



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

## Outdoor Distribution Test Report

Relevant Standards  
IES LM-79-2008, ANSI C82.77-10-2014

Prepared For  
**B-K LIGHTING INC**

DANIEL CARREJO  
40429 BRICKYARD DR.  
MADERA, CA 93636-9515  
UNITED STATES

Catalog Number  
**YK-D-LED-A4080-WHP-H-SD-60-010-MT-PROTOTYPE(Horizontal)**

Order Number

13280109

Test Number

13280109.08A

Revised Date:

2020-04-27

Test Date

2020-03-24

Prepared By

Khang Nguyen, 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:** Black plastic rectangular housing and white metal faceplate with clear glass lens  
**Lamp:** 24 White LEDs with diffuse plastic film  
**Mounting:** Recessed  
**Ballast/Driver:** ESS015W-0350-42

#### Luminaire



#### Luminaire Characteristics

Luminous Length: 0.00 in.  
5.750

#### Summary of Results

Roadway Classification: Type II, Very Short  
Cutoff Classification: Noncutoff  
BUG Rating: B0 U3 G1

#### Test Conditions

Test Temperature: 24.3 °C  
Voltage: 120.0 VAC  
Current: 0.08157 A  
Power: 9.489 W  
Power Factor: 0.969  
Frequency: 60 Hz  
Current THD: 17.0 %

