

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: P980151

Luminaire Tested: PRLX-242-940-18L-C-U-S-WHTE-X

Issue Date: 4/3/2025

Test Information

Test Method: LM-79-2019
Report Number: P980151
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2502-353-21)
Test Lab: COOPER LIGHTING SOLUTIONS
Issue Date: 4/3/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: PrentaLux
Catalog Number: PRLX-242-940-18L-C-U-S-WHTE-X
Description: 3D PRINTED LUMINAIRE, INTEGRAL LED LIGHT ENGINE, WHITE 242 SHADE WITH CLEAR LENS
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

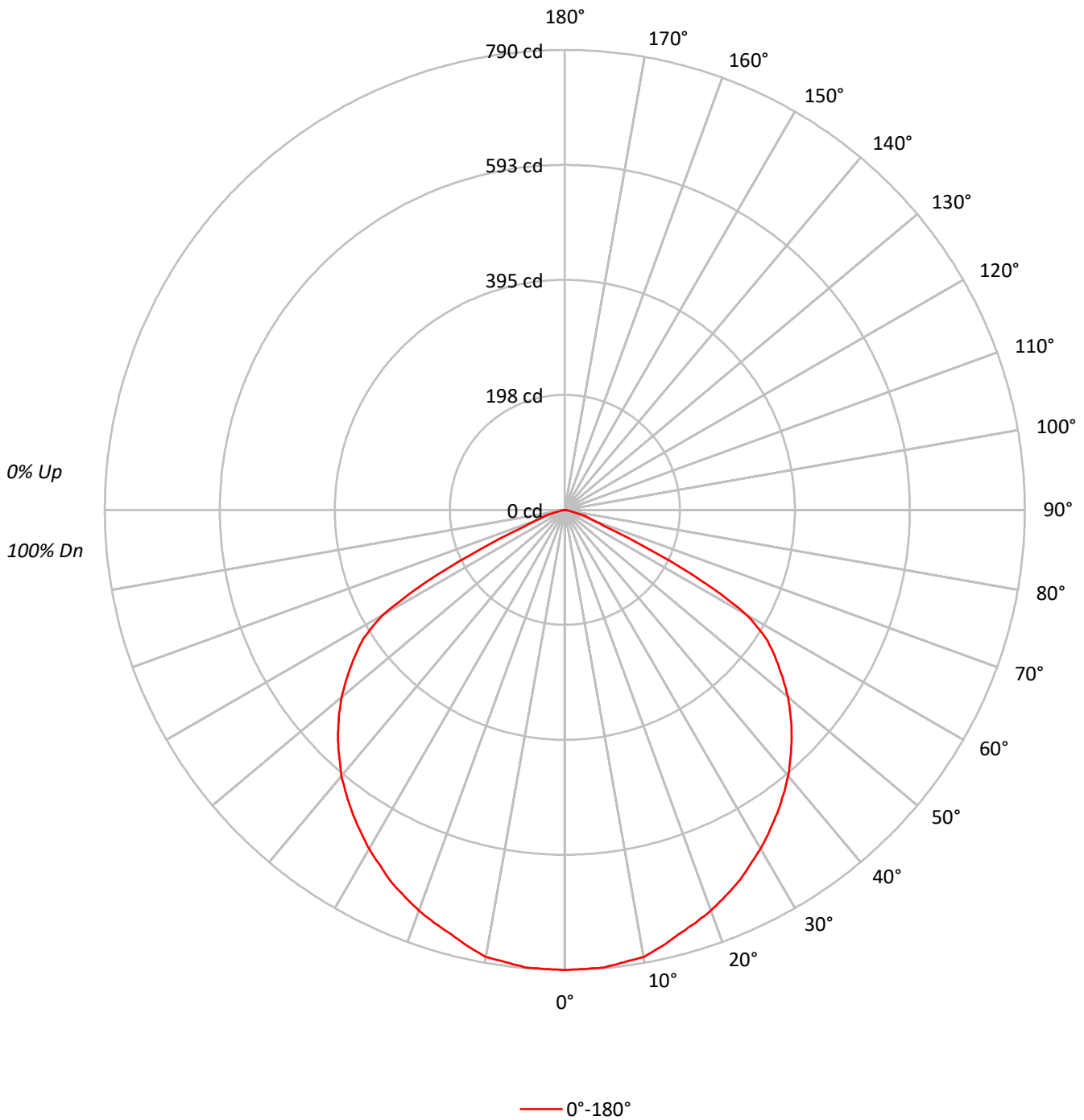
Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2025.4 lumens
Efficiency: N/A
Efficacy: 184.1 lumens/watt
Spacing Criteria (0/90/45): 1.27 / 1.27 / 1.4
Luminous Opening: Circular (Dia: 1.75' x H: 0')
CIE Type: Direct

