

Test Report No. SHAEC2116439401 Date: 05 Aug 2021 Page 1 of 5

UNIROYAL ELECTRONICS INDUSTRY(KUNSHAN) CO.,LTD.

88 Longteng Road, Economic & Technical Development Zone, Kunshan City, Jiangsu, CHINA

The following sample(s) was/were submitted and identified on behalf of the clients as: Current Sense

Resistors

SGS Job No.: SP21-024029 - SH

Manufacturer: Uniroyal Electronics Industry(Kunshan) Co., Ltd Royal Electronic

Factory (Thailand) Co.,Ltd

Date of Sample Received: 02 Aug 2021

Testing Period : 02 Aug 2021 - 05 Aug 2021

Test Requested: Selected test(s) as requested by client.

Test Method : Please refer to next page(s).

Test Results: Please refer to next page(s).

Conclusion: Based on the performed tests on submitted sample(s), the results of Lead,

Mercury, Cadmium, Hexavalent chromium comply with the limits as set by RoHS

Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU.

Signed for and on behalf of SGS-CSTC Standards Technical Services (Shanghai) Co., Ltd.

Jenny Lan

Approved Signatory

Jenny Lan





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Test Results:

#### Test Part Description:

Specimen No. SGS Sample ID Description
SN1 SHA21-164394.001 Silver metal

#### Remarks:

- (1) 1 mg/kg = 0.0001%
- (2) MDL = Method Detection Limit
- (3) ND = Not Detected ( < MDL)
- (4) "-" = Not Regulated

### RoHS Directive (EU) 2015/863 amending Annex II to Directive 2011/65/EU

Test Method: With reference to IEC 62321-4:2013+AMD1:2017, IEC62321-5:2013 and IEC62321-7-1:2015, analyzed by ICP-OES, AAS and UV-Vis.

Test Item(s)	<u>Limit</u>	<u>Unit</u>	<u>MDL</u>	<u>001</u>
Cadmium (Cd)	100	mg/kg	2	ND
Lead (Pb)	1000	mg/kg	2	ND
Mercury (Hg)	1000	mg/kg	2	ND
Hexavalent Chromium (Cr(VI))▼	-	µg/cm²	0.10	ND

#### Notes:

- (1)The maximum permissible limit is quoted from RoHS Directive (EU) 2015/863. IEC 62321 series is equivalent to EN 62321 series https://www.cenelec.eu/dyn/www/f?p=104:30:1742232870351101::::FSP\_ORG\_ID,FSP\_LANG\_ID:1258637,25
- (2)▼ = a. The sample is positive for CrVI if the CrVI concentration is greater than 0.13 µg/cm². The sample coating is considered to contain CrVI
  - b. The sample is negative for CrVI if CrVI is ND (concentration less than 0.10  $\mu$ g/cm<sup>2</sup>). The coating is considered a non-CrVI based coating
  - c. The result between 0.10  $\mu g/cm^2$  and 0.13  $\mu g/cm^2$  is considered to be inconclusive unavoidable coating variations may influence the determination
  - Information on storage conditions and production date of the tested sample is unavailable and thus Cr(VI) results represent status of the sample at the time of testing.



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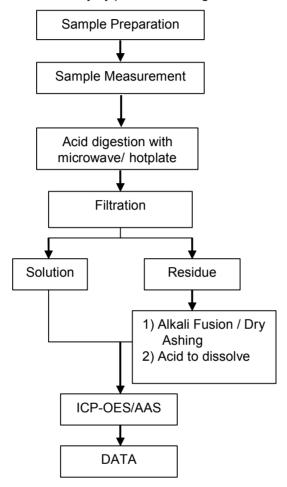
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## **ATTACHMENTS**

## **Elements (IEC62321) Testing Flow Chart**

1) These samples were dissolved totally by pre-conditioning method according to below flow chart.





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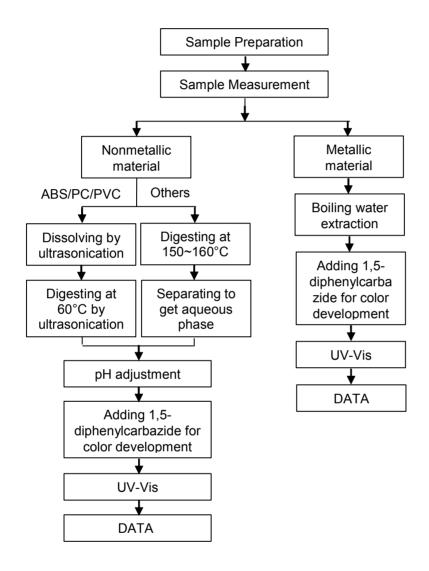
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## **ATTACHMENTS**

## Hexavalent Chromium (Cr(VI)) Testing Flow Chart





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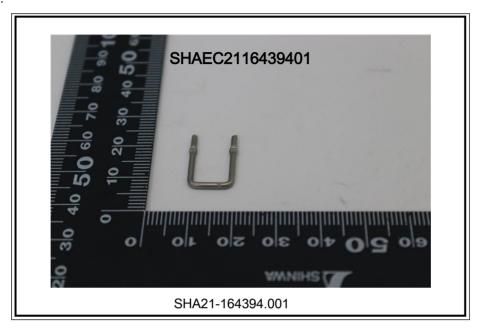
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Sample photo:



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