



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY UNDERTAKING

PRODUCT NAME:	CATALOG #
Myeloperoxidase (MPO) Immunoassay	DZ178C
Myeloperoxidase (MPO) Calibrators	DZ178C-CAL
Myeloperoxidase (MPO) Controls	DZ178C-CON

Supplier: **Diazyme Laboratories**
12889 Gregg Court
Poway, CA 92064, USA
858-455-4768

Manufacturer: **Diazyme Laboratories**
12889 Gregg Court
Poway, CA 92064, USA
858-455-4768

Authorized Representative: **MDSS GmbH**
Schiffgraben 41
30175 Hannover
Germany
(+49)-511-6262 8630

In case of Emergency: Call Diazyme Laboratories (858-455-4768)

Intended Use: Refer to the instruction booklet for proper and intended use.

SECTION 2: COMPOSITION/INFORMATION ON INGREDIENTS

Product	Ingredient	Amount	CAS #	EINECS #	Symbols	R-Phrase	S-Phrase
Reagent 1	Trizma Base	1.21 %	67-48-1	200-655-4	Xi	36/37/38	26/36
Reagent 1	Glycerol	2.5 %	56-81-5	200-289-5	N/A	N/A	N/A
Reagent 1	Sodium Azide	0.09 %	26628-22-8	247-852-1	T+	28/32/50/53	28/45/60/61
Reagent 1	Choline Chloride	17 %	67-48-1	200-655-4	Xi	36/37/38	26/36
Reagent 2	Sodium Azide	0.09 %	26628-22-8	247-852-1	T+	28/32/50/53	28/45/60/61
Calibrator	Sodium Azide	0.09 %	26628-22-8	247-852-1	T+	28/32/50/53	28/45/60/61
Control	Sodium Azide	0.09 %	26628-22-8	247-852-1	T+	28/32/50/53	28/45/60/61

NOTE: Physical and health hazard information on reagent mixtures has not been determined. Any physical and health information noted is based on 1) evaluation of data for the pure ingredients, and 2) concentration of ingredients as packaged.

SECTION 3: HAZARD IDENTIFICATION

TRIZMA BASE:

Emergency Overview

OSHA Hazards

Irritant

GHS Classification

Skin irritation (Category 2)

Eye irritation (Category 2A)

Specific target organ toxicity - single exposure (Category 3)

GHS Label elements, including precautionary statements

Signal word Warning

Hazard statement(s)

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

Precautionary statement(s)

P261 Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.

P264 Wash skin thoroughly after handling.

P271 Use only outdoors or in a well-ventilated area.

P280 Wear protective gloves/ eye protection/ face protection.

P302 + P352 IF ON SKIN: Wash with plenty of soap and water.

P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.

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

P312 Call a POISON CENTER or doctor/ physician if you feel unwell.

P321 Specific treatment (see supplemental first aid instructions on this label).

P332 + P313 If skin irritation occurs: Get medical advice/ attention.

P337 + P313 If eye irritation persists: Get medical advice/ attention.

P362 Take off contaminated clothing and wash before reuse.

P403 + P233 Store in a well-ventilated place. Keep container tightly closed.

P405 Store locked up.



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

P501 Dispose of contents/ container to an approved waste disposal plant.

HMIS Classification

Health hazard: 2

Flammability: 0

Physical hazards: 0

NFPA Rating

Health hazard: 2

Fire: 0

Reactivity Hazard: 0

Potential Health Effects

Inhalation May be harmful if inhaled. Causes respiratory tract irritation.

Skin May be harmful if absorbed through skin. Causes skin irritation.

Eyes Causes eye irritation.

Ingestion May be harmful if swallowed.

Classification according to Regulation (EC) No 1272/2008

Skin irritation (Category 2), H315

Eye irritation (Category 2), H319

Specific target organ toxicity - single exposure (Category 3), H335

For the full text of the H-Statements mentioned in this Section, see Section 16.

Classification according to EU Directives 67/548/EEC or 1999/45/EC

Xi Irritant R36/37/38

For the full text of the R-phrases mentioned in this Section, see Section 16.

2.2 Label elements

Labeling according Regulation (EC) No 1272/2008

Pictogram

Signal word Warning

Hazard statement(s)

H315 Causes skin irritation.

H319 Causes serious eye irritation.

Sigma - T1503 Page 2 of 7

H335 May cause respiratory irritation.

Precautionary statement(s)

P261 Avoid breathing dust.

