

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



Scaled data based on original data using
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: PrentaLux

Report Number: P866918

Luminaire Tested: PRLX-2002-L-927-100L-L-X-X-GREY-X

Issue Date: 8/20/2024

Test Information

Test Method: LM-79-2019
Report Number: P866918
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2304-993-82)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 8/20/2024
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: Pentalux
Catalog Number: PRLX-2002-L-927-100L-L-X-X-GREY-X
Description: PRENTALUX 3D PRINTED PENDANT LED LUMINAIRE, LARGE LIGHT ENGINE, FLAT LENS, TRUNCATED DOME WITH GRAY INTERIOR SHADE.
LIGHT LEVEL 6
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

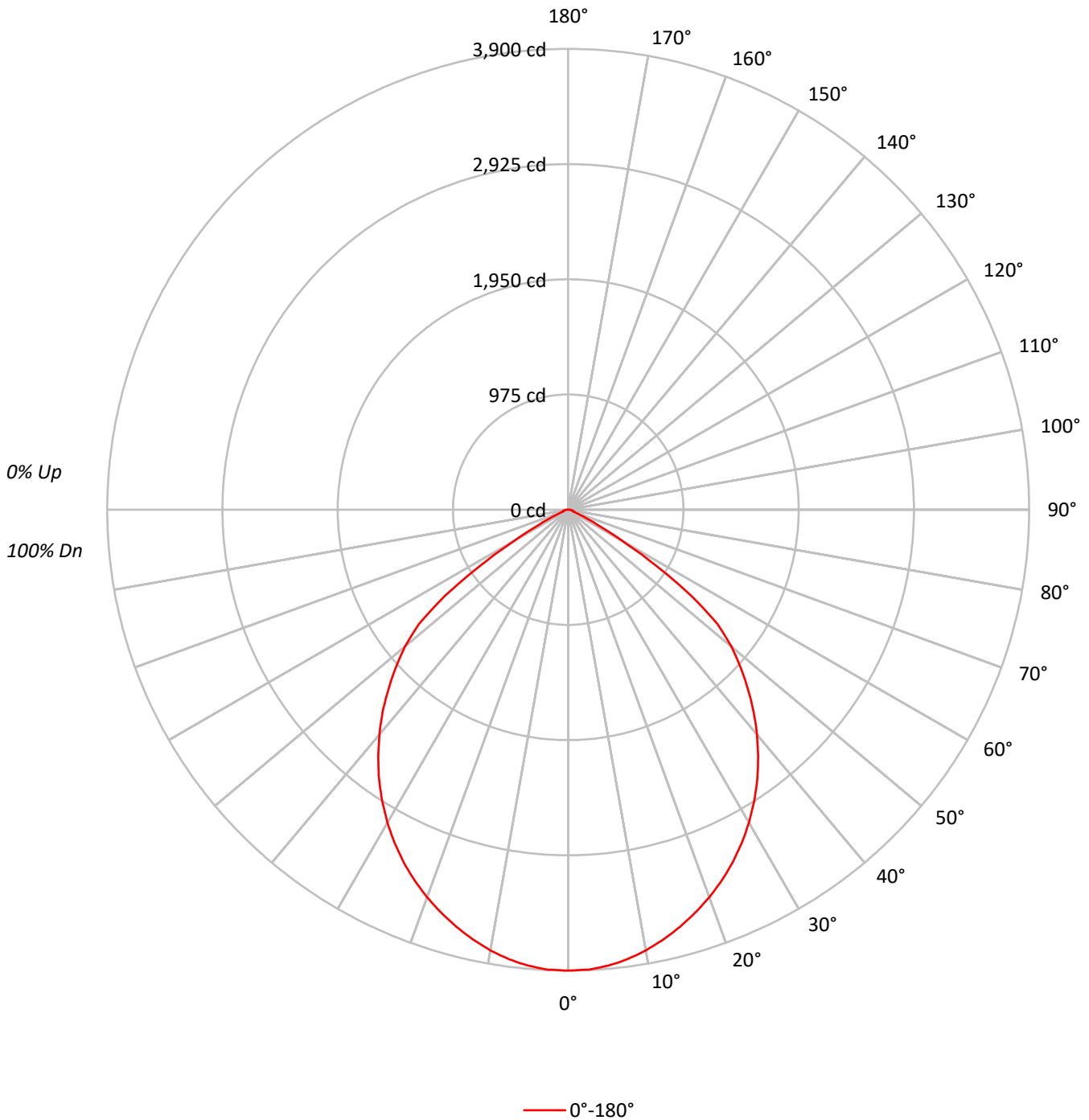
Lumens per Lamp: N/A
Luminaire Lumens: 7665.4 lumens
Efficiency: N/A
Efficacy: 96.5 lumens/watt
Spacing Criteria (0/90/45): 1.17 / 1.17 / 1.27
Luminous Opening: Circular (Dia: 1.67' x H: 0')
CIE Type: Direct

Input Watts (W): 79.4
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: 0.5 HR
Operation Time: 3 HR
Ambient Temperature (°C): NR
Test Distance: 24 FT

