

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



Scaled data based on original data using
LM-79-2024 Approved Method: Electrical and Photometric Measurements of Solid-
State Lighting Products

Test Report Prepared for
Cooper Lighting Solutions

Brand: NEO-RAY

Report Number: P1061837

Luminaire Tested: S125RDRP-S850D950-X4F0-XX-UDD-WVL-S

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2024
Report Number: P1061837
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2406-143-85)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S125RDRP-S850D950-X4F0-XX-UDD-WVL-S
Description: DEFINE 5 SILVER REGRESSED DIRECT RECESSED HOUSING WITH WHITE STRAIGHT BLADE
LOUVER WITH DIFFUSER
CORE LIGHT ENGINE
Light Source: 5000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

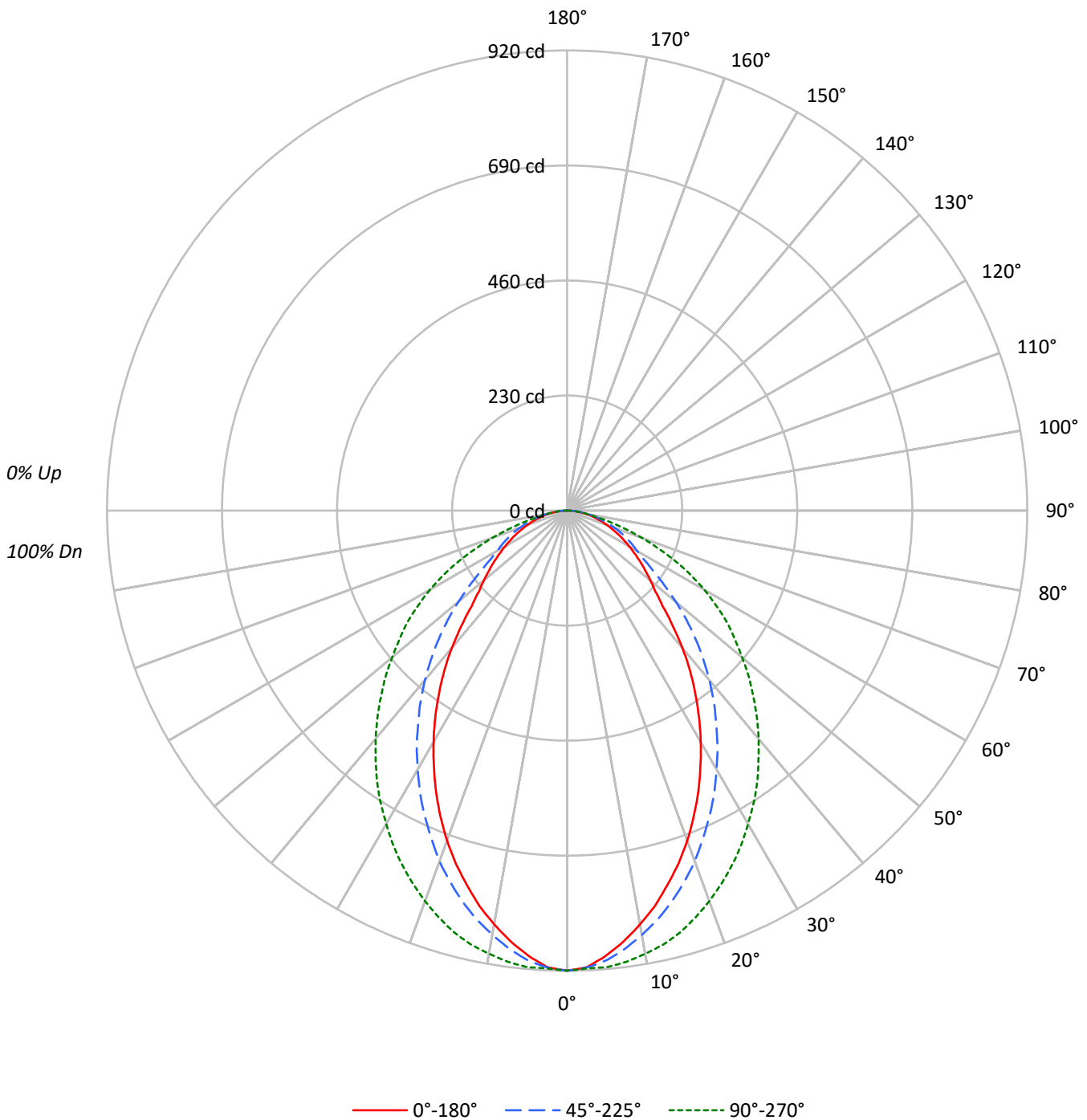
Lumens per Lamp: N/A
Luminaire Lumens: 1724.5 lumens
Efficiency: N/A
Efficacy: 66.8 lumens/watt
Spacing Criteria (0/90/45): 0.94 / 1.18 / 1.12
Luminous Opening: Rectangular (W 0.39' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 25.8
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: 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	102	99	107	104	100	97	99	97	94	96	93	91	92	90	88	86
2	101	94	88	83	99	92	86	82	89	84	80	85	81	78	82	79	76	74
3	93	84	76	71	91	82	75	70	79	74	69	77	72	68	74	70	66	64
4	86	75	67	61	84	74	67	61	72	65	60	69	64	59	67	62	58	56
5	80	68	60	54	78	67	59	53	65	58	53	63	57	52	61	56	52	50
6	74	62	54	48	72	61	53	48	59	52	47	58	52	47	56	51	46	44
7	69	57	49	43	68	56	48	43	54	47	42	53	47	42	52	46	42	40
8	65	52	44	39	63	52	44	39	50	43	38	49	43	38	48	42	38	36
9	61	48	41	35	59	48	40	35	47	40	35	46	39	35	45	39	35	33
10	57	45	37	32	56	44	37	32	43	37	32	42	36	32	42	36	32	30

