

	MATERIAL SAFETY DATASHEET	MSDS No.	M-02
	2-ETHYL HEXYL ACRYLATE	Effective From	10/04/2024

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

1.1 Product identifier:

Identification on the label/Trade name:	2-Ethyl Hexyl Acrylate
Additional identification:	2-Propenoicacid,2-ethylhexylester
Identification of the product:	CAS#103-11-7 EC#203-080-7
REACH	01-2119453158-37-XXXX

1.2 Relevant identified uses of the substance and uses advised against:

1.2.1 Identified uses:

1.2.2 2-EHA copolymers include printing inks, non-woven fabrics, textile and paper coatings, leather finishing, caulks and sealants, and additives in products such as lubricant oils and fuels.

1.2.3 Uses advised against:

Not available.

1.3 Details of the supplier of the safety data sheet:

Supplier:	Bloomchemag BV
Address	Sint - Antoniusstraat 16 b1, B-2400 Mol, Belgium.
Phone No.	+91 72919 74484
E-mail	info@bloomchemag.com

Section 2 Hazards Identification

2.1 Classification of the substance/mixture

2.1.1 Classification:

The substance is classified as following according to REGULATION (EC) No 1272/2008:

REGULATION (EC) No 1272/2008	
Hazard categories	Hazard classes
Flam. Liq.	2
Skin Irrit.	2
Skin Sens.	1
Specific target organ toxicity-single exposure	3
Hazardous to aquatic environment, Acute hazard	2
Hazardous to aquatic environment, Long term hazard	3

For full text of H- phrases: see section 2.2.

2.2 label elements

Hazard Pictograms:



Signal Word(S):

Danger

Hazard Statement:

H227: Combustible liquid and

H315: Causes skin irritation

H317: May cause an allergic skin reaction

H319: Causes serious eye irritation

H335: May cause respiratory irritation

H401: Toxic to aquatic life

H412: Harmful to aquatic life with long term effects

Precautionary statement

P210: Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

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

P264: Wash hands thoroughly after handling.

P264+P265: Wash hands and thoroughly after handling. Do not touch eyes.

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

P272: Contaminated work clothing should not be allowed out of the workplace.

P273: Avoid release to the environment.

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

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

P304 + P340: IF INHALED: Remove person to fresh air and keep 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. Rinse well.

P319 :Get medical help if you are unwell.

P321: Specific treatment.(See the supplement first aid instruction)

P332 + P317: If skin irritation occurs: Get medical advice/attention.

P333 + P313: If skin irritation or rash occurs: Get medical advice/ attention. P362 + P364: Take off contaminated clothing and wash it before reuse.

P370 + P378: In case of fire: Use foam, dry chemical, carbon dioxide to extinguish.

P403 : Store in a well-ventilated place.

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

P405: Store locked up.

P501: Dispose of contents/container in accordance with local regulation.

2.3 Other hazards

The substance is not considered a PBT/vPvB.

Section 3 Composition/information on ingredients

Substance/Mixture: Substance

Ingredient(s):

Chemical Name	Registration No.	CAS No.	EC No.	Concentration
2-Ethyl Hexyl Acrylate	01-2119453158-37-XXXX	103-11-7	203-080-7	99.5 %(w/w)

Section 4 First aid measures

4.1 Description of first aid measures:

In all cases of doubt, or when symptoms persist, seek medical attention.

4.1.1 In case of inhalation:

Move subject to fresh air and keep him calm. See a physician.

4.1.2 In case of skin contact:

Wash off immediately with soap and water. Remove and isolate contaminate clothing and shoes. If skin irritation occurs consult a physician. For minor contact, avoid spreading material on unaffected skin. Wash clothing separately before reuse.

4.1.3 In case of eyes contact:

Keeping the eyelids apart flush thoroughly with water immediately. If irritation persists, contact a physician.

4.1.4 In case of ingestion:

Rinse mouth. Give one or two glasses of water to drink. Do not induce vomiting without medical advise. If vomiting occurs naturally. Lean forward to reduce risk of aspiration. Oosen tight clothing. Do not use mouth to mouth method if person has ingested something. Contact a doctor immediately.

4.2 Most important symptoms and effects, both acute and delayed

Causes skin irritation. May cause an allergic skin reaction. May cause respiratory irritation.

4.3 Indication of any immediate medical attention and special treatment needed

If skin irritation or rash occurs, get medical advice/attention.

Section 5 Fire-Fighting measures

5.1 Extinguishing media:

Suitable extinguishing media: Foam, dry chemical, carbon dioxide, dry chemical powder, sandly oil.

Unsuitable extinguishing media: Water.

