

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: P1056442

Luminaire Tested: S125R3DR-S610D835-X4F0-XX-UDD-FLL-B

Issue Date: 7/25/2025

Test Information

Test Method: LM-79-2019
Report Number: P1056442
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2503-402-11)
Test Lab: INNOVATION CENTER
Issue Date: 7/25/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S125R3DR-S610D835-X4F0-XX-UDD-FLL-B
Description: DEFINE 5, BLACK 3-INCH REGRESSED DIRECT RECESSED HOUSING WITH FROSTED LENS
CORE LIGHT ENGINE
Light Source: 3500K CCT, 80 CRI LEDS
Ballast/Driver: -

Summary

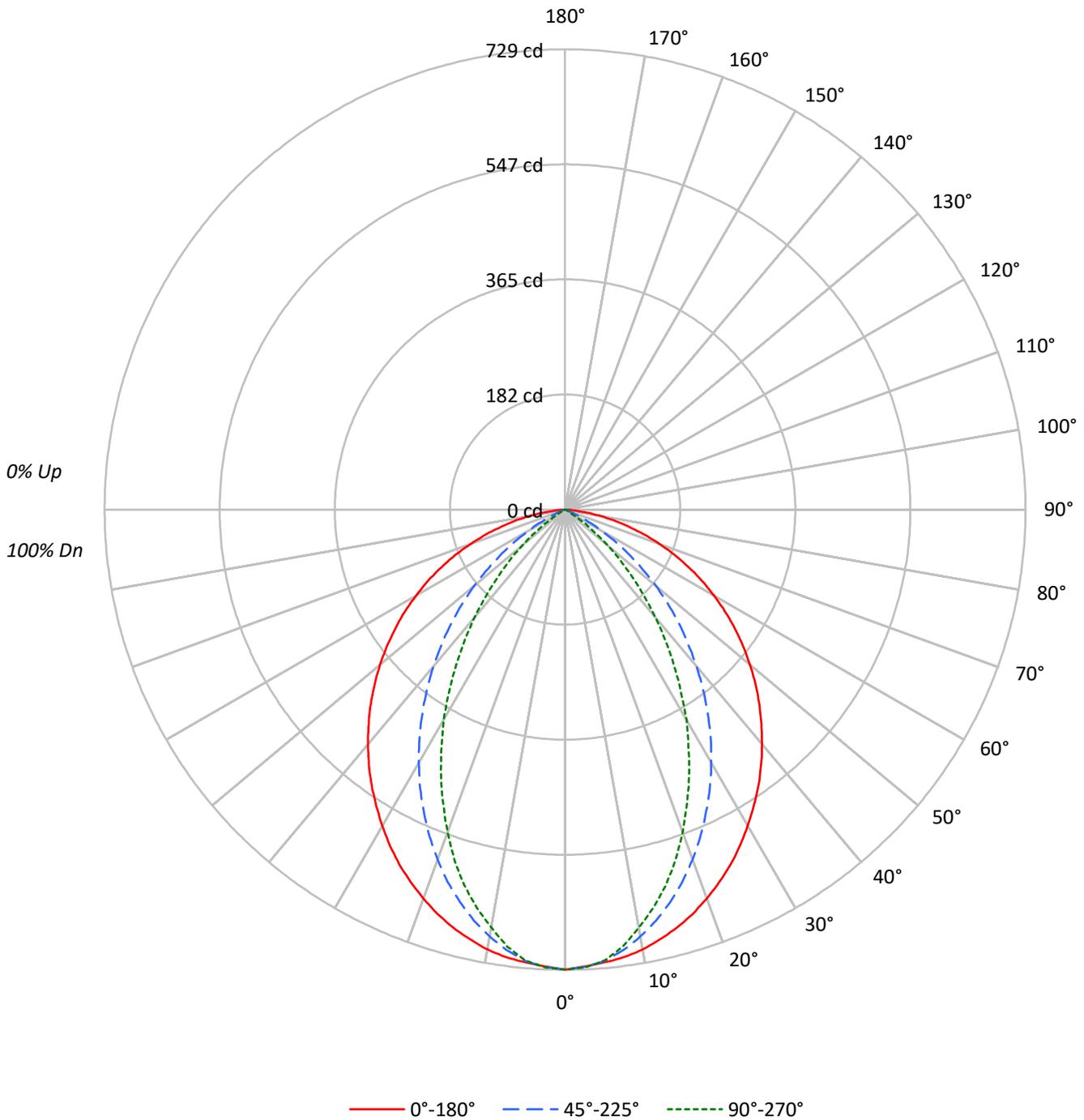
Lumens per Lamp: N/A
Luminaire Lumens: 1181.0 lumens
Efficiency: N/A
Efficacy: 61.8 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 0.89 / 1.07
Luminous Opening: Rectangular (W 0.39' x L: 3.9' x H: 0')
CIE Type: Direct

