## CHEREY-NAGE



# **Safety Data Sheet**

## according to Regulations 1907/2006/EC (REACh) and 2015/830/EU

NANOCOLOR Nitrite 4 Page: 1/9 Printing date: 12.01.2023 Date of issue: 12.01.2023 Version: 2.2.2.10

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

1.1 **Product identifier** 

> RFF 985069

Product name NANOCOLOR Nitrite 4

REACH Registration number(s): see SECTION 3.1/3.2 or
A registration number for the substance(s) does not exist because the annual tonnage does not require registration or

the substance or its use is excluded from registration.

20 x 5 mL Nitrite 4 (R0)

1 x 20x 6 mg NANÒFIX Nitrite 4 (R2)

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

Relevant identified uses

Product for analytical use.

Exposure Scenario Classification according REACh, RIP 3.2 Codes: SU 0-2, PC 21, PROC 15, AC 0

The exposure scenario is integrated into sections 1-16.

Uses advised against

not described

#### 1.3 Details of the supplier of the safety data sheet

Manufactured by:

MACHEREY-NAGEL GmbH & Co. KG Valencienner Str. 11, 52355 Düren, Germany

Phone: +49 2421 969 0

E-mail: sds@mn-net.com (msds@mn-net.com)

1.4 **Emergency telephone number** 

Information not necessary.

You find our current versions of SDS in Internet:

Carl Roth GmbH + Co KG Carl Roth Gmbri 7. 3-5

Carl R 76185 Karlsruhe, Germany +49 721 5606 0

sicherheit@carlroth.de

## **SECTION 2: Hazard identification**

### 2.0 Classification of the complete product according to Regulation (EC) 1272/2008

### 2.1 Classification of the substance or mixture according to Regulation (EC) 1272/2008

20x 6 mg NANOFIX Nitrite 4 (R2)

Do not need labelling as hazardous

Signal word

No hazard class

5 mL Nitrite 4 (R0)

Do not need labelling as hazardous

Signal word

No hazard class

List of H phrases: see section 16.2

### 2.2 Label elements according regulation (EC) 1272/2008

20x 6 mg NANOFIX Nitrite 4 (R2)

Do not need labelling as hazardous



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Software: M2 V 6.0.28.156



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Signal word: -

5 mL Nitrite 4 (R0)

Do not need labelling as hazardous

Signal word: -

### Label elements of the complete product

### 2.3 Other hazards

### Possible hazards from physicochemical properties

According to our current status of knowledge and experience we state, that this product does not contain any substances, which in accordance with EC regulations 1272/2008/EC, 1907/2006/EC and German Regulations for Hazardous goods - have to be declared as dangerous goods, either because of their applied concentration or because of their total amount in anyone kit. An individual package has considerably less hazardous potential.

Information pertaining to particular risks to human and possible symptoms

Information pertaining to particular risks to the environment

Possible endocrine disrupting effects

no data available

## **SECTION 3: Composition / information on ingredients**

### 3.1 Substances or 3.2 Mixtures

20x 6 mg NANOFIX Nitrite 4 (R2)

Substance name: sulfanilamide CAS No.: 53-74-1

Substance rating: No criteria for classification or naming of chemical not required.

Formula: C<sub>6</sub>H<sub>8</sub>N<sub>2</sub>O<sub>2</sub>S

Pseudonym (de): 4-Aminobenzolsulfonamid

EC No.: 200-563-4 Concentration: 10 - <30 %

acc. CLP (GHS): The criteria for classification are not fulfilled.

5 mL Nitrite 4 (R0)

Substance name: citric acid
CAS No.: 77-92-9

Substance rating: H319, Eye Irrit. 2, H335, STOT SE 3

Formula: C 6 H 8 O 7
Pseudonym (de): Zitronensäure

REACH Reg. No.: 01-2119457026-42-xxxx

EC No.: 201-069-1 Concentration: 1 - <10 %

acc. CLP (GHS): The criteria for classification are not fulfilled.

### 3.3 Remarks

When not listed, mixtures are added with water [CAS No. 7732-18-5] to 100%.List of H and P phrases: see section 16.2.

### **SECTION 4: First aid measures**

### 4.1 Description of first aid measures

Place insured person out of danger zone to fresh air immediately.

4.1.1 After SKIN Contact

Not necessary.

4.1.2 After EYE Contact

Not necessary.



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4.1.3 After INHALATION of vapours

Not necessary. -

4.1.4 After ORAL Intake

Not necessary.

