# KIT SAFETY DATA SHEET



Kit Product Name Bio-Plex Pro Human Diabetes Adipsin and Adinopectin Assays

Kit Catalogue Number(s) 171A7002M

Revision date 17-May-2023

### **Kit Contents**

Catalogue Number(s)	Product Name
9723892, 9703892, 9704415, 10014822, 10014823	Bio-Plex Assay Buffer
171D70001, 10018258, 171D70050	Bio-Plex Pro Human Diabetes Standard
10018264, 10018265, 10018266, 10018267, 10018268, 10018269, 10018270, 10018271, 10018272, 10018273, 10018274	Bio-Plex Human Diabetes Single-Plex Beads
10018263	Bio-Plex Pro Human Adipo Beads, 1X96
12010716	Human Diabetes, Control
10018305, 10018306, 10018307, 10018308, 10018309, 10018310, 10018311, 10018312, 10018313, 10018314, 10018315, 10018316	Bio-Plex Pro Human Diabetes Single-Plex Detection
10022627, 12010718	Standard Diluent HB
10032400, 10031831, 12005852	Bio-Plex Detection Antibody Diluent HB
171304500, 9703893, 9704416	Bio-Plex Wash Buffer A
171304501, 9704418, 9703887, 9703897	Streptavidin-PE

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# SAFETY DATA SHEET

According to WHS Regulations

Revision date 18-Oct-2022 Revision Number 1.1

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

**Product identifier** 

**Product Name** Bio-Plex Assay Buffer

Catalogue Number(s) 9723892, 9703892, 9704415, 10014822, 10014823

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive Hercules, CA 94547

USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

**Legal Entity / Contact Address** u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

+61 2 9914 2800 or 1800 224 354 **Technical Service** 

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

### **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

### SECTION 3: Composition/information on ingredients

Substance

#### Not applicable

#### Mixture

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	CAS No	Weight-%
Water	7732-18-5	50 - 100
Trade secret	-	1 - 2.5
Trade secret	-	0.3 - 0.99
Trade secret	-	0.1 - 0.299
Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

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

#### **Description of first aid measures**

General advice No hazards which require special first aid measures.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

### Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

### **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

None known.

chemical

#### Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.

### SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

**Prevention of secondary hazards** Clean contaminated objects and areas thoroughly observing environmental regulations.

### SECTION 7: Handling and storage

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

### SECTION 8: Exposure controls/personal protection

**Control parameters** 

**Exposure Limits** This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

Biological occupational exposure limits

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

**Appropriate engineering controls** 

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection** Wear suitable protective clothing.

Hand protection Wear suitable gloves.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

### SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Liquid

Appearance aqueous solution colourless
Odour Odourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

pH 7.4 Melting point / freezing point 0 °C

Melting point / freezing point 0 °C

Boiling point / boiling range 100 °C

Flash point No data available None known Evaporation rate No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility Miscible in water Solubility(ies) No data available

Solubility(ies)No data availableNone knownPartition coefficientNo data availableNone knownAutoignition temperatureNo data availableNone knownDecomposition temperatureNo data availableNone knownKinematic viscosityNo data availableNone known

Kinematic viscosity

No data available

None known

No data available

None known

None known

Explosive properties Not applicable Oxidising properties Not applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

### SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

### Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

**Conditions to avoid** 

**Conditions to avoid**None known based on information supplied.

**Incompatible materials** 

**Incompatible materials**None known based on information supplied.

#### **Hazardous decomposition products**

Hazardous decomposition products None known based on information supplied.

### **SECTION 11: Toxicological information**

#### **Acute toxicity**

#### Information on likely routes of exposure

Product Information

**Inhalation** Specific test data for the substance or mixture is not available.

Eye contact Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

**Ingestion** Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Water	> 90 mL/kg (Rat)	-	-
Trade secret	= 3 g/kg (Rat)	> 10000 mg/kg (Rabbit)	> 42 mg/L (Rat) 1 h
Trade secret	= 8290 mg/kg (Rat)	> 7940 mg/kg (Rabbit)	> 0.83 mg/L (Rat)4 h

See section 16 for terms and abbreviations

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

**Skin corrosion/irritation**Based on available data, the classification criteria are not met.

**Serious eye damage/eye irritation** Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation Based on available data, the classification criteria are not met.

**Germ cell mutagenicity**Based on available data, the classification criteria are not met.

Carcinogenicity Based on available data, the classification criteria are not met.

Reproductive toxicity Based on available data, the classification criteria are not met.

STOT - single exposure Based on available data, the classification criteria are not met.

STOT - repeated exposure Based on available data, the classification criteria are not met.

**Aspiration hazard** Based on available data, the classification criteria are not met.

## **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** 

Unknown aquatic toxicity 0.095 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to microorganisms	Crustacea
Trade secret	-	LC50: 5560 - 6080mg/L (96h, Lepomis macrochirus) LC50: =12946mg/L (96h, Lepomis macrochirus) LC50: 6020 - 7070mg/L (96h, Pimephales promelas) LC50: =7050mg/L (96h, Pimephales promelas) LC50: 6420 - 6700mg/L (96h, Pimephales promelas) LC50: 4747 - 7824mg/L (96h, Oncorhynchus mykiss)	-	EC50: =1000mg/L (48h, Daphnia magna) EC50: 340.7 - 469.2mg/L (48h, Daphnia magna)

Persistence and degradability

No information available. Persistence and degradability

Bioaccumulative potential

Bioaccumulation No information available.

**Mobility** 

Mobility in soil No information available. Mobility No information available.

Other adverse effects

Other adverse effects No information available.

### **SECTION 13: Disposal considerations**

Waste treatment methods

Waste from residues/unused Dispose of in accordance with local regulations. Dispose of waste in accordance with products

environmental legislation.

Contaminated packaging Do not reuse empty containers.

### **SECTION 14: Transport information**

ADG Not regulated

<u>IATA</u> Not regulated

<u>IMDG</u> Not regulated

#### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

### **SECTION 15: Regulatory information**

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

### **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

No poisons schedule number allocated

#### **International Inventories**

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

#### SECTION 16: Other information

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 18-Oct-2022

**Revision Note** Reformatted and updated existing information.

### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA) EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 16-May-2023 Revision Number 1

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

**Product identifier** 

**Product Name** Bio-Plex Pro Human Diabetes Standard

Catalogue Number(s) 171D70001, 10018258, 171D70050

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

Legal Entity / Contact Address u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

### **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

**General Hazards** Contains human source material and / or potentially infectious components

### SECTION 3: Composition/information on ingredients

\_\_\_\_\_

#### Substance

Not applicable

#### Mixture

Chemical name	CAS No	Weight-%
Trade secret	-	5 - 10
Sodium phosphate dibasic	7558-79-4	5 - 10
Acetic acid	64-19-7	0.1 - 0.299
Non-hazardous ingredients	Proprietary	Balance

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

Description of first aid measures

**General advice** No hazards which require special first aid measures.

**Emergency telephone number** Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

### **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

None known.

chemical

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

### **SECTION 6: Accidental release measures**

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up**Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

**Prevention of secondary hazards** Clean contaminated objects and areas thoroughly observing environmental regulations.

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

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

### SECTION 8: Exposure controls/personal protection

#### **Control parameters**

#### **Exposure Limits**

Chemical name	Australia	ACGIH TLV
Acetic acid	TWA: 10 ppm	STEL: 15 ppm
64-19-7	TWA: 25 mg/m <sup>3</sup>	TWA: 10 ppm
	STEL: 15 ppm	
	STEL: 37 mg/m <sup>3</sup>	

### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### **Appropriate engineering controls**

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles).

Skin and body protection Wear suitable protective clothing.

Hand protection Wear suitable gloves.

No protective equipment is needed under normal use conditions. If exposure limits are Respiratory protection

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

### SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Solid

**Appearance** powder or cake, lyophilised

Colour white Odour Odourless.

