Shell Brake and Clutch Fluid DOT 3

Version 2.1 Revision Date 13.06.2022 Print Date 06.09.2023

1. PRODUCT AND COMPANY IDENTIFICATION

Product name : Shell Brake and Clutch Fluid DOT 3

Product code : 001F1490

Manufacturer or supplier's details

Supplier : Shell Pilipinas Corporation

41st FIr The Finance Center, 26th St Cor. 9th Ave, BGC,

1635 Taguig Metro Manila PHILIPPINES

Telephone : (+63) 2 8 802 7600 Telefax : (+63) 2 8 816 6565

Emergency telephone

Contact for Safety Data

number

Sheet

: (+63) 2 8 802 7600

: If you have any enquiries about the content of this SDS

please email lubricantSDS@shell.com

Recommended use of the chemical and restrictions on use

Recommended use : Brake fluid

2. HAZARDS IDENTIFICATION

GHS Classification

Acute toxicity (Oral) : Category 4 Serious eye damage : Category 1

GHS label elements

Hazard pictograms :





Signal word : Danger

Hazard statements : PHYSICAL HAZARDS:

Not classified as a physical hazard under GHS criteria.

HEALTH HAZARDS: H302 Harmful if swallowed.

H318 Causes serious eye damage. ENVIRONMENTAL HAZARDS:

Not classified as an environmental hazard under GHS criteria.

Precautionary statements

Prevention:

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P264 Wash skin thoroughly after handling.

P270 Do not eat, drink or smoke when using this product. P280 Wear protective gloves/ protective clothing/ eye

protection/ face protection.

Response:

P301 + P312 IF SWALLOWED: Call a POISON CENTER/

doctor if you feel unwell.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and

easy to do. Continue rinsing.

P310 Immediately call a POISON CENTER or doctor/

physician.

P330 Rinse mouth.

P337 + P313 If eye irritation persists: Get medical advice/

attention.

Storage:

No precautionary phrases.

Disposal:

P501 Dispose of contents/ container to an approved waste disposal plant.

Hazardous components which must be listed on the label:

Contains Triethylene glycol monobutyl ether.

Contains diethylene glycol.

Other hazards which do not result in classification

Prolonged or repeated skin contact without proper cleaning can clog the pores of the skin resulting in disorders such as oil acne/folliculitis. Used oil may contain harmful impurities. Not classified as flammable but will burn.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture Mixture

Chemical nature Mixture of polyalkylene glycol monoalkyl ethers and

polyalkylene glycol.

Hazardous components

Chemical name	CAS-No.	Classification	Concentration (% w/w)
Triethylene glycol monobutyl ether	143-22-6	Eye Dam.1; H318	< 99
Diethylene glycol	111-46-6	Acute Tox.4; H302	< 50

For explanation of abbreviations see section 16.

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4. FIRST-AID MEASURES

If inhaled : No treatment necessary under normal conditions of use.

If symptoms persist, obtain medical advice.

In case of skin contact : Remove contaminated clothing. Flush exposed area with

water and follow by washing with soap if available.

If persistent irritation occurs, obtain medical attention.

In case of eye contact : Immediately flush eye(s) with plenty of water.

Remove contact lenses, if present and easy to do. Continue

rinsing.

Transport to the nearest medical facility for additional

treatment.

If swallowed : If swallowed, do not induce vomiting: transport to nearest

medical facility for additional treatment. If vomiting occurs spontaneously, keep head below hips to prevent aspiration.

Rinse mouth.

Most important symptoms and effects, both acute and

delaved

Protection of first-aiders

Eye irritation signs and symptoms may include a burning

sensation, redness, swelling, and/or blurred vision.

: When administering first aid, ensure that you are wearing the

appropriate personal protective equipment according to the

incident, injury and surroundings.

Notes to physician : Treat symptomatically.

Call a doctor or poison control center for guidance.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media : Alcohol-resistant foam, water spray or fog. Dry chemical

powder, carbon dioxide, sand or earth may be used for small

fires only.

Unsuitable extinguishing

media

: Do not use water in a jet.

Specific hazards during

firefighting

: Material will not burn unless preheated.

Hazardous combustion products may include:

A complex mixture of airborne solid and liquid particulates and

gases (smoke).

Carbon monoxide may be evolved if incomplete combustion

occurs.

Unidentified organic and inorganic compounds.

Specific extinguishing

methods

Use extinguishing measures that are appropriate to local

circumstances and the surrounding environment.

