

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: P1008002

Luminaire Tested: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

Issue Date: 5/7/2025

Test Information

Test Method: LM-79-2019
Report Number: P1008002
REPORT IS A COMBINATION OF REPORTS P983835 AND P1007351
Test Lab: INNOVATION CENTER
Issue Date: 5/7/2025
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: NEO-RAY
Catalog Number: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K
Description: Define 2 Direct/Indirect Pendant with 4000K BioUP LEDs {m-DER=0.865} {m-EER=0.951}
Light Source: -
Ballast/Driver: -

Summary

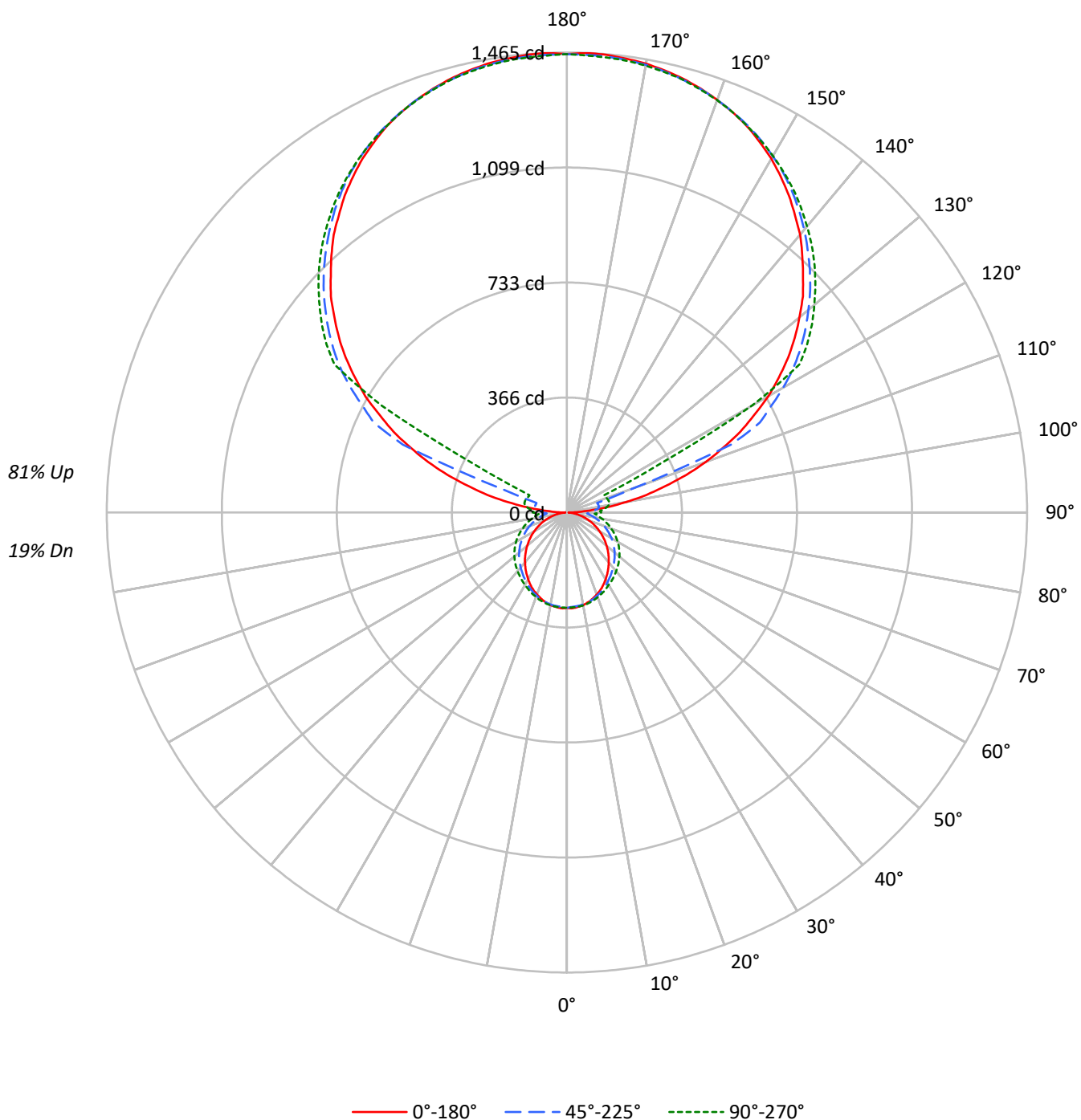
Lumens per Lamp: N/A
Luminaire Lumens: 5440.0 lumens
Efficiency: N/A
Efficacy: 113.3 lumens/watt
Spacing Criteria (0/90/45): 1.21 / 1.31 / 1.42
Luminous Opening: Rectangular w/ Sides (W: 0.17' x L: 4' x H: 0.1')
CIE Type: Semi-Indirect

