

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: P1031019

Luminaire Tested: S123RDIW-B1000D1030UB2750-4F0-XX-W2A-F1_5000K

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1031019
REPORT IS A COMBINATION OF REPORTS P993732 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123RDIW-B1000D1030UB2750-4F0-XX-W2A-F1_5000K
Description: Define 3 Regressed Direct/Indirect Wall Mount with 5000K BioUP LEDs {m-DER=1.015}
{m-EER=1.115}
Light Source: -
Ballast/Driver: -

Summary

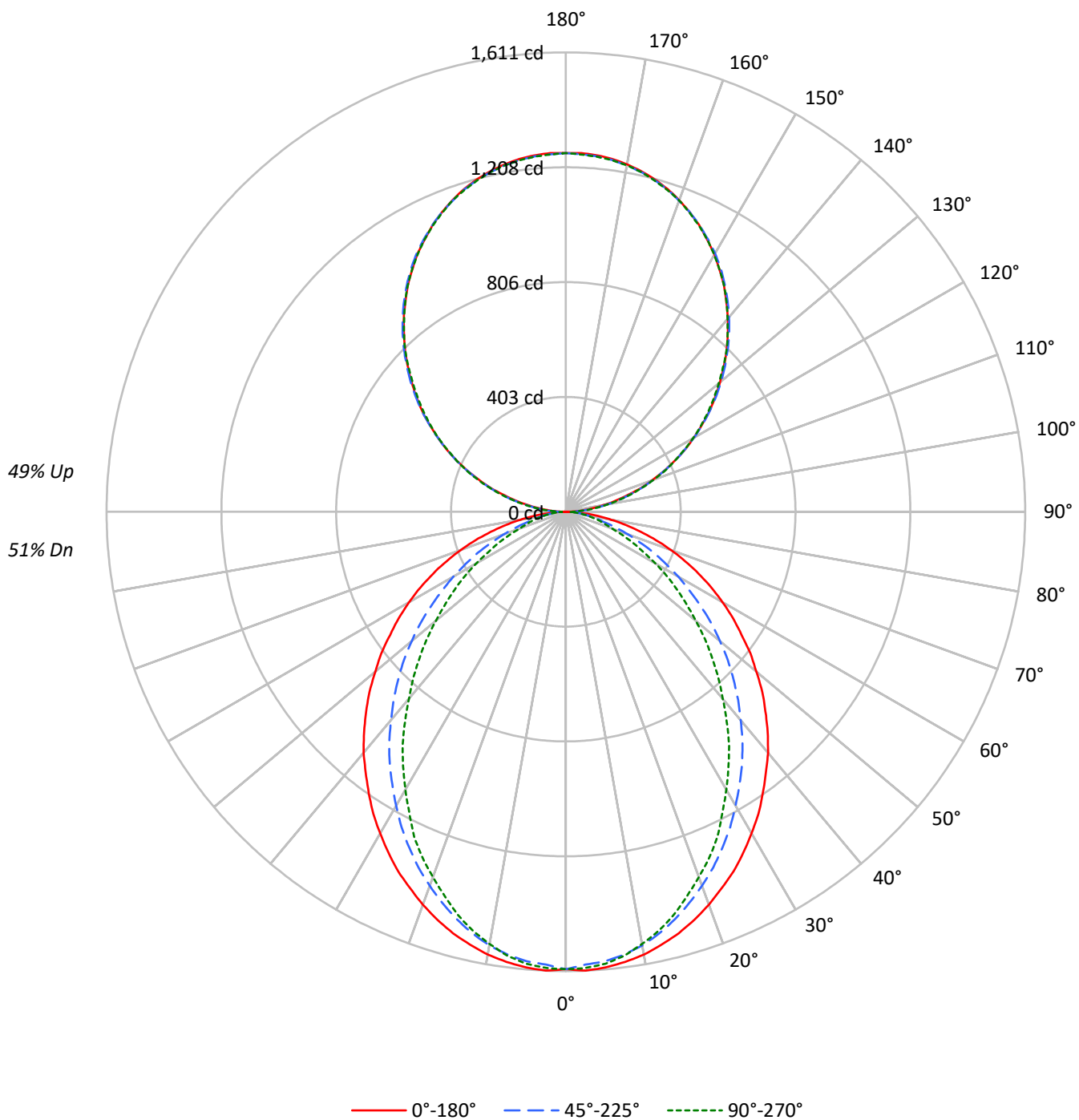
Lumens per Lamp: N/A
Luminaire Lumens: 7112.0 lumens
Efficiency: N/A
Efficacy: 90.8 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.07 / 1.22
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 78.3
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
RCR																	
0	107	107	107	107	99	99	99	99	84	84	84		70	70	70		57
1	98	94	90	87	91	87	84	81	74	72	70		62	60	59		51
2	90	83	77	72	83	77	71	67	65	61	58		55	52	50		45
3	82	73	66	60	76	68	61	56	58	53	49		49	45	42		40
4	75	65	57	51	69	60	53	48	52	46	42		44	40	37		36
5	69	58	50	44	64	54	47	41	46	41	37		39	35	32		33
6	64	52	44	38	59	48	41	36	42	36	32		36	31	28		30
7	59	47	39	34	55	44	37	32	38	32	28		33	28	25		27
8	55	43	35	30	51	40	33	28	35	29	25		30	25	22		25
9	51	39	32	27	47	37	30	25	32	27	23		27	23	20		23
10	48	36	29	24	44	34	27	23	29	24	21		25	21	18		22

