

# Shell Rustkote 943, 945

# Dewatering rust preventive fluid

**Shell Rustkote 943 and 945** are solvent deposited type rust preventive fluids with dewatering properties. Shell Rustkote evaporates and leaves thin dry protective film on the applied surfaces. Drying time will vary according to film thickness and protection time required.

## **Benefits**

- Rapid drying properties.
- High rust protective & dewatering performance
- Highly resistant to salt water and humidity
- Easy to remove by any types of hydrocarbon solvents
- Variety protection periods available
- Excellent demulsibility prolongs changing oil period.

## Shell Rustkote can be applied by dipping, spraying or brushing any dried parts and also parts passed coolant during machining process.

## Degreasing

Hydrocarbon solvents such as white spirit, alkaline solutions or any common degreasing techniques, can remove film layer on the applied surface.

## **Applications**

Shell Rustkote are suitable for rust protection of manufactured components or parts as well as metal parts of machinery.

Typical Physical	Characteristics	Rustkote 943	Rustkote 945	
Appearance		Transparent	Transparent	
		Yellow	Yellow	
Film Type			Oily film	
Flash Point	°C	59	60	
Density	kg/l @ 15 °C	0.801	0.814	
Oil film thickness	Microns	2	3	
Coverage (approx.)	Square M/L	80	70	
Protection Indoors		3	6	
Protection Outdoors	(Under shelter)	-	2	

## Safety Data Sheet

# **Shell Rustkote Fluid 945**

## 1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND COMPANY/UNDERTAKING

 Product Code
 179C0388

 Infosafe No.
 ACN1M AU/eng/C

 Issued Date
 16/02/2006

Product Type/Use Corrosion protective.

Other Names Code

Shell Rustkote Fluid 945 140000000394

Supplier Telephone Numbers

Shell Company of Australia Ltd.

Level 2, 8 Redfern Road, 1800 651 818

Hawthorn East, Victoria 3123 (ABN 46 004 610 459)

**AUSTRALIA** 

**Telephone/Fax Number**Tel: 03 9666 5444 Fax: 03 8823 4800

2. COMPOSITION/INFORMATION ON INGREDIENTS

## **Preparation Description**

Blend of petroleum distillates and additives. Highly refined mineral oils. The highly refined mineral oil contains <3% (w/w) DMSO-extract, according to IP346.

Name	CAS	EINECS	Proportion	Hazard	R Phrase
Paraffinic hydrocar- bons	90622-45-0	292-447-5	30-40 %	Xn	R65, R66
Naphtha (petroleum), hydrodesulfurized heavy	64742-82-1	265-185-4	30-40 %	Xn, N	R10, R65, R66, R67, R51/53
Oxidized wax derivatives	-	-	1-5 %	Xn	R20/22
1,2,4-trimethylbenze ne	95-63-6	202-436-9	1-3 %	Xi, Xn, N	R10, R36/37/38, R20, R51/53
1,3,5-trimethylbenze ne	108-67-8	203-604-4	0.1-1 %	Xi, N	R10, R37, R51/53

#### Other Information

See Section 16 'Other Information' for full text of each relevant Risk Phrase.

## 3. HAZARDS IDENTIFICATION

**Hazards Identification** 

HAZARDOUS SUBSTANCE.



#### DANGEROUS GOODS.

Hazard classification according to the criteria of NOHSC.

Dangerous goods classification according to the Australia Dangerous Goods Code.

## **Human Health Hazards**

Harmful: may cause lung damage if swallowed. Aspiration into the lungs may cause chemical pneumonitis which can be fatal. Repeated exposure may cause skin dryness or cracking. Vapours may cause drowsiness and dizziness. Used oil may contain harmful impurities.

## **Safety Hazards**

Flammable. In use, may form flammable/explosive vapour-air mixture.

#### **Environmental Hazards**

Toxic to aquatic organisms. May cause long term adverse effects in the aquatic environment.

#### 4. FIRST AID MEASURES

## Symptoms and Effects

Aspiration into the lungs may occur directly or following ingestion. This can cause chemical pneumonitis which may be fatal. Prolonged exposure to vapour/mist may give rise to headaches, dizziness, nausea, unconsciousness and irritation to the eyes and upper respiratory tract.

#### Inhalation

Remove to fresh air. If rapid recovery does not occur, obtain medical attention.

#### Skin

Remove contaminated clothing and wash affected skin with soap and water. If persistent irritation occurs, obtain medical attention. When using high pressure equipment, injection of product under the skin can occur. If high pressure injuries occur, the casualty should be sent immediately to a hospital. Do not wait for symptoms to develop.

