

MR Solution

SECTION 1. IDENTIFICATION

Product Identifier	MR Solution
Other Means of Identification	Aqueous solution of guanidine thiocyanate
Other Identification	47154-2
Product Family	AllPrep® Fungal DNA/RNA/Protein Kit (50)
Recommended Use	For laboratory research purposes only.
Restrictions on Use	Not applicable.
Manufacturer / Supplier	MO BIO Laboratories, Inc., 2746 Loker Avenue West, Carlsbad, CA, 92010, Technical Support, 800-606-6246 , www.mobio.com
Emergency Phone No.	MO BIO Laboratories, Inc., 800-606-6246 , M-F 8:00AM-5:00PM PST

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification

Acute toxicity (Oral) - Category 4; Skin corrosion/irritation - Category 1C; Serious eye damage/eye irritation - Category 1

GHS Label Elements



Signal Word:

Danger

Hazard Statement(s):

H302 Harmful if swallowed.

H314 Causes severe skin burns and eye damage.

Precautionary Statement(s):

P264 Wash hands and skin thoroughly after handling.

P270 Do not eat, drink or smoke when using this product.

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P301 + P312 IF SWALLOWED: Call a POISON CENTER/doctor if you feel unwell.

P301 + P330 + P331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

P303 + P361 + P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P304 + P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing.

P363 Wash contaminated clothing before reuse.

P310 Immediately call a POISON CENTER/doctor.

P501 Dispose of contents/container in accordance with local, regional, national and international regulations.

Other Hazards

Hazard Not Otherwise Classified (HNOC): None known.

Product Identifier: MR Solution

Date of Preparation: April 29, 2015

Page 01 of 05

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Mixture:

Chemical Name	CAS No.	%	Other Identifiers
Thiocyanic acid, compd. with guanidine (1:1)	593-84-0	60-80	Guanidinium thiocyanate

SECTION 4. FIRST-AID MEASURES

First-aid Measures

Inhalation

Move to fresh air.

Skin Contact

Wash gently and thoroughly with lukewarm, gently flowing water and mild soap for 5 minutes. Thoroughly clean clothing, shoes and leather goods before reuse or dispose of safely.

Eye Contact

Immediately rinse the contaminated eye(s) with lukewarm, gently flowing water for 15-20 minutes, while holding the eyelid(s) open.

Ingestion

Rinse mouth with water. Do not induce vomiting.

First-aid Comments

Get medical advice/attention if you feel unwell or are concerned.

Most Important Symptoms and Effects, Acute and Delayed

May cause moderate to severe irritation.

Immediate Medical Attention and Special Treatment

Special Instructions

Not applicable.

SECTION 5. FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media

Carbon dioxide, dry chemical powder, appropriate foam, water spray or fog.

Unsuitable Extinguishing Media

None known.

Specific Hazards Arising from the Chemical

Heating increases the release of toxic vapor.

In a fire, the following hazardous materials may be generated: Carbon oxides, Sulphur oxides. Nitrogen oxides.

Special Protective Equipment and Precautions for Fire-fighters

Fire-fighters may enter the area if positive pressure SCBA and full Bunker Gear is worn.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment, and Emergency Procedures

Do not touch damaged containers or spilled product unless wearing appropriate protective equipment. Use the personal protective equipment recommended in Section 8 of this safety data sheet.

Environmental Precautions

It is good practice to prevent releases into the environment.

Methods and Materials for Containment and Cleaning Up

Review Section 7 (Handling) of this safety data sheet before proceeding with clean-up. Contain and soak up spill with absorbent that does not react with spilled product. Place used absorbent into suitable, covered, labelled containers for

Product Identifier: MR Solution

Date of Preparation: April 29, 2015

Page 02 of 05

disposal.

SECTION 7. HANDLING AND STORAGE

Precautions for Safe Handling

Only use where there is adequate ventilation. Do not get in eyes, on skin or on clothing. Wear personal protective equipment to avoid direct contact with this chemical. Avoid repeated or prolonged skin contact with product or with contaminated equipment/surfaces. Avoid release to the environment.

Conditions for Safe Storage

Store in an area that is: cool, dry, ventilated. Store in a closed container.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control Parameters

Not available.

Appropriate Engineering Controls

General ventilation is usually adequate.

Individual Protection Measures

Eye/Face Protection

Not required but it is good practice to wear safety glasses or chemical safety goggles.