**Odour threshold** No information available

**Property** <u>Values</u> Remarks • Method

None known pН Melting point / freezing point No data available None known

1461 °C

Boiling point / boiling range

Flash point No data available None known No data available **Evaporation rate** None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressure No data available None known No data available Vapour density None known Relative density No data available None known

Water solubility Soluble in water

Solubility(ies) No data available None known **Partition coefficient** No data available None known **Autoignition temperature** No data available None known **Decomposition temperature** None known

Kinematic viscosity No data available None known **Dynamic viscosity** No data available None known

**Explosive properties** Not applicable Oxidising properties Not applicable

Other information

Molecular weight Not applicable **VOC** content Not applicable

### SECTION 10: Stability and reactivity

Reactivity

Reactivity No information available.

Chemical stability

Stable under normal conditions. Stability

**Explosion data** 

Sensitivity to mechanical impact None.

\_\_\_\_\_

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

**Incompatible materials** 

**Incompatible materials**None known based on information supplied.

Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

### **SECTION 11: Toxicological information**

### **Acute toxicity**

### Information on likely routes of exposure

**Product Information** 

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

Ingestion Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

### The following values are calculated based on chapter 3.1 of the GHS document

**ATEmix (oral)** 27,777.80 mg/kg

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Trade secret	= 3 g/kg (Rat)	> 10000 mg/kg (Rabbit)	> 42 mg/L (Rat)1 h
Sodium phosphate dibasic	= 17 g/kg(Rat)	-	-
Acetic acid	= 3310 mg/kg (Rat)	= 1060 mg/kg ( Rabbit )	= 11.4 mg/L (Rat)4 h

See section 16 for terms and abbreviations

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

**Skin corrosion/irritation**Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

Respiratory or skin sensitisation Based on available data, the classification criteria are not met.

**Germ cell mutagenicity** Based on available data, the classification criteria are not met.

**Carcinogenicity** Based on available data, the classification criteria are not met.

Reproductive toxicity Based on available data, the classification criteria are not met.

**STOT - single exposure** Based on available data, the classification criteria are not met.

**STOT - repeated exposure** Based on available data, the classification criteria are not met.

**Aspiration hazard** Based on available data, the classification criteria are not met.

### **SECTION 12: Ecological information**

### **Ecotoxicity**

**Ecotoxicity** 

**Unknown aquatic toxicity** 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to	Crustacea
			microorganisms	
Trade secret	-	LC50: 5560 - 6080mg/L	-	EC50: =1000mg/L (48h,
		(96h, Lepomis		Daphnia magna)
		macrochirus)		EC50: 340.7 - 469.2mg/L
		LC50: =12946mg/L (96h,		(48h, Daphnia magna)
		Lepomis macrochirus)		
		LC50: 6020 - 7070mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: =7050mg/L (96h,		
		Pimephales promelas)		
		LC50: 6420 - 6700mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: 4747 - 7824mg/L		
		(96h, Oncorhynchus		
		mykiss)		
Acetic acid	-	LC50: =79mg/L (96h,	-	EC50: =65mg/L (48h,
		Pimephales promelas)		Daphnia magna)
		LC50: =75mg/L (96h,		
		Lepomis macrochirus)		

### Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** There is no data for this product.

**Component Information** 

Chemical name	Partition coefficient
Acetic acid	-0.17

Mobility

Mobility in soil No information available.

**Mobility** No information available.

Other adverse effects

Other adverse effects No information available.

### SECTION 13: Disposal considerations

#### Waste treatment methods

products

Waste from residues/unused

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

### **SECTION 14: Transport information**

ADG Not regulated

IATA
Not regulated
IMDG
Not regulated

### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

### SECTION 15: Regulatory information

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

#### **National regulations**

#### <u>Australia</u>

See section 8 for national exposure control parameters

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

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number 6

### National pollutant inventory

Subject to reporting requirement

Casjost to reporting requirement		
Chemical name	National pollutant inventory	
Acetic acid - 64-19-7	10 tonne/vr Threshold category 1	

#### **International Inventories**

Contact supplier for inventory compliance status

### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

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

**Prepared By** 

Significant changes throughout SDS. Review all sections. **Revision Note** 

### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA (time-weighted average) STEL (Short Term Exposure Limit) TWA STEL

Maximum limit value Skin designation Ceiling

Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA) EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

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**End of Safety Data Sheet** 



# **SAFETY DATA SHEET**

According to WHS Regulations

Revision date 15-May-2023 Revision Number 1

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

**Product identifier** 

Product Name Bio-Plex Human Diabetes Single-Plex Beads

Catalogue Number(s) 10018264, 10018265, 10018266, 10018267, 10018268, 10018269, 10018270, 10018271,

10018272, 10018273, 10018274

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

Corporate HeadquartersManufacturerBio-Rad Laboratories Inc.Bio-Rad Laboratories, Life Scie1000 Alfred Nobel Drive2000 Alfred Nobel Drive

1000 Alfred Nobel Drive
Hercules, CA 94547

2000 Alfred Nobel Drive
Hercules, CAlifornia 94547

USA USA

Manufacturer Legal Entity / Contact Address
Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd

u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

### **SECTION 2: Hazards identification**

GHS Classification

Skin sensitisation Category 1A - (H317)

#### Label elements

**Exclamation mark** 



Signal word

#### Warning

#### **Hazard statements**

H317 - May cause an allergic skin reaction

#### **Precautionary Statements - Prevention**

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

Contaminated work clothing should not be allowed out of the workplace

Wear protective gloves/protective clothing/eye protection/face protection

IF ON SKIN: Wash with plenty of water and soap

If skin irritation or rash occurs: Get medical advice/attention

Take off all contaminated clothing and wash it before reuse

#### **Precautionary Statements - Disposal**

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable

#### Other hazards which do not result in classification

Harmful to aquatic life with long lasting effects Harmful to aquatic life Contains animal source material (Cattle)

### SECTION 3: Composition/information on ingredients

#### Substance

Not applicable

#### Mixture

Chemical name	CAS No	Weight-%
Sodium chloride	7647-14-5	5 - 10
Sodium hydroxide	1310-73-2	0.1 - 0.299
Sodium azide	26628-22-8	0.1 - 0.299
5-Chloro-2-methyl-3(2H)-isothiazolone, mixture with	55965-84-9	0.001 - 0.01
2-methyl-3(2H)-isothiazolone		
Non-hazardous ingredients	Proprietary	Balance

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

#### **Description of first aid measures**

**General advice** Show this safety data sheet to the doctor in attendance.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash with soap and water. May cause an allergic skin reaction. In the case of skin irritation

or allergic reactions see a doctor.

**Ingestion** Rinse mouth thoroughly with water.

### Most important symptoms and effects, both acute and delayed

Symptoms Itching. Rashes. Hives.

### Indication of any immediate medical attention and special treatment needed

**Note to doctors**May cause sensitisation in susceptible persons. Treat symptomatically.

### **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

Product is or contains a sensitiser. May cause sensitisation by skin contact.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

chemical

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

### SECTION 6: Accidental release measures

### Personal precautions, protective equipment and emergency procedures

Personal precautions Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Evacuate personnel to safe areas. Keep people away

from and upwind of spill/leak.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

### SECTION 7: Handling and storage

#### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid contact with

skin, eyes or clothing. Ensure adequate ventilation. In case of insufficient ventilation, wear suitable respiratory equipment. Do not eat, drink or smoke when using this product. Take off

contaminated clothing and wash it before reuse.

#### Conditions for safe storage, including any incompatibilities

**Storage Conditions** Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up.

Keep out of the reach of children. Store according to product and label instructions.

Incompatible materials Metals.

