

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: P210206

Luminaire Tested: **PR840D010 - PR8M34WDMB - 4000K**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P210206  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P29051)  
Test Lab: INNOVATION CENTER-P2  
Issue Date: 03/03/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: HALO COMMERCIAL  
Catalog Number: PR840D010 - PR8M34WDMB - 4000K  
Description: HALO 8" ROUND DOWNLIGHT, WIDE LENS, MATTE BLACK FINISH  
Light Source: (1) HIGH LUMEN LED 80CRI / 4000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4160.5 lumens  
Efficiency: N/A  
Efficacy: 95.6 lumens/watt  
Spacing Criteria (0/90/45): 1.37 / 1.37 / 1.39  
Luminous Opening: Circular (Dia: 0.67' x H: 0')  
CIE Type: Direct

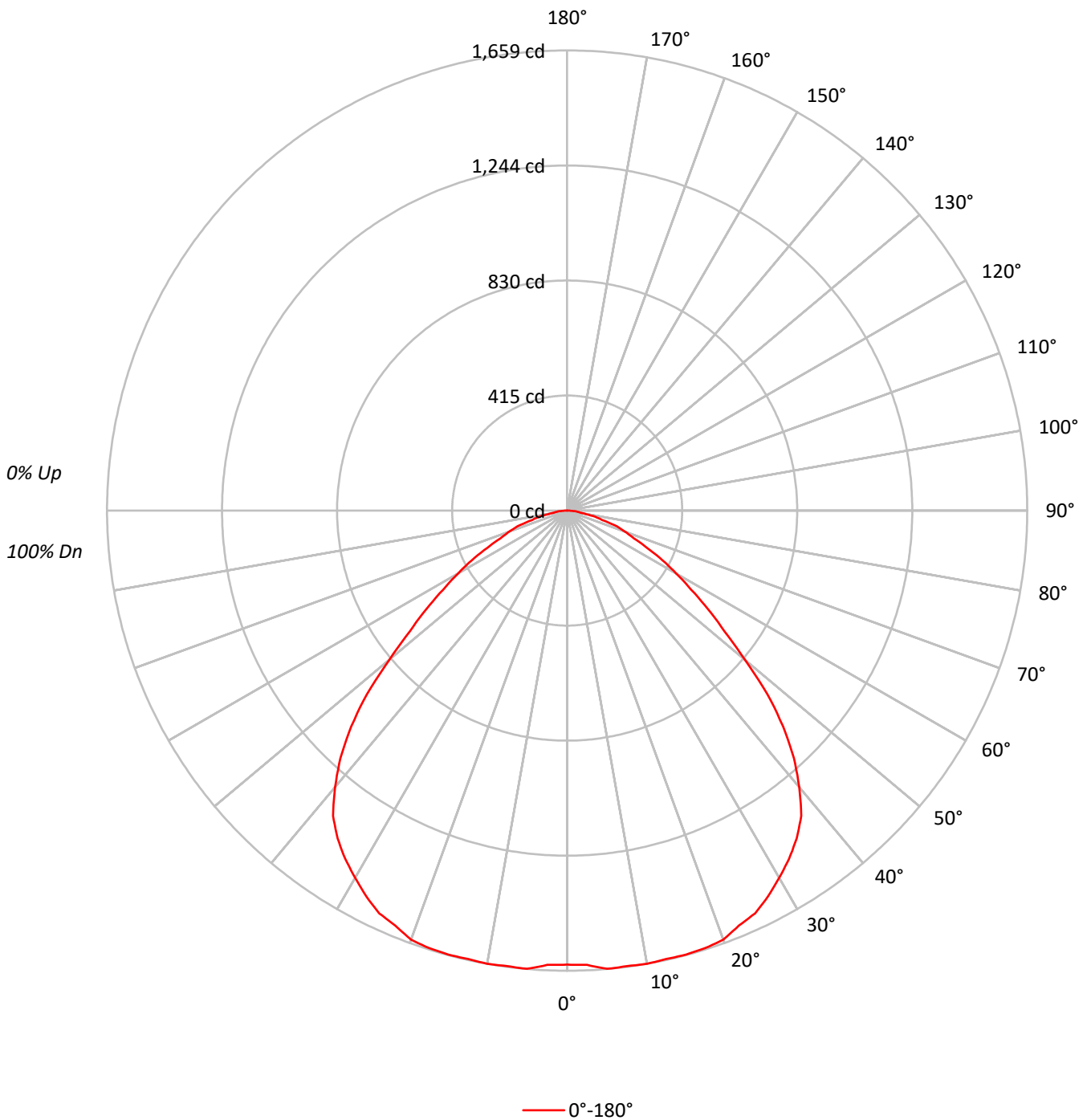
Input Watts (W): 43.5  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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	110	106	103	99	108	104	101	98	100	97	95	96	94	92	92	91	89	87
2	102	94	88	83	99	92	87	82	89	84	80	86	82	79	83	80	77	75
3	93	84	77	71	91	82	76	70	79	74	69	77	72	68	74	70	67	65
4	86	75	67	61	84	74	66	61	71	65	60	69	64	59	67	62	58	56
5	80	68	59	53	78	67	59	53	64	58	52	63	57	52	61	56	51	49
6	74	61	53	47	72	60	52	47	59	52	46	57	51	46	55	50	46	44
7	68	56	48	42	67	55	47	42	53	46	41	52	46	41	51	45	41	39
8	64	51	43	37	62	50	43	37	49	42	37	48	42	37	47	41	37	35
9	60	47	39	34	58	46	39	34	45	38	34	44	38	33	43	37	33	31
10	56	43	36	31	55	43	36	31	42	35	31	41	35	30	40	34	30	29

**AVERAGE LUMINANCE (cd/sqm):**

	0°
0°	50479
5°	51328
10°	51947
15°	52908
20°	54024
25°	54517
30°	54432
35°	54298
40°	52411
45°	48001
50°	40100
55°	33337
60°	28018
65°	23152
70°	19907
75°	15620
80°	10815
85°	11357



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	158.0	3.8
10°-20°	469.0	11.3
20°-30°	736.5	17.7
30°-40°	897.8	21.6
40°-50°	839.1	20.2
50°-60°	559.7	13.5
60°-70°	322.0	7.7
70°-80°	148.5	3.6
80°-90°	30.1	0.7
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°	1363.4	32.8
0°-40°	2261.2	54.3
0°-60°	3659.9	88.0
0°-90°	4160.5	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4160.5	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	1637	
5°	1658	158
15°	1657	469
25°	1602	736
35°	1442	898
45°	1101	839
55°	620	560
65°	317	322
75°	131	148
85°	32	30
90°	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°
0°	1637.0
2.5°	1639.6
5°	1658.2
7.5°	1656.5
10°	1659.0
12.5°	1655.6
15°	1657.3
17.5°	1654.0
20°	1646.3
22.5°	1619.3
25°	1602.3
27.5°	1568.5
30°	1528.7
32.5°	1489.0
35°	1442.4
37.5°	1386.6
40°	1302.0
42.5°	1209.8
45°	1100.7
47.5°	979.7
50°	835.9
52.5°	714.0
55°	620.1
57.5°	530.4
60°	454.3
62.5°	388.3
65°	317.3
67.5°	260.6
70°	220.8
72.5°	187.8
75°	131.1
77.5°	104.1
80°	60.9
82.5°	38.9
85°	32.1
87.5°	9.3
90°	0.0

(END OF REPORT)