# SAFETY DATA SHEET

**Safety Data Sheet according to (EC) No. 1907/2006.**

## SECTION 1: Identification of the substance/mixture and of the company/ undertaking

**1.1. Product identifier:**

QC TEST KIT 1

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

Aqueous preparation for research and analysis. Restricted to professional users.

**1.3. Details of the supplier of the safety data sheet:**

ChemoMetec A/S
Gydevang 43 Phone: (+45) - 48 13 10 20
DK - 3450 Alleroed Fax: (+45) - 48 13 10 21
Denmark e-mail: contact@chemometec.com
Responsible person for the safety data sheet (e-mail): contact@chemometec.com

**1.4. Emergency telephone number:**

NHS (England or Wales): Dial 111 or 0845 4647 NHS 24 (Scotland): Dial 111

## SECTION 2: Hazards identification

**2.1. Classification of the substance or mixture:**

CLP (1272/2008): None

**2.2. Label elements:**

EUH210: Safety data sheet available on request.

**2.3. Other hazards:** Contains Sodium azide. Contact with acids may form toxic gases.

PBT/vPvB: No ingredients are PBT/vPvB, according to the criteria in REACH Annex XIII.

## SECTION 3: Composition/information on ingredients

**3.2. Mixtures:**

| % w/w | Substance name | CAS-no. | EC-no. | Index-no. | REACH reg.no. | Classification |
|---|---|---|---|---|---|---|
| <0.015 | Sodium azide | 26628-22-8 | 247-852-1 | 011-004-00-7 | - | Acute Tox. 2;H300<br>Aquatic Acute 1;H400<br>Aquatic Chronic 1;H410<br>EUH032 |

Wording of hazard statements - see section 16.

## SECTION 4: First-aid measures

**4.1. Description of first aid measures:**

Inhalation: Move the affected person to fresh air. Keep at rest. If needed: Get medical attention.

Skin contact: Remove contaminated clothing and wash skin with water and mild soap. If irritation persists: Seek medical advice.

Eye contact: Immediately flush with water or physiological salt water for at least 15 minutes, holding eyelids open, remember to remove contact lenses, if any. If irritation persists: Seek medical advice.

Ingestion: Rinse mouth and drink plenty of water. In case of discomfort: Seek medical advice.

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

May cause slight irritation of eyes, skin, lungs and gastrointestinal tract.

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

Show this safety data sheet to a physician or emergency ward.

## SECTION 5: Fire-fighting measures

**5.1. Extinguishing media:**

Not flammable.

**5.2. Special hazards arising from the substance or mixture:**

Not relevant (the product is not combustible).

**5.3. Advice for firefighters:**

Do not inhale smoke fumes. When extinguishing surrounding fires use breathing apparatus with an independent source of air.

## SECTION 6: Accidental release measures

**6.1. Personal precautions, protective equipment and emergency procedures:**
Use personal protective equipment - see section 8.
**6.2. Environmental precautions:**
Do not empty into drains – see section 12. Inform appropriate authorities in accordance with local regulations.
**6.3. Methods and material for containment and cleaning up:**
Absorb spilled liquid with inert material and place in a suitable container for disposal. Clean with water. Further handling of spillage - see section 13.
**6.4. Reference to other sections:**
See references above.

## SECTION 7: Handling and storage

**7.1. Precautions for safe handling:**
Provide adequate ventilation. Avoid contact with skin, eyes and clothing. Wash with plenty of water and soap after end use.
**7.2. Conditions for safe storage, including any incompatibilities:**
Store in a tightly closed original container in a well-ventilated area.
**7.3. Specific end use(s):**
See section 1.

## SECTION 8: Exposure controls/Personal protection

**8.1. Control parameters:**
Occupational exposure limits (EH40/2005):

| Substance | TWA (8h) | STEL (15 min.) | Comments |
|---|---|---|---|
| Sodium azide | 0.1 mg/m$^3$ | 0.3 mg/m$^3$ | Sk (can be absorbed through the skin) |

DNEL/PNEC: No CSR.
**8.2. Exposure controls:**
Appropriate engineering controls: Ensure adequate ventilation.
Personal protective equipment:
Inhalation: Normally not necessary.
Skin: Wear protective gloves of e.g. nitrile or butyl (EN374). Breakthrough time, approx. 3 hours.
Eyes: Wear tight fitting safety goggles (EN166) when there is a risk of splashes.
Environmental exposure controls: None particular.

## SECTION 9: Physical and chemical properties

**9.1. Information on basic physical and chemical properties:**

| | |
|---|---|
| Appearance: | Clear liquid with polystyrene beads |
| Odour: | Odourless |
| Odour threshold: | No available data |
| pH: | Neutral |
| Melting point / freezing point (°C): | ~ 0 |
| Initial boiling point and boiling range (°C): | ~ 100 |
| Decomposition temperature (°C): | No available data |
| Flash point (°C): | No available data |
| Evaporation rate: | No available data |
| Flammability (solid, gas): | Not relevant |
| Upper/lower flammability or explosive limits (vol.-%): | Not relevant |
| Vapour pressure (mbar, 25°C): | No available data |
| Vapour density (air=1): | No available data |
| Relative density (g/ml): | ~ 1.0 |
| Solubility: | Completely soluble in water |
| Partition coefficient: n-octanol/water, Log $K_{ow}$: | No available data |
| Auto-ignition temperature (°C): | No available data |
| Viscosity: | No available data |
| Explosive/Oxidising properties: | Not relevant |
| **9.2. Other information:** | None relevant |

## SECTION 10: Stability and reactivity

**10.1. Reactivity:**
No available data.
**10.2. Chemical stability:**
Stable under the recommended storage conditions - see section 7.
**10.3. Possibility of hazardous reactions:**
None known.
**10.4. Conditions to avoid:**
Excessive heating and direct sunlight.
**10.5. Incompatible materials:**
Strong oxidizing agents, reducing agents, strong acids and bases, heavy metals and salts. Sodium azide forms a very toxic gas (hydrogen azide) in contact with acids. Sodium azide may react with lead and copper, to form explosive metalazides.
**10.6. Hazardous decomposition products:**
When heated to high temperatures (decomposition) toxic gasses are formed such as oxides of nitrogen, sodium and carbon, hydrogen chloride and phosgene.