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### SECTION 8: Exposure controls/personal protection

#### **Control parameters**

#### **Exposure Limits**

Chemical name	Australia	ACGIH TLV
Sodium hydroxide 1310-73-2	Peak: 2 mg/m <sup>3</sup>	Ceiling: 2 mg/m <sup>3</sup>
Sodium azide 26628-22-8	Peak: 0.11 ppm Peak: 0.3 mg/m <sup>3</sup>	Ceiling: 0.29 mg/m³ Sodium azide Ceiling: 0.11 ppm Hydrazoic acid vapor

### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

#### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection** Wear suitable protective clothing.

**Hand protection** Wear suitable gloves.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

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

### Information on basic physical and chemical properties

Physical state Liquid

Appearance Dilute bead suspension in aqueous solution

ColourcolourlessOdourOdourless.

Odour threshold No information available

Property Values Remarks • Method 7.4

pH 7.4

Melting point / freezing point None known
Boiling point / boiling range 100 °C

Boiling point / boiling range100 °CFlash pointNo data availableNone knownEvaporation rateNo data availableNone knownFlammability (solid, gas)No data availableNone knownFlammability Limit in AirNone known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

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Water solubility Partially miscible Solubility(ies) No data available

Partition coefficient
Autoignition temperature

No data available
No data available
Decomposition temperature

No data available

None known
No data available
No data available
No data available
None known
No data available

Dynamic viscosityNo data availalExplosive propertiesNot applicableOxidising propertiesNot applicable

Other information

Kinematic viscosity

Molecular weightNot applicableVOC contentNot applicable

### SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None

Possibility of hazardous reactions

Possibility of hazardous reactions Avoid contact with metals. This product contains Sodium azide. Sodium azide can react with

Copper, Brass, Lead, and solder in piping systems to form explosive compounds and toxic

None known

None known

gases.

Conditions to avoid

**Conditions to avoid**None known based on information supplied.

**Incompatible materials** 

Incompatible materials Metals.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

### SECTION 11: Toxicological information

#### **Acute toxicity**

### Information on likely routes of exposure

#### **Product Information**

**Inhalation** Specific test data for the substance or mixture is not available.

Eye contact Specific test data for the substance or mixture is not available.

**Skin contact** May cause sensitisation by skin contact. Specific test data for the substance or mixture is

not available. Repeated or prolonged skin contact may cause allergic reactions with

susceptible persons. (based on components).

**Ingestion** Specific test data for the substance or mixture is not available

Symptoms Itching. Rashes. Hives.

Numerical measures of toxicity - Product Information

### The following values are calculated based on chapter 3.1 of the GHS document

**ATEmix (oral)** 43,206.50 mg/kg

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium chloride	= 3 g/kg (Rat)	> 10000 mg/kg ( Rabbit )	> 42 mg/L (Rat) 1 h
Sodium hydroxide	= 325 mg/kg (Rat)	= 1350 mg/kg ( Rabbit )	-
Sodium azide	= 27 mg/kg (Rat)	= 20 mg/kg (Rabbit)	0.054 - 0.52 mg/L (Rat)4 h
5-Chloro-2-methyl-3(2H)-isothia zolone, mixture with 2-methyl-3(2H)-isothiazolone	= 53 mg/kg(Rat)	= 87.12 mg/kg ( Rabbit )	-

See section 16 for terms and abbreviations

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

**Skin corrosion/irritation**Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

**Respiratory or skin sensitisation** May cause sensitisation by skin contact.

**Germ cell mutagenicity** Based on available data, the classification criteria are not met.

**Carcinogenicity** Based on available data, the classification criteria are not met.

**Reproductive toxicity** Based on available data, the classification criteria are not met.

**STOT - single exposure** Based on available data, the classification criteria are not met.

STOT - repeated exposure Based on available data, the classification criteria are not met.

Aspiration hazard Based on available data, the classification criteria are not met.

### SECTION 12: Ecological information

**Ecotoxicity** 

**Ecotoxicity** Harmful to aquatic life with long lasting effects.

**Unknown aquatic toxicity** 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to	Crustacea
			microorganisms	
Sodium chloride	-	LC50: 5560 - 6080mg/L	-	EC50: =1000mg/L (48h,
		(96h, Lepomis		Daphnia magna)
		macrochirus)		EC50: 340.7 - 469.2mg/L
		LC50: =12946mg/L (96h,		(48h, Daphnia magna)
		Lepomis macrochirus)		
		LC50: 6020 - 7070ma/L		

	,		,	
		(96h, Pimephales		
		promelas)		
		LC50: =7050mg/L (96h,		
		Pimephales promelas)		
		LC50: 6420 - 6700mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: 4747 - 7824mg/L		
		(96h, Oncorhynchus		
		mykiss)		
Sodium hydroxide	-	LC50: =45.4mg/L (96h,	-	-
		Oncorhynchus mykiss)		
Sodium azide	-	LC50: =0.8mg/L (96h,	-	-
		Oncorhynchus mykiss)		
		LC50: =0.7mg/L (96h,		
		Lepomis macrochirus)		
		LC50: =5.46mg/L (96h,		
		Pimephales promelas)		

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** There is no data for this product.

**Component Information** 

Chemical name	Partition coefficient
5-Chloro-2-methyl-3(2H)-isothiazolone, mi	xture with 0.7
2-methyl-3(2H)-isothiazolone	

**Mobility** 

Mobility in soilNo information available.MobilityNo information available.

Other adverse effects

Other adverse effects No information available.

### **SECTION 13: Disposal considerations**

Waste treatment methods

Waste from residues/unused

products

Flush pipes with water frequently if discarding solutions containing Sodium azide into metal piping systems. Dispose of in accordance with local regulations. Dispose of waste in

piping systems. Dispose of in accordance with local regulations. Dispose

accordance with environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

### **SECTION 14: Transport information**

ADG Not regulated

IATA Not regulated

**IMDG** Not regulated

### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

### SECTION 15: Regulatory information

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

#### **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number 6

#### International Inventories

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

### SECTION 16: Other information

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 15-May-2023

**Revision Note** Significant changes throughout SDS. Review all sections.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 16-May-2023 Revision Number 1

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

**Product identifier** 

Bio-Plex Pro Human Adipo Beads, 1X96 **Product Name** 

Catalogue Number(s) 10018263

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

**Legal Entity / Contact Address** u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

+61 2 9914 2800 or 1800 224 354 **Technical Service** 

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

### **SECTION 2: Hazards identification**

GHS Classification

Skin sensitisation Category 1A - (H317)

#### Label elements

**Exclamation mark** 



Signal word Warning

#### **Hazard statements**

H317 - May cause an allergic skin reaction

### **Precautionary Statements - Prevention**

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

Contaminated work clothing should not be allowed out of the workplace

Wear protective gloves/protective clothing/eye protection/face protection

IF ON SKIN: Wash with plenty of water and soap

If skin irritation or rash occurs: Get medical advice/attention

Take off all contaminated clothing and wash it before reuse

#### **Precautionary Statements - Disposal**

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable

#### Other hazards which do not result in classification

Harmful to aquatic life with long lasting effects Harmful to aquatic life Contains animal source material (Cattle)

### SECTION 3: Composition/information on ingredients

#### Substance

Not applicable

#### <u>Mixture</u>

Chemical name	CAS No	Weight-%
Sodium chloride	7647-14-5	5 - 10
Sodium hydroxide	1310-73-2	0.1 - 0.299
Sodium azide	26628-22-8	0.1 - 0.299
5-Chloro-2-methyl-3(2H)-isothiazolone, mixture with	55965-84-9	0.001 - 0.01
2-methyl-3(2H)-isothiazolone		
Non-hazardous ingredients	Proprietary	Balance

#### SECTION 4: First aid measures

### **Description of first aid measures**

**General advice** Show this safety data sheet to the doctor in attendance.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash with soap and water. May cause an allergic skin reaction. In the case of skin irritation

or allergic reactions see a doctor.