5.2 Special hazards arising from the substance or mixture

Combustible. Above 82 degres celcius, explosive air/ mixture may be formed. Vapours are inhibited and may polymerise, causing blockage of vents. Can be released in case of fire. Highly flammable liquid and vapour.

5.3 Special fire fighting methods and special protective actions for fire-fighters:

Firefighters must wear fire resistant protective equipment. Wear approved respiratory and protective rubber gloves, antistatic clothes.

Section 6 Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures:

6.1.1 Person-related safety precautions: Ensure adequate ventilation. Remove all sources of ignition. Beware of vapours accumulating to form explosive concentrations. Ventilate closed spaces before entering. Keep unnecessary personnel away.

- 6.1.2 Measures for environmental protection:** Prevent further leakage or spillage if safe to do so. Do not allow material to be released to the environment without proper governmental permits.
- 6.1.3 Measures for cleaning/collecting:** Contain spillage, and then collect with non-combustible absorbent material (e.g. sand, earth, diatomaceous earth, vermiculite) and place in suitable container. Clean contaminated surface thoroughly.
- 6.1.4 Additional information:** See Section 7 for information on safe handling See section 8 for information on personal protection equipment. See Section 13 for information on disposal.

Section 7 Handling and storage

7.1 Precautions for safe handling:

- 7.1.1 Information for safe handling:** Avoid breathing dust/fume/gas/mist/vapours/spray. Avoid contact with eyes, skin, and clothing. In case of insufficient ventilation, wear suitable respiratory equipment.
- 7.1.2 Information about protection against explosions and fires:** Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Take measures to prevent the build up of electrostatic charge.
- 7.1.3 Requirements to be met by storerooms and containers:** Keep in a cool, well-ventilated place. Room temperature. Keep tightly closed until used.
- 7.1.4 Information about storage in one common storage facility:** Store away from incompatible substances such as strong oxidants, strong acids, alkalis, peroxides, etc.
- 7.1.5 Further information about storage conditions:** The storage area should be equipped with the corresponding variety and quantity of firefighting equipment, leakage emergency treatment equipment and suitable containment materials.

7.2 Specific end use(s): Not applicable.

Section 8 Exposure Controls/Personal Protection

8.1 Control parameters:

8.1.1 Occupational exposure limits:

Substance	CAS No.	ACGIH TLV-TWA	ACGIH TLV-STEL	NIOSH PEL-TWA	NIOSH PEL-STEL
2- Ethylhexyl Acrylate	103-11-7	N.E.	N.E.	N.E.	N.E.

Note: 1. N.E. means not established

- 8.1.2 Appropriate engineering controls:** Use adequate ventilation to keep airborne concentrations low. Provide safety shower and eyewash facility.
- 8.1.3 General protective hygienic measures:** Do not get this material in contact with eyes. Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.
- 8.1.4 Personal protective and hygienic measures:** Safety glasses, gloves, protective clothing and protective mask or respirator.
- 8.1.5 Breathing equipment:** When workers are facing concentrations above the exposure limit they must use appropriate certified respirators. Wear appropriate chemical resistant gloves.
- 8.1.6 Protection of hands Eye/Face protection:** Use safety glasses with side shields or safety goggles as mechanical barrier for prolonged exposure.
- 8.1.7 Body protection** Full set of anti chemical reagent overalls, flame retardant antistatic protective clothing, choose body protection according to the amount and concentration of the dangerous substance at the work place. Not available

Section 9 Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance	Liquid
Color	Colorless
Odour	Characteristic Odour
Melting point/range (°C):	-90 °C
Boiling point/range (°C):	215-219 °C
Lower and upper explosion limit	6.4%(V)/0.8%(V)
Flash point (°C):	86 °C (cc)
Auto-ignition temperature:	252 °C
Decomposition Temperature	No data available
pH	No data Available
Kinetic velocity	No data Available
Solubility	Insoluble in water and soluble in most organic solvents
Partition coefficient	3.67
Vapour pressure	0.2 hPa at 20 °C
Density/ Relative density	0.885g/ml at 25 °C
Relative vapour density	6.35
Particle Characteristics	Not applicable

Section 10 Stability and reactivity

10.1 Reactivity:	No data available.
10.2 Chemical stability:	Stable under recommended storage conditions.
10.3 Possibility of hazardous reactions:	The substance readily polymerizes under the influence of light, heat and peroxides. Reacts violently with strong oxidants.
10.4 Conditions to avoid:	Heat and flame and spark. The extreme temperatures and direct sunlight. Static discharge. Light.
10.5 Incompatible materials:	Avoid contact with strong oxidants, strong acids, alkalis, peroxides, etc.
10.6 Hazardous decomposition products:	May include carbon oxides, irritating and toxic fumes and gases.

