

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: P210308

Luminaire Tested: **PR840D010 - PR8M34WDMB - 3500K**

Issue Date: 03/03/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P210308  
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 - 3500K  
Description: HALO 8" ROUND DOWNLIGHT, WIDE LENS, MATTE BLACK FINISH  
Light Source: (1) HIGH LUMEN LED 80CRI / 3500K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4473.4 lumens  
Efficiency: N/A  
Efficacy: 102.8 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

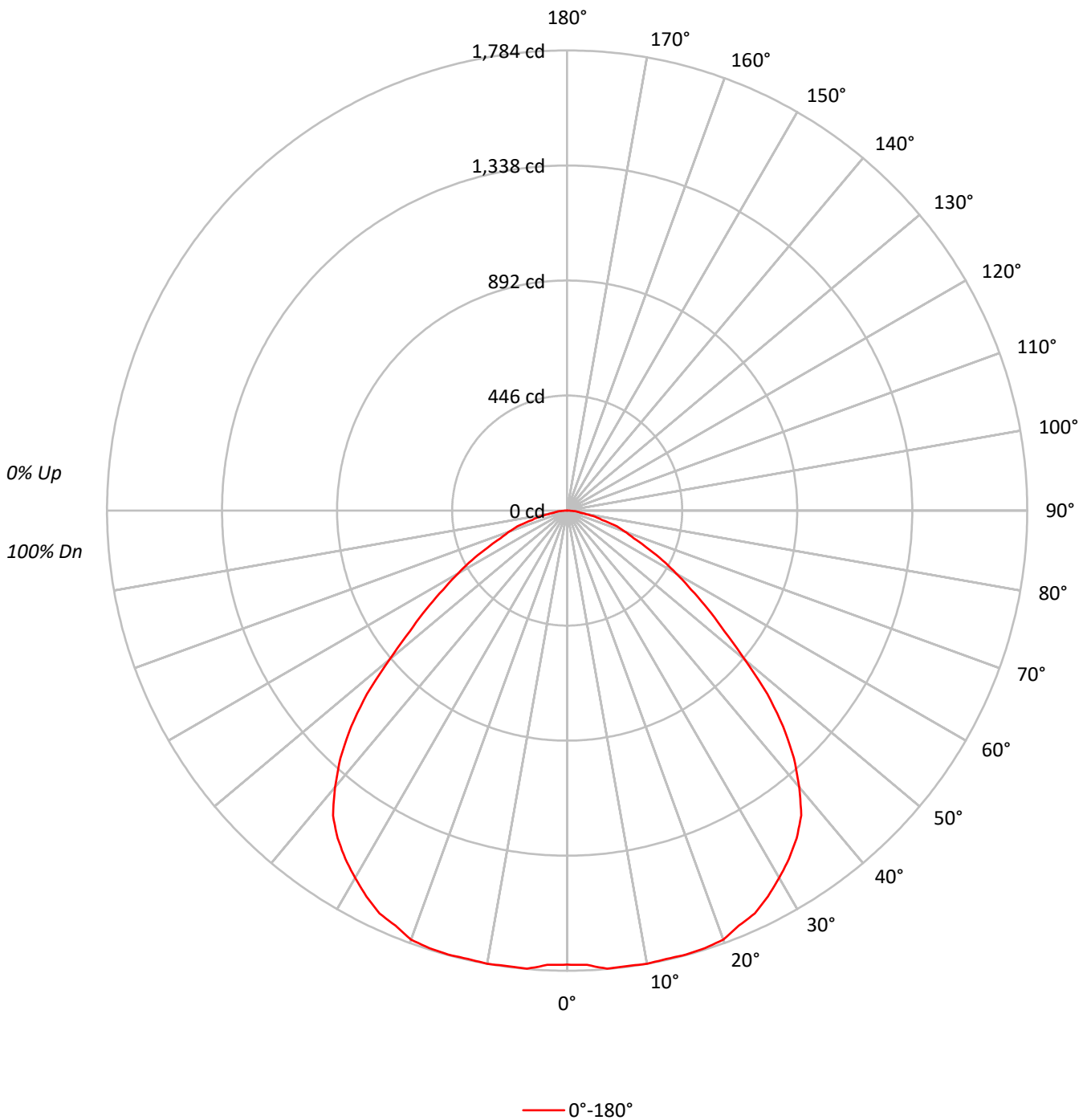
Input Watts (W): 43.5  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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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°	54275
5°	55188
10°	55854
15°	56889
20°	58086
25°	58617
30°	58527
35°	58382
40°	56352
45°	51607
50°	43113
55°	35848
60°	30127
65°	24888
70°	21404
75°	16799
80°	11631
85°	12242



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	169.8	3.8
10°-20°	504.2	11.3
20°-30°	791.9	17.7
30°-40°	965.3	21.6
40°-50°	902.2	20.2
50°-60°	601.8	13.5
60°-70°	346.2	7.7
70°-80°	159.7	3.6
80°-90°	32.4	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°	1465.9	32.8
0°-40°	2431.2	54.3
0°-60°	3935.1	88.0
0°-90°	4473.4	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	4473.4	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	1760	
5°	1783	170
15°	1782	504
25°	1723	792
35°	1551	965
45°	1183	902
55°	667	602
65°	341	346
75°	141	160
85°	35	32
90°	0	



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**CANDELA DISTRIBUTION (FULL):**

0°	
0°	1760.1
2.5°	1762.9
5°	1782.9
7.5°	1781.0
10°	1783.8
12.5°	1780.1
15°	1782.0
17.5°	1778.3
20°	1770.1
22.5°	1741.0
25°	1722.8
27.5°	1686.4
30°	1643.7
32.5°	1600.9
35°	1550.9
37.5°	1490.9
40°	1399.9
42.5°	1300.8
45°	1183.4
47.5°	1053.3
50°	898.7
52.5°	767.7
55°	666.8
57.5°	570.3
60°	488.5
62.5°	417.5
65°	341.1
67.5°	280.2
70°	237.4
72.5°	201.9
75°	141.0
77.5°	111.9
80°	65.5
82.5°	41.8
85°	34.6
87.5°	10.0
90°	0.0

(END OF REPORT)