**Ingestion** Rinse mouth thoroughly with water.

### Most important symptoms and effects, both acute and delayed

Symptoms Itching. Rashes. Hives.

#### Indication of any immediate medical attention and special treatment needed

**Note to doctors**May cause sensitisation in susceptible persons. Treat symptomatically.

### SECTION 5: Firefighting measures

**Suitable Extinguishing Media** 

**Suitable Extinguishing Media** Use extinguishing measures that are appropriate to local circumstances and the

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

Product is or contains a sensitiser. May cause sensitisation by skin contact.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

### SECTION 6: Accidental release measures

### Personal precautions, protective equipment and emergency procedures

**Personal precautions** Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Evacuate personnel to safe areas. Keep people away

from and upwind of spill/leak.

For emergency responders Use personal protection recommended in Section 8.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

Prevent further leakage or spillage if safe to do so. **Methods for containment** 

Methods for cleaning up Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

### SECTION 7: Handling and storage

#### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid contact with

skin, eyes or clothing. Ensure adequate ventilation. In case of insufficient ventilation, wear suitable respiratory equipment. Do not eat, drink or smoke when using this product. Take off

contaminated clothing and wash it before reuse.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up.

Keep out of the reach of children. Store according to product and label instructions.

Incompatible materials Metals.

### SECTION 8: Exposure controls/personal protection

### **Control parameters**

### **Exposure Limits**

Chemical name	Australia	ACGIH TLV
Sodium hydroxide 1310-73-2	Peak: 2 mg/m <sup>3</sup>	Ceiling: 2 mg/m <sup>3</sup>
Sodium azide 26628-22-8	Peak: 0.11 ppm Peak: 0.3 mg/m <sup>3</sup>	Ceiling: 0.29 mg/m³ Sodium azide Ceiling: 0.11 ppm Hydrazoic acid vapor

### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### **Appropriate engineering controls**

**Engineering controls** Showers

> Eyewash stations Ventilation systems.

#### Individual protection measures, such as personal protective equipment

Wear safety glasses with side shields (or goggles). Eye/face protection

Skin and body protection Wear suitable protective clothing.

Wear suitable gloves. Hand protection

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

### SECTION 9: Physical and chemical properties

### Information on basic physical and chemical properties

Physical state Liquid

**Appearance** Dilute bead suspension in aqueous solution

Colour colourless Odour Odourless.

**Odour threshold** No information available

**Property** <u>Values</u> Remarks • Method pН 7.4

No data available Melting point / freezing point None known

100 °C **Boiling point / boiling range** 

Flash point No data available None known **Evaporation rate** No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

No data available Vapour pressure None known Vapour density No data available None known No data available Relative density None known

Water solubility Partially miscible

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Solubility(ies)
Partition coefficient
Autoignition temperature
Decomposition temperature
Kinematic viscosity
No data available
No data available
No data available

No data available
No data available
None known
No data available

Dynamic viscosityNo data availaExplosive propertiesNot applicableOxidising propertiesNot applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

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

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions 
Avoid contact with metals. This product contains Sodium azide. Sodium azide can react with

Copper, Brass, Lead, and solder in piping systems to form explosive compounds and toxic

None known None known

None known

gases.

**Conditions to avoid** 

**Conditions to avoid**None known based on information supplied.

Incompatible materials

Incompatible materials Metals.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

### **SECTION 11: Toxicological information**

### **Acute toxicity**

### Information on likely routes of exposure

#### **Product Information**

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** May cause sensitisation by skin contact. Specific test data for the substance or mixture is

not available. Repeated or prolonged skin contact may cause allergic reactions with

susceptible persons. (based on components).

**Ingestion** Specific test data for the substance or mixture is not available

**Symptoms** Itching. Rashes. Hives.

Numerical measures of toxicity - Product Information

### The following values are calculated based on chapter 3.1 of the GHS document

**ATEmix (oral)** 43,206.50 mg/kg

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium chloride	= 3 g/kg (Rat)	> 10000 mg/kg ( Rabbit )	> 42 mg/L (Rat)1 h
Sodium hydroxide	= 325 mg/kg (Rat)	= 1350 mg/kg ( Rabbit )	-
Sodium azide	= 27 mg/kg (Rat)	= 20 mg/kg(Rabbit)	0.054 - 0.52 mg/L (Rat) 4 h
5-Chloro-2-methyl-3(2H)-isothia zolone, mixture with 2-methyl-3(2H)-isothiazolone	= 53 mg/kg (Rat)	= 87.12 mg/kg ( Rabbit )	-

See section 16 for terms and abbreviations

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

Skin corrosion/irritation Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

**Respiratory or skin sensitisation** May cause sensitisation by skin contact.

Germ cell mutagenicity Based on available data, the classification criteria are not met.

**Carcinogenicity** Based on available data, the classification criteria are not met.

**Reproductive toxicity** Based on available data, the classification criteria are not met.

**STOT - single exposure**Based on available data, the classification criteria are not met.

**STOT - repeated exposure**Based on available data, the classification criteria are not met.

Aspiration hazard Based on available data, the classification criteria are not met.

### **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** Harmful to aquatic life with long lasting effects.

**Unknown aquatic toxicity** 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to	Crustacea
			microorganisms	
Sodium chloride	-	LC50: 5560 - 6080mg/L	-	EC50: =1000mg/L (48h,
		(96h, Lepomis		Daphnia magna)
		macrochirus)		EC50: 340.7 - 469.2mg/L
		LC50: =12946mg/L (96h,		(48h, Daphnia magna)
		Lepomis macrochirus)		
		LC50: 6020 - 7070mg/L		
		(96h, Pimephales		

		promelas)		
		LC50: =7050mg/L (96h,		
		Pimephales promelas)		
		LC50: 6420 - 6700mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: 4747 - 7824mg/L		
		(96h, Oncorhynchus		
		mykiss)		
Sodium hydroxide	-	LC50: =45.4mg/L (96h,	-	-
		Oncorhynchus mykiss)		
Sodium azide	-	LC50: =0.8mg/L (96h,	-	-
		Oncorhynchus mykiss)		
		LC50: =0.7mg/L (96h,		
		Lepomis macrochirus)		
		LC50: =5.46mg/L (96h,		
		Pimephales promelas)		

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** There is no data for this product.

**Component Information** 

Chemical name	Partition coefficient
5-Chloro-2-methyl-3(2H)-isothiazolone, mixture w	ith 0.7
2-methyl-3(2H)-isothiazolone	

**Mobility** 

Mobility in soilNo information available.MobilityNo information available.

Other adverse effects

Other adverse effects No information available.

### SECTION 13: Disposal considerations

Waste treatment methods

Waste from residues/unused

products

Flush pipes with water frequently if discarding solutions containing Sodium azide into metal piping systems. Dispose of in accordance with local regulations. Dispose of waste in

accordance with environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

### **SECTION 14: Transport information**

ADG Not regulated

IATA Not regulatedIMDG Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

\_\_\_\_\_

No information available

### SECTION 15: Regulatory information

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

#### **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number

#### International Inventories

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

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

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 16-May-2023

**Revision Note** Significant changes throughout SDS. Review all sections.

### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

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**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 16-May-2023 Revision Number 1

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

**Product identifier** 

Human Diabetes, Control **Product Name** 

Catalogue Number(s) 12010716

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

Legal Entity / Contact Address u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

### **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

Contains animal source material (Cattle)

### SECTION 3: Composition/information on ingredients

#### Substance

Not applicable

#### Mixture

Chemical name	CAS No	Weight-%
Trade secret	1	5 - 10
Sodium phosphate dibasic	7558-79-4	5 - 10
Acetic acid	64-19-7	0.1 - 0.299
Non-hazardous ingredients	Proprietary	Balance

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

Description of first aid measures

**General advice** No hazards which require special first aid measures.

**Emergency telephone number** Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

# **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

None known.

chemical

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

# **SECTION 6: Accidental release measures**

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up**Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

**Prevention of secondary hazards** Clean contaminated objects and areas thoroughly observing environmental regulations.

## SECTION 7: Handling and storage

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

#### **Control parameters**

#### **Exposure Limits**

Chemical name	Australia	ACGIH TLV
Acetic acid	TWA: 10 ppm	STEL: 15 ppm
64-19-7	TWA: 25 mg/m <sup>3</sup>	TWA: 10 ppm
	STEL: 15 ppm	
	STEL: 37 mg/m <sup>3</sup>	

#### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### **Appropriate engineering controls**

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection**Wear suitable protective clothing.

