

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: P592823

Luminaire Tested: **HC4R40D010-HM43040950-42RMDC**

Issue Date: 9/23/2021

**Test Information**

Test Method: LM-41-14  
Report Number: P592823  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2106-266-13)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 9/23/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: HALO COMMERCIAL  
Catalog Number: HC4R40D010-HM43040950-42RMDC  
Description: HALO COMMERCIAL 4" ROUND, RETROFIT FRAME, WITH 4" MEDIUM DISTRIBUTION, SPECULAR TRIM  
Light Source: (1) HIGH LUMEN LED 90CRI / 5000K CCT  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 3766.9 lumens  
Efficiency: N/A  
Efficacy: 91.9 lumens/watt  
Spacing Criteria (0/90/45): 1.02 / 1.02 / 0.96  
Luminous Opening: Circular (Dia: 0.33' x H: 0')  
CIE Type: Direct

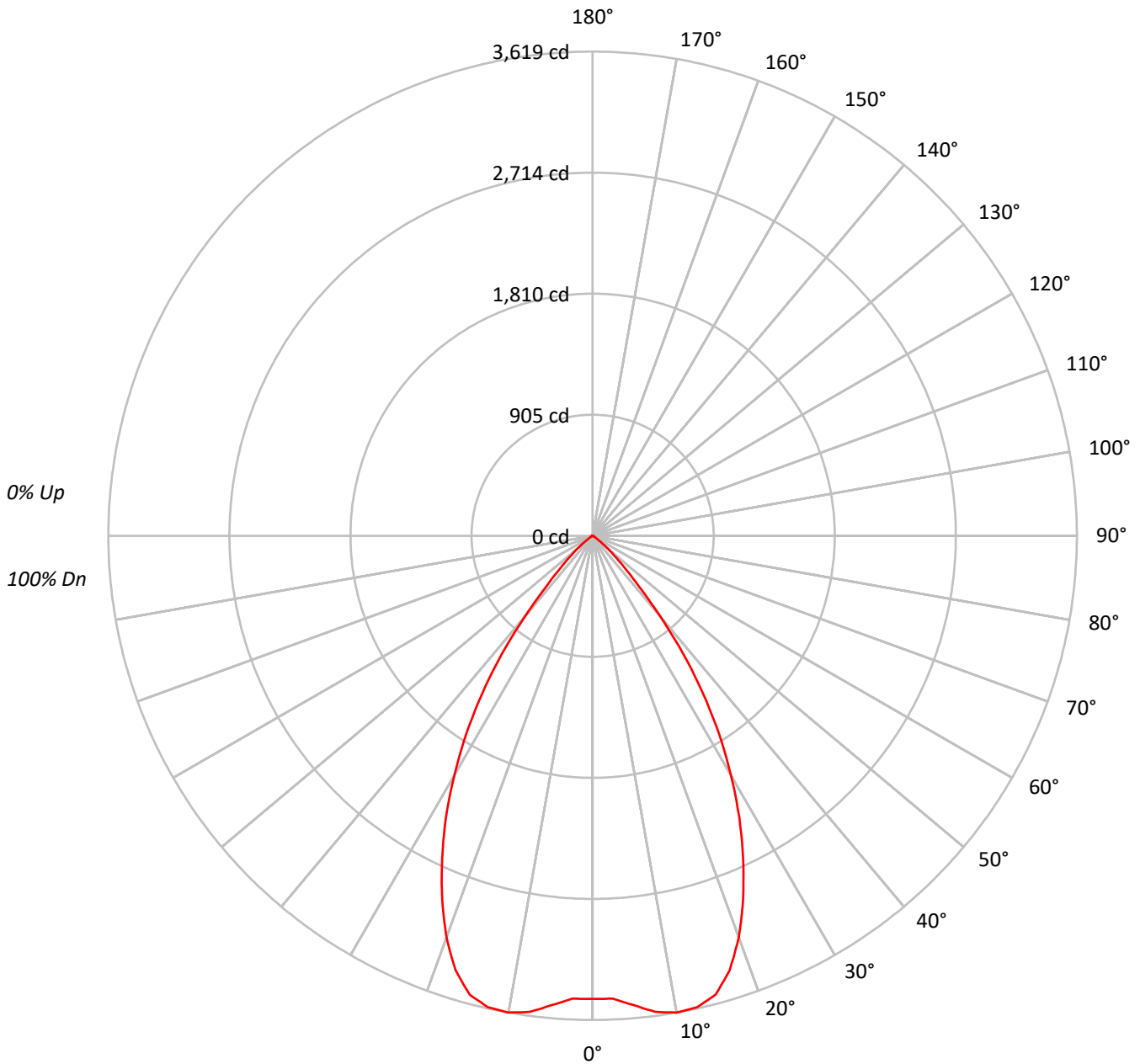
Input Watts (W): 41  
Input Voltage (V): NR  
Input Current (A<sub>in</sub>): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



