

BLUENERGY POLAR XN CUTTING OIL

High Quality Non Water-Soluble Neat cutting oil

PRODUCT DATA SHEET

PRODUCT DESCRIPTION

Bluenergy Polar XN cutting oil are a premium-quality, non-water-miscible metalworking fluid engineered to deliver superior lubrication and machining performance across a wide range of cutting operations. Formulated with highly refined base oils and advanced performance additives, it minimizes friction, reduces heat generation, extends tool life, and provides an excellent surface finish on machined components.

Designed for both general-purpose and heavy-duty machining, Bluenergy Polar XN cutting oil ensures smooth cutting action, improved dimensional accuracy, and reliable performance under demanding operating conditions.

FEATURES & BENEFITS

- Excellent lubricity for reduced friction and tool wear
- Superior surface finish on machined components
- Extends cutting tool life and improves machining efficiency
- High load-carrying capability for demanding cutting operations
- Excellent oxidation stability for longer service life
- Low mist formation for a cleaner and safer work environment
- Protects machined parts and machine components against rust and corrosion
- Suitable for continuous industrial machining applications.

APPLICATION

Bluenergy Polar XN cutting oil suitable on automatic and multi-tool lathes for cutting either ferrous and non-ferrous metals. It is also used in production thread grinding, form grinding and milling set-ups which use multiple cutters on both high tensile ferrous and non-ferrous materials.

TYPICAL CHARACTERISTICS

Bluenergy Polar XN	Test Method	Units	Neat cutting oil
appearance	visual	---	Clear yellow
Specific gravity@ 60/60°F	ASTM D 4052	Gm/cc	0.869
Viscosity @ 40 °C	ASTM D 445	cSt	21
Pour Point	ASTM D 97	°C	-12
Flash Point (COC)	ASTM D 92	°C	190
Ester Content	ASTM E1252	%	8.0
Chlorine Content	ASTM D808	%	2.0

These characteristics are typical of current product methods whilst future production will confirm to Bluenergy lubricants specifications, variations in these physical characteristics may occur.