Orange Serum Agar

Safety Data Sheet

according to the WHS Regulations
Issue date: 8/10/2025 Version: 1.0

SECTION 1: Product identifier

1.1. GHS Product identifier

Product form : Mixture
Trade name : Orange Serum Agar
Product code : NCM0054

1.2. Other means of identification

Part Number(s) : NCM0054|400000771|700003113|NCM0054A|700003114|NCM0054B|700003115|NCM0054C|700004437|NCM0054D|700003116|NCM0054E

1.3. Recommended use of the chemical and restrictions on use

Recommended use : Laboratory chemicals
Scientific research and development

1.4. Details of manufacturer or importer

Manufacturer
Neogen Corporation
620 Lesher Place
Lansing Michigan 48912
United States of America
T 800.234.5333
sds@neogen.com - https://www.neogen.com/

Importer
Neogen Australasia Pty Ltd
14 Hume Drive
Bundamba Queensland 4304
Australia
T 07 3736 2134
naa@neogen.com - https://www.neogen.com/

1.5. Emergency phone number

Emergency number : 24 hours:
Medical: 1-800-498-5743 (U.S. and Canada) or 1-651-523-0318 (international)
Spill/CHEMTREC: 1-800-424-9300 (U.S. and Canada) or 1-703-527-3887 (international)

Country/Area	Organisation/Company	Address	Emergency number	Comment
Australia	NSW Poisons Information Centre The Children's Hospital at Westmead	Locked Bag 4001 NSW 2145 Westmead	13 11 26	

SECTION 2: Hazard identification

2.1. Classification of the hazardous chemical

Classification according to the model Work Health and Safety Regulations (WHS Regulations)

Acute toxicity (oral), Category 5	H303
Acute toxicity (dermal), Category 5	H313
Serious eye damage/eye irritation, Category 2A	H319

2.2. GHS Label elements, including precautionary statements

Hazard pictograms (GHS AU) :

Exclamation mark

Signal word (GHS AU) : Warning
Contains : Peptones, casein (≥ 25 – < 50 %); potassium dihydrogenorthophosphate (≥ 5 – < 10 %); L-(+)-tartaric acid (≥ 1 – < 5 %)

Hazard statements (GHS AU)	:	H303+H313 - May be harmful if swallowed or in contact with skin H319 - Causes serious eye irritation
Precautionary statements (GHS AU)	:	P264 - Wash hands, forearms and face thoroughly after handling. P280 - Wear protective gloves/protective clothing/eye protection/face protection/hearing protection. P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P312 - Call a POISON CENTER or doctor if you feel unwell. P337+P313 - If eye irritation persists: Get medical advice/attention.
Unknown acute toxicity (GHS AU)	:	16.18% of the mixture consists of ingredient(s) of unknown acute toxicity (Oral) 92.77% of the mixture consists of ingredient(s) of unknown acute toxicity (Dermal) 100% of the mixture consists of ingredient(s) of unknown acute toxicity (Inhalation (Dust/Mist))

2.3. Other hazards which do not result in classification

No additional information available

SECTION 3: Composition and information on ingredients

Name	CAS-No.	%	Classification according to the model Work Health and Safety Regulations (WHS Regulations)
L-(+)-tartaric acid	87-69-4	≥ 1 – < 5	Acute Tox. 5 (Oral), H303 Acute Tox. 5 (Dermal), H313 Skin Corr./Irrit. Not classified Eye Dam. 1, H318 Aquatic Acute 3, H402 Aquatic Chronic 3, H412
Other substances (not contributing to the classification of this product)	-	95 – 99	-

SECTION 4: First aid measures

4.1. Description of necessary first-aid measures

First-aid measures general	:	Call a poison center or a doctor if you feel unwell.
First-aid measures after inhalation	:	Remove person to fresh air and keep comfortable for breathing.
First-aid measures after skin contact	:	Wash skin with plenty of water. Take off contaminated clothing.
First-aid measures after eye contact	:	Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.
First-aid measures after ingestion	:	Rinse mouth. Call a poison center or a doctor if you feel unwell.
Self protection of the first-aider	:	First aid workers will be equipped with suitable personal protective equipment.

