

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: NEO-RAY

Report Number: P1057917

Luminaire Tested: S122RDR-S290D930-X4F0-XX-UDD-BVL-W

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1057917
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-57)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDR-S290D930-X4F0-XX-UDD-BVL-W
Description: DEFINE 2 WHITE REGRESSED DIRECT RECESSED HOUSING WITH BLACK STRAIGHT BLADE LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

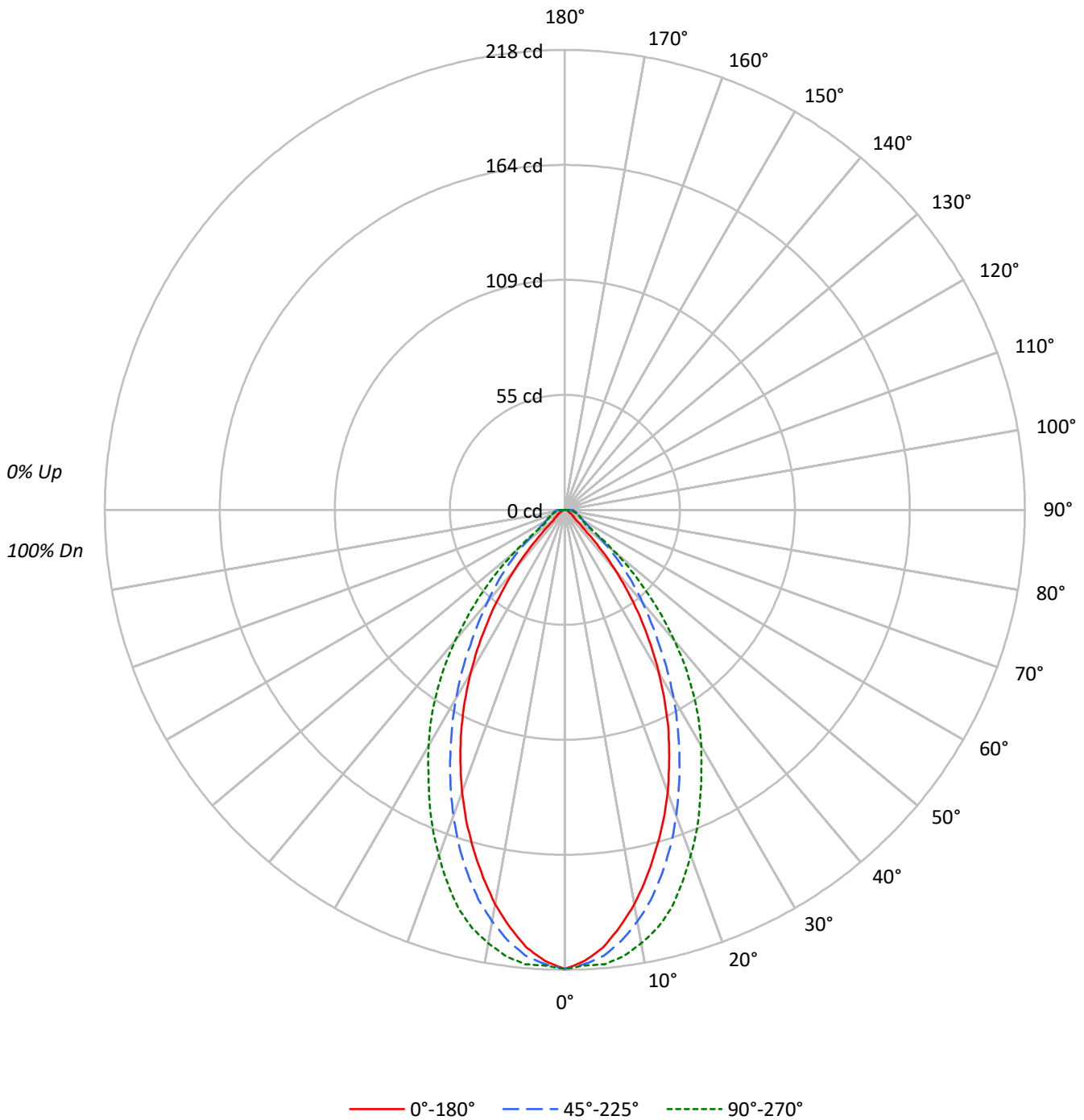
Lumens per Lamp: N/A
Luminaire Lumens: 236.9 lumens
Efficiency: N/A
Efficacy: 18.9 lumens/watt
Spacing Criteria (0/90/45): 0.78 / 0.96 / 0.91
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 12.5
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

