

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: P1032091

Luminaire Tested: S123RDIW-B1165D1030UB35-4F0-XX-W2A-F1

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1032091
REPORT IS A COMBINATION OF REPORTS P993969 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S123RDIW-B1165D1030UB35-4F0-XX-W2A-F1
Description: Define 3 Regressed Direct/Indirect Wall Mount with 3500K BioUP LEDs {m-DER=0.721}
{m-EER=0.792}
Light Source: -
Ballast/Driver: -

Summary

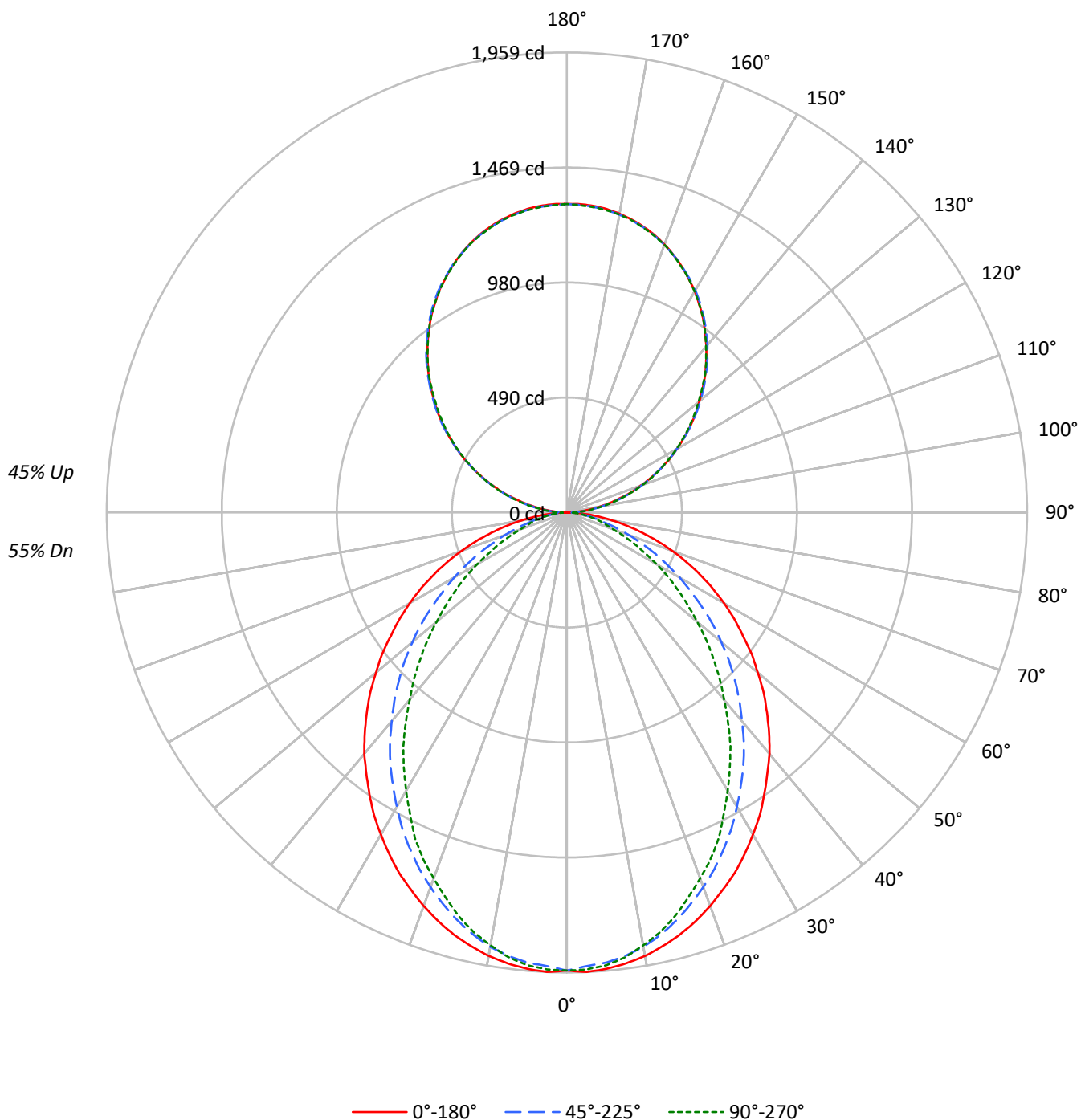
Lumens per Lamp: N/A
Luminaire Lumens: 8050.0 lumens
Efficiency: N/A
Efficacy: 86.7 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.07 / 1.22
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 4' x H: 0.1')
CIE Type: General Diffuse