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

Supplemental Hazard

Statements none

2.3 Other hazards - none

SODIUM AZIDE:

Emergency Overview

OSHA Hazards

Target Organ Effect, Highly toxic by ingestion, highly toxic by skin absorption

Target Organs

Heart, Central nervous system, Brain.

Other hazards which do not result in classification

Sodium Azide may react with lead and copper plumbing to form highly explosive metal azides. Rapidly absorbed through skin.

GHS Classification

Acute toxicity, Oral (Category 2)

Acute toxicity, Dermal (Category 1)

Acute aquatic toxicity (Category 1)

Chronic aquatic toxicity (Category 1)

GHS Label elements, including precautionary statements

Pictogram

Signal word Danger

Hazard statement(s)

H300 + H310 Fatal if swallowed or in contact with skin

H410 Very toxic to aquatic life with long lasting effects.

Precautionary statement(s)

P264 Wash hands thoroughly after handling.

P273 Avoid release to the environment.

P280 Wear protective gloves/ protective clothing.

P302 + P350 IF ON SKIN: Gently wash with plenty of soap and water.

P310 Immediately call a POISON CENTER or doctor/ physician.

P501 Dispose of contents/ container to an approved waste disposal plant.

Other hazards

Contact with acids liberates very toxic gas.



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

HMIS Classification

Health hazard: 4

Chronic Health Hazard: *

Flammability: 0

Physical hazards: 0

NFPA Rating

Health hazard: 4

Fire: 0

Reactivity Hazard: 0

Potential Health Effects

Inhalation May be harmful if inhaled. May cause respiratory tract irritation.

Skin May be fatal if absorbed through skin. May cause skin irritation.

Eyes May cause eye irritation.

Ingestion May be fatal if swallowed.

Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008 [EU-GHS/CLP]

Acute toxicity, Oral (Category 2)

Acute aquatic toxicity (Category 1)

Chronic aquatic toxicity (Category 1)

Classification according to EU Directives 67/548/EEC or 1999/45/EC

Very toxic if swallowed. Contact with acids liberates very toxic gas. Very toxic to aquatic organisms may cause long-term adverse effects in the aquatic environment.

Label elements

Labeling according Regulation (EC) No 1272/2008 [CLP]

Signal word Danger

Hazard statement(s)

H300 Fatal if swallowed.

H410 Very toxic to aquatic life with long lasting effects.

Precautionary statement(s)

P264 Wash hands thoroughly after handling.

P273 Avoid release to the environment.

P301 + P310 IF SWALLOWED: Immediately call a POISON CENTER or doctor/

P501 Dispose of contents/ container to an approved waste disposal plant.

Supplemental Hazard information (EU)

EUH032 Contact with acids liberates very toxic gas.

According to European Directive 67/548/EEC as amended.

R-phrases(s)

R28 Very toxic if swallowed.

R32 Contact with acids liberates very toxic gas.

R50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

S-phrases(s)

S28 After contact with skin, wash immediately with plenty of soap and water.

S45 In case of accident or if you feel unwell, seek medical advice immediately

(Show the label where possible).

S60 This material and its container must be disposed of as hazardous waste.

S61 Avoid release to the environment. Refer to special instructions/ Safety data sheets.

2.3 Other hazards

Sodium Azide may react with lead and copper plumbing to form highly explosive metal azides. Rapidly absorbed through skin.

GLYCEROL:

Emergency Overview

OSHA Hazards

Target Organ Effect

Target Organs

Kidney

GHS Classification

Skin irritation (Category 3)

Eye irritation (Category 2B)

GHS Label elements, including precautionary statements

Pictogram none

Signal word Warning

Hazard statement(s)

H316 Causes mild skin irritation.

H320 Causes eye irritation.

Precautionary statement(s)

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

HMIS Classification

Health hazard: 0

Chronic Health Hazard: *

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Flammability: 1

Physical hazards: 0

NFPA Rating

Health hazard: 0

Fire: 1

Reactivity Hazard: 0

Potential Health Effects

Inhalation May be harmful if inhaled. May cause respiratory tract irritation.

Skin May be harmful if absorbed through skin. May cause skin irritation.

Eyes May cause eye irritation.

Ingestion May be harmful if swallowed.

Classification of the substance or mixture

Not a hazardous substance or mixture according to Regulation (EC) No. 1272/2008.

This substance is not classified as dangerous according to Directive 67/548/EEC.

Label elements

The product does not need to be labeled in accordance with EC directives or respective national laws.

