Printing date 09/05/2014 Reviewed on 09/05/2014

1 Identification

· Product identifier

· Trade name: M-529

· Relevant identified uses of the substance or mixture and uses advised against

No further relevant information available.

- · Application of the substance / the mixture Corrosion inhibitors
- · Details of the supplier of the safety data sheet
- · Manufacturer/Supplier:

Cortec Corporation

4119 White Bear Parkway

St. Paul, MN 55110 USA

Phone (651) 429-1100

Fax (651) 429-1122

· Information department:

info@cortecvci.com

Product safety department.

· Emergency telephone number:

Spill, Leak, Fire, Exposure, or Accident

24 hour CHEMTREC contact:

USA and Canada 1-800-424-9300

International +1 703-527-3887 (collect calls accepted)

2 Hazard(s) identification

· Classification of the substance or mixture



Skin Irrit. 2 H315 Causes skin irritation.

Eye Irrit. 2B H320 Causes eye irritation.

· Classification according to Directive 67/548/EEC or Directive 1999/45/EC



Irritating to eyes and skin.

· Information concerning particular hazards for human and environment:

The product has to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

- · Label elements
- · GHS label elements The product is classified and labeled according to the Globally Harmonized System (GHS).
- · Hazard pictograms GHS07
- · Signal word Warning
- · Hazard statements

Causes skin and eye irritation.

· Precautionary statements

Wear protective gloves/protective clothing/eye protection/face protection.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Specific treatment (see on this label).

Take off contaminated clothing and wash before reuse.

If skin irritation occurs: Get medical advice/attention.

If eye irritation persists: Get medical advice/attention.

(Contd. on page 2)

(Contd. of page 1)

10-25%

Safety Data Sheet acc. to OSHA HCS

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

· Classification system

NFPA ratings (scale 0-4)



Health = 2Fire = 1Reactivity = 0

· HMIS rating system (0-4)



Health = 2Flammability = 1

- · Other hazards
- · Results of PBT and vPvB assessment
- · **PBT:** Not applicable. · vPvB: Not applicable.

3 Composition/information on ingredients

- · Chemical characterization: Mixtures
- · **Description:** Mixture of the substances listed below with nonhazardous additions.
- · Dangerous components:

CAS: 57855-77-3 EINECS: 260-991-2

Calcium Alkylnaphthalenesulfonate Xi R36/38

(1) Skin Irrit. 2, H315; Eye Irrit. 2A, H319

· Additional information For the wording of the listed risk phrases refer to section 16.

4 First-aid measures

- · Description of first aid measures
- · After inhalation In case of unconsciousness place patient stably on side position for transportation.
- · After skin contact Immediately wash with water and soap and rinse thoroughly.
- · After eve contact

Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.

- · After swallowing If symptoms persist consult doctor.
- · Most important symptoms and effects, both acute and delayed No further relevant information available.
- · Indication of any immediate medical attention and special treatment needed

No further relevant information available.

5 Fire-fighting measures

- · Extinguishing media
- · Suitable extinguishing agents Use fire fighting measures that suit the environment.
- · Special hazards arising from the substance or mixture No further relevant information available.
- · Advice for firefighters
- · Protective equipment: No special measures required.

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

(Contd. of page 2)

6 Accidental release measures

· Personal precautions, protective equipment and emergency procedures





Wear protective equipment. Keep unprotected persons away.

- Environmental precautions: Do not allow to enter sewers/ surface or ground water.
- · Methods and material for containment and cleaning up:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Ensure adequate ventilation.

· Reference to other sections

No dangerous substances are released.

See Section 7 for information on safe handling

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

7 Handling and storage

· Precautions for safe handling

Ensure good ventilation/exhaustion at the workplace.

Prevent formation of aerosols.

- · Information about protection against explosions and fires: No special measures required.
- · Conditions for safe storage, including any incompatibilities
- · Storage
- Requirements to be met by storerooms and receptacles: No special requirements.
- · Information about storage in one common storage facility: Not required.
- $\cdot \ \textbf{Further information about storage conditions:} \ \ \textbf{Keep receptacle tightly sealed}.$
- · Specific end use(s) No further relevant information available.

8 Exposure controls/personal protection

- · Additional information about design of technical systems: No further data; see item 7.
- · Control parameters
- · Components with limit values that require monitoring at the workplace:

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

- · Additional information: The lists that were valid during the creation were used as basis.
- · Exposure controls
- · Personal protective equipment
- · General protective and hygienic measures

The usual precautionary measures for handling chemicals should be followed.

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing

Wash hands before breaks and at the end of work.

Avoid contact with the eyes and skin.

- Breathing equipment: Use suitable respiratory protective device only when aerosol or mist is formed.
- · Protection of hands:

Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

(Contd. on page 4)

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

(Contd. of page 3)

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

· Penetration time of glove material

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

Eye protection: Tightly sealed goggles.Body protection: Protective work clothing.

