

AFX, INC.

TEST REPORT

SCOPE OF WORK

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

MODEL NUMBER
ALV490535LAJD2

REPORT NUMBER
103792309CHI-005

ISSUE DATE
February 27, 2019

REVISION DATE
None

DOCUMENT CONTROL NUMBER
TBD
© 2017 INTERTEK



REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

TEST REPORT

TEST OF ONE 4' LINEAR AMBIENT LUMINAIRE

MODEL NO. ALV490535LAJD2
LED MODEL NO. SAMSUNG LM281B
DRIVER MODEL NO. (2) KEYSTONE TECHNOLOGIES KTLD-23-UV-830-VDIM-L7

RENDERED TO:

AFX, INC.
2345 N. ERNIE KRUEGER CIRCLE
WAUKEGAN, IL 60087-3225

AUTHORIZATION

The testing performed was authorized by signed quote number Qu-00935446-0.

STANDARDS USED

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

DESCRIPTION OF SAMPLE

The client submitted one production sample of model number ALV490535LAJD2. The sample was received by Intertek on February 11, 2019 in undamaged condition and one sample was tested as received. The sample designation was AH02112019033354-02B.

DATE OF TESTS

February 27, 2019.

REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

TEST REPORT

SUMMARY

MODEL NO:	ALV490535LAJD2
DESCRIPTION:	4' Linear Ambient Luminaire

CRITERIA	RESULTS
Lumen Output (lumens)	3955.8
Input Power (W) @ 120 (VAC)	42.817
Lumen Efficacy (lm/W)	92.4
Input Power Factor @ 120 (VAC)	0.991

EQUIPMENT LIST

EQUIPMENT USED	MODEL NO.	CONTROL NO.	LAST CAL DATE	CAL DUE DATE
Yokogawa Power Meter	WT210	146919	7/9/2018	7/9/2019
Omega Thermometer	DPI8-C24	146920	10/4/2018	10/4/2019
LSI High Speed Mirror Goniometer	6440T	146928	VBU	VBU
Newport Thermohygrometer	iServer	146379	4/16/2018	4/16/2019
Pacific, AC power supply	118-ACX	CHI0358	VBU	VBU

REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

TEST REPORT

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 Type C Mirror Goniometer was used to measure the intensity (candelas) at each angle of distribution for the SSL sample.

Ambient temperature was measured equal to the height of the sample mounted on the goniometer equipment. The SSL sample was operated on the client provided driver at rated input volts in its designated orientation. The SSL sample was allowed to stabilize for at least thirty minutes before measurements were made. Stabilization procedures to LM-79 were followed. Electrical measurements including voltage, current, and power were measured using a power analyzer.

REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

TEST REPORT

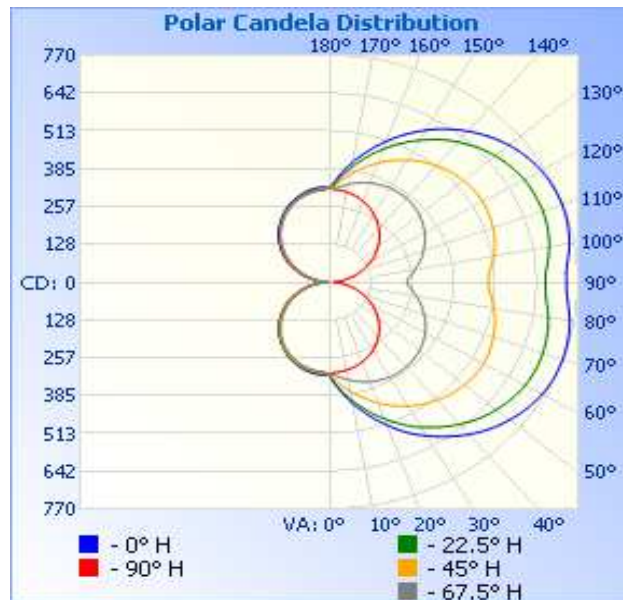
RESULTS OF TESTS

PHOTOMETRIC AND ELECTRICAL MEASUREMENTS - DISTRIBUTION METHOD (25°C +/- 1°C)

INTERTEK CONTROL NO.	BASE POSITION	INPUT VOLTAGE (VAC)	INPUT CURRENT (mA)	INPUT POWER (W)	INPUT POWER FACTOR ()	LIGHT OUTPUT (lm)	LUMEN EFFICACY (lm/W)
AH02112019033354-02B	Horizontal	120.0	360.0	42.817	0.991	3955.8	92.4

