# BIO RAD

## Material Safety Data Sheet

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Reviewed on 09/29/2011

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

· Product identifier

· Trade name: Bio-Safe™ Coomassie Stain

• Catalog or product number: 1610786, 1610787, 1610786S, 1610787EDU, 9704607, 4307131, 4307045 • Application of the substance / the preparation Laboratory chemicals

Details of the supplier of the safety data sheet

Manufacturer/Supplier: Bio-Rad Laboratories, Life Science Group 2000 Alfred Nobel Drive Hercules, California 94547

(510)741-1000

· Information department: Technical services, customer support.

· Emergency telephone number:

1(800)424-9300 Use only in the event of a CHEMICAL EMERGENCY involving a SPILL, LEAK, FIRE, EXPLOSION or ACCIDENT. 510-741-1000

2 Composition/information on ingredients

· Chemical characterization: Mixtures

· Description: Mixture of the substances listed below with non-hazardous additions.

· Listing of dangerous and non-hazardous components:			
7732-18-5	water		50-100%
7664-38-2	phosphoric acid	C R34	2.5-5%
67-56-1	methanol	T R23/24/25-39/23/24/25 F R11	0.1-1.0%

• Additional information For the wording of the listed risk phrases refer to section 15.

### **3 Hazards identification**

- · Classification of the substance or mixture
- · Classification according to Directive 67/548/EEC or Directive 1999/45/EC Void
- · Information concerning particular hazards for human and environment:

The product does not have to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

#### · Classification system:

The classification was made according to the latest editions of the EU-lists, and expanded upon from company and literature data.

The classification was made according to OSHA 29CFR 1910.1200 and 1910.1030, and is expanded upon from company and/or literature information.

#### · Label elements

· Labelling according to EU guidelines:

Observe the general safety regulations when handling chemicals The product is not subject to identification regulations under EU Directives and the Ordinance on Hazardous Materials (GefStoffV).

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· Safety phrases:

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35 This material and its container must be disposed of in a safe way.

#### 4 First aid measures

- · General information No special measures required.
- · After inhalation Supply fresh air; consult doctor in case of complaints.
- · After skin contact Generally the product does not irritate the skin.
- · After eye contact Rinse opened eye for several minutes under running water.
- After swallowing Induce vomiting and call for medical help.

#### 5 Firefighting measures

- Suitable extinguishing agents
- CO2, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
- · Special hazards arising from the substance or mixture No further relevant information available.
- · Protective equipment: No special measures required.

### 6 Accidental release measures

- · Personal precautions, protective equipment and emergency procedures Wear protective equipment (See section 8). Keep unprotected persons away.
- · Environmental precautions: Dilute with plenty of water.

Do not allow to enter sewers/ surface or ground water.

- Methods and material for containment and cleaning up: Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust). Dispose contaminated material as waste according to item 13.
- Reference to other sections No dangerous substances are released. See Section 7 for information on safe handling See Section 8 for information on personal protection equipment. See Section 13 for disposal information.

### 7 Handling and storage

- · Handling
- · Precautions for safe handling No special measures required.
- · Information about protection against explosions and fires: No special measures required.
- · Storage
- · Requirements to be met by storerooms and receptacles: According to product specification
- · Information about storage in one common storage facility: Not required.
- · Further information about storage conditions: None.
- · Specific end use(s) No further relevant information available.

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· pH-value:

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- USA

8 Exposure controls/personal	protection
	ign of technical systems: No further data; see item 7.
	It require monitoring at the workplace:
7664-38-2 phosphoric acid	
PEL () 1 mg/m <sup>3</sup>	
REL () Short-term value: 3 mg/m <sup>3</sup>	
Long-term value: 1 mg/m <sup>3</sup>	
TLV () Short-term value: 3 mg/m <sup>3</sup>	
Long-term value: 1 mg/m <sup>3</sup>	
67-56-1 methanol	
PEL () 260 mg/m <sup>3</sup> , 200 ppm	
REL () Short-term value: 325 mg/m	<sup>3</sup> 250 nnm
Long-term value: 260 mg/m <sup>2</sup>	<sup>3</sup> 200 ppm
Skin	, <b></b> pp
TLV () Short-term value: 328 mg/m	<sup>3</sup> , 250 ppm
Long-term value: 262 mg/m <sup>3</sup>	
Skin; BEI	
64-17-5 ethanol	
PEL () 1900 mg/m³, 1000 ppm	
REL () 1900 mg/m³, 1000 ppm	
TLV () Short-term value: 1880 mg/r	n³, NIC-1000 ppm
Long-term value: 1880 mg/n	
NIC-A3	
· Additional information: The lists th	hat were valid during the creation were used as basis.
· Personal protective equipment	5
Breathing equipment: Not required     Protection of hands: Protective glo	
• Material of gloves	
from manufacturer to manufacture material can not be calculated in ad	s does not only depend on the material, but also on further marks of quality and vari er. As the product is a preparation of several substances, the resistance of the glo wance and has therefore to be checked prior to the application.
Synthetic gloves	
· Penetration time of glove material	
	be found out by the manufacturer of the protective gloves and has to be observed.
<ul> <li>Eye protection: Safety glasses</li> </ul>	
Physical and chemical prop	erties
· General Information	
· General Information · Appearance:	
Form:	liquid
Color:	According to product specification
· Odor:	Accid
· Odour threshold:	Not determined.
	Not determined.