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Special protective equipment for firefighters

Proper protective equipment including chemical resistant gloves are to be worn; chemical resistant suit is indicated if large contact with spilled product is expected. Self-Contained Breathing Apparatus must be worn when approaching a fire in a confined space. Select fire fighter's clothing approved to relevant Standards (e.g. Europe: EN469).

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures Environmental precautions : Avoid contact with skin and eyes.

: Use appropriate containment to avoid environmental contamination. Prevent from spreading or entering drains, ditches or rivers by using sand, earth, or other appropriate barriers.

Local authorities should be advised if significant spillages cannot be contained.

Methods and materials for containment and cleaning up

Slippery when spilt. Avoid accidents, clean up immediately. Prevent from spreading by making a barrier with sand, earth or other containment material.

Reclaim liquid directly or in an absorbent.

Soak up residue with an absorbent such as clay, sand or other suitable material and dispose of properly.

For small liquid spills (< 1 drum), transfer by mechanical means to a labeled, sealable container for product recovery or safe disposal. Allow residues to evaporate or soak up with an appropriate absorbent material and dispose of safely. Remove contaminated soil and dispose of safely.

For large liquid spills (> 1 drum), transfer by mechanical means such as vacuum truck to a salvage tank for recovery or safe disposal. Do not flush away residues with water. Retain as contaminated waste. Allow residues to evaporate or soak up with an appropriate absorbent material and dispose of safely. Remove contaminated soil and dispose of safely

Additional advice

: For guidance on selection of personal protective equipment see Section 8 of this Safety Data Sheet.

For guidance on disposal of spilled material see Section 13 of this Safety Data Sheet.

Local authorities should be advised if significant spillages

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cannot be contained.

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7. HANDLING AND STORAGE

General Precautions : Use local exhaust ventilation if there is risk of inhalation of

vapours, mists or aerosols.

Use the information in this data sheet as input to a risk assessment of local circumstances to help determine

appropriate controls for safe handling, storage and disposal of

this material.

Advice on safe handling : Avoid prolonged or repeated contact with skin.

Avoid inhaling vapour and/or mists.

When handling product in drums, safety footwear should be worn and proper handling equipment should be used. Properly dispose of any contaminated rags or cleaning

materials in order to prevent fires.

Avoidance of contact : Mineral oils.

Water vapour.

Strong oxidising agents.

Product Transfer : Keep containers closed when not in use. Do not pressurize

drum containers to empty.

Storage

Other data : Tanks must be clean, dry and rust-free.

Keep container tightly closed.

Must be stored in a diked (bunded) well- ventilated area, away from sunlight, ignition sources and other sources of heat. Cleaning, inspection and maintenance of storage tanks is a specialist operation, which requires the implementation of

strict procedures and precautions.

Drums should be stacked to a maximum of 3 high.

Store at ambient temperature.

60 °C maximum

Packaging material : Suitable material: For containers or container linings, use mild

steel or high density polyethylene.

Unsuitable material: PVC.

Container Advice : Polyethylene containers should not be exposed to high

temperatures because of possible risk of distortion.

8. EXPOSURE CONTROLS AND PERSONAL PROTECTION

Components with workplace control parameters

Biological occupational exposure limits

No biological limit allocated.

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Monitoring Methods

Monitoring of the concentration of substances in the breathing zone of workers or in the general workplace may be required to confirm compliance with an OEL and adequacy of exposure controls. For some substances biological monitoring may also be appropriate.

Validated exposure measurement methods should be applied by a competent person and samples analysed by an accredited laboratory.

Examples of sources of recommended exposure measurement methods are given below or contact the supplier. Further national methods may be available.

National Institute of Occupational Safety and Health (NIOSH), USA: Manual of Analytical Methods http://www.cdc.gov/niosh/

Occupational Safety and Health Administration (OSHA), USA: Sampling and Analytical Methods http://www.osha.gov/

Health and Safety Executive (HSE), UK: Methods for the Determination of Hazardous Substances http://www.hse.gov.uk/

Institut für Arbeitsschutz Deutschen Gesetzlichen Unfallversicherung (IFA), Germany http://www.dguv.de/inhalt/index.jsp

L'Institut National de Recherche et de Securité, (INRS), France http://www.inrs.fr/accueil

Engineering measures

The level of protection and types of controls necessary will vary depending upon potential exposure conditions. Select controls based on a risk assessment of local circumstances. Appropriate measures include:

Adequate ventilation to control airborne concentrations.

