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Report No. A2230160846101001

Company Name shown on Report JIANGSU MICRO COMMERCIAL COMPONENTS CO., LTD.

Address NO.68, XINGANQUAN ROAD, HANJIANG DISTRICT, YANGZHOU, CHINA

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

Sample Name **BONDING PACKAGE DEVICES**

Color Black body

BONDING PACKAGE DEVICES Material

May 5, 2023 Sample Received Date

Testing Period May 5, 2023 to May 13, 2023

As specified by client, to test Lead (Pb), Cadmium (Cd), Mercury (Hg), Hexavalent **Test Requested**

Chromium (Cr(VI)), Polybrominated Biphenyls (PBBs), Polybrominated Diphenyl Ethers

(PBDEs), Phthalates (DBP, BBP, DEHP, DIBP) in the submitted sample(s).

Please refer to the following page(s). **Test Method**

Test Result(s) Please refer to the following page(s).

Testing International Pinbiao(Shanghai) Co., Ltd.

Chen kaimin Lab Manager

Date

May 15, 2023

No. R475319778

No.1351, Wanfang Road, Minhang District, Shanghai, China



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Test Method

Test Item(s)	Test Method	Measured Equipment(s)
Lead (Pb)	IEC 62321-5:2013	ICP-OES
Cadmium (Cd)	IEC 62321-5:2013	ICP-OES
Mercury (Hg)	IEC 62321-4:2013+AMD1:2017 CSV	ICP-OES
Hexavalent Chromium (Cr(VI))	IEC 62321-7-2:2017 and/or determination of Total Chromium by IEC 62321-5:2013	UV-Vis/ICP-OES
Polybrominated Biphenyls (PBBs)	IEC 62321-6:2015	GC-MS
Polybrominated Diphenyl Ethers (PBDEs)	IEC 62321-6:2015	GC-MS
Phthalates (DBP, BBP, DEHP, DIBP)	IEC 62321-8:2017	GC-MS

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Test Result(s)

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Tested Item(s)	Result 001	MDL
Cadmium (Cd)	N.D.	2 mg/kg
Mercury (Hg)	N.D.	2 mg/kg
Hexavalent Chromium (Cr(VI))	N.D.	8 mg/kg
Tested Item(s)	Result	MDL
	001	WIDL
Polybrominated Biphenyls (PBBs)		
Monobromobiphenyl	N.D.	5 mg/kg
Dibromobiphenyl	N.D.	5 mg/kg
Tribromobiphenyl	N.D.	5 mg/kg
Tetrabromobiphenyl	N.D.	5 mg/kg
Pentabromobiphenyl	N.D.	5 mg/kg
Hexabromobiphenyl	N.D.	5 mg/kg
Heptabromobiphenyl	N.D.	5 mg/kg
Octabromobiphenyl	N.D.	5 mg/kg
Nonabromobiphenyl	N.D.	5 mg/kg
Decabromobiphenyl	N.D.	5 mg/kg
Tested Item(s)	Result	MDI
Tested Item(s)	001	MDL
Polybrominated Diphenyl Ethers (PBDEs)		
Monobromodiphenyl ether	N.D.	5 mg/kg
Dibromodiphenyl ether	N.D.	5 mg/kg
Tribromodiphenyl ether	N.D.	5 mg/kg
Tetrabromodiphenyl ether	N.D.	5 mg/kg
Pentabromodiphenyl ether	N.D.	5 mg/kg
Hexabromodiphenyl ether	N.D.	5 mg/kg
Heptabromodiphenyl ether	N.D.	5 mg/kg
Octabromodiphenyl ether	N.D.	5 mg/kg
Nonabromodiphenyl ether	N.D.	5 mg/kg
Decabromodiphenyl ether	N.D.	5 mg/kg



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Test Result(s)

Tested Item(s)	Result	MDL		
Phthalates (DBP, BBP, DEHP, DIBP)				
Dibutyl phthalate (DBP) CAS#:84-74-2	N.D.	50 mg/kg		
Butyl benzyl phthalate (BBP) CAS#:85-68-7	N.D.	50 mg/kg		
Di-(2-ethylhexyl) phthalate (DEHP) CAS#:117-81-7	N.D.	50 mg/kg		
Diisobutyl phthalate (DIBP) CAS#:84-69-5	N.D.	50 mg/kg		

Sample/Part Description

CTI Sample ID Description No.

001 1 Black body (Tested as a whole)

Remark: The sample(s) had been dissolved totally tested for Lead, Cadmium, Mercury.

> The sample(s) was tested as a whole, because it's impossible to disassemble or separate it by current equipment and technology. The result(s) shown on this report may be different from the content of any homogeneous material.

