

Material Safety Data Sheet



PRODUCT NAME: LAURYL AMINE OXIDE (LAO)

IDENTIFICATION AND DISTRIBUTOR INFORMATION

TRADE NAME: LAURYL AMINE OXIDE
CAS #: 61788-90-7 / 1643-20-5
DATE: February 4, 2013

DISTRIBUTOR: ACME-HARDESTY COMPANY
ADDRESS: 450 Sentry Parkway
Blue Bell, PA 19422

TELEPHONE: (866) 226 – 3834
FAX: (215) 591 – 3620
EMERGENCY: CHEMTREC (800) 424-9300

COMPOSITION/INFORMATION ON INGREDIENTS

Component	CAS-No	Weight %
Amines, coco alkyldimethyl, N-oxides	61788-90-7 / 1643-20-5	30
Water	7732-18-5	70

HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW:

DANGER

FORM: Liquid
COLOR: Colorless to yellowish
ODOR: Fatty odor
HAZARD SUMMARY: Irritating to eyes and skin.

Handle in accordance with good industrial hygiene and safety practice.

OSHA HAZARDS: IRRITANT

POTENTIAL HEALTH EFFECTS

INHALATION: No information available.
SKIN: Causes skin irritation.
EYES: Causes eye irritation.
INGESTION: Harmful if swallowed.

ENVIRONMENTAL EFFECTS: Harmful to aquatic organisms; may cause long-term adverse effects in the aquatic environment.

MARINE: Pollutant.

FIRST AID MEASURES

FIRST AID PROCEDURES:

INHALATION: Remove to fresh air. If breathing is irregular or stopped, administer artificial respiration.

SKIN CONTACT: After contact with skin, wash immediately with plenty of soap and water.
Consult a physician.

EYE CONTACT: In the case of contact with eyes, rinse immediately with plenty of water
Seek medical advice.
Call a physician immediately.

INGESTION: Call a physician immediately.
Clean mouth with water and drink afterwards plenty of water.
Do not induce vomiting without medical advice.
Never give anything by mouth to an unconscious person.

FIRE-FIGHTING MEASURES

FLAMMABLE PROPERTIES:

FLASH POINT: > 212°F (100°C)
LOWER EXPLOSION LIMIT: No data available
UPPER EXPLOSION LIMIT: No data available

FIRE FIGHTING:

SUITABLE EXTINGUISHING MEDIA: Dry powder, Water spray, Foam
FURTHER INFORMATION: Use water spray to cool unopened containers.

FIREFIGHTERS PROTECTIVE EQUIPMENT/PRECAUTIONS:

SPECIFIC HAZARDS DURING FIRE-FIGHTING: Heating or fire can release toxic gas.
FIRE-FIGHTERS SPECIAL PROTECTIVE EQUIPMENT: In the event of fire, wear self-contained breathing apparatus.

ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTIONS: Use respirator when performing operations involving potential exposure to vapor of the product.

ENVIRONMENTAL PRECAUTIONS: Do not flush into surface water or sanitary sewer system.

CONTAINMENT/CLEANING UP METHODS: Sweep up or vacuum up spillage
Collect in suitable container for disposal.

HANDLING AND STORAGE

HANDLING: Provide sufficient air exchange and/or exhaust in work rooms.
Avoid contact with skin and eyes.

STORAGE: Keep container tightly closed.
To maintain product quality, do not store in heat or direct sunlight.
Keep in a dry, cool and well-ventilated place.

FIRE/EXPLOSION ADVICE: Take precautionary measures against static discharges.

ACCIDENTAL RELEASE MEASURE

SPILL/RELEASE: CAUTION!
Wear appropriate protective equipment and respiratory protection where dusts or airborne particulates of unknown concentrations may be generated (

LARGE SPILLS: Self-contained breathing apparatus preferred

Carefully shovel spills into appropriate containers for disposal.
Avoid generating dust.
Wet residue with water and absorb with inert material (sand, earth, etc.)
Transfer into appropriate containers for recovery or disposal.
Keep spill out of sewers and open bodies of water.

EXPOSURE CONTROLS/PERSONAL PROTECTION

EXPOSURE GUIDELINES: Contains no substances with occupational exposure limit values.

ENGINEERING MEASURES

PERSONAL PROTECTIVE EQUIPMENT

EYE PROTECTION: Tightly fitting safety goggles

HAND PROTECTION: Suitable material: Nitrile rubber

SKIN/ BODY PROTECTION: Choose protection according to amount/concentration of dangerous substance
No special protective equipment required.

RESPIRATORY PROTECTION: In the case of vapor formation use a respirator with an approved filter.

BREAK THROUGH TIME: > 480 min Take note of the information given by the producer concerning permeability and break through times, and of special workplace conditions (mechanical strain, duration of contact).

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

PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE:	Colorless to yellowish liquid	
ODOR:	Fatty odor	
FLASH POINT:	> 212°F (100°C)	
LOWER EXPLOSION LIMIT:	No data available	
UPPER EXPLOSION LIMIT:	No data available	
pH:	6 – 8 @ 1,000 g/l 68°F (20°C)	
MELTING POINT/RANGE:	Note: no data available	
BOILING POINT/BOILING RANGE:	> 212 °F (100 °C)	
VAPOR PRESSURE:	0.1 hPa (0.1 mmHg) at 77 °F (25 °C)	Method: calculated
DENSITY:	0.97 g/cm ³ @ 68°F (20°C)	Method: DIN 51757
WATER SOLUBILITY:	@ 68°F (20°C)	Note: completely miscible
VISCOSITY, DYNAMIC:	< 100 mPa.s @ 68°F (20°C)	Method: OECD 114

STABILITY AND REACTIVITY

STABILITY:	Stable under normal conditions
CONDITIONS TO AVOID:	No data available
MATERIALS TO AVOID:	Reducing agents
HAZARDOUS DECOMPOSITION PRODUCTS:	Nitrogen oxides (NO _x) Carbon oxides Heating or fire can release toxic gas.
HAZARDOUS REACTIONS:	Hazardous polymerization does not occur.

