

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: P130117

Luminaire Tested: **HL618TAT - HLM6935 - HL6WFL - 456W**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P130117
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P33489)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: HALO
Catalog Number: HL618TAT - HLM6935 - HL6WFL - 456W
Description: HALO ALLSLOPE 6" 30W, White Coilex Baffle, White Metal Trim Ring using 55 Degree Optic at a 6-12 Pitch
Light Source: (1) HIGH LUMEN LED 90CRI / 3500K CCT
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 2235.9 lumens
Efficiency: N/A
Efficacy: 81.0 lumens/watt
Spacing Criteria (0/90/45): 1.45 / 0.79 / 1.17
Luminous Opening: Vertical Cylinder (Dia: 0.48' x H: 0.1')
CIE Type: Direct

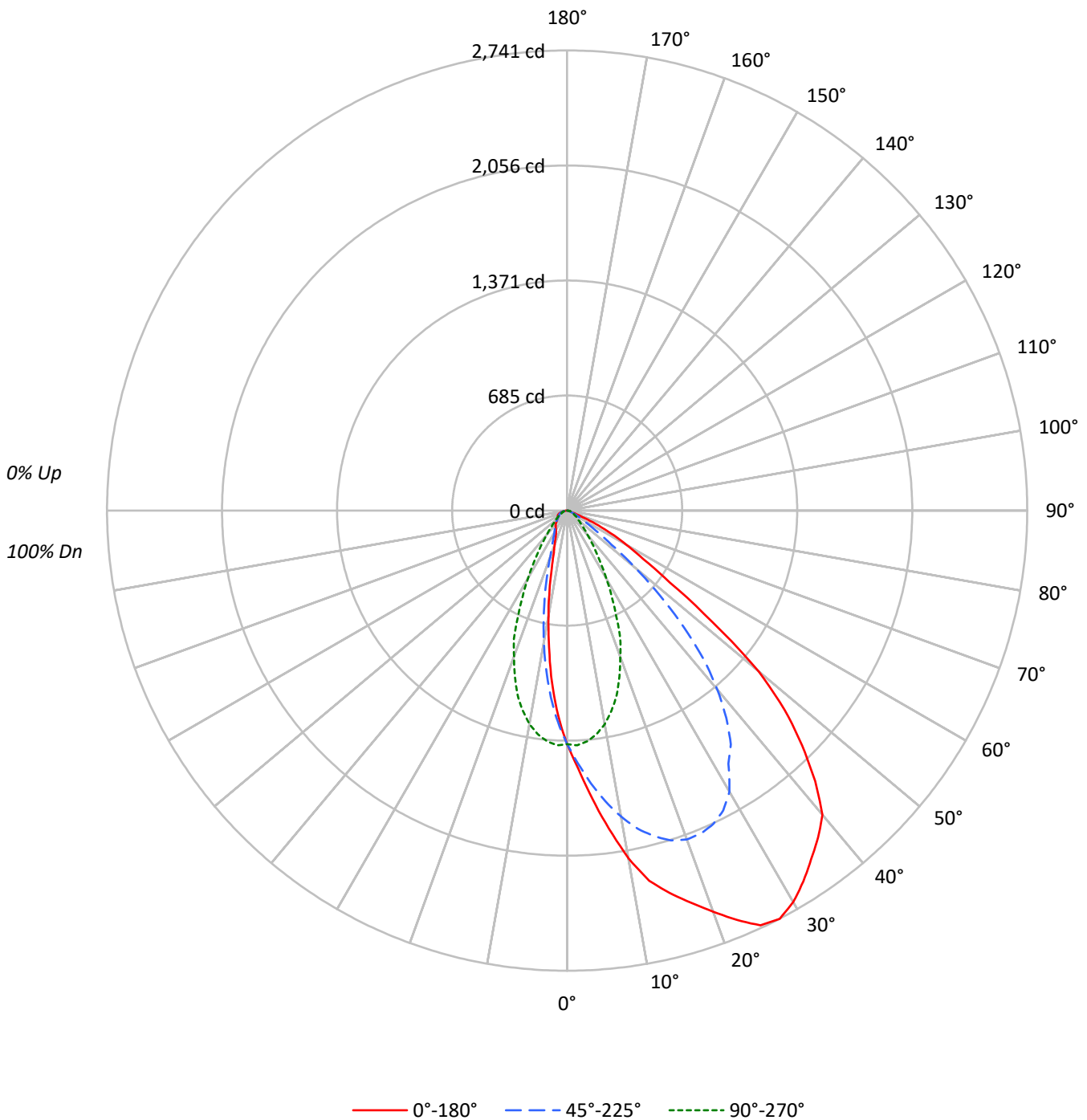
Input Watts (W): 27.6
Input Voltage (V): NR
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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	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	112	108	105	102	109	106	103	101	102	100	98	98	96	95	95	93	92	90				90
2	104	98	93	89	102	96	92	88	93	89	86	90	87	84	87	84	82	80				80
3	97	89	83	78	95	88	82	77	85	80	76	82	78	75	80	76	73	71				71
4	91	81	74	69	89	80	73	68	78	72	67	75	70	67	73	69	66	64				64
5	85	74	67	61	83	73	66	61	71	65	60	69	64	60	68	63	59	57				57
6	79	68	60	55	77	67	60	55	65	59	54	64	58	54	62	57	54	52				52
7	74	62	55	50	72	62	55	50	60	54	49	59	53	49	58	53	49	47				47
8	69	58	50	45	68	57	50	45	56	49	45	55	49	45	54	48	44	43				43
9	65	53	46	41	64	53	46	41	52	46	41	51	45	41	50	45	41	39				39
10	61	50	43	38	60	49	43	38	48	42	38	47	42	38	47	41	38	36				36

