# SAFETY DATA SHEET

## Molybdate TC2 Reagent Solution

Infosafe No.: GBZ1F
ISSUED Date : 09/12/2019
ISSUED by: Suez Water Technologies & Solutions Pty Ltd

## 1. IDENTIFICATION

**GHS Product Identifier**
Molybdate TC2 Reagent Solution

**Product Code**
L2353

**Product Type**
Field Test Reagent.

**Company Name**
Suez Water Technologies & Solutions Pty Ltd (ABN 84 001 221 941)

**Address**
Suez Water Technologies & Solutions
103 Raubers Road Northgate
QLD 4013 AUSTRALIA

**Telephone/Fax Number**
Tel: 1800 064 140 (AUS) 0800 945635 (NZ)
Fax: 1800 648 530 (AUS) 0800 945634(NZ)

**Emergency phone number**
1800 638 556 (Aus)  0800 154 666 (NZ)

**Product Safety Guide**
This product should only be used in accordance to the procedures GE Betz has established for a specific application. For a technical advice contact GE Betz.

**Recommended use of the chemical and restrictions on use**
Field Test Reagent.

**Disclaimer**
Off line MSDS are uncontrolled documents, Current safety data sheets can be accessed via internet on www.msdsonline.com.au/suez/
No liability is accepted for any damages resulting from the use of, or reliance on, this information..

## 2. HAZARD IDENTIFICATION

**GHS classification of the substance/mixture**
Eye Damage/Irritation: Category 2A

**Signal Word (s)**
WARNING

**Hazard Statement (s)**
Causes serious eye irritation.

**Pictogram (s)**
Exclamation mark

**Precautionary statement – Prevention**
Wash contaminated skin thoroughly after handling.
Wear protective gloves/protective clothing/eye protection/face protection.

**Precautionary statement – Response**
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical advice/attention.

**Precautionary statement – Storage**
Store away from incompatible materials.

**Precautionary statement – Disposal**
Dispose of waste and residues in accordance with local authority requirements.

**Supplemental Information**
HSNO code: 6.4A (Substances that are irritating to the eye)

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

**Ingredients**

| Name | CAS | Proportion |
|---|---|---|
| Octylphenoxypolyethoxyethanol | 9036-19-5 | 2.5-10 % |
| Components not classified as dangerous goods | N/A | Balance |

## 4. FIRST-AID MEASURES

**Inhalation**
Move to fresh air. For breathing difficulties, oxygen may be necessary. If breathing stops, provide artificial respiration. Call a physician if symptoms develop or persist.

**Ingestion**
Do not feed anything by mouth to an unconscious or convulsive victim. Do NOT induce vomiting! Dilute contents of stomach using 2-8 fluid ounces (60-240ml) of milk or water. Immediately contact a physician.

**Skin**
Remove contaminated clothing. Wash off with soap and water. Wash clothing separately before reuse. Get medical attention if irritation develops and persists.

**Eye contact**
Immediately flush eyes with plenty of water for at least 15 minutes. Keep eyelids apart. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention immediately.

**Indication of immediate medical attention and special treatment needed if necessary**
Provide general supportive measures and treat symptomatically. Keep victim under observation. Symptoms may be delayed.

**Most important symptoms/effects, acute and delayed**
Severe eye irritation. Symptoms may include stinging, tearing, redness, swelling, and blurred vision

**Other Information**
Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves

## 5. FIRE-FIGHTING MEASURES

**Fire Fighting Measures**
In case of fire and/or explosion do not breathe fumes. Use standard firefighting procedures and consider the hazards of other involved materials. Move containers from fire area if you can do so without risk. Cool containers / tanks with water spray.

**Suitable Extinguishing Media**
Water fog. Foam. Dry chemical powder. Carbon dioxide (CO2)

**Unsuitable Extinguishing Media**
Do not use water jet as an extinguisher, as this will spread the fire.

**Special Protective Equipment for fire fighters**
Wear full protective clothing, including helmet, self-contained positive pressure or pressure demand breathing apparatus, protective clothing and face mask.

**Specific Methods**
Use standard firefighting procedures and consider the hazards of other involved materials

**Specific Hazards Arising From The Chemical**
During fire, gases hazardous to health may be formed

**Decomposition Temperature**
Not available.

**Other Information**
No unusual fire or explosion hazards noted

## 6. ACCIDENTAL RELEASE MEASURES

**Methods And Materials For Containment And Cleaning Up**
Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.

Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS.

**Personal Precautions**
Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.

**Environmental Precautions**
Avoid discharge into drains, water courses or onto the ground

## 7. HANDLING AND STORAGE

**Precautions for Safe Handling**
Avoid contact with eyes. Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.

**Conditions for safe storage, including any incompatibilities**
Keep container tightly closed in a dry and well-ventilated place. Store away from incompatible materials (see Section 10 of the SDS).

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

**Occupational exposure limit values**
This mixture has no ingredients that have PEL, TLV, or other recommended exposure limit

**Biological Limit Values**
No biological exposure limits noted for the ingredient(s)

**Appropriate Engineering Controls**
Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Provide eyewash station.

**Respiratory Protection**
** Avoid breathing of vapours, mists or spray. Select and use respirators in accordance with AS/NZS 1715/1716. When mists or vapours exceed the exposure standards then the use of the following is recommended: Half face-piece respirator with organic vapour (Type A) and dust/mist (Type P1) filters. Filter capacity and respirator type depends on exposure levels.

