

# REPORT

25800 COMMERCE DRIVE, LAKE FOREST, CA 92630

Project No. G104013131

Date: July 29, 2019

REPORT NO. 104013131LAX-004D

TEST OF ONE LED LUMINAIRE

MODEL NO. BPRO2-FLSH-LED35-HO-4-TMW-BTW-SC-UNV-X1-DM01

LED MODEL NO. LUMILEDS 2835E 9V

DRIVER MODEL NO. OSRAM OTI50W G2

RENDERED TO

PRUDENTIAL LIGHTING  
1774 E 21ST STREET  
LOS ANGELES, CA 90058

TEST: Electrical and Photometric tests as required to the IESNA test standard.

AUTHORIZATION: The testing performed was authorized by signed quote number Qu-00978421-1 .

STANDARDS USED: The following American National Standards or Illuminating Engineering Society of North America Test Guides were used in part or totally to test each specimen:

IESNA LM-79 - 2008: Electrical and Photometric Measurements of Solid State Lighting

DESCRIPTION OF SAMPLE: The client submitted one Prototype sample of model number BPRO2-FLSH-LED35-HO-4-TMW-BTW-SC-UNV-X1-DM01. The sample was received by Intertek on July 24, 2019, in undamaged condition and one sample was tested as received. The sample designation was LAN1906281507-002.

DATES OF TESTS: July 26, 2019

## SUMMARY

Model No.:	BPRO2-FLSH-LED35-HO-4-TMW-BTW-SC-UNV-X1-DM01
Description:	LED Luminaire

Criteria	Result
Total Lumen Output (Lumens)	4245
Total Power (W)	41.65
Luminaire Efficacy (LPW)	101.9
Power Factor	0.986

## EQUIPMENT LIST

Equipment Used	Model Number	Control Number	Last Date Calibrated	Calibration Due Date	Date Used
Goniophotometer	6440T	000943	VBU	VBU	07/26/19
AC Source	CW1251P	000944	VBU	VBU	07/26/19
Power Analyzer	WT210	000945	11/28/18	11/28/19	07/26/19
Tape Measure	33-428	001491	VBU	VBU	07/26/19
Magnetic Level	581-9	001610	10/31/18	10/31/19	07/26/19
Thermometer	DPI8-C24	001782	09/21/18	09/21/19	07/26/19
Temp. & RH Meter	971	001177	01/29/19	01/29/20	07/26/19

## TEST METHODS

### Seasoning in Sample Orientation – LED Products

No seasoning was performed in accordance with IESNA LM-79.

### Photometric and Electrical Measurements – Distribution Method

A LSI Type C High Speed Model 6440 Mirror Goniometer was used to measure the intensity (candelas) at each angle of distribution for each sample.

Ambient temperature was measured equal to the height of the sample mounted on the Goniometer equipment. Each sample was operated at input rated voltage in its designated orientation. Each sample was allowed to stabilize for at least thirty minutes before measurements were made. Electrical measurements including voltage, current, and power were measured using the Xitron or Yokogawa Power Analyzer.

Some graphics were created with Photometrics Plus software.

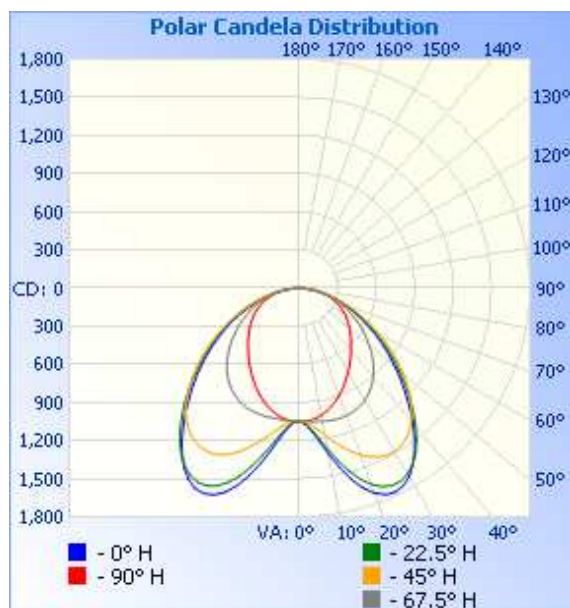
## RESULTS OF TEST

### Photometric and Electrical Measurements at Ambient Temperature (25°C +/- 1°C) – Distribution Method

Intertek Sample No.	Base Orientation	Input Voltage {Vac}	Input Current (mA)	Input Power (Watts)	Input Power Factor	Absolute Luminous Flux (Lumens)	Lumen Efficacy (LPW)
LAN1906281507-002	Up	120.0	352.3	41.65	0.986	4245	101.9