Other hazards – none

CHOLINE CHLORIDE:

Emergency Overview

OSHA Hazards

Irritant

GHS Classification

Acute toxicity, Oral (Category 5)

Skin irritation (Category 2)

Eye irritation (Category 2A)

Specific target organ toxicity - single exposure (Category 3)

GHS Label elements, including precautionary statements

Pictogram

Signal word Warning

Hazard statement(s)

H303 May be harmful if swallowed.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

Precautionary statement(s)

P261 Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.

P264 Wash skin thoroughly after handling.

P271 Use only outdoors or in a well-ventilated area.

P280 Wear protective gloves/ eye protection/ face protection.

P302 + P352 IF ON SKIN: Wash with plenty of soap and water.

P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.

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

P312 Call a POISON CENTER or doctor/ physician if you feel unwell.

P321 Specific treatment (see supplemental first aid instructions on this label).

P332 + P313 If skin irritation occurs: Get medical advice/ attention.

P337 + P313 If eye irritation persists: Get medical advice/ attention.

P362 Take off contaminated clothing and wash before reuse.

P403 + P233 Store in a well-ventilated place. Keep container tightly closed.

P405 Store locked up.

P501 Dispose of contents/ container to an approved waste disposal plant.

HMIS Classification

Health hazard: 2

Flammability: 0

Physical hazards: 0

NFPA Rating

Health hazard: 2

Fire: 0

Reactivity Hazard: 0

Potential Health Effects

Inhalation May be harmful if inhaled. Causes respiratory tract irritation.

Skin May be harmful if absorbed through skin. Causes skin irritation.

Eyes Causes eye irritation.

Ingestion May be harmful if swallowed.

Classification according to Regulation (EC) No 1272/2008 [EU-GHS/CLP]

Skin irritation (Category 2)

Eye irritation (Category 2)

Specific target organ toxicity - single exposure (Category 3)

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Classification is according to EU Directives 67/548/EEC or 1999/45/EC Irritating to eyes, respiratory system and skin.

Label elements

Labeling according Regulation (EC) No 1272/2008 [CLP]

Pictogram

Signal word Warning

Hazard statement(s)

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

Precautionary statement(s)

P261 Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.

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

Supplemental Hazard: none

Statements

According to European Directive 67/548/EEC as amended.

R-phrases(s)

R36/37/38 Irritating to eyes, respiratory system and skin.

S-phrases(s)

S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S36 Wear suitable protective clothing.

Other hazards - none

SECTION 4: FIRST AID MEASURES

TRIZMA BASE:

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

In case of skin contact

Wash off with soap and plenty of water. Consult a physician.

In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

SODIUM AZIDE:

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

In case of skin contact

Wash off with soap and plenty of water. Take victim immediately to hospital. Consult a physician.

In case of eye contact

Flush eyes with water as a precaution.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

GLYCEROL:

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

In case of skin contact

Wash off with soap and plenty of water. Consult a physician.

In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

CHOLINE CHLORIDE:

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

In case of skin contact

Wash off with soap and plenty of water. Consult a physician.

In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

SECTION 5: FIRE FIGHTING MEASURES**TRIZMA BASE:****Conditions of flammability**

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for firefighting if necessary.

Hazardous combustion products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx)

SODIUM AZIDE:**Conditions of flammability**

Not flammable or combustible.

Suitable extinguishing media

Dry powder

Special protective equipment for firefighters

Wear self contained breathing apparatus for firefighting if necessary.

Hazardous combustion products

Hazardous decomposition products formed under fire conditions. - Sodium oxides

GLYCEROL:**Conditions of flammability**

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for firefighting if necessary.

Hazardous combustion products

Hazardous decomposition products formed under fire conditions. - Carbon oxides

CHOLINE CHLORIDE:**Conditions of flammability**

Not flammable or combustible.

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self contained breathing apparatus for firefighting if necessary.

Sigma - C1879 Page 3 of 7

Hazardous combustion products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx), Hydrogen chloride gas

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

SECTION 6: ACCIDENTAL RELEASE MEASURES**TRIZMA BASE:****Personal precautions**

Use personal protective equipment. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.

Environmental precautions

Do not let product enter drains.

Methods and materials for containment and cleaning up

Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.

SODIUM AZIDE:**Personal precautions**

Wear respiratory protection. Avoid dust formation. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.

Environmental precautions

Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.

Methods and materials for containment and cleaning up

Pick up and arrange disposal without creating dust. Sweep up and shovel. Do not flush with water. Keep in suitable, closed containers for disposal.