**Hand protection** Wear suitable gloves.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

None known

**Environmental exposure controls** No information available.

# SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Solid

Appearance powder or cake, lyophilised

Colour White Odourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

None known pН Melting point / freezing point No data available None known Boiling point / boiling range None known No data available Flash point No data available None known **Evaporation rate** No data available None known Flammability (solid, gas) No data available None known

Flammability Limit in Air

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility Soluble in water

Solubility(ies)
No data available
None known
Partition coefficient
No data available
None known
Autoignition temperature
No data available
None known
None known
None known
None known

Kinematic viscosity

No data available

None known

No data available

None known

Explosive properties

Oxidising properties

Not applicable

Not applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

# SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing.

Conditions to avoid

Conditions to avoid None known based on information supplied.

**Incompatible materials** 

**Incompatible materials**None known based on information supplied.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

### **Acute toxicity**

#### Information on likely routes of exposure

Product Information

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

Ingestion Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

#### The following values are calculated based on chapter 3.1 of the GHS document

**ATEmix (oral)** 27,777.80 mg/kg

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Trade secret	= 3 g/kg (Rat)	> 10000 mg/kg (Rabbit)	> 42 mg/L (Rat)1 h
Sodium phosphate dibasic	= 17 g/kg (Rat)	-	-
Acetic acid	= 3310 mg/kg (Rat)	= 1060 mg/kg (Rabbit)	= 11.4 mg/L (Rat)4 h

See section 16 for terms and abbreviations

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

**Skin corrosion/irritation** Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

**Respiratory or skin sensitisation** Based on available data, the classification criteria are not met.

**Germ cell mutagenicity** Based on available data, the classification criteria are not met.

**Carcinogenicity** Based on available data, the classification criteria are not met.

**Reproductive toxicity** Based on available data, the classification criteria are not met.

**STOT - single exposure** Based on available data, the classification criteria are not met.

**STOT - repeated exposure** Based on available data, the classification criteria are not met.

**Aspiration hazard** Based on available data, the classification criteria are not met.

# **SECTION 12: Ecological information**

#### **Ecotoxicity**

**Ecotoxicity** 

**Unknown aquatic toxicity** 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Chemical name	Algae/aquatic plants	Fish	Toxicity to	Crustacea
			microorganisms	
Trade secret	-	LC50: 5560 - 6080mg/L	-	EC50: =1000mg/L (48h,
		(96h, Lepomis		Daphnia magna)
		macrochirus)		EC50: 340.7 - 469.2mg/L
		LC50: =12946mg/L (96h,		(48h, Daphnia magna)
		Lepomis macrochirus)		
		LC50: 6020 - 7070mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: =7050mg/L (96h,		
		Pimephales promelas)		
		LC50: 6420 - 6700mg/L		
		(96h, Pimephales		
		promelas)		
		LC50: 4747 - 7824mg/L		
		(96h, Oncorhynchus		
		mykiss)		
Acetic acid	-	LC50: =79mg/L (96h,	-	EC50: =65mg/L (48h,
		Pimephales promelas)		Daphnia magna)
		LC50: =75mg/L (96h,		
		Lepomis macrochirus)		

### Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** There is no data for this product.

**Component Information** 

Chemical name	Partition coefficient
Acetic acid	-0.17

Mobility

Mobility in soil No information available.

**Mobility** No information available.

Other adverse effects

Human Diabetes, Control Revision date 16-May-2023

Other adverse effects No information available.

### SECTION 13: Disposal considerations

Waste treatment methods

products

Waste from residues/unused

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

Contaminated packaging Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

IATA
Not regulated
IMDG
Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# **SECTION 15: Regulatory information**

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

#### **National regulations**

#### <u>Australia</u>

See section 8 for national exposure control parameters

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

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number 6

# National pollutant inventory

Subject to reporting requirement

Chemical name	National pollutant inventory	
Acetic acid - 64-19-7	10 tonne/yr Threshold category 1	

#### **International Inventories**

Contact supplier for inventory compliance status

### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 16-May-2023

Revision Note Significant changes throughout SDS. Review all sections.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### **Disclaimer**

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 16-May-2023 Revision Number 1

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

**Product identifier** 

**Product Name** Bio-Plex Pro Human Diabetes Single-Plex Detection

Catalogue Number(s) 10018305, 10018306, 10018307, 10018308, 10018309, 10018310, 10018311, 10018312,

10018313, 10018314, 10018315, 10018316

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Manufacturer Bio-Rad Laboratories Inc. Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 1000 Alfred Nobel Drive 2000 Alfred Nobel Drive

Hercules, CA 94547 Hercules, California 94547

USA USA

**Legal Entity / Contact Address** u1A, 62 Ferndell Street,

South Granville NSW 2142

Australia

For further information, please contact

+61 2 9914 2800 or 1800 224 354 **Technical Service** 

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

## **SECTION 2: Hazards identification**

GHS Classification

Skin sensitisation Category 1A - (H317)

#### Label elements

**Exclamation mark** 



Signal word

#### Warning

#### **Hazard statements**

H317 - May cause an allergic skin reaction

### **Precautionary Statements - Prevention**

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

Contaminated work clothing should not be allowed out of the workplace Wear protective gloves/protective clothing/eye protection/face protection

IF ON SKIN: Wash with plenty of water and soap

If skin irritation or rash occurs: Get medical advice/attention Take off all contaminated clothing and wash it before reuse

#### **Precautionary Statements - Disposal**

Dispose of contents/container in accordance with local, regional, national, and international regulations as applicable

### Other hazards which do not result in classification

Harmful to aquatic life with long lasting effects Harmful to aquatic life Contains animal source material (Cattle)

# SECTION 3: Composition/information on ingredients

#### Substance

Not applicable

#### Mixture

Chemical name	CAS No	Weight-%
Sodium phosphate dibasic	7558-79-4	0.1 - 0.299
5-Chloro-2-methyl-3(2H)-isothiazolone, mixture with	55965-84-9	0.001 - 0.01
2-methyl-3(2H)-isothiazolone		
Non-hazardous ingredients	Proprietary	Balance

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

### **Description of first aid measures**

**General advice** Show this safety data sheet to the doctor in attendance.

**Emergency telephone number** Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

**Eve contact**Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash with soap and water. May cause an allergic skin reaction. In the case of skin irritation

or allergic reactions see a doctor.

**Ingestion** Rinse mouth thoroughly with water.

#### Most important symptoms and effects, both acute and delayed

**Symptoms** Itching. Rashes. Hives.

#### Indication of any immediate medical attention and special treatment needed

Note to doctors May cause sensitisation in susceptible persons. Treat symptomatically.

•

# **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

Product is or contains a sensitiser. May cause sensitisation by skin contact.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Revision date 16-May-2023

Use personal protection equipment.

# **SECTION 6: Accidental release measures**

#### Personal precautions, protective equipment and emergency procedures

**Personal precautions** Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Evacuate personnel to safe areas. Keep people away

from and upwind of spill/leak.

