

**TECHNICAL INFORMATION**

# POLIMAL<sup>®</sup>

# 109-32 K

**Application**

**Polimal<sup>®</sup> 109-32 K** is designed for production of resinous – mineral castings and polymer concrete.

**Features**

**Polimal<sup>®</sup> 109-32 K** is orthophthalic, not accelerated, unsaturated polyester resin.  
Advantages of the resin usage:

- good miscibility and wetting of mineral fillers in the resin
- good processing features.
- easier mixing and pouring of the mixture into the mold.

**Typical parameters**

Parameter/Standard	Unit	Value
<b>Viscosity at 25°C</b> acc.to ISO 3219	mPa s	<b>230 - 290</b>
<b>Gel time at 25°C</b> acc. to DIN 16945	min	<b>13 – 20</b>
<b>Tensile strength</b> acc. to ISO 527	MPa	<b>50</b>
<b>Flexural strength</b> acc. to ISO 178	MPa	<b>100</b>
<b>Tensile modulus</b> acc. to ISO 527	MPa	<b>3900</b>
<b>Elongation at break</b> acc. to ISO 527	%	<b>2,5</b>
<b>Heat Deflection Temperature (HDT)</b> acc. to ISO 75	°C	<b>60</b>
<b>Barcoll hardness</b> ASTM-D 2583-95	°B	<b>40</b>
<b>Guarantee period</b>	month	<b>3</b>

Czas żelowania z: 0,4% Co1% + 2,0% Luperox<sup>®</sup> K-1S

Mechanical parameters refer to not reinforced resin curing for 24 hours at room temperature and post curing for 8 hours at 80°C.

**Storage conditions**

**Polimal<sup>®</sup> 109-32 K** should be stored in close package in a dry, shady and cool places at temperatures not exceeding 25°C.

**Processing conditions**

**The resin should be mixed before use.**  
 The resin of the temperature above 15°C is required for processing. Good curing requires ambient temperature at least 18°C and low air humidity. The best curing conditions are obtained using 2% MEKP as hardener. It is possible to adjust gel time by varying of amount of hardener, the best within in the range of 1 – 2 %. The final curing could be optimize by postcuring at elevated temperatures.

**Polimal<sup>®</sup>** is the trade name reserved for unsaturated polyester resins produced by **CIECH - Sarzyna S.A.**

**Luperox<sup>®</sup>** is the trade name registered for products of **ARKEMA** company.

Data and suggestions included in this document are on the basis of our own tests and are considered by us as reliable. However, we cannot take any responsibility for actions and losses directly or indirectly resulted from using our products. User should check the product quality, safety and properties before its using.

**Note:**

The information does not substitute Material Safety Data Sheet or Technical Specification, which are superior documents and are available on the customer's request.