

# REPORT

25800 COMMERCENTRE DRIVE, LAKE FOREST, CA 92630

Project No. G104464711

Date: October 1, 2020

REPORT NO. 104464711LAX-010

TEST OF ONE LED LUMINAIRE

MODEL NO. BPRO3-FLSH-LED35-HO-4-WWG-DM01

LED MODEL NO. LUMILEDS 2835E 9V

DRIVER MODEL NO. OSRAM OTI50G2 - 1077MAMP

RENDERED TO

PRUDENTIAL LIGHTING

1774 EAST 21ST

LOS ANGELES, CA 90058

**STATEMENT OF LIMITATION:** 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.

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

**AUTHORIZATION:** The testing performed was authorized by signed quote number Qu-01069292-0.

**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 Production sample of model number BPRO3-FLSH-LED35-HO-4-WWG-DM01. The sample was received by Intertek on September 29, 2020, in undamaged condition and one sample was tested as received. The sample designation was LAN2009290928-001.

**DATES OF TESTS:** October 1, 2020

## SUMMARY

Model No.:	BPRO3-FLSH-LED35-HO-4-WWG-DM01
Description:	LED Luminaire

Criteria	Result
Total Lumen Output (Lumens)	4901
Total Power (W)	40.51
Luminaire Efficacy (LPW)	121.0
Power Factor	0.986

## EQUIPMENT LIST

Equipment Used	Model Number	Control Number	Last Date Calibrated	Calibration Due Date	Date Used
Goniophotometer	6440T	000943	VBV	VBV	10/01/20
AC Source	CW1251P	000944	VBV	VBV	10/01/20
Power Analyzer	WT210	000945	09/29/20	09/29/21	10/01/20
Tape Measure	33-428	001491	VBV	VBV	10/01/20
Magnetic Level	581-9	001610	10/11/19	10/11/20	10/01/20
Temp. & RH Meter	Testo 622	001897	04/22/20	04/22/21	10/01/20

