

# Acrylamide AR CAS No 79-06-1

# MATERIAL SAFETY DATA SHEET SDS/MSDS

#### SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1 Product identifiers

Product name : Acrylamide AR

CAS-No. : 79-06-1

1.2 Relevant identified uses of the substance or mixture and uses advised against

Identified uses : Laboratory chemicals, Industrial & for professional use only.

1.3 Details of the supplier of the safety data sheet

Company : Pallav Chemicals & Solvents Pvt. Ltd

253, Shiv Shakti Industrial Estate, Opp Mittal Estate Andheri Kurla Road, Andheri (E), Mumbai - 400050

INDIA

Telephone : +91 22 4928 4000

Email : sales@pallavchemicals.com

1.4 Emergency telephone number

+91 22 4928 4000 (9:00am - 6:00 pm) [Office

Emergency Phone # : hours]

#### **SECTION 2: Hazards identification**

#### 2.1 Classification of the substance or mixture

#### Classification according to Regulation (EC) No 1272/2008

Carcinogenicity (Category 1B), H350

Germ cell mutagenicity (Category 1B), H340 Reproductive toxicity (Category 2), H361f Acute toxicity, Oral (Category 3), H301

Specific target organ toxicity - repeated exposure (Category 1), H372

Acute toxicity, Inhalation (Category 4), H332 Acute toxicity, Dermal (Category 4), H312

Eye irritation (Category 2), H319 Skin irritation (Category 2), H315 Skin sensitisation (Category 1), H317

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

## 2.2 Label elements

## Labelling according Regulation (EC) No 1272/2008

Pictogram

Signal word Danger

Hazard statement(s)

H301 Toxic if swallowed.

H312 + H332 Harmful in contact with skin or if inhaled

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.
H319 Causes serious eye irritation.
H340 May cause genetic defects.

H350 May cause cancer.

H361f Suspected of damaging fertility.

H372 Causes damage to organs through prolonged or repeated exposure.

Precautionary statement(s)

P201 Obtain special instructions before use.

P260 Do not breathe dust/ fume/ gas/ mist/ vapours/ spray.

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

protection.

P301 + P330 + P331 + P310 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. Immediately

call a POISON CENTER/doctor.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

P308 + P313 IF exposed or concerned: Get medical advice/ attention.

Supplemental Hazard none

Statements

#### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

#### **SECTION 3: Composition/information on ingredients**

#### 3.1 Substances

Synonyms : Acrylic acid amide

2-Propenamide

Formula : C3H5NO

Molecular weight : 71.08 g/mol

CAS-No. : 79-06-1

EC-No. : 201-173-7

Index-No. : 616-003-00-0

Registration number : 01-2119463260-48-XXXX

#### Hazardous ingredients according to Regulation (EC) No 1272/2008

Component Classification Concentration

**Acrylamide** Included in the Candidate List of Substances of Very High Concern (SVHC) according to Regulation (EC) No. 1907/2006 (REACH)

CAS-No. 79-06-1 Carc. 1B; Muta. 1B; Repr. 2; <= 100 %

EC-No. 201-173-7 Acute Tox. 3; STOT RE 1; Index-No. 616-003-00-0 Registration number 01-2119463260-48-XXXX Acute Tox. 4; Eye Irrit. 2; Skin Sens. 1; H350,

H340, H361f, H301, H372, H332, H312, H319, H315,

H317

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

#### **SECTION 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

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

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

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

## 4.3 Indication of any immediate medical attention and special treatment

needed No data available

## **SECTION 5: Firefighting measures**

#### 5.1 Extinguishing media

## Suitable extinguishing media

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

## 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 firefighting if necessary.

#### 5.4 Further information

No data available

#### **SECTION 6: Accidental release measures**

#### 6.1 Personal precautions, protective equipment and emergency procedures

Wear respiratory protection. Avoid dust formation. Avoid breathing vapours, mist or gas.

Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.

For personal protection see section 8.

#### 6.2 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.

#### 6.3 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.

#### 6.4 Reference to other sections

For disposal see section 13.

## **SECTION 7: Handling and storage**

#### 7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Avoid exposure - obtain special instructions before use.

Provide appropriate exhaust ventilation at places where dust is formed.

For precautions see section 2.2.

## 7.2 Conditions for safe storage, including any incompatibilities

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

Light sensitive.

Storage class (TRGS 510): Non-combustible, acute toxic Cat.3 / toxic hazardous materials or hazardous materials causing chronic effects

## 7.3 Specific end use(s)

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

## **SECTION 8: Exposure controls/personal protection**

#### 8.1 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

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 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.

## **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 (EN 143) respirator cartridges as a backup to engineering controls. If th full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

## Control of environmental exposure

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

#### **SECTION 9: Physical and chemical properties**

## 9.1 Information on basic physical and chemical properties

a) Appearance Form: powder
b) Odour No data available
c) Odour Threshold No data available
d) pH 5.2 - 6 at 500 g/l

e) Melting point/freezing Melting point/range: 82 - 86 °C - lit.

point

f) Initial boiling point and  $\,$  125 °C at 33 hPa - lit.

boiling range

explosive limits

g) Flash point 138 °C - closed cup
h) Evaporation rate No data available
i) Flammability (solid, gas) No data available
j) Upper/lower flammability or

