



UL LLC
1075 W Lambert Rd Suite B
Brea, CA 92821

Floodlight Distribution Test Report

Relevant Standards
IES LM-79-2008, ANSI C82.77-10-2014, IES LM-35-2002 (Withdrawn)

Prepared For
B-K Lighting INC

Daniel Carrejo
40429 Brickyard Dr.
Madera, CA 93636
United States

Catalog Number
HU-LED-TR-X108-NSP-WHP-12-C-1-INC-120-PROTOTYPE(4000K)

Order Number
13318635
Test Number
13318635.05

Test Date

2020-05-14

Prepared By

Austin Duff, Technician

Approved By

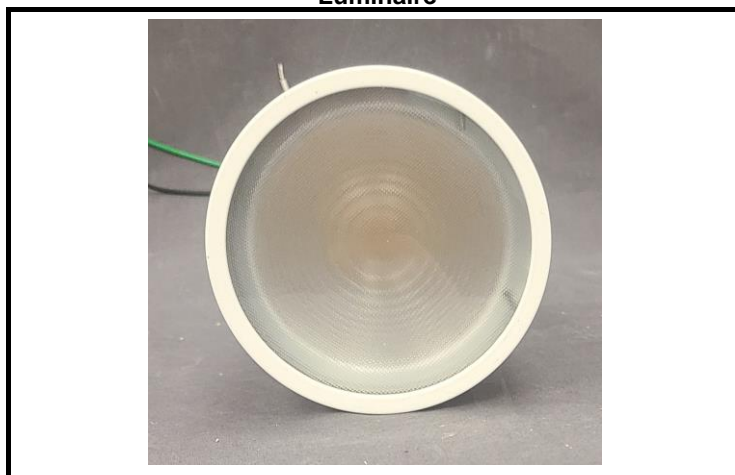
Eric Gaudreau, Engineering Leader

The results contained in this report pertain only to the tested sample.
This report shall not be reproduced, except in full, without written approval of Underwriters Laboratories.
This report must not be used by the client to claim product certification, approval, or endorsement by
NVLAP, NIST, or any agency of the Federal Government.



Luminaire Description: White metal cylindrical housing and clear glass lens
Lamp: One (1) White LED with optic below
Mounting: Pendant
Ballast/Driver: One (1) ERP ESST040W-0900-42

Luminaire



Luminaire Characteristics
Luminous Diameter: 3.50 in.

Summary of Results

Total Luminaire Output:	1677 Lumens
Luminaire Efficacy:	47.6 lm/w
Maximum Candela:	20947 Candela

Test Conditions

Test Temperature:	24.4 °C
Voltage:	120.0 VAC
Current:	0.2976 A
Power:	35.22 W
Power Factor:	0.986
Frequency:	60 Hz
Current THD:	12.1 %