## Eye

Flush eye with copious quantities of water. If persistent irritation occurs, obtain medical attention.

#### Ingestion

DO NOT INDUCE VOMITING. Protect the airway if vomiting begins. Give water to drink, provided patient is conscious. If breathing but unconscious, place in the recovery position. If breathing has stopped, apply artificial respiration. OBTAIN MEDICAL ATTENTION IMMEDIATELY.

#### **Advice to Doctor**

Treat symptomatically. Aspiration into the lungs may cause chemical pneumonitis. Dermatitis may result from prolonged or repeated exposure. High pressure injection injuries require prompt surgical intervention and possibly steroid therapy, to minimise tissue damage and loss of function.

## 5. FIRE FIGHTING MEASURES

## **Specific Hazards**

The vapour is heavier than air, spreads along the ground and distant ignition is possible. Will float and may be reignited on surface water. Combustion is likely to give rise to a complex mixture of airborne solid and liquid particulates and gases, including carbon monoxide, oxides of sulphur, and unidentified organic and inorganic compounds.

## **Extinguishing Media**

Foam and dry chemical powder. Carbon dioxide, sand or earth may be used for small fires only.

## **Unsuitable Extinguishing Media**

Water in jet. Use of halon extinguishers should be avoided for environmental reasons.



## **Protective Equipment**

Proper protective equipment including breathing apparatus must be worn when approaching a fire in a confined space.

#### Other Information

Keep adjacent containers cool by spraying with water.

#### 6. ACCIDENTAL RELEASE MEASURES

#### **Personal Precautions**

Ventilate contaminated area thoroughly. Avoid contact with skin, eyes, clothing. Take off immediately all contaminated clothing. Wear PVC, Neoprene or nitrile rubber gloves. Wear rubber knee length safety boots and PVC Jacket and Trousers. Wear safety glasses or full face shield if splashes are likely to occur. Vapour can travel along the ground for considerable distances. Remove all possible sources of ignition in the surrounding area and evacuate all personnel. Avoid sparks. Take precautionary measures against static discharge. Shut off leaks, if possible without personal risk.

#### **Environmental Precautions**

Prevent from spreading or entering into drains, ditches or rivers by using sand, earth, or other appropriate barriers. Inform local authorities if this cannot be prevented.

## Clean-up Methods - Small Spillages

Absorb or contain liquid with sand, earth or spill control material. Dispose into a suitable, clearly marked container for disposal or reclamation in accordance with local regulations.

## Clean-up Methods - Large Spillages

Prevent from spreading by making a barrier with sand, earth or other containment material. Reclaim liquid directly or in an absorbent. Dispose of as for small spills.

#### Other Information

Risk of explosion. Inform the emergency services if liquid enters surface water drains. Vapour may form an explosive mixture with air.

## 7. HANDLING AND STORAGE

## Handling

Avoid prolonged or repeated contact with skin, eyes and clothing. Only use in well-ventilated areas. Extinguish any naked flames. Remove ignition sources. Avoid sparks. Do not smoke. Take precautionary measures against static discharges. When using do not eat or drink. When handling product in drums, safety footwear should be worn and proper handling equipment should be used. Prevent spillages. Cloth, paper and other materials that are used to absorb spills present a fire hazard. Avoid their accumulation by disposing of them safely and immediately. In addition to any specific recommendations given for controls of risks to health, safety and the environment, an assessment of risks must be made to help determine controls appropriate to local circumstances.

#### Storage

Use properly labelled and closeable containers. Keep container tightly closed in a dry, well-ventilated place away from direct sunlight and other sources of heat or ignition. All tanks/equipment must be earthed/bonded. Keep in a bunded area. Do not smoke in storage areas.

## **Storage Temperatures**

0°C Minimum, 50°C Maximum,

#### **Recommended Materials**

For containers or container linings, use mild steel or high density polyethylene.

## **Unsuitable Materials**

For containers or container linings, avoid PVC.



## **Other Information**

Polyethylene containers should not be exposed to high temperatures because of possible risk of distortion.

## 8. EXPOSURE CONTROLS, PERSONAL PROTECTION

#### **Exposure Limits**

Substance	Regulations	Exposure Dura- tion	Exposure Limit	Units	Notes
1,3,5-trimethylbe nzene	NOHSC:1003	TWA	25	ppm	
	NOHSC:1003	TWA	123	mg/m3	
Oil mist, mineral	NOHSC:1003	TWA	5	mg/m3	
	NOHSC:1003	STEL	10	mg/m3	
1,2,4-trimethylbe nzene	NOHSC:1003	TWA	25	ppm	
	NOHSC:1003	TWA	123	mg/m3	

NOHSC:1003

Adopted National Exposure Standards for Atmospheric Contaminants in the Occupational Environment [NOHSC:1003(1995)] - 3rd Edition

## **Exposure Controls**

Use local exhaust ventilation if there is a risk of inhalation of vapours, mists or aerosols.