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	6334	6334	6334
5°	6174	6238	6333
10°	5873	6020	6290
15°	5522	5765	6224
20°	5144	5467	6087
25°	4712	5117	5935
30°	4246	4750	5751
35°	3754	4364	5569
40°	3221	3973	5352
45°	2631	3535	5128
50°	2333	3032	4893
55°	2140	2515	4689
60°	1975	2227	4367
65°	1841	2141	3892
70°	1721	2035	3183
75°	1588	1907	2346
80°	1495	1784	1713
85°	1382	1746	1454

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°
 Vertical Angle: 45°
 Luminance: 5128 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	85.1	4.9
10°-20°	229.3	13.3
20°-30°	315.2	18.3
30°-40°	334.0	19.4
40°-50°	291.6	16.9
50°-60°	221.5	12.8
60°-70°	148.4	8.6
70°-80°	76.5	4.4
80°-90°	22.9	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°	629.6	36.5
0°-40°	963.6	55.9
0°-60°	1476.7	85.6
0°-90°	1724.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1724.5	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	920	920	920	920	920	
5°	893	902	902	909	916	84
15°	775	789	809	845	873	217
25°	620	640	674	730	781	284
35°	447	472	519	593	663	279
45°	270	297	363	449	527	213
55°	178	184	210	308	391	160
65°	113	116	131	176	239	112
75°	60	63	72	76	88	64
85°	18	22	22	20	18	20
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	919.9	919.9	919.9	919.9	919.9
2.5°	913.5	919.9	914.4	914.4	916.3
5°	893.3	902.5	902.5	908.9	916.3
7.5°	868.5	878.6	884.1	898.8	909.8
10°	840.0	851.0	861.1	883.2	899.7
12.5°	809.7	821.6	837.2	865.7	888.7
15°	774.7	789.4	808.7	844.6	873.1
17.5°	739.8	754.5	778.4	820.7	852.9
20°	702.1	717.8	746.2	792.2	830.8
22.5°	661.7	679.2	709.5	761.9	806.9
25°	620.3	639.6	673.6	729.7	781.2
27.5°	577.1	600.1	636.9	696.6	753.6
30°	534.0	556.9	597.4	662.6	723.3
32.5°	490.8	515.6	559.7	628.6	693.9
35°	446.6	472.4	519.2	592.8	662.6
37.5°	403.5	429.2	481.6	557.8	628.6
40°	358.4	385.1	442.0	522.0	595.5
42.5°	312.5	341.0	402.5	485.2	561.5
45°	270.2	296.8	363.0	449.4	526.6
47.5°	238.9	256.4	323.5	412.6	492.6
50°	217.8	227.0	283.1	376.8	456.8
52.5°	196.7	204.0	245.4	340.0	422.7
55°	178.3	183.8	209.5	307.9	390.6
57.5°	159.9	165.4	182.0	275.7	352.9
60°	143.4	148.0	161.7	241.7	317.1
62.5°	127.7	131.4	146.1	209.5	278.5
65°	113.0	115.8	131.4	175.5	238.9
67.5°	98.3	101.1	116.7	143.4	196.7
70°	85.5	86.4	101.1	116.7	158.1
72.5°	72.6	73.5	85.5	94.7	121.3
75°	59.7	63.4	71.7	76.3	88.2
77.5°	48.7	53.3	57.9	59.7	59.7
80°	37.7	43.2	45.0	45.0	43.2
82.5°	27.6	32.2	33.1	31.2	29.4
85°	17.5	22.1	22.1	20.2	18.4
87.5°	8.3	11.9	11.9	11.0	8.3
90°	0.0	0.0	0.0	0.0	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	13.02	14.52	13.38	14.83	15.14	16.95	18.44	17.31	18.76	19.07
	3H	14.59	15.93	14.97	16.26	16.62	18.37	19.71	18.75	20.04	20.40
	4H	15.20	16.46	15.60	16.81	17.19	18.78	20.04	19.18	20.39	20.77
	6H	15.70	16.86	16.11	17.23	17.62	19.00	20.16	19.41	20.53	20.92
	8H	15.87	16.98	16.30	17.37	17.77	19.06	20.17	19.49	20.56	20.96
	12H	16.00	17.06	16.43	17.44	17.87	19.09	20.15	19.52	20.54	20.96
4H	2H	13.76	15.02	14.16	15.36	15.74	17.07	18.33	17.47	18.68	19.06
	3H	15.54	16.58	15.95	16.98	17.38	18.68	19.73	19.09	20.13	20.53
	4H	16.27	17.21	16.70	17.63	18.07	19.21	20.15	19.64	20.57	21.01
	6H	16.91	17.73	17.36	18.17	18.63	19.55	20.37	20.01	20.81	21.27
	8H	17.14	17.90	17.60	18.35	18.81	19.65	20.42	20.12	20.86	21.33
	12H	17.31	17.99	17.79	18.47	18.94	19.73	20.41	20.21	20.89	21.36
8H	4H	16.67	17.44	17.14	17.88	18.35	19.32	20.08	19.78	20.53	20.99
	6H	17.46	18.09	17.96	18.58	19.06	19.76	20.39	20.25	20.88	21.36
	8H	17.78	18.35	18.30	18.86	19.35	19.91	20.48	20.43	20.99	21.48
	12H	18.06	18.56	18.57	19.05	19.62	20.05	20.55	20.56	21.04	21.61
12H	4H	16.72	17.40	17.20	17.88	18.35	19.32	20.00	19.80	20.48	20.95
	6H	17.54	18.11	18.06	18.62	19.11	19.77	20.34	20.29	20.85	21.34
	8H	17.94	18.44	18.45	18.93	19.50	19.98	20.48	20.49	20.97	21.54