EC VINYL ESTER CHEMICAL ANCHOR

Revision nr. 3

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Safety Data Sheet

According to Annex II to REACH - Regulation 2015/830

SECTION 1. Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Code: 155 00 10250-90/400

Product name ANCORANTE CHIMICO VINILESTERE CE

1.2. Relevant identified uses of the substance or mixture and uses advised against

Intended use Two-component resin for chemical anchors

1.3. Details of the supplier of the safety data sheet

NameMeccanocar Italia S.r.I.Full addressVia San Francesco, 22District and Country56033 Capannoli (PI)

Italy

Tel. +39 0587 609433 Fax +39 0587 607145

e-mail address of the competent person

responsible for the Safety Data Sheet moreno.meini@meccanocar.it

1.4. Emergency telephone number

For urgent inquiries refer to National Poisons Information Service: +44 121 507 4123

SECTION 2. Hazards identification

2.1. Classification of the substance or mixture

The product is classified as hazardous pursuant to the provisions set forth in (EC) Regulation 1272/2008 (CLP) (and subsequent amendments and supplements). The product thus requires a safety datasheet that complies with the provisions of (EU) Regulation 2015/830.

Any additional information concerning the risks for health and/or the environment are given in sections 11 and 12 of this sheet.

Hazard classification and indication:

Acute toxicity, category 3 H331 Toxic if inhaled.

Skin sensitization, category 1 H317 May cause an allergic skin reaction.
Hazardous to the aquatic environment, chronic toxicity, H411 Toxic to aquatic life with long lasting effects.

category 2

2.2. Label elements

Hazard labelling pursuant to EC Regulation 1272/2008 (CLP) and subsequent amendments and supplements.

Hazard pictograms:

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Signal words: Danger

Hazard statements:

H331 Toxic if inhaled.

H317 May cause an allergic skin reaction.

H411 Toxic to aquatic life with long lasting effects.

Precautionary statements:

P273 Avoid release to the environment.

P391 Collect spillage.

Call a POISON CENTER / doctor / . . . P311

Avoid breathing dust / fume / gas / mist / vapours / spray. P261

P304+P340 IF INHALED: remove person to fresh air and keep comfortable for breathing.

P333+P313 If skin irritation or rash occurs: Get medical advice / attention.

Contains: BENZOILE PEROXIDE

N, N-DIMETHYL-M-TOLUIDINE

2.3. Other hazards

On the basis of available data, the product does not contain any PBT or vPvB in percentage greater than 0,1%.

SECTION 3. Composition/information on ingredients

3.2. Mixtures

Contains:

Identification x = Conc. % Classification 1272/2008 (CLP)

BENZOILE PEROXIDE

CAS 94-36-0 Self-react. B H241, Eye Irrit. 2 H319, Skin Sens. 1 H317, Aquatic Chronic 1 $1 \le x < 3$

H410 M=1

EC 202-327-6

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Reg. no. 01-2119511472-50-XXXX

N, N-DIMETHYL-M-TOLUIDINE

CAS 99-97-8 Acute Tox. 1 H330, Acute Tox. 3 H301, Acute Tox. 3 H311, STOT RE 2 $0,1 \le x < 1$

H373, Aquatic Chronic 3 H412

EC 202-805-4

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Reg. no. 01-2119956633-31-XXXX

The full wording of hazard (H) phrases is given in section 16 of the sheet.

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SECTION 4. First aid measures

4.1. Description of first aid measures

EYES: Remove contact lenses, if present. Wash immediately with plenty of water for at least 15 minutes, opening the eyelids fully. If problem persists, seek medical advice.

SKIN: Remove contaminated clothing. Rinse skin with a shower immediately. Get medical advice/attention immediately. Wash contaminated clothing before using it again.

INHALATION: Remove to open air. If the subject stops breathing, administer artificial respiration. Get medical advice/attention immediately.