### Intensity (Candlepower) Summary at 25°C - Candelas

Angle	0	22.5	45	67.5	90
0	1045	1045	1045	1045	1045
5	1134	1122	1083	1054	1042
10	1330	1292	1178	1064	1011
15	1554	1488	1294	1070	962
20	1716	1643	1396	1068	900
25	1769	1713	1465	1051	831
30	1712	1689	1484	1018	760
35	1567	1582	1449	967	691
40	1377	1411	1360	897	627
45	1174	1217	1227	813	568
50	985	1025	1065	717	513
55	810	845	891	617	461
60	647	675	717	518	408
65	498	522	553	424	354
70	363	382	406	332	295
75	245	259	277	245	231
80	139	148	163	159	160
85	48	50	62	73	82
90	0	0	0	0	0

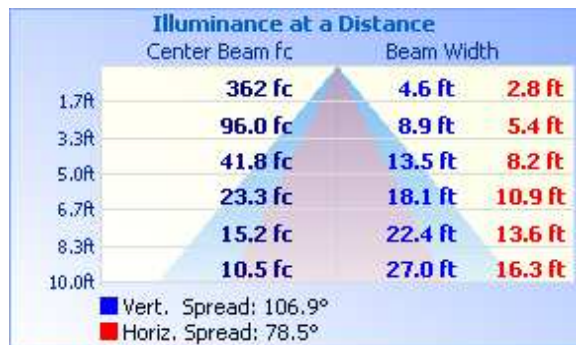


## RESULTS OF TEST (cont'd)

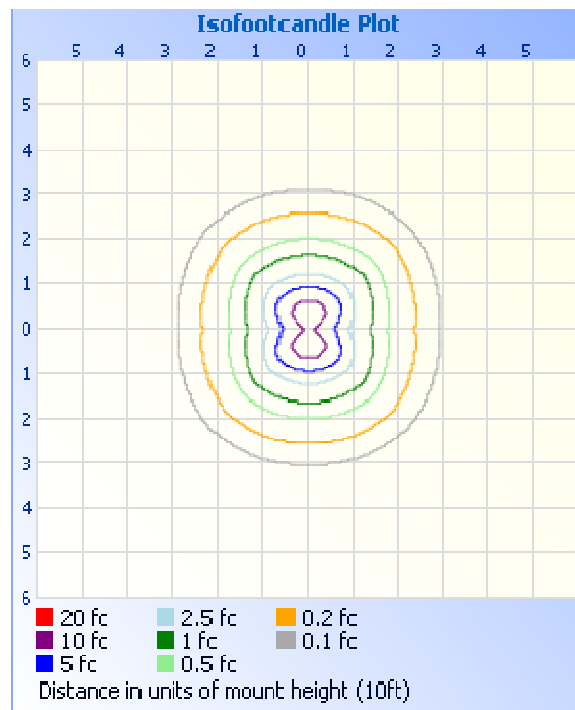
### Illumination Plots

Mounting Height: 10 ft.

Illuminance - Cone of Light



Isoillumination Plot



Zonal Lumen Summary and Percentages at 25°C

Zone	Lumens	% Luminaire
0-30	1098	25.9
0-40	1898	44.7
0-60	3384	79.7
60-90	861.9	20.3
0-90	4245	100.0
90-180	0.0	0.0
0-180	4245	100.0

Zonal Lumens and Percentages at 25°C

Zone	Lumens	% Luminaire
0-10	105.8	2.5
10-20	359.9	8.5
20-30	632.8	14.9
30-40	800.0	18.8
40-50	803.4	18.9
50-60	681.6	16.1
60-70	493.1	11.6
70-80	284.9	6.7
80-90	83.9	2.0

Spacing Criterion at 25°C

Spacing Criterion (0-180)	1.82
Spacing Criterion (90-270)	1.10
Spacing Criterion (Diagonal)	1.76

PICTURES (not to scale)



### CONCLUSION

The results tabulated in this report are representative of the actual test samples submitted for this report only. The data is provided to the client for further evaluation. Compliance to the referenced specification requirements was not determined in this report.

In Charge Of Tests:

Gregory V. Rosandich  
Technician  
Lighting Division

Attachment: None

Report Reviewed By:

Vladimir Kozak  
Engineering Supervisor  
Lighting Division