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	17266	17266	17266
5°	17295	16656	16611
10°	17159	16030	15714
15°	16936	15255	14731
20°	16643	14414	13633
25°	16343	13539	12593
30°	15956	12608	11363
35°	15558	11694	10244
40°	15183	10701	9006
45°	14704	9730	7894
50°	14175	8694	6743
55°	13626	7584	5687
60°	13101	6446	4616
65°	12423	5280	3603
70°	11570	3992	2574
75°	10343	2703	2040
80°	8827	1880	1432
85°	6628	1014	749

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 14704 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	150.8	2.1
10°-20°	419.5	5.9
20°-30°	604.0	8.5
30°-40°	680.2	9.6
40°-50°	650.6	9.1
50°-60°	532.6	7.5
60°-70°	359.1	5.0
70°-80°	180.1	2.5
80°-90°	49.7	0.7
90°-100°	81.0	1.1
100°-110°	245.1	3.4
110°-120°	417.2	5.9
120°-130°	548.9	7.7
130°-140°	617.0	8.7
140°-150°	606.5	8.5
150°-160°	510.6	7.2
160°-170°	340.0	4.8
170°-180°	119.0	1.7
0°-30°	1174.3	16.5
0°-40°	1854.5	26.1
0°-60°	3037.7	42.7
0°-90°	3626.7	51.0
90°-120°	743.3	10.5
90°-150°	2515.7	35.4
90°-180°	3485.0	49.0
0°-180°	7112.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1604	1604	1604	1604	1604	
5°	1604	1598	1582	1594	1591	152
15°	1530	1516	1479	1473	1464	431
25°	1392	1360	1300	1272	1258	640
35°	1205	1158	1077	1021	998	754
45°	990	932	831	757	726	764
55°	752	688	578	502	476	674
65°	514	442	341	277	263	509
75°	272	210	138	125	122	290
85°	69	40	36	34	34	76
90°	1	11	24	28	30	9
95°	58	65	73	77	77	64
105°	222	224	233	233	235	238
115°	420	423	421	422	421	416
125°	615	618	616	612	608	548
135°	797	803	802	798	796	614
145°	967	969	972	971	967	604
155°	1108	1108	1109	1113	1106	510
165°	1206	1204	1204	1210	1202	340
175°	1255	1251	1251	1257	1250	119
180°	1258	1258	1258	1258	1258	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1604.1	1604.1	1604.1	1604.1	1604.1
2.5°	1610.6	1605.4	1589.8	1604.1	1601.5
5°	1604.1	1597.6	1582.0	1593.7	1591.1
7.5°	1592.4	1585.9	1566.4	1574.2	1570.3
10°	1576.8	1567.7	1544.3	1545.6	1539.1
12.5°	1554.7	1544.3	1514.4	1513.1	1505.2
15°	1530.0	1515.7	1479.2	1472.7	1463.6
17.5°	1500.0	1484.4	1438.9	1425.9	1412.9
20°	1466.2	1445.4	1396.0	1379.1	1363.4
22.5°	1428.5	1403.8	1350.4	1328.3	1314.0
25°	1392.1	1359.5	1299.7	1272.4	1258.1
27.5°	1347.8	1312.7	1247.7	1211.2	1189.1
30°	1302.3	1263.3	1190.4	1146.2	1125.4
32.5°	1256.8	1211.2	1133.2	1083.7	1061.6
35°	1204.7	1157.9	1077.2	1021.3	997.9
37.5°	1152.7	1101.9	1017.4	954.9	926.3
40°	1103.2	1046.0	953.6	886.0	856.1
42.5°	1047.3	990.1	893.8	818.3	792.3
45°	990.1	931.5	831.3	757.2	726.0
47.5°	934.1	869.1	770.2	689.5	662.2
50°	871.7	810.5	705.1	624.5	594.6
52.5°	815.7	748.1	644.0	559.4	533.4
55°	752.0	688.2	577.6	502.2	476.2
57.5°	694.7	625.8	513.9	442.3	420.2
60°	634.9	563.3	455.3	385.1	363.0
62.5°	575.0	503.5	395.5	330.5	307.0
65°	513.9	442.3	340.9	277.1	262.8
67.5°	452.7	379.9	281.0	232.9	217.3
70°	392.9	322.6	231.6	186.0	171.7
72.5°	333.1	264.1	183.4	148.3	144.4
75°	271.9	209.5	137.9	124.9	122.3
77.5°	216.0	158.7	108.0	100.2	97.6
80°	162.6	109.3	82.0	78.1	75.5
82.5°	111.9	67.7	58.5	54.6	54.6
85°	69.0	40.3	36.4	33.8	33.8
87.5°	31.2	16.9	16.9	15.6	14.3
90°	1.0	10.9	23.7	27.7	29.6
92.5°	29.6	35.6	41.5	44.5	42.5
95°	58.3	65.2	73.1	77.1	77.1
97.5°	95.8	100.8	106.7	111.7	110.7
100°	134.4	140.3	145.3	148.2	150.2
102.5°	178.8	181.8	188.7	191.7	190.7
105°	222.3	224.3	233.2	233.2	235.2
107.5°	273.7	274.7	278.6	281.6	280.6
110°	321.1	323.1	325.1	329.0	327.1