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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									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	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	101	102	100	97	98	96	95	95	93	92	90																												
2	105	99	94	90	102	97	92	89	94	90	87	91	87	85	88	85	83	81																												
3	98	91	85	80	96	89	84	79	86	82	78	84	80	76	81	78	75	74																												
4	92	83	77	72	90	82	76	71	80	75	70	78	73	70	76	72	69	67																												
5	87	77	70	65	85	76	70	65	74	69	64	72	67	64	71	66	63	61																												
6	82	72	65	60	80	71	64	59	69	63	59	68	62	58	66	62	58	56																												
7	77	67	60	55	76	66	59	55	64	59	54	63	58	54	62	57	54	52																												
8	73	62	55	51	72	62	55	51	60	54	50	59	54	50	58	53	50	48																												
9	69	58	52	47	68	58	51	47	57	51	47	56	50	47	55	50	46	45																												
10	66	55	48	44	64	54	48	44	53	48	44	53	47	43	52	47	43	42																												

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4015	4015	4015
5°	3856	3929	4005
10°	3556	3712	3909
15°	3186	3406	3731
20°	2796	3030	3425
25°	2368	2616	3091
30°	1898	2197	2753
35°	1403	1757	2386
40°	882	1375	1937
45°	344	1036	1435
50°	169	700	878
55°	135	460	392
60°	103	373	358
65°	74	349	349
70°	92	356	356
75°	100	399	371
80°	149	521	404
85°	296	889	593

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 22.5°
 Vertical Angle: 87.5°
 Luminance: 1608 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	19.9	8.4
10°-20°	50.3	21.2
20°-30°	60.1	25.4
30°-40°	50.6	21.4
40°-50°	28.8	12.2
50°-60°	11.4	4.8
60°-70°	7.2	3.0
70°-80°	5.3	2.2
80°-90°	3.4	1.4
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°	130.2	55.0
0°-40°	180.8	76.4
0°-60°	221.0	93.3
0°-90°	236.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	236.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	218	218	218	218	218	
5°	208	213	212	214	216	19
15°	167	173	178	189	195	47
25°	116	122	128	142	152	53
35°	62	68	78	95	106	39
45°	13	23	40	50	55	12
55°	4	9	14	15	12	4
65°	2	8	8	8	8	2
75°	1	6	6	5	5	2
85°	1	4	4	4	3	1
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	217.6	217.6	217.6	217.6	217.6
2.5°	214.1	218.0	215.5	215.9	216.2
5°	208.2	212.7	212.1	214.5	216.2
7.5°	199.5	204.4	206.1	210.3	213.4
10°	189.8	195.3	198.1	204.7	208.6
12.5°	178.6	184.9	189.1	197.4	203.0
15°	166.8	172.7	178.3	188.7	195.3
17.5°	154.9	160.9	166.8	178.3	185.2
20°	142.4	148.0	154.3	166.4	174.4
22.5°	129.2	135.1	141.4	153.9	163.7
25°	116.3	121.5	128.5	141.7	151.8
27.5°	102.7	107.9	115.6	129.2	140.0
30°	89.1	94.4	103.1	117.0	129.2
32.5°	75.6	81.1	90.5	105.9	118.0
35°	62.3	67.9	78.0	94.7	105.9
37.5°	49.4	55.7	66.9	83.2	93.7
40°	36.6	43.9	57.1	71.7	80.4
42.5°	24.4	33.4	48.1	60.2	67.6
45°	13.2	23.3	39.7	49.8	55.0
47.5°	7.3	15.0	31.7	39.7	42.8
50°	5.9	10.4	24.4	30.3	30.6
52.5°	4.9	9.4	18.1	21.6	19.8
55°	4.2	9.1	14.3	14.6	12.2
57.5°	3.5	8.7	11.8	10.4	10.4
60°	2.8	8.7	10.1	9.4	9.7
62.5°	2.1	8.7	9.1	8.4	8.7
65°	1.7	8.0	8.0	7.7	8.0
67.5°	1.7	7.3	7.3	7.0	7.3
70°	1.7	7.0	6.6	6.6	6.6
72.5°	1.4	6.3	6.3	5.9	5.9
75°	1.4	5.6	5.6	5.2	5.2
77.5°	1.4	5.2	5.2	4.9	4.5
80°	1.4	4.5	4.9	4.5	3.8
82.5°	1.4	4.2	4.5	4.2	3.1
85°	1.4	3.8	4.2	3.8	2.8
87.5°	1.0	3.8	3.8	3.1	2.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)