Input Watts (W): 19.1
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	111	108	104	101	109	106	103	100	101	99	97	98	96	94	94	93	91	89
2	103	97	91	87	101	95	90	86	92	88	84	89	85	82	86	83	80	78
3	96	87	81	75	94	86	80	75	83	78	74	80	76	72	78	74	71	69
4	89	79	72	66	87	78	71	66	76	70	65	73	68	64	71	67	63	61
5	83	72	64	59	81	71	64	58	69	63	58	67	62	57	65	61	57	55
6	77	66	58	53	76	65	58	52	63	57	52	62	56	52	60	55	51	49
7	72	61	53	47	71	60	52	47	58	52	47	57	51	47	56	50	46	45
8	68	56	48	43	66	55	48	43	54	47	43	53	47	43	52	46	42	41
9	64	52	44	39	62	51	44	39	50	44	39	49	43	39	48	43	39	37
10	60	48	41	36	59	48	41	36	47	40	36	46	40	36	45	40	36	34

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	5151	5151	5151
5°	5109	5094	5089
10°	5080	4930	4826
15°	5016	4709	4508
20°	4933	4439	4091
25°	4838	4123	3628
30°	4721	3779	3136
35°	4606	3397	2592
40°	4479	2985	2052
45°	4346	2548	1488
50°	4201	2057	961
55°	4041	1504	428
60°	3849	929	123
65°	3611	338	72
70°	3268	120	29
75°	2841	38	19
80°	2174	28	0
85°	998	0	0

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
 Vertical Angle: 45°
 Luminance: 4346 cd/sqm



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	67.7	5.7
10°-20°	181.7	15.4
20°-30°	245.8	20.8
30°-40°	252.6	21.4
40°-50°	209.2	17.7
50°-60°	134.3	11.4
60°-70°	64.9	5.5
70°-80°	21.9	1.9
80°-90°	2.8	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°	495.2	41.9
0°-40°	747.8	63.3
0°-60°	1091.4	92.4
0°-90°	1181.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1181.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	729	729	729	729	729	
5°	720	726	718	714	717	68
15°	685	677	643	621	616	193
25°	620	590	529	481	465	285
35°	534	482	394	325	300	334
45°	435	363	255	176	149	335
55°	328	240	122	53	35	293
65°	216	119	20	6	4	214
75°	104	22	1	1	1	110
85°	12	0	0	0	0	19
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	728.6	728.6	728.6	728.6	728.6
2.5°	724.3	730.1	725.0	724.3	725.8
5°	720.0	725.8	717.8	713.5	717.1
7.5°	714.9	717.8	704.1	696.9	698.3
10°	707.7	707.0	686.8	674.5	672.3
12.5°	696.9	693.3	666.5	649.2	645.6
15°	685.3	676.6	643.4	621.0	616.0
17.5°	671.6	657.9	618.2	589.3	582.0
20°	655.7	636.9	590.0	554.6	543.8
22.5°	638.4	614.5	560.4	518.5	504.1
25°	620.3	590.0	528.6	480.9	465.1
27.5°	600.1	564.7	496.8	442.7	423.2
30°	578.4	538.0	462.9	403.7	384.2
32.5°	556.1	511.3	429.0	364.7	340.9
35°	533.7	482.4	393.6	325.0	300.4
37.5°	509.8	453.5	358.9	287.4	260.7
40°	485.3	423.9	323.5	248.4	222.4
42.5°	460.0	393.6	288.1	211.6	184.9
45°	434.7	363.2	254.9	176.2	148.8
47.5°	408.7	332.2	220.3	141.5	117.7
50°	382.0	301.9	187.0	110.5	87.4
52.5°	355.3	270.8	153.1	80.2	59.2
55°	327.9	240.5	122.0	53.4	34.7
57.5°	300.4	209.4	93.2	29.6	13.0
60°	272.2	179.8	65.7	10.1	8.7
62.5°	244.8	148.0	41.2	7.9	6.5
65°	215.9	119.2	20.2	5.8	4.3
67.5°	187.8	91.7	8.7	3.6	2.2
70°	158.1	66.4	5.8	2.2	1.4
72.5°	130.7	42.6	3.6	1.4	0.7
75°	104.0	22.4	1.4	0.7	0.7
77.5°	78.0	9.4	0.7	0.7	0.7
80°	53.4	4.3	0.7	0.7	0.0
82.5°	31.8	1.4	0.7	0.7	0.0
85°	12.3	0.0	0.0	0.0	0.0
87.5°	0.7	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)