INGESTION: Get medical advice/attention immediately. Do not induce vomiting. Do not administer anything not explicitly authorised by a doctor.

4.2. Most important symptoms and effects, both acute and delayed

Specific information on symptoms and effects caused by the product are unknown.

4.3. Indication of any immediate medical attention and special treatment needed

Information not available

SECTION 5. Firefighting measures

5.1. Extinguishing media

SUITABLE EXTINGUISHING EQUIPMENT

The extinguishing equipment should be of the conventional kind: carbon dioxide, foam, powder and water spray.

UNSUITABLE EXTINGUISHING EQUIPMENT

None in particular.

5.2. Special hazards arising from the substance or mixture

HAZARDS CAUSED BY EXPOSURE IN THE EVENT OF FIRE

Do not breathe combustion products.

5.3. Advice for firefighters

GENERAL INFORMATION

Use jets of water to cool the containers to prevent product decomposition and the development of substances potentially hazardous for health. Always wear full fire prevention gear. Collect extinguishing water to prevent it from draining into the sewer system. Dispose of contaminated water used for extinction and the remains of the fire according to applicable regulations.

SPECIAL PROTECTIVE EQUIPMENT FOR FIRE-FIGHTERS

Normal fire fighting clothing i.e. fire kit (BS EN 469), gloves (BS EN 659) and boots (HO specification A29 and A30) in combination with self-contained open circuit positive pressure compressed air breathing apparatus (BS EN 137).

SECTION 6. Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Block the leakage if there is no hazard.

Wear suitable protective equipment (including personal protective equipment referred to under Section 8 of the safety data sheet) to prevent any contamination of skin, eyes and personal clothing. These indications apply for both processing staff and those involved in emergency procedures.

6.2. Environmental precautions

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The product must not penetrate into the sewer system or come into contact with surface water or ground water.

6.3. Methods and material for containment and cleaning up

Collect the leaked product into a suitable container. Evaluate the compatibility of the container to be used, by checking section 10. Absorb the remainder with inert absorbent material.

Make sure the leakage site is well aired. Contaminated material should be disposed of in compliance with the provisions set forth in point 13.

6.4. Reference to other sections

Any information on personal protection and disposal is given in sections 8 and 13.

SECTION 7. Handling and storage

7.1. Precautions for safe handling

Ensure that there is an adequate earthing system for the equipment and personnel. Avoid contact with eyes and skin. Do not breathe powders, vapours or mists. Do not eat, drink or smoke during use. Wash hands after use. Avoid leakage of the product into the environment.

7.2. Conditions for safe storage, including any incompatibilities

Store only in the original container. Store in a ventilated and dry place, far away from sources of ignition. Keep containers well sealed. Keep the product in clearly labelled containers. Avoid overheating. Avoid violent blows. Keep containers away from any incompatible materials, see section 10 for details.

7.3. Specific end use(s)

Information not available

SECTION 8. Exposure controls/personal protection

8.1. Control parameters

N, N-DIMETHYL-M-TOLUIDINE			
Predicted no-effect concentration - PNEC			
Normal value in fresh water	0,014	mg/l	
Normal value in marine water	0,001	mg/l	
Normal value for fresh water sediment	48,245	mg/kg	
Normal value for marine water sediment	48,245	mg/kg	
Normal value of STP microorganisms	1,36	mg/l	
Normal value for the terrestrial compartment	20,365	mg/kg	

Health - Derived no-ef	fect level - DNEL / [OMEL						
	Effects on				Effects on			
	consumers				workers			
Route of exposure	Acute local	Acute systemic	Chronic local	Chronic systemic	Acute local	Acute systemic	Chronic local	Chronic systemic
Oral				0,174 mg/kg bw/d				
Inhalation				0,302 mg/m3				1,224 mg/m3
Skin				0,347 mg/kg bw/d				0,694 mg/kg bw/d

VND = hazard identified but no DNEL/PNEC available ; NEA = no exposure expected ; NPI = no hazard identified.

