

# Klübercut CO 6-103

Synthetic metalworking oil



## Your benefits at a glance

Rapidly biodegradable

- Not hazardous to water
- Environmentally compatible, no disposal
- Almost dry machines
- Almost dry tools and swarfs
- Low consumption

## Your requirements - our solution

Klübercut CO 6-103 is a metal-working oil. It can be classified as environmentally compatible for metal cutting and punching processes. This high-quality metal-working oil is not miscible with water and is applied undiluted. The substances mentioned in the following are not contained in the formulation of this lubricant, however the occurrence of traces cannot be ruled out.

- amines
- boron
- chlorine
- phosphor
- sulphur
- heavy metals
- silicone

and thus shows an almost neutral behaviour towards metals.

Klübercut CO 6-103 is classified as not hazardous to water. At the same time, it is rapidly biodegradable. Apart from minute residue on the swarf, the product undergoes rapid biodegradation in the scrap phase and is transformed into a substance non hazardous to the environment.

#### Application

The emphasis of application is in the range of easy to medium cutting processes, e.g. in

- drilling and boring,
- milling
- sawing

In addition, it can also be used in

- folding
- bending
- nibbling
- shearing

punching

Klübercut CO 6-103 is suitable for a number of metals, particularly for

- Al and Al alloys
- nonferrous metals

but also for

- steels
- composite materials

As Klübercut CO 6-103 is used undiluted, only a very small quantity is required on the friction point, i.e. the point of contact between the tool and the workpiece. Micro-dosing constitutes a technical progress in the direction of environmental compatibility.

The advantages include:

- only minute oil residue remains on the swarf; the swarf can be directly transferred to the scrap cycle and be re-used
- no disposal of coolants, no separation and disposal of used emulsions
- clearly improved working environment; almost dry machines and components, less oil mist or oil vapour
- improved tool life and surface quality; the undiluted metalworking oil reduces friction and heat generation.

#### Application notes

The successful application of Klübercut CO 6-103 is based on using only minimal quantities by way of micro-dosage. This synthetic metalworking fluid proves its efficiency in lubrication with extremely small quantities and not in cooling with large quantities.

Klübercut CO 6-103 is applied to the area between the tool's cutting edge and the workpiece. The products excellent lubricity permits reduction of the cutting speed and increase of the feed rate.



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We would be pleased to assist you in selecting systems for micro-dosing.

## Material safety data sheets

Material safety data sheets can be requested via our website www.klueber.com. You may also obtain them through your contact person at Klüber Lubrication.

Pack sizes	Klübercut CO 6-103
Canister 20 I	+

Product data	Klübercut CO 6-103
Article number	046088
Colour space	yellow
Kinematic viscosity, DIN 51562 pt. 01/ASTM D-445/ASTM D 7042, 40 °C	approx. 20 mm²/s
Density, DIN 51757, 20 °C	approx. 0.84 g/cm³
Biodegradability according to OECD 301 F, (within 28 days)	>= 60 %
Minimum shelf life from the date of manufacture - in a dry, frost-free place and in the unopened original container, approx.	12 months

### Klüber Lubrication – your global specialist

Innovative tribological solutions are our passion. Through personal contact and consultation, we help our customers to be successful worldwide, in all industries and markets. With our ambitious technical concepts and experienced, competent staff we have been fulfilling increasingly demanding requirements by manufacturing efficient high-performance lubricants for more than 80 years.

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