Where material is heated, sprayed or mist formed, there is greater potential for airborne concentrations to be generated.

General Information:

Define procedures for safe handling and maintenance of controls.

Educate and train workers in the hazards and control measures relevant to normal activities associated with this product.

Ensure appropriate selection, testing and maintenance of equipment used to control exposure, e.g. personal protective equipment, local exhaust ventilation.

Drain down system prior to equipment break-in or maintenance.

Retain drain downs in sealed storage pending disposal or subsequent recycle.

Always observe good personal hygiene measures, such as washing hands after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants. Discard contaminated clothing and footwear that cannot be cleaned. Practice good housekeeping.

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Due to the product's semi-solid consistency, generation of mists and dusts is unlikely to occur.

Personal protective equipment

Protective measures

Personal protective equipment (PPE) should meet recommended national standards. Check with PPE suppliers.

Respiratory protection

: No respiratory protection is ordinarily required under normal conditions of use.

In accordance with good industrial hygiene practices, precautions should be taken to avoid breathing of material. If engineering controls do not maintain airborne concentrations to a level which is adequate to protect worker

health, select respiratory protection equipment suitable for the specific conditions of use and meeting relevant legislation. Check with respiratory protective equipment suppliers. Where air-filtering respirators are suitable, select an

appropriate combination of mask and filter.

Select a filter suitable for the combination of organic gases and vapours and particles [Type A/Type P boiling point >65°C

(149°F)].

Hand protection Remarks

: Where hand contact with the product may occur the use of gloves approved to relevant standards (e.g. Europe: EN374, US: F739) made from the following materials may provide suitable chemical protection. PVC, neoprene or nitrile rubber gloves Suitability and durability of a glove is dependent on usage, e.g. frequency and duration of contact, chemical resistance of glove material, dexterity. Always seek advice from glove suppliers. Contaminated gloves should be replaced. Personal hygiene is a key element of effective hand care. Gloves must only be worn on clean hands. After using gloves, hands should be washed and dried thoroughly. Application of a non-perfumed moisturizer is recommended.

For continuous contact we recommend gloves with breakthrough time of more than 240 minutes with preference for > 480 minutes where suitable gloves can be identified. For short-term/splash protection we recommend the same but recognize that suitable gloves offering this level of protection may not be available and in this case a lower breakthrough time maybe acceptable so long as appropriate maintenance and replacement regimes are followed. Glove thickness is not a good predictor of glove resistance to a chemical as it is dependent on the exact composition of the glove material. Glove thickness should be typically greater than 0.35 mm depending on the glove make and model.

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Eye protection : Wear goggles for use against liquids and gas, combined with

face shield.

Skin and body protection : Skin protection is not ordinarily required beyond standard

work clothes.

It is good practice to wear chemical resistant gloves.

Thermal hazards : Not applicable

Environmental exposure controls

General advice : Take appropriate measures to fulfill the requirements of

relevant environmental protection legislation. Avoid

contamination of the environment by following advice given in Section 6. If necessary, prevent undissolved material from being discharged to waste water. Waste water should be treated in a municipal or industrial waste water treatment plant

before discharge to surface water.

Local guidelines on emission limits for volatile substances must be observed for the discharge of exhaust air containing

vapour.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance : Liquid at room temperature.

Colour : amber, May be dyed

Odour : Ethereal

Odour Threshold : Data not available

pH : 7 - 11.5, As 50% volume aqueous ethanol solution.

Melting point/freezing point : Data not available

pour point Method: Unspecified

Not applicable

Initial boiling point and boiling

range

: > 238 °C / 460 °F

Flash point : $>= 100 \, ^{\circ}\text{C} / >= 212 \, ^{\circ}\text{F}$

Method: Unspecified

Evaporation rate : Data not available Flammability (solid, gas) : Data not available

Upper explosion limit : Data not available
Lower explosion limit : Data not available

Vapour pressure : < 0.5 Pa (20 °C / 68 °F)

estimated value(s)

Relative vapour density : > 1estimated value(s)

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Relative density : 1.038 (20 °C / 68 °F)

Density : 1,038 kg/m3 (20 °C / 68 °F)

Method: ASTM D4052

Solubility(ies)

Water solubility : Miscible.

