

# VINNAPAS® UW 4 FS

VINNAPAS®

## **Polyvinyl Acetate & Copolymers**

VINNAPAS® UW 4 FS is a solid, thermoplastic homopolymer. The clear and colorless resin is prepared by polymerization of vinyl acetate. VINNAPAS® UW 4 FS is tasteless.

# **Technical data**

#### **Specification**

Property	Condition	Value	Method
Viscosity in 10 % ethyl acetate	20.0 °C	23.0 - 30.0 mPa·s	ASTM D 445 - 06
Volatiles	-	< 1.0 wt. %	specific method

#### **General Characteristics**

Property	Condition	Value	Method
Acid number	-	< 0.5 mg KOH/g	specific method
Bulk density	-	700 - 850 kg/m³	DIN 53466
Supply form	-	solid, colorless beads	-
Density of the polymer	-	approx. 1.18 g/cm <sup>3</sup>	DIN EN ISO 1183 /1-3
K-value	-	60 - 66	DIN 53726
Softening point	-	approx. 197 °C	ASTM D 3104
Molecular weight (Mw)	-	approx. 280000 g/mol	SEC, PS-Standard
Glass transition temperature	-	approx. 44 °C	DSC (DIN 53765 / ISO 11357-5)

These figures are only intended as a guide and should not be used in preparing specifications.

All the information provided is in accordance with the present state of our knowledge. Nonetheless, we disclaim any warranty or liability whatsoever and reserve the right, at any time, to effect technical alterations. The information provided, as well as the product's fitness for an intended application, should be checked by the buyer in preliminary trials. Contractual terms and conditions always take precedence. This disclaimer of warranty and liability also applies particularly in foreign countries with respect to third parties' rights.

Comprehensive instructions are given in the corresponding Material Safety Data Sheets. They are available on request from WACKER subsidiaries or may be downloaded via WACKER web site http://www.wacker.com.

## Applications

- Antishrinkage Additives
- Building & Construction Adhesives
- Composites
- Do It Yourself
- Industrial Coatings
- Resin Modification for Composites

## **Application details**

Typical applications for VINNAPAS<sup>®</sup> UW 4 FS: fiber reinforced plastics Adhesives powder injection molding sound damping

#### Processing

Solid content Viscosity Brookfield RVT, in styrene 20 RPM, 23°C (PML 002) 20 % 740 mPa·s 30 % 7100 mPa·s 40 % 66000 mPa·s

#### Additional information

If the product is used in applications other than those mentioned, the choice, processing and use of the product is the sole responsibility of the purchaser. All legal and other regulations must be complied with. For questions concerning food contact status according the chapter 21 CFR (US FDA) and German BfR, please feel free to contact us. Wacker Chemie AG Gisela-Stein-Strasse 1 81671 Munich Germany

## Packaging and storage

### Packaging

VINNAPAS® UW 4 FS is supplied in 25 kg Paper Bags. Big Bag is available on request.

#### Storage

VINNAPAS® UW 4 FS should not be stored at temperatures above 20 °C in order to prevent caking. Storage conditions must be dry protected from direct sun exposure.

Under these conditions the product has a shelf life of at least 12 months starting from the date of receipt.

## Safety notes

Comprehensive instructions are given in the corresponding Material Safety Data Sheets. They are available on request from WACKER subsidiaries or may be printed via WACKER web site http://www.wacker.com.

## QR Code VINNAPAS® UW 4 FS



#### For technical, quality or product safety questions, please contact:

Wacker Chemie AG, Gisela-Stein-Strasse 1, 81671 Munich, Germany productinformation@wacker.com, www.wacker.com

The data presented in this medium are in accordance with the present state of our knowledge but do not absolve the user from carefully checking all supplies immediately on receipt. We reserve the right to alter product constants within the scope of technical progress or new developments. The recommendations made in this medium should be checked by preliminary trials because of conditions during processing over which we have no control, especially where other companies' raw materials are also being used. The information provided by us does not absolve the user from the obligation of investigating the possibility of infringement of third parties' rights and, if necessary, clarifying the position. Recommendations for use do not constitute a warranty, either express or implied, of the fitness or suitability of the product for a particular purpose.