

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: P580325

Luminaire Tested: **HCC4S30D010MB-HM43040840-41WWW**

Issue Date: 9/9/2021

**Test Information**

Test Method: LM-41-14  
Report Number: P580325  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-2106-266-16)  
Test Lab: COOPER LIGHTING SOLUTIONS  
Issue Date: 9/9/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: HALO COMMERCIAL  
Catalog Number: HCC4S30D010MB-HM43040840-41WWW  
Description: HALO COMMERCIAL 4" ROUND, NEW CONSTRUCTION FRAME, WITH 4" WALLWASH DISTRIBUTION, WHITE TRIM  
Light Source: (1) HIGH LUMEN LED 80CRI / 4000K CCT  
CYLINDER  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

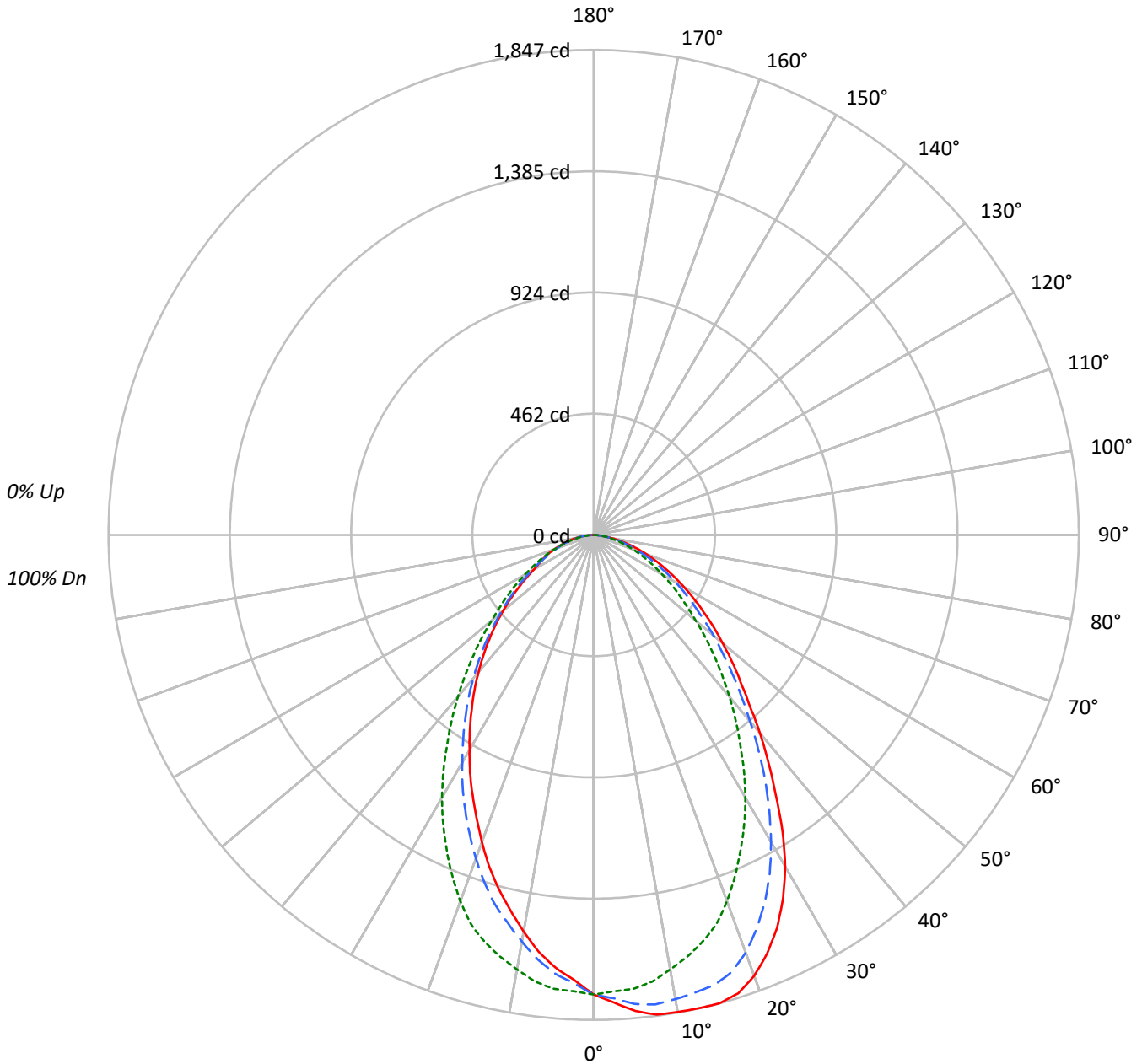
Lumens per Lamp: N/A  
Luminaire Lumens: 3125.3 lumens  
Efficiency: N/A  
Efficacy: 111.6 lumens/watt  
Spacing Criteria (0/90/45): 1.06 / 1.03 / 1.1  
Luminous Opening: Circular (Dia: 0.33' x H: 0')  
CIE Type: Direct