Not determined.

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<ul> <li>Change in condition Melting point/Melting range: Boiling point/Boiling range:</li> </ul>	undetermined 100°C	
· Flash point:	Not applicable	
· Flammability (solid, gaseous)	Not applicable.	
· Ignition temperature:		
Decomposition temperature:	Not determined.	
· Auto igniting:	Product is not selfigniting.	
· Danger of explosion:	Product does not present an explosion hazard.	
· Explosion limits: Lower: Upper:	Not determined. Not determined.	
· Vapor pressure at 20°C:	23 hPa	
<ul> <li>Density:</li> <li>Relative density</li> <li>Vapour density</li> <li>Evaporation rate</li> </ul>	Not determined Not determined. Not determined. Not determined.	
<ul> <li>Solubility in / Miscibility with Water:</li> </ul>	Fully miscible	
· Segregation coefficient (n-octonol/w	ater): Not determined.	
<ul> <li>Viscosity: dynamic: kinematic:</li> </ul>	Not determined. Not determined.	
<ul> <li>Solvent content:</li> <li>Organic solvents:</li> <li>Water:</li> <li>Other information</li> </ul>	1.1 % 93.9 % No further relevant information available.	

## 10 Stability and reactivity

· Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.

- · Incompatible materials: No further relevant information available.
- · Hazardous decomposition products: No dangerous decomposition products known

## 11 Toxicological information

· Acute toxicity:

· LD/LC50 values for hazardous components per OSHA criteria:	

### 67-56-1 methanol

Oral LD50 5628 mg/kg (rat)

Dermal LD50 20000 mg/kg (rat)

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- · Primary irritant effect:
- · on the skin: No irritant effect.
- · on the eye: No irritant effect.
- · Sensitization: No sensitizing effects known.
- · Additional toxicological information:

The product is not subject to classification according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version:

When used and handled according to specifications, the product does not have any harmful effects according to our experience and the information provided to us.

· Target organs: Not applicable.

### 12 Ecological information

- · Acquatic toxicity: No further relevant information available.
- · Persistence and degradability No further relevant information available.
- · Behavior in environmental systems:
- · Bioaccumulative potential No further relevant information available.
- · Additional ecological information:
- · General notes:
- Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water.

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

#### 13 Disposal considerations

- · Waste treatment methods
- · Recommendation

Hand over to hazardous waste disposers. Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

- · Uncleaned packagings:
- Recommendation: Disposal must be made according to official regulations.
- · Recommended cleansing agent: Water, if necessary with cleansing agents.

UN-Number		
DOT, ADR, ADN, IMDG, IATA	Void	
UN proper shipping name		
DOT, ÁDR, ADN, IMDG, IATA	Void	
Transport hazard class(es)		
DOT, ADR, ADN, IMDG, IATA		
Class	Void	
Packing group		
DOT, ADR, IMDG, IATA	Void	
Environmental hazards:		
Marine pollutant:	No	

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<ul> <li>Special precautions for user</li> </ul>	Not applicable.
<ul> <li>Transport in bulk according to Annex II of MAR and the IBC Code</li> </ul>	RPOL73/78 Not applicable.
· Transport/Additional information:	Not dangerous according to the above specifications.

#### **15 Regulatory information**

· SARA (Superfund Amendents and Reauthorization Act of 1986 - USA)
· Section 302/304 (40CFR355.30 / 40CFR355.40):
None of the ingredients is listed.
· Section 313 (40CFR372.65):
67-56-1 methanol

• TSCA (Toxic Substances Control Act):

All ingredients are listed.

· California Proposition 65:

• Developmental Toxicity
 64-17-5 ethanol

· Carcinogenic categories

· EPA (Environmental Protection Agency)

None of the ingredients is listed.

· IARC (International Agency for Research on Cancer)

None of the ingredients is listed.

• NTP (National Toxicology Program)

None of the ingredients is listed.

· TLV (Threshold Limit Value established by ACGIH)

64-17-5 ethanol

· MAK (German Maximum Workplace Concentration)

64-17-5 ethanol

· NIOSH-Ca (National Institute for Occupational Safety and Health)

None of the ingredients is listed.

· OSHA-Ca (Occupational Safety & Health Administration)

None of the ingredients is listed.

#### · National regulations

• Technical instructions (air):

## Class Share in %

1	0.1-1.0
NK	0.01-0.1

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USA

• Water hazard class: Water hazard class 1 (Self-assessment): slightly hazardous for water.

### 16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

· Department issuing MSDS: Environmental Health and Safety.

· Contact:

Life Science Group, Environmental Health and Safety, 2000 Alfred Nobel Drive, Hercules, California, 94547: 1(510) 741-1000

Diagnostic Group, Environmental Health and Safety, 4000 Alfred Nobel Drive, Hercules, California, 94547: 1(510) 724-7000 · \* Data compared to the previous version altered.