GLYCEROL:**Personal precautions**

Use personal protective equipment. Avoid breathing vapours, mist or gas. Ensure adequate ventilation.

Environmental precautions

Do not let product enter drains.

Methods and materials for containment and cleaning up

Soak up with inert absorbent material and dispose of as hazardous waste. Keep in suitable, closed containers for disposal.

CHOLINE CHLORIDE:**Personal precautions**

Use personal protective equipment. Avoid dust formation. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.

Environmental precautions

Do not let product enter drains.

Methods and materials for containment and cleaning up

Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.

SECTION 7: HANDLING AND STORAGE**TRIZMA BASE:****Precautions for safe handling**

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Provide appropriate exhaust ventilation at places where dust is formed.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place. Hygroscopic.

SODIUM AZIDE:**Precautions for safe handling**

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Provide appropriate exhaust ventilation at places where dust is formed.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place.

Never allow product to get in contact with water during storage. Do not store near acids. Heat sensitive.

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13**GLYCEROL:****Precautions for safe handling**

Avoid contact with skin and eyes. Avoid inhalation of vapour or mist.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place. Hygroscopic

CHOLINE CHLORIDE:**Precautions for safe handling**

Avoid contact with skin and eyes. Avoid formation of dust and aerosols.

Provide appropriate exhaust ventilation at places where dust is formed.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place. Hygroscopic. Store under inert gas.

SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION**TRIZMA BASE:**

Contains no substances with occupational exposure limit values.

Personal protective equipment**Respiratory protection**

For nuisance exposures use type P95 (US) or type P1 (EU EN 143) particle respirator. For higher level protection use type OV/AG/P99 (US) or type ABEK-P2 (EU EN 143) respirator cartridges. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Full contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (KCL 740 / Aldrich Z677272, Size M)

Splash contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (KCL 740 / Aldrich Z677272, Size M) data source: KCL GmbH, D-36124 Eichenzell, phone +49 (0)6659 87300, e-mail sales@kcl.de, test method: EN374

If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an industrial hygienist and safety officer familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

Eye protection

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin and body protection impervious clothing, the type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.**Hygiene measures**

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

SODIUM AZIDE:

Components	CAS-No.	Value	Control Parameters	Basis
Sodium Azide	26628-22-8	C	0.1 ppm	USA. OSHA - TABLE Z-1 Limits for Air Contaminants - 1910.1000
Remarks	Skin Notation			
	Skin Notation			
		C	0.1 ppm	USA. NIOSH Recommended Exposure Limits
	Potential for dermal absorption			
		C	0.3 mg/m3	USA. NIOSH Recommended Exposure Limits



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

	Potential for dermal absorption			
		C	0.11 ppm	USA. ACGIH Threshold Limit Values (TLV)
	Lung damage Cardiac impairment Not classifiable as a human carcinogen			
		C	0.29 mg/m3	USA. ACGIH Threshold Limit Values (TLV)
	Lung damage Cardiac impairment Not classifiable as a human carcinogen			

Personal protective equipment

Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type N100 (US) or type P3 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Immersion protection

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (Aldrich Z677272, Size M)

Splash protection

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (Aldrich Z677272, Size M) data source: KCL GmbH, D-36124 Eichenzell, phone +49 (0)6659 873000, e-mail sales@kcl.de, test method: EN374

If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an Industrial

Hygienist familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

Eye protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin and body protection

Complete suit protecting against chemicals, the type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Hygiene measures

Avoid contact with skin, eyes and clothing. Wash hands before breaks and immediately after handling the product.

GLYCEROL:

Components	CAS-No.	Value	Control Parameters	Basis
Glycerol	56-81-5	TWA	10 mg/m3	USA. OSHA - TABLE Z-1 Limits for Air Contaminants - 1910.1000
		TWA	5 mg/m3	USA. OSHA - TABLE Z-1 Limits for Air Contaminants - 1910.1000
		TWA	10 mg/m3	USA. ACGIH Threshold Limit Values (TLV)
Remarks	Upper Respiratory Tract irritation			
		TWA	15 mg/m3	USA. Occupational Exposure Limits (OSHA) - Table Z-1 Limits for Air Contaminants
		TWA	5 mg/m3	USA. Occupational Exposure Limits (OSHA) - Table Z-1 Limits for Air Contaminants
	See Appendix D - Substances with No Established RELs			
Glycerol	56-81-5	TWA	10 mg/m3	UK. EH40 WEL - Workplace Exposure Limits
Remarks	Where no specific short-term exposure limit is listed, a figure three times the long-term exposure should be used			