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8.2. Exposure controls

As the use of adequate technical equipment must always take priority over personal protective equipment, make sure that the workplace is well aired through effective local aspiration.

When choosing personal protective equipment, ask your chemical substance supplier for advice.

Personal protective equipment must be CE marked, showing that it complies with applicable standards.

Provide an emergency shower with face and eye wash station.

HAND PROTECTION

Protect hands with category III work gloves (see standard EN 374).

The following should be considered when choosing work glove material: compatibility, degradation, failure time and permeability.

The work gloves' resistance to chemical agents should be checked before use, as it can be unpredictable. The gloves' wear time depends on the duration and type of use.

SKIN PROTECTION

Wear category II professional long-sleeved overalls and safety footwear (see Regulation 2016/425 and standard EN ISO 20344). Wash body with soap and water after removing protective clothing.

EYE PROTECTION

Wear airtight protective goggles (see standard EN 166).

RESPIRATORY PROTECTION

If the threshold value (e.g. TLV-TWA) is exceeded for the substance or one of the substances present in the product, use a mask with a type A filter whose class (1, 2 or 3) must be chosen according to the limit of use concentration. (see standard EN 14387). In the presence of gases or vapours of various kinds and/or gases or vapours containing particulate (aerosol sprays, fumes, mists, etc.) combined filters are required.

Respiratory protection devices must be used if the technical measures adopted are not suitable for restricting the worker's exposure to the threshold values considered. The protection provided by masks is in any case limited.

If the substance considered is odourless or its olfactory threshold is higher than the corresponding TLV-TWA and in the case of an emergency, wear open-circuit compressed air breathing apparatus (in compliance with standard EN 137) or external air-intake breathing apparatus (in compliance with standard EN 138). For a correct choice of respiratory protection device, see standard EN 529.

ENVIRONMENTAL EXPOSURE CONTROLS

The emissions generated by manufacturing processes, including those generated by ventilation equipment, should be checked to ensure compliance with environmental standards.

Product residues must not be indiscriminately disposed of with waste water or by dumping in waterways.

BENZOILE PEROXIDE

Hand protection: gloves (nitrile rubber, neoprene) tested EN374.

SECTION 9. Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance paste

Colour light grey

Odour characteristic

Odour threshold Not available

pH Not available

Melting point / freezing point Not available

Initial boiling point Not available

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Boiling range Not available Flash point Not available Not available Evaporation rate Not available Flammability (solid, gas) Lower inflammability limit Not available Upper inflammability limit Not available Lower explosive limit Not available Not available Upper explosive limit Not available Vapour pressure Vapour density Not available

Relative density 1,67

Solubility insoluble in water

Partition coefficient: n-octanol/water Not available

Auto-ignition temperature Not available

Decomposition temperature Not available

Viscosity Not available

Explosive properties Not available

Oxidising properties Not available

9.2. Other information

VOC (Directive 2010/75/EC): 0,04 % - 0,66 g/litre

SECTION 10. Stability and reactivity

10.1. Reactivity

Information not available

10.2. Chemical stability

Information not available

10.3. Possibility of hazardous reactions

The product may react violently with water.

BENZOILE PEROXIDE

Decomposition temperature: starts at 105 ° C. Dangerous decomposition, risk of explosion.

10.4. Conditions to avoid

Avoid overheating. Prevent moisture or water from penetrating inside the containers.

BENZOILE PEROXIDE

Temperatures above 30 ° C. Keep away from heat and other causes of fire (risk of exothermic decomposition).

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Protect from light. Protect from frost. Explosion hazard due to shock, friction, fire or other sources of ignition.

N, N-DIMETHYL-M-TOLUIDINE

Heat, sources of ignition.

10.5. Incompatible materials

BENZOILE PEROXIDE

Strong oxidizing agents, powerful reducers, acids, bases, sulfur compounds, heavy metal compounds, heavy metals, rust, ash, powders.