TEST NUMBER: P592823

CATALOG NUMBER: HC4R40D010-HM43040950-42RMDC

### Luminous Intensity Polar Plot





TEST NUMBER: P592823

CATALOG NUMBER: HC4R40D010-HM43040950-42RMDC

**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			
1	113	111	108	106	111	108	106	104	104	103	101	101	99	98	97	96	95	93			
2	108	103	99	95	105	101	97	94	98	95	92	95	92	90	92	90	88	86			
3	102	95	90	86	100	94	89	86	91	87	84	89	86	83	87	84	82	80			
4	97	89	83	79	95	88	82	78	86	81	77	84	80	77	82	78	76	74			
5	92	83	77	73	90	82	76	72	80	75	72	78	74	71	77	73	70	69			
6	87	78	71	67	85	77	71	67	75	70	66	74	69	66	72	68	65	64			
7	82	73	66	62	81	72	66	62	71	65	62	69	65	61	68	64	61	60			
8	78	68	62	58	77	68	62	58	67	61	57	65	61	57	65	60	57	56			
9	74	64	58	54	73	64	58	54	63	57	54	62	57	54	61	57	53	52			
10	70	61	55	51	69	60	54	51	59	54	50	58	54	50	58	53	50	49			

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

	0°
0°	426875
5°	436021
10°	453224
15°	453413
20°	419197
25°	362263
30°	294696
35°	216500
40°	125142
45°	58471
50°	27038
55°	9398
60°	2985
65°	2131
70°	1731
75°	1191
80°	0
85°	0



TEST NUMBER: P592823

CATALOG NUMBER: HC4R40D010-HM43040950-42RMDC

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	339.7	9.0
10°-20°	984.0	26.1
20°-30°	1211.8	32.2
30°-40°	884.7	23.5
40°-50°	288.3	7.7
50°-60°	48.2	1.3
60°-70°	7.5	0.2
70°-80°	2.6	0.1
80°-90°	0.0	0.0
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°	2535.6	67.3
0°-40°	3420.3	90.8
0°-60°	3756.8	99.7
0°-90°	3766.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3766.9	100.0

**CANDELA DISTRIBUTION:**

	0°	Flux
0°	3461	
5°	3522	340
15°	3551	984
25°	2662	1212
35°	1438	885
45°	335	288
55°	44	48
65°	7	7
75°	2	3
85°	0	0
90°	0	



TEST NUMBER: P592823

CATALOG NUMBER: HC4R40D010-HM43040950-42RMDC

**CANDELA DISTRIBUTION (FULL):**

0°	
0°	3460.8
2.5°	3463.2
5°	3521.5
7.5°	3589.4
10°	3618.6
12.5°	3608.9
15°	3550.7
17.5°	3404.9
20°	3193.6
22.5°	2938.6
25°	2661.8
27.5°	2372.7
30°	2069.1
32.5°	1758.3
35°	1437.8
37.5°	1114.7
40°	777.2
42.5°	507.6
45°	335.2
47.5°	220.9
50°	140.9
52.5°	82.6
55°	43.7
57.5°	17.0
60°	12.1
62.5°	9.8
65°	7.3
67.5°	4.8
70°	4.8
72.5°	2.5
75°	2.5
77.5°	2.5
80°	0.0
82.5°	0.0
85°	0.0
87.5°	0.0
90°	0.0



Report Generated By 670245859 / DESKTOP-HRDQ47P







— 0°-180°







(END OF REPORT)