

NAFLON™ PFA CHEMICAL WARES



NAFLON™ PFA CHEMICAL WARES are the containers made from PFA fluorocarbon resin and made by the blow molding method. They have the exceptional chemical resistance, and little elution of impurities for almost all kinds of fluids. What is more, they have higher mechanical strength compared with the glass wares and are unbreakable even if dropped.

Features

- Superior chemical resistance for the strong acids, alkalis and solvents or most corrosive fluids on the market.
- Little elution of impurities.
- High mechanical strength compared with the glass wares.
- High transparency for easily checking the level of the inner fluids.
- Equipped with inside plugs that improve the sealing performance.
- Easily-identifiable date marks punched at the bottom of each ware.
- Wide variety of product lineups, ranging from 50mL to 5L.

Specifications

Lineup

Lineup	Capacity	Parts
Narrow Mouth Bottles	50mL, 100mL, 250mL, 500mL, 1L, 2L, 3L, 5L	Main Body, Inside Plug, Cap
Wide Mouth Bottles	100mL, 250mL, 500mL, 1L	Main Body, Inside Plug, Cap

Service Range

We recommend that they be used at the ordinary temperatures and pressures. In case of the usage to be heated or pressurized, you are recommended to carry out the verification test on your own according to the application.

Sizes

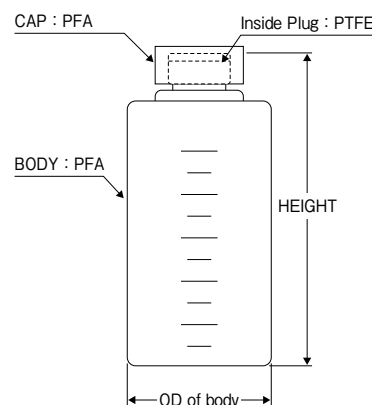
Narrow Mouth Bottles

Capacity	Size	Height (mm)	Outer Diameter of body (mm)
50mL		67	49
100mL		97	48
250mL		129	61
500mL		161	73
1L		198	92
2L		235	126
3L		260	148
5L		313	172

Wide Mouth Bottles

Capacity	Size	Height (mm)	Outer Diameter of body (mm)
100mL		101	49
250mL		131	60
500mL		170	73
1L		205	93

■ Narrow Mouth Bottles • Wide Mouth Bottles



*For enquiries about capacities please contact us for other capacities and shapes.

Features

Eluted Metals Measurement Results

1 Specimen (n=2) Size ● Narrow Mouth Bottles 500mL and 1L

2 Test Methods A specimen is filled with 3.6% hydrochloric acid with it's mouth wrapped by polyethylene. It is stored at an ordinary temperature for one day, the 14 kinds of eluted metals are measured (first time) by ICP-MS method (Test Machine : Agilent Technologies). After washing with ultrapure water, it is stored for an extra day in the same way, then the eluted metals are measured (Second time).

(unit : ppb)

3 Test Results

Element	Specimen	First time		Second time	
		500mL	1L	500mL	1L
Na (Sodium)		0.16	0.21	<0.01	<0.01
Mg (Magnesium)		<0.01	<0.01	<0.01	<0.01
Al (Aluminum)		<0.01	<0.01	<0.01	<0.01
K (Potassium)		0.11	0.07	<0.01	<0.01
Ca (Calcium)		0.41	0.43	0.02	<0.01
Ti (Titanium)		<0.04	<0.04	<0.04	<0.04
Cr (Chromium)		<0.01	<0.01	<0.01	<0.01
Mn (Manganese)		<0.01	<0.01	<0.01	<0.01
Fe (Iron)		0.04	0.02	<0.01	<0.01
Ni (Nickel)		<0.01	0.02	<0.01	<0.01
Cu (Copper)		<0.02	0.02	<0.01	<0.01
Zn (Zinc)		<0.02	0.03	<0.01	<0.01
Mo (Molybdenum)		<0.01	0.06	<0.01	<0.01
Pb (Lead)		<0.01	<0.01	<0.01	<0.01
Detected amount of eluted metals		0.75	0.86	0.02	—

Pressure cycle tests

1 Specimen (n=1) Size ● Narrow Mouth Bottles 50mL, 100mL, 250mL, 500mL, 1L, 2L, 3L and 5L

2 Test methods A PFA tube of 6 mm diameter with a fitting welded is connected into a specimen. After the cap is tightened by hand, the cycle of 100kPa x 10 sec ⇔ opening x 2 sec is made 1000 times. After the test, leakage and deformation are measured.

3 Test results Each specimen has no leakage and deformation, excluding 5L.

*TOMBO is a registered trademark or trademark of NICHIAS Corporation.
 *All brand names and product names are trademarks or registered trademarks of NICHIAS Corporation.

⚠ Cautions

- The products included in this catalog are intended for common use, including those presented in the catalog. If you intend to use any of the products in a way that requires extremely high quality and reliability such that any possible defect may directly affect the safety of human lives, please make sure to consult with our company in advance and take necessary measures at your responsibility.
- Because the stated material values may vary according to actual usage environments or circumstances, please consider such figures as indications for reference.
- The content of the catalog explains the features of the products when they are used alone. When actually using the products, please start using them after testing them under the actual usage environment.
- The content of the explanation of the products may be modified without any advance notice, and the production of the product may also be discontinued without advance notice. Please obtain the latest version of the catalog, and confirm the content thereof. The date of issuance of this catalog is printed on this page.
- The standards, accreditation and provisions of laws included in the catalog may not conform with the latest version thereof.
- We strictly prohibit any acts of infringement upon our rights that are protected by the Copyright Act with regard to information included in the catalog, through the production of copies or imitations, misappropriation or unauthorized reprinting.
- Please be informed that, in the case where any problem involving a third party's industrial property right arises due to the use of any product included in the catalog, our company shall not be responsible for any problems other than the problems arising strictly due to reasons related to only such products.
- Please be aware that our company will not bear any responsibility for the following damage related to our products:
 - Damage arising due to natural disasters or accidents occurring for reasons that are not attributable to our company;
 - Damage arising due to remodeling, repairing or other acts by a third party;
 - Damage arising due to the willful intent or negligence of the customer or the user, or due to the improper use or use under abnormal conditions of the products;
 - Damage arising due to the failure to carry out regular checkups and appropriate repairs, maintenance and part replacements, considering various conditions, such as the usage conditions, usage environment and usage period, etc., of the product;
 - Indirect damage (including any operational damage, lost profits, opportunity losses, etc.) arising due to the use of or inability to use our company's product;
 - Damage arising due to a situation which was unforeseeable under the technical standards at the time of the shipment of our company's product; or
 - Damage arising due to reasons that are not attributable to our company.



<https://www.nichias.co.jp/>

International Marketing and Sales Group
 6-1, Hatchobori 1-chome, Chuo-ku, Tokyo 104-8555, Japan
 Phone: 81-3-4413-1132