

Scope

ARDROX[®] 295 GD is an effective concentrated liquid deoxidiser and desmutter for use on aluminium alloys following cleaning or etching. ARDROX[®] 295 GD does not contain chromate; therefore, it can be used without problems where there is restriction relative to the disposal of chromate wastes. ARDROX[®] 295 GD provides a clean, oxide and smut free surface in preparation for spot welding, anodising, and chromate conversion coatings and barrel burnishing.

Testing Chemicals Required

- Indicator solution no. 15 (starch solution)
- Testing powder no. 25 (potassium iodide)
- Testing solution no. 14 (50 % sulphuric acid solution)
- Testing solution no. 22 (0.1 N sodium thiosulphate solution)

Method of use

Fill half of the tank with cold water. Slowly add the required amount of ARDROX[®] 295 GD to give a concentration of 20 – 25 % by volume. Bring the solution to the working level by adding water.

Immerse components for 3 to 5 minutes at ambient temperature. Continuous air agitation is recommended as it prolongs the life of the solution. The components are then rinsed in an ambient water rinse.

Method of control

Pipette a 10 ml sample of the bath solution into a 500 ml Erlenmeyer flask. Add 100 ml of distilled water, 5 ml of Testing solution no. 14 and 10 g of Testing powder no. 25. Stir to dissolve the solid and allow to stand for 20 minutes.

Titrate against Testing solution no. 22 until the solution becomes pale yellow. Add 5 – 10 drops of Indicator solution no. 15 (this should turn the solution dark blue). Continue to titrate against Testing solution no. 22 until the colour disappears. The solution should remain colourless for at least 1 minute.

A 20 vol% solution should give a titration of 30 – 31 ml. Although the product will operate within a wide concentration range, it should be maintained within a titration rate of 27 – 33 ml.

For every 1 ml below 27 ml on titration, add 6.6 litres of ARDROX® 295 GD for each 1000 litres of tank volume.

Effects on materials

When ARDROX® 295 GD is used in the recommended manner, no significant corrosion is likely to be encountered on aluminium and its alloys.

Plastics such as polymethylmethacrylate (Perspex, Plexiglas), PVC, polythene and rubbers will not be affected.

Technical information

Appearance: dark brown liquid

Density: approx. 1.43 g/cm³

pH: < 1

These are typical values only and do not constitute a specification.

Safety guidance

Before operating the process described it is important that this complete document, together with any relevant Safety Data sheets, be read and understood.

issue of: 12.08.2010
supersedes issue of: Feb. 2001