

MANUFACTURER CERTIFICATION ACCORDING TO PUR-FOOD

Manufacturer certification of NORRES PUR-FOOD hoses regarding suitability for applications in the food sector

Polyurethane hoses of the NORRES PUR FOOD series, which are made from special, particularly high-quality raw materials, are perfectly suited for many applications in the food sector. This product series includes the following hose types among others, in the standard make ... 0000 and ..1001 with transparent, not colored wall:

- PROTAPE® PUR 331 FOOD
- PROTAPE® PUR 330 FOOD
- AIRDUC® PUR 350 FOOD (...1300)
- AIRDUC® PUR 351 FOOD
- AIRDUC® PUR 355 FOOD
- AIRDUC® PUR 356 FOOD
- AIRDUC® PUR 356 FOOD reinforced
- BARDUC® PUR-INOX 382 FOOD
- CP PUR INOX 455 FOOD
- NORFLEX® PUR 401 FOOD
- NORFLEX® PUR 441 FOOD

These hose types have officially legal and regulatory approvals for food applications by independent institutes, complying with many of the food industry guidelines, and they can also be used with some restrictions in the medical sector.

The properties of the material used for the hose wall include the following:

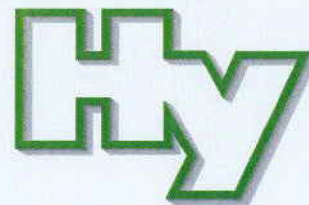
- **Compliance with FDA** (US Food and Drug Administration) regulations:
The raw materials and additives used (except for stabilizers) are listed in the FDA CFR Title 21 § 177.2600 "Rubber articles intended for repeated use" dated April 1, 2010. The antioxidants and stabilizers used are listed in § 178.2010 „Antioxidants and/or stabilizers for polymers“.
- **BfR** (German Federal Institute for Risk Assessment, formerly BgVV):
The monomers used in manufacture are listed in the **German Commodities Ordinance (BGVO)** published December 23, 1997 (BGBl. 1998 I, p. 5), last changed on June 24, 2013.
The used initial substances are listed in Section 2.1, Category 1 of **Recommendation XXXIX, "Commodities based on Polyurethanes"** BfR from June 1, 1998, last changed on January 1, 2012.
- **EC Regulation 2002/72/EC and 10/2011:**
The monomers and additives used are listed in the appendices of the **Regulation 2002/72/EC** corresponding to the version after the latest regulation amendment **2007/19/EC and 2008/39/EC, EC-Regulation 975/2009 and regulation 10/2011**, as well as **amendment regulation 1183/2012**.

When we label hoses with the official food logo of the EU, the "glass/fork" symbol, we have an official approval for the **entire hose** in each case by an independent testing laboratory in accordance with the EU Regulation 10/2011.

The examinations carried out by an independent testing laboratory show that these product lines meet the requirements of the EU Regulation 10/2011, relating to plastic materials and articles intended to come into contact with foodstuffs and the German BGVO for food contact articles. Please note the official test certificate.

(Note: Some of the guidelines for food contact cited above, which are based on EU Directives, lists limitations of the residual content of individual components of synthetic materials. However, it should be noted that the regulation 10/2011, which applies to all EU member states, sets a limit value for the migration in synthetic products for food sector. Even if, as in this case, an official statement from the manufacturer is available, according to Directive 10/2011, these tests should be performed on the end product by the processor using the corresponding foods or food simulation materials. Times and temperatures should be chosen to reflect actual conditions during the normal use of the articles, in accordance with the rule from EU regulation 10/2011. It is the responsibility of the processor to ensure that the article is suitable for the intended purpose.)

Our quality management system is certified according to DIN/ISO 9001.



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Test report No.: H-267637-16-Bg
Ansprechpartner: Dr. Jutta Begerow

Gelsenkirchen, 22.02.2016

Test report (short form)

-Translation of test report H-257813-15-Bg of June 10, 2015-

Client: NORRES Schlauchtechnik GmbH, Am Stadthafen 12 – 18
D-45881 Gelsenkirchen

Date of order: 09.04.2015 (Herr Mankiewicz)

Receipt of test items: 27.04.2015

Formulation: as of April 02, 2015

Test items: natural-coloured polyurethane tube with integrated metal wire (inner diameter = 32 mm, wall thickness: 4 mm) called PUR MHF (material identification number LP731897003)

Order: Testing for conformity with Regulation (EU) No. 10/2011 and its amendments Regulation 1282/2011, 1183/2012, 202/2014, and 2015/174

Period of testing: 29.04.2015 – 02.06.2015

According to our experimental testing the submitted natural-coloured polyurethane tube with integrated metal wire (inner diameter = 32 mm, wall thickness: 4 mm) called PUR MHF (material identification number LP731897003) meets the requirements of Regulation (EU) No. 10/2011, 1282/2011, 1183/2012, 202/2014, and 2015/174 and the German Consumer Goods Ordinance (Bedarfsgegenständeverordnung) with the following restrictions:

1. The aforementioned tube may be used for repeated use with all kinds of foodstuffs which are according to Table 2, Annex III of Regulation (EU) No. 10/2011 assigned to food simulants A, B, C, or E, under any conditions that include heating up to 70 °C for up to 2 h, or up to 100 °C for up to 15 min, which are not followed by long term or refrigerated temperature storage.
2. The aforementioned tube may be used in contact with foodstuffs which are according to Table 2, Annex III of Regulation (EU) No. 10/2011 assigned to food simulants D2, provided that a contact time of 1 h and a contact temperature of 40 °C are not exceeded.
3. The aforementioned tube may not be used in contact with foodstuffs which are according to Table 2, Annex III of Regulation (EU) No. 10/2011 assigned to food simulants D1. It may accordingly not be used in contact with alcoholic foodstuffs having an alcohol content of more than 20 % by volume and for milk and milk products with the exception of milk powder.

The conditions of use given under 1. to 3. have to be specified definitely on the labelling or in the directions of use to preclude an unintentional improper use.

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With regard to the restrictions given in 1. to 3. the aforementioned products in our opinion also meets the requirements of Regulation (EU) No. 1935/2004 and the German food and Feed Code (Lebensmittel- und Futtermittelgesetzbuch, LFGB).

This test report (short form) is based on our detailed test report H-257811-15-Bg of June 06, 2015.

The validity of our test report assumes a coexisting quality of the test material and product composition and processing. Our expert assessment is made on the premise that all base materials used in production have been declared in their entirety and that no further materials have been added to the product.

Under current statutory regulations, our assessment for the test sample is valid until June 06, 2020. However, validity becomes void should the formula or production process of the test sample be changed. The certificate shall not be reproduced, except in full, without written approval of the Institute.

For the Director



(Dr. Jutta Begerow)

Head of the Department for Food and Food Contact Materials Testing,

This document is not a declaration of conformity within the meaning of Article 15 of Regulation (EU) No. 10/2011.