

# Technical Data Sheet

## HYDROGUARD® Primer SZ

Serie 160619

### PRODUCT DESCRIPTION

Water based, fast drying, two pack epoxy primer with anticorrosive pigmentation free from zinc phosphate applicable at high dry film thickness.

### INTENDED USES

Particularly suitable as a primer coat in two pack water based epoxy systems for the protection of steel placed in industrial and marine atmosphere. The ease of drying in the winter season, allows the application of more coats throughout the day. This product contributes to the Green Buildings standard credits for LEED certification.

### TECHNICAL INFORMATION

Product type	Water based epoxy primer			
Colours	Grey, red oxide			
Solids (% +/- 2)	54 (by Volume)	64 (by Weight)	SOV/VOC (g/liter)	<50 Directive 2004/42/CE
Specific Gravity (g/liter +/- 100)	1150		SOV/VOC (g/liter) (calculated)	<50 Directive 2010/75/CE
Flash Point (°C +/- 2)	not flammable			
Appearance	matt			
Temperature Resistance (°C)	100 (dry) - 120 (peak)			

### APPLICATION DATA

Application Range	Film thickness per coat in micron		Theoretical spreading rate		Consumption
	Dry	Wet	m²/l	m²/kg	g/m²
	(min - max)				
Typical	50 - 200	93 - 371	10.8 - 2.7	9.4 - 2.3	-
	<b>100</b>	<b>186</b>	<b>5.4</b>	<b>4.7</b>	<b>213</b>

  

Room Temperature	min 10°C	Max 40°C	Relative Humidity	min 5%	Max 70%
Mixing Ratio	4 - 1 (by weight)		3.7 - 1 (by volume)		
Pot life	4 h				
Thinner/Cleaner	clear water (max. 5% by weight)				

Application methods      Airless or conventional spray, brush or roller.

### Guideline for airless spray

Pressure at nozzle	15 Mpa (150 kp/cm <sup>2</sup> , 2100 psi)
Nozzle tip	0,46 - 0,58 mm (0,018 - 0,023" )

**Ti.Pi.Ci. s.a.s. di C.M. Pinto & C.**

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**Series 160619**

**SURFACE PREPARATION**

the substrate must be clean and dry. Surface contamination is to be removed by detergents and fresh water cleaning. Blast cleaning to min. Sa 2, power tool cleaning to min. St 2. Improved surface treatment (blast cleaning to Sa 2,5) will improve the performance.

**CONDITION DURING APPLICATION**

the temperature of the substrate should be min. 10°C and min. 3°C above the dew point of the air. The temperature and relative humidity should be measured in the vicinity of the substrate.

**DRYING TIMES**

Drying times are generally related to air circulation, temperature, film thickness and number of coats, and will be affected correspondingly. The figures given in the table are typical with: good ventilation (outdoor exposure or free circulation of air), recommended film thickness, one coat on top of inert substrate.

Substrate temperature	Surface Dry <sup>1</sup>	Hard Dry <sup>2</sup>	Cured <sup>3</sup>	Dry to recoat <sup>4</sup>	
				minimum <sup>5</sup>	Maximum <sup>6</sup>
10°C		1 h	48 h	6 h	-
20°C		45 min - 1 h	24 h	4 h	-
30°C		30 min. - 45 min.	24 h	3 h	-

- 1
- 2 Data resulted by tests and experience in practical applications. A good ventilation can improve the drying time.
- 3 Data resulted by tests and experience in practical applications.
- 4 Recommended data given for recoating with same generic type of paint.
- 5 In case of multi-coat application, drying times will be influenced by the number in sequence and by the total thickness of previous coat applied.
- 6 The surface should be dry and free from any contamination prior to application of the subsequent coat.

Given data must be considered as guidelines only. Actual drying time can only be decided at site, depending on age of existing system, generic types, numbers of coats, thinning, temperature, ventilation, etc.

**THIS PRODUCT IS INTENDED FOR PROFESSIONAL USE ONLY**

The applicators and operators shall be trained, experienced and have the capability and equipment to mix/stir and apply the coatings correctly and according to Ti.Pi.Ci.'s technical documentation.

**STORAGE AND PACKAGING**  
**STORAGE**

the product should be stored in accordance with national regulations. The best storage conditions are to keep the packages in a dry space provided with adequate ventilation.

SHELF LIFE12 months at room temperature.

PACKAGING16 kg comp. A and 4 kg comp. B (20 kg KIT A+B)

**HEALTH AND SAFETY**

**For detailed information on the health and safety hazards and precautions for the use of this product, we refer to the Material Safety Data Sheet.**

**Disclaimer**

*The information in this data sheet is given to the best of our knowledge based on laboratory testing and practical experience. However, as the product is often used under conditions beyond our control, we can not guarantee anything but the quality of the product itself. We reserve the right to change the given data without notice.*