

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: P1058031

Luminaire Tested: S122RDR-S485D950-X4F0-XX-UDD-WVL-W

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1058031
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-55)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122RDR-S485D950-X4F0-XX-UDD-WVL-W
Description: DEFINE 2 WHITE REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 5000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

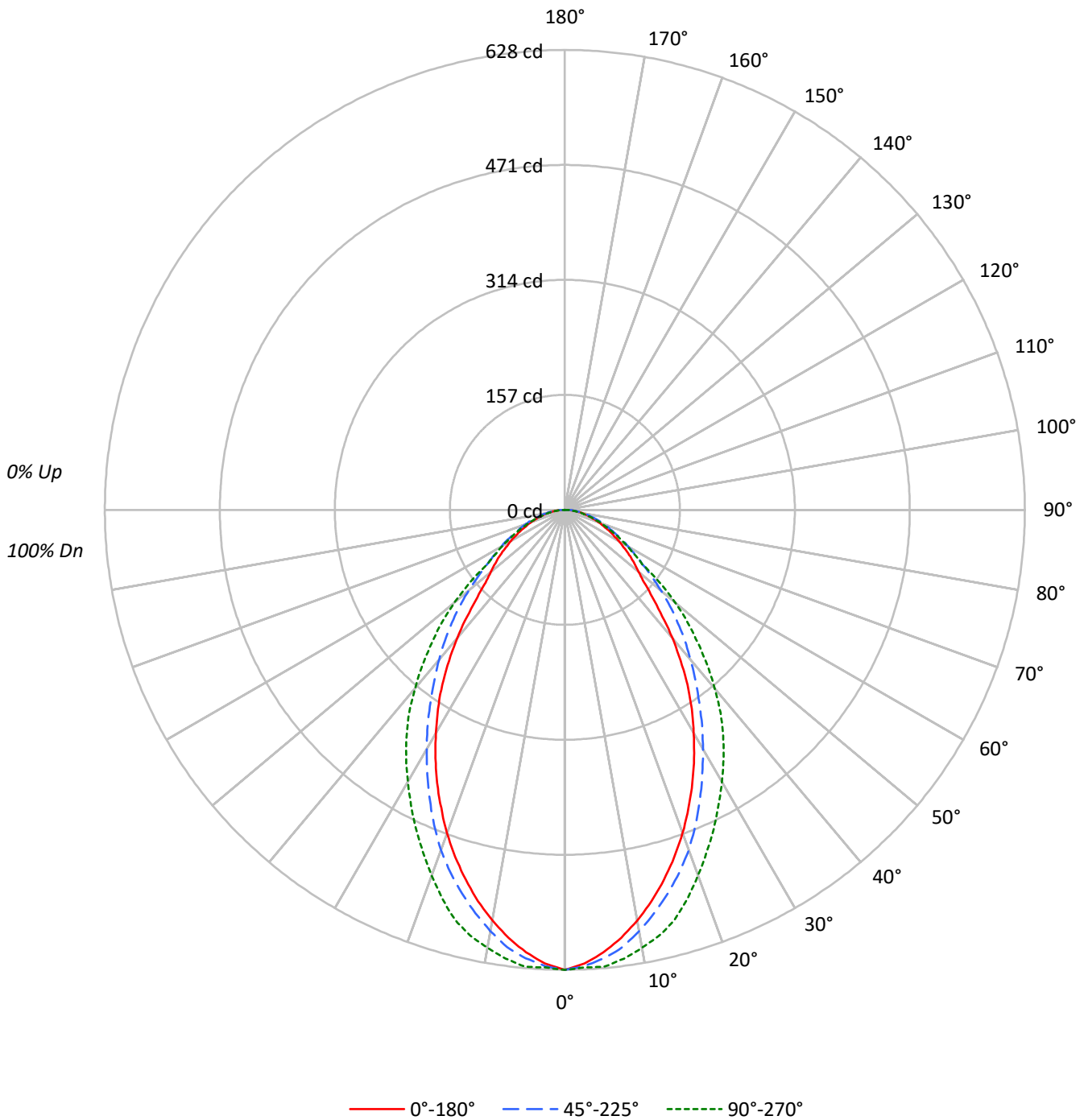
Lumens per Lamp: N/A
Luminaire Lumens: 1024.0 lumens
Efficiency: N/A
Efficacy: 52.2 lumens/watt
Spacing Criteria (0/90/45): 0.91 / 1.05 / 1.05
Luminous Opening: Rectangular (W 0.15' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 19.6
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	
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	110	106	103	100	108	104	101	98	100	97	95	96	94	92	93	91	89	87
2	102	95	89	84	100	93	88	83	90	85	81	87	83	80	84	81	78	76
3	94	85	78	73	92	84	77	72	81	75	71	78	74	70	76	72	68	67
4	88	77	69	64	85	76	69	63	73	67	62	71	66	62	69	65	61	59
5	81	70	62	56	80	69	62	56	67	60	55	65	59	55	63	58	54	52
6	76	64	56	50	74	63	56	50	61	55	50	60	54	49	58	53	49	47
7	71	59	51	46	69	58	51	45	57	50	45	55	49	45	54	49	44	43
8	67	54	47	41	65	54	46	41	52	46	41	51	45	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	40	35	58	46	39	35	46	39	35	45	39	35	44	38	34	33