Personal protective equipment

Respiratory protection

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration

Effective: 06/04/13

Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Full contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (KCL 740 / Aldrich Z677272, Size M)

Splash contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested: Dermatrill® (KCL 740 / Aldrich Z677272, Size M) data source: KCL GmbH, D-36124 Eichenzell, phone +49 (0)6659 87300, e-mail sales@kcl.de, test method: EN374

If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an industrial hygienist and safety officer familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

Eye protection

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin and body protection impervious clothing, the type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

CHOLINE CHLORIDE:

Contains no substances with occupational exposure limit values.

Personal protective equipment**Respiratory protection**

For nuisance exposures use type P95 (US) or type P1 (EU EN 143) particle respirator. For higher level protection use type OV/AG/P99 (US) or type ABEK-P2 (EU EN 143) respirator cartridges. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

Immersion protection

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: > 480 min

Material tested: Dermatrill® (Aldrich Z677272, Size M)

Splash protection

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: > 30 min

Material tested: Dermatrill® (Aldrich Z677272, Size M) data source: KCL GmbH, D-36124 Eichenzell, phone +49 (0)6659 873000, e-mail sales@kcl.de, test method: EN374

If used in solution, or mixed with other substances, and under conditions which differ from EN 374, contact the supplier of the CE approved gloves. This recommendation is advisory only and must be evaluated by an Industrial

Hygienist familiar with the specific situation of anticipated use by our customers. It should not be construed as offering an approval for any specific use scenario.

Eye protection

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin and body protection impervious clothing, the type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

TRIZMA BASE:

Appearance

Form crystalline

Colour white

Safety data

pH 10.5 – 12

Melting point/freezing point 171.2 - 172.3 °C (340.2 - 342.1 °F)

Boiling point 219 - 220 °C (426 - 428 °F) at 13.3 hPa (10.0 mmHg)

Flash point no data available

Ignition temperature no data available

Auto-ignition
Temperature no data available

Lower explosion limit no data available

Upper explosion limit no data available

Vapor pressure no data available

Density no data available

Water solubility no data available

Partition coefficient:
n-octanol/water no data available

Relative vapour
Density no data available

Odour no data available

Odour Threshold no data available

Evaporation rate no data available

SODIUM AZIDE:

Appearance

Form crystalline

Colour white

Safety data

pH 10 at 65 g/l at 25 °C (77 °F)

Melting point/freezing point 275 °C (527 °F)

Boiling point no data available

Flash point no data available

Ignition temperature no data available

Autoignition
Temperature no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Lower explosion limit	no data available
Upper explosion limit	no data available
Vapour pressure	0.01 hPa (0.01 mmHg) at 20 °C (68 °F)
Density	1.850 g/cm ³
Water solubility	65 g/l at 20 °C (68 °F) - completely soluble
Partition coefficient: n-octanol/water	no data available
Relative vapour Density	no data available
Odour	no data available
Odour Threshold	no data available
Evaporation rate	no data available

GLYCEROL:

Appearance

Form	liquid
Colour	clear

Safety data

pH	5.5 - 8
----	---------

Melting point/freezing point
Melting point/range: 20 °C (68 °F)

Boiling point 182 °C (360 °F) at 27 hPa (20 mmHg)

Flash point 160 °C (320 °F) - closed cup

Ignition temperature 370 °C (698 °F)

Auto-ignition
Temperature no data available

Lower explosion limit 0.9 % (V)

Vapour pressure 0.0033 hPa (0.0025 mmHg) at 50 °C (122 °F)

Density 1.25 g/mL

Water solubility soluble
Partition coefficient:
n-octanol/water no data available

Relative vapour 3.18
Density - (Air = 1.0)

Odour odourless
Odour Threshold no data available
Evaporation rate no data available

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

CHOLINE CHLORIDE:**Appearance**

Form solid
Colour white

Safety data

pH 5.0 - 6.5 at 140 g/l at 25 °C (77 °F)

Melting point/freezing point

Melting point/range: 302 - 305 °C (576 - 581 °F) - dec.

Boiling point no data available

Flash point no data available

Ignition temperature no data available

Autoignition

Temperature no data available

Lower explosion limit no data available

Upper explosion limit no data available

Vapour pressure no data available

Density no data available

Water solubility 140 g/l

Partition coefficient:

n-octanol/water no data available

Relative vapour

Density no data available

Odour no data available

Odour Threshold no data available

Evaporation rate no data available

SECTION 10: STABILITY AND REACTIVITY**TRIZMA BASE:****Chemical stability**

Stable under recommended storage conditions.

