



UL Verification Services Inc.
7036 Snowdrift Road
Allentown, PA 18106
610-774-1300



Photometric Test Report

Relevant Standards
IES LM-79-2008, ANSI C82.77-2002

Prepared For
Auroralight Inc

Stacia Elmore
2742 Loker Ave W
#100
Carlsbad, CA 92010-6619
United States

Catalog Number
LPL10-30 (3000K)

Order Number
14012719
Test Number
14012719.10

Test Date

2021-09-30

Prepared By

Javier Caban, Technician

Approved By

Alexa Lambert, Project Handler

The results contained in this report pertain only to the tested sample.
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Luminaire Description: Cylindrical copper stem with 10" shade and glass lens
Lamp: One (1) Cree XLAMP XHP35 High Density LED
Mounting: Bollard
Ballast/Driver: PROPRIETARY

Luminaire



Luminaire Characteristics

Luminous Diameter: 10.00 in.

Summary of Results

Roadway Classification: Type V, Short
Cutoff Classification: Semicutoff
BUG Rating: B0 U1 G1

Test Conditions

Test Temperature: 24.6 °C
Voltage: 12.10 VAC
Current: 0.4776 A
Power: 5.768 W
Power Factor: 0.998
Frequency: 60 Hz
Current THD: 4.44 %

Tested in 30 planes left side, 30 planes right side, left and right averaged
Vertical test increments are 2.5 degrees
Test distance exceeds five times the greatest luminous opening of luminaire

Laboratory results may not be representative of field performance
Ballast factors have not been applied



Distribution - Goniophotometer

Distribution Test Conditions

Temperature	Voltage	Current	Power	Power Factor	Frequency	Current THD
24.6 °C	12.10 VAC	0.4776 A	5.768 W	0.998	60 Hz	4.44 %

Summary of Results

Spacing Criteria

0-180: 1.08

90-270: 1.08

Total Lumen Output:

355.0 Lumens

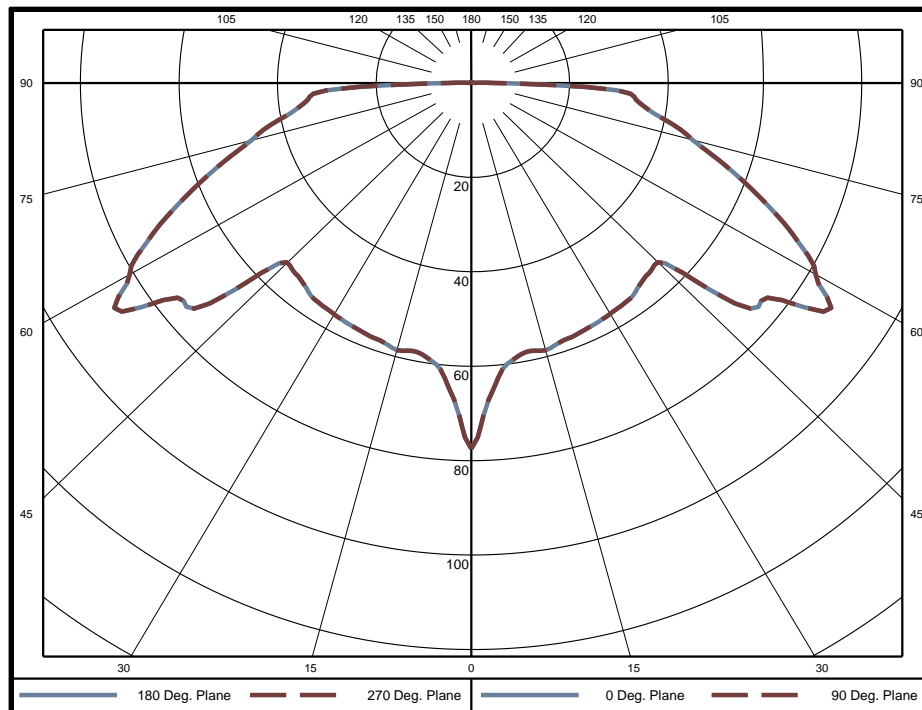
Luminaire Efficacy:

61.5 lm/w

Maximum Candela:

