

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

Report Number: E395728

Luminaire Tested: **H7-310/H930**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-41-14  
Report Number: E395728  
Test Lab:  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: HALO  
Catalog Number: H7-310/H930  
Description: HALO RECESSED INC - H7 HOUSING, ADJ, COILEX BAFFLE, MAX TILT  
Light Source: 75R30SP, 900 LUMENS  
Ballast/Driver: -

**Summary**

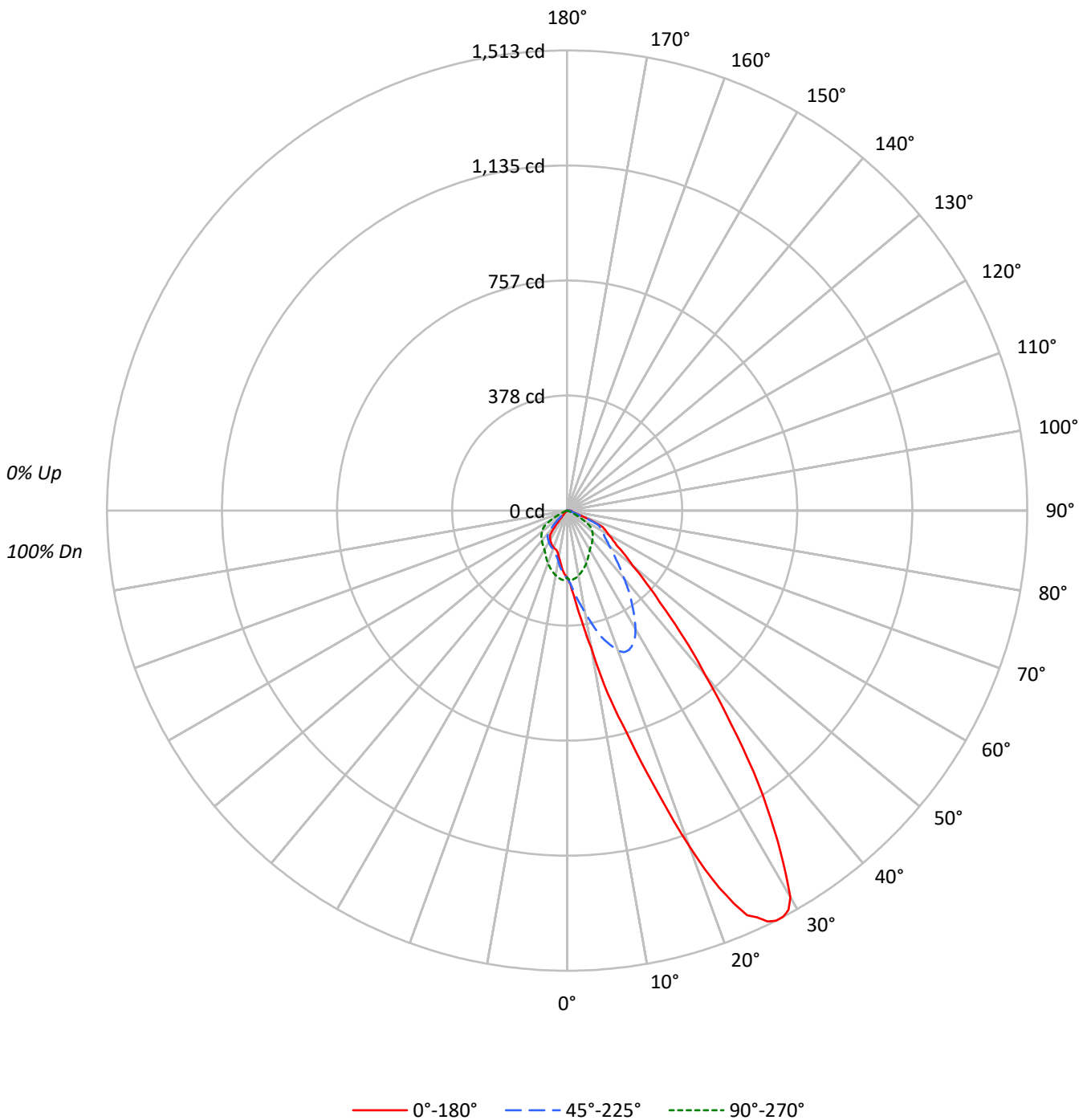
Lumens per Lamp: 900 (1 lamp)  
Luminaire Lumens: 756.4 lumens  
Efficiency: 84.0%  
Efficacy: 10.1 lumens/watt  
Spacing Criteria (0/90/45): 1.86 / 1.03 / 1.38  
Luminous Opening: (L: 0 ' x W: -0.49 ' x H: 0 '  
CIE Type: Direct

