

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: P1062064

Luminaire Tested: S125RDR-H375D940-X4F0-XX-UDD-BVL-B

Issue Date: 8/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1062064
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2406-143-48)
Test Lab: INNOVATION CENTER
Issue Date: 8/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S125RDR-H375D940-X4F0-XX-UDD-BVL-B
Description: DEFINE 5 BLACK REGRESSED DIRECT RECESSED HOUSING WITH BLACK STRAIGHT BLADE LOUVER WITH DIFFUSER
HIGH PERFORMANCE LIGHT ENGINE
Light Source: 4000K CCT, 90 CRI LEDS
Ballast/Driver: -

Summary

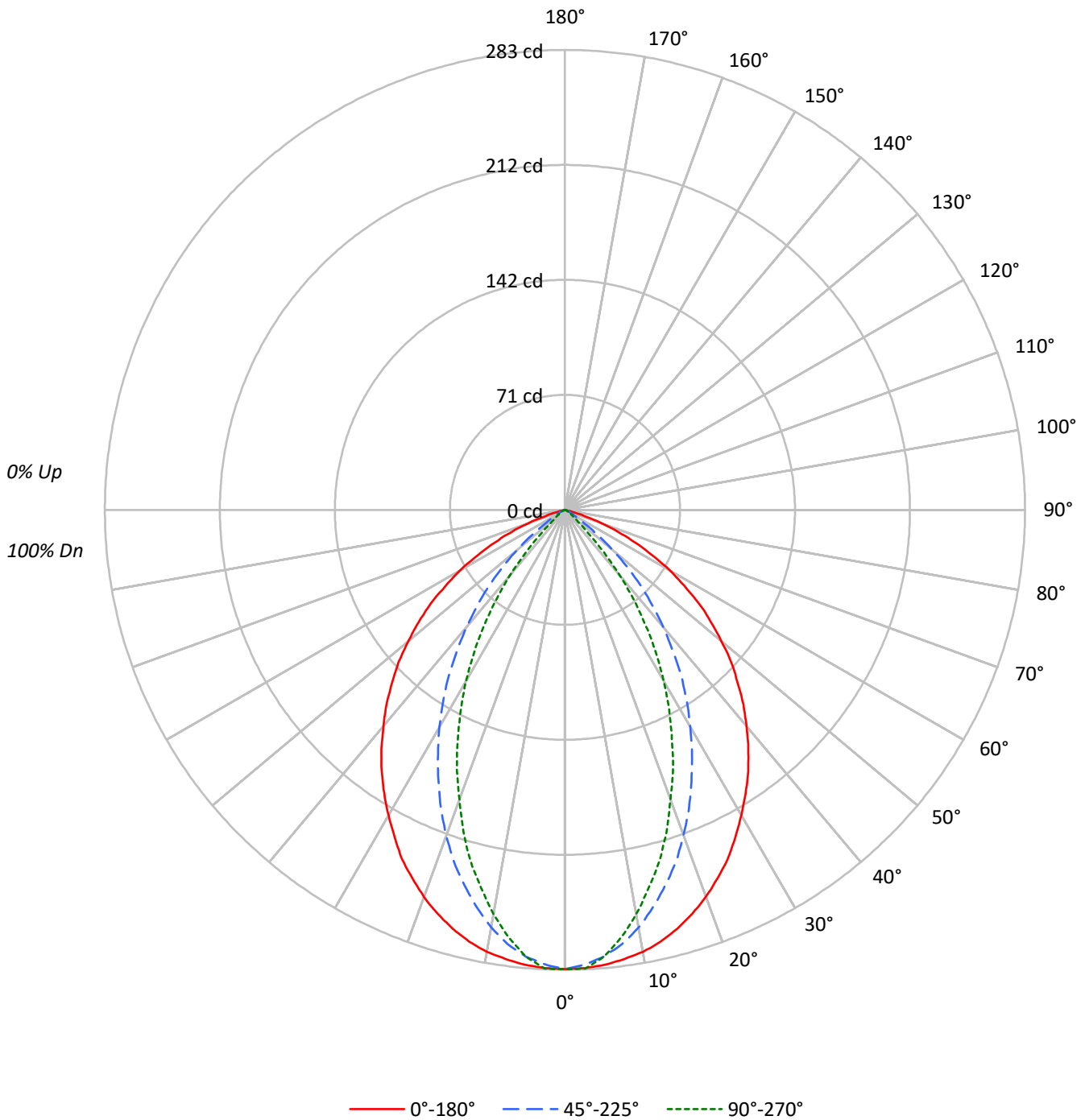
Lumens per Lamp: N/A
Luminaire Lumens: 365.0 lumens
Efficiency: N/A
Efficacy: 31.2 lumens/watt
Spacing Criteria (0/90/45): 1.15 / 0.81 / 0.97
Luminous Opening: Rectangular (W 0.39' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 11.7
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	109	106	103	110	107	104	102	103	101	99	99	97	96	95	94	93	91
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82
3	98	90	84	80	96	89	83	79	86	82	78	84	80	76	81	78	75	73
4	92	83	76	71	90	82	75	70	79	74	70	77	72	69	75	71	68	66
5	86	76	69	64	84	75	68	63	73	67	63	71	66	62	70	65	62	60
6	81	70	63	58	79	69	62	57	67	61	57	66	61	57	65	60	56	54
7	76	65	58	53	74	64	57	52	63	56	52	61	56	52	60	55	51	50
8	71	60	53	48	70	59	53	48	58	52	48	57	52	48	56	51	47	46
9	67	56	49	44	66	55	49	44	54	48	44	53	48	44	52	47	44	42
10	64	52	46	41	62	52	45	41	51	45	41	50	45	41	49	44	41	39

