

# **BONDERITE C-AK 2260 IT**

Known as Ridoline 2260 IT December 2018

# PRODUCT DESCRIPTION

BONDERITE C-AK 2260 IT provides the following product characteristics:

Technology	Industrial Cleaner
Product Type	Alkaline Cleaner
Application	Multifunctional

BONDERITE C-AK 2260 IT is a liquid, alkaline, multifunctional cleaner for metal surfaces. In combination with specific additives, BONDERITE C-AK 2260 IT can be used for many industrial applications, such as:

- 1) Dephosphating (dip and spray)
- 2) Electrolytic cleaning
- 3) Chemical cleaning (dip and spray)
- 4) Alkaline paint-stripping (dip and spray)
- 5) Descaling (dip and spray)

BONDERITE C-AK 2260 IT contains lots of caustic components, which grant to the bath a high saponification capacity for animal and vegetal fats and ensure high electrical conductivity.

In addition, BONDERITE C-AK 2260 IT contains a high amount of complexing agents which allow sequestering of dissolved metallic ions and prevent their re-deposition; finally, they avoid negative action due to limestone coming from water used for the bath.

BONDERITE C-AK 2260 IT can be used both on ferrous material and on copper alloys (by adjusting work parameters); on the contrary, it can't be used for light materials such as aluminium, zinc. etc.

Used by spray or dip, BONDERITE C-AK 2260 IT is normally assisted by a suitable cleaning additive.

# **DIRECTIONS FOR USE**

# **Preliminary Statement:**

Prior to use it is necessary to read the **Material Safety Data Sheet** for information about precautionary measures and safety recommendations. Also, for chemical products exempt from compulsory labeling, the relevant precautions should always be observed. Please also refer to the local safety instructions and contact Henkel for analytical support.

# Application:

# 1) Dephosphating

Used by oneself or with suitable additive, BONDERITE C-AK 2260 IT performs excellent dissolving action on phosphatic coatings, even high weight ones, and is used at the following average working parameters:

Concentration 70 to 130 g/L
Temperature 70 to 80°C
Time to be set
Free Alkalinity 6 to 11 pts
Pressure (spray) 2 to 10 bar

Spray surfactant additive 1 to 3 g/L BONDERITE C-AD

0508 IT

Dip surfactant additive 1 to 3 g/L BONDERITE C-AD

0506

# 2) Electrolytic Cleaning

Normally used in the anodic phase for steel and copper materials, BONDERITE C-AK 2260 IT can also be used in cathode phase, cathode-anodic phase and in inverted systems. It is recommended not to use foaming detergent additives.

 Concentration
 100 to 170 g/L

 Free Alkalinity
 8 to 15 pts

 Temperature
 20 to 60°C

 Time
 20 to 300 sec

 Current density
 2 to 20 A/dm²

# 3) Chemical Cleaning

Assisted by a specific detergent additive suggested by our Technical Service, BONDERITE C-AK 2260 IT ensures a rapid and complete removal of surface pollutants when used at following conditions:

Spray / Immersion

 $\begin{array}{ll} \text{Concentration} & \text{40 to 60 g/L / 60 to 100 g/L} \\ \text{Free Alkalinity} & \text{3.5 to 5 pts / 5 to 8.5 pts} \\ \end{array}$ 

Time to be set
Pressure 1 to 2.5 bar

Additive: to be chosen according to the

pieces to be treated and

application

# 4) Paint stripping

Used by spray or dip, BONDERITE C-AK 2260 IT ensures a rapid removal of many types of paint, liquid, powder or electrophoretic, when used at following conditions. The combination with specific additives (as BONDERITE S-ST 5941 IT) speeds up the paint stripping operation and must be discussed with Our Technical Service.



Concentration 50 to 150 g/L
Free Alkalinity 4 to 13 pts
Time to be set
Pressure 1 to 2.5 bar

# 5) Descaling

Due to its complexing and caustic components BONDERITE C-AK 2260 IT can be used for cleaning and descaling of tanks and crystalline phosphate plants.

Concentration 200 to 300 g/L
Temperature 90 to 100°C
Time to be set

Stripping additive to be decided (i.e. BONDERITE

S-ST 5941 IT50 to 100 g/L)

# Bath Make-up:

- 1. Fill the tank up to approximately 3/4 of its operating volume.
- 2. Heat up to the working temperature.
- 3. Add slowly and carefully the required amount of BONDERITE C-AK 2260 IT (and additives) and mix through recirculation to complete homogeneity.
- 4. Make the controls.

#### **Bath Control:**

BONDERITE C-AK 2260 IT solution is controlled by free alkalinity.