Input Watts (W): 75  
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	100	100	100	100	98	98	98	98	93	93	93		89	89	89		86	86	86	84
1	93	90	87	85	91	88	86	83	85	83	81		82	80	78		79	77	76	74
2	87	81	76	72	84	79	75	71	76	73	70		74	71	68		71	69	67	65
3	80	73	67	62	78	71	66	62	69	65	61		67	63	60		65	62	59	57
4	74	66	59	54	72	65	59	54	63	57	53		61	56	53		59	55	52	50
5	69	59	53	48	67	59	52	48	57	51	47		55	51	47		54	50	46	45
6	64	54	47	43	63	53	47	42	52	46	42		51	46	42		49	45	41	40
7	60	49	43	38	58	49	43	38	48	42	38		46	41	38		45	41	37	36
8	56	45	39	34	54	45	39	34	44	38	34		43	38	34		42	37	34	32
9	52	42	35	31	51	41	35	31	40	35	31		40	34	31		39	34	31	29
10	49	39	32	28	48	38	32	28	37	32	28		37	32	28		36	31	28	27

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

	0°	90°	180°
0°	Luminous shape not found,		
5°	reference photometric report, or contact		
10°	the photometric lab for calculations.		
15°			
20°			
25°			
30°			
35°			
40°			
45°			
50°			
55°			
60°			
65°			
70°			
75°			
80°			
85°			



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture	% Lamp
0°-10°	23.2	3.1	2.6
10°-20°	89.7	11.9	10.0
20°-30°	184.1	24.3	20.5
30°-40°	192.7	25.5	21.4
40°-50°	123.3	16.3	13.7
50°-60°	79.0	10.4	8.8
60°-70°	47.4	6.3	5.3
70°-80°	11.0	1.5	1.2
80°-90°	5.9	0.8	0.7
90°-100°	0.0	0.0	0.0
100°-110°	0.0	0.0	0.0
110°-120°	0.0	0.0	0.0
120°-130°	0.0	0.0	0.0
130°-140°	0.0	0.0	0.0
140°-150°	0.0	0.0	0.0
150°-160°	0.0	0.0	0.0
160°-170°	0.0	0.0	0.0
170°-180°	0.0	0.0	0.0
0°-30°	297.0	39.3	33.0
0°-40°	489.8	64.7	54.4
0°-60°	692.1	91.5	76.9
0°-90°	756.4	100.0	84.0
90°-120°	0.0	0.0	0.0
90°-150°	0.0	0.0	0.0
90°-180°	0.0	0.0	0.0
0°-180°	756.4	100.0	84.0

**CANDELA DISTRIBUTION:**

	0°	45°	90°	135°	180°	Flux
0°	220	220	220	220	220	
5°	291	271	227	199	191	33
15°	754	429	201	146	135	232
25°	1476	497	165	128	122	665
35°	1097	371	139	111	98	675
45°	440	228	120	42	9	355
55°	198	150	94	6	4	186
65°	130	114	22	4	3	113
75°	18	15	5	3	2	25
85°	14	12	2	2	1	15
90°	11	5	1	1	0	



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**CANDELA DISTRIBUTION (FULL):**