87 Candela

Polar Plot



Zonal Lumen Summary

Zone	Lumens	% of Luminaire	Zone	Lumens	% of Luminaire	Zone	Lumens	% of Luminaire
0-5	1.60	0.5%	60-65	37.04	10.4%	120-125	0.09	0.0%
5-10	4.27	1.2%	65-70	32.39	9.1%	125-130	0.08	0.0%
10-15	6.91	1.9%	70-75	27.21	7.7%	130-135	0.06	0.0%
15-20	9.56	2.7%	75-80	22.81	6.4%	135-140	0.05	0.0%
20-25	12.02	3.4%	80-85	19.15	5.4%	140-145	0.04	0.0%
25-30	14.37	4.0%	85-90	12.65	3.6%	145-150	0.04	0.0%
30-35	16.56	4.7%	90-95	0.98	0.3%	150-155	0.03	0.0%
35-40	18.44	5.2%	95-100	0.16	0.0%	155-160	0.03	0.0%
40-45	20.00	5.6%	100-105	0.13	0.0%	160-165	0.02	0.0%
45-50	25.49	7.2%	105-110	0.12	0.0%	165-170	0.02	0.0%
50-55	33.29	9.4%	110-115	0.11	0.0%	170-175	0.01	0.0%
55-60	39.19	11.0%	115-120	0.10	0.0%	175-180	0.00	0.0%

Zone	Lumens	% of Luminaire
0-40	84	23.6%
0-60	202	56.8%
0-90	353	99.4%
90-180	2	0.6%



Candela Tabulation
Horizontal Angle (Degrees)

Vertical Angle (Degrees)	0	22.5	45	67.5	90	112.5	135	157.5	180	202.5	225	247.5	270	292.5	315	337.5
	0	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46	77.46
	5	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68	62.68
	10	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35	58.35
	15	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60	58.60
	20	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59	57.59
	25	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03	57.03
	30	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50	56.50
	35	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02	56.02
	40	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45	54.45
	45	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68	53.68
	50	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31	74.31
	55	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78	82.78
	60	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02	81.02
	65	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38	70.38
	70	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83	57.83
	75	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72	46.72
	80	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04	38.04
	85	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34	33.34
	90	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68	4.68
	95	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
	100	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26	0.26
	105	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24	0.24
	110	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22	0.22
	115	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21
	120	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
	125	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18	0.18
	130	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17
	135	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
	140	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14
	145	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	150	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	155	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	160	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	165	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14
	170	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	175	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
	180	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14	0.14

Average Luminance (cd/m²)
Horizontal Angle (Degrees)

Vertical Angle (Degrees)	0	45	90
	0	1529	1529
	45	1498	1498
	55	2848	2848
	65	3286	3286
	75	3563	3563
	85	7549	7549



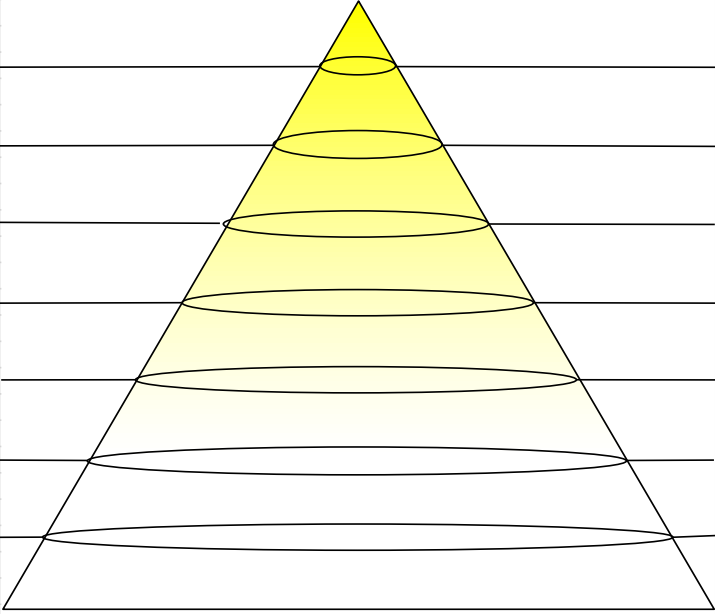
Utilization of Lumens - Zonal Cavity Method

Effective Floor Cavity Reflectance 20%																		
Ceiling Cavity Reflectance	80				70				50			30			10			0
Wall Reflectance	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
Room Cavity Ratio (RCR)	** Values are expressed as Lumens delivered to the task surface **																	
0	422	422	422	422	412	412	412	412	393	393	393	376	376	376	360	360	360	353
1	368	343	321	301	357	334	314	296	318	301	286	303	289	276	289	278	267	259
2	325	285	253	226	314	278	248	223	264	239	217	251	230	211	239	222	206	196
3	289	242	205	175	279	235	201	173	223	194	169	213	187	166	202	181	162	153
4	260	208	169	140	251	203	167	139	193	161	136	183	156	134	175	151	131	122
5	236	182	143	115	228	177	141	114	169	137	112	161	133	111	153	129	109	100
6	216	161	123	96	208	157	121	96	150	118	95	143	115	93	137	112	92	83
7	199	144	108	82	192	140	106	82	134	103	81	128	101	80	123	98	79	71
8	184	130	95	72	178	127	94	71	122	92	70	117	89	70	112	87	69	61
9	171	118	85	63	166	116	84	63	111	82	62	107	80	61	103	79	61	54
10	160	108	77	56	155	106	76	56	102	74	55	98	73	55	95	71	54	48

