

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: P1029358

Luminaire Tested: S122DIW-B290D1440UB2750-4F0-XX-W2A-F_3500K

Issue Date: 5/6/2025

Test Information

Test Method: LM-79-2019
Report Number: P1029358
REPORT IS A COMBINATION OF REPORTS P985609 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/6/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122DIW-B290D1440UB2750-4F0-XX-W2A-F_3500K
Description: Define 2 Direct/Indirect Wall Mount with 3500K BioUP LEDs {m-DER=0.721} {m-EER=0.792}
Light Source: -
Ballast/Driver: -

Summary

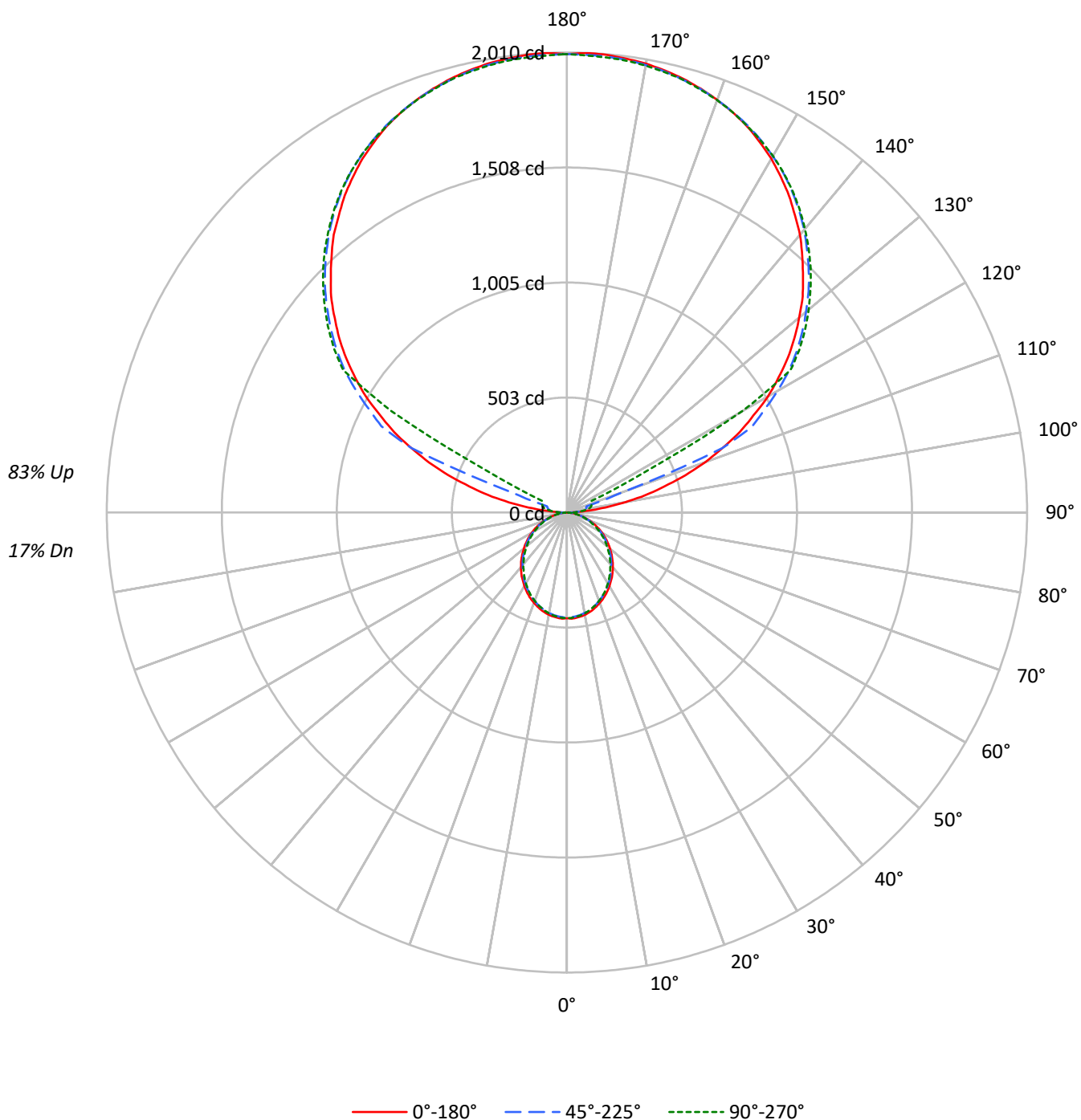
Lumens per Lamp: N/A
Luminaire Lumens: 7050.0 lumens
Efficiency: N/A
Efficacy: 108.1 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.16 / 1.29
Luminous Opening: Rectangular w/ Sides (W: 0.17' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 65.2
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	99	99	99	99	87	87	87	87	65	65	65	44	44	44	26	26	26
1	90	86	83	79	79	76	73	70	57	55	53	39	38	37	22	22	21
2	82	75	69	65	72	66	62	57	50	46	44	34	32	31	20	19	18
3	75	66	59	54	66	58	52	48	44	40	37	30	28	26	18	16	15
4	68	58	51	45	60	51	45	40	39	34	31	27	24	22	16	14	13
5	63	52	44	38	55	46	39	34	34	30	27	24	21	19	14	13	11
6	57	46	38	33	50	41	34	30	31	26	23	21	19	16	13	11	10
7	53	41	34	29	46	37	30	26	28	23	20	19	17	14	12	10	9
8	49	37	30	25	43	33	27	23	25	21	18	18	15	13	11	9	8
9	45	34	27	22	40	30	24	20	23	19	16	16	13	11	10	8	7
10	42	31	24	20	37	28	22	18	21	17	14	15	12	10	9	7	6

