HYB 20P PLUG/ CAP HSG(2R) AND TPA HSG

1. INTRODUCTION

1.1 Purpose

Testing was performed on HYB 20P PLUG/ CAP HSG(2R) AND TPA HSG to determine its conformance to the customer requirements.

1.2 Scope

This report covers the Glow Wire Test performance of HYB 20P PLUG /CAP HSG(2R) AND TPA HSG. Testing was performed at the Shanghai Electrical Components Test Laboratory between Nov.01 to Nov.04,2014. The associated test number isTP-14-02581.

1.3 Conclusion

Based on the test results, all meet the requirement according to IEC 60335-1, 2013, and IEC 60695-2-11, 2014.

1.4 Test Specimens

Specimens with the following part numbers were used for test:

Test request No.	Housing P/N	Position	Qty	Part Description	Material
TP-14-02581	2188646-1	20 pos	6 pcs	HYB 20P CAP HSG(2R)	PC/PET
	2188645-1	20 pos	6 pcs	HYB 20P PLUG HSG(2R), P/M	
	2188647-2	20 pos	6 pcs	HYB 20P TPA HSG	PA66

1.5 Test Sequence

Test Item	Test Group (a)
	1
	Test Sequence(b)
Visual examination	1
Glow Wire Test	2
Sample Size	6pcs

Note: a). Test group defined per customer requirement.
b). Numbers indicate sequence in which tests are performed.

1.6 Environmental Conditions

Unless otherwise stated, the following environmental conditions prevailed during testing:

Temperature: 15℃ to 35℃
Relative Humidity: 25% to 75%

| Indicates Change

2. TEST PROCEDUES

2.1. Visual examination
All specimens were visually examined for evidence of physical damage detrimental to product performance (visually inspected under a stereomicroscope, at a 10x magnification, with suitable illumination).
Test method: IEC 60512-1-1, Test 1a.

2.2. Glow wire Test
Thermal stabilization of specimens: 24 h at (15-35) ℃ and (45-75) %RH.
Test condition: The extremity of the wire is positioned horizontally and brought into contact with the sample with a force between 0.8N and 1.2N for a period of 30s. Test temperature: 750℃, Time of Glow tip applicatio n Ta: 30s
Requirements: No flame or Te-Ti≤2s.
Test Method: IEC 60335-1, 2013, and IEC 60695-2-11, 2014.

3. SUMMARY OF TESTING

3.1. Initial Examination of Product
All specimens were visually examined and no evidence of physical damage detrimental to product performance was observed.

3.2. Glow wire Test results
Glow wire test results see Tab.1-2

Test 1: 2188646-1 HYB 20P CAP HSG(2R)

Test samples	Number of data points	Condition	Point of glow tip application	Ti (sec)	Te (sec)	Flame Height (mm)	Drops (yes/no)	Light tissue paper burns (yes/no)	Judgment
2188646-1	6 pcs	Final (GWT 750℃)	A1	0	0	0	no	no	Meet spec
			A2	0	0	0	no	no	Meet spec
			A3	0	0	0	no	no	Meet spec
			B1	0	0	0	no	no	Meet spec
			B2	0	0	0	no	no	Meet spec
			B3	0	0	0	no	no	Meet spec

Tab.1

Test 2: 2188645-1 HYB 20P PLUG HSG(2R), P/M

Test samples	Number of data points	Condition	Point of glow tip application	Ti (sec)	Te (sec)	Flame Height (mm)	Drops (yes/no)	Light tissue paper burns (yes/no)	Judgment
2188645-1	6 pcs	Final (GWT 750℃)	A1	0	0	0	no	no	Meet spec
			A2	0	0	0	no	no	Meet spec
			A3	0	0	0	no	no	Meet spec
			B1	0	0	0	no	no	Meet spec
			B2	0	0	0	no	no	Meet spec
			B3	0	0	0	no	no	Meet spec