**Environmental precautions** 

**Environmental precautions**See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

**Prevention of secondary hazards** Clean contaminated objects and areas thoroughly observing environmental regulations.

# SECTION 7: Handling and storage

#### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice. Avoid contact with

skin, eyes or clothing. Ensure adequate ventilation. In case of insufficient ventilation, wear suitable respiratory equipment. Do not eat, drink or smoke when using this product. Take off

contaminated clothing and wash it before reuse.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place. Store locked up.

Keep out of the reach of children. Store according to product and label instructions.

Incompatible materials Metals.

# SECTION 8: Exposure controls/personal protection

#### **Control parameters**

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

#### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

#### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection** Wear suitable protective clothing.

Hand protection Wear suitable gloves.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

### SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Liquid

Appearance aqueous solution colourless
Odour Odourless.

Odour threshold No information available

Property Values Remarks • Method

pH 7.4

Melting point / freezing point No data available None known

Boiling point / boiling range 100 °C

Flash pointNo data availableNone knownEvaporation rateNo data availableNone knownFlammability (solid, gas)No data availableNone knownFlammability Limit in AirNone known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility Miscible in water

Solubility(ies)No data availableNone knownPartition coefficientNo data availableNone knownAutoignition temperatureNo data availableNone knownDecomposition temperatureNone known

Revision date 16-May-2023

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Kinematic viscosityNo data availableDynamic viscosityNo data availableExplosive propertiesNot applicableOxidising propertiesNot applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

# **SECTION 10: Stability and reactivity**

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions Avoid contact with metals. This product contains Sodium azide. Sodium azide can react with

Copper, Brass, Lead, and solder in piping systems to form explosive compounds and toxic

None known

None known

gases.

Conditions to avoid

**Conditions to avoid**None known based on information supplied.

**Incompatible materials** 

Incompatible materials Metals.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

#### **Acute toxicity**

### Information on likely routes of exposure

#### **Product Information**

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** May cause sensitisation by skin contact. Specific test data for the substance or mixture is

not available. Repeated or prolonged skin contact may cause allergic reactions with

susceptible persons. (based on components).

**Ingestion** Specific test data for the substance or mixture is not available

**Symptoms** Itching. Rashes. Hives.

#### Numerical measures of toxicity - Product Information

**Component Information** 

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium phosphate dibasic	= 17 g/kg(Rat)	-	-
5-Chloro-2-methyl-3(2H)-isothia zolone, mixture with 2-methyl-3(2H)-isothiazolone	= 53 mg/kg(Rat)	= 87.12 mg/kg (Rabbit)	-

See section 16 for terms and abbreviations

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

**Skin corrosion/irritation**Based on available data, the classification criteria are not met.

Serious eye damage/eye irritation Based on available data, the classification criteria are not met.

**Respiratory or skin sensitisation** May cause sensitisation by skin contact.

**Germ cell mutagenicity** Based on available data, the classification criteria are not met.

**Carcinogenicity** Based on available data, the classification criteria are not met.

**Reproductive toxicity** Based on available data, the classification criteria are not met.

STOT - single exposure Based on available data, the classification criteria are not met.

**STOT - repeated exposure**Based on available data, the classification criteria are not met.

Aspiration hazard Based on available data, the classification criteria are not met.

# **SECTION 12: Ecological information**

**Ecotoxicity** 

**Ecotoxicity** Harmful to aquatic life with long lasting effects.

**Unknown aquatic toxicity** 13.036 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** There is no data for this product.

**Component Information** 

Chemical name	Partition coefficient
5-Chloro-2-methyl-3(2H)-isothiazolone, mixture with	0.7
2-methyl-3(2H)-isothiazolone	

**Mobility** 

Mobility in soil No information available.

Revision date 16-May-2023

**Mobility** No information available.

Other adverse effects

Other adverse effects No information available.

## **SECTION 13: Disposal considerations**

#### Waste treatment methods

Waste from residues/unused

products

Flush pipes with water frequently if discarding solutions containing Sodium azide into metal piping systems. Dispose of in accordance with local regulations. Dispose of waste in

accordance with environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

IMDG Not regulated

Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# SECTION 15: Regulatory information

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

### **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

Classified as a scheduled poison according to the Standard for the Uniform Scheduling of Medicines and Poisons (SUSMP)

Poison Schedule Number 6

#### **International Inventories**

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 16-May-2023

Revision Note Significant changes throughout SDS. Review all sections.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### **Disclaimer**

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**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 16-May-2023 Revision Number 1

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

**Product identifier** 

**Product Name** Standard Diluent HB

Catalogue Number(s) 10022627, 12010718

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

Legal Entity / Contact Address u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

## **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

Contains animal source material (Cattle)

# SECTION 3: Composition/information on ingredients

\_\_\_\_\_

#### Substance

Not applicable

#### Mixture

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

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

#### **Description of first aid measures**

**General advice** No hazards which require special first aid measures.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

#### Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

## SECTION 5: Firefighting measures

**Suitable Extinguishing Media** 

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

None known.

### Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

## SECTION 6: Accidental release measures

#### Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

For emergency responders Use personal protection recommended in Section 8.

**Environmental precautions** 

**Environmental precautions**See Section 12 for additional Ecological Information.

### Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labelled containers.

#### Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

# SECTION 7: Handling and storage

#### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

#### Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

#### **Control parameters**

**Exposure Limits** This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

#### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

#### **Appropriate engineering controls**

Engineering controls Showers

Eyewash stations Ventilation systems.

#### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection**Wear suitable protective clothing.

Hand protection Wear suitable gloves.

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

# SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Liquid

Appearance aqueous solution colourless
Odour Odourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

**pH** 7.4

Melting point / freezing point No data available None known

Boiling point / boiling range 100 °C

Flash point No data available None known Evaporation rate No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility Miscible in water

Solubility(ies)
No data available
None known
Partition coefficient
No data available
None known
No data available
None known
None known
None known
None known
None known
None known

 Kinematic viscosity
 No data available
 None known

 Dynamic viscosity
 No data available
 None known

 Evaluative proportion
 Not applied by

**Explosive properties**Not applicable **Oxidising properties**Not applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

Liquid Density 1

## SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

**Possibility of hazardous reactions** None under normal processing.

#### **Conditions to avoid**

**Conditions to avoid**None known based on information supplied.

Incompatible materials

**Incompatible materials**None known based on information supplied.

#### Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

#### **Acute toxicity**

#### Information on likely routes of exposure

Product Information

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

Ingestion Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

#### **Component Information**

See section 16 for terms and abbreviations

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

Skin corrosion/irritation Based on available data, the classification criteria are not met. Serious eye damage/eye irritation Based on available data, the classification criteria are not met. Respiratory or skin sensitisation Based on available data, the classification criteria are not met. Germ cell mutagenicity Based on available data, the classification criteria are not met. Carcinogenicity Based on available data, the classification criteria are not met. Reproductive toxicity Based on available data, the classification criteria are not met. STOT - single exposure Based on available data, the classification criteria are not met. STOT - repeated exposure Based on available data, the classification criteria are not met. **Aspiration hazard** Based on available data, the classification criteria are not met.

# SECTION 12: Ecological information

**Ecotoxicity** 

**Ecotoxicity** 

**Unknown aquatic toxicity** 0.095 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

**Mobility** 

Mobility in soilNo information available.MobilityNo information available.

Other adverse effects

Other adverse effects No information available.