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

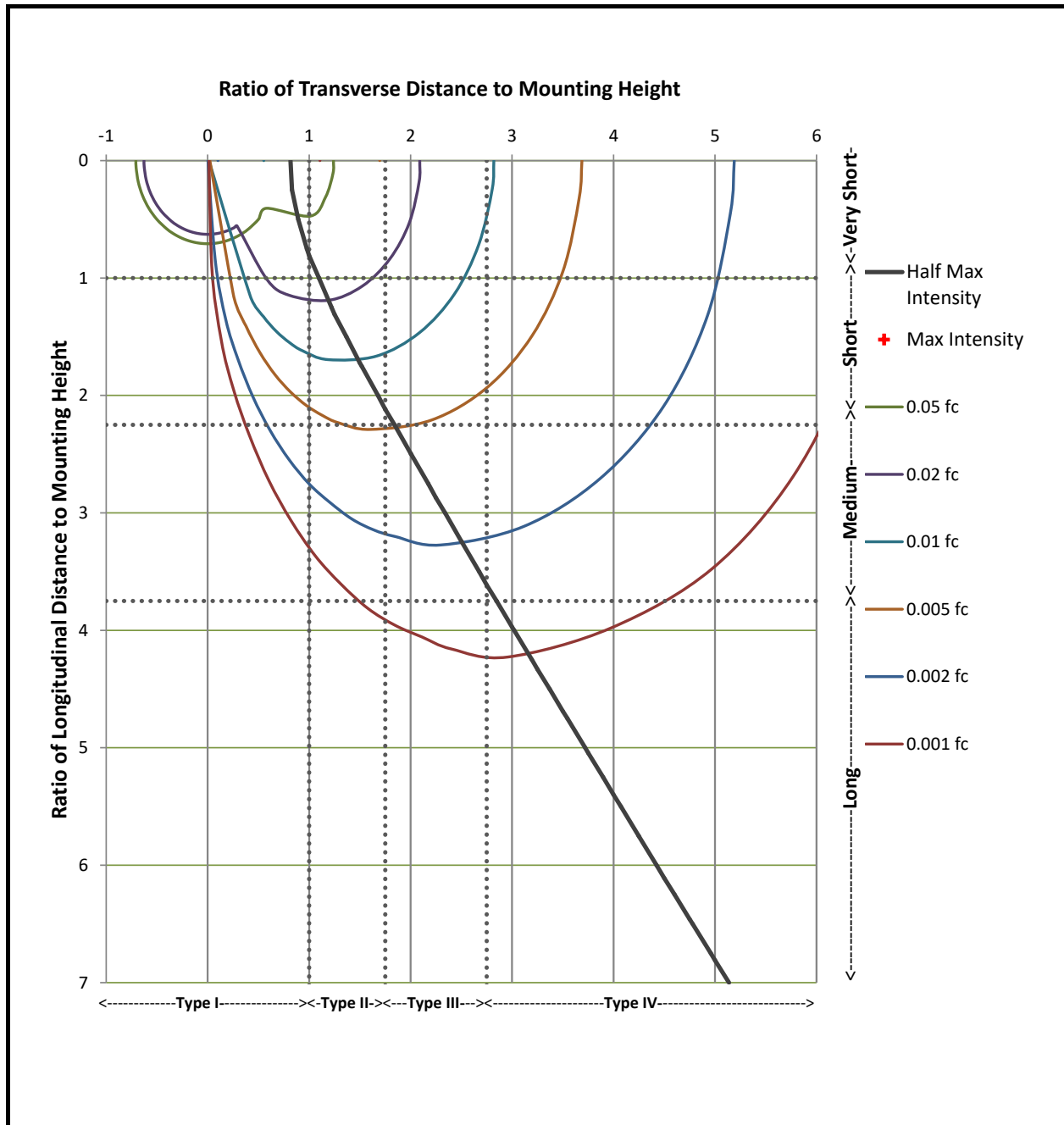
### Distribution Test Conditions

Temperature	Voltage	Current	Power	Power Factor	Frequency	Current THD
24.3 °C	120.0 VAC	0.08157 A	9.489 W	0.969	60 Hz	17.0 %

### Summary of Results

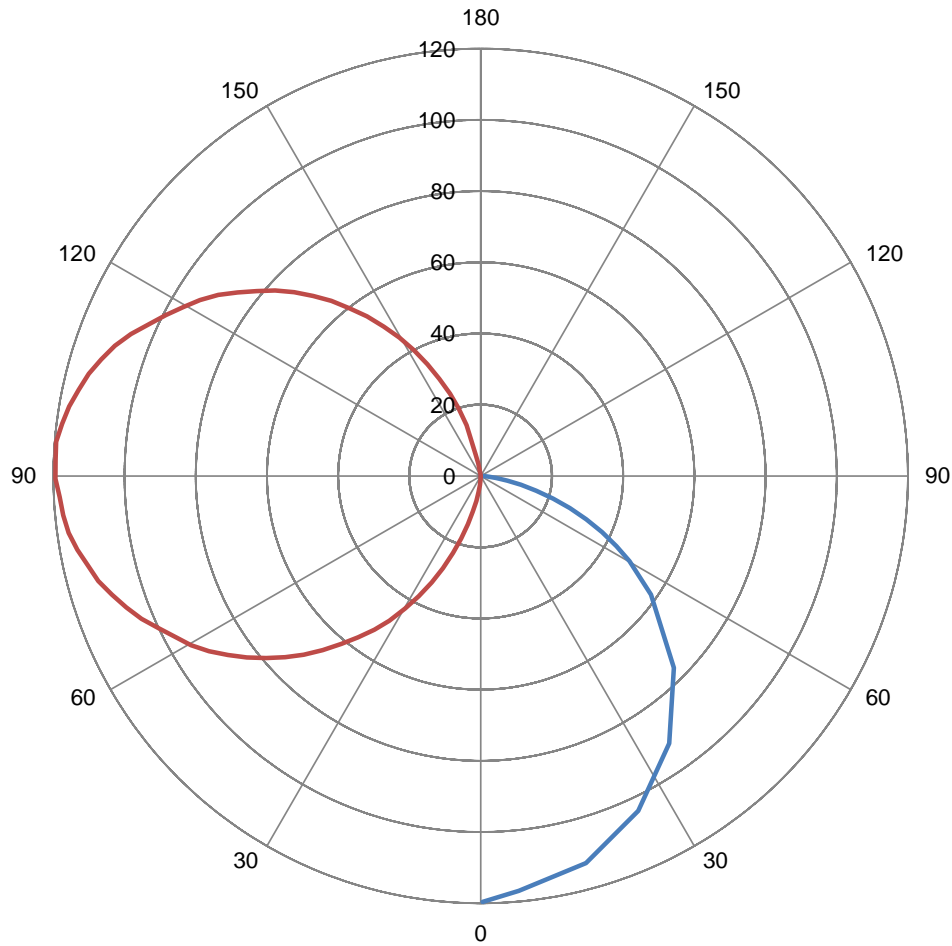
IES Roadway Classification:	Type II, Very Short	Total Lumen Output:	306 Lumens
Cutoff Classification:	Noncutoff	Luminaire Efficacy:	32.3 lm/w
BUG Rating:	B0 U3 G1	Maximum Candela:	120 Candela

