

# Material Safety Data Sheet

Section1. Product Information and Company Identification			
Product name	Ammonium Fluoride		
Mol.formula	H4FN	Cas no	12125-01-8
Mol.wt	37,04 g/mol		
Manfacture name	Pioneers for laboratory chemicals		
Brand name	Piochem		
Address	Area 540, Industrial Zone 6 <sup>th</sup> October city Giza, Egypt.		
Website	www.piochem.com		
E-mail	info@piochem.com		
Phone number	+201225728304, +201023932115		

## **SECTION 2: Hazards identification**

# 2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008

Acute toxicity, Oral (Category 3), H301 Acute toxicity, Inhalation (Category 3), H331 Acute toxicity, Dermal (Category 3), H311 Serious eye damage (Category 1), H318

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 + H311 + H331 Toxic if swallowed, in contact with skin or if inhaled

H318 Causes serious eye damage.

Precautionary statement(s)

P280 Wear eye protection/face protection. P280

Wear protective gloves/ protective clothing.

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

call a POISON CENTER or doctor/physician.

P302 + P352 + P312 IF ON SKIN: Wash with plenty of water, Call a POISON CENTER or

doctor/ physician if you feel unwell.

P304 + P340 + P311 IF INHALED: Remove person to fresh air and keep comfortable for

breathing. Call a POISON CENTER or doctor/physician.

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

#### 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**

Formula H<sub>4</sub>FN Molecular weight 37.04 a/mol CAS-No. 12125-01-8 EC-No. 235-185-9 Index-No. : 009-006-00-8

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

Classification Component Concentration

#### Ammonium fluoride

CAS-No. <= 100 % 12125-01-8 Acute Tox. 3; Eye Dam. 1;

H301, H331, H311, H318 EC-No. 235-185-9

009-006-00-8 Index-No.

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 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

Nitrogen oxides (NOx), Hydrogen fluoride

#### 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.

## 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.

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.

Hygroscopic.

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

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

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 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).

# Control of environmental exposure

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

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

#### 9.1 Information on basic physical and chemical properties

a) Appearance Form: Crystalsb) Odour odourless

c) Odour Threshold No data available

d) pH 5-7

e) Melting point/freezing

point

Melting point/range: 100  $^{\circ}\text{C}$  - Decomposes before melting.

f) Initial boiling point and

boiling range

No data available

g) Flash point Not applicableh) Evaporation rate No data available

i) Flammability (solid, gas) The product is not flammable.

j) Upper/lower flammability or explosive limits No data available

k) Vapour pressure No data available
l) Vapour density No data available
m) Relative density 1,01 g/cm3 at 20 °C

n) Water solubility soluble

o) Partition coefficient: noctanol/water No data available

p) Auto-ignition No data available

temperature

q) Decomposition 100 °C - Decomposes before melting. temperature

r) Viscosity No data available

s) Explosive properties No data availablet) Oxidizing properties No data available

# 9.2 Other safety information

Bulk density ca.660 kg/m3

#### **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

hygroscopic

## 10.5 Incompatible materials

Strong oxidizing agents

# 10.6 Hazardous decomposition products

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 - > 200 - < 2.000 mg/kg

(OECD Test Guideline 401)

Inhalation: No data available

Dermal: No data available

LD50 Intraperitoneal - Rat - 31 mg/kg

#### Skin corrosion/irritation

No data available

# Serious eye damage/eye irritation

Risk of serious damage to eyes.

#### Respiratory or skin sensitisation

No data available

#### Germ cell mutagenicity

No data available

#### Carcinogenicity

IARC: 3 - Group 3: Not classifiable as to its carcinogenicity to humans (Ammonium fluoride)

#### 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

#### **Additional Information**

RTECS: BQ6300000

Salivation, Nausea, Vomiting, Fever, Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin.

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

## **SECTION 12: Ecological information**

#### 12.1 Toxicity

No data available

#### 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

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

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 chemical incinerator equipped with an afterburner and scrubber.

#### Contaminated packaging

Dispose of as unused product.

## **SECTION 14: Transport information**

#### 14.1 UN number

ADR/RID: 2505 IMDG: 2505 IATA: 2505

#### 14.2 UN proper shipping name

ADR/RID: AMMONIUM FLUORIDE IMDG: AMMONIUM FLUORIDE IATA: Ammonium fluoride

# 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**

This safety datasheet complies with the requirements of Regulation (EC) No. 453/2010.

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

## 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.
H301 + H311 +	Toxic if swallowed, in contact with skin or if inhaled
H331	
H311	Toxic in contact with skin.
H318	Causes serious eye damage.
H331	Toxic if inhaled.