# SIGMA-ALDRICH

## **SAFETY DATA SHEET**

according to Regulation (EC) No. 1907/2006 Version 5.0 Revision Date 20.12.2012 Print Date 20.11.2013 GENERIC EU MSDS - NO COUNTRY SPECIFIC DATA - NO OEL DATA

## 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1	Product identifiers Product name	:	2-(Diisopropylamino)ethanol
	Product Number Brand	:	471488 Aldrich
	CAS-No.	:	96-80-0
1.2	Relevant identified use	s of th	e substance or mixture and uses advised against

Identified uses : Laboratory chemicals, Manufacture of substances

#### 1.3 Details of the supplier of the safety data sheet

Company	:	Sigma-Aldrich Chemie BV Stationsplein 4 3331 LL ZWIJNDRECHT NETHERLANDS
Telephone Fax E-mail address	-	+31 78-620-5411 +31 78-620-5421 eurtechserv@sial.com

### 1.4 Emergency telephone number

Emergency Phone # : 112

## 2. HAZARDS IDENTIFICATION

#### 2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008 [EU-GHS/CLP] Acute toxicity, Inhalation (Category 3)

Acute toxicity, Dermal (Category 3) Acute toxicity, Oral (Category 4) Skin corrosion (Category 1B)

#### **Classification according to EU Directives 67/548/EEC or 1999/45/EC** Harmful by inhalation and if swallowed. Toxic in contact with skin. Causes burns.

#### 2.2 Label elements

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

Pictogram

Signal word



Danger

olgridi word	Danger
Hazard statement(s)	
H302	Harmful if swallowed.
H311	Toxic in contact with skin.
H314	Causes severe skin burns and eye damage.
H331	Toxic if inhaled.
Precautionary statement(s)	
P261	Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.
P280	Wear protective gloves/ protective clothing/ eye protection/ face protection.

	P305 + P351 + P338 P310	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/ physician.
	Supplemental Hazard Statements	none
According to European Directive 67/548/EEC as amended. Hazard symbol(s)		tive 67/548/EEC as amended.
	R-phrase(s) R20/22 R24 R34	Harmful by inhalation and if swallowed. Toxic in contact with skin. Causes burns.
	S-phrase(s) S26 S36/37/39 S45	In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear suitable protective clothing, gloves and eye/face protection. In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).
2.3	Other hazards - none	

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

## 3.1 Substances

Synonyms	: N,N-Diisopropylethanolamine	
Formula Molecular Weight	: C <sub>8</sub> H <sub>19</sub> NO : 145,24 g/mol	
Component	. 143,24 g/moi	Concentration

2-Diisopropylaminoethanol			
CAS-No.	96-80-0	-	
EC-No.	202-536-2		

## 4. FIRST AID MEASURES

#### 4.1 Description of first aid measures

#### **General advice**

Consult a physician. Show this safety data sheet to the doctor in attendance.

#### If inhaled

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

#### In case of skin contact

Take off contaminated clothing and shoes immediately. Wash off with soap and plenty of water. Take victim immediately to hospital. 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

Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

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

Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin., Cough, Shortness of breath, Headache, Nausea

# **4.3 Indication of any immediate medical attention and special treatment needed** no data available

## 5. FIREFIGHTING MEASURES

#### 5.1 Extinguishing media

#### Suitable extinguishing media

For small (incipient) fires, use media such as "alcohol" foam, dry chemical, or carbon dioxide. For large fires, apply water from as far as possible. Use very large quantities (flooding) of water applied as a mist or spray; solid streams of water may be ineffective. Cool all affected containers with flooding quantities of water.

- 5.2 Special hazards arising from the substance or mixture Carbon oxides, nitrogen oxides (NOx)
- **5.3** Advice for firefighters Wear self contained breathing apparatus for fire fighting if necessary.
- **5.4 Further information** Use water spray to cool unopened containers.

## 6. ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapours accumulating to form explosive concentrations. Vapours can accumulate in low areas.

#### 6.2 Environmental precautions

Prevent further leakage or spillage if safe to do so. Do not let product enter drains.

#### 6.3 Methods and materials for containment and cleaning up

Contain spillage, and then collect with an electrically protected vacuum cleaner or by wet-brushing and place in container for disposal according to local regulations (see section 13). Keep in suitable, closed containers for disposal.

## 6.4 Reference to other sections

For disposal see section 13.

## 7. HANDLING AND STORAGE

#### 7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Keep away from sources of ignition - No smoking. Take measures to prevent the build up of electrostatic charge.

## 7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

7.3 Specific end use(s) no data available

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

#### Components with workplace control parameters

#### 8.2 Exposure controls

#### Appropriate engineering controls

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

#### Personal protective equipment

### Eye/face protection

Tightly fitting safety goggles. Faceshield (8-inch minimum). Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

## **Skin 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.

The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

## **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.

#### **Respiratory protection**

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).

