

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: NEO-RAY

Report Number: P1061887

Luminaire Tested: S125RDR-H1090D930-X4F0-XX-UDD-SVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1061887
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-47)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S125RDR-H1090D930-X4F0-XX-UDD-SVL-B
Description: DEFINE 5 BLACK REGRESSED DIRECT RECESSED HOUSING WITH SILVER STRAIGHT BLADE
LOUVER WITH DIFFUSER
HIGH PERFORMANCE LIGHT ENGINE
Light Source: 3000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

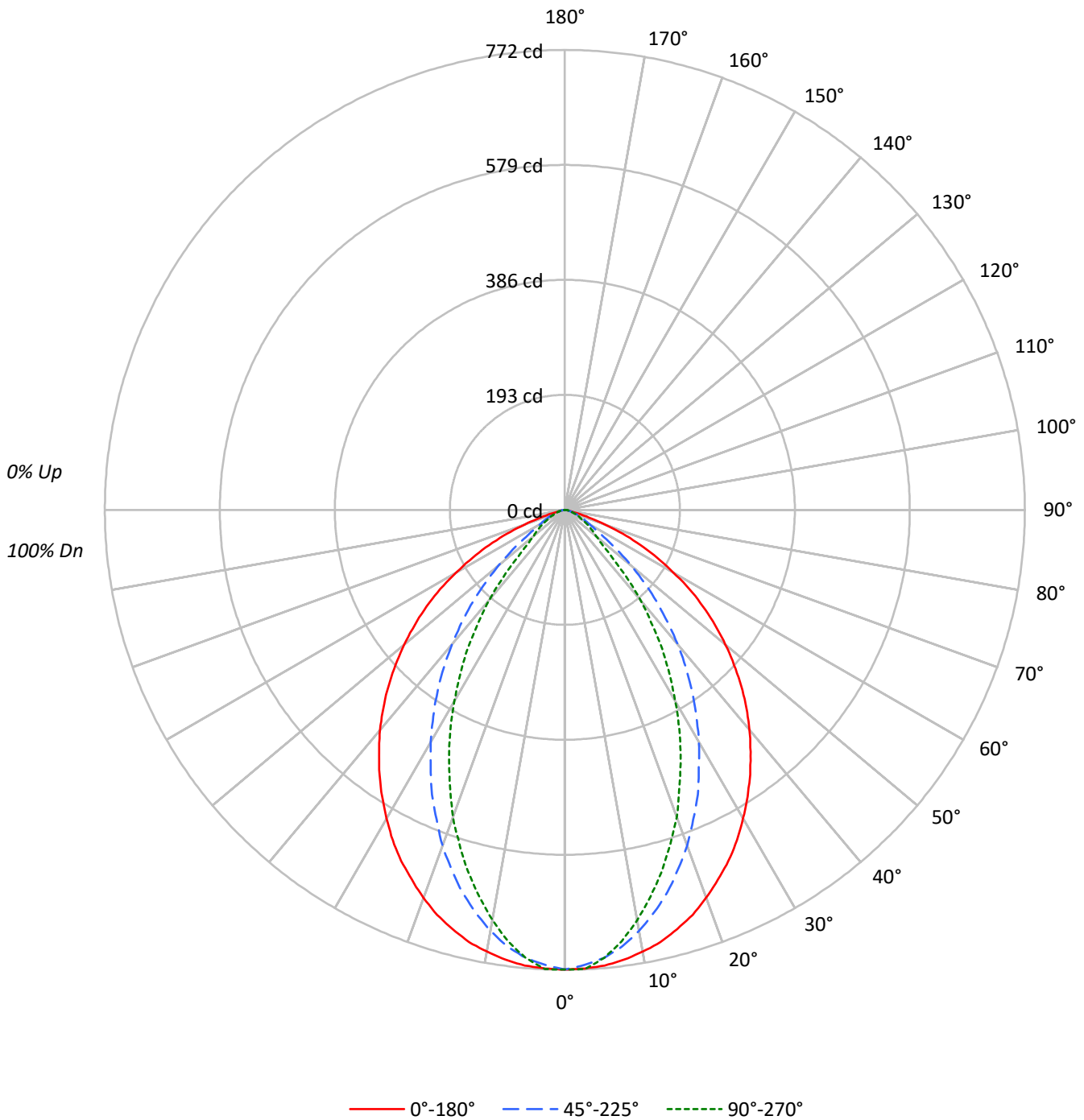
Lumens per Lamp: N/A
Luminaire Lumens: 1115.9 lumens
Efficiency: N/A
Efficacy: 35.8 lumens/watt
Spacing Criteria (0/90/45): 1.16 / 0.85 / 1.01
Luminous Opening: Rectangular (W 0.39' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 31.2
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	112	108	105	102	109	106	103	101	102	100	97	98	96	95	95	93	92	90
2	104	98	93	88	102	96	91	87	93	89	85	90	86	83	87	84	82	80
3	97	89	82	77	95	87	81	77	84	79	75	82	78	74	79	76	73	71
4	90	81	74	68	88	79	73	68	77	71	67	75	70	66	73	69	65	63
5	84	74	66	61	82	73	66	61	71	65	60	69	64	59	67	63	59	57
6	79	68	60	55	77	67	60	55	65	59	54	64	58	54	62	57	53	52
7	74	62	55	50	72	62	55	50	60	54	49	59	53	49	58	53	49	47
8	69	58	50	45	68	57	50	45	56	50	45	55	49	45	54	48	45	43
9	65	54	47	42	64	53	46	42	52	46	41	51	45	41	50	45	41	39
10	62	50	43	38	61	50	43	38	49	43	38	48	42	38	47	42	38	36