Vapour pressure 1.6 mmHg at 84.50 °C

> 0.03 mmHg at 40 °C 0.0675 mmHg at 25 °C

2.45 - (Air = 1.0)I) Vapour density

m) Relative density No data available

n) Water solubility 200 g/l at 20 °C o) Partition coefficient: nlog Pow: -0.67

octanol/water

No data available

temperature

p) Auto-ignition

No data available q) Decomposition

temperature

r) Viscosity No data available No data available s) Explosive properties Oxidizing properties No data available

9.2 Other safety information

> 2.45 - (Air = 1.0)Relative vapour density

#### **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

No data available

#### 10.4 Conditions to avoid

No data available

## 10.5 Incompatible materials

Acids, Oxidizing agents, Iron and iron salts., Copper, Brass, Free radical initiators

## 10.6 Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, Nitrogen oxides (NOx) Other decomposition products - No data available

In the event of fire: see section 5

## **SECTION 11: Toxicological information**

#### 11.1 Information on toxicological effects

#### **Acute toxicity**

LD50 Oral - Rat - 177 mg/kg(Acrylamide)

LC50 Inhalation - Rat - 4 h - > 1,500 mg/m3(Acrylamide)

LD50 Dermal - Rabbit - 1,141 mg/kg(Acrylamide)

(OECD Test Guideline 402)

#### Skin corrosion/irritation

Skin - Rabbit(Acrylamide)

Result: No skin irritation

(OECD Test Guideline 404)

Classified according to Regulation (EU) 1272/2008, Annex VI (Table 3.1/3.2)(Acrylamide)

## Serious eye damage/eye irritation

Eyes - Rabbit(Acrylamide)

Result: Irritating to eyes.

(OECD Test Guideline 405)

#### Respiratory or skin sensitisation

Maximisation Test - Guinea pig(Acrylamide) May cause allergic skin reaction. (OECD Test Guideline 406)

## Germ cell mutagenicity

May alter genetic material. In vivo tests showed mutagenic effects(Acrylamide)

#### Carcinogenicity

This product is or contains a component that has been reported to be proba EPA classification. Possible human carcinogen(Acrylamide)

IARC: 2A - Group 2A: Probably carcinogenic to humans (Acrylamide)

## Reproductive toxicity

Animal testing did not show any effects on foetal development.(Acrylamide)

May cause reproductive disorders. Suspected human reproductive toxicant(Acrylamide)

#### Specific target organ toxicity - single exposure

No data available(Acrylamide)

**Specific target organ toxicity - repeated exposure** Oral - Causes damage to organs through prolonged or repeated exposure. - Peripheral nervous system

## **Aspiration hazard**

No data available(Acrylamide)

#### **Additional Information**

RTECS: AS3325000

Liver - Irregularities - Based on Human Evidence(Acrylamide)

#### **SECTION 12: Ecological information**

## 12.1 Toxicity

Toxicity to fish LC50 - Pimephales promelas (fathead minnow) - 90 mg/l - 96 h(Acrylamide)

NOEC - Cyprinus carpio (Carp) - 5 mg/l - 28 d(Acrylamide)

Toxicity to daphnia and

other aquatic invertebrates

mortality NOEC - Daphnia magna (Water flea) - 60 mg/l - 48 h(Acrylamide)

EC50 - Daphnia magna (Water flea) - 160 mg/l - 48 h(Acrylamide)

#### 12.2 Persistence and degradability

Biodegradability Result: 100 % - Readily biodegradable

(OECD Test Guideline 301D)

#### 12.3 Bioaccumulative potential

Bioaccumulation Oncorhynchus mykiss (rainbow trout) - 72 h

- 710 µg/l(Acrylamide)

Bioconcentration factor (BCF): 1.65

## 12.4 Mobility in soil

No data available(Acrylamide)

#### 12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

#### 12.6 Other adverse effects

Harmful to aquatic life.

No data available

#### **SECTION 13: Disposal considerations**

#### 13.1 Waste treatment methods

#### **Product**

Offer surplus and non-recyclable solutions to a licensed disposal company. Dissolve or mix the material with a combustible solvent and burn in a chem scrubber.

## Contaminated packaging

Dispose of as unused product.

#### **SECTION 14: Transport information**

#### 14.1 UN number

ADR/RID: 2074 IMDG: 2074 IATA: 2074

#### 14.2 UN proper shipping name

ADR/RID: ACRYLAMIDE, SOLID IMDG: ACRYLAMIDE, SOLID IATA: Acrylamide, solid

#### 14.3 Transport hazard class(es)

ADR/RID: 6.1 IMDG: 6.1 IATA: 6.1

#### 14.4 Packaging group

ADR/RID: III IMDG: III IATA: III

## 14.5 Environmental hazards

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

## 14.6 Special precautions for user

No data available

## **SECTION 15: Regulatory information**

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

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

## Authorisations and/or restrictions on use

#### 15.2 Chemical safety assessment

For this product a chemical safety assessment was not carried out

#### **SECTION 16: Other information**

#### Full text of H-Statements referred to under sections 2 and 3.

H301	Toxic if swallowed.
H312	Harmful in contact with skin.
H312 + H332	Harmful in contact with skin or if inhaled
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H340	May cause genetic defects.
H350	May cause cancer.
H361f	Suspected of damaging fertility.

H372 Causes damage to organs through prolonged or repeated exposure.

#### **Further information**

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. Pallav Chemicals & Solvents Pvt. Ltd and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.pallavchemicals.com for additional terms and conditions of sale.