

Cooper Lighting Solutions Photometric Lab
1121 Highway 74 South
Peachtree City, GA 30269



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: FAIL-SAFE

Report Number: P1499556

Luminaire Tested: MAE-G-4-120-3HI-STD-50-90

Issue Date: 6/26/2026

Test Information

Test Method: LM-79-2019
Report Number: P1499556
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P189188)
Test Lab: INNOVATION CENTER
Issue Date: 6/26/2026
Manufacturer: COOPER LIGHTING SOLUTIONS
Product Line: FAIL-SAFE
Catalog Number: MAE-G-4-120-3HI-STD-50-90
Description: Patient Room Recessed Ceiling Ambient, Exam LED luminaire with, no door frame, 3 HI ambient , STD exam illumination levels
Light Source: -
Ballast/Driver: -

Summary

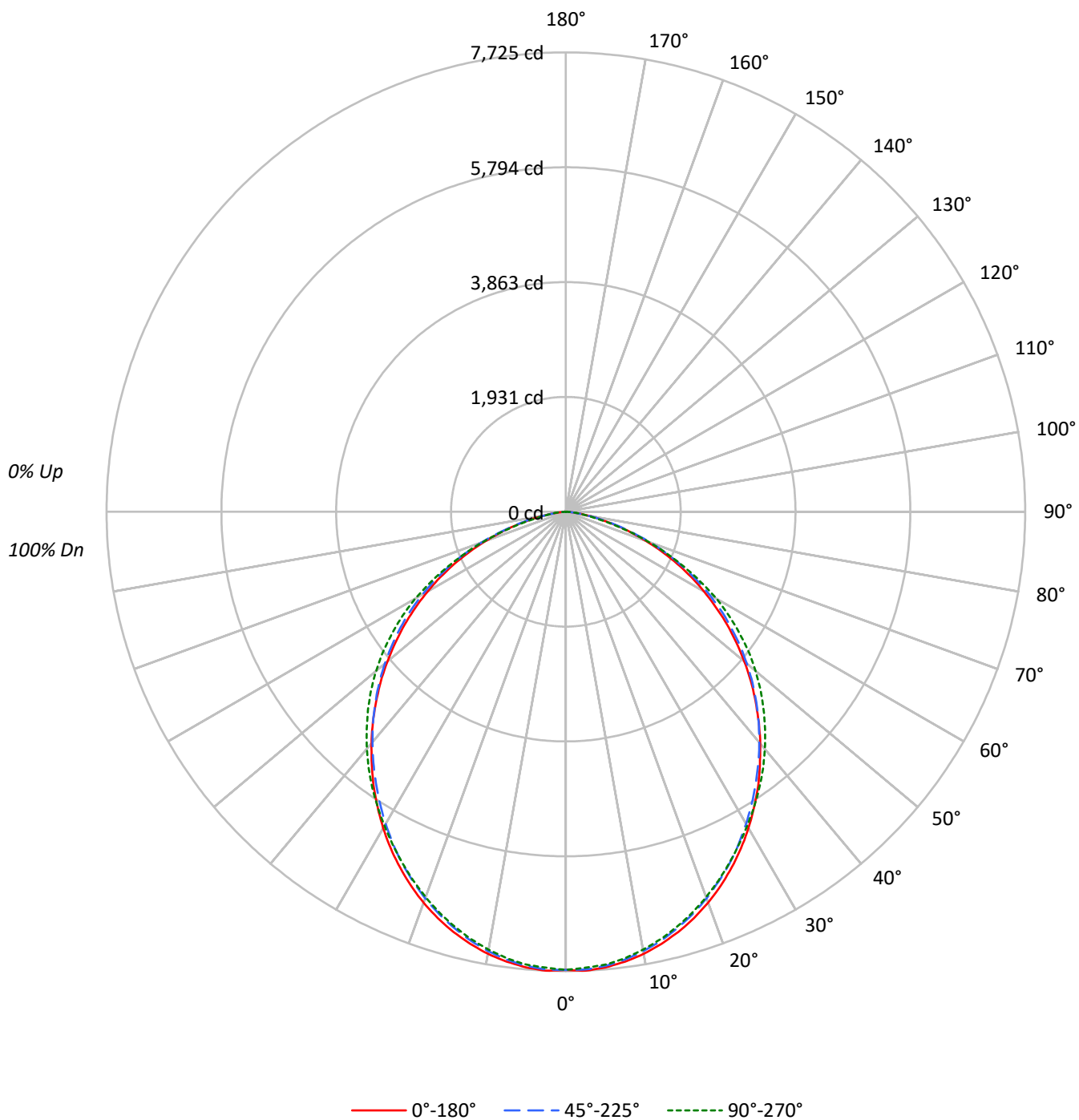
Lumens per Lamp: N/A
Luminaire Lumens: 19042.0 lumens
Efficiency: N/A
Efficacy: 94.5 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.18 / 1.3
Luminous Opening: Rectangular (W 2' x L: 4' x H: 0')
CIE Type: Direct