## SECTION 11: Toxicological information

**11.1. Information on toxicological effects:**

| **Hazard class** | **Data** (Sodium azide) | **Test** | **Data source** |
|---|---|---|---|
| Acute toxicity: | | | |
| Inhalation | $LC_{50}$ (rat) = 37 mg/m$^3$ | No info | RTECS |
| Dermal | $LD_{50}$ (rabbit) = 20 mg/kg | No info | RTECS |
| Oral | $LD_{Lo}$ (woman) = 14 mg/kg | No info | RTECS |
| | $LD_{50}$ (rat) = 27 mg/kg | No info | RTECS |
| Corrosion/irritation: | No irritation, skin and eyes | No info | ECHA |
| Sensitization: | No skin sensitization, guinea pig | OECD 419 | ECHA |
| CMR: | $TD_{Lo}$ = 2730 mg/kg/78W (rat, continuous) "Equivocal tumorigenic agent" | No info | RTECS |
| | $TD_{Lo}$ = 177.5 mg/kg (rat, 6-19 days after birth): "Effects on embryo or foetus". | No info | RTECS |

Information on likely routes of exposure: Lungs, skin and ingestion.
Symptoms:
Inhalation: Vapours may cause irritation to the airways.
Skin: May cause irritation by prolonged contact with skin.
Eyes: May cause eye irritation.
Ingestion: May cause irritation of the gastrointestinal tract, nausea, vomiting and headache.
Chronic effects: Sodium azide in its pure form does affect the CNS, is a possible mutagen and have caused carcinogenic effect in rats. No conclusive data for humans.

## SECTION 12: Ecological information

**12.1. Toxicity:**

| **Aquatic** | **Data** (Sodium azide) | **Test (Media)** | **Data source** |
|---|---|---|---|
| Fish | $LC_{50}$ (Lepomis macrochirus, 96h) = 0.68 mg/l | No info | EPA Ecotox |
| Daphnia | $EC_{50}$ (Daphnia pulex, 48h) = 4.2 mg/l | No info | EPA Ecotox |
| Algae | $EC_{50}$ (Pseudokirchneriella subcapitata, 96h) = 0.35 mg/l | No info | EPA Ecotox |

**12.2. Persistence and degradability:**
Sodium azide is an inorganic substance, methods for the determination of the biological degradation is not applicable to inorganic substances
**12.3. Bioaccumulative potential:**
Sodium azide: Log $K_{ow} < 1$ - No significant bioaccumulative potential.
**12.4. Mobility in soil:**
No available/applicable data
**12.5. Results of PBT and vPvB assessment:**
No ingredients are PBT/vPvB, according to the criteria in REACH Annex XIII.
**12.6. Other adverse effects:**
None known

## SECTION 13: Disposal considerations

**13.1. Waste treatment methods:**
The mixture is to be considered as hazardous waste. Disposal should be according to local, state or national legislation. Dispose of through authority facilities or pass to chemical disposal company.
**EWC-code:** 16 05 09 (mixture itself)
15 02 03 (paper towel, inert material etc. contaminated with the mixture)

## SECTION 14: Transport information

Not dangerous goods (ADR/RID/IMDG/IATA).
**14.1. UN-no.:** None
**14.2. UN proper shipping name:** None
**4.3. Transport hazard class(es):** None
**14.4. Packing group:** None
**14.5. Environmental hazards:** No
**14.6. Special precautions for user:** None
**14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code:** Not relevant.

## SECTION 15: Regulatory information

**15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture:**
None
**15.2. Chemical Safety Assessment:**
No CSR.

## SECTION 16: Other information

**Hazard statements mentioned in section 2 and 3:**
H300: Fatal if swallowed.
H400: Very toxic to aquatic life.
H410: Very toxic to aquatic life with long lasting effects.
EUH032: Contact with acids liberates very toxic gas.
EUH210: Safety data sheet available on request.
**Abbreviations:**
CMR = Carcinogenicity, mutagenicity and reproductive toxicity.
CSR = Chemical Safety Report
DNEL = Derived No-Effect Level
$EC_{50}$ = Effect Concentration 50%
FW = Fresh Water
$LC_{50}$ = Lethal Concentration 50%
$LD_{50}$ = Lethal Dose 50%
PBT = Persistent, Bioaccumulative, Toxic
PNEC = Predicted No-Effect Concentration
vPvB = very Persistent, very Bioaccumulative
**Literature:**
ECHA = European Chemicals Agency
EPA Ecotox = The US Environmental Protection Agency's database on ecotoxicological effects for chemicals.
IUCLID = International Uniform ChemicaL Information Database.
RTECS = Register of Toxic Effects of Chemical Substances
**Training advice:**
No special training is required. However, the user should be well instructed in the execution of his/her task, be familiar with this Safety Data Sheet and have normal training in the use of personal protective equipment.
**Other information:**
Prepared based on the information available to Altox A/S as of April 2016.
**Changes since the previous edition:**
1-16

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