| 9 Physical and chemical properties | | | | |
|---|---|--|--|--|
| Information on basic physical and chemical properties General Information Appearance: | | | | |
| Form: | Viscous | | | |
| Color: | Brown | | | |
| · Odor: | Characteristic | | | |
| · Odour threshold: | Not determined. | | | |
| · pH-value: | Not determined. | | | |
| Change in condition Melting point/Melting range: Boiling point/Boiling range: | undetermined undetermined | | | |
| · Flash point: | 100 °C (212 °F) | | | |
| · Flammability (solid, gaseous) | Not applicable. | | | |
| · Ignition temperature: | | | | |
| Decomposition temperature: | Not determined. | | | |
| · Auto igniting: | Product is not selfigniting. | | | |
| · Danger of explosion: | Product does not present an explosion hazard. | | | |
| · Explosion limits: Lower: Upper: | Not determined. Not determined. | | | |
| · Vapor pressure: | Not determined. | | | |
| Density at 20 °C (68 °F): Relative density Vapour density Evaporation rate | 0.91-0.92 g/cm³ (7.594-7.677 lbs/gal) Not determined. Not determined. Not determined. | | | |
| · Solubility in / Miscibility with Water: | Not miscible or difficult to mix | | | |
| · Partition coefficient (n-octanol/water): Not determined. | | | | |
| · Viscosity: dynamic: kinematic: | Not determined. Not determined. | | | |
| · Solvent content: Organic solvents: | 55-60 % | | | |
| Solids content: | 35-40 % | | | |

(Contd. on page 5)

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

(Contd. of page 4)

· Other information

The above data are typical values and do not constitute a specification.

10 Stability and reactivity

- · Reactivity
- · Chemical stability
- Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- · Possibility of hazardous reactions No dangerous reactions known
- · Conditions to avoid No further relevant information available.
- · Incompatible materials: No further relevant information available.
- · Hazardous decomposition products: No dangerous decomposition products known

11 Toxicological information

- · Information on toxicological effects
- · Acute toxicity:
- · Primary irritant effect:
- · on the skin: Repeated or prolonged skin contact with this product may produce skin irritation.
- · on the eye: May be irritating.
- · Sensitization: No sensitizing effects known.
- $\cdot \ \textbf{Additional toxicological information:} \\$

The product shows the following dangers according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version:

Irritant

- · Carcinogenic categories
- · IARC (International Agency for Research on Cancer)

None of the ingredients is listed.

· NTP (National Toxicology Program)

None of the ingredients is listed.

· OSHA-Ca (Occupational Safety & Health Administration)

None of the ingredients is listed.

12 Ecological information

- · Toxicity
- · Aquatic toxicity: No further relevant information available.
- · Persistence and degradability No further relevant information available.
- · Bioaccumulative potential No further relevant information available.
- · Mobility in soil No further relevant information available.
- · Additional ecological information:
- · General notes:

Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water.

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

- · Results of PBT and vPvB assessment
- · **PBT:** Not applicable.
- · vPvB: Not applicable.

(Contd. on page 6)

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

· Other adverse effects No further relevant information available.

(Contd. of page 5)

13 Disposal considerations

- · Waste treatment methods
- · Recommendation



Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

- · Uncleaned packagings:
- · Recommendation: Disposal must be made according to official regulations.

| -1 | 4 7 | ٠ | | | P . | 4 • |
|----|-----|---------|------|------|-------|----------|
| | 41. | ranc | nor | m | forma | mon |
| | | T CITTO | OUT. | 7111 | OLIHA | <u> </u> |

| · UN-Number · DOT, ADR, ADN, IMDG, IATA | Void |
|---|-----------------|
| UN proper shipping nameDOT, ADR, ADN, IMDG, IATA | Void |
| · Transport hazard class(es) | |
| · DOT, ADR, ADN, IMDG, IATA · Class | Void |
| · Packing group · DOT, ADR, IMDG, IATA | Void |
| · Environmental hazards: · Marine pollutant: | No |
| · Special precautions for user | Not applicable. |

Not applicable.

15 Regulatory information

· UN "Model Regulation":

- · Safety, health and environmental regulations/legislation specific for the substance or mixture
- · SARA Section 355 (extremely hazardous substances)

· Transport in bulk according to Annex II of

MARPOL73/78 and the IBC Code

None of the ingredients is listed.

· SARA Section 313 (specific toxic chemical listings)

None of the ingredients is listed.

· TSCA (Toxic Substances Control Act)

All ingredients are listed.

· Prop 65 - Chemicals known to cause cancer

None of the ingredients is listed.

(Contd. on page 7)

Printing date 09/05/2014 Reviewed on 09/05/2014

Trade name: M-529

(Contd. of page 6)

· Cancerogenity categories

· EPA (Environmental Protection Agency)

None of the ingredients is listed.

· NIOSH-Ca (National Institute for Occupational Safety and Health)

None of the ingredients is listed.

- · GHS label elements The product is classified and labeled according to the Globally Harmonized System (GHS).
- · Hazard pictograms GHS07
- · Signal word Warning
- · Hazard statements

Causes skin and eye irritation.

· Precautionary statements

Wear protective gloves/protective clothing/eye protection/face protection.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

Specific treatment (see on this label).

Take off contaminated clothing and wash before reuse.

If skin irritation occurs: Get medical advice/attention.

If eye irritation persists: Get medical advice/attention.

· Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Cortec Corporation does not warranty any translation of this SDS not created by Cortec Corporation.

· Date of preparation / last revision 09/05/2014 / -

Abbreviations and acronyms:

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

ICAO: International Civil Aviation Organization

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

DOT: US Department of Transportation

IATA: International Air Transport Association

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

NFPA: National Fire Protection Association (USA)

HMIS: Hazardous Materials Identification System (USA)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

Skin Irrit. 2: Skin corrosion/irritation, Hazard Category 2

Eye Irrit. 2A: Serious eye damage/eye irritation, Hazard Category 2A

Eye Irrit. 2B: Serious eye damage/eye irritation, Hazard Category 2B

* Data compared to the previous version altered.

USA