Input Watts (W): 92.8
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	108	108	108	108	101	101	101	101	86	86	86	73	73	73	61	61	61
1	99	95	91	88	92	88	85	82	76	74	71	65	63	61	54	53	52
2	91	83	77	72	84	78	72	68	67	63	60	57	54	52	48	46	44
3	83	74	66	61	77	69	62	57	59	55	51	51	47	44	43	40	38
4	76	65	58	52	70	61	54	49	53	48	43	45	41	38	38	35	33
5	70	58	50	44	65	55	48	42	48	42	38	41	37	33	35	32	29
6	65	53	45	39	60	49	42	37	43	37	33	37	33	29	32	28	26
7	60	48	40	34	55	45	38	33	39	33	29	34	29	26	29	26	23
8	56	43	36	30	52	41	34	29	36	30	26	31	27	23	27	23	21
9	52	40	32	27	48	37	31	26	33	27	23	29	24	21	25	21	19
10	48	36	29	24	45	34	28	23	30	25	21	27	22	19	23	20	17

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	20997	20997	20997
5°	21031	20254	20200
10°	20866	19492	19109
15°	20595	18551	17913
20°	20240	17528	16578
25°	19873	16464	15314
30°	19404	15332	13818
35°	18919	14221	12457
40°	18464	13014	10952
45°	17881	11834	9599
50°	17237	10573	8199
55°	16568	9223	6915
60°	15932	7839	5613
65°	15106	6420	4382
70°	14071	4854	3131
75°	12580	3287	2481
80°	10738	2285	1741
85°	8059	1234	911

