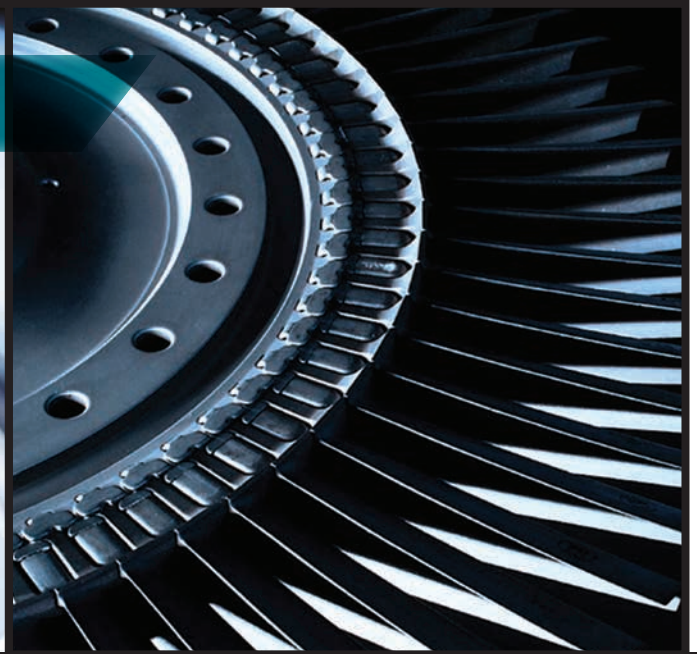




# Master Fluid

SOLUTIONS™

*TRIM® Neat Oils*



## *An Innovation in Oil*

Experts in the field of metal cutting and grinding operations, Master Fluid Solutions is committed to research and development and the use of the premium raw materials and production methods.

TRIM® neat oils blend superior synthetic and semisynthetic, hydrocracked base fluids with carefully selected "intelligent" additives to improve cutting and grinding performance and ensure products consistently exceed market expectations.





*TRIM neat oils outperform standard mineral oil-based products due to:*

- > vastly reduced oil consumption – lower operating cost
- > higher flash points – less fire risk
- > very low or no mist even at high pressures – safer working environment
- > free from polycyclic aromatics – improved operator safety
- > very low odour and light colour – better operator acceptability
- > lower foam – improved cutting and grinding performance

Whether you are superfinishing or gear hobbing, the innovative range of chlorine free Master Fluid Solutions TRIM neat oils offer you the best-in-class option.

## TRIM® Neat Oils

Product	Physical Properties		Chemical Properties			Performance					
	Viscosity mm <sup>2</sup> /s @ 40°C	Colour	Flash Point °C	Extreme Pressure	Base Fluid	Ferrous	Carbide	Aluminium	Alloys	Ceramics	Exotics
TRIM® OE105	5.3	Straw Yellow	170	EP	Saturated Esters	***	***	**	*	***	*
TRIM® OG107	7.7	Pale Straw	164	-	Mineral Grp III Hydrocracked	**	**				
TRIM® OG108	8.6	Colourless	198	-	Mineral Grp III Hydrocracked	***	***	***	**	***	**
TRIM® OE209	9.0	Water White	200	EP	Saturated Esters	***	***	***	**	***	**
TRIM® OG210	9.3	Pale Straw	200	EP	Mineral Grp III Hydrocracked	***	***	**	***	**	**
TRIM® OE310 NS	10.6	Pale Straw	250	EP	Ester	**		***	**		***
TRIM® OE315 NS	15.0	Pale Straw	230	EP	Ester	**		***	***		***
TRIM® OE220 NS	20.0	Straw	230	-	Ester	***					
TRIM® OE322 NS	22.0	Pale Straw	235	EP	Ester	***		***	***		***
TRIM® OG225	25.3	Pale Straw	240	EP	Mineral Grp III Hydrocracked	***	***	**	***		***
TRIM® OE330 NS	30.0	Pale Straw	240	EP	Ester	***		***	***		***
TRIM® OE335	35.0	Straw	300	-	Ester	***		***	***		***

\*\*\* Excellent \*\*



Applications							Description
Grinding	Honing	Drilling	Broaching	Tapping & Threading	Fine Machining	General Purpose	
***	***	**			***	**	Very low misting, synthetic oil-based product for honing of all materials. Also suitable for very fine machining operations.
							HSS and carbide tool grinding oil based on hydrocracked oil and saturated ester. Available only in Italy.
***	***	***		**	***	***	Grinding oil based on hydrocracked oil and saturated ester; for grinding HSS/carbide tools and grinding of gears. Very low misting.
***	***	***		**	***	***	Very low misting, synthetic oil-based product for machining/grinding all materials. Well suited to very high-pressure, chip-breaker applications.
***	**	***		**	***	***	Grinding oil based on hydrocracked oil, saturated ester and EP additives; for hard grinding of gears and other form-grinding applications.
**	***	**	*	***	***	***	High lubricity, ester-based fluid for machining all materials. Suitable for heavy-duty machining processes where a light viscosity is also advantageous.
**	**	***	*	***	***	***	High lubricity, ester-based product for machining all materials. Specially suited to heavy-duty machining processes, such as deep-hole drilling and broaching.
							High lubricity, ester-based product for general machining of steel, aluminium and yellow metals.
**		***	*	***	**	***	High lubricity ester-based product for machining of all materials. Proven product for machining of high-strength materials, cast metals and gear machining.
**	**	**	**	**	**	***	High performance, Mineral Group III hydrocracked oil-based fluid formulated specifically for flute grinding of HSS tools.
**	***	***	***	**	*	***	Very high lubricity and EP containing ester-based oil for the heaviest duty cutting applications. Proven performer in broaching, gear cutting and honing applications.
**	**	**	**	**		***	Very high lubricity, ester-based product especially suitable for very tough applications such as gear cutting and hobbing. Also for non-cutting metal forming.