Possibility of hazardous reactions

no data available

Conditions to avoid

hygroscopic

Materials to avoid

Strong oxidizing agents

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx)

Other decomposition products - no data available

SODIUM AZIDE:**Chemical stability**

Stable under recommended storage conditions.

Possibility of hazardous reactions

no data available

Conditions to avoid



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

An explosion occurred when a mixture of sodium azide, methylene chloride, dimethyl sulfoxide, and sulfuric acid were being concentrated on a rotary evaporator.

Materials to avoid

Halogenated hydrocarbon, Metals, Acids, Acid chlorides

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Sodium oxides

Other decomposition products - no data available

Thermal decomposition

300 °C

GLYCEROL:

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

no data available

Conditions to avoid

no data available

Materials to avoid

Strong bases, Strong oxidizing agents

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides

Other decomposition products - no data available

CHOLINE CHLORIDE:

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

no data available

Conditions to avoid

no data available

Materials to avoid

Strong oxidizing agents, Strong acids, Strong bases

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NOx), Hydrogen chloride gas

Other decomposition products - no data available

SECTION 11: TOXICOLOGICAL INFORMATION

TRIZMA BASE:

Acute toxicity

Oral LD50

LD50 Oral - rat - 5,900 mg/kg

Inhalation LC50

No data available

Dermal LD50

no data available

Other information on acute toxicity

no data available

Skin corrosion/irritation

no data available

Serious eye damage/eye irritation

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Carcinogenicity

IARC: No component of this product presents at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

ACGIH: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

NTP: No component of this product presents at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

Reproductive toxicity

no data available

Teratogenicity

no data available

Specific target organ toxicity - single exposure (Globally Harmonized System)

Inhalation - May cause respiratory irritation.

Specific target organ toxicity - repeated exposure (Globally Harmonized System)

no data available

Aspiration hazard

no data available

Potential health effects

Inhalation May be harmful if inhaled. Causes respiratory tract irritation.

Ingestion May be harmful if swallowed.

Skin May be harmful if absorbed through skin. Causes skin irritation.

Eyes Causes eye irritation.

Signs and Symptoms of Exposure

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

Synergistic effects

no data available

Additional Information

RTECS: TY2900000

SODIUM AZIDE:

Acute toxicity

Oral LD50

no data available

Inhalation LC50

LC50 Inhalation - rat - 37 mg/m³

Remarks: Sense Organs and Special Senses (Nose, Eye, Ear, and Taste): Eye: Other. Behavioral: Convulsions or effect on seizure threshold. Lungs, Thorax, or Respiration: Structural or functional change in trachea or bronchi.

Dermal LD50

LD50 Dermal - rabbit - 20 mg/kg

Other information on acute toxicity

no data available

Skin corrosion/irritation

no data available

Serious eye damage/eye irritation

no data available

Respiratory or skin sensitization

no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Germ cell mutagenicity

no data available

Carcinogenicity

IARC: No component of this product presents at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC. NTP:

No component of this product presents at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product present at levels greater than or equal to 0.1% is identified as a

Sigma-Aldrich - S8032 Page 6 of 8 carcinogen or potential carcinogen by OSHA.

Reproductive toxicity

no data available

Teratogenicity

no data available

Specific target organ toxicity - single exposure (Globally Harmonized System)

no data available

Specific target organ toxicity - repeated exposure (Globally Harmonized System)

no data available

Aspiration hazard

no data available

Potential health effects

Inhalation May be harmful if inhaled. May cause respiratory tract irritation.

Ingestion May be fatal if swallowed.

Skin May be fatal if absorbed through skin. May cause skin irritation.

Eyes May cause eye irritation.

Signs and Symptoms of Exposure

Nausea, Headache, Vomiting, Laboratory experiments in animals have shown sodium azide to produce a profound hypotensive effect, demyelination of myelinated nerve fibers in the central nervous system, testicular damage, blindness, attacks of rigidity, and hepatic and cerebral effects.

