

Test Report

Report No. : AGC05443240614-001S1

SAMPLE NAME: MO2385 240ml Fondue set for 2 guests, MO2386 300ml Fondue set for 2

guests

MODEL NAME : MO2385, MO2386

APPLICANT: MID OCEAN BRANDS B.V

STANDARD(S) : Please refer to the following page(s).

DATE OF ISSUE : Jun. 28, 2024

Attestation of Global Compliance (Shenzhen) Std & Tech Co., Ltd.





Report No.: AGC05443240614-001S1
pplicant : MID OCEAN BRANDS B.V

Address : 7/F, Kings Tower, 111 King Lam Street, Cheung Sha Wan, Kowloon, Hong Kong. Test Site : 5,6/F., Building 2, Sanwei Chaxi Industrial Park, Sanwei Community, Hangcheng

Street, Bao'an District, Shenzhen, Guangdong, China

Report on the submitted sample(s) said to be:

Sample Name : MO2385 240ml Fondue set for 2 guests, MO2386 300ml Fondue set for 2 guests

Model : MO2385, MO2386

Vendor code : 119071
Country of Origin : CHINA
Country of Destination : EUROPE
Sample receiving state : Normal
Sample Received Date : Jun. 17, 2024

Testing Period : Jun. 17, 2024 to Jun. 26, 2024

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

Approved by:

Suhongliang, Leon

Technical Director



Conclusion Pass

Microwave heating resistance test

Mechanical dishwashing safe test Pass

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 63
- Lead(Pb) Content

Pass

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 23
-Cadmium(Cd) Content

Pass

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 51&52
- Phthalates Content

Pass

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 50
- Polycyclic-aromatic Hydrocarbons (PAHs) Content

Pass

Regulation (EU) 2019/1021 on persistent organic pollutants (POPs)
- Pentachlorophenol (PCP) Content

Pass

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 77
- Formaldehyde Release

Regulation 1935/2004/EC, Council Directive 84/500/EEC and Commission Directive 2005/31/EC
-Leachable Lead and Cadmium
-Pass

Regulation 1935/2004/EC and Technical Guide on Metals and alloys used in food contact materials of Council of Europe Resolution CM/Res(2013)9

Pass

- Specific migration of Heavy metal



Report Revise Record

Report Version	Issued Date	Valid Version	Notes
/	Jun. 27, 2024	Invalid	Initial release
S1	Jun. 28, 2024	Valid	Modify data



The photo of the sample



The photo of AGC05443240614-001S1 is for use only with the original report.

Test Point Description

Test point	Test point description
1-1	White ceramic pot
1-2+1-3	Red ceramic cover+Red ceramic pot
1-4	Metal fork
1-5	Metal frame
1-6	Wooden handle
1-7	Black coating
1-2	Red ceramic cover



Note: N.D.=Not Detected (less than method detection limit), MDL = Method Detection Limit, 1mg/kg=0.0001%

Microwave heating resistance test

Test Sample:1-1

Test Result of microwave test

Sample No.:MO2385

Test method: Refer EN 15284:2007 Microwave power out: 800 W

Short period: 90 s Long period: 585 s

Number of tested sample: 2 pc(s) Number of control sample: 1 pc(s)

Specimen(s)	Maximum surface temperature after long period of heating
1	78.9°C
2	74.6°C

For all tested ceramic articles:

No visible change of color was found on the tested samples after test.

No visible cracking, crazing, scaling was found on the tested samples after test.

Microwave heating resistance test

Test Sample:1-2/1-3

Test Result of microwave test

Sample No.: MO2386

Test method: Refer EN 15284:2007 Microwave power out: 800 W

Short period: 90 s Long period: 585 s

Number of tested sample: 2 pc(s) Number of control sample: 1 pc(s)

Specimen(s)	Maximum handle temperature after short period of heating	Maximum surface temperature after long period of heating
1	27.3℃	80.4°C
2	26.9℃	78.6°C

For all tested ceramic articles:

No visible change of color was found on the tested samples after test.