4.2. Symptoms caused by exposure

Symptoms/effects after inhalation	:	None under normal conditions. Dust of the product, if present, may cause respiratory irritation after excessive inhalation exposure.
Symptoms/effects after skin contact	:	May be harmful in contact with skin.
Symptoms/effects after eye contact	:	Eye irritation.
Symptoms/effects after ingestion	:	May be harmful if swallowed.

4.3. Medical attention and special treatment

Other medical advice or treatment	:	Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media	:	Water spray. Dry powder. Foam.

Unsuitable extinguishing media : Do not use a heavy water stream.

5.2. Specific hazards arising from the chemical

Fire hazard : No fire hazard.
Explosion hazard : No direct explosion hazard.
General measures : Notify authorities if product enters sewers or public waters. Absorb spillage to prevent material damage.
Hazardous decomposition products in case of fire : Toxic fumes may be released.

5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions : Fight fire from safe distance and protected location. Do not enter fire area without proper protective equipment, including respiratory protection.
Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures : Notify authorities if product enters sewers or public waters. Absorb spillage to prevent material damage.

6.1.1. For non-emergency personnel

Protective equipment : Wear recommended personal protective equipment.
Emergency procedures : Ventilate spillage area. Avoid contact with skin, eyes and clothing.

6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".
Emergency procedures : Evacuate unnecessary personnel.

6.2. Environmental precautions

Avoid release to the environment.

6.3. Methods and materials for containment and cleaning up

For containment : Using a clean shovel, put the material in a dry container and cover without compressing it.
Methods for cleaning up : Mechanically recover the product.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Ensure good ventilation of the work station. Do not get in eyes, on skin, or on clothing. Wear personal protective equipment.
Hygiene measures : Wash contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Always wash hands after handling the product.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Keep in a cool, well-ventilated place away from heat.
Storage conditions : Keep cool. Protect from sunlight.
Storage temperature : 2 – 30 °C
Packaging materials : Store always product in container of same material as original container.

SECTION 8: Exposure controls and personal protection

8.1. Control parameters - exposure standards

No additional information available

8.2. Monitoring methods

No additional information available

8.3. Engineering controls

Appropriate engineering controls : Ensure good ventilation of the work station.

8.4. Individual protection measures, such as personal protective equipment (PPE)

Personal protective equipment : Wear recommended personal protective equipment.
Hand protection : Protective gloves
Eye protection : Safety glasses
Skin and body protection : Wear suitable protective clothing
Respiratory protection : In case of insufficient ventilation, wear suitable respiratory equipment

Personal protective equipment symbol(s)

Environmental exposure controls : Avoid release to the environment.

SECTION 9: Physical and chemical properties

Physical state : Solid
Appearance : Powder.
Colour : Beige
Odour : Characteristic
Odour threshold : No data available
pH : 5.3 – 5.7
pH solution : No data available
Relative evaporation rate (butylacetate=1) : No data available
Melting point / Freezing point : Freezing point: Not applicable
Boiling point : No data available
Flash point : Not applicable
Auto-ignition temperature : Not applicable
Flammability : No data available
Vapour pressure : No data available
Relative density : No data available
Density : No data available
Solubility : Soluble in water.
Partition coefficient n-octanol/water (Log Pow) : No data available
Viscosity, kinematic : Not applicable
Explosive properties : No data available
Explosive limits : Not applicable
Minimum ignition energy : No data available
Fat solubility : No data available

SECTION 10: Stability and reactivity

Reactivity : The product is non-reactive under normal conditions of use, storage and transport.
Chemical stability : Stable under normal conditions.
Possibility of hazardous reactions : No dangerous reactions known under normal conditions of use.
Conditions to avoid : None under recommended storage and handling conditions (see section 7).
Incompatible materials : No additional information available
Hazardous decomposition products : Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