Section 11 Toxicological information

11.1 Routes of Entry:

Dermal contact, eye contact, inhalation, ingestion.

11.2 Information on toxicological effects

Acute toxicity:

LD50(Oral, Rat): 5850 mg/kg bw

LD50(Dermal, Rabbit): 5000 mg/kg bw

LC50(Inhalation, Rat): N/A mg/m³ air

Skin corrosion/Irritation: Causes skin irritation.

Serious eye damage/irritation: Causes serious eye irritation.

Respiratory or skin sensitization: May cause an allergic skin reaction.

Germ cell mutagenicity: Not classified

Carcinogenicity: Not classified

Reproductive toxicity: Not classified

STOT- single exposure: May cause respiratory irritation.

STOT-repeated exposure: Not classified

Aspiration hazard: Not classified

Further information: An added stabilizer or inhibitor can influence the toxicological properties of this substance, consult an expert.

Section 12 Ecological information

12.1 Toxicity:

Acute toxicity		Time	Species
LC50	23 mg/L	96h	Fish
EC50	17 mg/L	48h	Daphnia
EC50	N/AL	72h	Algae

12.2 Persistence and degradability: readily biodegradable - **75%**

- 12.3 Bioaccumulative potential:** Not available
- 12.4 Mobility in soil:** Not available
- 12.5 Additional Information:** Toxic to aquatic life. Harmful to aquatic life with local environmental regulations or local authority requirements
- 12.6 Other adverse effects:** Not available.

Section 13 Disposal considerations

- 13.1 Waste treatment methods** Contact a qualified professional waste disposal service to dispose of this material. Dispose of in accordance with local environmental regulations or local authority requirements.

Section 14 Transport information

UN-Number:	
UN Proper shipping name:	
Class/Division:	The product is not regulated by TDG.
Packaging group:	The product is non-dangerous goods.
Subsidiary risk labelling pictogram. Maritime transport IMDG/ Being same with TDG/ No	Being same with TDG/ No
Marine pollutant (Yes/No)	
Air transport ICAO-TI and IATA-DGR	Being same with TDG

Section 15 Regulation information

15.1 European/International Regulations

- 15.1.1 OSHA:** Hazardous by definition of Hazard Communication Standard. (29CFR 1910.1200)
- 15.1.2 EINECS Status:** 2-ETHYLHEXYL ACRYLATE (CAS 103-11-7) is included in EPA TSCA
- 15.1.3 Canadian DSL (Domestic Substances List):** 2-ETHYLHEXYL ACRYLATE (CAS 103-11-7) is included in DSL.
- 15.1.4 HMIS(Hazardous Material Identification System Ratings):**
 Health: 2
 Flammability: 2
 Physical hazard: 0
 Personal protection:H
 (4. Severe Hazard; 3. Serious Hazard; 2. Moderate Hazard; 1. Slight Hazard; 0. Minimal Hazard)
- 15.1.5 WHMIS (Canadian Workplace Hazardous Material Identification System Ratings): GB 12268-2012 List of dangerous goods** This product is not a dangerous goods on the GB 12268-2012 list of dangerous goods.

Section 16 Other information

Employers should use this information only as a supplement to other information gathered by them, and should make independent judgement of suitability of this information to ensure proper use and protect the health and safety of employees. This information is furnished without warranty, and any use of the product not in conformance with this Material Safety Data Sheet, or in combination with any other product or process, is the responsibility of the user. This Material Safety Data Sheet was based on the "Globally Harmonized System of Classification and Labelling of Chemicals", "Recommendations on the TRANSPORT OF DANGEROUS GOODS Model Regulations", "INTERNATIONAL MARITIME DANGEROUS GOODS CODE", "International Air Transport Association Dangerous Goods Regulations", the National Standards and other related dangerous chemicals management laws, regulations and standards, which are periodically updated and changed. To make dangerous goods / hazardous chemicals comply with the relevant requirements of the latest management, regularly update is recommended. This Material Safety Data Sheet has been compiled in both English and Chinese. For any discrepancies, the Chinese version shall prevail.

Abbreviations and acronyms:

ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road

RID: Regulations Concerning the International Transport of Dangerous Goods by Rail

IMDG: International Maritime Code for Dangerous Goods

IATA-DGR: Dangerous Goods Regulations by the "International Air Transport Association" (IATA)

ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO)

EINECS: European Inventory of Existing Commercial Chemical Substances

CAS: Chemical Abstracts Service

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

EC50: Effective concentration, 50 percent

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