No visible cracking, crazing, scaling was found on the tested samples after test.



Test Sample:1-2/1-3

Test Result of mechanical dishwashing safe test:

Requirements: For dishwasher safe test, if there is no noticeable change in appearance (e.g. color, size and shape) and function, it should be "PASS"

Sample No.:MO2386

Test method: Refer BS EN 12875 -1-2005

Washing temperature: 60°C Number of cycle: 10 cycles

Number of tested sample: 2 pc(s). Number of control sample: 1 pc(s).

For all tested ceramic or glass enamel articles:

No visible change of color and gloss was found on the tested samples after wash. No visible deposit or iridescent layer was found on the tested samples after wash.

No cracking was found on the tested samples after wash.

No decoration was detached after wash.

Mechanical dishwashing safe test

Test Sample:1-1

Test Result of mechanical dishwashing safe test:

Requirements: For dishwasher safe test, if there is no noticeable change in appearance (e.g. color, size and shape) and function, it should be "PASS"

Sample No.:MO2385

Test method: Refer BS EN 12875 -1-2005

Washing temperature: 60°C Number of cycle: 10 cycles

Number of tested sample: 2 pc(s). Number of control sample: 1 pc(s).

For all tested ceramic or glass enamel articles:

No visible change of color and gloss was found on the tested samples after wash. No visible deposit or iridescent layer was found on the tested samples after wash.

No cracking was found on the tested samples after wash.

No decoration was detached after wash.



Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 63

- Lead(Pb) Content

Test Methods and Equipment: IEC 62321-5:2013; ICP-OES

Test Item(s)	Unit Limit	Limit	MDL	Test Result(s)	
Test Item(s)		Liiiit		1-4	1-5
Lead(Pb)	mg/kg	500	10	N.D.	N.D.
Con	Conformity	Conformity			

Report No.: AGC05443240614-001S1

Tost Itam(s)	Unit	Limit	MDL	Test Result(s)	
Test Item(s)	Ollit	Lillit		1-6	1-7
Lead(Pb)	mg/kg	500	10	N.D.	N.D.
Con	Conformity	Conformity			

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 23

-Cadmium(Cd) Content

Test Methods and Equipment: IEC 62321-5:2013; ICP-OES

Test Item(s)	Unit	Limit	MDL	Test Result(s)
Test Item(s)				1-7
Cadmium(Cd)	mg/kg	100	10	N.D.
Со	Conformity			

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 51&52

- Phthalates Content

Test Methods and Equipment: IEC 62321-8:2017; GC-MS

Test Item(s)	Unit	Limit	MDL	Test Result(s) 1-7
Diisobutyl phthalate (DIBP) CAS:84-69-5	%	0.1	0.005	N.D.
Dibutyl phthalate (DBP) CAS:84-74-2	%	0.1	0.005	N.D.
Butylbenzyl phthalate (BBP) CAS:85-68-7	%	0.1	0.005	N.D.
Di-(2-ethylhexyl) Phthalate (DEHP) CAS:117-81-7	%	0.1	0.005	N.D.
Di-n-octyl phthalate (DNOP) CAS:117-84-0	%	/	0.005	N.D.
Di-isononyl phthalate (DINP) CAS:28553-12-0, 68515-48-0	%	/	0.005	N.D.
Di-isodecyl phthalate(DIDP) CAS:26761-40-0, 68515-49-1	%	/	0.005	N.D.
Sum of DIBP +DBP+BBP+DEHP	%	0.1	/	N.D.
Sum of DNOP+DINP+DIDP	%	0.1	/	N.D.
Co	Conformity			



Limit requirements of Phthalates

Toys and childcare articles	Each of DEHP, DBP, BBP, DIBP is less than 0.1% or the sum of DEHP+DBP+BBP+DIBP is less than 0.1%
Toys and childcare articles which can be placed in the mouth by children	The sum of DINP+DIDP+DNOP is less than 0.1%