Beam and Field Information

CIE Type:	Direct
Center Beam Intensity:	77.46 Candela
Central Cone Intensity:	70 Candela
Beam Flux:	319.7 Lumens
Beam Angle (0-180):	159.3 Degrees
Beam Angle (90-270):	159.3 Degrees
Field Angle (0-180):	179.1 Degrees
Field Angle (90-270):	179.1 Degrees

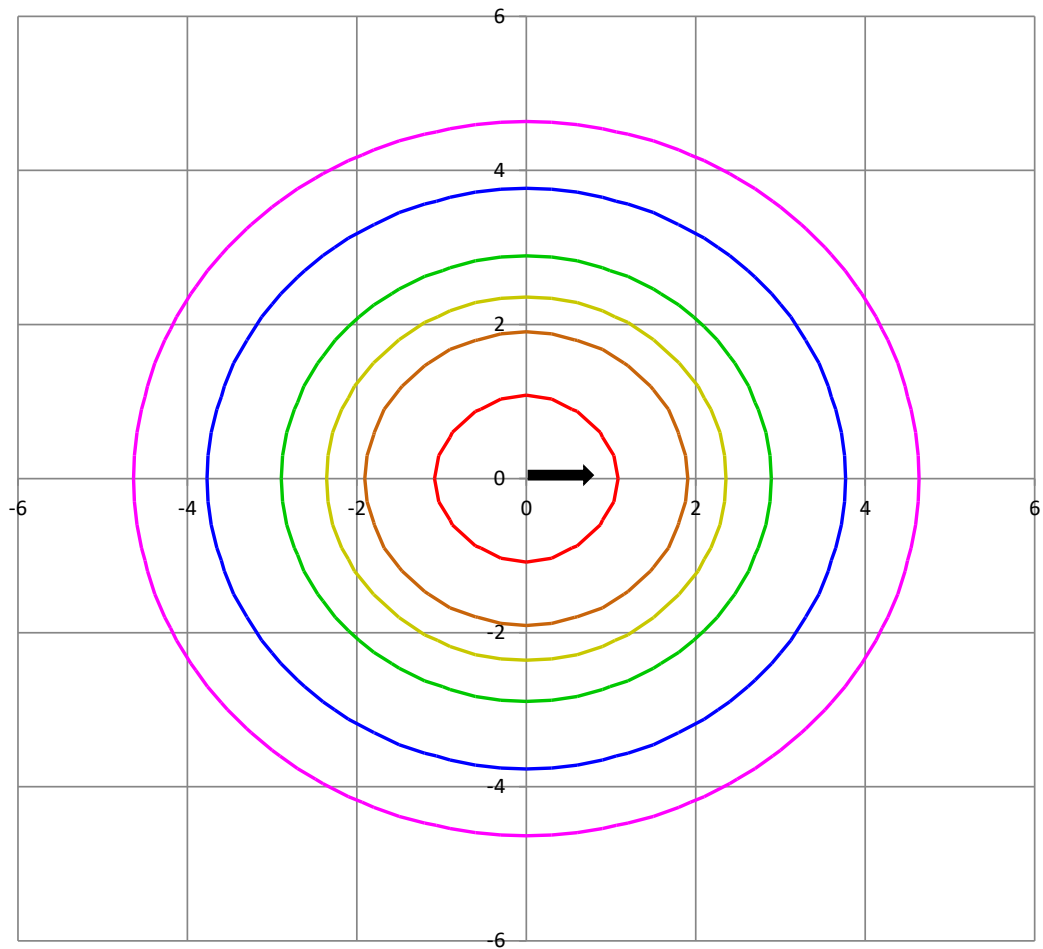
Cone of Light Tabulation

Mounting Height (Feet)		Footcandles at Nadir	Diameter (Feet)
4.00		4.84	4.30
6.00		2.15	6.45
8.00		1.21	8.60
10.0		0.775	10.8
12.0		0.538	12.9
14.0		0.395	15.1
16.0		0.303	17.2



ISOFootcandle Plot

Mounting Height - 2 Feet



Grid Lines in Units of Mounting Height





IES "BUG" Rating
(Back Light, Uplight, Glare)
Per IES TM-15-11



Luminaire Classification System (LCS)

LCS	Zone	Lumens	Luminaire %
FL	(0-30)	24.4	6.9%
FM	(30-60)	76.6	21.5%
FH	(60-80)	59.8	16.8%
FVH	(80-90)	15.9	4.5%
BL	(0-30)	24.4	6.9%
BM	(30-60)	76.6	21.5%
BH	(60-80)	59.8	16.8%
BVH	(80-90)	15.9	4.5%
UL	(90-100)	1.3	0.4%
UH	(100-180)	0.9	0.3%
Total		355.7	100.0%
BUG Rating	B0 U1 G1		