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1946	1946	1946
5°	1943	1907	1907
10°	1931	1825	1767
15°	1902	1704	1597
20°	1857	1562	1390
25°	1801	1399	1184
30°	1725	1227	966
35°	1652	1046	724
40°	1561	844	469
45°	1463	639	204
50°	1345	407	76
55°	1212	179	54
60°	1027	77	36
65°	777	49	18
70°	473	22	8
75°	98	11	11
80°	0	0	0
85°	0	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 1463 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	26.0	7.1
10°-20°	67.9	18.6
20°-30°	87.2	23.9
30°-40°	82.1	22.5
40°-50°	57.4	15.7
50°-60°	30.7	8.4
60°-70°	12.2	3.3
70°-80°	1.6	0.4
80°-90°	0.0	0.0
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°	181.1	49.6
0°-40°	263.2	72.1
0°-60°	351.2	96.2
0°-90°	365.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	365.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	283	283	283	283	283	
5°	281	280	276	277	276	27
15°	267	258	239	228	224	75
25°	237	216	184	164	156	109
35°	196	165	124	96	86	123
45°	150	113	66	32	21	116
55°	101	62	15	5	4	90
65°	48	19	3	2	1	47
75°	4	1	0	0	0	7
85°	0	0	0	0	0	0
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	282.6	282.6	282.6	282.6	282.6
2.5°	282.2	282.6	280.0	282.2	282.6
5°	281.1	280.3	275.9	276.6	275.9
7.5°	278.8	277.0	269.5	266.9	265.4
10°	276.2	272.1	261.0	255.4	252.7
12.5°	272.1	266.2	250.5	241.9	238.2
15°	266.9	258.3	239.0	227.8	224.0
17.5°	260.6	249.4	227.0	213.2	207.6
20°	253.5	238.6	213.2	196.8	189.7
22.5°	245.3	228.1	199.1	180.8	173.7
25°	237.1	216.2	184.2	164.0	155.8
27.5°	227.0	203.9	169.2	147.6	138.7
30°	217.0	191.6	154.3	130.8	121.5
32.5°	206.9	178.6	139.4	113.3	104.0
35°	196.5	165.1	124.5	96.2	86.1
37.5°	185.3	151.7	108.5	79.8	69.3
40°	173.7	138.7	93.9	63.7	52.2
42.5°	162.5	125.6	79.4	48.1	35.4
45°	150.2	112.6	65.6	31.7	20.9
47.5°	138.7	99.9	51.4	18.3	10.8
50°	125.6	86.9	38.0	9.7	7.1
52.5°	113.3	74.2	25.3	6.3	5.6
55°	101.0	61.9	14.9	5.2	4.5
57.5°	86.9	50.0	8.2	4.1	3.4
60°	74.6	39.1	5.6	3.0	2.6
62.5°	60.4	28.7	4.1	2.2	1.9
65°	47.7	19.0	3.0	1.5	1.1
67.5°	35.4	11.2	1.9	0.7	0.7
70°	23.5	6.0	1.1	0.4	0.4
72.5°	12.3	2.6	0.7	0.4	0.4
75°	3.7	1.1	0.4	0.4	0.4
77.5°	0.0	0.4	0.0	0.0	0.4
80°	0.0	0.0	0.0	0.0	0.0
82.5°	0.0	0.0	0.0	0.0	0.0
85°	0.0	0.0	0.0	0.0	0.0
87.5°	0.0	0.0	0.0	0.0	0.0
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	11.26	12.52	11.63	12.84	13.15	0.00	0.00	0.00	0.00	0.00
	3H	11.85	12.96	12.23	13.29	13.65	0.00	0.00	0.00	0.00	0.00
	4H	11.81	12.84	12.21	13.19	13.58	0.00	0.00	0.00	0.00	0.00
	6H	11.72	12.67	12.14	13.04	13.43	0.00	0.00	0.00	0.00	0.00
	8H	11.68	12.57	12.11	12.96	13.37	0.00	0.00	0.00	0.00	0.00
	12H	11.63	12.48	12.06	12.87	13.30	0.00	0.00	0.00	0.00	0.00
4H	2H	11.03	12.07	11.44	12.42	12.80	0.00	0.00	0.00	0.00	0.00
	3H	11.63	12.46	12.04	12.87	13.27	0.00	0.00	0.00	0.00	0.00
	4H	11.57	12.32	12.01	12.74	13.18	0.00	0.00	0.00	0.00	0.00
	6H	11.49	12.13	11.95	12.57	13.04	0.00	0.00	0.00	0.00	0.00
	8H	11.43	12.02	11.90	12.47	12.94	0.00	0.00	0.00	0.00	0.00
	12H	11.38	11.90	11.86	12.38	12.86	0.00	0.00	0.00	0.00	0.00
8H	4H	11.43	12.02	11.90	12.47	12.94	0.00	0.00	0.00	0.00	0.00
	6H	11.32	11.80	11.83	12.30	12.78	0.00	0.00	0.00	0.00	0.00
	8H	11.25	11.69	11.78	12.20	12.70	0.00	0.00	0.00	0.00	0.00
	12H	11.21	11.59	11.72	12.08	12.66	0.00	0.00	0.00	0.00	0.00
12H	4H	11.38	11.90	11.87	12.38	12.86	0.00	0.00	0.00	0.00	0.00
	6H	11.25	11.69	11.78	12.20	12.70	0.00	0.00	0.00	0.00	0.00
	8H	11.21	11.59	11.72	12.08	12.66	0.00	0.00	0.00	0.00	0.00