## **Respiratory Protection**

Not normally required. If oil mist cannot be controlled, a respirator fitted with an organic vapour cartridge combined with a particulate pre-filter should be used.

#### **Hand Protection**

PVC or nitrile rubber gloves.

## **Eye Protection**

Wear safety glasses or full face shield if splashes are likely to occur.

#### **Body Protection**

Minimise all forms of skin contact. Overalls and shoes with oil resistant soles should be worn. Launder overalls and undergarments regularly.

## **Environmental Exposure Controls**

Minimise release to the environment. An environmental assessment must be made to ensure compliance with local environmental legislation.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

Colour Clear. Yellow.

Physical StateLiquid at ambient temperature.OdourCharacteristic petroleum solvent.

pH ValueData not available.Vapour Pressure<0.1 kPa at 20°C.</th>

Initial Boiling Point>187°C.Solubility in WaterNegligible.

**Density** 806 kg/m3 at 15°C.

**Auto-Ignition Temperature** Expected to be above 200°C.



**Kinematic Viscosity Evaporation Rate** Vapour Density (Air=1)

Partition co-efficient, n-octanol/water

**Pour Point** 

circa 3 mm2/s at 40°C. Data not available. Greater than 1.

Log Pow expected to be greater than 6.

Data not available.

## 10. STABILITY AND REACTIVITY

## Stability

Stable.

## **Conditions to Avoid**

Heat, flames and sparks.

## **Materials to Avoid**

Strong oxidizing agents.

## **Hazardous Decomposition Products**

Hazardous decomposition products are not expected to form during normal storage.

## 11. TOXICOLOGICAL INFORMATION

## **Basis for Assessment**

Toxicological data have not been determined specifically for this product. Information given is based on a knowledge of the components and the toxicology of similar products.

## **Acute Toxicity - Oral**

LD50 expected to be > 2000 mg/kg. Ingestion can lead to vomiting and aspiration into the lungs, which can result in chemical pneumonitis, which can be fatal.

## **Acute Toxicity - Dermal**

LD50 expected to be > 2000 mg/kg.

## **Acute Toxicity - Inhalation**

Not considered to be an inhalation hazard under normal conditions of use. Vapours may cause drowsiness and dizziness.

## **Eye Irritation**

Expected to be slightly irritating.

#### **Skin Irritation**

Repeated exposure may cause skin dryness or cracking.

## Respiratory Irritation

If mists are inhaled, slight irritation of the respiratory tract may occur.

## Skin Sensitisation

Not expected to be a skin sensitizer.

## Carcinogenicity

Components are not known to be associated with carcinogenic effects.

## Mutagenicity

Not considered to be a mutagenic hazard.

## **Reproductive Toxicity**

Not considered to be toxic to reproduction.



#### Other Information

Prolonged and/or repeated contact with this product can result in defatting of the skin, particularly at elevated temperatures. This can lead to irritation and possibly dermatitis, especially under conditions of poor personal hygiene. Skin contact should be minimised. High pressure injection of product into the skin may lead to local necrosis if the product is not surgically removed. Used oils may contain harmful impurities that have accumulated during use. The concentration of such impurities will depend on use and they may present risks to health and the environment on disposal. ALL used oil should be handled with caution and skin contact avoided as far as possible.

#### 12. ECOLOGICAL INFORMATION

#### **Basis for Assessment**

Ecotoxicological data have not been determined specifically for this product. Information given is based on a knowledge of the components and the ecotoxicology of similar products.

#### Mobility

Liquid under most environmental conditions. Floats on water. Contains volatile components. Partly evaporates from water or soil surfaces, but a significant proportion will remain after one day. If it enters soil, it will adsorb to soil particles and will not be mobile. Large volumes may penetrate soil and could contaminate groundwater.

#### Persistence / Degradability

Not expected to be readily biodegradable. Major constituents are expected to be inherently biodegradable, but the product contains components that may persist in the environment. The volatile components oxidise rapidly by photochemical reactions in air.

#### **Bioaccumulation**

Contains components with the potential to bioaccumulate.

