

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: 104P178

Luminaire Tested: **2PGX-432S48I-PAF**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: 104P178
Test Lab:
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: METALUX
Catalog Number: 2PGX-432S48I-PAF
Description: 2 X 4 Recessed Convertible Body troffer
with a 4" deep 32 cell semi-specular
low iridescent parabolic louver.
Light Source: Four-F32T8/35K - 2900 Lumens ea. - 32 Watts ea.
Ballast/Driver: Triad-Utrad B432I120RH Electronic

Summary

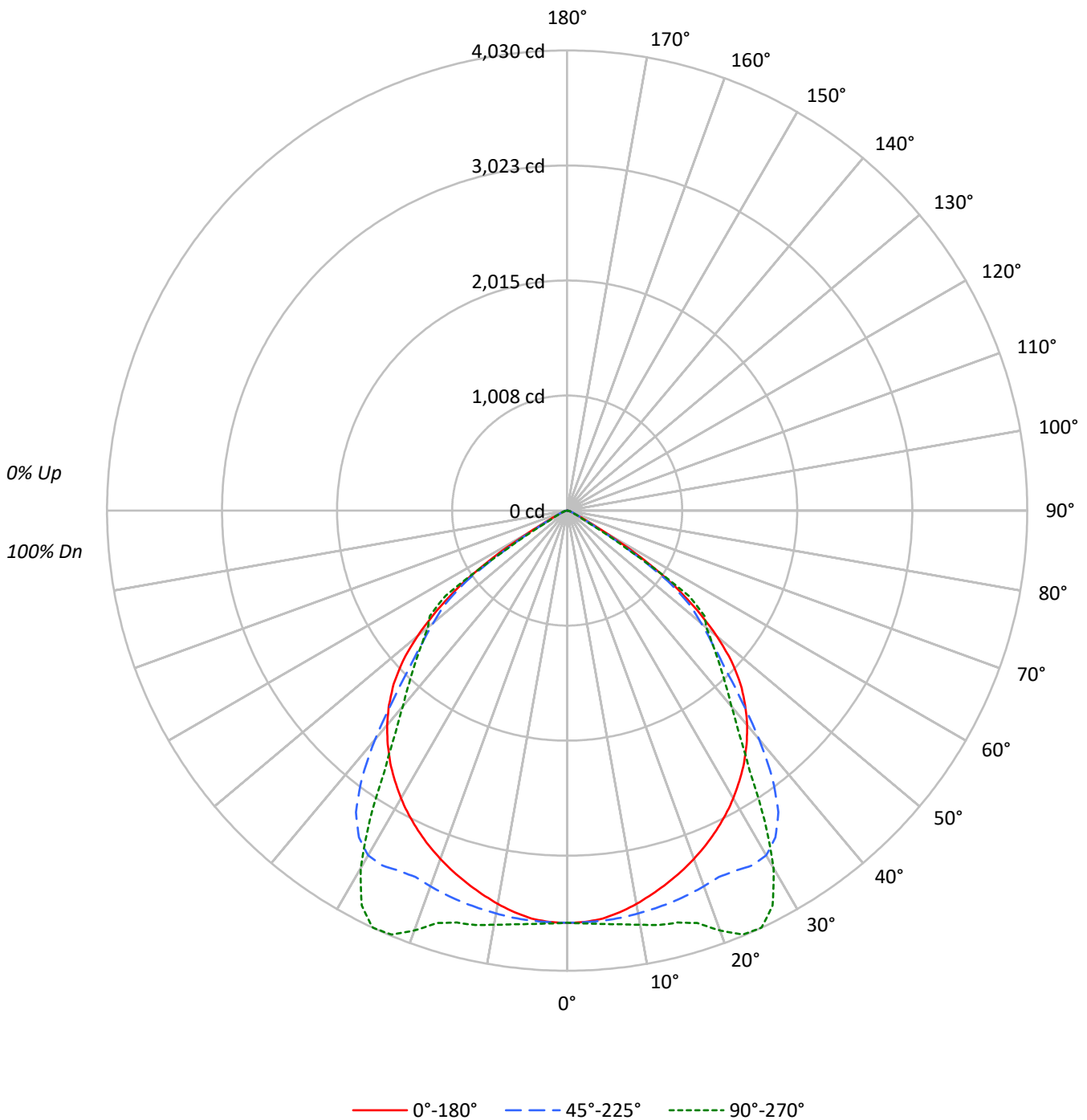
Lumens per Lamp: 2900 (4 lamps)
Luminaire Lumens: 7465.3 lumens
Efficiency: 64.4%
Efficacy: 68.1 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.31 / 1.29
Luminous Opening: Rectangular (W 1.74' x L: 3.76' x H: 0')
CIE Type: Direct

Input Watts (W): 109.7
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: 104P178
CATALOG NUMBER: 2PGX-432S48I-PAF