TEST NUMBER: P866918

CATALOG NUMBER: PRLX-2002-L-927-100L-L-X-X-GREY-X

Luminous Intensity Polar Plot





TEST NUMBER: P866918

CATALOG NUMBER: PRLX-2002-L-927-100L-L-X-X-GREY-X

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	112	108	105	102	109	106	103	100	102	99	97	98	96	94	94	93	91	90
2	104	97	92	87	101	95	91	86	92	88	84	89	86	83	86	83	81	79
3	96	88	81	76	94	86	80	75	83	78	74	81	76	73	78	75	71	69
4	89	79	72	66	87	78	71	66	75	70	65	73	68	64	71	67	63	61
5	83	72	64	58	81	71	63	58	69	62	57	67	61	57	65	60	56	54
6	77	65	57	52	75	64	57	52	63	56	51	61	55	51	60	54	50	48
7	72	60	52	46	70	59	51	46	57	51	46	56	50	46	55	49	45	43
8	67	55	47	42	65	54	47	42	53	46	41	52	46	41	50	45	41	39
9	63	50	43	38	61	50	43	38	49	42	38	48	42	37	47	41	37	36
10	59	47	39	35	58	46	39	34	45	39	34	44	38	34	43	38	34	32

AVERAGE LUMINANCE (cd/sqm):

	0°
0°	19243
5°	19185
10°	18971
15°	18668
20°	18327
25°	17925
30°	17420
35°	16803
40°	15999
45°	15013
50°	13835
55°	10998
60°	5177
65°	1869
70°	720
75°	797
80°	915
85°	1093

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 15013 cd/sqm

TEST NUMBER: P866918

CATALOG NUMBER: PRLX-2002-L-927-100L-L-X-X-GREY-X

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	367.0	4.8
10°-20°	1029.9	13.4
20°-30°	1514.9	19.8
30°-40°	1740.5	22.7
40°-50°	1657.8	21.6
50°-60°	1090.2	14.2
60°-70°	201.4	2.6
70°-80°	44.0	0.6
80°-90°	19.7	0.3
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°	2911.9	38.0
0°-40°	4652.4	60.7
0°-60°	7400.3	96.5
0°-90°	7665.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	7665.4	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	3900	
5°	3874	367
15°	3655	1030
25°	3293	1515
35°	2790	1741
45°	2152	1658
55°	1279	1090
65°	160	201
75°	42	44
85°	19	20
90°	0	

TEST NUMBER: P866918

CATALOG NUMBER: PRLX-2002-L-927-100L-L-X-X-GREY-X

CANDELA DISTRIBUTION (FULL):

	0°
0°	3900.2
2.5°	3896.1
5°	3873.6
7.5°	3837.4
10°	3786.7
12.5°	3724.8
15°	3654.7
17.5°	3575.9
20°	3490.6
22.5°	3395.6
25°	3292.7
27.5°	3180.0
30°	3057.7
32.5°	2926.5
35°	2789.7
37.5°	2640.1
40°	2484.0
42.5°	2323.8
45°	2151.6
47.5°	1981.1
50°	1802.4
52.5°	1593.2
55°	1278.6
57.5°	876.3
60°	524.6
62.5°	295.3
65°	160.1
67.5°	80.5
70°	49.9
72.5°	45.9
75°	41.8
77.5°	37.8
80°	32.2
82.5°	26.6
85°	19.3
87.5°	10.5
90°	0.0



TEST NUMBER: P866918
 CATALOG NUMBER: PRLX-2002-L-927-100L-L-X-X-GREY-X

CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	18.27	19.67	18.63	19.98	20.30	18.27	19.67	18.63	19.98	20.30
	3H	18.18	19.42	18.56	19.75	20.11	18.18	19.42	18.56	19.75	20.11
	4H	18.14	19.28	18.54	19.63	20.01	18.14	19.28	18.54	19.63	20.01
	6H	18.09	19.14	18.50	19.51	19.90	18.09	19.14	18.50	19.51	19.90
	8H	18.06	19.06	18.49	19.45	19.85	18.06	19.06	18.49	19.45	19.85
	12H	18.04	18.99	18.47	19.37	19.80	18.04	18.99	18.47	19.37	19.80
4H	2H	18.14	19.29	18.54	19.64	20.02	18.14	19.29	18.54	19.64	20.02
	3H	18.07	19.00	18.49	19.40	19.80	18.07	19.00	18.49	19.40	19.80
	4H	18.02	18.84	18.46	19.26	19.70	18.02	18.84	18.46	19.26	19.70
	6H	17.99	18.70	18.45	19.14	19.61	17.99	18.70	18.45	19.14	19.61
	8H	17.96	18.62	18.43	19.07	19.54	17.96	18.62	18.43	19.07	19.54
	12H	17.94	18.53	18.43	19.01	19.49	17.94	18.53	18.43	19.01	19.49
8H	4H	17.91	18.57	18.38	19.02	19.49	17.91	18.57	18.38	19.02	19.49
	6H	17.87	18.42	18.37	18.91	19.39	17.87	18.42	18.37	18.91	19.39
	8H	17.85	18.34	18.37	18.86	19.35	17.85	18.34	18.37	18.86	19.35
	12H	17.84	18.29	18.36	18.78	19.35	17.84	18.29	18.36	18.78	19.35
12H	4H	17.87	18.45	18.35	18.94	19.41	17.87	18.45	18.35	18.94	19.41
	6H	17.82	18.31	18.34	18.83	19.32	17.82	18.31	18.34	18.83	19.32
	8H	17.82	18.26	18.33	18.76	19.32	17.82	18.26	18.33	18.76	19.32