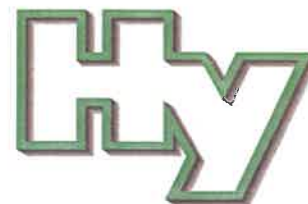


# Hygiene-Institut des Ruhrgebiets

Institut für Umwelthygiene und Toxikologie

Direktor: Prof. Dr. rer. nat. L. Dunemann

Träger: Verein zur Bekämpfung der Volkskrankheiten im Ruhrkohlengebiet e.V.



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Reference-No.: K-281027-17-Ko  
Contact person: Dr. Andreas Koch

Gelsenkirchen, 09.02.2017

## TEST REPORT according to the KTW-Guideline

**Order of:** 06.12.2016

**Field of application:** sealings for pipes DN < 80 mm (domestic distribution)  
cold and hot water (23°C / 85°C)

**Product:** ULTRASEAL REXEAL 100

**Specimen:** Brass Tap Body impregnated with the Casting Impregnation Sealant  
ULTRASEAL REXEAL 100, surface: 444 cm<sup>2</sup> (manufacturer's information)

**Production Place:** Surface Technology, Arthur House, Peters Field Avenue, SL2 5DU, Slough, UK


**Date of receipt:** 08.12.2016

**Sampler:** transmitted by mail

**Start of migration test:** 24.01.2017

**End of test:** 07.02.2017

The Director of the Hygiene-Institute  
on behalf of

  
Dr. rer. nat. Andreas Koch  
Head of the Dept. for water  
hygienic material testing

This test report consists of 3 pages.

The assessment was based on the assumption that the used starting substances and monomers used to manufacture the product may completely known and no other substances are present in the product. The validity of this document expires in case of modifications in the composition of the product or the processing conditions. The results and evaluations refer to the groups of test items. This document may not be published without our written permission only complete and unchanged or duplicated.



test results cold water (23°C)

**Product:** ULTRASEAL REXEAL 100  
**Specimen:** Brass Tap Body impregnated with the Casting Impregnation Sealant ULTRASEAL REXEAL 100, surface: 444 cm<sup>2</sup> (manufacturer's information)  
**Formulation:** no information

**Conversion factor:** 0,4 (sealings for pipes DN < 80 mm)  
**SN-ratio migration test:** 4,44 dm<sup>2</sup> / 1,12 dm<sup>3</sup> ± 3,96 dm<sup>-1</sup>  
**SN-ratio odour/flavour test:** 4,44 dm<sup>2</sup> / 1,12 dm<sup>3</sup> ± 3,96 dm<sup>-1</sup>

Parameter	Method	Test cycle / Result			Requirements
		1 4. day	2 7. day	3 10. day	
Colour	Hy-KTW-14.05	colorless	colorless	colorless	n.s.e.
Turbidity	Hy-KTW-14.05	clear	clear	clear	n.s.e.
Tendency to foam formation	Hy-KTW-14.05	none	none	none	n.s.e.
Threshold odour number (23°C)	DIN EN 1622	1-2*	1-2*	1	< 2
Threshold flavour number (23°C)	DIN EN 1622	n.e.	n.e.	1	< 2
Total organic carbon (TOC) C <sub>Tap</sub> mg/l	DIN EN 1484	< 0,02	< 0,02	< 0,02	≤ 0,5
Formulation specific parameters with restrictions		Not examined			Guidance Level passed

\*) tentative determination of Threshold odour number

n.s.e.: not significant effected

test results hot water (85°C)

**Product:** ULTRASEAL REXEAL 100  
**Specimen:** Brass Tap Body impregnated with the Casting Impregnation Sealant ULTRASEAL REXEAL 100, surface: 444 cm<sup>2</sup> (manufacturer's information)  
**Formulation:** no information

**Conversion factor:** 0,4 (sealings for pipes DN < 80 mm)  
**S/N-ratio migration test:** 4,44 dm<sup>2</sup> / 1,12 dm<sup>3</sup> ± 3,96 dm<sup>-1</sup>  
**S/V-ratio odour/flavour test:** 4,44 dm<sup>2</sup> / 1,12 dm<sup>3</sup> ± 3,96 dm<sup>-1</sup>

Parameter	Method	Test cycle / Result							Requirements
		1 2. day	2 3. day	3 4. day	6 9. day	7 10. day			
Colour	Hy-KTW-14.05	colorless	colorless	colorless	colorless	colorless	colorless	colorless	n.s.e.
Turbidity	Hy-KTW-14.05	clear	clear	clear	clear	clear	clear	clear	n.s.e.
Tendency to foam formation	Hy-KTW-14.05	none	none	none	none	none	none	none	n.s.e.
Threshold odour number (23°C)	DIN EN 1622	1-2 *)	1-2 *)	1-2 *)	1-2 *)	1-2 *)	1-2 *)	1	≤ 4
Threshold flavour number (23°C)	DIN EN 1622	n.e.	n.e.	n.e.	n.e.	n.e.	n.e.	1	≤ 4
Total organic carbon (TOC) C <sub>Tap</sub> mg/l	DIN EN 1484	0,02	< 0,02	< 0,02	< 0,02	< 0,02	< 0,02	< 0,02	≤ 0,5
Formulation specific parameters with restrictions		Not examined							Guidance Level passed

\*) tentative determination of Threshold odour number

n.s.e.: not significant effected