40	52	45	40	50	44	39	48	43	38	36
6	62	49	41	35	60	48	40	35	46	39	34	45	39	34	43	38	33	32
7	57	44	36	30	55	44	36	30	42	35	30	41	34	30	39	34	29	28
8	53	40	32	27	51	40	32	27	38	31	27	37	31	26	36	30	26	24
9	49	37	29	24	48	36	29	24	35	28	24	34	28	24	33	28	23	22
10	46	34	27	22	45	33	26	22	32	26	21	31	26	21	31	25	21	20

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4025	4025	4025
5°	4080	4025	4013
10°	4075	4060	4072
15°	4073	4111	4169
20°	4066	4186	4286
25°	4050	4265	4446
30°	4034	4358	4650
35°	4012	4499	4880
40°	3976	4682	5135
45°	3935	4878	5365
50°	3881	5106	5492
55°	3813	5323	5293
60°	3705	5398	4837
65°	3557	5111	4168
70°	3345	4546	3244
75°	3032	3707	1901
80°	2621	2564	1771
85°	2061	3020	1665



TEST NUMBER: 112P106
 CATALOG NUMBER: DCI-240

ZONAL LUMENS:

CANDELA DISTRIBUTION:

Zone	Lumens	% Fixture	% Lamp		0°	22.5°	45°	67.5°	90°	Flux
0°-10°	155.8	2.7	2.5	0°	1636	1636	1636	1636	1636	
10°-20°	457.3	8.1	7.3	5°	1652	1636	1630	1631	1625	157
20°-30°	724.4	12.8	11.5	15°	1599	1596	1614	1637	1637	451
30°-40°	934.7	16.5	14.8	25°	1492	1514	1571	1621	1638	688
40°-50°	1056.7	18.6	16.8	35°	1336	1391	1498	1597	1625	835
50°-60°	1025.6	18.1	16.3	45°	1131	1227	1402	1517	1542	872
60°-70°	776.2	13.7	12.3	55°	889	1048	1241	1265	1234	793
70°-80°	384.9	6.8	6.1	65°	611	839	878	765	716	604
80°-90°	112.8	2.0	1.8	75°	319	518	390	237	200	339
90°-100°	24.8	0.4	0.4	85°	73	145	107	70	59	84
100°-110°	11.6	0.2	0.2	90°	12	73	43	11	0	8
110°-120°	7.2	0.1	0.1	95°	1	45	34	8	0	1
120°-130°	4.7	0.1	0.1	105°	0	18	18	7	0	0
130°-140°	2.6	0.0	0.0	115°	0	8	13	8	0	0
140°-150°	0.2	0.0	0.0	125°	0	4	9	9	0	0
150°-160°	0.0	0.0	0.0	135°	0	1	6	6	0	0
160°-170°	0.0	0.0	0.0	145°	0	0	0	0	0	0
170°-180°	0.0	0.0	0.0	155°	0	0	0	0	0	0
0°-30°	1337.5	23.5	21.2	165°	0	0	0	0	0	0
0°-40°	2272.3	40.0	36.1	175°	0	0	0	0	0	0
0°-60°	4354.6	76.7	69.1	180°	0	0	0	0	0	0
0°-90°	5628.5	99.1	89.3							
90°-120°	43.6	0.8	0.7							
90°-150°	51.1	0.9	0.8							
90°-180°	51.0	0.9	0.8							
0°-180°	5679.6	100.0	90.2							



TEST NUMBER: 112P106
 CATALOG NUMBER: DCI-240

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1636	1636	1636	1636	1636
2.5°	1656	1640	1632	1631	1624
5°	1652	1636	1630	1631	1625
7.5°	1643	1631	1629	1633	1627
10°	1631	1621	1625	1634	1630
12.5°	1616	1610	1620	1636	1634
15°	1599	1596	1614	1637	1637
17.5°	1577	1580	1609	1636	1639
20°	1553	1561	1599	1632	1637
22.5°	1525	1539	1587	1626	1635
25°	1492	1514	1571	1621	1638
27.5°	1458	1487	1553	1619	1639
30°	1420	1456	1534	1615	1637
32.5°	1378	1426	1517	1608	1633
35°	1336	1391	1498	1597	1625
37.5°	1287	1355	1480	1584	1614
40°	1238	1314	1458	1565	1599
42.5°	1186	1271	1432	1546	1577
45°	1131	1227	1402	1517	1542
47.5°	1075	1182	1370	1477	1496
50°	1014	1137	1334	1426	1435
52.5°	952	1093	1294	1357	1346
55°	889	1048	1241	1265	1234
57.5°	821	1000	1179	1150	1112
60°	753	949	1097	1027	983
62.5°	683	894	994	897	851
65°	611	839	878	765	716
67.5°	538	782	757	631	586
70°	465	711	632	506	451
72.5°	391	622	508	365	306
75°	319	518	390	237	200
77.5°	250	411	262	173	160
80°	185	310	181	137	125
82.5°	125	213	143	103	92
85°	73	145	107	70	59
87.5°	35	106	71	37	26
90°	12	73	43	11	0
92.5°	3	61	38	9	0
95°	1	45	34	8	0
97.5°	0	34	29	8	0
100°	0	26	24	8	0
102.5°	0	21	20	7	0
105°	0	18	18	7	0
107.5°	0	15	16	7	0
110°	0	12	15	7	0



TEST NUMBER: 112P106
CATALOG NUMBER: DCI-240

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0	10	14	7	0
115°	0	8	13	8	0
117.5°	0	6	12	8	0
120°	0	5	11	9	0
122.5°	0	4	10	8	0
125°	0	4	9	9	0
127.5°	0	3	8	8	0
130°	0	2	7	7	0
132.5°	0	1	7	7	0
135°	0	1	6	6	0
137.5°	0	1	5	6	0
140°	0	1	4	5	0
142.5°	0	0	0	0	0
145°	0	0	0	0	0
147.5°	0	0	0	0	0
150°	0	0	0	0	0
152.5°	0	0	0	0	0
155°	0	0	0	0	0
157.5°	0	0	0	0	0
160°	0	0	0	0	0
162.5°	0	0	0	0	0
165°	0	0	0	0	0
167.5°	0	0	0	0	0
170°	0	0	0	0	0
172.5°	0	0	0	0	0
175°	0	0	0	0	0
177.5°	0	0	0	0	0
180°	0	0	0	0	0

(END OF REPORT)