Good \* Suitable

## *TRIM® Neat Oils enhance performance*

Whether your precision operation involves gear cutting, hobbing, deep hole drilling, broaching, creepfeed and form grinding, honing, thread rolling, screw machining, superfinishing, other fine machining operations or the heaviest duty cutting applications, there is a TRIM neat oil just right for the job.





### *Production soars with TRIM OG 108*

Looking for improved performance and reduced costs? Not a problem when you work with Master Fluid Solutions metalworking experts. After careful analysis of manufacturing giant MMPP (Moscow Machine-building Production Plant) Salut's machines, operation process and concerns, Master Fluid Solutions recommended a switch to TRIM OG 108.

The highly refined, hydrocracked oil-based OG 108 was the ideal choice for MMPP Salut's steel and carbide grinding of aerospace engine components and associated carbide tooling.

"Low viscosity TRIM OG 108 provides excellent detergency to keep the customer's grinding wheels clean," explains Master Fluid Solutions' representative. "This, together with excellent workpiece cooling, ensures minimal burning throughout the grinding process."

TRIM OG 108 resulted in:

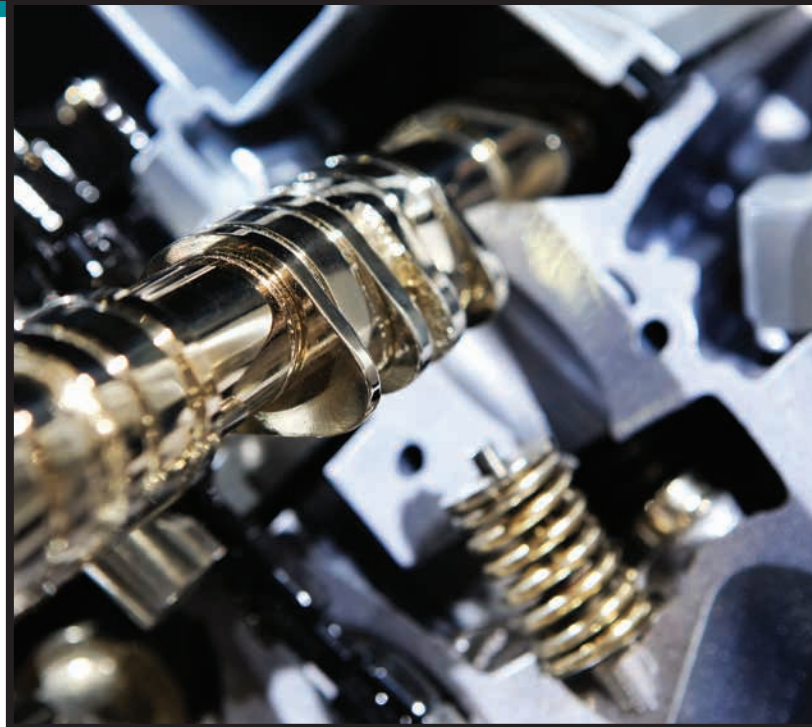
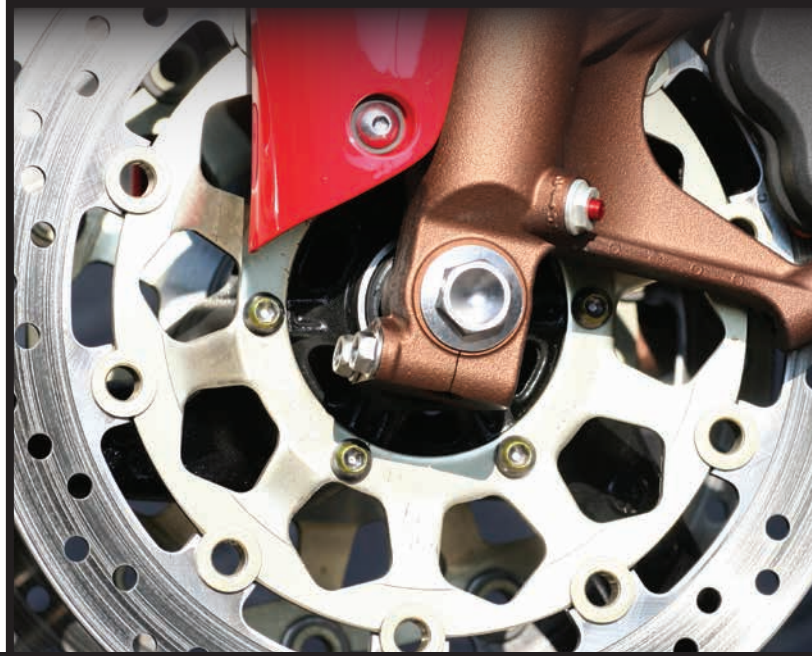
- > less misting
- > reduced costs
- > reduced fluid consumption
- > reduced machine maintenance
- > reduced parts waste
- > optimised parts quality

Overall, running TRIM OG 108 saved MMPP Salut more than 50% of their total production cost.

### Contact us

Let us create a detailed, fact-based, customised analysis to prove just how much we can save your operation in time, material and cost, while improving quality, with the premium coolant just right for your production.

For prices or additional information, contact your Master Fluid Solutions representative.



[www.masterfluidsolutions.com/eu/en/](http://www.masterfluidsolutions.com/eu/en/)