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 50

- Polycyclic-aromatic Hydrocarbons (PAHs) Content

Test Methods and Equipment: Afps GS 2019:01 PAK; GC-MS

Test Item(s)	Unit	Limit	MDL	Test Result(s)
rest item(s)	Onit			1-7
Benzo[a]pyrene(BaP)	mg/kg	1	0.1	N.D.
Benzo[e]pyrene(BeP)	mg/kg	1	0.1	N.D.
Benzo[a]anthracene(BaA)	mg/kg	1	0.1	N.D.
Benzo[b]fluoranthene(BbF)	mg/kg	1	0.1	N.D.
Benzo[j]fluoranthene(BjFA)	mg/kg	1	0.1	N.D.
Benzo[k]fluoranthene(BkF)	mg/kg	1	0.1	N.D.
Chrysene(CHR)	mg/kg	1	0.1	N.D.
Dibenzo[a,h]anthracene(DBA)	mg/kg	1	0.1	N.D.
C	Conformity			

Limit requirements of Polycyclic-aromatic Hydrocarbons (PAHs) (Unit: mg/kg)

Items	CAS No.	Extender oils or used for the production of tyres or parts of tyres	Any of their rubber or plastic components that come into direct as well as prolonged or short-term repetitive contact with the human skin or the oral cavity	Toys, including activity toys, and childcare articles, any of their rubber or plastic components that come into direct as well as prolonged or short-term repetitive contact with the human skin or the oral cavity
Benzo[a]pyrene(BaP)	50-32-8	≤1	≤ 1	≤ 0.5
Benzo[e]pyrene(BeP)	192-97-2	/	≤ 1	≤ 0.5
Benzo[a]anthracene(BaA)	56-55-3	/	≤ 1	≤ 0.5
Benzo[b]fluoranthene(BbF)	205-99-2	/	≤ 1	≤ 0.5
Benzo[j]fluoranthene(BjFA)	205-82-3	/	≤ 1	≤ 0.5
Benzo[k]fluoranthene(BkF)	207-08-9	/	≤ 1	≤ 0.5
Chrysene(CHR)	218-01-9	/	≤ 1	≤ 0.5
Dibenzo[a,h]anthracene(DBA)	53-70-3	/	≤ 1	≤ 0.5



Items	CAS No.	Extender oils or used for the production of tyres or parts of tyres	Any of their rubber or plastic components that come into direct as well as prolonged or short-term repetitive contact with the human skin or the oral cavity	Toys, including activity toys, and childcare articles, any of their rubber or plastic components that come into direct as well as prolonged or short-term repetitive contact with the human skin or the oral cavity
Sum of BaP+ BeP+ BaA+ BbF+ BiFA+ BkF+ CHR+ DBA	/	≤ 10	/	/

Regulation (EU) 2019/1021 on persistent organic pollutants (POPs)

- Pentachlorophenol (PCP) Content

Test Methods and Equipment: EPA 3550C:2007 & EPA 8270E:2018; GC-MS

Test Item(s)	Unit	Limit	MDL	Test Result(s)
Test Item(s)				1-6
Pentachlorophenol (PCP)	mg/kg	5	5	N.D.
Со	Conformity			

Annex XVII of the REACH Regulation (EC) No 1907/2006, entry 77

- Formaldehyde Release

Test Methods and Equipment: EN 717-1:2004; UV-Vis

Test Item(s)	Unit	Limit	MDL	Test Result(s)
rest ttem(s)				1-6
Formaldehyde Release	mg/m³	0.062	0.006	N.D. (240h)
Со	Conformity			

-Leachable Lead and Cadmium

	I		1	
	Те			
Test point	Extractable Lead(Pb)/(mg/L)	Extractable Cadmium(Cd)/(mg/L)	Conclusion	
	4% Acetic acid,22°C,24h	4% Acetic acid,22°C,24h		
1-1	N.D.	N.D.	Conformity	
1-2	N.D.	N.D.	Conformity	
Limit	4.0	0.3	/	
MDL	0.1	0.01	/	



- Specific migration of heavy metal:

Report No.: AGC05443240614-001S1

Test Method: With reference to EDQM Technical Guide on Metals and alloys used in food contact materials 2013.

