

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: HALO COMMERCIAL

Report Number: P345285

Luminaire Tested: **PR4FS24D010 PR4M24MD9FSBZ 4000Lm4000K**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P345285
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1908-453-3)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: HALO COMMERCIAL
Catalog Number: PR4FS24D010 PR4M24MD9FSBZ 4000Lm4000K
Description: PR4 MEDIUM LENS WITH, BRONZE FINISH
Light Source: ARRAY OF HIGH LUMEN LEDs 90CRI / 4000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2668.3 lumens
Efficiency: N/A
Efficacy: 59.3 lumens/watt
Spacing Criteria (0/90/45): 1/1/2001
Luminous Opening: Circular (Dia: 0.4' x H: 0')
CIE Type: Direct

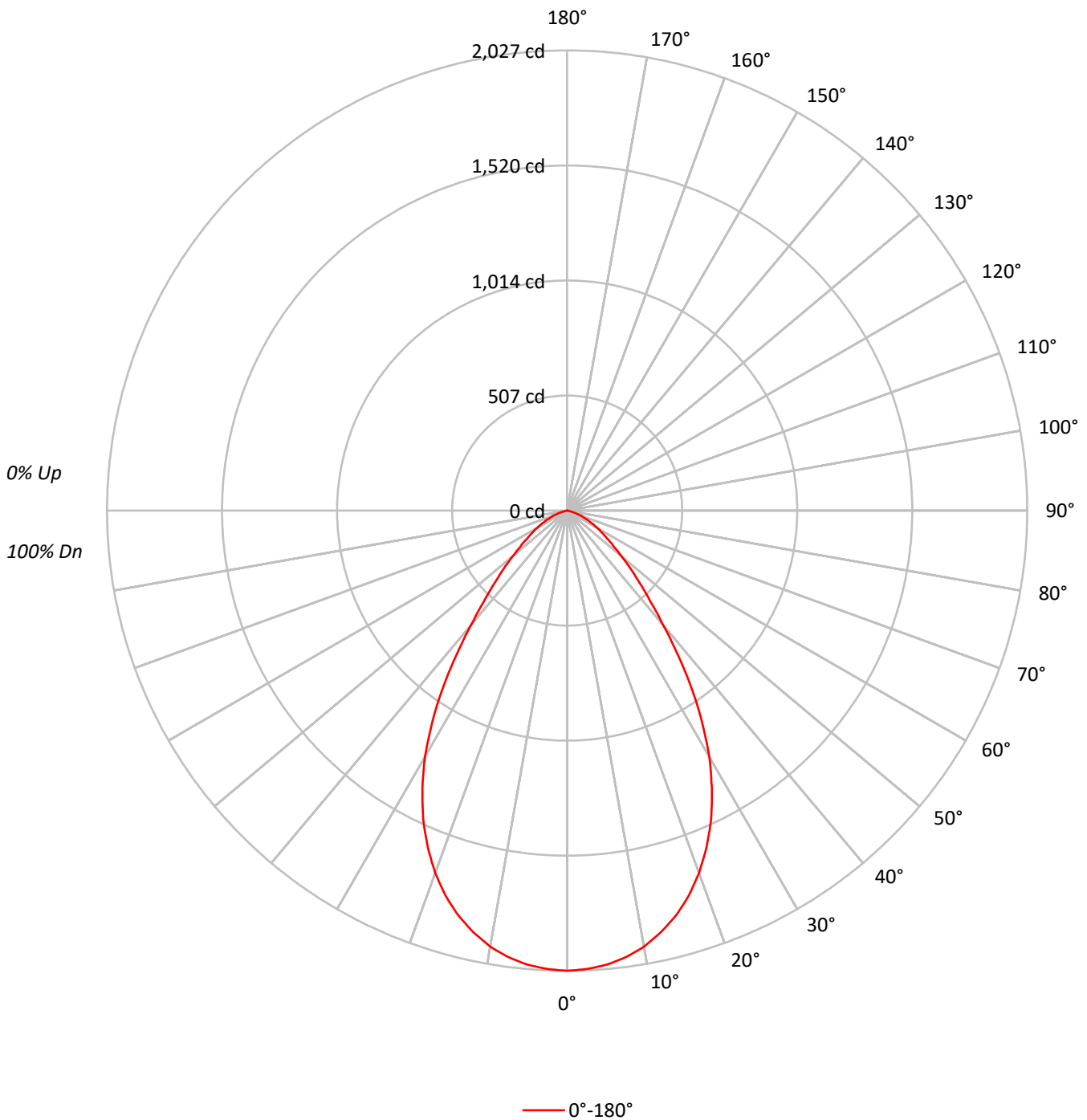
Input Watts (W): 45
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	112	109	106	103	110	107	104	102	103	100	98	99	97	95	95	94	93	91
2	105	99	94	90	103	97	93	89	94	90	87	91	88	85	88	86	83	82
3	98	91	85	80	96	89	84	79	86	82	78	84	80	76	81	78	75	73
4	92	83	76	71	90	82	76	71	79	74	70	77	73	69	75	71	68	66
5	86	76	69	64	85	75	69	64	73	68	63	72	67	63	70	66	62	60
6	81	70	63	58	79	70	63	58	68	62	58	66	61	57	65	60	57	55
7	76	65	58	53	75	65	58	53	63	57	53	62	57	52	61	56	52	51
8	72	61	54	49	70	60	53	49	59	53	49	58	52	48	57	52	48	47
9	68	57	50	45	67	56	50	45	55	49	45	54	49	45	53	48	45	43
10	64	53	46	42	63	53	46	42	52	46	42	51	45	42	50	45	41	40

AVERAGE LUMINANCE (cd/sqm):

	0°
0°	177318
5°	176274
10°	173241
15°	167373
20°	158139
25°	144797
30°	126504
35°	102039
40°	74984
45°	55937
50°	42280
55°	32985
60°	26836
65°	20759
70°	15089
75°	7300
80°	1964
85°	2007



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	189.8	7.1
10°-20°	517.7	19.4
20°-30°	683.7	25.6
30°-40°	592.2	22.2
40°-50°	356.2	13.3
50°-60°	198.4	7.4
60°-70°	101.4	3.8
70°-80°	26.3	1.0
80°-90°	2.7	0.1
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°	1391.2	52.1
0°-40°	1983.4	74.3
0°-60°	2538.0	95.1
0°-90°	2668.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2668.3	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	2027	
5°	2008	190
15°	1848	518
25°	1500	684
35°	956	592
45°	452	356
55°	216	198
65°	100	101
75°	22	26
85°	2	3
90°	0	



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CANDELA DISTRIBUTION (FULL):

	0°
0°	2027.2
2.5°	2021.3
5°	2007.6
7.5°	1984.0
10°	1950.5
12.5°	1903.3
15°	1848.3
17.5°	1779.5
20°	1698.9
22.5°	1604.5
25°	1500.3
27.5°	1380.3
30°	1252.5
32.5°	1107.0
35°	955.6
37.5°	800.3
40°	656.7
42.5°	542.7
45°	452.2
47.5°	379.5
50°	310.7
52.5°	259.5
55°	216.3
57.5°	182.9
60°	153.4
62.5°	125.8
65°	100.3
67.5°	78.7
70°	59.0
72.5°	39.3
75°	21.6
77.5°	7.9
80°	3.9
82.5°	3.9
85°	2.0
87.5°	2.0
90°	0.0

(END OF REPORT)