

1. Identification of the substance/preparation and of the company/undertaking

Product name Hysol Excel
SDS # UK-7016
Product Use Metalworking fluid - soluble.

Supplier Castrol (U.K.) Limited
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2. Composition/information on ingredients

Highly refined mineral oil, emulsifiers and additives.

Chemical name	CAS no.	%	EINECS / ELINCS.	Classification
Alcohol ethoxylate phosphate ester	39464-62-2	5 - 10		Xi; R38, 41 N; R51/53
N,N'-Methylenebis(morpholine)	5625-90-1	1 - 5	227-062-3	Xn; R20/21/22 Xi; R36/37/38
ALCOHOLS, C12-15, ETHOXYLATED	68131-39-5	1 - 5	500-195-7	Xi; R41 N; R50
3-Iodo-2-propynyl butylcarbamate	55406-53-6	0.1 - 1	259-627-5	Xn; R20/22 Xi; R41 N; R50

See Section 16 for the full text of the R Phrases declared above

Occupational Exposure Limit(s), if available, are listed in Section 8

3. Hazards identification

This preparation is classified as dangerous according to Directive 1999/45/EC as amended and adapted.
 Not classified as dangerous when diluted below 40%.

Physical/chemical Hazards Not classified as dangerous.
Human health hazards Irritating to eyes.
Environmental hazards Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
Effects and symptoms
Eyes Causes eye irritation.
Skin Prolonged or repeated contact can defat the skin and lead to irritation and/or dermatitis.
Inhalation Vapors and aerosol can produce mucous membrane, nose and throat irritation.
Ingestion Ingestion may cause gastrointestinal irritation and diarrhoea.

4. First-aid measures

Eye Contact In case of contact, immediately flush eyes with a copious amount of water for at least 15 minutes. Obtain medical attention immediately.
Skin contact Wash contaminated skin with soap and water. Remove contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention if irritation develops.
Inhalation If inhaled, remove to fresh air. Get medical attention if symptoms appear.
Ingestion Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, call a physician immediately.

5. Fire-fighting measures

Extinguishing Media

Suitable In case of fire, use water fog, foam, dry chemical or CO2 extinguisher or spray. This material is harmful to aquatic organisms. Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.

Not Suitable Do not use water jet.

Hazardous decomposition products These products are carbon oxides (CO, CO₂), nitrogen oxides (NO, NO₂...), phosphates.

Unusual fire/explosion Hazards This material is not explosive as defined by established regulatory criteria.

Special fire-fighting procedures None identified.

6. Accidental release measures

Personal Precautions Immediately contact emergency personnel. Keep unnecessary personnel away. Use suitable protective equipment (Section 8). Follow all fire fighting procedures (Section 5).

Environmental precautions and cleanup methods If emergency personnel are unavailable, contain spilled material. For small spills add absorbent (soil may be used in the absence of other suitable materials) scoop up material and place in a sealed, liquid-proof container for disposal. For large spills dike spilled material or otherwise contain material to ensure runoff does not reach a waterway. Place spilled material in an appropriate container for disposal. Minimize contact of spilled material with soils to prevent runoff to surface waterways. See Section 13 for Waste Disposal Information.

Personal Protection in Case of a Large Spill Splash goggles. Full suit. Boots. Gloves. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.

7. Handling and storage

Handling Avoid contact with eyes. Avoid breathing vapour or mist. Avoid prolonged or repeated contact with skin. Avoid contact of spilled material and runoff with soil and surface waterways. Wash thoroughly after handling.

Storage Keep container tightly closed. Protect from freezing. Store away from direct sunlight.

Not Suitable Store away from direct sunlight. Avoid contact with skin and eyes. Handle and open container with care. Avoid breathing mists. This product has been formulated to be used diluted with water. The dilution rate will need to be varied depending on the application. For this information, please refer to the Technical Data Sheet. Wash hands after handling compounds and before eating, smoking, using lavatory, and at the end of day.

8. Exposure controls/personal protection

Ingredient Name

Highly refined mineral oil

Occupational Exposure Limits

EH40-OES (United Kingdom (UK)).

TWA: 5 mg/m³ Form: Oil mist, mineral

STEL: 10 mg/m³ Form: Oil mist, mineral

This product contains a preservative that may release trace amounts of formaldehyde during use.

Control Measures Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapours below their respective occupational exposure limits. Local exhaust ventilation is preferred because it prevents contaminant dispersion into the work area by controlling it at its source.

Hygiene measures After handling, always wash hands thoroughly with soap and water.