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



Distribution - Goniophotometer

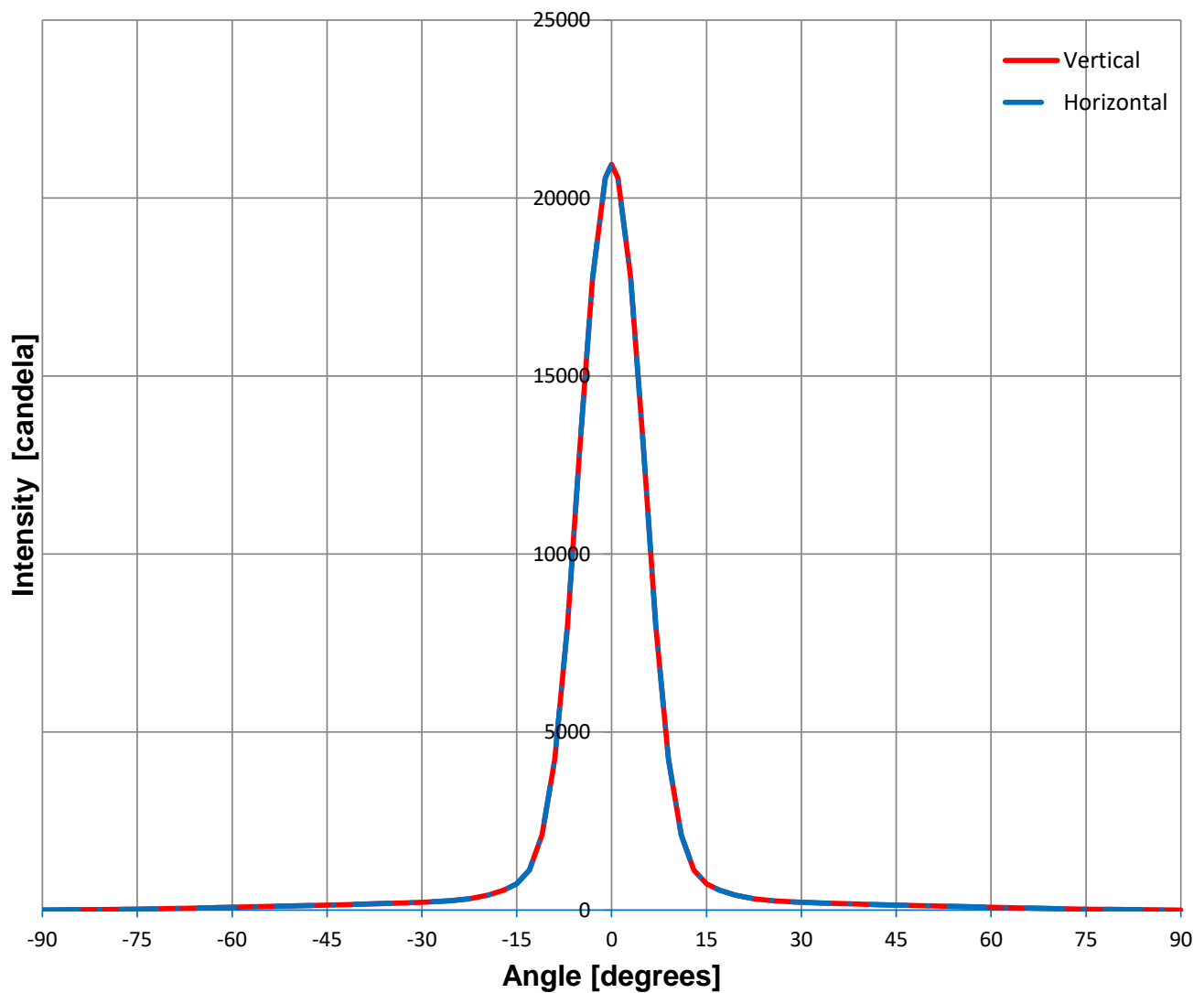
Distribution Test Conditions

Temperature	Voltage	Current	Power	Power Factor	Frequency	Current THD
24.4 °C	120.0 VAC	0.2976 A	35.22 W	0.986	60 Hz	12.1 %

Summary of Results

Total Lumen Output:	1676.6 Lumens	Maximum Candela:	20946.7 Candela
Luminaire Efficacy:	47.6 Lumens/Watt	Maximum Angle:	0 H 0 V
Field Lumens:	921.9 Lumens	Field Angle :	22.1 H X 22.1 V
Beam Lumens:	572.3 Lumens	Beam Angle :	12.0 H X 12.0 V
Spill Light Lumens:	754.7 Lumens	IESNA Type:	2 H X 2 V

Maximum Candlepower Plot





Candela Tabulation

Lateral Angle (Degrees)

	0	1	3	5	7	9	11	13	15	17	19.5
85.0	8	8	8	8	8	8	8	8	8	8	7
75.0	22	22	22	22	22	22	22	21	21	21	20
65.0	57	57	57	56	56	56	55	54	53	52	51
55.0	99	99	99	99	98	97	96	95	94	92	90
47.5	131	131	130	130	129	128	127	125	123	121	119
42.5	152	152	151	151	150	148	147	145	143	140	137
37.5	174	174	174	173	172	170	168	165	163	160	156
33.0	197	197	196	195	193	191	188	185	182	178	173
29.0	223	223	222	220	217	214	210	205	201	196	189
25.5	262	262	260	256	250	243	236	228	221	213	204
22.5	320	320	316	308	297	285	271	258	245	233	220
19.5	426	424	415	399	377	351	326	302	280	260	239
17.0	564	562	548	521	483	440	397	355	320	290	260
15.0	735	732	707	658	599	537	474	414	361	320	280
13.0	1120	1112	1041	904	775	660	566	486	414	355	302
11.0	2116	2089	1874	1479	1117	857	686	566	474	397	326
9.0	4235	4168	3643	2754	1882	1235	857	660	537	440	351
7.0	7973	7825	6693	4903	3147	1882	1117	775	599	483	377
5.0	13016	12757	10847	7834	4903	2754	1479	904	658	521	399
3.0	17756	17398	14936	10847	6693	3643	1874	1041	707	548	415
1.0	20564	20108	17398	12757	7825	4168	2089	1112	732	562	424
0.0	20947	20564	17756	13016	7973	4235	2116	1120	735	564	426
-1.0	20564	20108	17398	12757	7825	4168	2089	1112	732	562	424
-3.0	17756	17398	14936	10847	6693	3643	1874	1041	707	548	415
-5.0	13016	12757	10847	7834	4903	2754	1479	904	658	521	399
-7.0	7973	7825	6693	4903	3147	1882	1117	775	599	483	377
-9.0	4235	4168	3643	2754	1882	1235	857	660	537	440	351
-11.0	2116	2089	1874	1479	1117	857	686	566	474	397	326
-13.0	1120	1112	1041	904	775	660	566	486	414	355	302
-15.0	735	732	707	658	599	537	474	414	361	320	280
-17.0	564	562	548	521	483	440	397	355	320	290	260
-19.5	426	424	415	399	377	351	326	302	280	260	239
-22.5	320	320	316	308	297	285	271	258	245	233	220
-25.5	262	262	260	256	250	243	236	228	221	213	204
-29.0	223	223	222	220	217	214	210	205	201	196	189
-33.0	197	197	196	195	193	191	188	185	182	178	173
-37.5	174	174	174	173	172	170	168	165	163	160	156
-42.5	152	152	151	151	150	148	147	145	143	140	137
-47.5	131	131	130	130	129	128	127	125	123	121	119
-55.0	99	99	99	99	98	97	96	95	94	92	90
-65.0	57	57	57	56	56	56	55	54	53	52	51
-75.0	22	22	22	22	22	22	22	21	21	21	20
-85.0	8	8	8	8	8	8	8	8	8	8	7