Synergistic effects

no data available

Additional Information

RTECS: VY8050000

GLYCEROL:

Acute toxicity

Oral LD50

LD50 Oral - rat - 12,600 mg/kg

Inhalation LC50

Sigma-Aldrich - G6279 Page 5 of 7

no data available

Dermal LD50

LD50 Dermal - rabbit - > 10,000 mg/kg

Other information on acute toxicity

no data available

Skin corrosion/irritation

Skin - rabbit - Mild skin irritation - 24 h



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Serious eye damage/eye irritation

Eyes - rabbit - Mild eye irritation - 24 h

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

IARC: No component of this product presents at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

ACGIH: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

NTP: No component of this product presents at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

Reproductive toxicity

no data available

Teratogenicity

no data available

Specific target organ toxicity - single exposure (Globally Harmonized System)

no data available

Specific target organ toxicity - repeated exposure (Globally Harmonized System)

no data available

Aspiration hazard

no data available

Potential health effects

Inhalation May be harmful if inhaled. May cause respiratory tract irritation.

Ingestion May be harmful if swallowed.

Skin May be harmful if absorbed through skin. May cause skin irritation.

Eyes May cause eye irritation.

Signs and Symptoms of Exposure

Prolonged or repeated exposure may cause: Nausea, Headache, and Vomiting

Synergistic effects

no data available

Additional Information

RTECS: MA8050000

CHOLINE CHLORIDE:

Acute toxicity

Oral LD50

LD50 Oral - rat - 3,400 mg/kg

Remarks: Sense Organs and Special Senses (Nose, Eye, Ear, and Taste): Eye: Chromodacryorrhea.

Behavioral: Excitement. Respiratory disorder

Inhalation LC50

Dermal LD50

no data available

Other information on acute toxicity

no data available

Skin corrosion/irritation



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

no data available

Serious eye damage/eye irritation

no data available

Respiratory or skin sensitization

no data available

Germ cell mutagenicity

no data available

Carcinogenicity

IARC: No component of this product presents at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

ACGIH: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

NTP: No component of this product presents at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product presents at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

Reproductive toxicity

no data available

Teratogenicity

no data available

Specific target organ toxicity - single exposure (Globally Harmonized System)

Inhalation - May cause respiratory irritation.

Specific target organ toxicity - repeated exposure (Globally Harmonized System)

no data available

Aspiration hazard

no data available

Potential health effects

Inhalation May be harmful if inhaled. Causes respiratory tract irritation.

Ingestion May be harmful if swallowed.

Skin May be harmful if absorbed through skin. Causes skin irritation.

Eyes Causes eye irritation.

Signs and Symptoms of Exposure

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

Synergistic effects

Sigma - C1879 Page 6 of 7

no data available

Additional Information

RTECS: KH2975000

SECTION 12: ECOLOGICAL INFORMATION

TRIZMA BASE:

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

SODIUM AZIDE:

Toxicity

no data available

Toxicity to daphnia and other aquatic invertebrates

EC50 - Daphnia pulex (Water flea) - 4.2 mg/l - 48 h

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.

Very toxic to aquatic life with long lasting effects.

GLYCEROL:

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available

PBT and vPvB assessment

no data available

Other adverse effects

no data available

CHOLINE CHLORIDE:

Toxicity

no data available

Persistence and degradability

no data available

Bioaccumulative potential

no data available

Mobility in soil

no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

PBT and vPvB assessment

no data available

Other adverse effects

no data available

SECTION 13: DISPOSAL CONSIDERATIONS

DISPOSE OF IN ACCORDANCE WITH LOCAL REGULATIONS.

SECTION 14: TRANSPORTATION INFORMATION

TRIZMA BASE:

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

UN number

ADR/RID: - IMDG: - IATA: -

UN proper shipping name

ADR/RID: Not dangerous goods

IMDG: Not dangerous goods

IATA: Not dangerous goods

Transport hazard class (es)

ADR/RID: - IMDG: - IATA: -

Packaging group

ADR/RID: - IMDG: - IATA: -

Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

Special precautions for user

no data available

SODIUM AZIDE:

DOT (US)

UN number: 1687 Class: 6.1 Packing group: II

Proper shipping name: Sodium azide

Reportable Quantity (RQ): 1000 lbs

Marine pollutant: No

Poison Inhalation Hazard: No

IMDG

UN number: 1687 Class: 6.1 Packing group: II EMS-No: F-A, S-A

Proper shipping name: SODIUM AZIDE

Marine pollutant: No

IATA

UN number: 1687 Class: 6.1 Packing group: II

Proper shipping name: Sodium azide

UN number

ADR/RID: 1687 IMDG: 1687 IATA: 1687

UN proper shipping name

ADR/RID: SODIUM AZIDE

IMDG: SODIUM AZIDE

IATA: Sodium azide

Transport hazard class (es)