- 4.2 Most important symptoms and effects, both acute and delayed
- 4.3 Indication of any immediate medical attention and special treatment needed No additionally recommendations. ---

## SECTION 5: Firefighting measures

### 5.1 Extinguishing media

5.1.1 Suitable extinguishing media

Fire extinguishers appropriate to the fire classification, and, if applicable, a fire blanket must be available in a prominent location in the work area. All extinguishers like FOAM, WATER SPRAY, DRY POWDER, CARBON DIOXIDE can be used. Fire extinguishers appropriate to the fire classification, and, if applicable, a fire blanket must be available in a prominent location in the work area. All extinguishers like FOAM, WATER SPRAY, DRY POWDER, CARBON DIOXIDE can be used.

5.1.2 Unsuitable extinguishing media

no data available

Special hazards arising from the substance or mixture 5.2

None

5.3 Advice for firefighters

No, for listed product. Product package burns like paper or plastic.

Additional information 5.4

### SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Do not breathe vapours. Not necessary.

6.2 **Environmental precautions** 

not necessary

6.3 Methods and material for containment and cleaning up

Clean working area with water. Flush used water into drains.

6.4 Reference to other sections

## **SECTION 7: Handling and storage**

7.1 Precautions for safe handling

Handling in accordance with the test instruction, that comes with the product. Use a safety bottle when shaking test tubes.

7.2 Conditions for safe storage, including any incompatibilities

> Safe storage is guaranteed in the original packaging . Storage class (German chemical industry): see chapter 12.1 Storage class (VCI): 12 3

Water hazard class (DE):

7.2.1 Requirements for stock rooms and containers

Keep original product packages tightly closed during handling and storage.

7.3 Specific end use(s)

Product for analytical use.



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## **SECTION 8: Exposure controls /personal protection**

#### 8.1 Control parameters

20x 6 mg NANOFIX Nitrite 4 (R2)

Chemical: sulfanilamide CAS No.: 63-74-1

5 mL Nitrite 4 (R0)

CAS No.: 77-92-9 Chemical:

PNEC (fresh water): 440 mg/L PNEC = Predicted No Effected Concentration TRGS 900 (DE): 2 E mg/m³ E/e respirable

Short-term exposure factor: 2 (I) Y skin resorptive (H), respiratory sensitizable (Sa), skin sensitizable (Sh), teratogenic (Z) not securely excluded / (Y) certainly excluded

### 8.2 **Exposure controls**

Not necessary. Good ventilation and extraction system in the room, floor resistant to chemicals with floor drainage and washing facilities.

8.2.1 Respiratory protection

Not necessary

8.2.2 Skin protection / Hand protection

Not necessary.

8.2.3 Eye / Face Protection

Not necessary

8.2.4 Skin protection

Not necessary

8.2.5 Personal hygiene

Information not necessary.

Thermal hazards 8.2.6

no data available

### 8.3 Limitation and monitoring of environmental exposure

Information not necessary.

## **SECTION 9: Physical and chemical properties**

#### 9.1 Information on basic physical and chemical properties

### 20x 6 mg NANOFIX Nitrite 4 (R2)

a) State of aggregation: b) Colour: colourless c) Odor: odorless d) Melting point: no data available e) Boiling point: no data available f) Flammability: no data available g) Explosive limits (lower / upper): no data available h) Flash point: no data available i) Flashing temperature: no data available j) Decomposition temperature: no data available k) pH value: 5-7 I) Kinematic viscosity: no data available m) Solubility in water: 0-100 % n) Dispersion coefficient (o/w): no data available o) Vapour pressure (20°C): no data available p) Specific gravity: no data available q) Relative vapour density (air=1) no data available r) Particle size: no data available

5 mL Nitrite 4 (R0)

a) State of aggregation: liquid b) Colour: colourless c) Odor: odorless d) Melting point: no data available e) Boiling point: no data available



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f) Flammability: no data available g) Explosive limits (lower / upper): no data available h) Flash point: no data available i) Flashing temperature: no data available j) Decomposition temperature: no data available k) pH value: 2-3 I) Kinematic viscosity: no data available m) Solubility in water: 0-100 % n) Dispersion coefficient (o/w): no data available o) Vapour pressure (20°C): no data available p) Specific gravity: no data available q) Relative vapour density (air=1): no data available r) Particle size: no data available

### 9.2 Other information

No data is available for the other parameters for the mixtures, since no registration and no chemical safety report is required. **Properties relevant to substance groups** 

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## **SECTION 10: Stability and reactivity**

10.1 Reactivity

None

10.2 Chemical stability

no known instability.

### 10.3 Possibility of hazardous reactions

None

### 10.4 Conditions to avoid

Observe the storage temperature printed on it. Not known.

### 10.5 Incompatible materials

Not known.

