

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: P345262

Luminaire Tested: **PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P345262
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: PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K
Description: PR4 MEDIUM LENS WITH, BRONZE FINISH
Light Source: ARRAY OF HIGH LUMEN LEDs 80CRI / 3000K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1636.7 lumens
Efficiency: N/A
Efficacy: 79.1 lumens/watt
Spacing Criteria (0/90/45): 1/1/2001
Luminous Opening: Circular (Dia: 0.4' x H: 0')
CIE Type: Direct

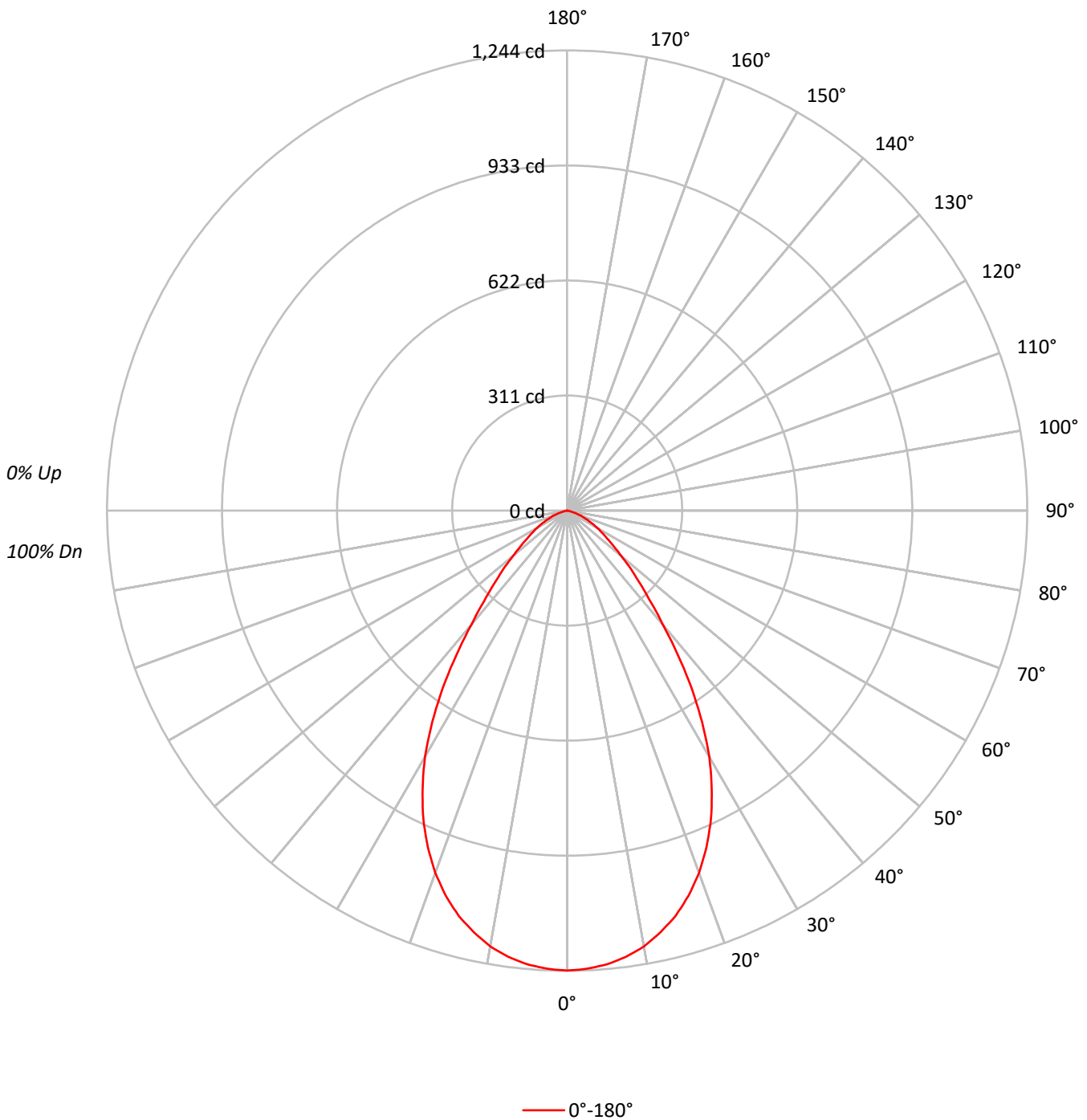
Input Watts (W): 20.7
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



TEST NUMBER: P345262

CATALOG NUMBER: PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K

Luminous Intensity Polar Plot





TEST NUMBER: P345262

CATALOG NUMBER: PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K

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°	108768
5°	108121
10°	106263
15°	102662
20°	97002
25°	88810
30°	77599
35°	62595
40°	45993
45°	34315
50°	25937
55°	20237
60°	16462
65°	12729
70°	9258
75°	4495
80°	1209
85°	1204



TEST NUMBER: P345262

CATALOG NUMBER: PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	116.4	7.1
10°-20°	317.5	19.4
20°-30°	419.4	25.6
30°-40°	363.2	22.2
40°-50°	218.5	13.3
50°-60°	121.7	7.4
60°-70°	62.2	3.8
70°-80°	16.1	1.0
80°-90°	1.6	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°	853.3	52.1
0°-40°	1216.6	74.3
0°-60°	1556.8	95.1
0°-90°	1636.7	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1636.7	100.0

CANDELA DISTRIBUTION:

	0°	Flux
0°	1244	
5°	1231	116
15°	1134	318
25°	920	419
35°	586	363
45°	277	218
55°	133	122
65°	62	62
75°	13	16
85°	1	2
90°	0	



TEST NUMBER: P345262

CATALOG NUMBER: PR4FS12D010 PR4M12MD8FSBZ 2000Lm3000K

CANDELA DISTRIBUTION (FULL):

	0°
0°	1243.5
2.5°	1239.9
5°	1231.4
7.5°	1216.9
10°	1196.4
12.5°	1167.5
15°	1133.7
17.5°	1091.5
20°	1042.1
22.5°	984.2
25°	920.2
27.5°	846.7
30°	768.3
32.5°	679.0
35°	586.2
37.5°	490.9
40°	402.8
42.5°	332.9
45°	277.4
47.5°	232.8
50°	190.6
52.5°	159.2
55°	132.7
57.5°	112.2
60°	94.1
62.5°	77.2
65°	61.5
67.5°	48.2
70°	36.2
72.5°	24.1
75°	13.3
77.5°	4.8
80°	2.4
82.5°	2.4
85°	1.2
87.5°	1.2
90°	0.0

(END OF REPORT)