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	83024	83024	83024
5°	100906	80768	60490
10°	121709	74730	37125
15°	136002	65713	20312
20°	147215	53616	12627
25°	159739	40446	9224
30°	160938	27871	7942
35°	155726	18265	7305
40°	150723	12036	6760
45°	131953	8477	5909
50°	105087	6333	5346
55°	56293	5100	4836
60°	33364	4006	5339
65°	16681	3248	5245
70°	3410	2936	4822
75°	1355	2698	4180
80°	1124	2235	3195
85°	797	1391	1781



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	129.7	5.8
10°-20°	351.8	15.7
20°-30°	499.8	22.4
30°-40°	541.4	24.2
40°-50°	426.0	19.1
50°-60°	187.8	8.4
60°-70°	65.4	2.9
70°-80°	25.2	1.1
80°-90°	8.7	0.4
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°	981.3	43.9
0°-40°	1522.7	68.1
0°-60°	2136.5	95.6
0°-90°	2235.9	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2235.9	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	1391	1391	1391	1391	1391	
5°	1723	1631	1379	1117	1033	176
15°	2358	2009	1139	508	352	671
25°	2726	2060	690	200	157	1243
35°	2535	1700	297	129	119	1588
45°	1978	986	127	91	89	1511
55°	746	208	68	63	64	736
65°	185	48	36	50	58	195
75°	12	14	23	33	36	15
85°	5	6	8	10	10	5
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°	112.5°	135°	157.5°	180°
0°	1390.9	1390.9	1390.9	1390.9	1390.9	1390.9	1390.9	1390.9	1390.9
2.5°	1539.0	1527.3	1508.7	1449.2	1399.1	1329.1	1261.5	1252.2	1224.2
5°	1723.2	1697.6	1631.1	1502.9	1379.3	1240.5	1116.9	1062.1	1033.0
7.5°	1910.9	1870.1	1746.5	1540.2	1343.1	1134.4	956.0	879.1	820.8
10°	2102.1	2034.5	1851.5	1562.3	1290.7	1014.3	797.5	693.7	641.2
12.5°	2258.4	2181.4	1941.2	1567.0	1220.7	882.6	643.6	528.2	482.7
15°	2357.5	2302.7	2008.9	1556.5	1139.1	752.0	508.3	390.6	352.1
17.5°	2448.4	2378.5	2060.2	1527.3	1036.5	626.1	384.7	289.1	261.2
20°	2541.7	2429.8	2084.6	1480.7	925.7	502.5	293.8	234.3	218.0
22.5°	2639.6	2468.2	2082.3	1418.9	827.8	403.4	240.2	197.0	181.9
25°	2725.9	2495.0	2060.2	1333.8	690.2	317.1	200.5	169.1	157.4
27.5°	2741.1	2498.5	2013.5	1228.9	572.5	258.8	173.7	149.2	142.2
30°	2693.2	2484.6	1934.2	1109.9	466.4	216.9	151.6	138.7	132.9
32.5°	2618.6	2461.2	1787.3	979.4	373.1	186.5	138.7	130.6	125.9
35°	2534.7	2398.3	1699.9	839.5	297.3	160.9	129.4	123.6	118.9
37.5°	2455.4	2281.7	1556.5	701.9	241.3	139.9	120.1	116.6	113.1
40°	2365.6	2133.6	1392.1	566.6	188.9	125.9	110.8	108.4	106.1
42.5°	2186.1	1941.2	1205.5	424.4	156.2	111.9	101.4	99.1	96.8
45°	1978.5	1724.4	986.4	304.3	127.1	99.1	90.9	89.8	88.6
47.5°	1758.2	1485.4	749.7	206.4	103.8	88.6	81.6	81.6	80.4
50°	1490.0	1196.2	524.7	137.6	89.8	78.1	74.6	73.5	75.8
52.5°	1090.1	874.4	333.4	101.4	76.9	70.0	67.6	70.0	71.1
55°	746.2	579.5	207.5	83.9	67.6	61.8	63.0	66.5	64.1
57.5°	537.5	398.7	137.6	68.8	58.3	54.8	58.3	64.1	66.5
60°	408.1	288.0	93.3	57.1	49.0	50.1	54.8	63.0	65.3
62.5°	295.0	192.4	66.5	45.5	42.0	45.5	52.5	60.6	61.8
65°	185.4	107.3	47.8	36.1	36.1	42.0	50.1	57.1	58.3
67.5°	94.4	56.0	32.6	29.1	32.6	39.6	46.6	52.5	53.6
70°	33.8	28.0	23.3	24.5	29.1	36.1	42.0	46.6	47.8
72.5°	16.3	17.5	17.5	21.0	26.8	32.6	37.3	40.8	42.0
75°	11.7	12.8	14.0	17.5	23.3	28.0	32.6	35.0	36.1
77.5°	9.3	10.5	11.7	15.2	19.8	24.5	26.8	29.1	30.3
80°	8.2	8.2	10.5	12.8	16.3	18.7	21.0	23.3	23.3
82.5°	5.8	7.0	8.2	10.5	11.7	14.0	15.2	17.5	17.5
85°	4.7	4.7	5.8	7.0	8.2	9.3	10.5	11.7	10.5
87.5°	2.3	2.3	3.5	3.5	4.7	4.7	4.7	4.7	4.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)