-MDL = Method Detection Limit

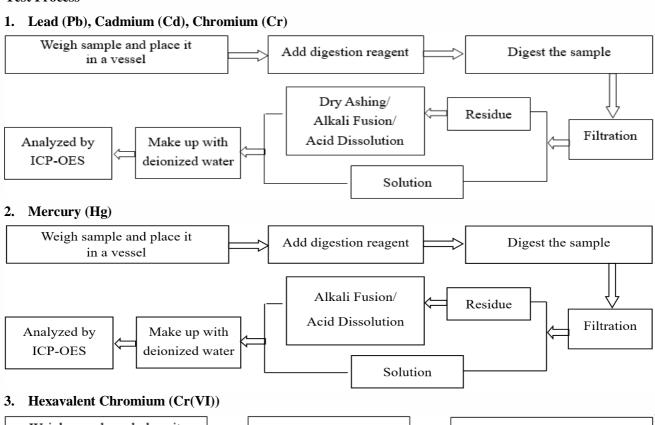
-N.D. = Not Detected (< MDL)

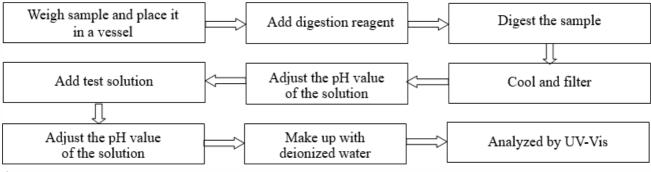
-mg/kg = ppm = parts per million



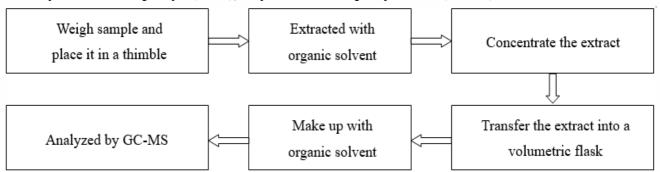
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Test Process





4. Polybrominated Biphenyls (PBBs), Polybrominated Diphenyl Ethers (PBDEs)





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5. Phthalates (DBP, BBP, DEHP, DIBP)

Weigh sample and place it in a thimble

Extracted with organic solvent

Concentrate the extract into a volumetric flask

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Photo(s) of the sample(s)



Statement:

- 1. This report is considered invalid without approved signature, special seal and the seal on the perforation;
- 2. The Company Name shown on Report and Address, the sample(s) and sample information was/were provided by the applicant who should be responsible for the authenticity which CTI hasn't verified;
- 3. The result(s) shown in this report refer(s) only to the sample(s) tested;
- 4. Without written approval of CTI, this report can't be reproduced except in full;
- 5. In case of any discrepancy between the English version and Chinese version of the testing reports (if generated), the Chinese version shall prevail.

*** End of report ***



Appendix

Client Reference Information

0201,0201-A,CSP0201,CSP1006-2,DFN-10,DFN1006-2,DFN1006-2L,DFN1006-3,DFN1006-3A, DFN1308-5,DFN1510-6,DFN1608-2,DFN1610-2,DFN1610-6,DFN1616-6,DFN1616-6L, DFN2020-3A,DFN2020-3L,DFN2020-6G,DFN2020-6J,DFN2020-6JA,DFN2020-6L, DFN2020-6LE,DFN2030-6,DFN2030-6L,DFN2626-10,DFN3030,DFN3030-4L, DFN3030-8,DFN3333-8,DFN3333-B,DFN3333-D,DFN4120-10,DFN5060,DFN5060-8D, DFN5060-8L,DFN8080A,SOD-123,SOD-323,SOD-323FL,SOD-523,SOD-723,SOD-923,SOP-8, SOT-143,SOT-223,SOT-23,SOT-23-3L,SOT23-5L,SOT23-6L,SOT-323,SOT-353,SOT-363,SOT-523, SOT-563,SOT-723,SOT-89,TSSOP-8,0402,0603,SOT-553,DFN1210-6,SOT-883,DFN3810-9, DFN2510-10,DFN3020-10,DFN0808-4,DFN1608-2L,DFN2020-6LA,DFN8080,SOT-343,SOT23-3L, FBP,WFBP,SO-8,CSP,QFN,DFN,1206,2510,TO-92,TO-92S,TO-92L,TO-92MOD,MSOP-10,SOD-323 F,0201-B,SOD-882E,0201-C,DFN1006-2A,DFN1006-2B,DFN1006-2C,DFN1616-6U,DFN2020-3,DF N5060-8,FBP-02L,DFN2020-6U,MFN-9-1,SOD-882

Statement:

- 1. The Appendix Information was/were provided by the applicant who should be responsible for the authenticity which CTI hasn't verified.
- 2. The Appendix Information is/are the supplement(s) for the Report A2230160846101001.

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