**Eye Protection**
Splash proof chemical goggles.

**Hand Protection**
Wear appropriate chemical resistant gloves. The choice of an appropriate glove does not only depend on its material but also on other quality features and is different from one producer to the other. Glove selection must take into account any solvents and other hazards present.

**Thermal Hazards**
Wear appropriate thermal protective clothing, when necessary

**Hygiene Measures**
Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

**Form**
Liquid

**Colour**
Colourless

**Odour**
None

**Decomposition Temperature**
Not available.

**Boiling Point**
100 degrees Celsius

**Solubility in Water**
100%

**Specific Gravity**
1.000 @ 21 degrees Celsius

**pH**
pH (concentrated product) 6.5

**Vapour Pressure**
18mm Hg

**Vapour Density (Air=1)**
<1.00

**Evaporation Rate**
<1 (Ether = 1)

**Physical State**
Liquid

**Viscosity**
4cps @ 21 degrees Celsius

**Volatile Component**
0% (Estimated)

**Partition Coefficient: n-octanol/water**
Not available.

**Flash Point**
> 93 degrees Celsius P-M(CC)

**Flammability**
Not applicable

**Auto-Ignition Temperature**
Not available.

**Flammable Limits - Lower**
Not available.

**Flammable Limits - Upper**
Not available.

**Explosion Limit - Upper**
Not available.

**Explosion Limit - Lower**
Not available.

**Melting/Freezing Point**
Not avialable

## 10. STABILITY AND REACTIVITY

**Reactivity**
The product is stable and non-reactive under normal conditions of use, storage and transport

**Chemical Stability**
Material is stable under normal conditions

**Conditions to Avoid**
None under normal conditions

**Incompatible materials**
Strong oxidizing agents

**Hazardous Decomposition Products**
Carbon oxides. Nitrogen oxides (NOx). Hydrogen bromide

**Possibility of hazardous reactions**
Hazardous polymerization does not occur

**Hazardous Polymerization**
Will not occur.

## 11. TOXICOLOGICAL INFORMATION

**Toxicology Information**

| Product | Species | Test Results |
|---|---|---|
| MOLYBDATE TC2 REAGENT SOLUTION (CAS Mixture) | | |
| Acute | | |
| Dermal | | |
| LD50 | Rabbit | > 5000 mg/kg, (Calculated according to GHS additivity formula) |
| Oral | | |
| LD50 | Rat | > 5000 mg/kg, (Calculated according to GHS additivity formula) |

| Components | Species | Test Results |
|---|---|---|
| Octyl phenoxypolyethoxyethanol (CAS 9036-19-5) | | |
| Acute | | |

| | | |
|---|---|---|
| Dermal | | |
| LD50 | Rabbit | > 3000 mg/kg |
| Oral | | |
| LD50 | Rat | 1800 mg/kg |

* Estimates for product may be based on additional component data not shown.

**Ingestion**
May cause slight gastrointestinal irritation.

**Inhalation**
May cause irritation to respiratory organs.

**Skin**
Prolonged or repeated contact may cause irritation.

**Eye**
Causes serious eye irritation.

**Skin corrosion/irritation**
Prolonged skin contact may cause temporary irritation.

**Serious eye damage/irritation**
Causes serious eye irritation.

**Respiratory sensitisation**
Not available.

**Skin Sensitisation**
This product is not expected to cause skin sensitization.

**Germ cell mutagenicity**
No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity**
This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.
IARC Monographs. Overall Evaluation of Carcinogenicity Not listed.
OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050) Not regulated.
US. National Toxicology Program (NTP) Report on Carcinogens Not listed.

**Reproductive Toxicity**
This product is not expected to cause reproductive or developmental effects

**STOT-single exposure**
Not classified

**STOT-repeated exposure**
Not classified

**Aspiration Hazard**
May be harmful if swallowed and enters airways. Based on available data, the classification criteria are not met.

**Human Effects**
Severe eye irritation. Symptoms may include stinging, tearing, redness, swelling, and blurred vision.

**Chronic Effects**
No evidence of potential chronic effects.

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity**
No ecotoxicity data noted for the ingredient(s).

**Persistence and degradability**
No data is available on the degradability of this product.

**Mobility**
No data available.

**Bioaccumulative Potential**
No data available.

**Other Adverse Effects**
No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

## 13. DISPOSAL CONSIDERATIONS

**Disposal considerations**
Collect and reclaim or dispose in sealed containers at licensed waste disposal site.

**Waste Disposal**
Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).

**Container Disposal**
Since emptied containers may retain product residue, follow label warnings even after container is emptied. Empty containers should be taken to an approved waste handling site for recycling or disposal

**Local Legislation**
Dispose in accordance with all applicable regulations.

**Other Information**
The waste code should be assigned in discussion between the user, the producer and the waste disposal company.

## 14. TRANSPORT INFORMATION

**Transport Information**
Not classified as a Dangerous Good for the purposes of road, rail, sea and air transport.

**U.N. Number**
None Allocated

**UN proper shipping name**
None Allocated

**Transport hazard class(es)**
None Allocated

## 15. REGULATORY INFORMATION

**Regulatory information**
All components are exempt or listed in the Australian Inventory of Chemical Substances and the New Zealand Inventory of Chemicals.

**HSNO Approval Number**
Group standard HSR002596 - Laboratory Chemicals and reagent kits

## 16. OTHER INFORMATION

**Contact Person/Point**
New Zealand address:
Level 6, 63 Albert Street, Auckland, 1010 , New Zealand

**Other Information**
Disclaimer:
The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

## END OF SDS

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