Solubility in other solvents : Data not available

Partition coefficient: n-

octanol/water

: Data not available

Auto-ignition temperature : > 300 °C / 572 °F

Decomposition temperature : Data not available

Viscosity

Viscosity, dynamic : Data not available

Viscosity, kinematic : 700 - 1250 mm2/s (40 °C / 104 °F)

Method: Unspecified

Explosive properties : Classification Code: Not classified

Oxidizing properties : Data not available

Conductivity : This material is not expected to be a static accumulator.

10. STABILITY AND REACTIVITY

Reactivity : The product does not pose any further reactivity hazards in

addition to those listed in the following sub-paragraph.

Chemical stability : Stable.

Possibility of hazardous

reactions

: Reacts with strong oxidising agents.

Conditions to avoid : Exposure to water vapour.

Extremes of temperature and direct sunlight.

Incompatible materials : Mineral oils.

Water vapour.

Strong oxidising agents.

Hazardous decomposition

products

: No decomposition if stored and applied as directed.

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11. TOXICOLOGICAL INFORMATION

Basis for assessment : Information given is based on data on the components and

> the toxicology of similar products. Unless indicated otherwise, the data presented is representative of the product as a

whole, rather than for individual component(s).

exposure

Information on likely routes of : Skin and eye contact are the primary routes of exposure

although exposure may occur following accidental ingestion.

Acute toxicity

Product:

: LD50 rat: > 200 - 2,000 mg/kg Acute oral toxicity

Remarks: Moderately toxic:

Acute inhalation toxicity : Remarks: Based on available data, the classification criteria

are not met.

Acute dermal toxicity : LD50 Rabbit: > 5,000 mg/kg

Remarks: Low toxicity:

Based on available data, the classification criteria are not met.

Components:

Diethylene glycol:

Acute oral toxicity : LD 50 Rat, male and female: > 5,000 mg/kg

Method: Literature data

Remarks: Based on available data, the classification criteria

are not met.

There is a marked difference in acute oral toxicity between rodents and man, man being more susceptible than rodents. The estimated fatal dose for man is 100 milliliters (1/2 cup). This material has also been shown to be toxic and potentially

lethal by ingestion to cats and dogs.

Acute inhalation toxicity : LC 50 Rat: > 1 -<= 5 mg/l

Exposure time: 4 h Test atmosphere: Aerosol Method: Literature data

Remarks: LC50 greater than near-saturated vapour

concentration.

Based on available data, the classification criteria are not met.

Acute dermal toxicity : LD 50 Rabbit: > 2,000 mg/kg

Method: Literature data

Remarks: Based on available data, the classification criteria

are not met.

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Skin corrosion/irritation

Product:

Remarks: Based on available data, the classification criteria are not met., Slightly irritating to skin., Prolonged or repeated skin contact without proper cleaning can clog the pores of the skin resulting in disorders such as oil acne/folliculitis.

Components:

Diethylene glycol:

Species: Rabbit

Method: Literature data

Remarks: Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation

Product:

Remarks: Risk of serious damage to eyes.

Components:

Diethylene glycol:

Species: Rabbit

Method: Literature data

Remarks: Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation

Product:

Remarks: Not a skin sensitiser.

Based on available data, the classification criteria are not met.

Components:

Diethylene glycol:

Species: Guinea pig

Method: Tested according to Annex V of Directive 67/548/EEC.

Remarks: Based on available data, the classification criteria are not met.

Germ cell mutagenicity

Product:

: Remarks: Non mutagenic, Based on available data, the

classification criteria are not met.

Components:

Diethylene glycol:

Genotoxicity in vitro : Method: OECD Test Guideline 471

Remarks: Based on available data, the classification criteria

are not met.

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: Method: OECD Test Guideline 473

Remarks: Based on available data, the classification criteria

are not met.

: Method: OECD Test Guideline 479

Remarks: Based on available data, the classification criteria

are not met.

Test species: MouseMethod: OECD Test Guideline 474

Remarks: Based on available data, the classification criteria

are not met.

Germ cell mutagenicity-

Assessment

: This product does not meet the criteria for classification in

categories 1A/1B.

Carcinogenicity

Product:

Remarks: Not a carcinogen., Based on available data, the classification criteria are not met.

Components:

Diethylene glycol:

Species: Rat, (male and female)

Application Route: Oral Method: Literature data

Remarks: Based on available data, the classification criteria are not met., Tumours produced in

animals are not considered relevant to humans.

Carcinogenicity - : This product does not meet the criteria for classification in

Assessment categories 1A/1B.

Material	GHS/CLP Carcinogenicity Classification
Triethylene glycol monobutyl ether	No carcinogenicity classification.
Diethylene glycol	No carcinogenicity classification.

