EPOXONIC®
innovative epoxies

EPOXONIC® 276

Thermal conductive adhesive for Automotive Engineering, Microelectronics and Electrical Engineering

EPOXONIC® 276 is a solvent-free, mineral filled 1-Part adhesive based on epoxy resin.

Main characteristics:

- Chemical resistance
- High shear strength
- Thermal conductivity
- Toughness

Application:

EPOXONIC® 276 is especially suited for high-strength bonding of devices with need of thermal management (e.g. power semiconductors).

Properties:

Specific values measured by standard test specimen at 23 °C, cured 3 h / 120 °C.

Operating temperature [1]	-40 °C to +150 °C	
Colour	light-beige	
Density	2.3 g/cm³	DIN EN ISO 1183-1
Glass transition temperature	95 – 105 °C	ISO 11359-2
Coefficient of linear thermal expansion CTE	30 – 40 x 10^{-6}/K (50 – 80 °C)	ISO 11359-2
Thermal conductivity	1.0 W/mK	DIN EN ISO 8894-1
Shear Strength Aluminium	60 MPa 40 MPa (80 °C)	EPOXONIC PV 29
FR4	45 MPa	
Quarz glass	80 MPa	
PC	18 MPa	
PET	35 MPa	
PBT GF 20	25 MPa	
PA 66 GF 30	25 MPa	

1) Depending on the application, other temperature limits may be reasonable

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Processing:

Viscosity cone/plate viscometer	25 °C	70– 110 Pas
Pot life	25 °C	min. 1 week
Method of application		e.g. dispenser
Cure schedule		e.g. 3 h / 120 °C Optimum cure schedules have to be determined by the specific application.

Storage:

The shelf life of EPOXONIC® 276 is 12 months at temperatures < -25 °C or 6 months at temperatures at 2 – 8 °C when stored in tightly closed, original containers. EPOXONIC® 276 has to be stirred very well before use when stored at 2 – 8 °C. Partly emptied containers should be tightly closed immediately after use.

If packaging in cartridges: Do not touch the cartridges with bare hands and thaw them in vertical position (tip down). It is recommended not to refreeze used material.

Health and Safety:

Recommended industrial hygiene procedures should always be followed when handling this product. Please refer to the corresponding Material Safety Data Sheet for details.

Packaging:

EPOXONIC® 276 is delivered in 1 l metal pails containing 2 kg material or in cartridges.

Other packaging options are available upon request.

Quality Assurance:

If required EPOXONIC® 276 will be supplied with a Certificate of Analysis.

Disclaimer:

All information herein is based on the present state of knowledge and believed to be reliable. Any suggestions or recommendations are made without liability on our part since we shall have no control over the use of our product. Buyers and users should make their own assessment of this product under their own conditions and for their own requirements.