**Intended use**

2K zinc phosphate epoxy primer for steel, zinced substrates, aluminium, GRP and mineral substrates. Suitable as priming coat even for both underwater and chemical protective coatings and as intermediate coating for EP zinc dust primers.

In combination with Mipa PU 240-XX it can be used harmlessly to coat surfaces that are in direct contact with both dry and abrasive food (e.g. grain). (ISEGA certificate: 43517 U 16).

This product complies in combination with PU 250-XX with the requirements for fire behaviour of materials and components according to EN 45545-2:2013 + A1:2015.

**Processing instructions**

### Mixing ratio

<table>
<thead>
<tr>
<th></th>
<th>by weight (lacquer : hardener)</th>
<th>by volume (lacquer : hardener)</th>
</tr>
</thead>
<tbody>
<tr>
<td>EP 950-XX</td>
<td>5 : 1</td>
<td>3 : 1</td>
</tr>
</tbody>
</table>

### Hardener

Mipa EP 950-10, EP 950-25

### Pot life

- With hardener -25 ca. 7 - 9 h at 20 °C

### Thinner

Mipa EP-Verdünnung

### Spray viscosity

**Gravity spray gun**

- 20 - 30 s 4 mm DIN

**Airmix/Airless**

- 30 - 40 s 4 mm DIN

### Application mode

<table>
<thead>
<tr>
<th>Application mode</th>
<th>hardener</th>
<th>pressure (bar)</th>
<th>nozzle (mm)</th>
<th>spray passes</th>
<th>dilution</th>
</tr>
</thead>
<tbody>
<tr>
<td>gravity spray gun/HVLP</td>
<td>--</td>
<td>2.0 - 2.5</td>
<td>1.5 - 1.8</td>
<td>2 - 3</td>
<td>20 - 25 %</td>
</tr>
<tr>
<td>Airmix / Airless</td>
<td>--</td>
<td>100 - 120</td>
<td>0.28 - 0.33</td>
<td>1 - 2</td>
<td>10 - 15 %</td>
</tr>
<tr>
<td>brush, roller</td>
<td>--</td>
<td>--</td>
<td>--</td>
<td>--</td>
<td>5 - 10 %</td>
</tr>
</tbody>
</table>

### Drying time

<table>
<thead>
<tr>
<th>Hardener</th>
<th>Object temperature</th>
<th>Dust dry</th>
<th>Set to touch</th>
<th>Ready for assembly</th>
<th>Sandable</th>
<th>Recoatable</th>
</tr>
</thead>
<tbody>
<tr>
<td>--</td>
<td>20 °C</td>
<td>45 - 55 min</td>
<td>4 - 5 h</td>
<td>10 - 12 h</td>
<td>--</td>
<td>1 h</td>
</tr>
<tr>
<td>--</td>
<td>60 °C</td>
<td>--</td>
<td>--</td>
<td>45 min</td>
<td>--</td>
<td>--</td>
</tr>
</tbody>
</table>

Recoatable at the earliest after 1 hour and at the latest after 24 hours. After drying > 24 h, requires intermediate sanding.
Note

Characteristics:
- binder base: epoxy resin
- solids content (% by weight): 65 - 68
- solids content (% by volume): 44 - 45
- delivery viscosity DIN 53211 4 mm (in s): thixotropic
- density DIN EN ISO 2811 (kg/l): 1,4 - 1,5
- gloss level ISO 2813 at 60° (GU): 10 - 20 matt

Properties:
- active protection against corrosion (zinc phosphate)
- electrostatic application possible
- excellent resistance to chemical and mechanical strains
- suitable to insulate thermoplastic substrates
- heat resistance:
  - short-term heat exposure: 180 °C
  - permanent heat exposure: 150 °C
- adhesion on steel, zinced substrates, aluminium and GRP

Theoretical spreading rate:
- 35,8 - 36,8 m²/kg, 5:1 by weight with EP 950-25, for 10 μm dry film thickness
- 47,5 - 48,0 m²/l, 5:1 by weight with EP 950-25, for 10 μm dry film thickness

Storage:
- at least 3 years in unopened original container.

VOC Regulation:
- EU limit value according to Directive 2004/42/EC for this product (category B/c): 540 g/l
- This product contains the following maximum VOC-values:

Processing conditions:
- from +10 °C and up to 80 % relative humidity. Ensure adequate air ventilation.

Substrate preparation:
- Remove oil, grease, rust, mill scale, rolling skins, as well as other substances impairing the function of the coating!
  - Attention: A direct adhesion cannot be taken as granted due to most different kinds of metals, alloys, metallic and conversion coatings and so on. The adhesion must therefore be tested on the original metal substrate.
  - steel:
    - blast to cleaning degree Sa 2½, remove blast residues and overcoat promptly
    - de-rust with hand and power tools to degree of cleanliness St 3
    - degrease with Mipa WB5 Reiniger or Mipa Silikonentferner
  - zinced substrates:
    - clean the surface with the ammonia solution Mipa Zinkreiniger
    - sweep blast
  - aluminium:
    - degrease with Mipa 2K-Verdünnung, sand thoroughly with sandpaper P 360/400 and clean subsequently with Mipa Silikonentferner
  - GRP:
    - clean (remove completely any mould release agents), sand slightly if necessary and degrease again with Mipa Silikonentferner
**Proposed coating structure:**

- **Steel, zinced substrates, GRP:**
  - Priming coat: EP 100-20 with 50 - 70 µm dry film thickness
  - Finishing coat: *PU 200-XX / PU 240-XX with 50 - 60 µm dry film thickness

- **Aluminium:**
  - Priming coat: EP 100-20 with 25 - 30 µm dry film thickness
  - Finishing coat: *PU 200-XX / PU 240-XX with 50 - 60 µm dry film thickness

*Further Mipa topcoats are available. Please contact your technical adviser or our application technicians.

**Special notes:**

For professional use only.

After drying > 24 h, intermediate sanding is required.

If required we also offer cleaning agents that are suitable for 2-component mixing and dosing units. Please contact your technical adviser or our application technicians.

**Cleaning of tools:**

Clean tools immediately after use with Mipa EP-Verdünnung.