## **SECTION 13: Disposal considerations**

Waste treatment methods

Waste from residues/unused

products

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

IATA Not regulated

IMDG Not regulated

### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# SECTION 15: Regulatory information

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

#### **National regulations**

#### <u>Australia</u>

See section 8 for national exposure control parameters

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

No poisons schedule number allocated

#### **International Inventories**

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

## **SECTION 16: Other information**

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 16-May-2023

Revision Note Significant changes throughout SDS. Review all sections.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

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# SAFETY DATA SHEET

According to WHS Regulations

Revision date 17-May-2023 Revision Number 1.1

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

**Product identifier** 

**Product Name** Bio-Plex Detection Antibody Diluent HB

Catalogue Number(s) 10032400, 10031831, 12005852

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive Hercules, CA 94547

USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive

Hercules, California 94547

USA

Legal Entity / Contact Address

u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

## **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

Contains animal source material (Cattle)

# SECTION 3: Composition/information on ingredients

Revision date 17-May-2023

#### Substance

Not applicable

#### Mixture

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

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

#### **Description of first aid measures**

**General advice** No hazards which require special first aid measures.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

## SECTION 5: Firefighting measures

**Suitable Extinguishing Media** 

Suitable Extinguishing Media Use extinguishing measures that are appropriate to local circumstances and the

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

chemical

None known.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

## **SECTION 6: Accidental release measures**

Revision date 17-May-2023

Personal precautions, protective equipment and emergency procedures

See section 8 for more information. **Personal precautions** 

For emergency responders Use personal protection recommended in Section 8.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

Methods for cleaning up Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

# SECTION 7: Handling and storage

Precautions for safe handling

Handle in accordance with good industrial hygiene and safety practice. Advice on safe handling

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

Incompatible materials None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

**Control parameters** 

This product, as supplied, does not contain any hazardous materials with occupational **Exposure Limits** 

exposure limits established by the region specific regulatory bodies.

Biological occupational exposure limits

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

**Appropriate engineering controls** 

**Engineering controls** Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles).

Skin and body protection Wear suitable protective clothing.

Wear suitable gloves. Hand protection

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Environmental exposure controls** No information available.

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

Information on basic physical and chemical properties

Physical state Liquid

**Appearance** aqueous solution Colour colourless Odour Odourless.

**Odour threshold** No information available

**Property** Values Remarks • Method

7.4 pН

No data available Melting point / freezing point None known

Boiling point / boiling range 100 °C

Flash point No data available None known **Evaporation rate** No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressure No data available None known Vapour density No data available None known No data available Relative density None known

Water solubility Miscible in water

Solubility(ies) No data available None known **Partition coefficient** No data available None known **Autoignition temperature** No data available None known **Decomposition temperature** None known

Kinematic viscosity No data available None known Dynamic viscosity No data available None known

**Explosive properties** Not applicable Not applicable **Oxidising properties** 

Other information

Not applicable Molecular weight **VOC** content Not applicable

# SECTION 10: Stability and reactivity

Reactivity

No information available. Reactivity

**Chemical stability** 

Stable under normal conditions. Stability

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions None under normal processing. Revision date 17-May-2023

Conditions to avoid

Conditions to avoid None known based on information supplied.

Incompatible materials

Incompatible materials None known based on information supplied.

Hazardous decomposition products

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

#### **Acute toxicity**

Information on likely routes of exposure

**Product Information** 

Inhalation Specific test data for the substance or mixture is not available.

Eve contact Specific test data for the substance or mixture is not available.

Skin contact Specific test data for the substance or mixture is not available.

Specific test data for the substance or mixture is not available Ingestion

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

See section 16 for terms and abbreviations

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

Skin corrosion/irritation Based on available data, the classification criteria are not met. Serious eye damage/eye irritation Based on available data, the classification criteria are not met. Respiratory or skin sensitisation Based on available data, the classification criteria are not met. Germ cell mutagenicity Based on available data, the classification criteria are not met. Carcinogenicity Based on available data, the classification criteria are not met. Reproductive toxicity Based on available data, the classification criteria are not met. STOT - single exposure Based on available data, the classification criteria are not met. STOT - repeated exposure Based on available data, the classification criteria are not met. **Aspiration hazard** Based on available data, the classification criteria are not met.

# SECTION 12: Ecological information

**Ecotoxicity** 

**Ecotoxicity** 

**Unknown aquatic toxicity** 0.095 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

**Mobility** 

Mobility in soilNo information available.MobilityNo information available.

Other adverse effects

Other adverse effects No information available.

# **SECTION 13: Disposal considerations**

Waste treatment methods

Waste from residues/unused

products

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

<u>IATA</u> Not regulated

IMDG Not regulated

### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# **SECTION 15: Regulatory information**

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

# **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

No poisons schedule number allocated

Revision date 17-May-2023

#### **International Inventories**

Contact supplier for inventory compliance status

#### **International Regulations**

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

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

**Prepared By** Bio-Rad Laboratories, Environmental Health and Safety

**Revision date** 17-May-2023

**Revision Note** Reformatted and updated existing information.

### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceilina Maximum limit value Skin designation

Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

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**End of Safety Data Sheet** 



# SAFETY DATA SHEET

According to WHS Regulations

Revision date 17-May-2023 Revision Number 1.1

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

**Product identifier** 

**Product Name** Bio-Plex Wash Buffer A

Catalogue Number(s) 171304500, 9703893, 9704416

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive

Hercules, CA 94547 USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive Hercules, California 94547

USA

**Legal Entity / Contact Address** u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

+61 2 9914 2800 or 1800 224 354 **Technical Service** 

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

## **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

Other hazards which do not result in classification

# SECTION 3: Composition/information on ingredients

Substance

#### Not applicable

#### Mixture

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

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

#### **Description of first aid measures**

**General advice** No hazards which require special first aid measures.

**Emergency telephone number** Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

#### Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

### SECTION 5: Firefighting measures

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

None known.

chemical

#### Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

## SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions**See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up**Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

### SECTION 7: Handling and storage

#### Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

#### Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

#### Control parameters

**Exposure Limits** This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

#### **Biological occupational exposure limits**

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

### Appropriate engineering controls

Engineering controls Showers

Eyewash stations Ventilation systems.

#### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection**Wear suitable protective clothing.

Hand protection Wear suitable gloves.

exceeded or irritation is experienced, ventilation and evacuation may be required.

None known

**Environmental exposure controls** No information available.

# SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Liquid

Appearance aqueous solution
Colour colourless
Odour Odourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

pH 7.4 Melting point / freezing point 0 °C

Boiling point / treezing point 0 °C Boiling point / boiling range 100 °C

Flash point No data available None known Evaporation rate No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility
Solubility(ies)

No data available
No data available

Solubility(ies)No data availableNone knownPartition coefficientNo data availableNone knownAutoignition temperatureNo data availableNone knownDecomposition temperatureNo data availableNone knownKinematic viscosityNo data availableNone known

Kinematic viscosityNo data availableDynamic viscosityNo data availableExplosive propertiesNot applicable

**Explosive properties**Not applicable

Oxidising properties
Not applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

## SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions 
None under normal processing.

Conditions to avoid

Bio-Plex Wash Buffer A Revision date 17-May-2023

**Conditions to avoid**None known based on information supplied.

**Incompatible materials** 

**Incompatible materials**None known based on information supplied.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

#### **Acute toxicity**

Information on likely routes of exposure

Product Information

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

**Ingestion** Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

See section 16 for terms and abbreviations

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

Skin corrosion/irritation Based on available data, the classification criteria are not met. Based on available data, the classification criteria are not met. Serious eye damage/eye irritation Respiratory or skin sensitisation Based on available data, the classification criteria are not met. Germ cell mutagenicity Based on available data, the classification criteria are not met. Carcinogenicity Based on available data, the classification criteria are not met. Reproductive toxicity Based on available data, the classification criteria are not met. STOT - single exposure Based on available data, the classification criteria are not met. Based on available data, the classification criteria are not met. STOT - repeated exposure **Aspiration hazard** Based on available data, the classification criteria are not met.

# **SECTION 12: Ecological information**

### Ecotoxicity

**Ecotoxicity** 

**Unknown aquatic toxicity** 0.095 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

**Mobility** 

**Mobility in soil** No information available.

**Mobility** No information available.

Other adverse effects

Other adverse effects No information available.