Unit: mg/kg

Test Item(s)			Test Result(s)	Unit: m
	Test condition/ Equipment	MDL	1 st + 2 nd extractives	Limit
	Equipment		1-4	
Barium (Ba)		0.1	N.D.	8.4
Copper (Cu)		0.1	N.D.	28
Iron (Fe)		0.1	N.D.	280
Tin (Sn)		0.1	N.D.	700
Chromium (Cr)		0.01	N.D.	1.75
Manganese (Mn)		0.1	N.D.	12.6
Zinc (Zn)		0.1	N.D.	35
Aluminium (Al)		0.1	N.D.	35
Lithium (Li)		0.01	N.D.	0.336
Beryllium (Be)		0.005	N.D.	0.07
Vanadium (V)		0.005	N.D.	0.07
Nickel (Ni)	0.5% Citric acid, 70°C, 2h ICP-OES	0.01	N.D.	0.98
Cobalt (Co)		0.01	N.D.	0.14
Arsenic (As)		0.002	N.D.	0.014
Molybdenum (Mo)		0.01	N.D.	0.84
Silver (Ag)		0.01	N.D.	0.56
Cadmium (Cd)		0.002	N.D.	0.035
Antimony (Sb)		0.01	N.D.	0.28
Mercury (Hg)		0.002	N.D.	0.021
Thallium (Tl)		0.0001	N.D.	0.0007
Lead (Pb)		0.01	N.D.	0.07
Magnesium (Mg)		0.01	0.042	/
Titanium (Ti)		0.01	N.D.	/
Conclusion		/	Conformity	/

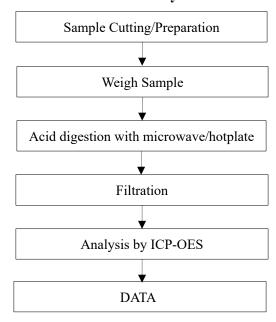


Test Item(s)		MDL	Test Result(s)	Limit
	Test condition/ Equipment		3 rd extractives	
	Equipment		1-4	
Barium (Ba)		0.1	N.D.	1.2
Copper (Cu)		0.1	N.D.	4
Iron (Fe)		0.1	N.D.	40
Tin (Sn)		0.1	N.D.	100
Chromium (Cr)		0.01	N.D.	0.25
Manganese (Mn)		0.1	N.D.	1.8
Zinc (Zn)		0.1	N.D.	5
Aluminium (Al)		0.1	N.D.	5
Lithium (Li)		0.01	N.D.	0.048
Beryllium (Be)		0.005	N.D.	0.01
Vanadium (V)		0.005	N.D.	0.01
Nickel (Ni)	0.5% Citric acid,	0.01	N.D.	0.14
Cobalt (Co)	70°C, 2h ICP-OES	0.01	N.D.	0.02
Arsenic (As)		0.002	N.D.	0.002
Molybdenum (Mo)		0.01	N.D.	0.12
Silver (Ag)		0.01	N.D.	0.08
Cadmium (Cd)		0.002	N.D.	0.005
Antimony (Sb)		0.01	N.D.	0.04
Mercury (Hg)		0.002	N.D.	0.003
Thallium (Tl)		0.0001	N.D.	0.0001
Lead (Pb)		0.01	N.D.	0.01
Magnesium (Mg)		0.01	N.D.	/
Titanium (Ti)		0.01	N.D.	/
Conclusion		/	Conformity	/

