

SurTec® 494

Chrome-Free Clarification for Aluminium

Properties

- liquid
- non-foaming
- free of surfactants
- for mild pickling and decolouring of aluminium and its alloys

Application

SurTec 494 can be used in immersion and spray installations.

make-up value: 3-15 %vol

temperature: 20-60 °C

tank material: stainless steel or rubber coated steel

Technical Specification

| (at 20 °C) | Appearance | Density (g/ml) | pH-value (at 10 g/l) |
|------------|--------------------|--------------------|----------------------|
| SurTec 494 | liquid, colourless | 1.345 (1.31-1.389) | 1.8 (1.6-2.0) |

Maintenance and Analysis

Analyse and adjust the concentration of SurTec 494 regularly.

Sample Preparation

Take a sample at a homogeneously mixed position. Let it cool down to room temperature. If the sample is turbid, let the turbidity settle down and decant or filter the solution.

SurTec 494 – Analysis by Titration

reagents: 1 N sodium hydroxide solution
indicator: methyl orange solution (0.04 %)

procedure:

1. Pipette 20 ml bath sample into a 250 ml Erlenmeyer flask.
2. Dilute to approx. 100 ml with deionised water.
3. Add 3 drops of indicator.
4. Titrate with 1 N sodium hydroxide solution from red to yellow-orange.

calculation: consumption in ml · 0.81 = %vol SurTec 494

Ingredients

- phosphoric acid
- sulfuric acid
- complex fluorides

Stock Keeping

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

SurTec 494 200 kg

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 494 | C - Corrosive | 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>

12 May 2009/DK, OP