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	7310	7310	7310
5°	7322	6969	6918
10°	7262	6651	6518
15°	7156	6331	6099
20°	7013	5983	5700
25°	6870	5619	5302
30°	6688	5277	4883
35°	6520	4917	4473
40°	6309	4562	4085
45°	6100	4210	3706
50°	5873	3850	3311
55°	5633	3467	2937
60°	5362	3050	2548
65°	5066	2628	2140
70°	4694	2167	1728
75°	4173	1670	1334
80°	3545	1136	860
85°	2571	528	364

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°

Vertical Angle: 45°

Luminance: 6100 cd/sqm

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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	43.5	0.6
10°-20°	122.3	1.7
20°-30°	179.7	2.5
30°-40°	208.7	3.0
40°-50°	208.5	3.0
50°-60°	181.8	2.6
60°-70°	134.4	1.9
70°-80°	76.0	1.1
80°-90°	23.6	0.3
90°-100°	66.1	0.9
100°-110°	246.2	3.5
110°-120°	652.9	9.3
120°-130°	1082.9	15.4
130°-140°	1150.3	16.3
140°-150°	1069.1	15.2
150°-160°	859.5	12.2
160°-170°	553.8	7.9
170°-180°	190.6	2.7
0°-30°	345.5	4.9
0°-40°	554.2	7.9
0°-60°	944.5	13.4
0°-90°	1178.5	16.7
90°-120°	965.2	13.7
90°-150°	4267.5	60.5
90°-180°	5871.0	83.3
0°-180°	7050.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	462	462	462	462	462	
5°	462	460	455	459	458	44
15°	440	437	431	433	431	124
25°	398	394	387	388	387	183
35°	343	339	332	329	327	214
45°	279	276	270	265	263	216
55°	211	209	203	198	196	189
65°	142	140	135	131	129	141
75°	75	74	72	69	70	80
85°	18	18	17	16	16	20
90°	1	17	29	36	39	6
95°	94	46	56	64	62	112
105°	441	484	88	104	110	471
115°	833	858	894	223	119	820
125°	1178	1197	1225	1235	1239	1051
135°	1458	1481	1494	1509	1506	1126
145°	1691	1690	1714	1724	1717	1058
155°	1862	1849	1867	1875	1864	858
165°	1962	1954	1958	1968	1958	554
175°	2007	1997	2000	2010	1996	191
180°	2003	2003	2003	2003	2003	