Acute toxicity (oral) : May be harmful if swallowed.
Acute toxicity (dermal) : May be harmful in contact with skin.
Acute toxicity (inhalation) : Not classified

Orange Serum Agar	
ATE AU (oral)	4713.113 mg/kg bodyweight
ATE AU (dermal)	2500 mg/kg bodyweight

L-(+)-tartaric acid (87-69-4)	
LD50 oral rat	2000 – 5000 mg/kg bodyweight (OECD 423: Acute Oral Toxicity – Acute Toxic Class Method, 14 day(s), Rat, Female, Experimental value, Oral, 14 day(s))
LD50 dermal rat	> 2000 mg/kg bodyweight (OECD 402: Acute Dermal Toxicity, 24 h, Rat, Male / female, Experimental value, Dermal, 14 day(s))

Unknown acute toxicity (GHS AU) : 16.18% of the mixture consists of ingredient(s) of unknown acute toxicity (Oral)
92.77% of the mixture consists of ingredient(s) of unknown acute toxicity (Dermal)
100% of the mixture consists of ingredient(s) of unknown acute toxicity (Inhalation (Dust/Mist))

Skin corrosion/irritation : Not classified.
pH: 5.3 – 5.7

Serious eye damage/irritation : Causes serious eye irritation.
pH: 5.3 – 5.7

Respiratory or skin sensitization : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified
Reproductive toxicity : Not classified
STOT-single exposure : Not classified
STOT-repeated exposure : Not classified

L-(+)-tartaric acid (87-69-4)	
NOAEL (subchronic, oral, animal/male, 90 days)	≈ 2460 mg/kg bodyweight Animal: , Animal sex: male
NOAEL (subchronic, oral, animal/female, 90 days)	≈ 3200 mg/kg bodyweight Animal: , Animal sex: female

Aspiration hazard : Not classified

Orange Serum Agar	
Viscosity, kinematic	Not applicable

L-(+)-tartaric acid (87-69-4)	
Viscosity, kinematic	Not applicable (solid)

SECTION 12: Ecological information

12.1. Ecotoxicity

Ecology - general : The product is not considered harmful to aquatic organisms nor to cause long-term adverse effects in the environment.
Hazardous to the aquatic environment, short–term (acute) : Not classified
Hazardous to the aquatic environment, long–term (chronic) : Not classified

L-(+)-tartaric acid (87-69-4)	
LC50 - Fish [1]	> 100 mg/l (OECD 203: Fish, Acute Toxicity Test, 96 h, Danio rerio, Static system, Fresh water, Experimental value, Nominal concentration)
LC50 - Fish [2]	> 100 mg/l Test organisms (species):

L-(+)-tartaric acid (87-69-4)	
EC50 - Crustacea [1]	93.313 mg/l (OECD 202: Daphnia sp. Acute Immobilisation Test, 48 h, Daphnia magna, Static system, Fresh water, Experimental value, Locomotor effect)
NOEC chronic fish	43.141 g/l Test organisms (species): Duration: '30 d'
Partition coefficient n-octanol/water (Log Pow)	-1.91 (Experimental value, OECD 107: Partition Coefficient (n-octanol/water): Shake Flask Method, 20 °C)
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	0 (log Koc, SRC PCKOCWIN v2.0, Calculated value)
LD50 dermal rat	> 2000 mg/kg bodyweight (OECD 402: Acute Dermal Toxicity, 24 h, Rat, Male / female, Experimental value, Dermal, 14 day(s))
LD50 oral rat	2000 – 5000 mg/kg bodyweight (OECD 423: Acute Oral Toxicity – Acute Toxic Class Method, 14 day(s), Rat, Female, Experimental value, Oral, 14 day(s))

12.2. Persistence and degradability

Orange Serum Agar	
Persistence and degradability	Not rapidly degradable

L-(+)-tartaric acid (87-69-4)	
Persistence and degradability	Readily biodegradable in water.
Biochemical oxygen demand (BOD)	0.35 g O_2/g substance
Chemical oxygen demand (COD)	0.42 g O_2/g substance
ThOD	0.53 g O_2/g substance

12.3. Bioaccumulative potential

L-(+)-tartaric acid (87-69-4)	
Partition coefficient n-octanol/water (Log Pow)	-1.91 (Experimental value, OECD 107: Partition Coefficient (n-octanol/water): Shake Flask Method, 20 °C)
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	0 (log Koc, SRC PCKOCWIN v2.0, Calculated value)
Bioaccumulative potential	Not bioaccumulative.