## 9. PHYSICAL AND CHEMICAL PROPERTIES

## 9.1 Information on basic physical and chemical properties

a)	Appearance	Form: clear, liquid Colour: light yellow
b)	Odour	no data available
c)	Odour Threshold	no data available
d)	рН	no data available
e)	Melting point/freezing point	no data available
f)	Initial boiling point and boiling range	187 - 192 °C - lit.
g)	Flash point	64 °C - closed cup
h)	Evaporation rate	no data available
i)	Flammability (solid, gas)	no data available
j)	Upper/lower flammability or explosive limits	no data available
k)	Vapour pressure	no data available
I)	Vapour density	5,01 - (Air = 1.0)
m)	Relative density	0,826 g/cm3 at 25 °C
n)	Water solubility	no data available
o)	Partition coefficient: n- octanol/water	no data available
p)	Auto-ignition temperature	no data available
q)	Decomposition temperature	no data available

- r) Viscosity
- no data available
- s) Explosive properties no data available
- t) Oxidizing properties no data available
- 9.2 Other safety information no data available

## 10. STABILITY AND REACTIVITY

- 10.1 Reactivity no data available
- **10.2 Chemical stability** no data available
- **10.3** Possibility of hazardous reactions no data available
- **10.4 Conditions to avoid** Heat, flames and sparks.
- **10.5** Incompatible materials Oxidizing agents, Do not store near acids.
- **10.6 Hazardous decomposition products** Other decomposition products - no data available

## 11. TOXICOLOGICAL INFORMATION

#### 11.1 Information on toxicological effects

Acute toxicity LD50 Oral - rat - 860 mg/kg

LC50 Inhalation - rat - 6 h - 1.965 mg/m3

LD50 Dermal - rabbit - 394 mg/kg

## 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

#### Carcinogenicity

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

#### **Reproductive toxicity**

no data available

## Specific target organ toxicity - single exposure

no data available

Specific target organ toxicity - repeated exposure no data available

Aspiration hazard no data available

## Potential health effects

Inhalation

Toxic if inhaled. Material is extremely destructive to the tissue of the

Ingestion	mucous membranes and upper respiratory tract. Harmful if swallowed. Causes burns.
Skin	Toxic if absorbed through skin. Causes skin burns.
Eyes	Causes eye burns.

## Signs and Symptoms of Exposure

Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin., Cough, Shortness of breath, Headache, Nausea

#### **Additional Information**

RTECS: KK5950000

## 12. ECOLOGICAL INFORMATION

#### 12.1 Toxicity

Toxicity to fish

LC50 - Pimephales promelas (fathead minnow) - 201 mg/l - 96 h

- 12.2 Persistence and degradability no data available
- **12.3 Bioaccumulative potential** no data available
- **12.4 Mobility in soil** no data available
- **12.5** Results of PBT and vPvB assessment no data available
- **12.6** Other adverse effects no data available

#### 13. DISPOSAL CONSIDERATIONS

#### 13.1 Waste treatment methods

#### Product

This combustible material may be burned in a chemical incinerator equipped with an afterburner and scrubber. Offer surplus and non-recyclable solutions to a licensed disposal company. Contact a licensed professional waste disposal service to dispose of this material.

## **Contaminated packaging**

Dispose of as unused product.

## 14. TRANSPORT INFORMATION

14.1	<b>UN numbe</b> ADR/RID: 2	-	IMDG: 2922	IATA: 2922
14.2	2UN proper shipping nameADR/RID:CORROSIVE LIQUID, TOXIC, N.O.S. (2-Diisopropylaminoethanol)IMDG:CORROSIVE LIQUID, TOXIC, N.O.S. (2-Diisopropylaminoethanol)IATA:Corrosive liquid, toxic, n.o.s. (2-Diisopropylaminoethanol)			
14.3	Transport ADR/RID:	hazard class(es) 8 (6.1)	IMDG: 8 (6.1)	IATA: 8 (6.1)
14.4	Packaging group ADR/RID: II		IMDG: II	IATA: II
14.5	Environmental hazards ADR/RID: no		IMDG Marine Pollutant: no	IATA: no
14.6	<b>Special pr</b> no data av	ecautions for user ailable		

## 15. REGULATORY INFORMATION

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006. Aldrich - 471488

- **15.1** Safety, health and environmental regulations/legislation specific for the substance or mixture no data available
- 15.2 Chemical Safety Assessment no data available

## 16. OTHER INFORMATION

## **Further information**

Copyright 2012 Sigma-Aldrich Co. LLC. License granted to make unlimited paper copies for internal use only.

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Corporation and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.sigma-aldrich.com and/or the reverse side of invoice or packing slip for additional terms and conditions of sale.