Input Watts (W): 201.4
Input Voltage (V): NR
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: P1499556

CATALOG NUMBER: MAE-G-4-120-3HI-STD-50-90

Luminous Intensity Polar Plot



TEST NUMBER: P1499556

CATALOG NUMBER: MAE-G-4-120-3HI-STD-50-90

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	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100		
1	110	105	101	98	107	103	99	96	99	96	93	95	93	90	91	89	88	86		
2	100	92	86	81	98	91	85	80	87	82	78	84	80	76	81	77	74	72		
3	92	82	74	68	89	80	73	67	77	71	66	74	69	65	72	67	64	62		
4	84	73	64	58	82	71	63	57	69	62	57	67	61	56	64	59	55	53		
5	78	65	56	50	75	64	56	50	62	55	49	60	54	49	58	53	48	46		
6	72	59	50	44	70	58	50	44	56	49	43	54	48	43	53	47	43	40		
7	67	53	45	39	65	53	44	39	51	44	38	50	43	38	48	42	38	36		
8	62	49	40	35	60	48	40	35	47	40	34	46	39	34	44	38	34	32		
9	58	45	37	31	57	44	37	31	43	36	31	42	36	31	41	35	31	29		
10	54	41	34	29	53	41	33	28	40	33	28	39	33	28	38	32	28	26		

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	10366	10366	10366
5°	10386	10354	10324
10°	10313	10254	10214
15°	10187	10097	10062
20°	10019	9906	9875
25°	9797	9677	9668
30°	9544	9416	9477
35°	9257	9148	9316
40°	8934	8888	9144
45°	8582	8620	8951
50°	8199	8314	8720
55°	7767	7957	8365
60°	7231	7496	7873
65°	6563	6862	6995
70°	5645	5930	5829
75°	4478	4651	4247
80°	3001	2956	2631
85°	1528	1775	2101

MAXIMUM LUMINANCE 45°-90°:

Horizontal Angle: 90°

Vertical Angle: 45°

Luminance: 8951 cd/sqm

TEST NUMBER: P1499556

CATALOG NUMBER: MAE-G-4-120-3HI-STD-50-90

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	725.7	3.8
10°-20°	2042.4	10.7
20°-30°	3004.9	15.8
30°-40°	3504.8	18.4
40°-50°	3518.7	18.5
50°-60°	3044.6	16.0
60°-70°	2113.0	11.1
70°-80°	933.6	4.9
80°-90°	154.4	0.8
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°	5773.0	30.3
0°-40°	9277.8	48.7
0°-60°	15841.1	83.2
0°-90°	19042.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	19042.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	7705	7705	7705	7705	7705	
5°	7690	7655	7666	7634	7644	729
15°	7313	7269	7249	7210	7223	2061
25°	6599	6549	6518	6483	6512	3038
35°	5636	5579	5570	5611	5672	3521
45°	4510	4476	4530	4638	4704	3480
55°	3311	3290	3392	3521	3566	2956
65°	2061	2069	2155	2192	2197	2037
75°	861	876	895	848	817	925
85°	99	104	115	130	136	147
90°	0	0	0	0	0	