Personal protective equipment

Respiratory system None required; however, use of adequate ventilation is good industrial practice.

Skin and body Wear protective clothing if prolonged or repeated contact is likely.

Hands Wear protective gloves if prolonged or repeated contact is likely.

Eyes Avoid contact with eyes. Safety glasses with side shield or chemical goggles.

9. Physical and chemical properties

Flash point	>100 °C (CLOSED CUP)
Pour Point	<0 °C
Colour	Amber.
Odour	Mild
Odour threshold	Not available.
Physical state	Liquid.
Boiling point / range	>100 °C
Density	<1 g/cm ³ at 20 °C
Solubility	Emulsifies in water.
pH	8.9 (Basic.) at 5%
Dispersion Properties	See solubility in water.

10. Stability and reactivity

Conditions to Avoid	High temperatures.
Incompatibility with Various Substances	Reactive with oxidizing agents. Slightly reactive to reactive with acids.
Hazardous Polymerization	Will not occur.

11. Toxicological information

Chronic toxicity

Carcinogenic effects	No component of this product at levels greater than 0.1% is identified as a carcinogen by ACGIH, the International Agency for Research on Cancer (IARC) or the European Commission (EC).
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12. Ecological information

Ecotoxicity

<u>Ingredient Name</u>	<u>Species</u>	<u>Period</u>	<u>Result</u>
N,N'-Methylenebismorpholine	Fish (LC50)	96 hours	55 mg/l

Persistence/degradability	Inherently biodegradable.
Mobility	Liquid. Emulsifies in water.
Environmental hazards	Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

13. Disposal considerations

Disposal Consideration / Waste information	Avoid contact of spilled material and runoff with soil and surface waterways. Consult an environmental professional to determine if local, regional or national regulations would classify spilled or contaminated materials as hazardous waste. Use only approved transporters, recyclers, treatment, storage or disposal facilities.
Hazardous Waste	This product is listed as Hazardous by the EU Directive on hazardous waste. Dispose of according to all national and local applicable regulations.

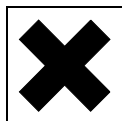
14. Transport information

Not classified as hazardous for transport (ADR, RID, UN , IMO, IATA/ICAO).

15. Regulatory information

Label Requirements

Hazard symbol(s)



Indication of Danger

Irritant

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Version 1.01

Date of issue 15 November 2002

Format United Kingdom (UK)

Language

(BUILD 5.0)

(ENGLISH)

Risk Phrases	R36- Irritating to eyes. R52/53- Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
Safety Phrases	S26- In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. S36/37/39- Wear suitable protective clothing, gloves and eye/face protection. S61- Avoid release to the environment. Refer to special instructions/Safety data sheets.
Restrictions to product use	Classification and labelling have been performed according to EU directives 1999/45/EC and 67/548/EEC as amended and adapted. - Industrial applications.
EU Regulations	Classification and labelling have been performed according to EU directives 1999/45/EC and 67/548/EEC as amended and adapted.

Other Regulations

Inventories

AUSTRALIAN INVENTORY (AICS): Not determined.

CANADA INVENTORY (DSL): Not determined.

CHINA INVENTORY (IECS): Not determined.

EC INVENTORY (EINECS): In compliance.

JAPAN INVENTORY (ENCS): Not determined.

KOREA INVENTORY (ECL): Not determined.

PHILIPPINE INVENTORY (PICCS): Not determined.

US INVENTORY (TSCA): Not determined.

16. Other information

Full text of R-phrases appearing in section 2

R20/21/22- Harmful by inhalation, in contact with skin and if swallowed.
R20/22- Harmful by inhalation and if swallowed.
R36/37/38- Irritating to eyes, respiratory system and skin.
R38- Irritating to skin.
R41- Risk of serious damage to eyes.
R50- Very toxic to aquatic organisms.
R51/53- Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

HISTORY

Date of issue 15/11/2002.

Date of previous issue 12/11/2002.

Prepared by Product Stewardship

Notice to Reader

The data and advice given apply when the product is sold for the stated application or applications. The product is not sold as suitable for any other application. Use of the product for applications other than as stated in this sheet may give rise to risks not mentioned in this sheet. You should not use the product other than for the stated application or applications without seeking advice from us.

If you have purchased the product for supply to a third party for use at work, it is your duty to take all necessary steps to secure that any person handling or using the product is provided with the information in this sheet.

If you are an employer, it is your duty to tell your employees and others who may be affected of any hazards described in this sheet and of any precautions which should be taken.

Further copies of this Safety Data Sheet may be obtained from Castrol.

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