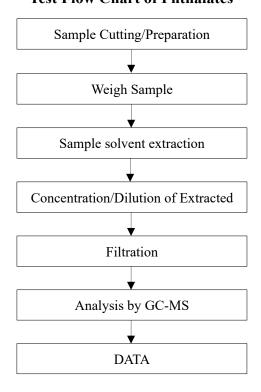


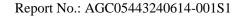


Test Flow Chart of Heavy Metal Content



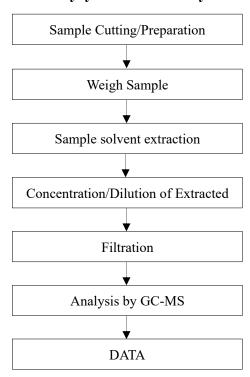
Test Flow Chart of Phthalates

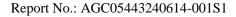






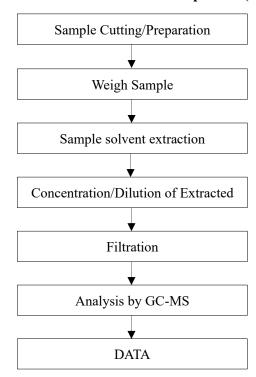
Test Flow Chart of Polycyclic-aromatic Hydrocarbons (PAHs)

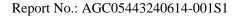






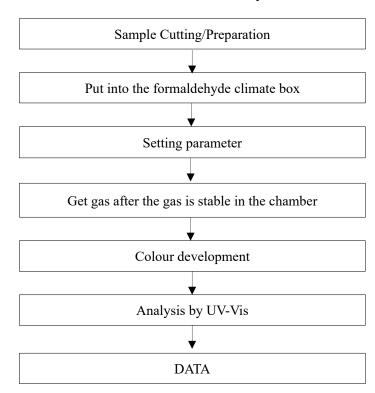
Test Flow Chart of Pentachlorophenol (PCP)







Test Flow Chart of Formaldehyde Release





Conditions of Issuance of Test Reports

- 1. All samples and goods are accepted by the Attestation of Global Compliance (Shenzhen) Std & Tech Co., Ltd. (the "Company") solely for testing and reporting in accordance with the following terms and conditions. The company provides its services on the basis that such terms and conditions constitute express agreement between the company and any person, firm or company requesting its services (the "Clients").
- 2. Any report issued by Company as a result of this application for testing services (the "Report") shall be issued in confidence to the Clients and the Report will be strictly treated as such by the Company. It may not be reproduced either in its entirety or in part and it may not be used for advertising or other unauthorized purposes without the written consent of the Company. The Clients to whom the Report is issued may, however, show or send it, or a certified copy thereof prepared by the Company to its customer, supplier or other persons directly concerned. The Company will not, without the consent of the Clients, enter into any discussion or correspondence with any third party concerning the contents of the Report, unless required by the relevant governmental authorities, laws or court orders.
- 3. The Company shall not be called or be liable to be called to give evidence or testimony on the Report in a court of law without its prior written consent, unless required by the relevant governmental authorities, laws or court orders.
- 4. In the event of the improper use of the report as determined by the Company, the Company reserves the right to withdraw it, and to adopt any other additional remedies which may be appropriate.
- 5. Samples submitted for testing are accepted on the understanding that the Report issued cannot form the basis of, or be the instrument for, any legal action against the Company.
- 6. The Company will not be liable for or accept responsibility for any loss or damage however arising from the use of information contained in any of its Reports or in any communication whatsoever about its said tests or investigations. 7. Clients wishing to use the Report in court proceedings or arbitration shall inform the Company to that effect prior to submitting the sample for testing.
- 8. The Company is not responsible for recalling the electronic version of the original report when any revision is made to them. The Client assumes the responsibility to providing the revised version to any interested party who uses them.
- 9. Subject to the variable length of retention time for test data and report stored hereinto as otherwise specifically required by individual accreditation authorities, the Company will only keep the supporting test data and information of the test report for a period of six years. The data and information will be disposed of after the aforementioned retention period has elapsed. Under no circumstances shall we provide any data and information which has been disposed of after retention period. Under no circumstances shall we be liable for damage of any kind, including (but not limited to) compensatory damages, lost profits, lost data, or any form of special, incidental, indirect, consequential or punitive damages of any kind, whether based on breach of contract of warranty, tort (including negligence), product liability or otherwise, even if we are informed in advance of the possibility of such damages.

*** End of Report ***