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	370.5	371.5	371.5	376.5	376.5
115°	420.0	422.9	420.9	421.9	420.9
117.5°	470.3	471.3	469.4	469.4	466.4
120°	516.8	522.7	517.8	516.8	514.8
122.5°	565.2	569.2	567.2	564.2	561.3
125°	614.6	617.6	615.6	611.6	607.7
127.5°	660.1	666.0	664.0	658.1	654.1
130°	705.5	713.4	710.5	706.5	699.6
132.5°	751.0	758.9	756.9	752.0	747.0
135°	797.4	803.3	802.4	798.4	796.4
137.5°	839.9	844.8	847.8	842.9	839.9
140°	884.4	889.3	890.3	889.3	882.4
142.5°	924.9	929.8	931.8	930.8	925.9
145°	967.4	969.3	972.3	971.3	967.4
147.5°	1003.9	1007.9	1010.8	1010.8	1004.9
150°	1042.5	1044.4	1046.4	1046.4	1040.5
152.5°	1074.1	1077.0	1078.0	1080.0	1075.1
155°	1107.7	1107.7	1108.7	1112.6	1105.7
157.5°	1136.3	1135.3	1136.3	1140.3	1134.4
160°	1163.0	1161.0	1161.0	1166.0	1162.0
162.5°	1186.7	1183.8	1184.8	1189.7	1182.8
165°	1206.5	1203.5	1203.5	1209.5	1202.5
167.5°	1223.3	1219.3	1220.3	1226.3	1220.3
170°	1237.1	1233.2	1233.2	1240.1	1233.2
172.5°	1248.0	1244.0	1244.0	1250.0	1243.1
175°	1254.9	1251.0	1251.0	1256.9	1250.0
177.5°	1258.9	1254.9	1254.9	1260.8	1253.9
180°	1257.9	1257.9	1257.9	1257.9	1257.9

(END OF REPORT)