

## SELECTION & SPECIFICATION DATA

<b>Generic Type</b>	Solvent-based Inorganic Zinc
<b>Description</b>	Carbozinc 12 is a self-curing inorganic zinc coating for the protection of steel surfaces against rust and corrosion. It protects galvanically and prevents undercutting corrosion. Carbozinc 12 has excellent application properties in the field or shop. Meets or exceeds all requirements of Steel Structures Painting Council Specification, SSPC 12.00 for inorganic zinc coatings. Future expensive surface preparation is avoided. Develops hardness rapidly and may be topcoated the same day. Refer to Drying Times chart for topcoating.
<b>Color</b>	Only green
<b>Gloss</b>	Matte
<b>Dry Film Thickness</b>	50 to 75 microns according to the application.
<b>Typical Uses</b>	Provides single layer protection in most aging environments. Carbozinc 12 is used as a basecoat with a suitable topcoat in corrosive environments or other difficult service conditions. It is perfect for long-term protection of structural steel, equipment, cargo containers, rail lines, cranes, steel platforms, bridges with barges outside, work boats and ships. <b>Not recommended uses</b> Most tank interior-priming applications and acids and bases of pH 5 to 10 without a suitable topcoat.
<b>Solid(s) Content</b>	Carbozinc 12 ratio: 73% ± 2% (By weight) Zinc ratio in dry film: 75% ± 2% (By weight)
<b>Theoretical Coverage Rates</b>	24.5 m <sup>2</sup> /lt (25 microns) 8.2 m <sup>2</sup> /lt (75 microns) Take into account that there may be losses for mixing and application.
<b>Dry Temp. Resistance</b>	Continuous: 399°C (750°F) Non-Continuous: 427°C (801°F)  Non-immersion
<b>Flexibility</b>	Low
<b>Abrasion Resistance</b>	Excellent. The abrasion resistance increases with time.
<b>Topcoats</b>	It can be finished with epoxy, vinyl, acrylic, silicone and chlorine-rubber or other recommended paints. <b>NOTE:</b> A powder or patch may be needed to prevent bubbling that may occur at the topcoat. <b>Compatibility with other paints:</b> Carboweld 11P or other recommended inorganic zinc and can be applied directly to the floor.

## SUBSTRATES & SURFACE PREPARATION

<b>General</b>	Surfaces must be clean and dry. Use adequate methods to remove dust, dirt, grease and other contaminants from the surface, which may prevent paint sticking.
----------------	--

## SUBSTRATES & SURFACE PREPARATION

<b>Steel</b>	<u>Immersion</u> : ISO 8501 Sa 2 ½ (SSPC-SP10) degree of surface cleaning and 25-75 micron surface profile (angular thread depth).
	<u>Non-immersion</u> : ISO 8501 Sa 2 (SSPC-SP6) degree of surface cleaning and 25-75 micron surface profile (angular thread depth).

## MIXING & THINNING

<b>Mixing</b>	Mix the base part with the motorized tools and then assemble as described below. Gently pour the zinc filler by continuously stirring on the premixed base. Mix until there is no lump. Filter the mixture through a 30 mesh sieve. DO NOT MIX PARTIAL KITS.
<b>Thinning</b>	In cold weather up to 12% of paint can be thinned with Thinner #21. (Less than 13°C) In extremely hot weather, it can be thinned with 4% Thinner #33. Can be thinned with Thinner #26 or Thinner #33 in hot and windy weather. Use of thinners other than those supplied or recommended by Carboline may adversely affect product performance and void product warranty, whether expressed or implied.
<b>Ratio</b>	CZ 12 Part A: 14,98 LT (16,7 kg) Zinc Filler: 21,7 kg
<b>Pot Life</b>	8 hours at 24 ° (shorter at higher temperatures) When the consistency of the paint is too high (such as gel), the pot life is finished.

## APPLICATION EQUIPMENT GUIDELINES

Listed below are general equipment guidelines for the application of this product. Job site conditions may require modifications to these guidelines to achieve the desired results.

<b>Spray Application</b>	The following are general equipment guiding rules for this product. In order to achieve the desired results in field conditions, it may be necessary to make changes to these rules.
	The following spray equipment has been found suitable and is available in manufacturers such as Binks, DeVilbiss and Graco. Mix the material gently during application. If spraying stops for more than 10 minutes, recirculate the remaining material in the spray line. Do not leave the mixed liner in the hoses during work stoppages.
<b>Conventional Spray</b>	Pressure pot equipped with dual regulators, 3/8" I.D. 50' length material hose, .070" I.D. fluid tip and appropriate air cap.
<b>Airless Spray</b>	Pump Ratio: 30:1 (min.)* GPM Out : 3.0 (min.) Material Hose: 3/8" I.D. (min.) Tip Size: .019-.023" Output PSI: 1500-2000 Filter Size: 60 mesh *Teflon packings are recommended and available from the pump manufacturer.
<b>Brush</b>	Just for repairs. Use a medium bristle brush.

