70953 台南市海中街 288 號 TEL = (06)2568831 FAX = (06)2563437 E-mail = light.lab@msa.hinet.net Web = www.lightlab.com.tw



# DEGREES OF PROTECTION PROVIDED BY ENCLOSURES PATTERN TEST REPORT

Test Standard: IEC 60529(2001)

Date of Receipt: 2016 / 02 / 18

Test Date: 2016 / 02 / 22 ~ 2016 / 02 / 24

Result of determination this subclass type experiment: PASS(IP65)

1. Issue date for test report : 2016 / 03 / 15

2. Report No: 16021806

3. Total pages: 7

4. Test report without steel stamp is not valid, and shall not be reproduced except in full.

5. Test sample is not sampling by laboratory, test result relate only to the items tested.

6. Test report is not responsible for advertisement or promotion for products.

Approved Signatory:

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#### Test Report

#### **Information for test items**

Applicant: TAIWAY ELECTRONICS COMPONENTS CO., LTD.

Applicant's address: 6F, No.4, Lane 359, Section 2 ZhongShan Road, ZhongHe

District, New Taipei City, Taiwan

Manufacturer: TAIWAY ELECTRONICS COMPONENTS CO., LTD.

Manufacturer's address: 6F, No.4, Lane 359, Section 2 ZhongShan Road,

ZhongHe District, New Taipei City, Taiwan

Product: Anti-Vandal M19 Pushbutton Switches (AV series)

Model No.: AV02L-B22-M3-FR-O-12V

Series model : AVx-B2x-x-x-x / (X=0~220, A-Z)

Uses the place : ☐in door out door

Application test rank: IP65

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#### **Test content**

<u>rest content</u>					
Test Levels	Test standard (IEC 60529)	Result of test	Determination		
	Temperature : 25.3 ℃ Humidit	y : 54.4 %RH	L		
	Degrees of protection against access to hazardous parts and				
IP6X	protection against solid foreign objects indicated by the first				
	characteristic numeral				
	The test wire of 1.0 mm shall	Not penetrate and			
	not penetrate and adequate	adequate	PASS		
	clearance shall be kept.	clearance be kept.			
	The enclosure shall be deemed	No dust into the test box.			
	category 1, whether reductions				
	in pressure below the				
	atmospheric pressure are				
	present or not.				
	The protection is satisfactory if				
	no deposit of dust is observable				
	inside the enclosure at the end				
	of the test.				
	Degrees of protection against water indicated by the second				
	characteristic numeral				
IPX5	Water projected in jets against	No water into the test box.	PASS		
	the enclosure from any				
	direction shall have no harmful				
	effects (projected against water				
	jets) delivery rate : 12.5 ℓ±5% >				
	minimum test duration: 3min				
	Distance from nozzle to				
	enclosure surface :				
	2.5~3m.				

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# **Photo of test items**

## The appearance of photo



The appearance of photo



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## **Photo of test items**

## IP6X testing



IP6X after the test



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## **Photo of test items**

# IPX5 testing



IPX5 after the test



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## **Equipment list and testing engineer for test**

Item	Equipment No	Equipment	Manufacturer / Type / Series No	
1	99S-04	Bears the dust		
		testing machine	TAICHY TECHNOLOGY LTD	
		class dust +	DT-1500CF	
		Floating dust		
2	99S-07	Bears the rain	TAICHY TECHNOLOGY LTD RT-IEC-IPX5.6	
		water testing		
		machine	K1-IEC-IFA5.8	
3	99S-10	IP test touch and	Shanghai Haiyue Electrinic /	
		access wire	DTPP-1.0/100	
Testing engineers: Chun-Ting Liu				

<sup>-</sup>Following blank-