Vertical Angle (Degrees)



Candela Tabulation

Lateral Angle (Degrees)

	22.5	25.5	29	33	37.5	42.5	47.5	55	65	75	85
85.0	7	7	7	7	7	6	6	5	4	2	1
75.0	20	19	18	17	16	14	13	11	9	7	2
65.0	49	47	44	40	36	31	27	20	13	9	4
55.0	87	83	78	73	65	57	48	35	20	11	5
47.5	115	110	105	97	88	77	66	48	27	13	6
42.5	132	127	121	113	103	90	77	57	31	14	6
37.5	150	144	137	127	116	103	88	65	36	16	7
33.0	166	159	150	140	127	113	97	73	40	17	7
29.0	181	172	162	150	137	121	105	78	44	18	7
25.5	194	184	172	159	144	127	110	83	47	19	7
22.5	206	194	181	166	150	132	115	87	49	20	7
19.5	220	204	189	173	156	137	119	90	51	20	7
17.0	233	213	196	178	160	140	121	92	52	21	8
15.0	245	221	201	182	163	143	123	94	53	21	8
13.0	258	228	205	185	165	145	125	95	54	21	8
11.0	271	236	210	188	168	147	127	96	55	22	8
9.0	285	243	214	191	170	148	128	97	56	22	8
7.0	297	250	217	193	172	150	129	98	56	22	8
5.0	308	256	220	195	173	151	130	99	56	22	8
3.0	316	260	222	196	174	151	130	99	57	22	8
1.0	320	262	223	197	174	152	131	99	57	22	8
0.0	320	262	223	197	174	152	131	99	57	22	8
-1.0	320	262	223	197	174	152	131	99	57	22	8
-3.0	316	260	222	196	174	151	130	99	57	22	8
-5.0	308	256	220	195	173	151	130	99	56	22	8
-7.0	297	250	217	193	172	150	129	98	56	22	8
-9.0	285	243	214	191	170	148	128	97	56	22	8
-11.0	271	236	210	188	168	147	127	96	55	22	8
-13.0	258	228	205	185	165	145	125	95	54	21	8
-15.0	245	221	201	182	163	143	123	94	53	21	8
-17.0	233	213	196	178	160	140	121	92	52	21	8
-19.5	220	204	189	173	156	137	119	90	51	20	7
-22.5	206	194	181	166	150	132	115	87	49	20	7
-25.5	194	184	172	159	144	127	110	83	47	19	7
-29.0	181	172	162	150	137	121	105	78	44	18	7
-33.0	166	159	150	140	127	113	97	73	40	17	7
-37.5	150	144	137	127	116	103	88	65	36	16	7
-42.5	132	127	121	113	103	90	77	57	31	14	6
-47.5	115	110	105	97	88	77	66	48	27	13	6
-55.0	87	83	78	73	65	57	48	35	20	11	5
-65.0	49	47	44	40	36	31	27	20	13	9	4
-75.0	20	19	18	17	16	14	13	11	9	7	2
-85.0	7	7	7	7	7	6	6	5	4	2	1

Vertical Angle (Degrees)



Isocandela Diagram (Percent of Maximum Intensity)

