

Test Report

No. SHAEC1804251001

Date: 12 Mar 2018

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NING BO JIANG DONG HUASUN MECHANICAL ELECTRON MATERIAL LIMITED COMPANY.
NO.40 NINGCHUAN ROAD JIANG DONG NINGBO ZHEJIANG.

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

SGS Job No. : SP18-006758 - SH
Model No. : 3MM
Client Ref. Information : 2MM 2.5MM 3MM 3.175MM 3.5MM 4MM 4.763MM 5MM 5.556MM 6MM
6.35MM 7.144MM 7.938MM
Material No. : Q235
Main Substance : Q235
Date of Sample Received : 08 Mar 2018
Testing Period : 08 Mar 2018 - 12 Mar 2018
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.

Helen Liu

Helen Liu
Approved Signatory



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Test Results :

Test Part Description :

Specimen No.	SGS Sample ID	Description
SN1	SHA18-042510.001	Silvery metal ball

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)	Limit	Unit	MDL	001
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/cm ²	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
http://www.cenelec.eu/dyn/www/f?p=104:30:1742232870351101:::FSP_ORG_ID,FSP_LANG_ID:12586637,25
- (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 µg/cm²). The coating is considered a non-CrVI based coating
 c. The result between 0.10 µg/cm² and 0.13 µg/cm² 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.



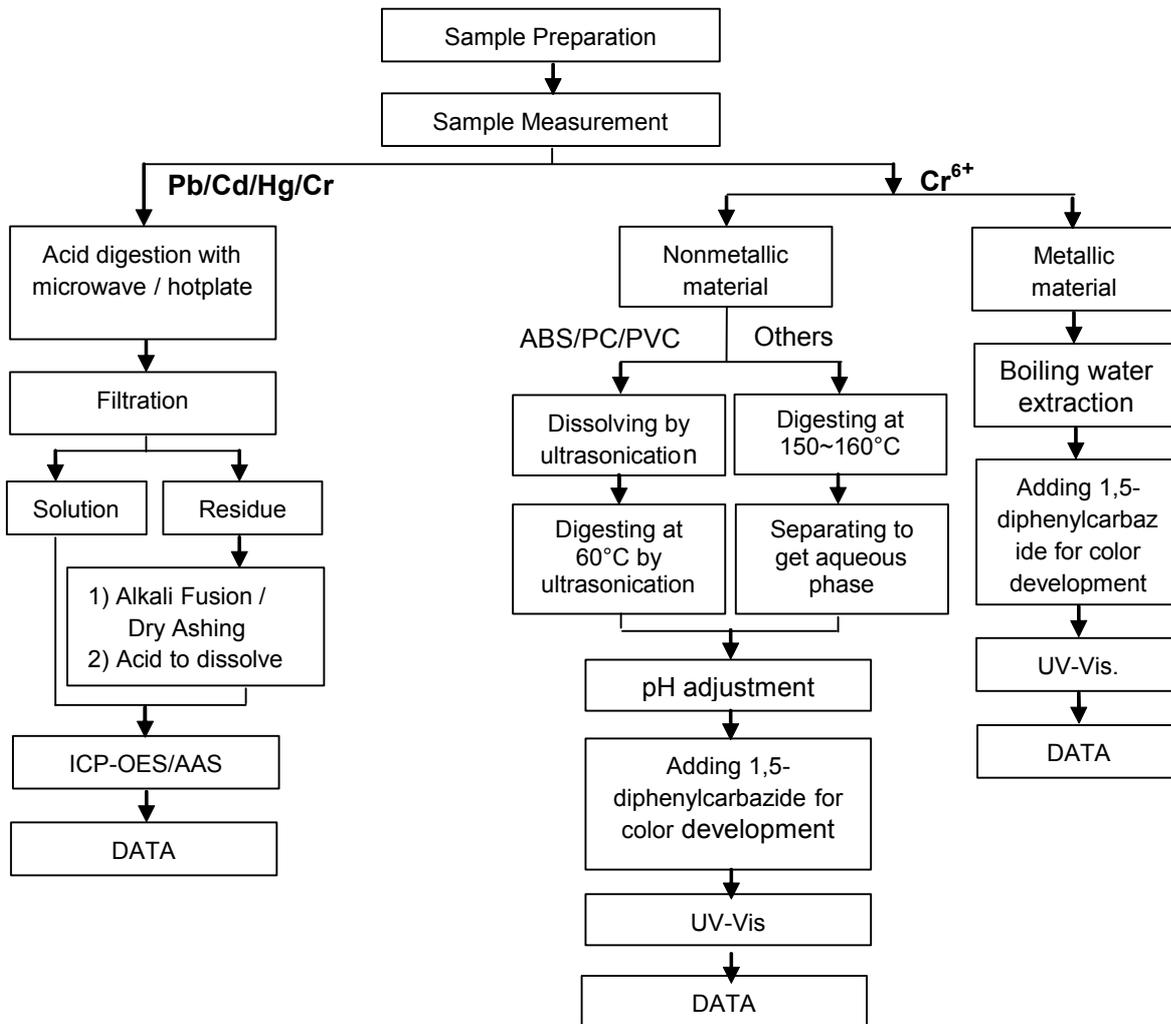
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ATTACHMENTS

Pb/Cd/Hg/Cr⁶⁺ Testing Flow Chart

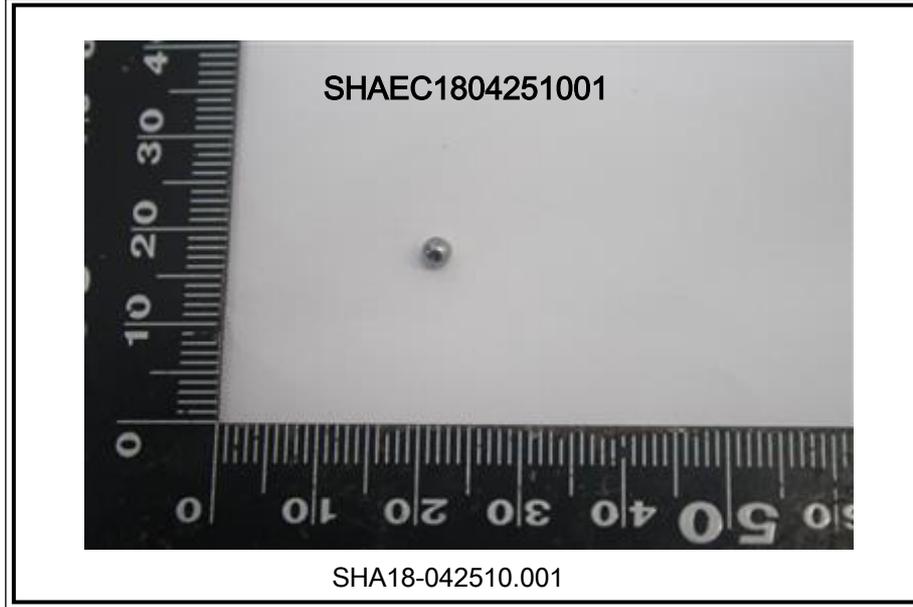
- 1) Name of the person who made testing: Meria Jin/Xiaolong Yang/Sielina Song
- 2) Name of the person in charge of testing: Jan Shi/Luna Xu/Shara Wang
- 3) These samples were dissolved totally by pre-conditioning method according to below flow chart. (Cr⁶⁺ test method excluded)



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Sample photo:



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*** End of Report ***