Tab.2

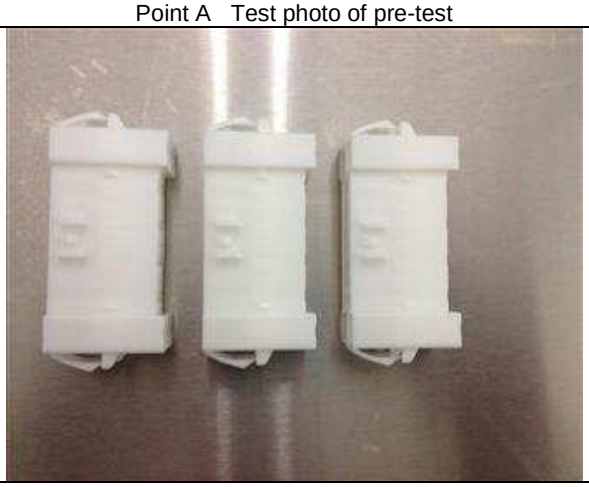
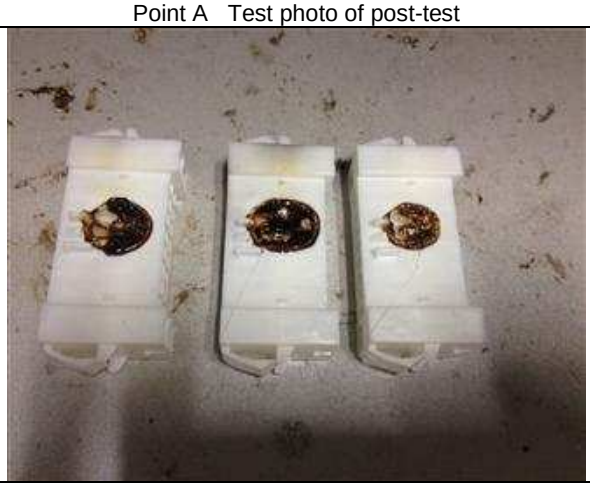
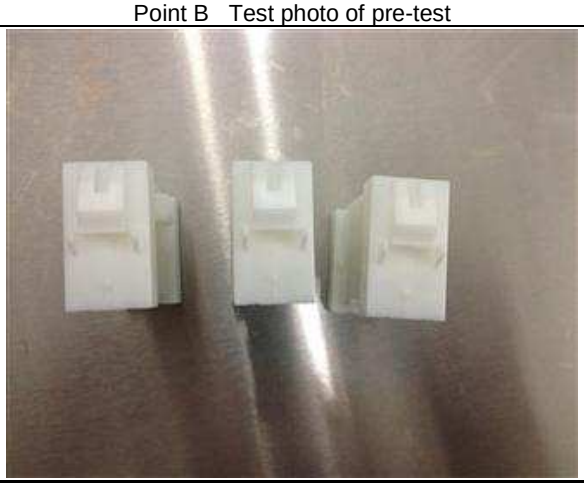
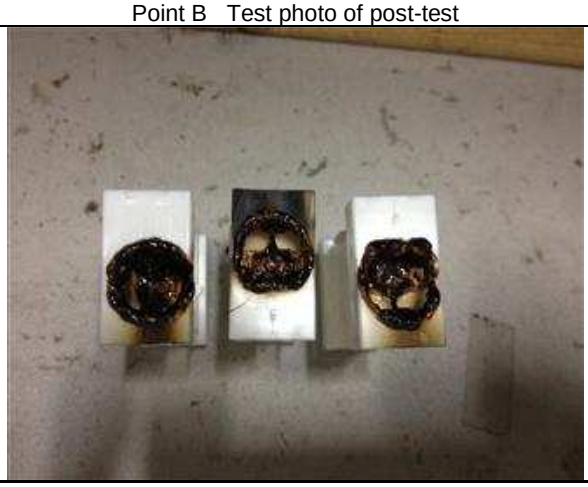
Test 3: 2186647-2 (HYB 20P TPA HSG)

Test samples	Number of data points	Condition	Point of glow tip application	Ti (sec)	Te (sec)	Flame Height (mm)	Drops (yes/no)	Light tissue paper burns (yes/no)	Judgment
2186647-2	6 pcs	Final (GWT 750℃)	A1	0	0	0	no	no	Meet spec
			A2	0	0	0	no	no	Meet spec
			A3	0	0	0	no	no	Meet spec
			A4	0	0	0	no	no	Meet spec
			A5	0	0	0	no	no	Meet spec
			A6	0	0	0	no	no	Meet spec