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	11590	11590	11590
5°	11234	11384	11597
10°	10669	10946	11377
15°	9987	10362	11070
20°	9231	9708	10437
25°	8388	8883	9791
30°	7498	8031	9139
35°	6573	7197	8490
40°	5499	6427	7662
45°	4408	5694	6699
50°	3781	4906	5624
55°	3455	4173	4150
60°	3141	3690	3613
65°	2860	3301	3157
70°	2622	3027	2805
75°	2453	2795	2453
80°	2295	2582	2157
85°	2287	2710	1863

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 6699 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	58.0	5.7
10°-20°	153.5	15.0
20°-30°	202.5	19.8
30°-40°	203.9	19.9
40°-50°	166.0	16.2
50°-60°	113.1	11.0
60°-70°	73.4	7.2
70°-80°	40.4	3.9
80°-90°	13.2	1.3
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°	414.0	40.4
0°-40°	617.9	60.3
0°-60°	897.0	87.6
0°-90°	1024.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1024.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	628	628	628	628	628	
5°	606	618	615	620	626	57
15°	523	536	542	565	580	146
25°	412	426	436	456	481	189
35°	292	307	320	347	377	181
45°	169	190	218	237	257	133
55°	107	118	130	130	129	96
65°	66	78	76	72	72	65
75°	34	43	39	35	34	36
85°	11	14	13	10	9	12
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	628.1	628.1	628.1	628.1	628.1
2.5°	620.0	630.2	623.4	624.1	625.4
5°	606.5	618.0	614.6	620.0	626.1
7.5°	589.6	601.1	602.5	610.6	618.0
10°	569.4	582.2	584.2	596.4	607.2
12.5°	547.1	561.3	564.0	581.5	595.7
15°	522.8	536.3	542.4	564.6	579.5
17.5°	497.1	509.9	519.4	539.7	556.5
20°	470.1	482.2	494.4	512.6	531.5
22.5°	441.0	454.5	466.0	484.3	505.9
25°	412.0	425.5	436.3	455.9	480.9
27.5°	382.3	395.8	406.6	427.5	454.5
30°	351.9	366.1	376.9	400.5	428.9
32.5°	322.2	336.4	348.5	373.5	403.2
35°	291.8	306.6	319.5	347.2	376.9
37.5°	259.4	276.2	292.5	320.1	349.2
40°	228.3	247.2	266.8	292.5	318.1
42.5°	197.2	218.2	242.5	264.1	287.7
45°	168.9	189.8	218.2	237.1	256.7
47.5°	146.6	164.1	194.5	210.1	227.6
50°	131.7	143.9	170.9	183.0	195.9
52.5°	119.5	129.7	148.6	156.7	163.4
55°	107.4	118.2	129.7	130.4	129.0
57.5°	95.2	107.4	113.5	108.7	111.4
60°	85.1	97.3	100.0	95.2	97.9
62.5°	74.3	87.8	87.8	83.1	84.4
65°	65.5	77.7	75.6	71.6	72.3
67.5°	56.7	68.9	65.5	61.5	61.5
70°	48.6	60.1	56.1	52.0	52.0
72.5°	41.2	50.7	48.0	43.2	42.6
75°	34.4	42.6	39.2	35.1	34.4
77.5°	27.7	34.4	31.7	28.4	27.0
80°	21.6	27.7	24.3	21.6	20.3
82.5°	16.2	20.9	18.2	15.5	14.2
85°	10.8	14.2	12.8	10.1	8.8
87.5°	5.4	9.5	8.1	6.8	5.4
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)