Input Watts (W): 11
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: 24 FT

TEST NUMBER: P980151
CATALOG NUMBER: PRLX-242-940-18L-C-U-S-WHTE-X

Luminous Intensity Polar Plot





TEST NUMBER: P980151

CATALOG NUMBER: PRLX-242-940-18L-C-U-S-WHTE-X

COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	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	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	111	107	103	100	108	104	101	98	100	98	95	96	94	92	93	91	90	88																												
2	102	95	89	84	99	93	87	83	89	85	81	86	82	79	83	80	77	75																												
3	93	84	76	71	91	82	75	70	79	74	69	77	72	68	74	70	66	64																												
4	86	75	67	60	83	73	66	60	71	64	59	69	63	58	67	62	58	56																												
5	79	67	58	52	77	66	58	52	64	57	51	62	56	51	60	55	50	48																												
6	73	60	52	46	71	59	51	45	57	50	45	56	49	45	54	49	44	42																												
7	68	55	46	40	66	54	46	40	52	45	40	51	44	40	49	44	39	37																												
8	63	50	42	36	61	49	41	36	48	41	36	47	40	35	45	40	35	33																												
9	59	46	38	32	57	45	37	32	44	37	32	43	36	32	42	36	32	30																												
10	55	42	34	29	54	42	34	29	41	34	29	40	33	29	39	33	29	27																												

AVERAGE LUMINANCE (cd/sqm):

	0°
0°	3537
5°	3543
10°	3544
15°	3497
20°	3488
25°	3484
30°	3474
35°	3474
40°	3485
45°	3487
50°	3481
55°	3440
60°	3234
65°	1655
70°	666
75°	315
80°	59
85°	92

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 3487 cd/sqm



TEST NUMBER: P980151

CATALOG NUMBER: PRLX-242-940-18L-C-U-S-WHTE-X

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	74.9	3.7
10°-20°	213.6	10.5
20°-30°	324.9	16.0
30°-40°	398.1	19.7
40°-50°	424.8	21.0
50°-60°	391.7	19.3
60°-70°	172.4	8.5
70°-80°	23.1	1.1
80°-90°	1.8	0.1
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°	613.4	30.3
0°-40°	1011.5	49.9
0°-60°	1828.1	90.3
0°-90°	2025.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2025.4	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	790	
5°	789	75
15°	755	214
25°	706	325
35°	636	398
45°	551	425
55°	441	392
65°	156	172
75°	18	23
85°	2	2
90°	0	

TEST NUMBER: P980151

CATALOG NUMBER: PRLX-242-940-18L-C-U-S-WHTE-X

CANDELA DISTRIBUTION (FULL):

0°	
0°	790.4
2.5°	789.3
5°	788.7
7.5°	783.4
10°	779.9
12.5°	768.2
15°	754.7
17.5°	744.2
20°	732.5
22.5°	719.0
25°	705.5
27.5°	688.0
30°	672.2
32.5°	654.0
35°	635.9
37.5°	616.5
40°	596.6
42.5°	573.8
45°	551.0
47.5°	526.4
50°	500.0
52.5°	470.7
55°	440.9
57.5°	409.3
60°	361.3
62.5°	268.7
65°	156.3
67.5°	72.6
70°	50.9
72.5°	38.1
75°	18.2
77.5°	5.3
80°	2.3
82.5°	2.3
85°	1.8
87.5°	1.2
90°	0.0



TEST NUMBER: P980151
 CATALOG NUMBER: PRLX-242-940-18L-C-U-S-WHTE-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	17.23	18.78	17.59	19.09	19.41	17.23	18.78	17.59	19.09	19.41
	3H	17.27	18.65	17.65	18.98	19.34	17.27	18.65	17.65	18.98	19.34
	4H	17.24	18.53	17.64	18.87	19.25	17.24	18.53	17.64	18.87	19.25
	6H	17.18	18.36	17.59	18.73	19.12	17.18	18.36	17.59	18.73	19.12
	8H	17.15	18.27	17.57	18.66	19.06	17.15	18.27	17.57	18.66	19.06
	12H	17.12	18.19	17.55	18.57	19.00	17.12	18.19	17.55	18.57	19.00
4H	2H	17.32	18.61	17.72	18.96	19.33	17.32	18.61	17.72	18.96	19.33
	3H	17.41	18.46	17.82	18.86	19.26	17.41	18.46	17.82	18.86	19.26
	4H	17.38	18.31	17.81	18.73	19.17	17.38	18.31	17.81	18.73	19.17
	6H	17.32	18.13	17.78	18.57	19.03	17.32	18.13	17.78	18.57	19.03
	8H	17.28	18.03	17.74	18.47	18.94	17.28	18.03	17.74	18.47	18.94
	12H	17.24	17.91	17.73	18.39	18.86	17.24	17.91	17.73	18.39	18.86
8H	4H	17.29	18.04	17.75	18.49	18.95	17.29	18.04	17.75	18.49	18.95
	6H	17.21	17.83	17.71	18.32	18.80	17.21	17.83	17.71	18.32	18.80
	8H	17.16	17.71	17.67	18.22	18.71	17.16	17.71	17.67	18.22	18.71
	12H	17.12	17.61	17.63	18.11	18.67	17.12	17.61	17.63	18.11	18.67
12H	4H	17.26	17.92	17.74	18.40	18.88	17.26	17.92	17.74	18.40	18.88
	6H	17.16	17.71	17.67	18.22	18.71	17.16	17.71	17.67	18.22	18.71
	8H	17.12	17.61	17.63	18.11	18.67	17.12	17.61	17.63	18.11	18.67