#### **Ecotoxicity**

Poorly soluble mixture. Product is expected to be toxic to aquatic organisms, LL/EL50 1 -10 mg/l. (LL/EL50 expressed as the nominal amount of product required to prepare aqueous test extract).

#### Other Adverse Effects

Not expected to have ozone depletion potential, photochemical ozone creation potential or global warming potential.

## 13. DISPOSAL CONSIDERATIONS

## **Waste Disposal**

Recycle or dispose of in accordance with prevailing regulations, by a recognised collector or contractor. The competence of the contractor to deal satisfactorily with this type of product should be established beforehand. Do not pollute the soil, water or environment with the waste product.

## **Product Disposal**

As for waste disposal.

## **Container Disposal**

All containers should be emptied and returned to the supplier or sent to a drum reconditioner or metal recoverer without removing or defacing markings or labels. Drain container thoroughly. After draining, vent in a safe place away from sparks and fire. Residues may cause an explosion hazard. Do not puncture cut or weld uncleaned drums. Recycle or dispose of in accordance with the legislation in force with a recognised collector or contractor.



## 14. TRANSPORT INFORMATION

ADG U.N. Number

1993

**ADG UN Class** 

3

**ADG Packing Group** 

Ш

**ADG Hazchem Code** 

3[Y]

**ADG Proper Shipping Name** 

FLAMMABLE LIQUIDS, N.O.S. - (CONTAINS LOW BOILING POINT HYDROGEN TREATED NAPHTHA)

**IMDG UN Number** 

1993

**IMDG Hazard Class** 

3

**IMDG Packing Group** 

Ш

**IMDG Proper Shipping Name** 

FLAMMABLE LIQUID, N.O.S. - (CONTAINS LOW BOILING POINT HYDROGEN TREATED NAPHTHA)

**IATA UN Number** 

1993

**IATA Hazard Class** 

3

**IATA Packing Group** 

Ш

**IATA Proper Shipping Name** 

FLAMMABLE LIQUID, N.O.S. - (CONTAINS LOW BOILING POINT HYDROGEN TREATED NAPHTHA)

## 15. REGULATORY INFORMATION

EC Symbols	Xn N	
EC Risk Phrase	R10 Flammable. R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment. R65 Harmful: may cause lung damage if swallowed. R66 Repeated exposure may cause skin dryness and cracking. R67 Vapours may cause drowsiness and dizziness	
EC Safety Phrase	S16 Keep away from sources of ignition - No smoking. S51 Use only in well ventilated areas. S61 Avoid release to the environment. Refer to special instructions/safety data sheet. S62 If swallowed, do not induce vomiting; seek medical advice immediately and show this container or label. S7 Keep container tightly closed.	
EINECS	All components listed or polymer exempt.	

## AICS (Australia)

Not all components listed.



## **National Legislation**

National Code of Practice for the Preparation of Material Safety Data Sheets [NOHSC:2011]

List of Designated Hazardous Substances [NOHSC:10005].

Approved Criteria for Classifying Hazardous Substances [NOHSC:1008].

Adopted National Exposure Standards for Atmospheric Contaminants in the Occupational Environment INOHSC:1003].

Australian Dangerous Goods Code.

Standard Uniform Scheduling of Drugs and Poisons.

## **Hazard Category**

Harmful, Dangerous for the environment, Flammable

## Packaging & Labelling

Contains naphtha (petroleum), hydrodesulfurized heavy.

Safety data sheet available for professional user on request.

#### 16. OTHER INFORMATION

#### References

For detailed advice on Personal Protective equipment, refer to the following Australian Standards:-

HB 9 (Handbook 9) Manual of industrial personal protection.

AS/NZS 1337 Eye protectors for industrial applications.

AS/NZS 1715 Selection, use and maintenance of respiratory protective devices.

AS/NZS 1716 Respiratory protective devices.

#### **Poisons Schedule**

S5

#### Restrictions

This product must be used, handled and applied in accordance with the requirements of the equipment manufacturer's manuals, bulletins and other documentation.

#### List of R Phrases in Section 2

R10 Flammable.

R20 Harmful by inhalation.

R37 Irritating to respiratory system.

R65 Harmful: may cause lung damage if swallowed.

R66 Repeated exposure may cause skin dryness and cracking.

R67 Vapours may cause drowsiness and dizziness

R20/22 Harmful by inhalation and if swallowed.

R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R36/37/38 Irritating to eyes, respiratory system and skin.

## **Technical Contact Numbers**

(03) 9666 5444.

## **Further Information**

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It does not constitute a guarantee for any specific property of the product.

... End Of SDS ...