INTENSITY SUMMARY - CANDELAS

Angle	0	22.5	45	67.5	90
0	314	314	314	314	314
5	367	362	343	322	307
10	417	407	376	336	304
15	467	451	406	349	298
20	515	493	436	360	291
25	562	533	462	367	281
30	602	570	486	372	269
35	640	600	506	375	254
40	674	630	522	374	238
45	705	655	535	370	219
50	728	675	545	364	199
55	747	690	551	355	178
60	761	700	552	343	155
65	768	704	548	329	130
70	769	704	541	312	105
75	764	698	531	294	80
80	756	689	518	275	55
85	741	674	502	254	33
90	734	669	493	241	16
95	740	677	500	253	30
100	755	691	518	273	53
105	764	700	531	294	78
110	768	704	540	311	104
115	765	702	546	327	129
120	758	697	548	342	154
125	744	685	546	352	178
130	725	669	539	362	200
135	700	648	530	368	221
140	669	621	516	372	240
145	635	591	500	372	256
150	596	556	479	371	272
155	553	519	456	366	285
160	507	480	430	359	296
165	460	438	401	349	305
170	412	396	371	337	311
175	362	351	339	324	315
180	318	318	318	318	318



REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

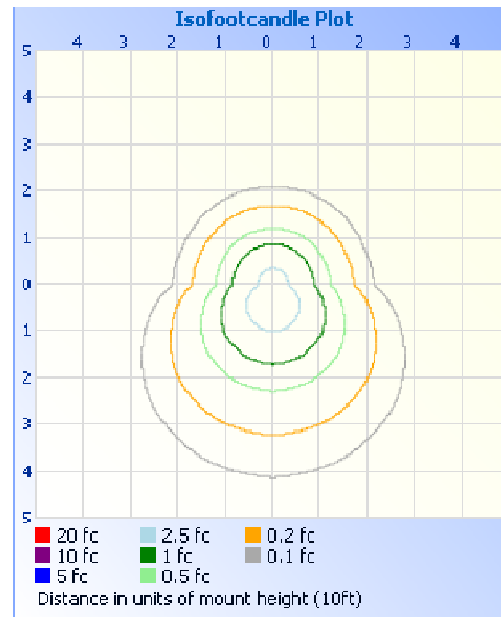
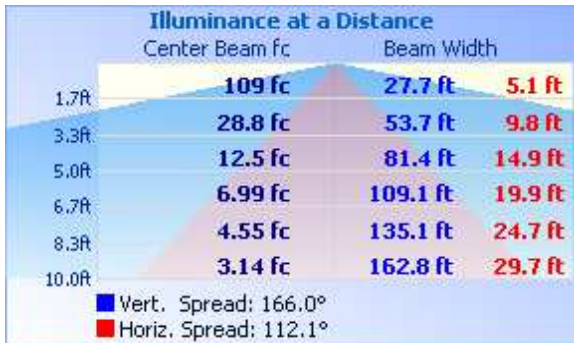
TEST REPORT

RESULTS OF TESTS

PHOTOMETRIC AND ELECTRICAL MEASUREMENTS - DISTRIBUTION METHOD (25°C +/- 1°C)

MOUNTING HEIGHT: 10ft

ILLUMINANCE - CONE OF LIGHT	ISOILLUMINATION PLOT
-----------------------------	----------------------



ZONAL LUMEN SUMMARY AND PERCENTAGES

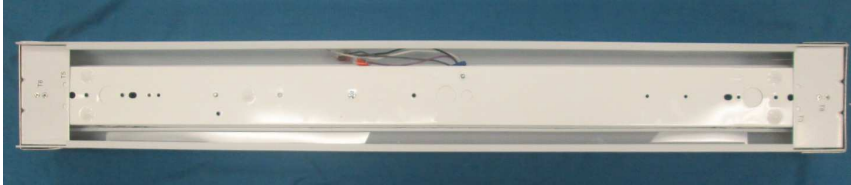
ZONE	LUMENS	% LUMINAIRE
0-30	298.7	7.6
0-40	529.3	13.4
0-60	1115.7	28.2
60-90	871.3	22.0
70-100	817.1	20.7
90-120	860.5	21.8
0-90	1987.0	50.2
90-180	1968.8	49.8
0-180	3955.8	100.0

ZONE	LUMENS	% LUMINAIRE
0-10	31.5	0.8
10-20	99.1	2.5
20-30	168.2	4.3
30-40	230.6	5.8
40-50	278.9	7.0
50-60	307.5	7.8
60-70	312.9	7.9
70-80	296.0	7.5
80-90	262.4	6.6
90-100	258.7	6.5
100-110	292.4	7.4
110-120	309.4	7.8
120-130	304.6	7.7
130-140	276.6	7.0
140-150	229.0	5.8
150-160	167.4	4.2
160-170	99.1	2.5
170-180	31.6	0.8

REPORT NO.:103792309CHI-005
REPORT DATE: February 27, 2019

TEST REPORT

PICTURES



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:

Timothy Quigley
Engineer
Lighting Division

Report Reviewed By:

Hector Huitron
Associate Engineer
Lighting Division

Attachments: IES File

REVISION HISTORY

JOB NUMBER	DATE OF REVISION	PROJECT HANDLER	REVIEWED BY	REVISION NOTE
None				