## APPLICATION CONDITIONS

Condition	Material	Surface	Ambient	Humidity
Minimum	-18°C (-0°F)	-18°C (-0°F)	-18°C (-0°F)	30%
Maximum	54°C (129°F)	93°C (199°F)	54°C (129°F)	95%
Optimum	20°C (68°F)	23°C (73°F)	20°C (68°F)	65%

This product simply requires the substrate temperature to be above the dew point. Condensation due to substrate temperatures below the dew point can cause flash rusting on prepared steel and interfere with proper adhesion to the substrate. Special application techniques may be required above or below normal application conditions.

## CURING SCHEDULE

Surface Temp.	Dry to Recoat or Topcoat
-18°C (-0°F)	5 Days
4°C (39°F)	24 Hours
16°C (61°F)	16 Hours
27°C (81°F)	12 Hours
38°C (100°F)	6 Hours

## CLEANUP & SAFETY

<b>Cleanup</b>	Use Thinner #21 or Isopropyl alcohol. In case of spillage, absorb and dispose of in accordance with local applicable regulations.
<b>Safety</b>	Read and follow all caution statements on this product data sheet and on the MSDS for this product. Employ normal workmanlike safety precautions. Hypersensitive persons should wear protective clothing, gloves and use protective cream on face, hands and all exposed areas.
<b>Ventilation</b>	When used in enclosed areas as a tank inner lining, thorough air circulation must be used during and after application until the coating is cured. The ventilation system should be capable of preventing the solvent vapor concentration from reaching the lower explosion limit for the solvents used. In addition, suitable masks must be used by the operating personnel for a straight-air ventilation.
<b>Caution</b>	This product contains flammable solvents. Keep away from sparks and open flames. All electrical equipment and installations should be made and grounded in accordance with the National Electric Code. In areas where explosion hazards exist, workmen should be required to use non-ferrous tools and wear conductive and non-sparking shoes.

## PACKAGING, HANDLING & STORAGE

<b>Shelf Life</b>	Part A: 12 month at (24°C) Zinc Filler: 12 month at (24°C) <b>Shelf Life:</b> (actual stated shelf life) when kept at recommended storage conditions and in original unopened containers.
<b>Shipping Weight (Approximate)</b>	Kit: 18 L (40,8 kg) A: 14,98 L (17,5 kg) Zinc Filler: 23,3 kg
<b>Storage Temperature &amp; Humidity</b>	40°F-100°F (4°C-38°C) 0-90% Relative Humidity

# Carbozinc 12

## PRODUCT DATA SHEET



### PACKAGING, HANDLING & STORAGE

<b>Flash Point (Setaflash)</b>	Part A: 15°C Zinc Filler: NA
--------------------------------	---------------------------------

<b>Storage</b>	Store Indoors.
----------------	----------------

### WARRANTY

To the best of our knowledge the technical data contained herein is true and accurate on the date of publication and is subject to change without prior notice. User must contact Carboline to verify correctness before specifying or ordering. No guarantee of accuracy is given or implied. Carboline warrants our products to be free of manufacturing defects in accord with applicable Carboline quality control procedures. THIS WARRANTY IS NOT VALID WHEN THE PRODUCT IS NOT: (1) APPLIED IN ACCORDANCE WITH CARBOLINE'S SPECIFICATIONS, AND/OR (2) PROPERLY STORED, CURED, AND USED UNDER NORMAL OPERATING CONDITIONS. Carboline assumes no responsibility for coverage, performance, injuries, or damages resulting from use of the product. If this product is found not to perform as specified upon inspection by a Carboline representative during the warranty period, Carboline's sole obligation, if any, is to replace the Carboline product(s) proven to be defective or refund the purchase price thereof, at Carboline's sole option. Carboline shall not be liable for any other losses or damages. This warranty excludes (1) labor and costs of labor for the application or removal of any product, and (2) any incidental or consequential damages, whether based on breach of express or implied warranty, negligence, strict liability or any other legal theory. NO OTHER WARRANTY OR GUARANTEE OF ANY KIND IS MADE BY CARBOLINE, EXPRESS OR IMPLIED, STATUTORY, BY OPERATION OF LAW, OR OTHERWISE, INCLUDING MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. All of the trademarks referenced above are the property of Carboline International Corporation unless otherwise indicated. The whole text of this Product Data Sheet, as well as the documents derived from it, have been written in English, and for legal purposes the English version shall prevail.