

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: P866922

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

Issue Date: 8/20/2024

**Test Information**

Test Method: LM-79-2019  
Report Number: P866922  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2304-993-70)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 8/20/2024  
Manufacturer: COOPER LIGHTING SOLUTIONS  
Product Line: Pentalux  
Catalog Number: PRLX-2002-L-927-100L-G-X-X-GREY-X  
Description: PRENTALUX 3D PRINTED PENDANT LED LUMINAIRE, LARGE LIGHT ENGINE, GLOBE LENS, TRUNCATED DOME WITH GRAY INTERIOR SHADE.  
LIGHT LEVEL 6  
Light Source: 3000K CCT, 90 CRI LEDS  
Ballast/Driver: -

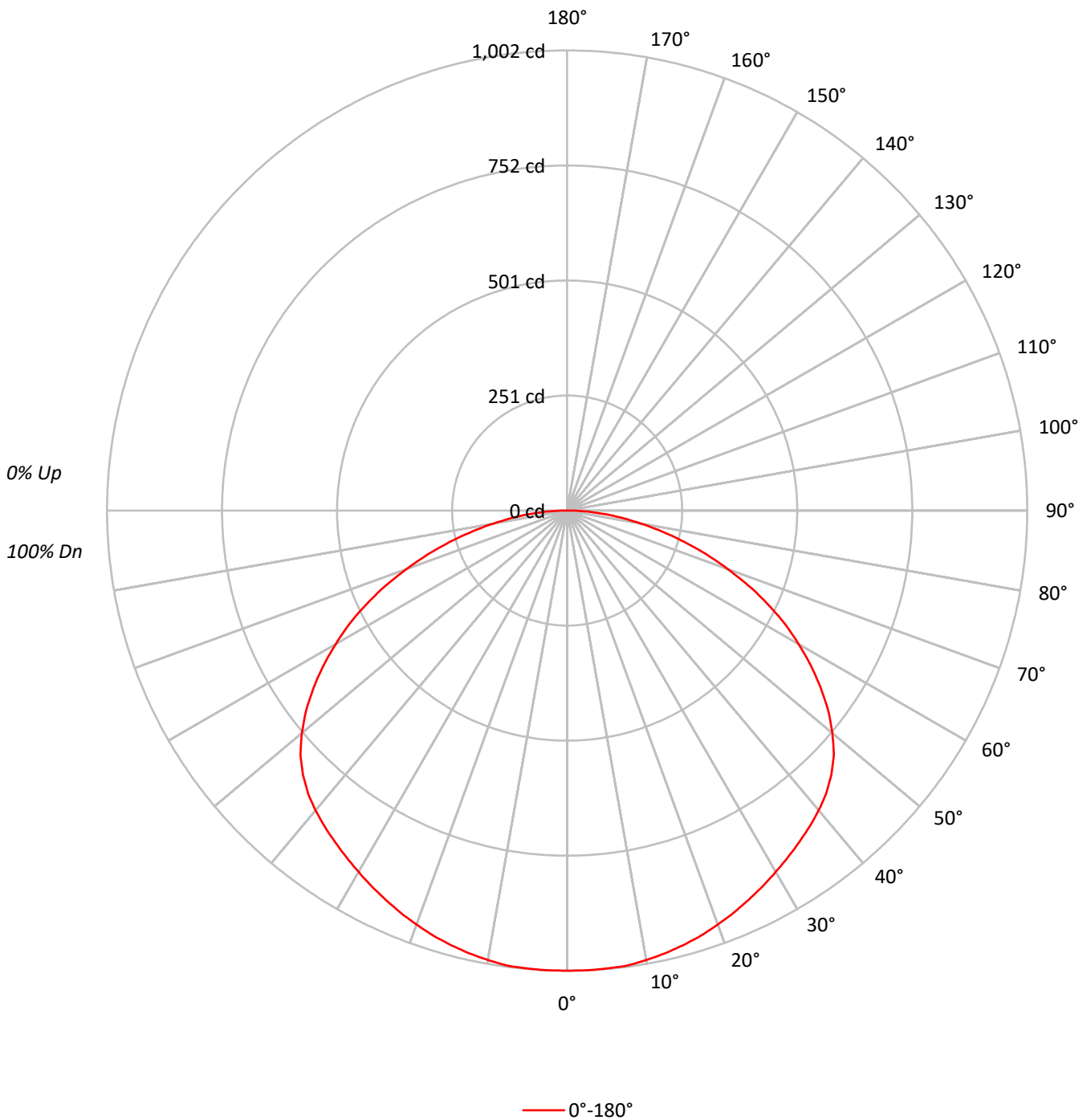
**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3426.0 lumens  
Efficiency: N/A  
Efficacy: 43.1 lumens/watt  
Spacing Criteria (0/90/45): 1.36 / 1.36 / 1.52  
Luminous Opening: Circular (Dia: 1.67' x H: 0')  
CIE Type: Direct  
  