Reproductive toxicity

Product:

Remarks: Not a developmental toxicant., Does not impair fertility., Based on available data, the classification criteria are

not met.

Components:

Diethylene glycol:

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> Species: Mouse Sex: male and female Application Route: Oral

Method: Acceptable non-standard method.

Remarks: Based on available data, the classification criteria

are not met.

Effects on foetal Species: Rabbit, female development **Application Route: Oral**

Method: OECD Test Guideline 414

Remarks: Based on available data, the classification criteria

are not met.

Reproductive toxicity -

Assessment

: This product does not meet the criteria for classification in

categories 1A/1B.

STOT - single exposure

Product:

Remarks: Based on available data, the classification criteria are not met.

Components:

Diethylene glycol:

Remarks: Based on available data, the classification criteria are not met., Inhalation of vapours or mists may cause irritation to the respiratory system., Ingestion may cause drowsiness and dizziness.

STOT - repeated exposure

Product:

Exposure routes: Oral Target Organs: Kidney

Remarks: May cause damage to organs or organ systems through prolonged or repeated

exposure.

Components:

Diethylene glycol:

Remarks: Based on available data, the classification criteria are not met.

Repeated dose toxicity

Components:

Diethylene glycol:

Rat, male and female: Application Route: Oral

Method: Acceptable non-standard method.

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Target Organs: No specific target organs noted

Dog, male:

Application Route: Dermal

Method: OECD Test Guideline 410

Target Organs: No specific target organs noted

Aspiration toxicity

Product:

Not an aspiration hazard.

Components:

Diethylene glycol:

Based on available data, the classification criteria are not met.

Further information

Product:

Remarks: 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.

Remarks: Slightly irritating to respiratory system.

Components:

Diethylene glycol:

Remarks: Classifications by other authorities under varying regulatory frameworks may exist.

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.

Unless indicated otherwise, the data presented is representative of the product as a whole, rather than for individual component(s).(LL/EL/IL50 expressed as the nominal amount of product required to prepare aqueous test

extract).

Ecotoxicity

Product:

Toxicity to fish (Acute

toxicity)

Remarks: LL/EL/IL50 > 100 mg/l

Practically non toxic:

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Based on available data, the classification criteria are not met.

Toxicity to crustacean (Acute

toxicity)

Remarks: LL/EL/IL50 > 100 mg/l

Practically non toxic:

Based on available data, the classification criteria are not met.

Toxicity to algae/aquatic

plants (Acute toxicity)

Remarks: LL/EL/IL50 > 100 mg/l

Practically non toxic:

Based on available data, the classification criteria are not met.

Toxicity to fish (Chronic

toxicity)

: Remarks: Data not available

Toxicity to crustacean

(Chronic toxicity)

: Remarks: Data not available

Toxicity to microorganisms

(Acute toxicity)

: Remarks: Data not available

Components:

Diethylene glycol:Toxicity to fish (Acute

toxicity)

: LC50 (Pimephales promelas (fathead minnow)): 75,200 mg/l

Exposure time: 96 h Method: Literature data. Remarks: Practically non toxic:

LL/EL/IL50 > 100 mg/l

Toxicity to crustacean (Acute

toxicity)

EC50 (Daphnia magna (Water flea)): > 10,000 mg/l

Exposure time: 24 h

Method: Other guideline method. Remarks: Practically non toxic:

LL/EL/IL50 > 100 mg/l

Toxicity to algae/aquatic

plants (Acute toxicity)

EC50 (Scenedesmus quadricauda (Green algae)): 2,700 mg/l

Exposure time: 192 h

Method: Information given is based on data obtained from

similar substances.

Remarks: Practically non toxic:

LL/EL/IL50 > 100 mg/l

Toxicity to microorganisms

(Acute toxicity)

: EC20 (Activated sludge, domestic waste): > 1,995 mg/l

Exposure time: 0.5 h

Method: Other guideline method. Remarks: Practically non toxic:

LL/EL/IL50 > 100 mg/l

Toxicity to fish (Chronic

toxicity)

: NOEC: 15,380 mg/l Exposure time: 7 d

Species: Pimephales promelas (fathead minnow)

Method: Other guideline method. Remarks: NOEC/NOEL > 100 mg/l

Toxicity to : NOEC: 8,590 mg/l

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crustacean(Chronic toxicity) Exposure time: 7 d

Species: Ceriodaphnia dubia (Water flea)

Method: Other guideline method. Remarks: NOEC/NOEL > 100 mg/l

Persistence and degradability

Product:

Biodegradability : Remarks: Not readily biodegradable., Major constituents are

inherently biodegradable, but contains components that may

persist in the environment.