### ISO FootCandle Plot at 20 Feet





### Maximum Plane and Cone Plots of Candela



Vertical Plane Through

0 ° Lateral

Lateral Cone Through

95 ° Vertical

Maximum Intensity (Candlepower):

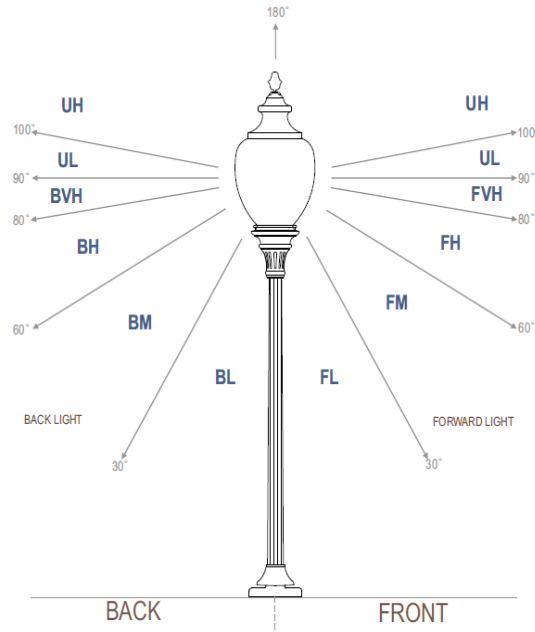
120 Candela

### Zonal Lumen Summary

Zone	Lumens	% of Luminaire	Zone	Lumens	% of Luminaire	Zone	Lumens	% of Luminaire
0-5	0.0	0.0%	60-65	13.7	4.5%	120-125	12.1	4.0%
5-10	0.1	0.0%	65-70	15.2	5.0%	125-130	10.4	3.4%
10-15	0.4	0.1%	70-75	16.5	5.4%	130-135	8.7	2.9%
15-20	0.9	0.3%	75-80	17.5	5.7%	135-140	7.1	2.3%
20-25	1.6	0.5%	80-85	18.2	6.0%	140-145	5.5	1.8%
25-30	2.7	0.9%	85-90	18.7	6.1%	145-150	4.0	1.3%
30-35	3.9	1.3%	90-95	18.8	6.1%	150-155	2.7	0.9%
35-40	5.4	1.8%	95-100	18.5	6.0%	155-160	1.6	0.5%
40-45	7.0	2.3%	100-105	17.7	5.8%	160-165	0.8	0.2%
45-50	8.7	2.8%	105-110	16.6	5.4%	165-170	0.2	0.1%
50-55	10.4	3.4%	110-115	15.3	5.0%	170-175	0.0	0.0%
55-60	12.1	3.9%	115-120	13.7	4.5%	175-180	0.0	0.0%



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



Luminaire Classification System (LCS)

LCS	Zone	Lumens	Luminaire %
FL	(0-30)	5.7	1.9%
FM	(30-60)	47.2	15.4%
FH	(60-80)	62.7	20.5%
FVH	(80-90)	36.9	12.0%
BL	(0-30)	0.1	0.0%
BM	(30-60)	0.1	0.0%
BH	(60-80)	0.1	0.0%
BVH	(80-90)	0.0	0.0%
UL	(90-100)	37.2	12.1%
UH	(100-180)	116.4	38.0%
Total		306.4	100.0%
<b>BUG Rating</b>	<b>B0 U3 G1</b>		