	0°	2.5°	5°	7.5°	10°	12.5°	15°	20°	22.5°	25°	30°
0°	220	220	220	220	220	220	220	220	220	220	220
2.5°	242	245	247	248	246	246	243	245	247	244	242
5°	291	296	297	291	297	296	291	289	291	287	282
7.5°	365	374	367	368	364	369	366	355	354	346	339
10°	459	470	464	460	469	454	448	444	435	416	398
12.5°	615	589	605	602	582	587	575	543	532	521	484
15°	754	781	761	756	741	737	723	674	658	634	584
17.5°	944	957	955	926	928	913	882	818	793	746	680
20°	1174	1170	1157	1149	1114	1076	1066	960	912	874	769
21°	1261	1258	1236	1212	1186	1157	1111	1016	968	910	803
22°	1339	1334	1319	1299	1265	1234	1180	1074	1019	961	834
23°	1403	1395	1386	1365	1334	1296	1244	1125	1065	998	855
24°	1456	1452	1441	1421	1384	1346	1297	1168	1104	1033	879
25°	1476	1489	1473	1457	1417	1379	1332	1200	1124	1052	892
26°	1503	1512	1494	1475	1439	1398	1351	1217	1139	1063	902
27°	1513	1521	1505	1482	1449	1406	1355	1218	1144	1066	899
28°	1513	1517	1502	1482	1446	1402	1350	1208	1135	1056	891
29°	1501	1504	1491	1469	1431	1385	1339	1194	1116	1042	874
30°	1468	1479	1459	1435	1397	1354	1306	1167	1083	1012	852
32.5°	1288	1307	1285	1266	1243	1218	1167	1046	973	910	762
35°	1097	1117	1081	1081	1056	1034	997	902	846	791	660
37.5°	886	910	886	879	864	835	816	733	697	656	562
40°	708	723	705	696	686	667	649	587	565	533	468
42.5°	568	566	572	571	546	540	506	478	450	423	377
45°	440	453	448	440	427	415	405	379	360	340	312
47.5°	354	347	347	343	330	330	327	302	295	290	267
50°	282	277	277	274	278	270	265	251	249	243	228
55°	198	197	197	196	196	193	193	190	186	182	173
60°	156	157	156	156	156	156	155	152	151	149	144
65°	130	131	131	131	132	133	133	131	131	131	129
70°	42	43	45	47	50	48	52	50	48	47	45
75°	18	18	18	18	18	18	18	18	17	17	16
80°	15	15	15	15	15	15	15	15	15	15	15
85°	14	15	15	15	15	15	15	15	15	15	14
90°	11	11	12	12	12	12	12	11	11	10	9



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**CANDELA DISTRIBUTION (continued):**

	35°	40°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	220	220	220	220	220	220	220	220	220
2.5°	243	243	240	235	230	221	215	212	209
5°	276	273	271	247	227	210	199	192	191
7.5°	324	312	304	257	223	199	184	174	170
10°	386	364	340	264	216	189	168	158	156
12.5°	454	422	384	269	209	177	156	146	142
15°	528	474	429	269	201	166	146	137	135
17.5°	608	529	460	265	193	155	138	133	132
20°	672	574	490	258	184	147	135	130	129
21°	694	588	497	255	180	145	133	129	128
22°	710	598	502	251	177	142	132	128	127
23°	722	604	502	246	173	141	131	127	125
24°	734	607	501	242	169	139	130	125	123
25°	742	606	497	236	165	137	128	124	122
26°	746	605	491	232	162	136	127	121	119
27°	743	599	482	227	158	135	125	119	118
28°	735	590	475	223	155	133	124	117	116
29°	720	578	463	218	152	132	122	116	114
30°	697	560	449	212	149	131	120	114	111
32.5°	633	508	410	198	143	128	115	108	105
35°	556	447	371	186	139	124	111	104	98
37.5°	471	396	332	173	134	118	106	84	63
40°	404	344	291	161	129	115	97	46	24
42.5°	341	293	258	151	124	110	72	19	12
45°	286	255	228	143	120	104	42	11	9
47.5°	242	225	204	138	114	93	18	8	7
50°	213	198	181	132	108	72	11	6	5
55°	166	157	150	120	94	22	6	5	4
60°	141	138	134	110	58	8	5	4	4
65°	127	120	114	71	22	5	4	4	3
70°	41	39	33	16	8	4	4	3	3
75°	15	15	15	10	5	4	3	3	2
80°	15	15	14	7	4	3	3	2	2
85°	14	13	12	4	2	1	2	1	1
90°	8	7	5	1	1	0	1	1	0

(END OF REPORT)