Input Watts (W): 79.4  
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: 0.5 HR  
Operation Time: 3 HR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT

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

### 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	101	96	93	96	93	90		92	89	87		89	86	84	82
2	98	89	82	75	95	87	80	75	83	78	73		80	75	71		77	73	69	67
3	88	77	69	62	86	76	68	61	73	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	50	44	57	49	43		55	48	43		53	47	42	40
6	68	54	45	38	66	53	44	38	51	43	37		50	42	37		48	42	37	35
7	63	49	40	33	61	48	39	33	46	39	33		45	38	33		44	37	32	30
8	58	44	36	29	57	44	35	29	42	35	29		41	34	29		40	33	29	27
9	54	41	32	26	53	40	32	26	39	31	26		38	31	26		37	30	26	24
10	51	37	29	24	50	37	29	24	36	29	24		35	28	23		34	28	23	22

**AVERAGE LUMINANCE (cd/sqm):**

	0°
0°	4943
5°	4958
10°	4979
15°	5002
20°	5036
25°	5090
30°	5176
35°	5307
40°	5488
45°	5676
50°	5787
55°	5800
60°	5749
65°	5627
70°	5363
75°	5046
80°	4640
85°	4280

**MAXIMUM LUMINANCE 45°-90°:**

Horizontal Angle: 0°  
 Vertical Angle: 52.5°  
 Luminance: 5810 cd/sqm

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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	95.4	2.8
10°-20°	276.8	8.1
20°-30°	432.0	12.6
30°-40°	552.7	16.1
40°-50°	626.2	18.3
50°-60°	601.8	17.6
60°-70°	475.5	13.9
70°-80°	280.4	8.2
80°-90°	85.3	2.5
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°	804.2	23.5
0°-40°	1356.9	39.6
0°-60°	2584.8	75.4
0°-90°	3426.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3426.0	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	1002	
5°	1001	95
15°	979	277
25°	935	432
35°	881	553
45°	814	626
55°	674	602
65°	482	476
75°	265	280
85°	76	85
90°	0	

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**CANDELA DISTRIBUTION (FULL):**

	0°
0°	1001.8
2.5°	1001.8
5°	1001.0
7.5°	999.4
10°	993.8
12.5°	987.3
15°	979.3
17.5°	970.4
20°	959.2
22.5°	947.9
25°	935.0
27.5°	922.1
30°	908.5
32.5°	894.8
35°	881.1
37.5°	867.4
40°	852.1
42.5°	835.2
45°	813.5
47.5°	787.8
50°	754.0
52.5°	716.9
55°	674.3
57.5°	630.0
60°	582.6
62.5°	534.3
65°	482.0
67.5°	428.1
70°	371.8
72.5°	318.6
75°	264.7
77.5°	212.4
80°	163.3
82.5°	117.5
85°	75.6
87.5°	38.6
90°	0.0



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**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	18.56	20.26	18.92	20.58	20.89	18.56	20.26	18.92	20.58	20.89
	3H	20.47	22.02	20.85	22.35	22.71	20.47	22.02	20.85	22.35	22.71
	4H	21.19	22.66	21.59	23.00	23.38	21.19	22.66	21.59	23.00	23.38
	6H	21.74	23.10	22.15	23.46	23.85	21.74	23.10	22.15	23.46	23.85
	8H	21.93	23.23	22.35	23.62	24.01	21.93	23.23	22.35	23.62	24.01
	12H	22.06	23.31	22.49	23.69	24.12	22.06	23.31	22.49	23.69	24.12
4H	2H	19.24	20.70	19.64	21.05	21.42	19.24	20.70	19.64	21.05	21.42
	3H	21.37	22.61	21.78	23.00	23.40	21.37	22.61	21.78	23.00	23.40
	4H	22.22	23.34	22.65	23.76	24.19	22.22	23.34	22.65	23.76	24.19
	6H	22.90	23.89	23.35	24.32	24.78	22.90	23.89	23.35	24.32	24.78
	8H	23.14	24.06	23.60	24.51	24.97	23.14	24.06	23.60	24.51	24.97
	12H	23.33	24.16	23.81	24.64	25.10	23.33	24.16	23.81	24.64	25.10
8H	4H	22.57	23.49	23.03	23.93	24.39	22.57	23.49	23.03	23.93	24.39
	6H	23.38	24.15	23.87	24.63	25.11	23.38	24.15	23.87	24.63	25.11
	8H	23.70	24.39	24.21	24.89	25.38	23.70	24.39	24.21	24.89	25.38
	12H	23.98	24.59	24.48	25.08	25.63	23.98	24.59	24.48	25.08	25.63
12H	4H	22.61	23.44	23.09	23.92	24.39	22.61	23.44	23.09	23.92	24.39
	6H	23.45	24.14	23.95	24.65	25.13	23.45	24.14	23.95	24.65	25.13
	8H	23.83	24.45	24.34	24.94	25.49	23.83	24.45	24.34	24.94	25.49