N, N-DIMETHYL-M-TOLUIDINE

Reactive with oxidizing agents.

10.6. Hazardous decomposition products

BENZOILE PEROXIDE

Through thermal decomposition, the formation of very reactive free radicals.

Thermal decomposition for flammable and toxic products: carbon dioxide (CO2), benzoic acid, benzene, phenyl benzoate, diphenyl.

SECTION 11. Toxicological information

11.1. Information on toxicological effects

Metabolism, toxicokinetics, mechanism of action and other information

Information not available

Information on likely routes of exposure

Information not available

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Information not available

Interactive effects

Information not available

ACUTE TOXICITY

LC50 (Inhalation) of the mixture:

5,56 mg/l

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LD50 (Oral) of the mixture:

>2000 mg/kg

LD50 (Dermal) of the mixture:

>2000 mg/kg

BENZOILE PEROXIDE

Method: OECD 401

Reliability: 1

Species: Mouse (ICR; male / female)

Route of exposure: Oral Results: Not classified

Method: Equivalent or similar to OECD 403

Reliability: 2 Species: Rat (albino Spartan; male) Route of exposure: Inhalation (dust)

Results: Not classified

SKIN CORROSION / IRRITATION

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Method: Equivalent or similar to OECD 404

Reliability: 2

Species: Rabbit (New Zealand, Albino) Route of exposure: Dermal

Results: Not irritating

N, N-DIMETHYL-M-TOLUIDINE

Method: OECD 404

Reliability: 1

Species: Rabbit (New Zealand White)

Route of exposure: Dermal Results: Not irritating

SERIOUS EYE DAMAGE / IRRITATION

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Method: US FDA, 21 CFR, Part 191, Hazardous substances test for eye irritants

Reliability: 2

Species: Rabbit (New Zealand White)

Route of exposure: Ocular Results: Slightly irritating

N, N-DIMETHYL-M-TOLUIDINE

Method: OECD 405

Reliability: 1

Species: Rabbit (New Zealand White)

Route of exposure: Ocular Results: Not irritating

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RESPIRATORY OR SKIN SENSITISATION

Sensitising for the skin

BENZOILE PEROXIDE

Method: Equivalent or similar to OECD 429

Reliability: 1

Species: Mouse (CBA / Ca, CBA / JHsd; female)

Route of exposure: Dermal

Results: Category 1 (skin sensitization)

GERM CELL MUTAGENICITY

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Method: OECD 476 in vitro test

Reliability: 1

Species: Mouse lymphoma cells

Results: Negative

Method: OECD 474-test in vivo

Reliability: 1

Species: Mouse (ICR; male) Route of exposure: Oral Results: Negative

CARCINOGENICITY

Does not meet the classification criteria for this hazard class

REPRODUCTIVE TOXICITY

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Method: OECD 422

Reliability: 1

Species: Rat (Sprague-Dawley; male / female)

Route of exposure: Oral

Results: NOAEL (fertility) = 500 mg / kg

Method: OECD 414

Reliability: 1

Species: Rat (Sprague-Dawley)

Route of exposure: Oral

Results: Negative, NOAEL (development) = 300 mg / kg bw / day

STOT - SINGLE EXPOSURE

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Based on available data and through expert judgment, the substance is not classified in the target organ toxicity class for single exposure.

N, N-DIMETHYL-M-TOLUIDINE

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Based on available data and through expert judgment, the substance is not classified in the target organ toxicity class for single exposure.

STOT - REPEATED EXPOSURE

Does not meet the classification criteria for this hazard class

BENZOILE PEROXIDE

Method: OECD 451

Reliability: 1

Species: Mouse (B6C3F1; male / female)

Route of exposure: Dermal

Results: NOAEL> 833 mg / kg bw / day

N, N-DIMETHYL-M-TOLUIDINE

Based on available data and through expert judgment, the substance is not classified in the target organ toxicity class for prolonged or repeated exposure.