## 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.

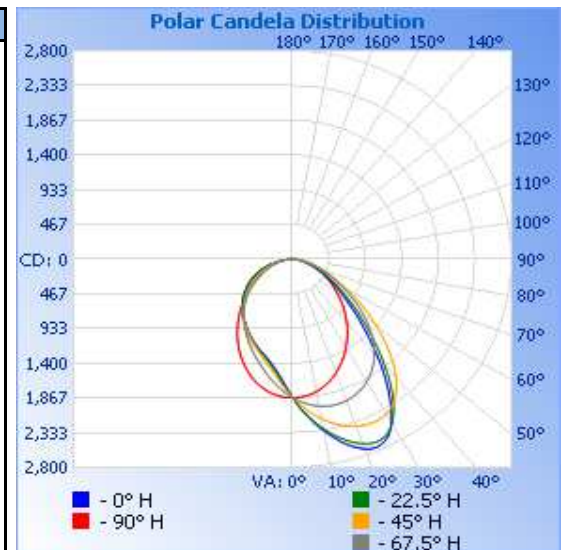
## RESULTS OF TEST

### 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)
LAN2009290928-001	Up	120.0	342.3	40.51	0.986	4901	121.0

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

	Angle	0	22.5	45	67.5	90
	90	0	0	0	0	0
W A L L  S I D E	85	57	57	68	75	77
	80	120	126	157	166	161
	75	194	207	264	268	245
	70	285	306	402	390	328
	65	401	435	582	544	418
	60	547	597	811	736	519
	55	734	805	1090	966	640
	50	971	1069	1410	1205	778
	45	1278	1406	1747	1435	926
	40	1683	1818	2056	1631	1077
	35	2136	2235	2283	1786	1226
	30	2533	2548	2401	1901	1372
	25	2730	2678	2425	1979	1507
	20	2712	2639	2386	2023	1627
	15	2559	2503	2302	2032	1728
	10	2344	2317	2181	2006	1803
	5	2108	2101	2027	1946	1847
	0	1858	1858	1858	1858	1858
R O O M  S I D E	5	1614	1638	1672	1749	1847
	10	1452	1470	1514	1627	1803
	15	1347	1361	1393	1502	1728
	20	1272	1282	1300	1386	1627
	25	1201	1210	1220	1278	1507
	30	1126	1132	1141	1175	1372
	35	1051	1054	1058	1074	1226
	40	979	976	971	973	1077
	45	904	897	878	865	926
	50	822	813	778	750	778
	55	734	722	676	630	640
	60	639	625	570	515	519
	65	539	523	464	410	418
	70	429	417	360	318	328
	75	310	308	260	233	245
	80	192	196	166	152	161
	85	84	91	78	73	77
	90	0	0	0	0	0
	Angle	180	202.5	225	247.5	270

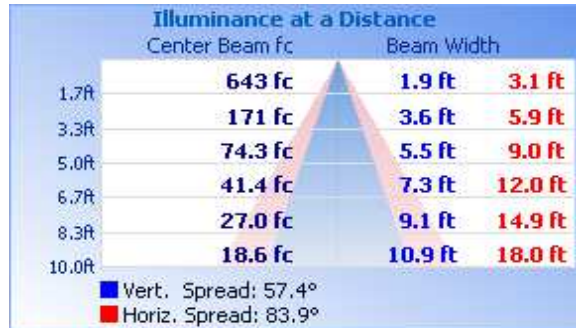


RESULTS OF TEST (cont'd)

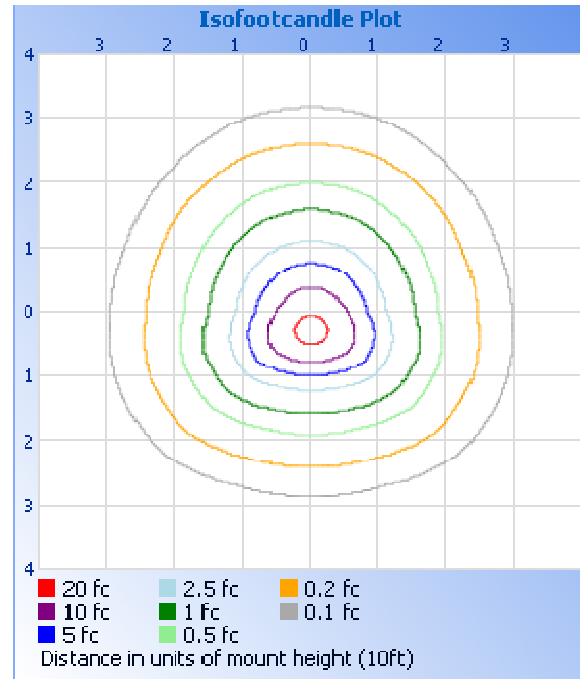
Illumination Plots

Mounting Height: 10 ft.

Illuminance - Cone of Light



Isoillumination Plot



Zonal Lumen Summary and Percentages at 25°C

Zone	Lumens	% Luminaire
0-30	1519	31.0
0-40	2477	50.5
0-60	4071	83.1
60-90	830.2	16.9
0-90	4901	100.0
90-180	0.0	0.0
0-180	4901	100.0

Zonal Lumens and Percentages at 25°C

Zone	Lumens	% Luminaire
0-10	177.0	3.6
10-20	522.6	10.7
20-30	819.2	16.7
30-40	958.6	19.6
40-50	891.5	18.2
50-60	701.9	14.3
60-70	478.4	9.8
70-80	270.2	5.5
80-90	81.6	1.7

Spacing Criterion at 25°C

Spacing Criterion (0-180)	1.56
Spacing Criterion (90-270)	1.12
Spacing Criterion (Diagonal)	1.42

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:



Kellen Murakami  
Technician  
Lighting Division

Attachment: None

Report Reviewed By:



Vladimir Kozak  
Engineering Supervisor  
Lighting Division