# **SECTION 13: Disposal considerations**

#### Waste treatment methods

Waste from residues/unused

products

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

**Contaminated packaging** Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

<u>IATA</u> Not regulated

IMDG Not regulated

Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# **SECTION 15: Regulatory information**

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

#### **National regulations**

### Australia

See section 8 for national exposure control parameters

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

No poisons schedule number allocated

#### International Inventories

Bio-Plex Wash Buffer A Revision date 17-May-2023

Contact supplier for inventory compliance status

#### **International Regulations**

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

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

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 17-May-2023

**Revision Note** Reformatted and updated existing information.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications

Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

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**End of Safety Data Sheet** 



# **SAFETY DATA SHEET**

According to WHS Regulations

Revision date 17-May-2023 Revision Number 1.1

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

**Product identifier** 

**Product Name** Streptavidin-PE

Catalogue Number(s) 171304501, 9704418, 9703887, 9703897

Other means of identification

Pure substance/mixture Mixture

Recommended use of the chemical and restrictions on use

Recommended use Laboratory chemicals

Uses advised against No information available

Details of manufacturer or importer

**Corporate Headquarters** Bio-Rad Laboratories Inc. 1000 Alfred Nobel Drive Hercules, CA 94547

USA

Manufacturer Bio-Rad Laboratories, Life Science Group Bio-Rad Laboratories Pty Ltd 2000 Alfred Nobel Drive

Hercules, California 94547

USA

**Legal Entity / Contact Address** 

u1A, 62 Ferndell Street, South Granville NSW 2142

Australia

For further information, please contact

**Technical Service** +61 2 9914 2800 or 1800 224 354

sales.australia@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Australia: 61-290372994

Emergency telephone number No information available

## **SECTION 2: Hazards identification**

GHS Classification

Not classified

Label elements

**Hazard statements** 

Not classified

UGHS / EN

Other hazards which do not result in classification

Streptavidin-PE Revision date 17-May-2023

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

Substance

Not applicable

Mixture

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	CAS No	Weight-%
Non-hazardous ingredients	Proprietary	Balance

# **SECTION 4: First aid measures**

**Description of first aid measures** 

**General advice** No hazards which require special first aid measures.

Emergency telephone number Poisons Information Centre, Australia: 13 11 26

Poisons Information Centre, New Zealand: 0800 764 766

**Inhalation** Remove to fresh air.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a doctor.

**Skin contact** Wash skin with soap and water.

**Ingestion** Rinse mouth thoroughly with water.

Most important symptoms and effects, both acute and delayed

**Symptoms** No information available.

Indication of any immediate medical attention and special treatment needed

Note to doctors Treat symptomatically.

# **SECTION 5: Firefighting measures**

**Suitable Extinguishing Media** 

surrounding environment.

**Unsuitable extinguishing media** No information available.

Specific hazards arising from the chemical

Specific hazards arising from the

None known.

chemical

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear.

Use personal protection equipment.

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# **SECTION 6: Accidental release measures**

Personal precautions, protective equipment and emergency procedures

**Personal precautions** See section 8 for more information.

**Environmental precautions** 

**Environmental precautions** See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up**Pick up and transfer to properly labelled containers.

Precautions to prevent secondary hazards

**Prevention of secondary hazards** Clean contaminated objects and areas thoroughly observing environmental regulations.

## SECTION 7: Handling and storage

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

**Storage Conditions** Store according to product and label instructions.

**Incompatible materials**None known based on information supplied.

# SECTION 8: Exposure controls/personal protection

**Control parameters** 

Exposure Limits This product, as supplied, does not contain any hazardous materials with occupational

exposure limits established by the region specific regulatory bodies.

**Biological occupational exposure limits** 

This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies

**Appropriate engineering controls** 

Engineering controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

**Skin and body protection** Wear suitable protective clothing.

**Hand protection** Wear suitable gloves.

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

None known

**Environmental exposure controls** No information available.

# SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Physical state Liquid

Appearance aqueous solution Colour colourless Odour Odourless.

Odour threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

pH 7.4 Melting point / freezing point 0 °C

Melting point / freezing point  $0 \, ^{\circ}\text{C}$ Boiling point / boiling range  $100 \, ^{\circ}\text{C}$ 

Flash point No data available None known Evaporation rate No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive No data available

limits

Lower flammability or explosive No data available

limits

Vapour pressureNo data availableNone knownVapour densityNo data availableNone knownRelative densityNo data availableNone known

Water solubility Miscible in water

Solubility(ies)No data availableNone knownPartition coefficientNo data availableNone knownAutoignition temperatureNo data availableNone knownDecomposition temperatureNo data availableNone knownKinematic viscosityNo data availableNone known

Dynamic viscosity

No data available

Explosive properties

Not applicable

Explosive properties Not applicable Not applicable

Other information

Molecular weightNot applicableVOC contentNot applicable

# SECTION 10: Stability and reactivity

Reactivity

**Reactivity** No information available.

**Chemical stability** 

**Stability** Stable under normal conditions.

**Explosion data** 

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

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**Possibility of hazardous reactions** None under normal processing.

**Conditions to avoid** 

Conditions to avoid None known based on information supplied.

**Incompatible materials** 

**Incompatible materials**None known based on information supplied.

**Hazardous decomposition products** 

Hazardous decomposition products None known based on information supplied.

# SECTION 11: Toxicological information

#### **Acute toxicity**

Information on likely routes of exposure

Product Information

**Inhalation** Specific test data for the substance or mixture is not available.

**Eye contact** Specific test data for the substance or mixture is not available.

**Skin contact** Specific test data for the substance or mixture is not available.

**Ingestion** Specific test data for the substance or mixture is not available

**Symptoms** No information available.

Numerical measures of toxicity - Product Information

See section 16 for terms and abbreviations

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

Skin corrosion/irritation Based on available data, the classification criteria are not met. Serious eye damage/eye irritation Based on available data, the classification criteria are not met. Respiratory or skin sensitisation Based on available data, the classification criteria are not met. Germ cell mutagenicity Based on available data, the classification criteria are not met. Carcinogenicity Based on available data, the classification criteria are not met. Based on available data, the classification criteria are not met. Reproductive toxicity STOT - single exposure Based on available data, the classification criteria are not met. STOT - repeated exposure Based on available data, the classification criteria are not met. **Aspiration hazard** Based on available data, the classification criteria are not met.

# SECTION 12: Ecological information

**Ecotoxicity** 

**Ecotoxicity** 

**Unknown aquatic toxicity** 0.02 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

**Bioaccumulation** No information available.

**Mobility** 

**Mobility** 

Mobility in soil No information available.

Other adverse effects

Other adverse effects No information available.

# **SECTION 13: Disposal considerations**

Waste treatment methods

Waste from residues/unused

products

Dispose of in accordance with local regulations. Dispose of waste in accordance with

environmental legislation.

No information available.

**Contaminated packaging** Do not reuse empty containers.

# **SECTION 14: Transport information**

ADG Not regulated

IATA Not regulated

IMDG Not regulated

### Transport in bulk according to Annex II of MARPOL and the IBC Code

No information available

# SECTION 15: Regulatory information

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

#### **National regulations**

#### Australia

See section 8 for national exposure control parameters

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

No poisons schedule number allocated

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#### International Inventories

Contact supplier for inventory compliance status

#### International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

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

Prepared By Bio-Rad Laboratories, Environmental Health and Safety

Revision date 17-May-2023

**Revision Note** Reformatted and updated existing information.

#### Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value \* Skin designation

C Carcinogen

#### Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme

Organisation for Economic Co-operation and Development Screening Information Data Set

RTECS (Registry of Toxic Effects of Chemical Substances)

World Health Organization

#### Disclaimer

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