ASPIRATION HAZARD

Does not meet the classification criteria for this hazard class

SECTION 12. Ecological information

This product is dangerous for the environment and is toxic for aquatic organisms. In the long term, it have negative effects on acquatic environment. **12.1. Toxicity**

N, N-DIMETHYL-M-TOLUIDINE

 LC50 - for Fish
 52,8 mg/l/96h

 EC50 - for Crustacea
 23,758 mg/l/48h

 EC50 - for Algae / Aquatic Plants
 15,481 mg/l/72h

12.2. Persistence and degradability

BENZOILE PEROXIDE

Rapidly degradable in water, 68% in 28 days.

12.3. Bioaccumulative potential

Information not available

12.4. Mobility in soil

Information not available

12.5. Results of PBT and vPvB assessment

On the basis of available data, the product does not contain any PBT or vPvB in percentage greater than 0,1%.

12.6. Other adverse effects

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Information not available

SECTION 13. Disposal considerations

13.1. Waste treatment methods

Reuse, when possible. Product residues should be considered special hazardous waste. The hazard level of waste containing this product should be evaluated according to applicable regulations.

Disposal must be performed through an authorised waste management firm, in compliance with national and local regulations. CONTAMINATED PACKAGING

Contaminated packaging must be recovered or disposed of in compliance with national waste management regulations.

BENZOILE PEROXIDE

Do not throw waste into the sewers. Discard the product by incineration after dilution in a suitable flammable solvent (in accordance with local and national regulations). The amount of active oxygen must be less than 1%.

SECTION 14 Transport information

obotion 14. Italisport illiotination
The product is not dangerous under current provisions of the Code of International Carriage of Dangerous Goods by Road (ADR) and by Rail (RID), the International Maritime Dangerous Goods Code (IMDG), and of the International Air Transport Association (IATA) regulations.
14.1. UN number
Not applicable
14.2. UN proper shipping name
Not applicable

14.3. Transport hazard class(es)

Not applicable

14.4. Packing group

Not applicable

14.5. Environmental hazards

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Workers exposed to this chemical agent must not undergo health checks, provided that available risk-assessment data prove that the risks related to the

None

None

Healthcare controls

Substances subject to the Stockholm Convention:

workers' health and safety are modest and that the 98/24/EC directive is respected.

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15.2. Chemical safety assessment

A chemical safety assessment has not been performed for the preparation/for the substances indicated in section 3.

SECTION 16. Other information

Text of hazard (H) indications mentioned in section 2-3 of the sheet:

Self-react. B Self-reactive substance or mixture, category B

Acute Tox. 1 Acute toxicity, category 1
Acute Tox. 3 Acute toxicity, category 3

STOT RE 2 Specific target organ toxicity - repeated exposure, category 2

Eye Irrit. 2 Eye irritation, category 2
Skin Sens. 1 Skin sensitization, category 1

Aquatic Chronic 1 Hazardous to the aquatic environment, chronic toxicity, category 1

Aquatic Chronic 2 Hazardous to the aquatic environment, chronic toxicity, category 2

Aquatic Chronic 3 Hazardous to the aquatic environment, chronic toxicity, category 3

H241 Heating may cause a fire or explosion.

H330 Fatal if inhaled.
H301 Toxic if swallowed.
H311 Toxic in contact with skin.

H331 Toxic if inhaled.

H373 May cause damage to organs through prolonged or repeated exposure.

H319 Causes serious eye irritation.
H317 May cause an allergic skin reaction.

H410 Very toxic to aquatic life with long lasting effects.
 H411 Toxic to aquatic life with long lasting effects.
 H412 Harmful to aquatic life with long lasting effects.

EUH014 Reacts violently with water.

