

SurTec[®] 762

Grain Refiner

for Acidic Zinc Electrolytes on Sulfate Basis

Properties

- produces soft zinc layers on steel bands, with good adhesion and high corrosion resistance
- based on zinc sulfate, specially qualified for lines with insoluble anodes
- liquid and easy to dose
- works in a wide range of current densities
- prevents dendrite formation at the edge of the strip
- prevents burnings and has a good leveling effect
- the deposited zinc layers are ductile
- zinc depositions are easy to passivate

Application

make-up values:

zinc (as sulfate)	80-110 g/l
sodium sulfate (optional)	70 - 80 g/l
SurTec 762	7 ml/l

temperature:	50-65°C
pH-value:	0.9-1.8 adjust with sulfuric acid
current density:	15-200 A/dm ² depending on temperature and band agitation
agitation:	band movement with at least 10 m/min depending on desired current density and temperature
current efficiency:	90-98 %
deposition weight:	20-70 g/m ²
anodes:	pure zinc anodes 99.99 % or lead/silver
tank material:	out of acid resistant material
filtration:	continuous filtration necessary

Technical Specification

(at 20°C)	Appearance	Density (g/ml)	pH-value (conc.)
SurTec 762	liquid, colourless, clear	1.012 (1.00-1.02)	4.6 (3-6)

Maintenance and Analysis

Check the pH-value regularly. Analyse and adjust the concentration of zinc and sulfate regularly.

In order to control the concentration of SurTec 762, we recommend an analysis by HPLC. (If required, please ask for further information.)

To avoid an accumulation of decomposition products, the electrolyte should be filtered with activated carbon at regular intervals.

Consumption and Stock Keeping

The consumption depends heavily on the drag-out. To determine the exact amounts of drag-out, see [SurTec Technical Letter 11](#).

The following value per 10,000 Ah can be taken as estimated average consumption:

SurTec 762	1-2 l
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In order to prevent delays in the production process, per 1,000 l bath the following amount should be kept in stock:

SurTec 762	200 kg
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Product Safety and Ecology

The safety instructions and the instructions for environmental protection have to be followed in order to avoid hazards for people and environment. The Material Safety Data Sheets (according to European legislation) contain explicit details for this.

The following hazard designations and classifications into water hazard classes (WHC) have to be taken into account:

<u>product</u>	<u>hazard designation</u>	<u>water hazard class</u>
SurTec 762	Xn - Harmful	WHC 2

Warranty

We are responsible for our products in the context of the valid legal regulations. The warranty exclusively accesses for the delivered state of a product. Warranties and claims for damages after the subsequent treatment of our products do not exist. For details please consider our [general terms and conditions](#).

Further Information and Contact

In our forum, you can discuss topics of the surface technology:
<http://forum.SurTec.com/>

If you have any questions concerning the process, please contact your local technical department: <http://SurTec.com/International.html>