

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



Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: HALO COMMERCIAL

Report Number: P580679

Luminaire Tested: **HCC4S40D010BZ-HM43040940-41NDW**

Issue Date: 9/9/2021

**Test Information**

Test Method: LM-41-14  
Report Number: P580679  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2106-266-3)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 9/9/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: HALO COMMERCIAL  
Catalog Number: HCC4S40D010BZ-HM43040940-41NDW  
Description: HALO COMMERCIAL 4" ROUND, NEW CONSTRUCTION FRAME, WITH 4" NARROW DISTRIBUTION, WHITE TRIM  
Light Source: (1) HIGH LUMEN LED 90CRI / 4000K CCT  
CYLINDER  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

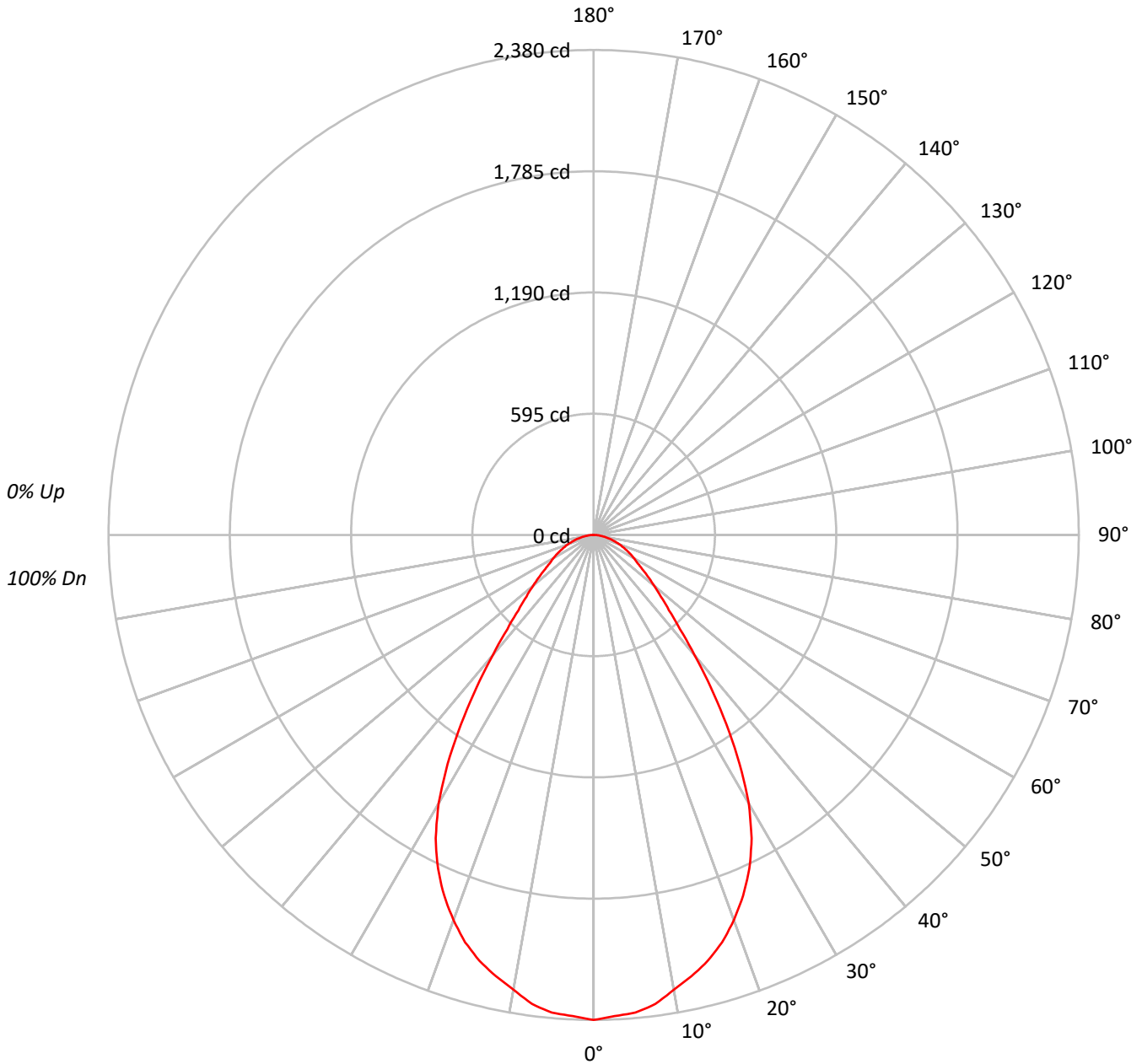
Lumens per Lamp: N/A  
Luminaire Lumens: 3341.9 lumens  
Efficiency: N/A  
Efficacy: 81.5 lumens/watt  
Spacing Criteria (0/90/45): 1.03 / 1.03 / 1.01  
Luminous Opening: Circular (Dia: 0.33' x H: 0')  
CIE Type: Direct