<u>Components:</u> Diethylene glycol:

Biodegradability : Biodegradation: 70 - 80 %

Exposure time: 28 d

Method: OECD Test Guideline 301B Remarks: Readily biodegradable.

Oxidises rapidly by photo-chemical reactions in air.

Bioaccumulative potential

Product:

Bioaccumulation : Remarks: Contains components with the potential to

bioaccumulate.

Partition coefficient: n-

octanol/water
Components:
Diethylene glycol:

: Remarks: Data not available

Bioaccumulation : Remarks: Does not bioaccumulate significantly.

Mobility in soil

Product:

Mobility : Remarks: Liquid under most environmental conditions., If it

enters soil, it will adsorb to soil particles and will not be

mobile.

Components:

Diethylene glycol:

Mobility : Remarks: If the product enters soil, one or more constituents

will or may be mobile and may contaminate groundwater.,

Dissolves in water.

Other adverse effects

Product:

Additional ecological

information

: Does not have ozone depletion potential, photochemical ozone creation potential or global warming potential., Product

is a mixture of non-volatile components, which will not be released to air in any significant quantities under normal

conditions of use.

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Poorly soluble mixture., Causes physical fouling of aquatic

organisms.

<u>Components:</u> Diethylene glycol:

Results of PBT and vPvB

assessment

: The substance does not fulfill all screening criteria for persistence, bioaccumulation and toxicity and hence is not

considered to be PBT or vPvB.

Additional ecological

information

: Data not available

13. DISPOSAL CONSIDERATIONS

Disposal methods

Waste from residues : Recover or recycle if possible.

It is the responsibility of the waste generator to determine the toxicity and physical properties of the material generated to determine the proper waste classification and disposal methods in compliance with applicable regulations. Do not dispose into the environment, in drains or in water

courses

Waste product should not be allowed to contaminate soil or ground water, or be disposed of into the environment. Waste, spills or used product is dangerous waste.

Contaminated packaging : Dispose in accordance with prevailing regulations, preferably

to a recognized collector or contractor. The competence of the collector or contractor should be established beforehand. Disposal should be in accordance with applicable regional,

national, and local laws and regulations.

Local legislation

Remarks : Disposal should be in accordance with applicable regional,

national, and local laws and regulations.

14. TRANSPORT INFORMATION

International Regulations

ADR

Not regulated as a dangerous good

IATA-DGR

Not regulated as a dangerous good

IMDG-Code

Not regulated as a dangerous good

Maritime transport in bulk according to IMO instruments

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MARPOL Annex 1 rules apply for bulk shipments by sea.

Special precautions for user

Remarks : Special Precautions: Refer to Section 7, Handling & Storage,

for special precautions which a user needs to be aware of or

needs to comply with in connection with transport.

Additional Information : MARPOL Annex 1 rules apply for bulk shipments by sea.

15. REGULATORY INFORMATION

Safety, health and environmental regulations/legislation specific for the substance or mixture

Product Classification, Labelling and SDS: DOLE Administrative Order 136-14 Guidelines for the Implementation of GHS in Chemical Safety Program in the Workplace.

Other international regulations

The components of this product are reported in the following inventories:

REACH : All components listed.
TSCA : Not established.
PICCS : All components listed.

16. OTHER INFORMATION

Full text of H-Statements

H302 Harmful if swallowed.

H318 Causes serious eye damage.

Full text of other abbreviations

Acute Tox. Acute toxicity
Eye Dam. Serious eye damage

Abbreviations and Acronyms

AIIC - Australian Inventory of Industrial Chemicals; ANTT - National Agency for Transport by Land of Brazil; ASTM - American Society for the Testing of Materials; bw - Body weight; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population

Shell Brake and Clutch Fluid DOT 3

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(Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not Otherwise Specified; Nch - Chilean Norm; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NOM - Official Mexican Norm; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; SADT - Self-Accelerating Decomposition Temperature; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TDG - Transportation of Dangerous Goods; TECI - Thailand Existing Chemicals Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative; WHMIS - Workplace Hazardous Materials Information System

Further information

Training advice : Provide adequate information, instruction and training for

operators.

Other information : A vertical bar (|) in the left margin indicates an amendment

from the previous version.

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