

## **Test Report**

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Applicant :

Address :

The following sample(s) and sample information was/were submitted and identified by/on behalf of the client

Sample Name : Multi tool

Sample Material : Stainless steel 2CR13

Sample Model : MP-M017

Sample Lot : /

Sample Received Date : Sep 1, 2018

Test Completed Date : Sep 17, 2018

Test Method : Refer to the next pages

Test Results : Refer to the next page(s).

Lab Senior Engineer

Test Requested	Conclusion
German food and commodities law (LFGB) 30 and technical guidelines for the use of metals and alloys in food contact materials of the council of EU1935/2004 in CM/Res (2013)9.	EV. EV
Metal/metal coating extractable heavy metals	PASS

Reviewed by:

Authorized Signature:

Technology Manager

In no circumstances, shall the Company's responsibility extend beyond inspection, testing and reporting upon the samples actually drawn from the bulk and inspected, tested and surveyed by the Company and any inference to be drawn from the results of such inspection or survey or testing shall be entirely in the discretion and at the sole and exclusive responsibility of the Principal. This test report cannot be reproduced except in full.





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### Metal / Metallic coating - Extractable heavy metals

Method: Sample preparation in 0.5% citric acid (p/v) in aqueous solution at  $40^{\circ}$ C for 0.5 hours with reference to EN13130-1:2004 for selection of test method, followed by analysis using Inductively Coupled Argon Plasma Spectrometry (ICP) and Inductively coupled plasma-mass spectrometry (ICP-MS).

Test Item	Result(mg/kg)		Reporting	7×SRL	Specific Release
	1st + 2nd Migration	3rd Migration	Limit (mg/kg)	(mg/kg)	Limit (SRL) (mg/kg)
Aluminium (Al)	N.D.	N.D.	0.2	35	5
Antimony (Sb)	N.D.	N.D.	0.02	0.28	0.04
Arsenic (As)	N.D.	N.D.	0.001	0.014	0.002
Barium (Ba)	N.D.	N.D.	0.25	8.4	1.2
Beryllium (Be)	N.D.	N.D.	0.005	0.07	0.01
Cadmium (Cd)	N.D.	N.D.	0.002	0.035	0.005
Chromium(Cr)	N.D.	N.D.	0.1	1.75	0.25
Cobalt (Co)	N.D.	N.D.	0.01	0.14	0.02
Copper (Cu)	N.D.	N.D.	0.1	28	4
Iron (Fe)	N.D.	N.D.	0.25	280	40
Lead (Pb)	N.D.	N.D.	0.005	0.07	0.01
Lithium (Li)	N.D.	N.D.	0.02	0.336	0.048
Manganese(Mn)	N.D.	N.D.	0.25	12.6	1.8
Mercury (Hg)	N.D.	N.D.	0.002	0.021	0.003
Molybdenum(Mo)	N.D.	N.D.	0.02	0.84	0.12
Nickel (Ni)	N.D.	N.D.	0.05	0.98	0.14
Silver (Ag)	N.D.	N.D.	0.03	0.56	0.08
Thallium (TI)	N.D.	N.D.	0.0001	0.0007	0.0001
Tin (Sn)	N.D.	N.D.	5	700	100
Vanadium (V)	N.D.	N.D.	0.005	0.07	0.01
Zinc (Zn)	N.D.	N.D.	1	35	5
Comment	PASS		67.	5,,	<u> </u>

#### Note:

- (1) mg/kg = milligram per kilogram of foodstuff in contact with
- (2) °C = degree Celsius
- (3) N.D. = Not Detected
- (4) According to Council of Europe Resolution CM/Res(2013)9, the result from 3rd migration shall comply with the Specific Release Limit (SRL) and the sum of 1st and 2nd migration shall not exceed seven times of SRL for repeated use articles

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Test Part Description: Stainless steel

### Sample Photo



Note: The results shown in this report refer only to the sample(s) tested.

\* \* \* \* \* End of Report \* \* \* \*

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