TOXICOLOGICAL INFORMATION

ACUTE ORAL TOXICITY:	LD50 rat Dose: > 2 000 mg/kg Method: OECD Test Guideline 401
SKIN IRRITATION:	Rabbit Result: moderate to severe irritant Method: DOT
EYE IRRITATION:	Rabbit Result: severe irritant
FURTHER INFORMATION:	Information given is based on data on the components and the toxicology of similar products. No data is available on the product itself.

ECOLOGICAL INFORMATION

ENVIRONMENTAL EFFECTS:	Harmful to aquatic organisms May cause long-term adverse effects in the aquatic environment Marine pollutant
ACUTE FISH TOXICITY:	LC50 Species: Brachydanio rerio (zebra fish) Concentration: 10.00 – 100.00 mg/l Exposure time: 96 h
ADDITIONAL INFORMATION:	Information given is based on data on the components and the ecotoxicology of similar products.
Following eco-toxicological data refer to:	Cocookyl-N,N-dimethylamine N-oxide (CAS# 61788-90-7 / 1643-20-5)
BIODEGRADABILITY:	Zahn-Wellens Test Result: Biologically well degradable >80 % Method: OECD 302 B Modified Sturm Test Exposure time: 28 d Result: Readily biodegradable. 80 % Method: OECD 301 B
REMARKS:	The surfactant(s) contained in this mixture complies (comply) with the biodegradability criteria as laid down in Regulation (EC) No.648/2004 on detergents. Data to support this assertion are held at the disposal of the competent authorities of the Member States and will be made available to them, at their direct request or at the request of a detergent manufacturer.
ACUTE FISH TOXICITY:	Acute toxicity LC50 Species: Brachydanio rerio (zebra fish) Concentration: 10.00 – 100.00 mg/l Exposure time: 96 h Method: OECD Test Guideline 203
DAPHNIA/AQUATIC INVERTEBRATES TOXICITY:	Immobilization EC50 Species: Daphnia magna (Water flea) Concentration: 4.40 mg/l Exposure time: 48 h Analytical monitoring: No Method: US-EPA
TOXICITY TO ALGAE:	Cell multiplication inhibition test EC50 Species: Pseudokirchneriella subcapitata (green algae) Dose: 0.11 mg/l Exposure time: 96 h Analytical monitoring: No Method: US-EPA
TOXICITY TO BACTERIA:	Growth inhibition EC50 Species: Pseudomonas putida Dose: 190.00 mg/l Exposure time: 16 h Method: DIN 38412 Part 8

DISPOSAL CONSIDERATIONS

Further information: Dispose of in accordance with local regulations.
Contact waste disposal services.
Contaminated packaging: Where possible, recycling is preferred to disposal or incineration.

TRANSPORT INFORMATION

DOT (Department of Transportation): Not dangerous goods

IATA:

UN-Number: 3082
Description of the goods: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.
(C12/C14/C16-Alkyldimethylamine oxide)
Class: 9
Packing group: III
Labels: 9MI
Packing instruction (cargo aircraft): 914
Packing instruction (passenger aircraft): 914
Packing instruction (passenger aircraft): Y914

IMDG-CODE:

UN-Number: 3082
Description of the goods: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.
(C12/C14/C16-Alkyldimethylamine oxide)
Class: 9
Packing group: III
Labels: 9
EmS Number 1: F-A
EmS Number 2: S-F
Marine pollutant: yes

RID:

UN-Number: 3082
Description of the goods: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.
(C12/C14/C16-Alkyldimethylamine oxide)
Class: 9
Packing group: III
Classification Code: M6
Hazard identification No: 90
Labels: 9

REGULATORY INFORMATION

OSHA HAZARDS: Irritant

TSCA STATUS: All components of this product are listed on the EPA TSCA 8(b) inventory list.

SARA 311/312 HAZARDS: Acute Health Hazard

EPCRA - EMERGENCY PLANNING COMMUNITY RIGHT-TO-KNOW

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.

US STATE REGULATIONS:

Massachusetts Right to Know Components: No components are subject to the Massachusetts Right to Know Act

Pennsylvania Right to Know Components: No components are subject to the Pennsylvania Right to know Act

New Jersey Right to Know Components: No components are subject to the New Jersey Right to know Act

California Prop. 65 Components: This product does not contain any chemicals known to the State of California to cause cancer, birth, or any other reproductive defects

This product has been classified according to the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

OTHER INFORMATION

HMIS Classification: Health hazard: 3
Flammability: 1
Reactivity: 0

The data herein are based on our current knowledge and believed to be reliable. Acme-Hardesty Co., provides this information without any representation or warranty, expressed or implied, regarding its accuracy or correctness.

Users must make their own determination that handling, storage and use of the product in the anticipated manner is safe and appropriate. Because these actions of the user are out of our control, and may be beyond our knowledge, we do not assume responsibility and expressly disclaim liability for loss, damage, expense or any other claim arising out of or in any way connected with the handling, storage, use or disposal of the product.

Disposal of containers must comply with applicable federal, state and local laws and regulations. Empty containers should never be given to individuals.