

# TECHNICAL DATA SHEET



Last updated: 09.05.2018 Product Code: RCECO4648

**RUNCOOL ECO 4648** is an extremely adaptable high performance, chlorine free, biostable semi- synthetic water mix cutting fluid offering truly universal multi-metal compatibility.

Runcool ECO-4648 has been specifically developed for its versatility across a wide range of materials and applications. It is suitable on most ferrous and non-ferrous materials including cast iron and carbon steel, through to aluminium alloys and stainless steel. Machining applications range from light duty grinding to high speed CNC milling, turning, drilling, tapping and threading operations.

This advanced product meets the latest HSE guidelines for metalworking fluids, whilst being very robust and gives extended service life it is free from biocide and therefore is formaldehyde free. All the materials used in the formulation of this product are registered under REACH.

REACH (EC 1907/2006) aims to improve the protection of human health and the environment through the better and earlier identification of the intrinsic properties of chemical substances. This is done by the four processes of REACH, namely the registration, evaluation, authorisation and restriction of chemicals.

## BENEFITS

- Outstanding bio-stability
- Low foaming
- Superior corrosion protection
- Chlorine, biocide free
- Multi-metal compatible
- High operator acceptance
- Medium - Hard water tolerant
- Extremely clean running

## SUGGESTED OPERATING DILUTIONS

- Light duty machining / grinding: 3 – 5%
- Moderate duty machining: 4 – 6%
- Heavy duty machining: 6 – 10%

## TYPICAL PROPERTIES

- Emulsion: Translucent
- pH of 5% emulsion: 9.2 – 9.4
- IP 287 Corrosion break point: 2.0%

## CONCENTRATION

To check and maintain fluid concentration a refractometer is recommended, the resulting reading multiplied by a **factor of 1.4** will give the actual concentration strength.

## HEALTH & SAFETY, STORAGE AND DISPOSAL

**RUNCOOL ECO 4648** should be stored in dry conditions and protected from extreme temperatures: between 4°C and 35°C is the recommended storage temperature.

**RUNCOOL ECO 4648** is unlikely to present any significant health or safety hazard when used as recommended by MTO Lubricants. Good standards of personal and industrial hygiene are to be maintained by the user (see Material Safety Data Sheets). In order to protect the environment, the product used should be safely disposed by a licensed contractor. The packaging material should be handled by a recognised reconditioning firm.

Prior to using this product, consult the Material Safety Data Sheet for instructions regarding safe handling and environmental issues. The information contained herein is based on data available to us and is believed to be accurate.

HOWEVER, NO WARRANTY OF MERCHANTABILITY, FITNESS FOR ANY USE, OR ANY OTHER WARRANTY IS EXPRESSED OR TO BE IMPLIED, REGARDING THE ACCURACY OF THESE DATA. THE RESULTS TO BE OBTAINED FROM THE USE THEREOF, OR THE HAZARDS CONNECTED WITH THE USE OF THE PRODUCT.

Milo Tools Ltd assumes no liability for any alleged ineffectiveness of the product or any injury or damage, direct or consequential, resulting from the use of this product unless such injury or damage is solely attributable to negligence on the part of Milo Tools Ltd

MTO Lubricants (Part of Milo Tools Ltd)

Tel: 01274 872822

Fax: 0113 8800541

Email: [sales@milotools.co.uk](mailto:sales@milotools.co.uk)

Registered In England 08809951 VAT Registration No. GB 184 4633 89