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 17881 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	183.4	2.3
10°-20°	510.1	6.3
20°-30°	734.5	9.1
30°-40°	827.2	10.3
40°-50°	791.2	9.8
50°-60°	647.7	8.0
60°-70°	436.7	5.4
70°-80°	219.0	2.7
80°-90°	60.0	0.7
90°-100°	84.6	1.1
100°-110°	256.0	3.2
110°-120°	435.8	5.4
120°-130°	573.3	7.1
130°-140°	644.4	8.0
140°-150°	633.5	7.9
150°-160°	533.3	6.6
160°-170°	355.1	4.4
170°-180°	124.3	1.5
0°-30°	1428.0	17.7
0°-40°	2255.2	28.0
0°-60°	3694.0	45.9
0°-90°	4409.8	54.8
90°-120°	776.3	9.6
90°-150°	2627.5	32.6
90°-180°	3640.0	45.2
0°-180°	8050.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1951	1951	1951	1951	1951	
5°	1951	1943	1924	1938	1935	185
15°	1860	1843	1799	1791	1780	524
25°	1693	1653	1580	1547	1530	779
35°	1465	1408	1310	1242	1214	917
45°	1204	1133	1011	921	883	929
55°	914	837	702	611	579	820
65°	625	538	414	337	320	618
75°	331	255	168	152	149	352
85°	84	49	44	41	41	92
90°	1	11	25	29	31	10
95°	61	68	76	80	80	67
105°	232	234	244	244	246	249
115°	439	442	440	441	440	434
125°	642	645	643	639	635	572
135°	833	839	838	834	832	642
145°	1010	1012	1016	1014	1010	631
155°	1157	1157	1158	1162	1155	533
165°	1260	1257	1257	1263	1256	355
175°	1311	1306	1306	1313	1306	125
180°	1314	1314	1314	1314	1314	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1950.7	1950.7	1950.7	1950.7	1950.7
2.5°	1958.6	1952.3	1933.3	1950.7	1947.5
5°	1950.7	1942.8	1923.8	1938.1	1934.9
7.5°	1936.5	1928.6	1904.8	1914.3	1909.6
10°	1917.5	1906.4	1877.9	1879.5	1871.6
12.5°	1890.6	1877.9	1841.5	1840.0	1830.5
15°	1860.5	1843.1	1798.8	1790.9	1779.8
17.5°	1824.1	1805.2	1749.8	1734.0	1718.1
20°	1783.0	1757.7	1697.6	1677.0	1658.0
22.5°	1737.1	1707.1	1642.2	1615.3	1597.9
25°	1692.8	1653.3	1580.5	1547.3	1529.9
27.5°	1639.0	1596.3	1517.2	1472.9	1446.0
30°	1583.7	1536.2	1447.6	1393.8	1368.5
32.5°	1528.3	1472.9	1378.0	1317.9	1291.0
35°	1465.0	1408.1	1310.0	1241.9	1213.5
37.5°	1401.7	1340.0	1237.2	1161.2	1126.4
40°	1341.6	1272.0	1159.7	1077.4	1041.0
42.5°	1273.6	1204.0	1086.9	995.1	963.5
45°	1204.0	1132.8	1011.0	920.8	882.8
47.5°	1135.9	1056.8	936.6	838.5	805.3
50°	1060.0	985.6	857.5	759.4	723.0
52.5°	992.0	909.7	783.1	680.3	648.7
55°	914.4	836.9	702.4	610.7	579.0
57.5°	844.8	761.0	624.9	537.9	511.0
60°	772.1	685.0	553.7	468.3	441.4
62.5°	699.3	612.3	481.0	401.8	373.4
65°	624.9	537.9	414.5	337.0	319.6
67.5°	550.6	462.0	341.7	283.2	264.2
70°	477.8	392.4	281.6	226.2	208.8
72.5°	405.0	321.2	223.1	180.4	175.6
75°	330.7	254.7	167.7	151.9	148.7
77.5°	262.6	193.0	131.3	121.8	118.7
80°	197.8	132.9	99.7	94.9	91.8
82.5°	136.1	82.3	71.2	66.4	66.4
85°	83.9	49.0	44.3	41.1	41.1
87.5°	38.0	20.6	20.6	19.0	17.4
90°	1.0	11.4	24.8	28.9	31.0
92.5°	31.0	37.2	43.3	46.4	44.4
95°	60.9	68.1	76.4	80.5	80.5
97.5°	100.1	105.3	111.5	116.6	115.6
100°	140.4	146.5	151.7	154.8	156.9
102.5°	186.8	189.9	197.1	200.2	199.2
105°	232.2	234.3	243.6	243.6	245.6
107.5°	285.9	286.9	291.0	294.1	293.1
110°	335.4	337.5	339.5	343.7	341.6



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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	387.0	388.0	388.0	393.2	393.2
115°	438.6	441.7	439.6	440.7	439.6
117.5°	491.2	492.3	490.2	490.2	487.1
120°	539.8	545.9	540.8	539.8	537.7
122.5°	590.3	594.4	592.4	589.3	586.2
125°	641.9	645.0	643.0	638.8	634.7
127.5°	689.4	695.6	693.5	687.3	683.2
130°	736.9	745.1	742.0	737.9	730.7
132.5°	784.3	792.6	790.5	785.4	780.2
135°	832.8	839.0	838.0	833.9	831.8
137.5°	877.2	882.4	885.5	880.3	877.2
140°	923.7	928.8	929.9	928.8	921.6
142.5°	966.0	971.1	973.2	972.2	967.0
145°	1010.4	1012.4	1015.5	1014.5	1010.4
147.5°	1048.5	1052.7	1055.8	1055.8	1049.6
150°	1088.8	1090.9	1092.9	1092.9	1086.7
152.5°	1121.8	1124.9	1125.9	1128.0	1122.8
155°	1156.9	1156.9	1157.9	1162.1	1154.8
157.5°	1186.8	1185.8	1186.8	1191.0	1184.8
160°	1214.7	1212.6	1212.6	1217.8	1213.7
162.5°	1239.5	1236.4	1237.4	1242.6	1235.3
165°	1260.1	1257.0	1257.0	1263.2	1256.0
167.5°	1277.7	1273.5	1274.6	1280.7	1274.6
170°	1292.1	1288.0	1288.0	1295.2	1288.0
172.5°	1303.5	1299.3	1299.3	1305.5	1298.3
175°	1310.7	1306.5	1306.5	1312.7	1305.5
177.5°	1314.8	1310.7	1310.7	1316.9	1309.6
180°	1313.8	1313.8	1313.8	1313.8	1313.8

(END OF REPORT)