Input Watts (W): 28  
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: P580325  
CATALOG NUMBER: HCC4S30D010MB-HM43040840-41WWW

### Luminous Intensity Polar Plot



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



TEST NUMBER: P580325

CATALOG NUMBER: HCC4S30D010MB-HM43040840-41WWW

**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	111	106	103	100	108	104	101	98	100	97	95	96	94	92	93	91	89	87								
2	102	95	89	84	100	93	88	83	90	85	81	87	83	80	84	81	78	76								
3	94	85	78	72	92	84	77	72	81	75	71	78	73	69	76	72	68	66								
4	87	77	69	63	85	76	68	63	73	67	62	71	66	61	69	64	60	58								
5	81	70	62	56	79	69	61	56	67	60	55	65	59	54	63	58	54	52								
6	76	64	56	50	74	63	55	50	61	54	49	59	53	49	58	53	48	47								
7	71	58	50	45	69	58	50	45	56	49	44	55	49	44	53	48	44	42								
8	66	54	46	41	65	53	46	41	52	45	40	51	45	40	50	44	40	38								
9	62	50	42	37	61	49	42	37	48	42	37	47	41	37	46	41	37	35								
10	59	46	39	34	57	46	39	34	45	38	34	44	38	34	43	38	34	32								

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

	0°	90°	180°
0°	215867	215867	215867
5°	225359	214909	204954
10°	231058	210417	192119
15°	235843	204813	178252
20°	234578	194845	163237
25°	224737	180179	148509
30°	207616	164518	134594
35°	181973	146331	121832
40°	158472	129296	109733
45°	137910	112774	98051
50°	122887	97193	86524
55°	109803	85459	74836
60°	98035	74649	64510
65°	87150	65523	61291
70°	76491	56440	57161
75°	64766	48038	52995
80°	49722	40914	48231
85°	29154	32126	40900



TEST NUMBER: P580325  
 CATALOG NUMBER: HCC4S30D010MB-HM43040840-41WWW

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	164.0	5.2
10°-20°	452.5	14.5
20°-30°	618.2	19.8
30°-40°	620.8	19.9
40°-50°	513.5	16.4
50°-60°	372.2	11.9
60°-70°	235.7	7.5
70°-80°	119.1	3.8
80°-90°	29.2	0.9
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°	1234.7	39.5
0°-40°	1855.5	59.4
0°-60°	2741.2	87.7
0°-90°	3125.3	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	3125.3	100.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	1750	1750	1750	1750	1750	
5°	1820	1793	1736	1678	1655	174
15°	1847	1775	1604	1456	1396	519
25°	1651	1542	1324	1157	1091	755
35°	1208	1137	972	852	809	758
45°	791	745	646	583	562	615
55°	511	465	397	362	348	459
65°	299	266	224	202	210	297
75°	136	117	101	105	111	145
85°	21	21	23	27	29	29
90°	0	0	0	0	0	