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5313	5313	5313
5°	5306	5218	5218
10°	5265	5018	4887
15°	5192	4738	4479
20°	5079	4396	4023
25°	4938	4007	3493
30°	4755	3578	2946
35°	4557	3132	2390
40°	4336	2643	1772
45°	4076	2120	1069
50°	3770	1554	735
55°	3401	953	612
60°	2889	649	486
65°	2284	495	383
70°	1441	354	316
75°	468	261	261
80°	155	194	234
85°	79	158	158

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 4076 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	71.4	6.4
10°-20°	188.5	16.9
20°-30°	247.9	22.2
30°-40°	243.6	21.8
40°-50°	184.3	16.5
50°-60°	111.7	10.0
60°-70°	52.7	4.7
70°-80°	13.8	1.2
80°-90°	2.1	0.2
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°	507.7	45.5
0°-40°	751.3	67.3
0°-60°	1047.3	93.9
0°-90°	1115.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1115.9	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	772	772	772	772	772	
5°	768	766	755	756	755	73
15°	728	709	665	639	628	205
25°	650	601	528	478	460	299
35°	542	470	373	307	284	339
45°	419	329	218	138	110	322
55°	283	194	79	54	51	252
65°	140	72	30	26	24	138
75°	18	12	10	10	10	27
85°	1	1	2	2	2	1
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	771.6	771.6	771.6	771.6	771.6
2.5°	770.6	770.6	764.7	771.6	771.6
5°	767.7	765.7	754.9	755.9	754.9
7.5°	761.8	757.9	739.2	734.3	730.4
10°	753.0	745.1	717.7	705.9	699.0
12.5°	743.2	729.4	692.2	675.5	664.7
15°	728.4	708.8	664.7	639.2	628.4
17.5°	712.8	684.3	632.4	602.0	588.2
20°	693.2	659.8	600.0	562.8	549.0
22.5°	671.6	632.4	562.8	521.6	503.0
25°	650.0	601.0	527.5	478.4	459.8
27.5°	625.5	569.6	487.3	436.3	415.7
30°	598.1	538.2	450.0	397.1	370.6
32.5°	570.6	505.9	410.8	352.9	326.5
35°	542.2	469.6	372.6	306.9	284.3
37.5°	511.8	435.3	333.3	264.7	238.2
40°	482.4	401.0	294.1	221.6	197.1
42.5°	451.0	366.7	254.9	179.4	152.0
45°	418.6	329.4	217.7	138.2	109.8
47.5°	385.3	296.1	180.4	102.0	82.4
50°	352.0	260.8	145.1	75.5	68.6
52.5°	317.7	226.5	109.8	62.7	59.8
55°	283.3	194.1	79.4	53.9	51.0
57.5°	248.0	158.8	59.8	46.1	43.1
60°	209.8	127.5	47.1	38.2	35.3
62.5°	174.5	100.0	38.2	31.4	29.4
65°	140.2	71.6	30.4	25.5	23.5
67.5°	104.9	48.0	23.5	19.6	19.6
70°	71.6	31.4	17.6	15.7	15.7
72.5°	43.1	18.6	12.7	12.7	12.7
75°	17.6	11.8	9.8	9.8	9.8
77.5°	5.9	6.9	6.9	7.8	7.8
80°	3.9	3.9	4.9	5.9	5.9
82.5°	2.0	2.9	2.9	3.9	3.9
85°	1.0	1.0	2.0	2.0	2.0
87.5°	0.0	0.0	0.0	1.0	1.0
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	15.13	16.46	15.50	16.77	17.09	5.79	7.12	6.15	7.43	7.75
	3H	15.84	17.01	16.22	17.34	17.71	6.57	7.75	6.95	8.08	8.44
	4H	15.85	16.95	16.26	17.30	17.68	6.82	7.91	7.22	8.26	8.65
	6H	15.78	16.79	16.20	17.16	17.55	6.99	8.00	7.41	8.37	8.76
	8H	15.74	16.69	16.17	17.09	17.49	7.04	7.99	7.47	8.38	8.79
	12H	15.70	16.61	16.13	16.99	17.42	7.05	7.96	7.48	8.34	8.77
4H	2H	14.96	16.06	15.36	16.41	16.79	6.28	7.37	6.68	7.72	8.10
	3H	15.71	16.60	16.12	17.00	17.41	7.18	8.07	7.59	8.48	8.88
	4H	15.73	16.52	16.16	16.94	17.38	7.49	8.29	7.93	8.71	9.15
	6H	15.66	16.35	16.13	16.79	17.26	7.75	8.44	8.22	8.88	9.35
	8H	15.61	16.25	16.08	16.70	17.17	7.82	8.46	8.29	8.90	9.37
	12H	15.57	16.13	16.06	16.62	17.09	7.84	8.41	8.33	8.89	9.36
8H	4H	15.61	16.25	16.08	16.69	17.16	7.61	8.24	8.08	8.69	9.16
	6H	15.53	16.05	16.04	16.55	17.03	7.92	8.44	8.43	8.94	9.42
	8H	15.48	15.95	16.00	16.46	16.95	8.03	8.49	8.55	9.01	9.50
	12H	15.44	15.85	15.95	16.35	16.92	8.09	8.50	8.61	9.00	9.57
12H	4H	15.56	16.13	16.05	16.61	17.08	7.58	8.14	8.06	8.62	9.10
	6H	15.48	15.94	16.00	16.46	16.95	7.89	8.36	8.42	8.88	9.37
	8H	15.44	15.85	15.96	16.35	16.92	8.03	8.44	8.55	8.94	9.51