12.4. Mobility in soil

L-(+)-tartaric acid (87-69-4)	
Surface tension	No data available in the literature
Ecology - soil	Highly mobile in soil.
Partition coefficient n-octanol/water (Log Pow)	-1.91 (Experimental value, OECD 107: Partition Coefficient (n-octanol/water): Shake Flask Method, 20 °C)
Organic Carbon Normalized Adsorption Coefficient (Log Koc)	0 (log Koc, SRC PCKOCWIN v2.0, Calculated value)

12.5. Other adverse effects

Ozone : Not classified
Other adverse effects : No additional information available

Orange Serum Agar	
Fluorinated greenhouse gases	False

L-(+)-tartaric acid (87-69-4)	
Fluorinated greenhouse gases	False

SECTION 13: Disposal considerations

Regional waste regulation : Disposal must be done according to official regulations.
Waste treatment methods : Dispose of contents/container in accordance with licensed collector's sorting instructions.
Sewage disposal recommendations : Disposal must be done according to official regulations.
Product/Packaging disposal recommendations : Comply with applicable regulations for solid waste disposal. Disposal must be done according to official regulations.
Additional information : Do not re-use empty containers.

SECTION 14: Transport information

In accordance with ADG / IMDG / IATA

ADG	IMDG	IATA
14.1. UN number		
Not regulated for transport		
14.2. UN Proper Shipping Name		
Not regulated	Not regulated	Not regulated
14.3. Transport hazard class(es)		
Not regulated	Not regulated	Not regulated
14.4. Packing group		
Not regulated	Not regulated	Not regulated
14.5. Environmental hazards		
Not regulated	Not regulated	Not regulated

14.6. Special precautions for user

Specific storage requirement : No data available
Shock sensitivity : No data available

14.7. Additional information

Other information : No supplementary information available

Transport by road and rail
Not regulated

Transport by sea
Not regulated

Air transport
Not regulated

14.8. Hazchem or Emergency Action Code

Hazchem Code : Not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations

Australian Industrial Chemicals Introduction Scheme (AICIS)

Australian Inventory of Industrial Chemicals (AICIS Inventory) status : Contains substance(s) listed on Australian Industrial Chemicals Introduction Scheme (AICIS Inventory)

Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

No additional information available

Australian Pesticides and Veterinary Medicines Authority (APVMA)

No additional information available

15.2. International agreements

No additional information available

SECTION 16: Other information

Classification	
Acute Tox. 5 (Oral)	H303
Acute Tox. 5 (Dermal)	H313
Eye Irrit. 2A	H319

Full text of H-statements	
Acute Tox. 5 (Dermal)	Acute toxicity (dermal), Category 5
Acute Tox. 5 (Oral)	Acute toxicity (oral), Category 5
Aquatic Acute 3	Hazardous to the aquatic environment – Acute Hazard, Category 3
Aquatic Chronic 3	Hazardous to the aquatic environment – Chronic Hazard, Category 3
Eye Dam. 1	Serious eye damage/eye irritation, Category 1
Eye Irrit. 2A	Serious eye damage/eye irritation, Category 2A
Skin Corr./Irrit. Not classified	Skin corrosion/irritation Not classified
H303	May be harmful if swallowed
H313	May be harmful in contact with skin
H318	Causes serious eye damage
H319	Causes serious eye irritation
H402	Harmful to aquatic life
H412	Harmful to aquatic life with long lasting effects

Safety Data Sheet (SDS), Australia

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.