TEST NUMBER: P580325

CATALOG NUMBER: HCC4S30D010MB-HM43040840-41WWW

**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	1750.1	1750.1	1750.1	1750.1	1750.1	1750.1	1750.1	1750.1	1750.1
2.5°	1783.0	1776.8	1766.6	1754.2	1739.8	1723.4	1708.9	1700.7	1696.5
5°	1820.1	1811.8	1793.3	1766.6	1735.7	1704.7	1678.0	1661.5	1655.3
7.5°	1842.7	1830.4	1803.6	1762.4	1715.1	1669.8	1630.6	1608.0	1601.9
10°	1844.8	1830.4	1795.3	1739.8	1680.0	1620.4	1573.0	1540.1	1533.9
12.5°	1846.9	1828.4	1785.1	1719.2	1645.1	1571.0	1513.3	1474.2	1463.9
15°	1846.9	1828.4	1774.8	1696.5	1603.9	1519.5	1455.7	1410.3	1395.9
17.5°	1830.4	1809.8	1745.9	1655.3	1554.5	1459.7	1385.6	1338.3	1323.9
20°	1787.1	1764.5	1692.5	1593.6	1484.4	1385.6	1311.5	1262.1	1243.6
22.5°	1725.4	1698.7	1622.4	1515.4	1406.3	1305.3	1233.2	1181.8	1165.3
25°	1651.3	1624.4	1542.1	1437.1	1323.9	1229.2	1157.1	1109.7	1091.2
27.5°	1560.7	1531.8	1451.5	1346.5	1241.5	1146.8	1081.0	1037.6	1019.1
30°	1457.7	1426.8	1350.7	1249.7	1155.1	1064.5	1000.6	965.7	945.0
32.5°	1338.3	1311.5	1243.6	1153.0	1064.5	978.0	924.5	893.6	877.1
35°	1208.5	1194.2	1136.6	1058.3	971.8	899.7	852.4	823.6	809.1
37.5°	1093.3	1078.8	1029.4	963.5	887.4	821.5	782.4	757.7	745.4
40°	984.2	971.8	924.5	868.9	803.0	745.4	712.3	693.8	681.5
42.5°	877.1	870.9	831.8	780.4	722.7	673.3	646.5	632.1	621.8
45°	790.6	782.4	745.4	695.9	646.5	605.3	582.7	572.3	562.1
47.5°	714.5	704.1	665.1	621.8	576.5	539.4	518.9	508.5	504.4
50°	640.4	630.0	595.0	551.8	506.5	479.7	463.3	453.0	450.9
52.5°	574.5	564.1	525.0	483.8	448.8	426.2	411.8	401.5	397.4
55°	510.6	498.2	465.3	426.2	397.4	376.8	362.3	352.0	348.0
57.5°	453.0	440.6	411.8	374.7	348.0	329.4	317.1	306.8	302.6
60°	397.4	387.1	360.3	325.3	302.6	286.2	273.9	265.6	261.5
62.5°	345.8	337.6	310.9	280.0	261.5	247.0	236.8	228.5	232.7
65°	298.6	290.3	265.6	238.8	224.5	210.0	201.8	201.8	210.0
67.5°	253.2	245.0	224.5	201.8	189.4	179.1	172.9	179.1	185.3
70°	212.1	203.8	185.3	166.7	156.5	148.2	148.2	154.4	158.5
72.5°	172.9	164.7	150.2	135.9	127.7	121.5	127.7	131.8	135.9
75°	135.9	129.7	117.3	107.0	100.8	98.8	105.0	109.1	111.2
77.5°	100.8	96.8	88.5	80.3	76.1	78.3	84.4	86.5	88.5
80°	70.0	67.9	61.8	57.6	57.6	59.7	63.8	65.9	67.9
82.5°	43.2	43.2	39.1	37.1	39.1	43.2	45.3	47.4	47.4
85°	20.6	22.7	20.6	20.6	22.7	26.7	26.7	28.9	28.9
87.5°	6.2	6.2	8.2	8.2	10.3	10.3	10.3	10.3	12.4
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

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

Scaled Data Report



Report Generated By 670245859 / DESKTOP-T8S5UU9

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

Scaled Data Report





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

Scaled Data Report



— 0°-180°    - - 45°-225°    - - - - 90°-270°

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

Scaled Data Report



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

Scaled Data Report



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

Scaled Data Report



(END OF REPORT)