- Add 50 mL of DI water to 10 mL of operating bath.
- Add some drops of Phenolphthalein Indicator and 10 mL of Reattivo DF.
- Titrate the solution with 1 N hydrochloric acid.
- The endpoint will be shown by a colour change from pink-violet to colourless.

Being "A" the number of ml of Hydrochloric Acid used to achieve colour change:

#### Concentration

BONDERITE C-AK 2260 IT (g/L) A. x 11.6 BONDERITE C-AK 2260 IT (mL/L) A. x 8.2

# Aluminium determination:

- Add 50 mL of DI water to 10 mL of operating bath.
- Add some drops of Phenolphthalein Indicator and 10 mL of Reattivo DF.
- Titrate with 1 N hydrochloric acid.
- The endpoint will be shown by a colour change from pink-violet to colourless.
- Mark as "A" the number of mL of Hydrochloric Acid used to achieve colour change.
- Add Potassium Fluoride (KF) or Sodium Fluoride (NaF) powder; in presence of aluminium the solution will become violet again.
- Mark as "B" the number of ml of 1 N Hydrochloric Acid used for the second titration.

# Calculation:

BONDERITE C-AK 2260 IT (g/L) A x 11.6 AI (g/L) B x 0.09

#### Advices:

Keep the cleaning bath surface free from floating pollutants like dust, oil, etc. The plant can be made of common steel but it is advisable to use stainless steel for the spray nozzles. Small differences in product appearance do not affect its performances.

# Classification:

Please refer to the corresponding Material Safety Data Sheets for details on:
Hazards identification
Transport information
Regulatory information

# Storage:

Recommended Storage Temperature +5 to 40°C Shelf-life, months 36 (in unopened original packaging)

#### ADDITIONAL INFORMATION

#### Disclaimer

#### Note:

The information provided in this Technical Data Sheet (TDS) including the recommendations for use and application of the product are based on our knowledge and experience of the product as at the date of this TDS. The product can have a variety of different applications as well as differing application and working conditions in your environment that are beyond our control. Henkel is, therefore, not liable for the suitability of our product for the production processes and conditions in respect of which you use them, as well as the intended applications and results. We strongly recommend that you carry out your own prior trials to confirm such suitability of our product.

Any liability in respect of the information in the Technical Data Sheet or any other written or oral recommendation(s) regarding the concerned product is excluded, except if otherwise explicitly agreed and except in relation to death or personal injury caused by our negligence and any liability under any applicable mandatory product liability law.

In case products are delivered by Henkel Belgium NV, Henkel Electronic Materials NV, Henkel Nederland BV, Henkel Technologies France SAS and Henkel France SA please additionally note the following:

In case Henkel would be nevertheless held liable, on whatever legal ground, Henkel's liability will in no event exceed the amount of the concerned delivery.

# In case products are delivered by Henkel Colombiana, S.A.S. the following disclaimer is applicable:

The information provided in this Technical Data Sheet (TDS) including the recommendations for use and application of the product are based on our knowledge and experience of the product as at the date of this TDS. Henkel is, therefore, not liable for the suitability of our product for the production processes and conditions in respect of which you use them, as well as the intended applications and results. We strongly recommend that you carry out your own prior trials to confirm such suitability of our product.

Any liability in respect of the information in the Technical Data Sheet or any other written or oral recommendation(s) regarding the concerned product is excluded, except if otherwise explicitly agreed and except in relation to death or personal injury caused by our negligence and any liability under any applicable mandatory product liability law.

# In case products are delivered by Henkel Corporation, Resin Technology Group, Inc., or Henkel Canada Corporation, the following disclaimer is applicable:

The data contained herein are furnished for information only and are believed to be reliable. We cannot assume responsibility for the results obtained by others over whose methods we have no control. It is the user's responsibility to determine suitability for the user's purpose of any production methods mentioned herein and to adopt such precautions as may be advisable for the protection of property and of persons against any hazards that may be involved in the handling and use thereof. In light of the foregoing, Henkel Corporation specifically disclaims all warranties expressed or implied, including warranties of merchantability or fitness for a particular purpose, arising from sale or use of Henkel Corporation's products. Henkel Corporation specifically disclaims any liability for consequential or incidental damages of any kind, including lost profits. The discussion herein of various processes or compositions is not to be interpreted as representation that they are free from domination of patents owned by others or as a license under any Henkel Corporation patents that may cover such processes or compositions. We recommend that each prospective user test his proposed application before repetitive use, using this data as a guide. This product may be covered by one or more United States or foreign patents or patent applications.

**Trademark usage:** [Except as otherwise noted] All trademarks in this document are trademarks and/or registered trademarks of Henkel and its affiliates in the U.S. and elsewhere.

Reference 1.1