Skin Protection

Wear chemical protective clothing e.g. gloves, aprons, boots.

Respiratory Protection

Not normally required if product is used as directed.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Basic Physical and Chemical Properties

Appearance	Clear liquid.
Odor	Odorless
Odor Threshold	Not available
pH	6.0 - 7.0
Melting Point/Freezing Point	Not available (melting); Not available (freezing)
Initial Boiling Point/Range	Not available
Flash Point	Not available
Evaporation Rate	Not available
Flammability (solid, gas)	Not applicable (liquid).
Upper/Lower Flammability or Explosive Limit	Not available (upper); Not available (lower)
Vapor Pressure	Not available
Vapor Density (air = 1)	Not available
Relative Density (water = 1)	Not available
Solubility	Not available in water
Partition Coefficient, n-Octanol/Water (Log Kow)	Not available
Auto-ignition Temperature	Not available
Decomposition Temperature	Not available
Viscosity	Not available (kinematic); Not available (dynamic)

SECTION 10. STABILITY AND REACTIVITY

Product Identifier: MR Solution
Date of Preparation: April 29, 2015

Reactivity

Not reactive under normal conditions of use.

Chemical Stability

Normally stable.

Possibility of Hazardous Reactions

None expected under normal conditions of storage and use.

Conditions to Avoid

Not applicable.

Incompatible Materials

Strong acids (e.g. hydrochloric acid), strong oxidizing agents (e.g. perchloric acid), cyanides.

Hazardous Decomposition Products

Very toxic chemicals.

SECTION 11. TOXICOLOGICAL INFORMATION**Likely Routes of Exposure**

Skin contact; eye contact; ingestion.

Acute Toxicity

Chemical Name	LD50 (oral)	LD50 (dermal)	LC50
Thiocyanic acid, compd. with guanidine (1:1)	593 mg/kg (rat)	Not available	Not available

Skin Corrosion/Irritation

No information was located.

Serious Eye Damage/Irritation

No information was located.

STOT (Specific Target Organ Toxicity) - Single Exposure**Inhalation**

No information was located.

Skin Absorption

No information was located.

Ingestion

May be harmful.

Aspiration Hazard

No information was located.

STOT (Specific Target Organ Toxicity) - Repeated Exposure

No information was located.

Respiratory and/or Skin Sensitization

No information was located.

Reproductive Toxicity**Development of Offspring**

No information was located.

Sexual Function and Fertility

No information was located.

Germ Cell Mutagenicity

No information was located.

Interactive Effects

No information was located.

Product Identifier: MR Solution

Date of Preparation: April 29, 2015

SECTION 12. ECOLOGICAL INFORMATION

Environmental information was not located.

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal Methods

Contact local environmental authorities for approved disposal or recycling methods in your jurisdiction.

SECTION 14. TRANSPORT INFORMATION

Regulation	UN No.	Proper Shipping Name	Transport Hazard Class(es)	Packing Group
US DOT	1760	Corrosive liquid, n.o.s. (Guanidinium thiocyanate solution)	8	III
IATA (Air)	1760	Corrosive liquid, n.o.s. (Guanidinium thiocyanate solution)	8	III

SECTION 15. REGULATORY INFORMATION

Safety, Health and Environmental Regulations

USA

Toxic Substances Control Act (TSCA) Section 8(b)

All ingredients are listed on the TSCA Inventory.

Additional USA Regulatory Lists

California Proposition 65: Not listed.

SECTION 16. OTHER INFORMATION

NFPA Rating **Health - 2** **Flammability - 0** **Instability - 0**

SDS Prepared By MO BIO Laboratories, Inc.

Phone No. 800-606-6246

Date of Preparation April 29, 2015

Revision Indicators The following SDS content was changed on May 16, 2016:
SECTION 14. TRANSPORT INFORMATION; Shipping Information.

Disclaimer This Safety Data Sheet (SDS) is intended only as a guide for the appropriate handling of this product by a properly trained individual. Individuals receiving this information must make their own determination as to the appropriateness of using this product for a particular purpose, and to ensure that appropriate protective measures are in place to prevent exposure, property damage, or improper environmental release. MO BIO Laboratories, Inc. shall not be held liable for damages of any nature resulting from the above product or reliance upon this information.

Product Identifier: MR Solution

Date of Preparation: April 29, 2015

Page 05 of 05