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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	461.8	461.8	461.8	461.8	461.8
2.5°	464.5	462.3	457.4	461.8	461.0
5°	461.8	460.1	455.2	458.7	457.8
7.5°	458.7	456.1	451.2	454.7	453.8
10°	453.8	450.7	445.4	449.0	447.6
12.5°	447.2	444.5	439.2	441.4	440.5
15°	439.6	437.0	431.2	433.0	430.8
17.5°	430.3	427.6	421.9	424.1	421.9
20°	420.1	417.4	411.2	412.5	410.8
22.5°	409.9	405.9	400.1	400.1	399.2
25°	397.9	394.3	386.8	387.7	386.8
27.5°	384.6	381.5	375.7	374.4	372.1
30°	371.2	367.7	361.0	359.7	357.9
32.5°	357.0	354.4	347.3	344.6	342.8
35°	343.3	338.8	331.7	329.1	326.8
37.5°	327.7	323.7	316.6	313.5	311.3
40°	311.7	308.2	301.1	297.1	295.3
42.5°	296.2	292.6	285.5	281.1	278.4
45°	279.3	276.2	269.6	264.7	262.9
47.5°	262.9	259.8	252.7	247.8	245.1
50°	245.6	243.4	237.1	230.9	228.7
52.5°	228.7	225.6	219.8	214.9	211.8
55°	211.4	208.7	203.4	198.1	195.8
57.5°	194.1	191.8	186.1	180.7	179.0
60°	176.7	175.0	168.7	163.9	162.5
62.5°	159.9	156.8	152.3	147.9	146.1
65°	142.5	139.9	135.4	131.4	129.2
67.5°	124.8	122.6	118.6	115.5	113.7
70°	108.4	106.6	102.6	99.5	97.7
72.5°	91.5	89.7	87.5	84.4	83.0
75°	74.6	73.7	71.5	68.8	69.7
77.5°	59.5	57.7	56.8	55.5	54.2
80°	44.4	44.0	43.1	41.7	40.9
82.5°	30.2	30.2	29.8	28.0	28.0
85°	18.2	17.8	17.3	16.0	15.5
87.5°	8.0	7.1	6.2	4.9	4.4
90°	1.4	17.4	29.0	36.2	39.1
92.5°	36.2	30.4	34.8	37.7	39.1
95°	94.2	46.4	56.5	63.8	62.3
97.5°	169.6	50.7	73.9	78.3	79.7
100°	256.5	58.0	82.6	94.2	97.1
102.5°	352.2	349.3	85.5	101.4	105.8
105°	440.6	484.0	88.4	104.3	110.1
107.5°	543.4	579.7	91.3	107.2	113.0
110°	642.0	672.4	253.6	108.7	114.5

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CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	734.7	760.8	736.2	111.6	115.9
115°	833.3	857.9	894.2	223.2	118.8
117.5°	918.8	947.8	972.4	765.2	385.5
120°	1014.4	1036.2	1062.3	1079.7	884.0
122.5°	1095.6	1118.8	1147.8	1156.5	1157.9
125°	1178.2	1197.0	1224.6	1234.7	1239.1
127.5°	1253.6	1273.8	1295.6	1310.1	1311.5
130°	1324.6	1347.8	1363.7	1379.6	1378.2
132.5°	1397.0	1415.9	1431.8	1444.8	1443.4
135°	1457.9	1481.1	1494.1	1508.6	1505.7
137.5°	1521.7	1539.0	1553.5	1568.0	1563.7
140°	1584.0	1595.6	1611.5	1624.5	1617.3
142.5°	1636.1	1646.3	1665.1	1676.7	1669.5
145°	1691.2	1689.8	1714.4	1724.5	1717.3
147.5°	1739.0	1734.7	1759.3	1766.6	1760.8
150°	1785.4	1775.3	1798.5	1807.1	1799.9
152.5°	1824.5	1812.9	1834.7	1843.4	1833.2
155°	1862.2	1849.2	1866.6	1875.3	1863.7
157.5°	1892.7	1881.1	1894.1	1904.2	1892.7
160°	1918.7	1910.0	1918.7	1927.4	1917.3
162.5°	1941.9	1933.2	1940.5	1950.6	1937.6
165°	1962.2	1953.5	1957.9	1968.0	1957.9
167.5°	1978.2	1969.5	1973.8	1983.9	1970.9
170°	1991.2	1982.5	1985.4	1995.5	1982.5
172.5°	1999.9	1991.2	1994.1	2004.2	1991.2
175°	2007.1	1997.0	1999.9	2010.0	1995.5
177.5°	2010.0	1999.9	2001.3	2011.5	1998.4
180°	2002.8	2002.8	2002.8	2002.8	2002.8

(END OF REPORT)