ADR/RID: 6.1 IMDG: 6.1 IATA: 6.1

Packaging group

ADR/RID: II IMDG: II IATA: II

Environmental hazards

ADR/RID: yes IMDG Marine pollutant: yes IATA: no



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Special precautions for user
no data available

GLYCEROL:

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

UN number

ADR/RID: - IMDG: - IATA: -

UN proper shipping name

ADR/RID: Not dangerous goods

IMDG: Not dangerous goods

IATA: Not dangerous goods

Transport hazard class (es)

ADR/RID: - IMDG: - IATA: -

Packaging group

ADR/RID: - IMDG: - IATA: -

Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

Special precautions for user

no data available

CHOLINE CHLORIDE:

DOT (US)

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

UN number

ADR/RID: - IMDG: - IATA: -

UN proper shipping name

ADR/RID: Not dangerous goods

IMDG: Not dangerous goods

IATA: Not dangerous goods

Transport hazard class (es)

ADR/RID: - IMDG: - IATA: -

Packaging group

ADR/RID: - IMDG: - IATA: -

Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

Special precautions for user

no data available

SECTION 15: REGULATORY INFORMATION

TRIZMA BASE:

OSHA Hazards

Irritant

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

SARA 311/312 Hazards

Acute Health Hazard



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

Massachusetts Right To Know Components

No components are subject to the Massachusetts Right to Know Act.

Pennsylvania Right To Know Components

Tris (hydroxymethyl) aminomethane

CAS-No.

77-86-1

Revision Date

New Jersey Right To Know Components

Tris (hydroxymethyl) aminomethane

CAS-No.

77-86-1

Revision Date

California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

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

no data available

Chemical Safety Assessment

For this product a chemical safety assessment was not carried out

SODIUM AZIDE:

OSHA Hazards

Target Organ Effect, Highly toxic by ingestion, Highly toxic by skin absorption

SARA 302 Components

The following components are subject to reporting levels established by SARA Title III, Section 302:

Sodium azide

CAS-No.

26628-22-8

Revision Date

2007-07-01

SARA 313 Components

The following components are subject to reporting levels established by SARA Title III, Section 313:

Sodium azide

CAS-No.

26628-22-8

Revision Date

2007-07-01

SARA 311/312 Hazards

Acute Health Hazard, Chronic Health Hazard

Massachusetts Right To Know Components

Sodium azide

CAS-No.

26628-22-8

Revision Date

2007-07-01

Pennsylvania Right To Know Components

Sodium azide

CAS-No.

26628-22-8

Revision Date

2007-07-01

New Jersey Right To Know Components

Sodium azide

CAS-No.

26628-22-8

Revision Date

2007-07-01

California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

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

no data available

Chemical Safety Assessment

no data available



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

GLYCEROL:

OSHA Hazards

Target Organ Effect

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

SARA 311/312 Hazards

Chronic Health Hazard

Massachusetts Right To Know Components

Glycerol

CAS-No.

56-81-5

Revision Date

2007-03-01

Pennsylvania Right To Know Components

Glycerol

CAS-No.

56-81-5

Revision Date

2007-03-01

New Jersey Right To Know Components

Glycerol

CAS-No.

56-81-5

Revision Date

2007-03-01

California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

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

no data available

Chemical Safety Assessment

For this product a chemical safety assessment was not carried out

CHOLINE CHLORIDE:

OSHA Hazards

Irritant

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

SARA 311/312 Hazards

Acute Health Hazard

Massachusetts Right To Know Components

No components are subject to the Massachusetts Right to Know Act.

Pennsylvania Right To Know Components

Choline chloride

CAS-No.

67-48-1

Revision Date

New Jersey Right To Know Components

Choline chloride

CAS-No.

67-48-1

Revision Date

California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

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



MATERIAL SAFETY DATA SHEET

Conforms to 93/112/EC, ISO 11014:2009 and EC 1907/2006

Responsible Name: Diazyme Administration
Effective: 06/04/13

no data available

Chemical Safety Assessment For this product a chemical safety assessment was not carried out

SECTION 16: OTHER INFORMATION

PREPARED BY: Diazyme Administration
PHONE NO: 858-455-4768
DATE PREPARED: 06/04/13

The information provided on this Material Safety Data Sheet is provided in the interest of promoting safe handling of the material. While this information is believed to be correct Diazyme makes no warranty in respect to any of the information disclosed. Observe all federal, provincial, state and local laws concerning health and pollution.