### 10.6 Hazardous decomposition products

In the original package all parts/all reagents are safety and separated stored. Decompositions are not observed during the expiration period under recommended conditions.

## **SECTION 11: Toxicological information**

### 11.1 Information on the hazard classes according regulation (EC) 1272/2008

Following information is valid for pure substances. Quantitative data on the toxicity of this product are not available.

### 20x 6 mg NANOFIX Nitrite 4 (R2)

Chemical: sulfanilàmide CAS No.: 63-74-1

TSCA Inventory: listed Korea Exist.Chem.Inventory: KE-01188 LD50 orl rat: 3900 mg/kg

5 mL Nitrite 4 (R0)

Chemical: citric acid CAS No.: 77-92-9

TSCA Inventory: listed
Korea Exist.Chem.Inventory: KE-20831
LD50 orl rat: > 3000 mg/kg
LC50 ihl rat: 5,800 mg/L
LD50 orl mus: 5400 mg/kg
LD50 scu rat: 5500 mg/kg



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#### 11.2 Other hazards

Possible endocrine disrupting effects

no data available

Other information

no additional data available

## **SECTION 12: Ecological information**

#### 12.1 **Toxicity**

Following information is valid for pure substances.

20x 6 mg NANOFIX Nitrite 4 (R2)

sulfanilamide Chemical: CAS No.: 63-74-1

Water hazard class (DE): WGK No.: n.n.

Storage class (VCI): 12-13

5 mL Nitrite 4 (R0)

CAS No.: 77-92-9 Chemical: citric acid

PNEC (fresh water):
PNEC = Predicted No Effected Concentration 440 mg/L

LC50 leuciscus idus/96h: 440-760 mg/L EC50 daphnia/48h: 1535 <sub>24h</sub> mg/L 7d: 425-640 mg/L IC50 scenedesmus quadricauda/72h: EC0: >10 g/L EC10 pseudomonas putita/16h

WGK No.: 0057 Water hazard class (DE):

-1.72 Dispersion coefficient (o/w): Storage class (VCI): 12-13

#### 12.2 Persistence and degradability

not necessary

#### 12.3 Bioaccumulative potential

not necessary

### 12.4 Mobility in soil

not necessary

### 12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT) or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher

#### 12.6 **Endocrine disrupting properties**

no data available

#### 12.7 Other adverse effects

no additional data available

## **SECTION 13: Disposal considerations**

Not necessary.

#### 13.1 Waste treatment methods

GENERAL: Empty solids into municipal waste, empty liquids diluted into drains. Not necessary, see above.

## **SECTION 14: Transport information**

14.1 - 14.4 Not necessary

#### 14.5 **Environmental hazards**

#### 14.6 Special precautions for user

not necessary



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### 14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code Not applicable.

## **SECTION 15: Regulatory information**

### 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

Dangerous Substances Protection Act (DE: Chemikaliengesetz - ChemG), Aug 2013, Stand: Okt 2020 Ordinance on protection against dangerous substances (E: Gefahrstoffverordnung - GefStoffV), Nov 2010, Stand: Mrz 2017 MN leaflet/instructions for use, also at www.mn-net.com If necessary, observe other country-specific regulations.

#### 15.2 Chemical safety assessment

### **SECTION 16: Other information**

#### 16.1 Changes compared to the last version

Between versions 2.2.2.10 and 2.2.2.2 following changes were applied: - 8 substance data corrected

### 16.2 List of H and P phrases

- 16.2.1 List of relevant H phrases
- 16.2.2 List of relevant P phrases

#### 16.3 Recommended restriction on use

#### 16.4 Sources of key data

KÜHN, BIRETT, Leaflets on hazardous materials, 2021

Directive 1999/92/EG Minimum requirements to improve the safety and health protection of workers at risk from potentially explosive

SUVA .CH, limit values in the air at work 2009, revised on 01/2009

Regulation 790/2009/EU, adaptation of Regulation 1272/2008/EU to technical and scientific progress (1st ATP)

Regulation 453/2010/EU, adaptation of the REACH regulation 1907/2006/EG

Regulation 487/2013/EU, adaptation of regulation 1272/2008/EG to technical and scientific progress (4th ATP)

Regulation 1221/2015/EU, adaptation of regulation 1272/2008/EG to technical and scientific progress (7th ATP)

Regulation 776/2017/EU, adaptation of regulation 1272/2008/EG to technical and scientific progress (10th ATP)

Regulation 669/2018/EU, adaptation of Regulation 1272/2008/EC to technical and scientific progressText (11th ATP)

Regulation 1480/2018/EU, adaptation of regulation 1272/2008/EG to technical and scientific progress (13th ATP)