LEGEND:

- ADR: European Agreement concerning the carriage of Dangerous goods by Road
- CAS NUMBER: Chemical Abstract Service Number
- CE50: Effective concentration (required to induce a 50% effect)
- CE NUMBER: Identifier in ESIS (European archive of existing substances)
- CLP: EC Regulation 1272/2008
- DNEL: Derived No Effect Level
- EmS: Emergency Schedule
- GHS: Globally Harmonized System of classification and labeling of chemicals
- IATA DGR: International Air Transport Association Dangerous Goods Regulation
- IC50: Immobilization Concentration 50%
- IMDG: International Maritime Code for dangerous goods
- IMO: International Maritime Organization
- INDEX NUMBER: Identifier in Annex VI of CLP
- LC50: Lethal Concentration 50%
- LD50: Lethal dose 50%
- OEL: Occupational Exposure Level
- PBT: Persistent bioaccumulative and toxic as REACH Regulation
- PEC: Predicted environmental Concentration
- PEL: Predicted exposure level
- PNEC: Predicted no effect concentration
- REACH: EC Regulation 1907/2006
- RID: Regulation concerning the international transport of dangerous goods by train
- TLV: Threshold Limit Value

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- TLV CEILING: Concentration that should not be exceeded during any time of occupational exposure.
- TWA STEL: Short-term exposure limit
- TWA: Time-weighted average exposure limit
- VOC: Volatile organic Compounds
- vPvB: Very Persistent and very Bioaccumulative as for REACH Regulation
- WGK: Water hazard classes (German).

GENERAL BIBLIOGRAPHY

- 1. Regulation (EC) 1907/2006 (REACH) of the European Parliament
- 2. Regulation (EC) 1272/2008 (CLP) of the European Parliament
- 3. Regulation (EU) 790/2009 (I Atp. CLP) of the European Parliament
- 4. Regulation (EU) 2015/830 of the European Parliament
- 5. Regulation (EU) 286/2011 (II Atp. CLP) of the European Parliament
- 6. Regulation (EU) 618/2012 (III Atp. CLP) of the European Parliament
- Regulation (EU) 487/2013 (IV Atp. CLP) of the European Parliament
- 8. Regulation (EU) 944/2013 (V Atp. CLP) of the European Parliament
- 9. Regulation (EU) 605/2014 (VI Atp. CLP) of the European Parliament 10. Regulation (EU) 2015/1221 (VII Atp. CLP) of the European Parliament
- 11. Regulation (EU) 2016/918 (VIII Atp. CLP) of the European Parliament
- 12. Regulation (EU) 2016/1179 (IX Atp. CLP)
- 13. Regulation (EU) 2017/776 (X Atp. CLP)
- 14. Regulation (EU) 2018/669 (XI Atp. CLP)
- 15. Regulation (EU) 2018/1480 (XIII Atp. CLP)
- 16. Regulation (EU) 2019/521 (XII Atp. CLP)
- The Merck Index. 10th Edition
- Handling Chemical Safety
- INRS Fiche Toxicologique (toxicological sheet)
- Patty Industrial Hygiene and Toxicology
- N.I. Sax Dangerous properties of Industrial Materials-7, 1989 Edition
- IFA GESTIS website
- **FCHA** website
- Database of SDS models for chemicals Ministry of Health and ISS (Istituto Superiore di Sanità) Italy

Note for users:

The information contained in the present sheet are based on our own knowledge on the date of the last version. Users must verify the suitability and thoroughness of provided information according to each specific use of the product.

This document must not be regarded as a guarantee on any specific product property.

The use of this product is not subject to our direct control; therefore, users must, under their own responsibility, comply with the current health and safety laws and regulations. The producer is relieved from any liability arising from improper uses.

Provide appointed staff with adequate training on how to use chemical products.

Product's classification is based on the calculation methods set out in Annex I of the CLP Regulation, unless otherwise indicated in sections 11 and 12. The data for evaluation of chemical-physical properties are reported in section 9.

Changes to previous review:

The following sections were modified: