

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: NEO-RAY

Report Number: P242774

Luminaire Tested: **S125DR-S1090D830-X4F0-XX-UDD-F-W**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P242774
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1802-639-12)
Test Lab: INNOVATION CENTER
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: NEO-RAY
Catalog Number: S125DR-S1090D830-X4F0-XX-UDD-F-W
Description: DEFINE 5 DIRECT RECESSED WITH SATIN FLUSH DIFFUSER
STANDARD LIGHT ENGINE
Light Source: (92) 3000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 3954.4 lumens
Efficiency: N/A
Efficacy: 113.6 lumens/watt
Spacing Criteria (0/90/45): 1.2 / 1.18 / 1.3
Luminous Opening: Rectangular (W 0.39' x L: 3.88' x H: 0')
CIE Type: Direct

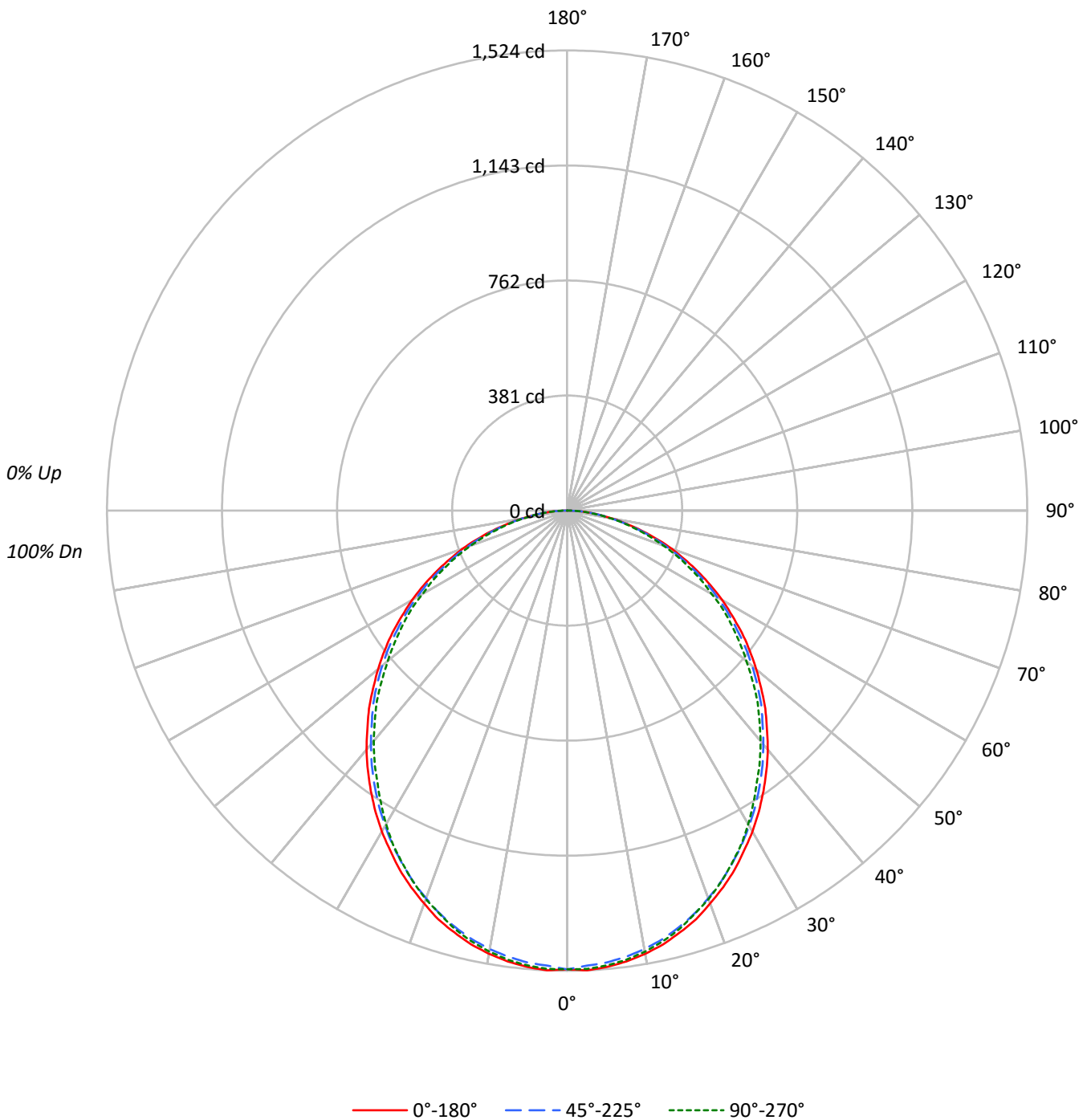
Input Watts (W): 34.8
Input Voltage (V): 120
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	104	100	96	106	102	98	95	98	94	92	94	91	89	90	88	86	84
2	99	91	84	79	97	89	83	78	86	80	76	82	78	74	79	76	72	70
3	91	80	72	66	88	79	71	65	76	69	64	73	67	63	70	66	62	59
4	83	71	62	56	81	70	62	55	67	60	55	65	59	54	63	58	53	51
5	76	64	55	48	74	63	54	48	60	53	47	58	52	47	57	51	46	44
6	71	57	49	42	69	56	48	42	55	47	42	53	46	41	51	46	41	39
7	66	52	43	37	64	51	43	37	50	42	37	48	42	37	47	41	36	34
8	61	48	39	33	60	47	39	33	46	38	33	44	38	33	43	37	33	31
9	57	44	36	30	56	43	35	30	42	35	30	41	34	30	40	34	30	28
10	54	40	33	27	52	40	32	27	39	32	27	38	32	27	37	31	27	25

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10798	10798	10798
5°	10822	10720	10788
10°	10756	10644	10704
15°	10640	10515	10560
20°	10473	10336	10354
25°	10294	10123	10114
30°	10071	9894	9845
35°	9835	9646	9511
40°	9591	9379	9245
45°	9327	9134	8953
50°	9037	8838	8573
55°	8758	8504	8266
60°	8424	8166	7876
65°	8025	7763	7499
70°	7643	7294	7045
75°	6964	6733	6503
80°	6197	6099	5951
85°	5390	5488	5195



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	143.4	3.6
10°-20°	405.0	10.2
20°-30°	597.8	15.1
30°-40°	697.5	17.6
40°-50°	700.5	17.7
50°-60°	615.0	15.6
60°-70°	458.1	11.6
70°-80°	261.6	6.6
80°-90°	75.5	1.9
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	1146.2	29.0
0°-40°	1843.7	46.6
0°-60°	3159.2	79.9
0°-90°	3954.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3954.4	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	1519	1519	1519	1519	1519	
5°	1517	1514	1502	1513	1512	144
15°	1446	1442	1429	1435	1435	408
25°	1313	1306	1291	1293	1290	604
35°	1134	1129	1112	1106	1096	709
45°	928	923	909	894	891	715
55°	707	703	686	676	667	631
65°	477	475	462	451	446	473
75°	254	251	245	242	237	270
85°	66	67	67	66	64	77
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	1519.3	1519.3	1519.3	1519.3	1519.3
2.5°	1524.1	1520.5	1508.5	1520.5	1519.3
5°	1516.9	1514.5	1502.5	1513.3	1512.1
7.5°	1506.1	1503.7	1490.4	1501.3	1500.1
10°	1490.4	1488.0	1474.8	1484.4	1483.2
12.5°	1471.2	1466.4	1454.4	1461.6	1461.6
15°	1446.0	1442.4	1429.1	1435.2	1435.2
17.5°	1419.5	1413.5	1400.3	1407.5	1401.5
20°	1384.7	1382.3	1366.6	1375.1	1369.0
22.5°	1349.8	1345.0	1330.6	1335.4	1331.8
25°	1312.6	1306.5	1290.9	1293.3	1289.7
27.5°	1269.3	1265.7	1250.1	1251.3	1247.6
30°	1227.2	1223.6	1205.6	1203.2	1199.6
32.5°	1181.5	1175.5	1159.9	1155.1	1147.9
35°	1133.5	1128.7	1111.8	1105.8	1096.2
37.5°	1084.2	1078.2	1062.5	1054.1	1048.1
40°	1033.7	1027.7	1010.9	1000.0	996.4
42.5°	979.6	974.8	958.0	948.4	942.3
45°	927.9	923.1	908.7	894.3	890.7
47.5°	871.4	872.6	854.6	840.2	831.8
50°	817.3	813.7	799.3	783.7	775.3
52.5°	762.1	759.6	744.0	730.8	721.2
55°	706.8	703.2	686.3	675.5	667.1
57.5°	647.9	646.7	632.2	617.8	614.2
60°	592.6	587.8	574.5	562.5	554.1
62.5°	534.9	531.3	520.5	507.2	501.2
65°	477.2	474.8	461.6	450.7	445.9
67.5°	420.7	415.9	406.3	396.7	394.2
70°	367.8	361.8	351.0	343.8	339.0
72.5°	310.1	306.5	300.5	292.1	287.3
75°	253.6	251.2	245.2	241.6	236.8
77.5°	200.7	199.5	195.9	193.5	189.9
80°	151.4	151.4	149.0	147.8	145.4
82.5°	108.2	105.8	105.8	103.4	103.4
85°	66.1	67.3	67.3	66.1	63.7
87.5°	32.5	32.5	31.3	31.3	28.8
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)