Input Watts (W): 48
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

TEST NUMBER: P1008002

CATALOG NUMBER: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

Luminous Intensity Polar Plot



TEST NUMBER: P1008002

CATALOG NUMBER: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

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	50	30	10
RCR																				
0	100	100	100	100	88	88	88	88	66	66	66	46	46	46	28	28	28	19		
1	90	86	82	78	79	76	73	70	57	55	53	39	38	37	23	23	22	15		
2	82	75	69	63	72	66	61	57	49	46	43	34	32	30	20	19	18	12		
3	74	65	58	52	65	58	52	47	43	39	36	30	28	25	18	16	15	10		
4	68	57	50	44	60	51	44	39	38	34	30	27	24	21	16	14	13	8		
5	62	51	43	37	54	45	38	33	34	29	26	24	21	18	14	12	11	7		
6	57	45	38	32	50	40	34	29	30	26	22	21	18	16	13	11	10	6		
7	53	41	33	28	46	36	30	25	27	23	19	19	16	14	12	10	8	5		
8	49	37	29	24	43	33	26	22	25	20	17	17	14	12	11	9	7	5		
9	45	33	26	21	40	30	23	19	23	18	15	16	13	11	10	8	7	4		
10	42	30	23	19	37	27	21	17	21	16	13	15	12	10	9	7	6	4		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	4804	4804	4804
5°	4826	4599	4573
10°	4793	4439	4375
15°	4726	4275	4172
20°	4641	4101	3979
25°	4556	3936	3803
30°	4438	3767	3631
35°	4319	3605	3504
40°	4194	3465	3377
45°	4073	3338	3267
50°	3943	3221	3159
55°	3808	3097	3048
60°	3644	2967	2931
65°	3470	2816	2797
70°	3278	2657	2654
75°	3026	2497	2517
80°	2635	2330	2376
85°	2232	2174	2255

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 0°
Vertical Angle: 45°
Luminance: 4073 cd/sqm

TEST NUMBER: P1008002

CATALOG NUMBER: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	28.8	0.5
10°-20°	82.5	1.5
20°-30°	125.0	2.3
30°-40°	152.2	2.8
40°-50°	163.8	3.0
50°-60°	159.1	2.9
60°-70°	138.9	2.6
70°-80°	106.9	2.0
80°-90°	74.2	1.4
90°-100°	97.6	1.8
100°-110°	215.5	4.0
110°-120°	499.7	9.2
120°-130°	802.5	14.8
130°-140°	844.0	15.5
140°-150°	780.1	14.3
150°-160°	626.5	11.5
160°-170°	403.7	7.4
170°-180°	138.9	2.6
0°-30°	236.3	4.3
0°-40°	388.5	7.1
0°-60°	711.5	13.1
0°-90°	1031.5	19.0
90°-120°	812.8	14.9
90°-150°	3239.5	59.5
90°-180°	4409.0	81.0
0°-180°	5440.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	304	304	304	304	304	
5°	304	303	300	303	303	29
15°	290	291	291	295	295	82
25°	264	267	271	276	278	121
35°	227	235	243	253	256	142
45°	186	198	214	227	232	144
55°	143	159	182	198	203	128
65°	98	119	145	163	169	97
75°	54	79	107	126	132	57
85°	16	43	71	90	96	17
90°	6	43	79	102	109	7
95°	72	58	92	114	118	84
105°	323	368	102	129	138	346
115°	609	632	678	202	131	599
125°	860	873	908	927	934	767
135°	1063	1080	1094	1114	1115	821
145°	1233	1232	1250	1260	1256	771
155°	1357	1348	1360	1367	1358	625
165°	1430	1424	1427	1434	1427	404
175°	1463	1456	1458	1465	1454	139
180°	1460	1460	1460	1460	1460	

TEST NUMBER: P1008002

CATALOG NUMBER: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	303.5	303.5	303.5	303.5	303.5
2.5°	305.7	304.4	301.3	303.5	302.6
5°	304.4	303.0	300.4	303.0	302.6
7.5°	302.2	301.3	299.1	302.2	301.7
10°	299.5	298.6	297.3	300.8	300.4
12.5°	295.1	295.6	294.7	298.2	297.8
15°	290.3	291.2	291.2	295.1	294.7
17.5°	284.1	285.9	287.2	291.2	291.2
20°	278.0	280.2	281.9	286.8	286.8
22.5°	271.4	274.0	276.7	281.5	282.4
25°	263.9	267.0	270.9	276.2	277.5
27.5°	255.1	259.9	264.3	270.9	271.8
30°	246.3	252.0	257.7	264.8	266.1
32.5°	236.6	243.2	250.3	258.6	261.3
35°	227.4	234.9	243.2	252.9	256.0
37.5°	217.3	225.6	236.2	246.7	249.8
40°	207.2	216.8	228.7	240.2	244.1
42.5°	197.5	207.2	221.2	234.0	238.0
45°	186.5	198.4	213.8	227.4	231.8
47.5°	175.9	188.7	206.3	220.4	225.2
50°	164.9	178.6	198.4	213.3	218.2
52.5°	154.4	168.9	190.0	205.4	210.7
55°	142.9	158.8	181.7	197.5	203.2
57.5°	132.0	149.5	172.4	189.6	195.3
60°	120.1	139.0	164.1	180.8	186.9
62.5°	109.5	129.3	154.4	172.4	178.1
65°	97.6	119.2	145.1	163.2	168.9
67.5°	87.1	109.5	135.9	153.9	160.1
70°	75.7	98.5	125.8	144.7	150.0
72.5°	65.1	88.8	116.6	135.0	141.6
75°	54.1	78.7	106.9	125.8	131.5
77.5°	43.5	69.1	97.6	116.6	122.7
80°	33.0	59.8	88.4	106.9	113.0
82.5°	24.2	50.6	79.6	98.1	103.8
85°	15.8	43.1	71.3	89.7	95.9
87.5°	9.7	36.1	64.2	82.2	88.0
90°	5.5	42.6	79.2	102.1	109.4
92.5°	30.4	49.5	79.4	98.8	105.0
95°	72.2	58.0	91.8	113.8	118.0
97.5°	126.7	59.0	101.4	120.8	127.2
100°	190.1	61.6	104.2	129.0	135.9
102.5°	259.3	271.8	103.2	130.6	138.7
105°	323.3	367.8	102.2	129.2	138.4
107.5°	398.3	435.3	101.2	127.9	136.9
110°	469.7	500.7	216.9	125.4	134.4

TEST NUMBER: P1008002

CATALOG NUMBER: S122DIP-B290D1080UB2750-4F0-XX-W2A-D_4000K

CANDELA DISTRIBUTION (continued):

	0°	22.5°	45°	67.5°	90°
112.5°	537.3	563.3	565.6	124.4	132.4
115°	609.1	631.9	678.1	202.3	131.0
117.5°	671.0	695.6	732.0	594.2	321.9
120°	740.7	758.3	794.9	819.9	682.1
122.5°	799.8	817.2	854.5	872.8	877.8
125°	859.6	873.4	907.5	926.7	933.9
127.5°	914.6	928.8	956.6	978.1	983.2
130°	966.3	982.7	1003.6	1025.7	1028.3
132.5°	1019.1	1032.4	1050.6	1070.3	1072.7
135°	1063.0	1079.9	1093.8	1113.7	1115.0
137.5°	1109.5	1122.1	1134.9	1153.9	1153.8
140°	1154.9	1162.9	1175.4	1192.0	1189.4
142.5°	1192.9	1199.9	1213.6	1227.4	1224.3
145°	1232.6	1231.6	1249.5	1259.5	1256.5
147.5°	1267.5	1264.3	1282.3	1288.0	1285.1
150°	1301.3	1293.9	1310.8	1317.1	1311.9
152.5°	1329.8	1321.4	1337.2	1343.5	1336.2
155°	1357.3	1347.8	1360.4	1366.8	1358.3
157.5°	1379.5	1371.0	1380.5	1387.9	1379.5
160°	1398.5	1392.1	1398.5	1404.8	1397.4
162.5°	1415.4	1409.0	1414.3	1421.7	1412.2
165°	1430.2	1423.8	1427.0	1434.4	1427.0
167.5°	1441.8	1435.4	1438.6	1446.0	1436.5
170°	1451.3	1444.9	1447.1	1454.5	1444.9
172.5°	1457.6	1451.3	1453.4	1460.8	1451.3
175°	1462.9	1455.5	1457.6	1465.0	1454.5
177.5°	1465.0	1457.6	1458.7	1466.1	1456.6
180°	1459.7	1459.7	1459.7	1459.7	1459.7

(END OF REPORT)