

GPS Safety Summary

Substance Name:

Sodium Salt 1,2,4 - Triazole

1. General Statement

Sodium Salt 1,2,4 -Triazole is produced for the use as intermediate for fine chemicals synthesis. The substance is manufactured and handled in industrial settings in closed systems.

2. Chemical Identity

Name: 1H-1,2,4-triazole, sodium salt Brand names: Sodium salt of 1,2,4-triazole chemical name (IUPAC): sodium 1,2,4-triazol-1-ide

 CAS number(s):
 41253-21-8

 ES number:
 255-280-9

 Molecular formula:
 C₂H₃N₃.Na

Structure:

Na⁺

3. Use and applications

Sodium Salt 1,2,4 – Triazole is widely used as intermediate for the synthesis of active ingredients in agrochemicals and pharmaceuticals.

4. Physical / Chemical properties

Sodium Salt 1,2,4 - Triazole is an organic substance having the following characteristics and physical–chemical properties:

Property	Value
Physical state	Solid, powder
Colour	White to light yellow
Odour	Odourless
Density (rel.)	1.649 g/cm3 (20°C)
Melting point	311.5°C
Boiling point	Not applicable (material decomposes before boiling)
Flammability	Non flammable (1,2,4-triazole)

Explosive properties	Non explosive
Self-ignition temperature	Not applicable
Vapour pressure	0.215 Pa at 20°C (1,2,4-triazole)
Water solubility	> 1 000 mg/L at 20°C (1,2,4-triazole)
Flash point	No spontaneous combusting when tested
Octanol-water partition coefficient (log Kow)	Far below 3 (log Kow 1,2,4-triazole)

5. Health Effects

Effect Assessment	Result
Acute Toxicity	Harmful if swallowed
Oral / inhalation / dermal	
Irritation	Highly irritating to eyes
Skin /eye / respiratory tract	Not irritating to skin
Sensitisation	Not sensitizing to skin (1,2,4-triazole)
Toxicity after repeated exposure	No indication for toxicity after repeated exposure
Oral / inhalation / dermal	(1,2,4-triazole)
Genotoxicity / mutagenicity	Not genotoxic / mutagenic
Carcinogenicity	No indication for carcinogenicity
Toxicity for reproduction	Suspected of toxicity for reproduction

6. Environmental Effects

Effect Assessment	Result
Aquatic Toxicity	Harmful to algae

Fate and behaviour	Result
Biodegradation	Considered to be not readily biodegradable
Bioaccumulation potential	No bioaccumulation expected
PBT / vPvB conclusion	Not expected to be either PBT or vPvB

7. Exposure

In occupational settings, Triazole Sodium Salt is used in closed systems. Exposure may take place in case of incidents. In case of unintended exposure during maintenance, sampling, testing or other procedures, workers should follow the recommended safety measures in the Safety Data Sheet (SDS).

8. Risk Management recommendations

Human health measures		
Organizational	Collect the latest available Safety Data Sheet. Implement good basic standards of occupational hygiene. Ensure operatives are well informed of the hazards and trained to minimise exposures. Handle and store according to the indications of the Safety Data Sheet.	
Engineering controls	Provide appropriate local exhaust ventilation at points of emission. Ensure that eye- and handwash stations and safety showers are close to workstation locations.	
Protection	Eye/Face protection:	Safety glasses with side-shields, face-shield
	Skin protection:	Protective suit, boots
	Hand protection:	Polyvinylchloride – neoprene rubber, tested to EN374:1
	Respiratory protection:	Effective dust mask
Environment protective measures		
Do not release into the environment. Do not let product enter drains. Use waste water treatment systems. Do not spread sludge to soil.		

9. Regulatory Information / Classification and Labelling

9.1 Regulatory Information

This substance has been registered under:

EU Regulation EC 1907/2006 (REACH)

9.2 Classification and labelling

Under GHS substances are classified according to their physical, health, and environmental hazards. The hazards are communicated via specific labels and the eSDS. GHS attempts to standardize hazard communication so that the intended audience (workers, consumers, transport workers, and emergency responders) can better understand the hazards of the chemicals in use. Substances registered for REACH are classified according CLP (EC) 1272/2008, implementation of the GHS in the European Union.

Classification		
According to REGULATION (EC) no 1272/2008:		
Acute toxicity – Oral: Category 4		
Eye damage: Category 1		
Reproductive Toxicity: Category 2		
Pictogram		
GHS07: exclamation mark		
— GHS05: corrosion		

GHS08: health hazard



Hazard statement

- H302: Harmful if swallowed
- H318: Causes serious eye damage
- H361d: Suspected of damaging the unborn child

Additional classification according to Globally Harmonized System (GHS)

- Acute toxicity Dermal: Category 5, H 313: May be harmful in contact with skin
- Acute aquatic toxicity, Category 3, H402: Harmful to aquatic life

10. Contact Information within Company

For further information on this substance or product safety summary in general, please contact:

- arkema-thiochem-reach-uses@arkema.com
- ICCA portal where the GPS Safety Summary is posted:
 http://www.icca-chem.org/en/Home/ICCA-initiatives/global-product-strategy/

11. Date of Issues / Revision

Date of issue: 2014/05/15

Date of revision:

12. Disclaimer

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