

## ISTMT Test Report

For

### SHENZHEN JIANGJING LIGHTING CO., LTD.

3-5 Floor, Building A & 4-5 Floor, Building C, Aiqun Road, Tongfuyu Industrial Zone, Shangwu Community, Shiyuan Street, Bao'an District, Shenzhen City, Guangdong Province, China.

### LED PANEL

Model Name(s):

PLC-35W-24-28-DM-02

PLC-40W-24-28-DM-02

PLC-45W-24-28-DM-02

PLC-50W-24-28-DM-02

Representative (Tested) Model:

PLC-50W-24-28-DM-02

**Model Difference: All is the same construction, except Wattage.**

Prepare by:

*Derek Lai*

Engineer: Derek Lai

Date: 2018-07-24

Review by:

*Vincent Yuan*

Technical Lead: Vincent Yuan

Issue Date: 2018-07-26

Revised Date: N/A

- Note:
1. The results contained in this report pertain only to the tested samples.
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  3. This report does not imply product certification, approval, or endorsement by NVLAP, or any agency of the Federal Government.

**Laboratory: Dongguan New Testing Centre Co., Ltd**

Address: 3F, No. 1 the 1<sup>st</sup> North Industry Road, Songshan Lake Science & Technology Park, Dongguan, Guangdong, China

Tel: 86-769-89874553

Website: <http://www.ntc-cert.com>

**Product Information:**

Client Name:	SHENZHEN JIANGJING LIGHTING CO., LTD.
Brand Name:	JIANGJING
Model Number:	PLC-50W-24-28-DM-02
Product Type:	2x4 Luminaires for Ambient Lighting of Interior Commercial Space
Rating Input:	120-347Vac, 50/60Hz, 50W
Declared CCT:	3000K
Declared Light Output:	5250 lm
LED Manufacturer:	ShenZhen JuFei Optoelectronics Co., Ltd.
LED Model:	2835 White SMD LED

**Test Information:**

Date of Receipt Samples:	2018-07-06
Quantity of Receipt Samples:	1
Sample Number:	180706008-S1

**Laboratory Information:**

Test Laboratory:	Dongguan New Testing Centre Co., Ltd
Laboratory Address:	3F, No. 1 the 1 <sup>st</sup> North Industry Road, Songshan Lake Science & Technology Park, Dongguan, Guangdong, China
Laboratory Contact Name:	Neil Zhong
Laboratory Contact E-mail:	<a href="mailto:Neil_ntc@163.com">Neil_ntc@163.com</a>

**Report Information:**

Issued Date of Test Report:	2018-07-26
Revised Date of Test Report:	N/A
Test Report No.:	NTCR18070092
Remark (If applicable):	N/A

**Test Specification:**

Date of Test	2018-07-18
Test Item	1. In-Situ Temperature Measured Test (ISTMT)
Reference Standard	ANSI/UL 1598-2008 Luminaire

**Test Methods:****1. In-Situ Temperature Measurement Test (ISTMT)**

Maximum LED source operated temperature measurements were taken on one test sample per model with a thermocouple and temperature meter. The SSL sample could reach thermal equilibrium for at least 3 hours before measurements were taken. LED source temperature was measured at the point as indicated by the included diagram in accordance with manufacturers declared hot spot location. The maximum temperature was recorded for the sample. A simulated ceiling or other enclosure may be used in accordance to UL 1598 as applicable.

**In-Situ Temperature Measurement Test Results (Test for PLC-50W-24-28-DM-02):**

**Electrical Data:**

Voltage (V)	Frequency (Hz)	Current (A)	Wattage (W)	Power Factor	Orientation	Test Time (hours)
120	60	0.4066	48.44	0.9922	Face Down	3.5

**Test Result:**

TC Location	Measured LED Driver Current (mA)	Temperature (°C)			Limits (°C)	TM-21 Result			
		Ambient	Test Result	Corrected to 25°C		Lumen Maintenance (%)		Reported (hours)	
						L70	L90	L70	L90
TMP <sub>LED</sub>	31.8	27.3	48.5	46.2	55	90.84	N/A	>60000	N/A

**Test Result from TM-21:**

**L70**

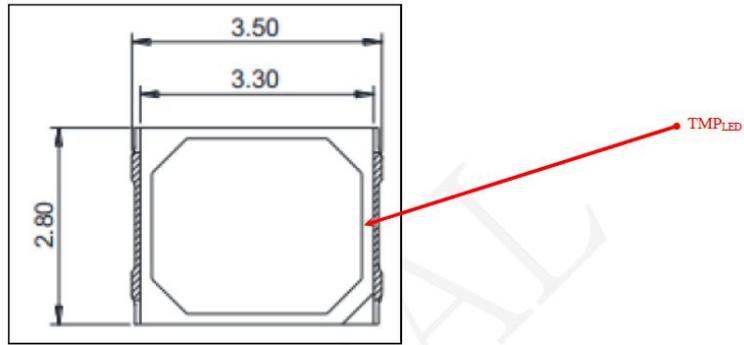
***In-Situ* Inputs**

Drive current for each LED package/array/module (mA):	31.8
<i>In-situ</i> case temperature (T <sub>c</sub> , °C):	48.5
Percentage of initial lumens to project to (e.g. for L70, enter 70):	70

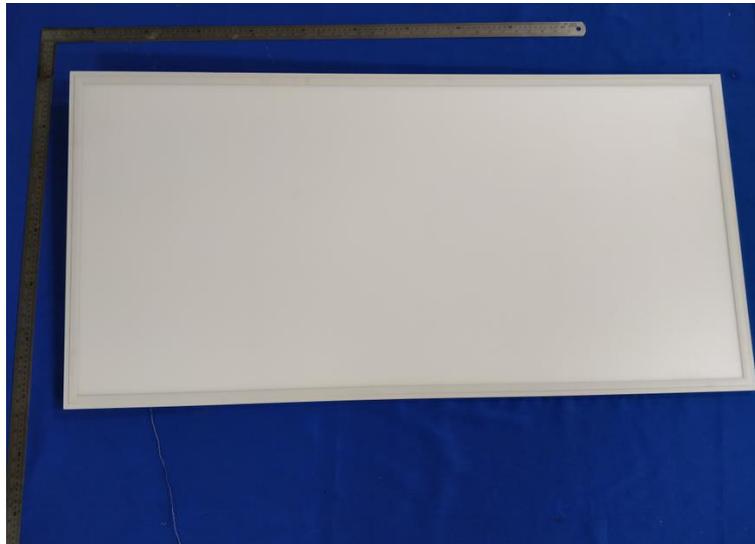
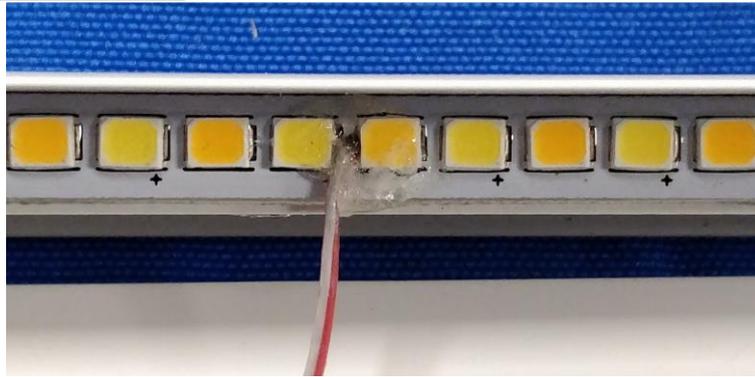
**Results**

Time (t) at which to estimate lumen maintenance (hours):	50,000
Lumen maintenance at time (t) (%):	90.84%
Reported L70 (hours):	>60000

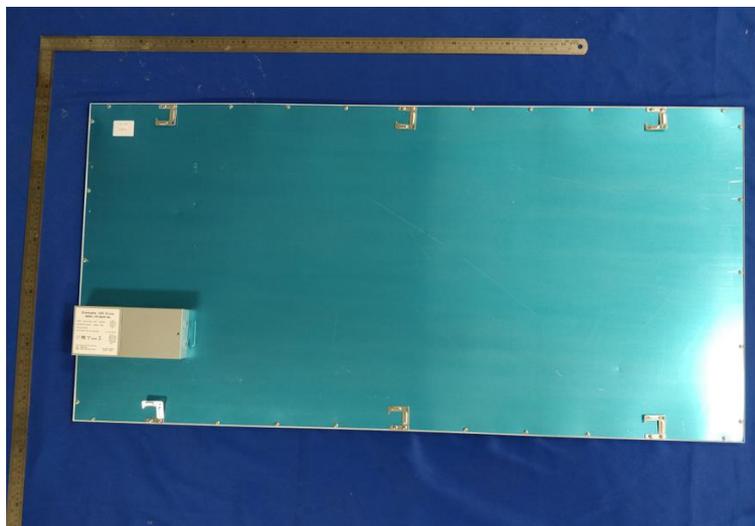
**TMP Position in LM-80:**



**Thermocouple Position on TMP:**



**Photo of Sample:**



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**Equipment List:**

Equipment ID	Equipment Name	Last Cal.	Due Cal.
NTC-F01-031	Digital Power Meter	2017-11-18	2018-11-17
NTC-F01-019	Temperature & Humidity Meter	2017-11-23	2018-11-22
NTCD-S001	Temperature Data Logger	2017-11-27	2018-11-26