



# RZ – 5251-1

## Solvent Free Polyamine Cured Epoxy

(HYGIENIC COATING FOR POTABLE WATER TANKS)

### Product Description

RZ-5251-1 is a two component, solvent free polyamine cured, hygienic epoxy coating confirmed with AWWA C210 and BS 6920 for interior of potable water tanks and pipes.

### Recommended Use

It is designed for ductile iron pipes ,valves ,fixtures ,fitting for the water industry .It is used for internal of storage tanks for drinking water or edible oils. It can be used as hygienic coating for machines ,walls and floor of food and drug processing factories laboratories, hospitals .

### Outstanding Characteristics

- Excellent mechanical strength
- High water and oil resistance
- High chemical resistance against weak acids and alkalis
- Applicable in high film thickness.
- Self Priming properties
- Certified by AMIRKABIR UNIVERSITY accordance to AWWA C210 and BS 6920 requirements.

### Surface Preparation

Remove oil and grease, etc. with suitable detergent. Remove salt and other contaminants by (high pressure) fresh water cleaning. Abrasive blasting to Sa 2½, SSPC-10 with a sharp-edged surface profile corresponding to Rug test No. 3, BN9a, keane-Tator comparator, 2.0 G/S or ISO comparator, medium (G).

### Technical Data

Finish	Gloss
Color	White, light colors
Volume Solids	97-100
Specific Gravity	1. 4± 0.05 gr/cm <sup>3</sup>
Recommended DFT	300-400 microns
Theoretical Coverage	3.2-2.4 m <sup>2</sup> / lit 2.28-1.7 m <sup>2</sup> / kg
Touch dry	6 hrs at 25 ºC
Fully cured	7 days at 20 ºC
Thermal Resistance	Up to 120 ºC
Shelf life	12 months at 25 ºC

### Application Details

Application method	Airless spray Roller , Brush
Nozzle orifice	0.023"-0.029"
Nozzle pressure	180 bar / 2600 Psi
Ambient temperature	10 -45 ºC
Mixing ratio	Base/ Hardener 4 / 1 by weight
Thinner/Cleaner	RZT- 51
Pot life	90 minutes 25ºC
Recoat Interval	Min: 12 Hours at 25ºC Max:5 days at 25ºC

*\*Maximum overcoating time will reduce significantly at high ambient temperature or in strong sunlight.*

*Revised  
FEB 2020*

## ***Application Procedure of RZ-5251-1***

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1. Flush all equipment with recommended cleaner before use.
2. Stir pigmented resin (in the larger container ) to an even consistency with a power mixer.
3. Add cure to pigmented resin ,and continue stirring for 5 minutes .

**Note:** Since the pot life is limited and shortened by high temperatures, do not mix more material than will be used in 90 minutes at 25°C .

4. Stir during application to maintain uniformity of material . Apply a wet coat by parallel passes. Overlap each pass 50% to avoid bare areas, pinholes or holidays.
5. Double coat all welds, rough spots, sharp edges, rivets, bolts, etc. to ensure proper thickness.
6. Check thickness of dry coating with a non-destructive dry film thickness gauge. Recoat if greater thickness is required.
7. Random pinholes, holidays and small damaged or bare areas can be touched up by brush when the film is dry to touch. Larger areas should be sprayed.
8. In confined areas ventilate with clean air during application and drying until all solvents are removed.
9. Clean all equipment with recommended cleaner immediately after use.

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### ***Environmental Conditions***

Surface temperature must be at least 3° C above dew point. Relative humidity during application should be less than 80%.

Do not apply coatings under reverse environmental conditions.

Each coat shall be air dried a minimum of 24 hours at 25° C. prior to recoating. Longer recoat times will be required at lower temperatures. Normal recoat time is within 24 hours. Longer recoat times may require special surface preparation. These coating shall not be applied at temperatures below 10° C.

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### ***Safety***

This product is flammable. Keep away from heat and open flame. Keep container closed. Avoid prolonged and repeated contact with skin.

Since improper use and handling can be hazardous to health and cause fire or explosion, safety precautions included with application instructions must be observed during all storage, handling, use and drying periods.

If used in confined areas:

- circulate adequate fresh air continuously during application and drying.
- Use fresh air masks and explosion proof equipment
- Prohibit all flames, sparks, welding and smoking
- Take precautionary measures against static discharges

Keep away from food products.

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### ***Storage conditions***

Store in cool dry conditions, away from sources of heat and naked flames, in the original, unopened packs. If stored at high temperature , the shelf life may be reduced.

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### ***Disclaimers***

The information in this data sheet is given to the best of our knowledge based on laboratory testing and practical experience.

However we reserve the right to change the given data without notice.

Any recommendation relating to the use of the products is based on data believed to be reliable. It is buyer to satisfy itself of the suitability of the product for its own particular use .

As the product is often used under conditions beyond our control, we cannot guarantee anything but the quality of the product itself.

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