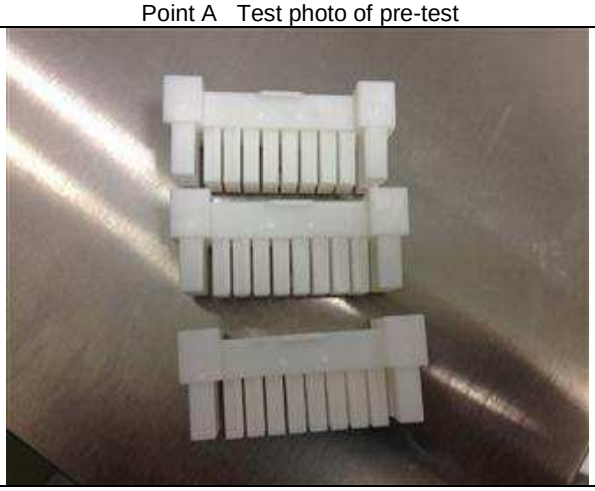
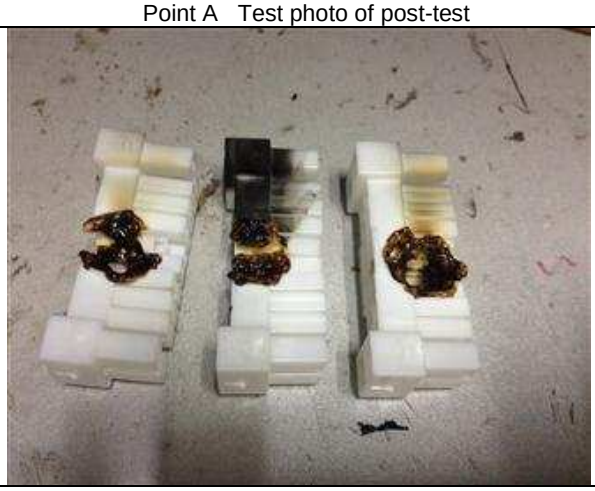
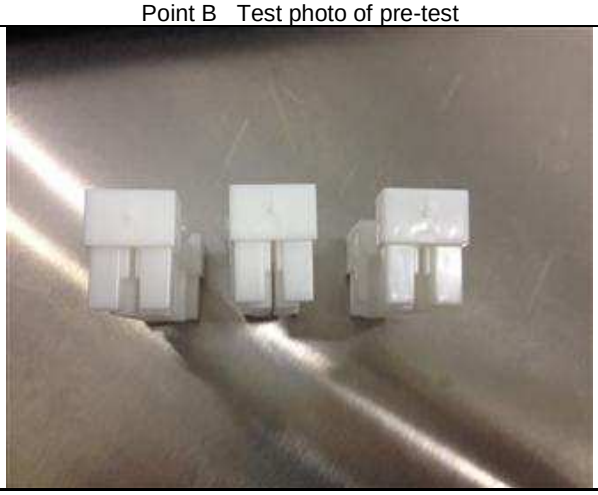
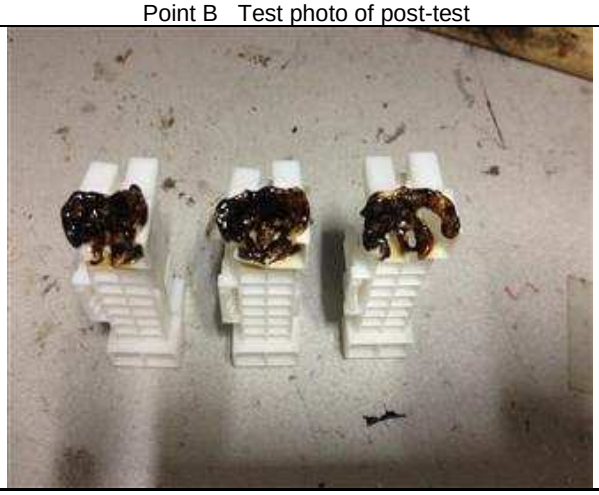
Tab.3

Sample pictures:

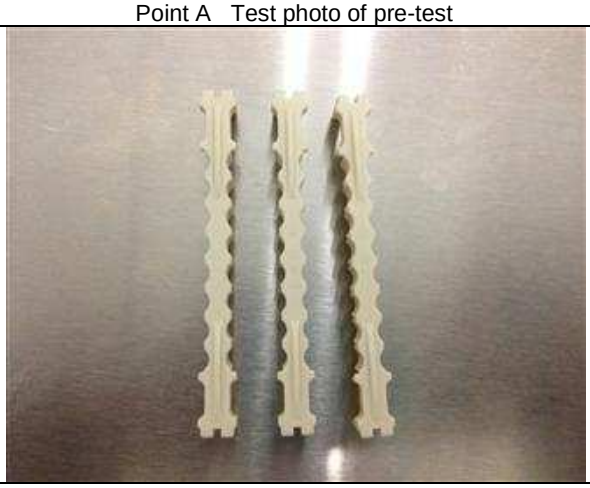
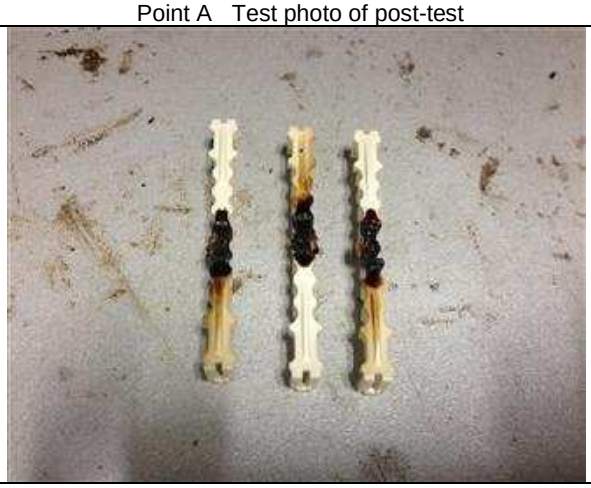
Test 1: 2188646-1 HYB 20P CAP HSG(2R)

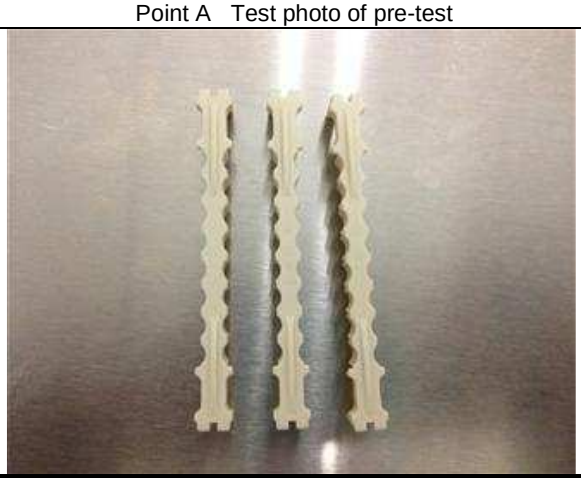
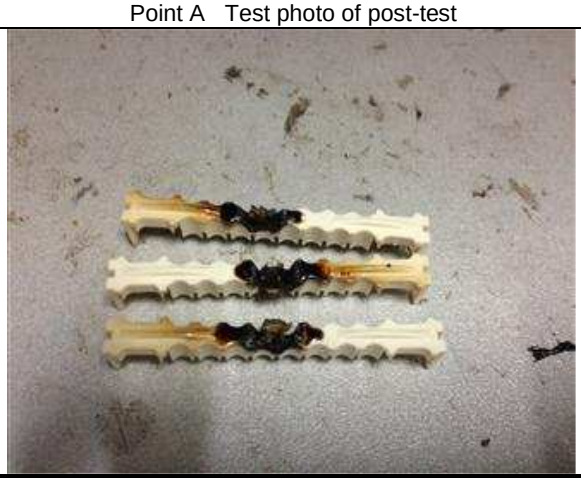
Description of pre-test: Normal	Description of post-test: Damage
Point A Test photo of pre-test	Point A Test photo of post-test
	
Point B Test photo of pre-test	Point B Test photo of post-test
	

Test 2: 2188645-1 HYB 20P PLUG HSG(2R), P/M

Description of pre-test: Normal	Description of post-test: Damage
Point A Test photo of pre-test	Point A Test photo of post-test
	
Point B Test photo of pre-test	Point B Test photo of post-test
	

Test 3: 2186647-2 (HYB 20P TPA HSG)

Description of pre-test: Normal	Description of post-test: Damage
Point A Test photo of pre-test	Point A Test photo of post-test
	

Point A Test photo of pre-test	Point A Test photo of post-test
	

4. CALIBRATION

4.1 Calibration Statement

All equipment containing a calibration number is calibrated and traceable through TE Connectivity (TE).

No.	Test Item	Equipment Code	Equipment application	Calibration Effective Period	Serial No.
1	Examination of Product	/	Visual observation	/	/
2	Glow Wire Test	GW-V	Glow wire Tester	2015-04-17	E-00118

5. VALIDATION

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