Regulation 521/2019/EU, adaptation of regulation 1272/2008/EG to technical and scientific progress (12th ATP) TRGS 900, German rules of technology on limit values in the air at work, as of 03/2019

Regulation 217/2020/EU, adaptation of Annex VI, Part 3, of Regulation 1272/2008/EC to technical and scientific progress (14th ATP)

Regulation 878/2020/EU, adaptation of Annex VI, Part 3, of Regulation 1907/2008/EC to technical and scientific progress (15th ATP)

Regulation 1182/2020/EU, adaptation of Annex VI, Part 3, of Regulation 1272/2008/EC to technical and scientific progress (15th ATP)

Regulation 643/2021/EU, adaptation of Annex VI, Part 1, of Regulation 1272/2008/EC to technical and scientific progress (16th ATP) Regulation 849/2021/EU, adaptation of Annex VI, Part 3, of Regulation 1272/2008/EC to technical and scientific progress (17th ATP)

### revisions/updates

2014-02 Corrected structure of the sections according to Regulation 453/2010/EU, if necessary Reason for revision:

2014-04 adjustment according Regulation 487/2013/EU 2016-03 adjustment according Regulation 1221/2015/EU

2017-11 adjustment according the ECHA registration dossier 2022-11 adjustment according Regulation 878/2020/EU

#### 16.5 **Further information**

MACHEREY-NAGEL GmbH & Co. KG provides the information contained herein in good faith being up-to-date of own realizations at revision time. This document is intended only as a guide to the appropriate precautionary handling of the material by a properly trained person using this product. Individuals receiving the information must exercise their independent judgement in determining its appropriateness for a particular purpose.

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### 16.6 Legend / Abbreviations

acc: according

ADR: Convention concerning the International Carriage of Dangerous Goods by Road

Act: acute

BAT: biological workplace tolerance value

CAO: Cargo Aircraft Only

Carc: carcinogen

CAS: Chemical Abstracts Service

CLP: Classification, Labelling and Packaging regulation

CMR: carcinogen, mutagen, reproduction toxic

Corr: corrosive

COD: chemical oxigen demand

CSCL: Chemical Substance Control Law (Jp)

Dam: damage

DNEL: Derived No-Effect Level (for workers)

derm: dermal dog: dog

EC10: Concentration causing a toxic effect in 10% of the test organisms

EC: European Community

EC-Nr: Substance number of the EC substance inventory EmS: Guide to accident management measures on ships

EU: European Union fish: fish (not spezified)

GHS: Global Harmonized System of Classification and Labeling of Chemicals

gpg: guinea pig ICAO: Internationa

ICAO: International Civil Aviation Organization

ihl: inhaled

IMDG: International Maritime Dangerous Goods Code

intrav: intravenous ipt: intraperitonaeal

İSHL: Industrial Safety and Health Law (Jp)

LC50: letale concentration 50%
LD50: letale dosis 50%
leuciscus idus: fisch, ide, orfe
MAK: maximum workplace concentration

MAK: maximur Met: Metall mus: mouse

Muta: mutagen
NIOSH: National Institute for Occupational Safety and Health (US)

NRD: Non-rapidly degradable

onchorhynchus mykiss: fish, rainbow trout

orl: oral

OSHA: Occupational Safety and Health Administration PAX: transport on passenger planes allowed persistent, bioaccumulating, toxic substance

pH: pH value

pimephales promelas: fish, fathead minnow PNEC: Predicted No Effected Concentration PROC 15: Process category 'for laboratory use'

PRTR: Law for PRTR and Promotion of Chemical Management (Jp)

PVC: polyvinyl chloride quail: bird, quail rat: rat rbt: rabbit

RD: rapidly degradable

RE: repeated

REACh: Registration, Evaluation, Authorisation and Restriction of Chemicals

REF: item number, reference number

Reg.No.: rRegistration number Repr: harmful to reproduction

Resp: respiratory

RIP: REACH Implementations Projects

scu: sub cutan
SDS: safety data sheet
Sens: sensitisation

STEL: short term exposure limit
STOT: Specific Target Organ Toxicity
SVHC: Substance of Very High Concern

t/a: tons per year



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TCCA: Toxic Chemicals Control Act (S. Korea)

Tox: TSCA: The Toxic Substances Control Act (US)

TWA: time weighted average TRGS: technical regulations (DE)

vPvB: very persistent, very bioaccumulating substance

### 16.7 **Training advice**

Regular safety training. Multiple safety training of staffs about danger and protection by using hazards in working area. Additionally training and introduction of staffs for using these products.

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