

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: P1034022

Luminaire Tested: S124RDIW-B350D1050UB27-4F0-XX-W2A-F

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1034022
REPORT IS A COMBINATION OF REPORTS P1000262 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S124RDIW-B350D1050UB27-4F0-XX-W2A-F
Description: Define 4 Regressed Direct/Indirect Wall Mount with 2700K BioUP LEDs {m-DER=0.473}
{m-EER=0.52}
Light Source: -
Ballast/Driver: -

Summary

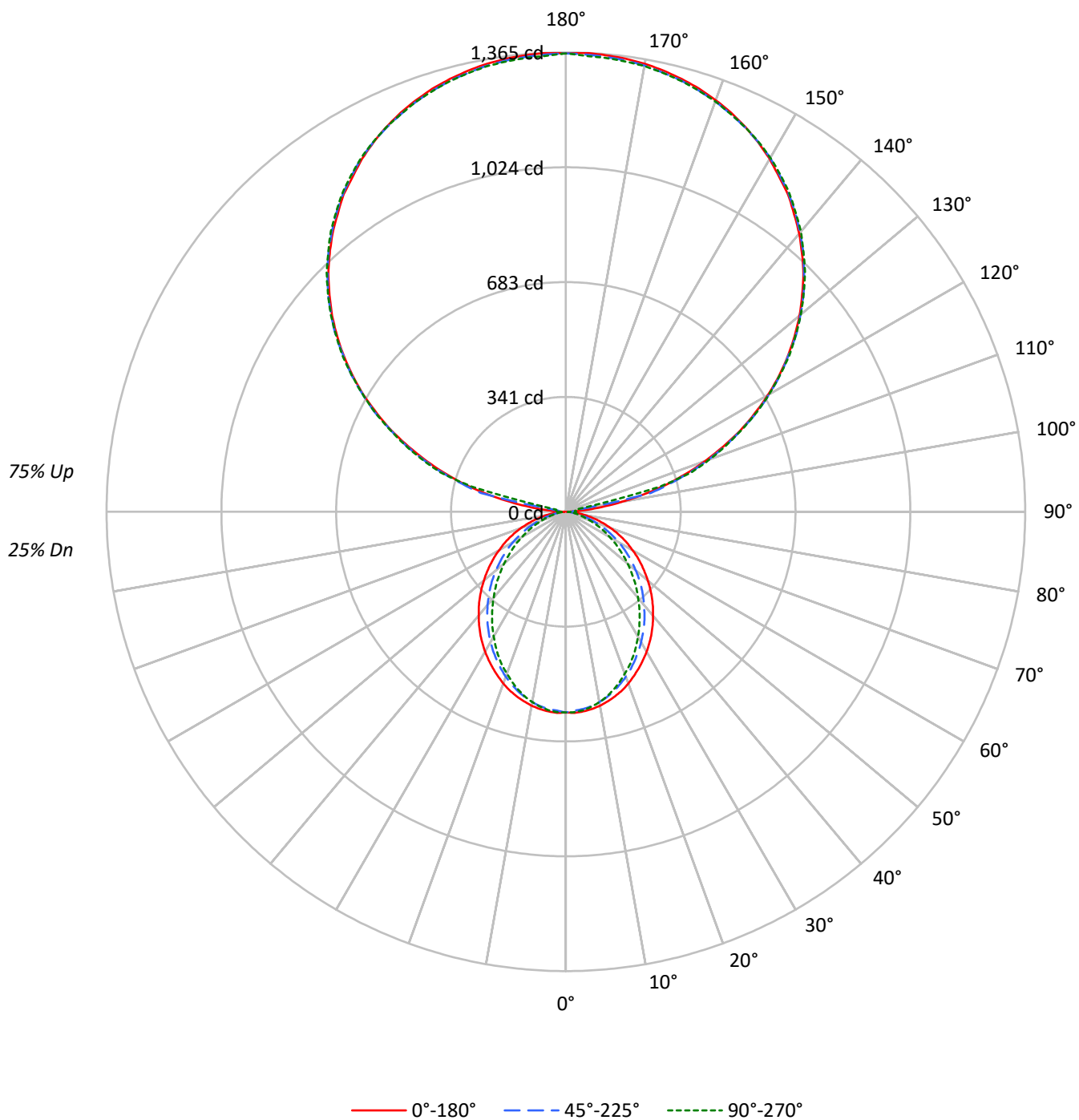
Lumens per Lamp: N/A
Luminaire Lumens: 5595.0 lumens
Efficiency: N/A
Efficacy: 125.7 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.09 / 1.24
Luminous Opening: Rectangular w/ Sides (W: 0.33' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 44.5
Input Voltage (V):
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
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10
RCR																	
0	101	101	101	101	90	90	90	90	69	69	69	50	50	50	33	33	33
1	92	88	84	81	82	79	76	73	61	59	57	44	43	42	29	29	28
2	84	77	71	66	75	69	64	60	53	50	47	39	37	35	26	25	24
3	77	68	61	55	68	61	55	50	47	43	40	35	32	30	23	22	20
4	70	60	52	47	62	54	47	42	42	37	34	31	28	26	21	19	18
5	64	53	46	40	57	48	41	36	37	33	29	28	25	22	19	17	15
6	59	48	40	34	52	43	36	31	34	29	25	25	22	19	17	15	13
7	55	43	35	30	48	39	32	27	30	26	22	23	19	17	15	13	12
8	50	39	31	26	45	35	29	24	28	23	20	21	17	15	14	12	11
9	47	35	28	23	42	32	26	21	25	21	17	19	16	14	13	11	10
10	44	32	25	21	39	29	23	19	23	19	16	17	14	12	12	10	9

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4863	4863	4863
5°	4864	4719	4719
10°	4823	4570	4516
15°	4757	4384	4275
20°	4670	4173	4001
25°	4561	3945	3733
30°	4454	3713	3432
35°	4338	3477	3139
40°	4200	3223	2837
45°	4069	2971	2538
50°	3921	2695	2234
55°	3761	2414	1921
60°	3583	2114	1612
65°	3412	1772	1313
70°	3168	1410	1004
75°	2856	1025	702
80°	2385	631	504
85°	1797	364	277

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
Vertical Angle: 45°
Luminance: 4069 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	56.1	1.0
10°-20°	156.4	2.8
20°-30°	225.7	4.0
30°-40°	255.9	4.6
40°-50°	247.0	4.4
50°-60°	205.4	3.7
60°-70°	141.8	2.5
70°-80°	71.6	1.3
80°-90°	21.0	0.4
90°-100°	45.2	0.8
100°-110°	297.7	5.3
110°-120°	568.5	10.2
120°-130°	721.7	12.9
130°-140°	772.1	13.8
140°-150°	721.9	12.9
150°-160°	582.2	10.4
160°-170°	375.5	6.7
170°-180°	129.4	2.3
0°-30°	438.2	7.8
0°-40°	694.0	12.4
0°-60°	1146.4	20.5
0°-90°	1380.8	24.7
90°-120°	911.4	16.3
90°-150°	3127.1	55.9
90°-180°	4214.0	75.3
0°-180°	5595.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	596	596	596	596	596	
5°	596	594	588	593	592	57
15°	567	563	552	551	548	160
25°	513	505	486	478	474	236
35°	443	429	406	390	382	277
45°	362	345	317	295	287	279
55°	274	256	226	202	194	245
65°	186	167	138	118	112	184
75°	99	82	61	50	48	105
85°	25	16	14	13	13	27
90°	3	14	22	28	31	4
95°	56	21	22	28	30	69
105°	307	313	318	327	290	321
115°	572	576	574	576	576	563
125°	805	809	807	810	811	719
135°	998	997	1001	1003	1005	769
145°	1151	1154	1154	1155	1157	719
155°	1262	1263	1260	1264	1261	582
165°	1331	1326	1326	1334	1325	376
175°	1362	1356	1357	1366	1354	130
180°	1362	1362	1362	1362	1362	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	596.4	596.4	596.4	596.4	596.4
2.5°	598.2	596.4	591.4	596.4	595.9
5°	595.5	593.6	588.2	592.7	591.8
7.5°	591.4	589.5	582.7	585.9	584.5
10°	585.0	582.7	574.5	576.3	574.5
12.5°	576.7	574.0	564.0	564.9	562.1
15°	567.2	563.0	551.6	550.7	547.5
17.5°	556.2	550.3	537.0	534.7	530.2
20°	543.0	537.0	521.5	517.8	511.9
22.5°	528.3	521.5	504.6	498.7	494.1
25°	512.8	504.6	485.9	478.1	473.5
27.5°	496.8	486.8	467.1	458.0	451.6
30°	479.9	468.5	447.1	435.6	428.3
32.5°	462.1	448.9	426.5	412.8	406.0
35°	443.4	428.8	406.0	390.4	382.2
37.5°	423.8	408.7	383.6	366.7	358.5
40°	402.8	387.7	361.7	342.5	334.3
42.5°	382.7	366.7	339.3	319.7	311.0
45°	361.7	344.8	317.4	295.0	286.8
47.5°	340.2	322.8	294.5	271.2	262.1
50°	318.3	300.5	271.2	248.4	239.7
52.5°	295.9	278.6	248.4	225.1	216.0
55°	274.0	255.7	226.0	202.3	193.6
57.5°	252.5	233.3	204.1	179.9	173.5
60°	229.2	211.0	181.7	158.0	150.7
62.5°	208.2	189.1	158.9	137.5	132.0
65°	186.3	166.7	137.5	117.8	112.3
67.5°	163.5	144.8	117.4	100.0	93.6
70°	142.0	122.8	96.8	81.7	77.2
72.5°	119.2	102.3	78.1	65.8	61.6
75°	99.1	82.2	60.7	50.2	47.5
77.5°	78.1	63.5	45.2	37.9	37.0
80°	58.0	44.8	31.1	29.7	29.2
82.5°	40.6	28.8	22.4	21.5	21.0
85°	24.7	15.5	14.2	13.2	13.2
87.5°	10.5	6.8	6.4	5.9	6.4
90°	3.1	14.3	22.4	28.5	30.6
92.5°	15.3	13.2	21.4	27.5	27.5
95°	56.0	21.4	22.4	28.5	29.5
97.5°	107.0	129.4	22.4	27.5	28.5
100°	167.1	185.4	44.8	27.5	28.5
102.5°	234.3	246.5	258.7	29.5	29.5
105°	306.6	312.7	317.8	327.0	290.3
107.5°	372.8	375.9	383.0	388.1	392.2
110°	440.0	443.1	449.2	451.2	454.3

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	505.2	511.3	513.4	512.4	516.4
115°	572.5	575.5	574.5	576.5	576.5
117.5°	632.6	636.6	639.7	638.7	638.7
120°	693.7	697.8	696.7	698.8	696.7
122.5°	750.7	752.8	754.8	755.8	753.8
125°	804.7	808.8	806.7	809.8	810.8
127.5°	856.7	857.7	862.8	861.8	860.7
130°	906.6	907.6	910.6	911.7	911.7
132.5°	952.4	954.4	958.5	959.5	958.5
135°	998.2	997.2	1001.3	1003.3	1005.4
137.5°	1039.0	1039.0	1044.1	1046.1	1045.1
140°	1078.7	1080.8	1082.8	1085.9	1086.9
142.5°	1114.4	1118.4	1119.5	1121.5	1121.5
145°	1151.0	1154.1	1154.1	1155.1	1157.2
147.5°	1179.6	1185.7	1184.7	1185.7	1186.7
150°	1211.1	1215.2	1214.2	1214.2	1215.2
152.5°	1237.6	1240.7	1238.6	1240.7	1239.7
155°	1262.1	1263.1	1260.0	1264.1	1261.1
157.5°	1283.5	1283.5	1279.4	1284.5	1279.4
160°	1301.8	1298.7	1297.7	1303.8	1297.7
162.5°	1318.1	1314.0	1313.0	1319.1	1312.0
165°	1331.3	1326.2	1326.2	1334.4	1325.2
167.5°	1342.5	1337.4	1336.4	1345.6	1335.4
170°	1351.7	1345.6	1346.6	1354.8	1344.6
172.5°	1357.8	1351.7	1352.7	1360.9	1349.7
175°	1361.9	1355.8	1356.8	1366.0	1353.7
177.5°	1365.0	1357.8	1359.9	1368.0	1355.8
180°	1361.9	1361.9	1361.9	1361.9	1361.9

(END OF REPORT)