

# Resin EP 4627

## FEATURES

- Low cost
- Good dimensional stability
- Low viscosity

## COMPOSITION

- Part A: epoxy resin EP 4627
- Part B: hardener H 4627



EP 4627 is an epoxy casting resin containing abrasive fillers, combined with a polyamino-amide curing. The system is characterized by good mechanical properties and is used as casting resin, with possible further addition of inert fillers.

## APPLICATIONS

- Designed to create molds and back-filling.

## TYPICAL PROPERTIES

Specifications writers: These values are not intended for use in preparing specifications. Please contact your local sales representative prior to writing specifications on this product.

Property	Unit	Value
Colour (Resin A/Hardener B)	visual	Grey / Brown
Density at 23°C (Resin A/Hardener B)	g/cm <sup>3</sup>	1.72 – 1.76 / 0.95 – 0.99
Viscosity at 23°C (Resin A/Hardener B)	mPa.s	35000-45000 / 130-220
Colour (Mixture)	visual	Grey
Density at 23°C (Mixture)	g/cm <sup>3</sup>	1.58 – 1.62
Mixing ratio	pbw	100 : 15
Pot life at 23°C (150g)	minutes	110 – 120
Demoulding	Hours	24
Hardness	Shore D	80
Tensile strength	MPa	23.0 – 25.0
Deformation at break	%	2.4 – 2.6
Flexural modulus	MPa	2260
Glass transition (DSC)	°C	42
Linear shrinkage	%	<0.25

## SETTINGS

EP4627 contains fillers, which tend to settle over time. We recommend to use extreme care in re-homogenize the product in the container before use. Weight the two components and stir thoroughly until mixing is complete. Epoxy resins can crystallize at low temperature. To bring them back to their original condition heating at 40°C-50°C avoiding local overheating, then cool to room temperature.

## MIXING

The two components should be thoroughly mixed using a ratio of 100:15

by weight, until a homogeneous mixture.

## POTLIFE AND GELTIME

When the two components are thoroughly mixed in the right mixing ratio the reaction starts. The pot life, or usable time of the mixture, is normally the time required for an increase equal to twice the initial viscosity. Both Pot-life and Gel-time are depending on the mass and temperature: higher the mass faster the reaction. Higher the temperature faster the reaction.

## **CURING**

The system polymerizes at room temperature.

## **HANDLING PRECAUTIONS**

The information for a correct and safe handling of the products are contained in the safety data sheet. Consult the safety data sheets before use for complete information on the risks for health and environment and for suitable protective devices to be adopted. Share the safety data sheets with all the staff involved in the use of the products.

## **PACKAGING**

Resin is supplied in 25kg containers, hardener in 3,75kg containers.

## **USABLE LIFE - STORAGE**

Resin and hardener must be stored in the original unopened containers at a temperature between +10°C and +35°C. Be sure to close the containers after use. Resin and hardener, if stored under certain conditions, have a shelf life of 12 months from the date of manufacture.

## **LIMITATIONS**

This product is neither tested nor represented as suitable for food contact, skin contact or medical uses.

## **LIMITED WARRANTY**

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Chemix Srl Via Berlinguer 8, 21010 Golasecca (Italy). Phone +39(0)331959373 [info@chemix.it](mailto:info@chemix.it)