TEST NUMBER: P1499556

CATALOG NUMBER: MAE-G-4-120-3HI-STD-50-90

CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	7704.6	7704.6	7704.6	7704.6	7704.6
2.5°	7724.7	7690.0	7704.6	7680.2	7672.7
5°	7689.6	7654.8	7666.2	7634.5	7644.0
7.5°	7629.8	7593.8	7597.7	7564.4	7573.7
10°	7548.4	7507.1	7504.9	7468.2	7476.0
12.5°	7440.3	7398.9	7389.0	7347.9	7361.6
15°	7313.3	7268.7	7248.6	7210.4	7223.3
17.5°	7166.2	7118.2	7094.5	7049.3	7069.5
20°	6997.1	6946.8	6918.3	6869.6	6896.9
22.5°	6807.8	6756.3	6722.5	6681.3	6709.7
25°	6599.3	6549.2	6518.5	6482.6	6512.5
27.5°	6380.3	6324.5	6295.6	6274.7	6307.4
30°	6143.2	6086.6	6060.8	6053.9	6099.6
32.5°	5892.7	5838.4	5819.2	5836.3	5888.6
35°	5636.0	5579.0	5569.6	5611.1	5671.8
37.5°	5359.7	5314.7	5318.2	5383.6	5445.4
40°	5086.3	5039.1	5060.2	5141.4	5206.1
42.5°	4803.4	4764.1	4798.3	4897.9	4958.7
45°	4510.4	4475.6	4530.0	4637.6	4703.9
47.5°	4223.5	4186.6	4255.9	4372.0	4442.8
50°	3916.8	3890.4	3971.9	4099.7	4165.7
52.5°	3614.1	3588.2	3684.0	3817.7	3880.4
55°	3311.2	3289.8	3392.1	3521.1	3566.0
57.5°	2998.3	2992.5	3095.7	3207.5	3253.4
60°	2687.0	2683.7	2785.6	2886.3	2925.8
62.5°	2375.5	2379.5	2474.0	2552.2	2562.9
65°	2061.4	2069.3	2155.2	2191.6	2197.1
67.5°	1744.2	1759.9	1834.3	1846.9	1843.0
70°	1435.0	1445.5	1507.5	1503.2	1481.6
72.5°	1134.6	1152.3	1186.9	1166.4	1134.2
75°	861.4	875.7	894.7	848.2	817.0
77.5°	606.9	616.9	618.2	568.5	547.3
80°	387.3	399.6	381.5	353.8	339.6
82.5°	215.4	226.2	210.6	221.8	227.4
85°	99.0	103.9	115.0	130.2	136.1
87.5°	33.8	39.0	46.7	49.5	45.8
90°	0.0	0.0	0.0	0.0	0.0

TEST NUMBER: P1499556

CATALOG NUMBER: MAE-G-4-120-3HI-STD-50-90

CIE UGR TABLE:

Reflectances:											
Ceiling		0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall		0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference plane		0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions		Viewed crosswise					Viewed endwise				
X=2H	Y=2H	19.06	20.64	19.42	20.95	21.27	19.55	21.14	19.92	21.45	21.77
	3H	20.50	21.92	20.87	22.25	22.61	20.93	22.36	21.31	22.68	23.04
	4H	20.91	22.25	21.31	22.60	22.97	21.27	22.61	21.67	22.96	23.33
	6H	21.11	22.34	21.52	22.71	23.10	21.40	22.64	21.81	23.00	23.39
	8H	21.13	22.31	21.56	22.70	23.10	21.42	22.59	21.84	22.98	23.38
	12H	21.13	22.26	21.56	22.64	23.07	21.42	22.55	21.85	22.93	23.36
4H	2H	19.66	20.99	20.05	21.34	21.72	20.06	21.40	20.46	21.74	22.12
	3H	21.27	22.38	21.68	22.78	23.18	21.62	22.73	22.03	23.13	23.53
	4H	21.77	22.77	22.20	23.18	23.62	22.04	23.04	22.47	23.45	23.89
	6H	22.04	22.91	22.49	23.35	23.80	22.23	23.10	22.68	23.54	24.00
	8H	22.07	22.88	22.54	23.33	23.79	22.26	23.07	22.72	23.51	23.98
	12H	22.08	22.81	22.56	23.29	23.76	22.28	23.00	22.76	23.48	23.95
8H	4H	21.94	22.76	22.41	23.20	23.67	22.19	23.00	22.65	23.45	23.91
	6H	22.26	22.93	22.76	23.42	23.90	22.42	23.09	22.92	23.58	24.06
	8H	22.32	22.92	22.84	23.43	23.92	22.47	23.07	22.99	23.58	24.07
	12H	22.35	22.88	22.86	23.37	23.94	22.52	23.05	23.03	23.54	24.10
12H	4H	21.94	22.66	22.42	23.14	23.61	22.19	22.91	22.67	23.39	23.86
	6H	22.25	22.85	22.76	23.36	23.85	22.41	23.01	22.92	23.52	24.01
	8H	22.34	22.87	22.85	23.36	23.93	22.49	23.02	23.00	23.51	24.08