

SAFETY DATA SHEET

Legal Entity / Contact Address

239/2, Rajdamri Road, Lumpini,

Pathumwan, Bangkok 10330

Thailand

1st and 2nd Floor, Lumpini 1 Building

Bio-Rad Laboratories Ltd.

This safety data sheet was created pursuant to the requirements of: GB/T 16483-2008, GB/T 17519-2013

Product Name 10X APOPTOSIS WASH BUFFER - #10471

Revision date 17-Nov-2021

Revision Number 2

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

Product identifier

Product Name 10X APOPTOSIS WASH BUFFER - #10471

Other means of identification

Safety data sheet number 10471

Pure substance/mixture Mixture

Details of the supplier of the safety data sheet

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

Hercules, CA 94547

USA

<u>Manufacturer</u>

Bio-Rad Endeavour House

Langford Business Park

Kidlington Oxford OX5 1GE United Kingdom

e-mail:

antibody_safetydatasheets@bio-rad.co

m

Technical Service +66 2 652 8313

ctsthailand@bio-rad.com

Emergency telephone number

24 Hour Emergency Phone Number CHEMTREC Hong Kong: 800-968-793

Recommended use of the chemical and restrictions on use

Recommended use For research use only

SECTION 2: Hazards identification

Emergency Overview

No significant adverse health effects

Appearance Clear to semi-clear Physical state Liquid Odour No information available

Classification of the substance or mixture

Not classified

Revision date 17-Nov-2021

Review Date 17-Nov-2021

Page 1/8

Product Name 10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number OXAC-10471

Revision date 17-Nov-2021

Label elements

Hazard statements

Not classified

Physical and chemical hazards

Not applicable.

Health hazards

Immediate Health Effects: Not applicable.

Chronic effects: Not applicable.

Environmental hazards

Not applicable

Other hazards which do not result in classification

Contains animal source material (Cattle)

SECTION 3: Composition/information on ingredients

Substance

Not applicable.

Mixture

Not classified.

Chemical name	Weight-%	CAS No
Sodium azide	0.1 - 0.299	26628-22-8

SECTION 4: First aid measures

Description of necessary first aid measures

General advice No hazards which require special first aid measures.

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

No information available.

For emergency responders No information available.

Note to doctors Treat symptomatically.

Product Name 10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number OXAC-10471

Revision date 17-Nov-2021

SECTION 5: Firefighting measures

Extinguishing media

surrounding environment.

Unsuitable extinguishing media No information available.

Specific hazards arising from the

chemical

No information available.

Special protective actions 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 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. Pick up and transfer to properly

labelled containers.

Precautions to prevent secondary

<u>hazards</u>

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. See Section 8 for

information on appropriate personal protective equipment.

Conditions for safe storage, including any incompatibilities

Store according to product and label instructions.

Incompatible materials Metals.

SECTION 8: Exposure controls/personal protection

Occupational exposure limits

Chemical name	China	ACGIH TLV
Sodium azide - 26628-22-8	Ceiling: 0.3 mg/m³ Ceiling	Ceiling: 0.29 mg/m³ Sodium azide Ceiling: 0.11 ppm Hydrazoic acid vapor

Note See section 16 for terms and abbreviations

Revision date 17-Nov-2021

Review Date 17-Nov-2021

Product Name 10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number

Revision date 17-Nov-2021

Biological occupational exposure limits

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

Monitoring and observation processes

No applicable information was found.

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 protectionWear 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.

OXAC-10471

General hygiene considerations Handle in accordance with good industrial hygiene and safety practice.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Appearance Clear to semi-clear

Colour Varies
Physical state Liquid

Odour No information available
Odour threshold No information available

Property	<u>Values</u>	Remarks • Method
nU .		None known

pH		None known
Melting point / freezing point	No data available	None known
Boiling point / boiling range	No data available	None known
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
Soluble in water
No data available
No data available

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

Additional information

Explosive properties Not applicable

Revision date 17-Nov-2021

Review Date 17-Nov-2021

Product Name 10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number

Revision date 17-Nov-2021

Oxidising properties Not applicable

SECTION 10: Stability and reactivity

<u>Stability</u> Stable under normal conditions.

<u>Possibility of hazardous reactions</u> 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

OXAC-10471

toxic gases.

Sensitivity to mechanical impact None. Sensitivity to static discharge None.

Conditions to avoidNone known based on information supplied.

Incompatible materials Metals.

<u>Hazardous decomposition products</u> None known based on information supplied.

SECTION 11: Toxicological information

Acute toxicity

Numerical measures of toxicity

Oral LD50 No information available
Dermal LD50 No information available
Inhalation LC50 No information available

Component Information

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium azide	= 27 mg/kg (Rat)	= 20 mg/kg (Rabbit)	-
		= 50 mg/kg (Rat)	

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.

Specific target organ toxicity —

single exposure

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

Specific target organ toxicity —

repeated exposure

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

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

Revision date 17-Nov-2021

SECTION 12: Ecological information

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	Crustacea
Sodium azide	-	LC50: =0.7mg/L (96h, Lepomis	-
		macrochirus)	
		LC50: =0.8mg/L (96h,	
		Oncorhynchus mykiss)	
		LC50: =5.46mg/L (96h,	
		Pimephales promelas)	

<u>Persistence and degradability</u> No information available.

Bioaccumulative potential No information available.

Mobility in soil No information available.

SECTION 13: Disposal considerations

Waste chemicals 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

OXAC-10471

accordance with environmental legislation.

Contaminated packaging Do not reuse empty containers.

SECTION 14: Transport information

IMDG Not regulated

Transport in bulk according to No information available

Annex II of MARPOL and the IBC

Code

IATA Not regulated

China Not regulated

Special precautions for user

Please refer to the applicable dangerous goods regulations for additional information

SECTION 15: Regulatory information

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

National regulations

Law of the People's Republic of China on Prevention and Control of Occupational Diseases

Catalogue of occupational hazard factors:

Catalogue of occupational diseases:

Not applicable.

Not applicable.

Revision date 17-Nov-2021

Review Date 17-Nov-2021

10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number OXAC-10471 **Product Name**

Revision date 17-Nov-2021

Regulations on the Control over Safety of Hazardous Chemicals

Inventory of hazardous chemicals

The table below indicates ingredients above the cut-off threshold considered as relevant which are listed.

Weight-% 0

Chemical name	Inventory of hazardous chemicals
Sodium azide	Listed, Highly toxic

GB 18218-2009 Identification of major hazard installations for dangerous chemicals Not applicable

List of hazardous chemicals under priority management Not applicable

Regulations on Labour Protection in Workplaces Where Toxic Substances Are Used

Inventory of highly toxic goods Not applicable

Regulations for Environmental Management on the First Import of Chemicals and the Import and Export of Toxic

Chemicals

List of toxic chemicals severely restricted for import and export in China Not applicable

Measures for the Environmental Management of New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances
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

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

Abbreviations and acronyms

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

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

Product Name 10X APOPTOSIS WASH BUFFER - #10471 (M)SDS Number OXAC-10471

Revision date 17-Nov-2021

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