Luminous Intensity Polar Plot





TEST NUMBER: 104P178

CATALOG NUMBER: 2PGX-432S48I-PAF

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	77	77	77	77	75	75	75	75	72	72	72		68	68	68		66	66	66	64
1	72	70	68	66	70	68	67	65	66	64	63		63	62	61		61	60	59	58
2	67	63	60	57	66	62	59	56	60	57	55		58	56	54		56	54	53	51
3	62	57	53	49	61	56	52	49	54	51	48		53	50	47		51	49	47	46
4	58	52	47	43	57	51	46	43	49	46	43		48	45	42		47	44	42	40
5	54	47	42	38	53	46	42	38	45	41	38		44	40	37		43	40	37	36
6	50	43	38	34	49	42	37	34	41	37	34		40	36	34		39	36	33	32
7	47	39	34	31	46	39	34	31	38	33	30		37	33	30		36	33	30	29
8	44	36	31	28	43	35	31	28	35	30	27		34	30	27		33	30	27	26
9	41	33	28	25	40	33	28	25	32	28	25		31	28	25		31	27	25	24
10	38	31	26	23	38	30	26	23	30	26	23		29	25	23		29	25	23	22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5948	5948	5948
5°	5931	5963	6011
10°	5853	5995	6162
15°	5766	6056	6371
20°	5692	6139	6861
25°	5618	6329	7327
30°	5537	6633	6882
35°	5431	6487	5612
40°	5276	5631	4814
45°	5005	4556	4376
50°	4389	3927	4081
55°	3278	3100	3732
60°	1295	959	728
65°	390	398	335
70°	231	251	217
75°	159	178	159
80°	114	133	123
85°	76	76	76



TEST NUMBER: 104P178

CATALOG NUMBER: 2PGX-432S48I-PAF

ZONAL LUMENS:

CANDELA DISTRIBUTION:

Zone	Lumens	% Fixture	% Lamp		0°	22.5°	45°	67.5°	90°	Flux
0°-10°	343.6	4.6	3.0	0°	3610	3610	3610	3610	3610	
10°-20°	1007.0	13.5	8.7	5°	3586	3587	3605	3626	3634	339
20°-30°	1617.4	21.7	13.9	15°	3380	3425	3550	3681	3735	954
30°-40°	1828.6	24.5	15.8	25°	3090	3203	3481	3871	4030	1424
40°-50°	1579.3	21.2	13.6	35°	2700	2895	3225	2884	2790	1686
50°-60°	925.7	12.4	8.0	45°	2148	2408	1955	1813	1878	1636
60°-70°	127.3	1.7	1.1	55°	1141	1025	1079	1096	1299	976
70°-80°	30.6	0.4	0.3	65°	100	108	102	96	86	137
80°-90°	5.8	0.1	0.0	75°	25	29	28	27	25	28
90°-100°	0.0	0.0	0.0	85°	4	4	4	5	4	5
100°-110°	0.0	0.0	0.0	90°	0	0	0	0	0	0
110°-120°	0.0	0.0	0.0	95°	0	0	0	0	0	0
120°-130°	0.0	0.0	0.0	105°	0	0	0	0	0	0
130°-140°	0.0	0.0	0.0	115°	0	0	0	0	0	0
140°-150°	0.0	0.0	0.0	125°	0	0	0	0	0	0
150°-160°	0.0	0.0	0.0	135°	0	0	0	0	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°	2968.0	39.8	25.6	165°	0	0	0	0	0	0
0°-40°	4796.6	64.3	41.4	175°	0	0	0	0	0	0
0°-60°	7301.7	97.8	62.9	180°	0	0	0	0	0	0
0°-90°	7465.3	100.0	64.4							
90°-120°	0.0	0.0	0.0							
90°-150°	0.0	0.0	0.0							
90°-180°	0.0	0.0	0.0							
0°-180°	7465.3	100.0	64.4							



TEST NUMBER: 104P178

CATALOG NUMBER: 2PGX-432S48I-PAF

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	3610	3610	3610	3610	3610
2.5°	3607	3603	3608	3614	3619
5°	3586	3587	3605	3626	3634
7.5°	3548	3557	3597	3637	3655
10°	3498	3518	3583	3652	3683
12.5°	3441	3473	3567	3673	3718
15°	3380	3425	3550	3681	3735
17.5°	3316	3374	3528	3684	3786
20°	3246	3320	3501	3745	3913
22.5°	3172	3263	3473	3847	4019
25°	3090	3203	3481	3871	4030
27.5°	3004	3136	3504	3816	3898
30°	2910	3063	3486	3613	3617
32.5°	2807	2982	3393	3293	3217
35°	2700	2895	3225	2884	2790
37.5°	2581	2802	2952	2494	2477
40°	2453	2702	2618	2215	2238
42.5°	2308	2575	2260	1997	2047
45°	2148	2408	1955	1813	1878
47.5°	1953	2178	1723	1652	1723
50°	1712	1860	1532	1514	1592
52.5°	1436	1451	1349	1344	1516
55°	1141	1025	1079	1096	1299
57.5°	774	673	653	725	619
60°	393	384	291	318	221
62.5°	173	190	155	150	128
65°	100	108	102	96	86
67.5°	68	78	72	68	61
70°	48	53	52	49	45
72.5°	35	39	39	37	33
75°	25	29	28	27	25
77.5°	18	20	21	20	18
80°	12	14	14	14	13
82.5°	8	9	9	9	8
85°	4	4	4	5	4
87.5°	1	1	1	2	2
90°	0	0	0	0	0
92.5°	0	0	0	0	0
95°	0	0	0	0	0
97.5°	0	0	0	0	0
100°	0	0	0	0	0
102.5°	0	0	0	0	0
105°	0	0	0	0	0
107.5°	0	0	0	0	0
110°	0	0	0	0	0



TEST NUMBER: 104P178

CATALOG NUMBER: 2PGX-432S48I-PAF

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	0	0	0	0	0
115°	0	0	0	0	0
117.5°	0	0	0	0	0
120°	0	0	0	0	0
122.5°	0	0	0	0	0
125°	0	0	0	0	0
127.5°	0	0	0	0	0
130°	0	0	0	0	0
132.5°	0	0	0	0	0
135°	0	0	0	0	0
137.5°	0	0	0	0	0
140°	0	0	0	0	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)