

Cold heading oil

● Performance Overview

Maxtop Cold heading forming oil (MTCHFO) is refined from high-performance oiliness agents, anti-wear agents, antioxidants, rust inhibitors, defoamers and deeply refined base oil. The product can maintain the integrity of the oil film under extreme pressure, effectively reducing mold wear and workpiece cracking. At the same time, it has excellent cooling and heat dissipation performance, preventing metal softening or mold annealing caused by sudden temperature rise in the processing area. It is suitable for cold forming processing of high-strength fasteners, bearing rollers and automotive parts, significantly improving forming accuracy and mold life.

● Features

01

Extreme Pressure Anti-Wear: Contains extreme pressure additives to reduce wear and tear during cold heading processes with high loads and pressures.

03

Cooling performance: helps dissipate the heat generated during processing to prevent overheating of the workpiece and thermal damage to the mold.

05

Anti-foaming: It is not easy to form foam under agitation and high pressure, ensuring the stability and continuous supply of oil products.

02

Good lubricity: reduces friction between the mold and the workpiece and improves the surface quality of the molded part.

04

Anti-corrosion: Forms a protective film on the metal surface to prevent oxidation and corrosion during processing.

06

Oxidation stability: It is not easy to oxidize and deteriorate under high temperature and long-term use, thus extending the service life



● Application Scenario

1. Cold heading forming: Forming of the heads of fasteners such as bolts, nuts, and rivets, and cold extrusion processing of bearing balls/rollers.
2. Warm heading/hot heading: Precision forming of complex-shaped parts (such as gear blanks) in a warm or hot state.
3. Fastener manufacturing: Production of automotive standard parts and construction anchor bolts.
4. Bearing industry: Cold heading of miniature bearing rollers.
5. Automotive parts: Processing of valve tappets and steering column joints.
6. It is applicable to multi-station cold heading machines, high-speed heading and forging machines, CNC forming machines and other equipment, and supports multiple oil supply methods such as spray, immersion and brushing.

Cold Heading Oil Performance Index

Project	Quality indicators
Appearance	Brown transparent liquid
Kinematic viscosity (40°C), mm ² / s	90~110
Flash point (open), °C not less than	190
Pour point, °C not higher than	-10
Moisture, % not more than	trace
Mechanical impurities, % not more than	0.05
Corrosion (45# steel 100°C, 3h)	qualified
Maximum no-seizure load PB value/N not less than	745



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