Input Watts (W): 41  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): 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	50	30	10	0
RCR																					
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100			100
1	111	108	104	101	109	105	102	100	101	99	97	98	96	94	94	92	91	89			89
2	104	97	92	88	101	96	91	87	92	88	85	89	86	83	86	83	81	79			79
3	97	88	82	77	95	87	81	76	84	79	75	82	77	74	79	76	73	71			71
4	90	81	74	68	88	80	73	68	77	72	67	75	70	66	73	69	65	64			64
5	85	74	67	61	83	73	66	61	71	65	60	69	64	60	68	63	59	58			58
6	79	68	61	56	78	67	60	55	66	60	55	64	59	55	63	58	54	52			52
7	75	63	56	51	73	62	56	51	61	55	50	60	54	50	59	53	50	48			48
8	70	59	52	47	69	58	51	46	57	51	46	56	50	46	55	50	46	44			44
9	66	55	48	43	65	54	47	43	53	47	43	52	47	43	51	46	42	41			41
10	63	51	44	40	62	51	44	40	50	44	40	49	43	39	48	43	39	38			38

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

	0°
0°	293600
5°	291403
10°	283825
15°	276349
20°	263980
25°	245941
30°	216561
35°	170800
40°	123966
45°	91091
50°	74109
55°	62148
60°	56320
65°	51747
70°	48181
75°	43987
80°	39636
85°	34390



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	221.9	6.6
10°-20°	607.0	18.2
20°-30°	822.8	24.6
30°-40°	706.1	21.1
40°-50°	416.9	12.5
50°-60°	264.2	7.9
60°-70°	177.5	5.3
70°-80°	98.0	2.9
80°-90°	27.4	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°	1651.8	49.4
0°-40°	2357.8	70.6
0°-60°	3038.9	90.9
0°-90°	3341.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3341.9	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	2380	
5°	2354	222
15°	2164	607
25°	1807	823
35°	1134	706
45°	522	417
55°	289	264
65°	177	178
75°	92	98
85°	24	27
90°	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°
0°	2380.3
2.5°	2363.3
5°	2353.5
7.5°	2322.0
10°	2266.1
12.5°	2217.6
15°	2164.1
17.5°	2096.2
20°	2011.1
22.5°	1916.3
25°	1807.1
27.5°	1678.4
30°	1520.5
32.5°	1333.4
35°	1134.3
37.5°	942.4
40°	769.9
42.5°	626.6
45°	522.2
47.5°	446.9
50°	386.2
52.5°	335.2
55°	289.0
57.5°	252.6
60°	228.3
62.5°	204.0
65°	177.3
67.5°	155.5
70°	133.6
72.5°	111.8
75°	92.3
77.5°	72.9
80°	55.8
82.5°	38.9
85°	24.3
87.5°	9.8
90°	0.0

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Scaled Data Report



Report Generated By 670245859 / DESKTOP-T8S5UU9

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— 0°-180°

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(END OF REPORT)