

MOL Synaxol 100

universal metalworking fluid



A MOL Synaxol 100 is a water-miscible synthetic metalworking fluid, which is free from boron. The product is free from mineral oil. It contains emulsifiers, corrosion inhibitors, a friction modifier and wear reducing components. It is recommended to use mixing equipment for preparing the emulsion. The concentrate is always added to the water during agitated mixing. The concentration of the prepared emulsion should be checked by using a refractometer. Refractometer factor: 2.5. It is sensitive to biological contamination because it has a boron and biocide free composition, which is considered to be beneficial for safety at work. If contaminants (e.g. tramp oil) enters the product during use, then a subsequent biocide treatment can be used to enhance the emulsion's operating life. Cleanliness of the system is a determining factor in terms of the operating life of the emulsion, so it is recommended to use MOL Netsol SC system cleaner before every change.

Machining	Application concentration
Machining	3-15
Steel wire-drawing	3-4
Screw (thread rolling, spline-milling)	10-25
Lead-tin solder wire-drawing	20-30
Sheet metalforming in multistage die	5-35
Deep-drawing of mild steel sheet	5-35

Application



Chipless machining of ferrous metals (steel wire drawing, steel sheet stamping, bending, deep drawing)

Medium-duty chip forming machining of steel, alloys with regular inspection and handling

Features and benefits

Ready miscibility with water	Simple and quick emulsion preparation
Optimized lubricity	Appropriate wear reduction, long tool life and reduced specific tool cost
Excellent washing properties	Clean machine-tool and workpieces
Excellent hard water resistance	Forms a stable emulsion even with hard water No separation or sticky residues are formed on machines and workpieces
Excellent filterability	Reduced maintenance costs and environmental impact
Mild odour	More comfortable working environments
Free of boron containing and biocide additives	Safer workplace health conditions
Free of nitrites and secondary amines	Beneficial in terms of workplace health requirements

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Specifications and approvals

EMAG
ISO 6743-7: L-MAH

Properties

Properties	Typical values
Appearance	russet, clear
Density at 15°C [g/cm ³]	1,027
Emulsion pH value (3% (V/V) / 20 dH°)	8,3
Emulsion foaming characteristics (3 % (V/V) / 20 dH°)	
- foam volume promptly (3 % (V/V) / 20dH°) [cm ³]	80
- foam vanishing time (3% (V/V) / 20dH°) [s]	25
Anticorrosion effect (4% (V/V) / distilled water)	1
Appearance of emulsion (3% (V/V) / 20dH°)	light yellow

The characteristics in table are typical values of the product and do not constitute a specification.

Storage and handling instructions

Store in the original container in dry, properly ventilated area. Keep away from direct flame and other sources of ignition. Protect from direct sunlight. To preserve the original quality keep the suggested storage temperature. During transport, storage and use of the product follow the work safety instructions and environmental regulations relating to mineral oil products.

In the concentration specified for use and in case of keeping the health safety rules, the emulsions are not harmful to human health and do not cause skin affection.

For further details please read the Material Safety Data Sheet of the product.

In the original container under the recommended storage conditions: 12 months

Recommended storage temperature: +5°C - +40°C

Ordering information

Custom Tariff Number 34039900

SAP code and packaging:

13006542	MOL Synaxol 100 10LA	10 l plastic can
13006544	MOL Synaxol 100 50KG	60 l steel drum
13006543	MOL Synaxol 100 200KG	216.5 l steel drum

Order booking:

Please contact your local distributor or sales partner for ordering details.