

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

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

- **1.1 Product identifier**
- **Trade name:** Polyon 24-5-8 FINE (6-7 months)
- **Registration number** Mixture
- **1.2 Relevant identified uses of the substance or mixture and uses advised against**
- **Product category** PC12 Fertilisers
- **Application of the substance / the mixture** Fertiliser
- **Uses advised against** Any use not specified above.
- **1.3 Details of the supplier of the safety data sheet**
- **Supplier:**
 Agrovista UK Ltd
 Rutherford House
 Nottingham Science and Technology Park
 University Boulevard
 Nottingham
 NG7 2PZ
 UK

 Tel: +44 (0)1952 897910
- **Further information obtainable from:** Product safety department.
- **1.4 Emergency telephone number:**
 Members of the public seeking specific information on poisons should contact:
 In England and Wales: NHS 111 - dial 111
 In Scotland: NHS 24 - dial 111

SECTION 2: Hazards identification

- **2.1 Classification of the substance or mixture**
- **Classification according to GB-CLP** The product is not classified, according to the GB CLP regulation.
- **2.2 Label elements**
- **Labelling according to GB-CLP** Void
- **Hazard pictograms** Void
- **Signal word** Void
- **Hazard statements** Void
- **Additional information:**
 Product contains: Reportable explosives precursors. Acquisition, possession or use by the general public is restricted.
 EUH210 Safety data sheet available on request.
- **2.3 Other hazards**
- **Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.

SECTION 3: Composition/information on ingredients

- **3.2 Mixtures**
- **Description:** Mixture of substances listed below with nonhazardous additions.

- **Dangerous components:**

CAS: 6484-52-2 EINECS: 229-347-8 Reg.nr.: 01-2119490981-27-XXXX	Ammonium nitrate ⚠ Ox. Sol. 2, H272; ⚠ Eye Irrit. 2, H319	2.5 – < 10%
CAS: 7757-79-1 EINECS: 231-818-8 Reg.nr.: 01-2119488224-35-XXXX	Potassium nitrate ⚠ Ox. Sol. 3, H272	2.5 – 10%

(Contd. on page 2)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

CAS: 12125-02-9 EINECS: 235-186-4 Index number: 017-014-00-8 Reg.nr.: 01-2119487950-27-XXXX	Ammonium chloride ⚠ Acute Tox. 4, H302; Eye Irrit. 2, H319	(Contd. of page 1) 1 – 2.5%
------------------------------------------------------------------------------------------------------	---------------------------------------------------------------	--------------------------------

· **Additional information:** For the wording of the listed hazard phrases refer to section 16.

SECTION 4: First aid measures

- **4.1 Description of first aid measures**
- **General information:**
Immediately remove any clothing soiled by the product.
Rinse contaminated clothes (fire hazard) with plenty of water.
- **After inhalation:** Supply fresh air; consult doctor in case of complaints.
- **After skin contact:**
Immediately wash with water and soap and rinse thoroughly.
If skin irritation continues, consult a doctor.
- **After eye contact:**
Check for and remove any contact lenses.
Rinse opened eye for several minutes under running water. Then consult a doctor.
- **After swallowing:**
Wash mouth out with water
If symptoms persist consult doctor.
- **Information for doctor:**
Treat symptomatically and supportively.
Nitrates may cause effects on the blood, resulting in formation of methaemoglobin when ingested. The effects may be delayed. Medical observation is indicated.
- **4.2 Most important symptoms and effects, both acute and delayed**
No further relevant information available.
- **4.3 Indication of any immediate medical attention and special treatment needed**
No further relevant information available.

SECTION 5: Firefighting measures

- **5.1 Extinguishing media**
- **Suitable extinguishing agents:**
CO₂, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
Use fire extinguishing methods suitable to surrounding conditions.
- **For safety reasons unsuitable extinguishing agents:** Water with full jet
- **5.2 Special hazards arising from the substance or mixture**
In case of fire, the following can be released:
Carbon monoxide and carbon dioxide
Chlorine compounds
Nitrogen oxides (NO_x)
Toxic metal oxide smoke
Product is not classified as oxidizing. However, it may combustion of other substances.
- **5.3 Advice for firefighters**
- **Protective equipment:**
Wear self-contained respiratory protective device.
Do not inhale explosion gases or combustion gases.
Wear fully protective suit.
- **Additional information**
Cool endangered receptacles with water spray.
Collect contaminated fire fighting water separately. It must not enter the sewage system.

GB

(Contd. on page 3)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 2)

SECTION 6: Accidental release measures

- **6.1 Personal precautions, protective equipment and emergency procedures**
Avoid formation of dust.
Ensure adequate ventilation
- **6.2 Environmental precautions:** Do not allow product to reach sewage system or any water course.
- **6.3 Methods and material for containment and cleaning up:**
Pick up mechanically.
Send for recovery or disposal in suitable receptacles.
- **6.4 Reference to other sections**
See Section 7 for information on safe handling.
See Section 8 for information on personal protection equipment.
See Section 13 for disposal information.

SECTION 7: Handling and storage

- **7.1 Precautions for safe handling**
Avoid direct contact (skin/eye contact, ingestion and/or inhalation of fume/mist/dust) with the product in the undiluted form.
Ensure good ventilation/exhaustion at the workplace.
Rinse contaminated clothing with plenty of water (Fire hazard)
- **Information about fire - and explosion protection:**
Substance/product can reduce the ignition temperature of flammable substances.
- **7.2 Conditions for safe storage, including any incompatibilities**
- **Storage:**
- **Requirements to be met by storerooms and receptacles:** No special requirements.
- **Information about storage in one common storage facility:** Store away from flammable substances.
- **Further information about storage conditions:**
Store in cool, dry conditions in well sealed receptacles.
Protect from heat and direct sunlight.
- **Storage class:** 13
- **7.3 Specific end use(s)** No further relevant information available.

SECTION 8: Exposure controls/personal protection

· 8.1 Control parameters

· Ingredients with limit values that require monitoring at the workplace:

CAS: 12125-02-9 Ammonium chloride

WEL	Short-term value: 20 mg/m ³ Long-term value: 10 mg/m ³
-----	---------------------------------------------------------------------------------

· DNELs

CAS: 6484-52-2 Ammonium nitrate

Oral	Long-term systemic effects	2.56 mg/kg bw/day (general population)
Dermal	Long-term systemic effects	2.56 mg/kg bw/day (general population) 5.12 mg/kg bw/day (worker)
Inhalative	Long-term systemic effects	8.9 mg/m ³ (general population) 36 mg/m ³ (worker)

CAS: 12125-02-9 Ammonium chloride

Oral	Long-term systemic effects	11.4 mg/kg bw/day (general population)
	Short-term systemic effects	55.2 mg/kg bw/day (general population)
Dermal	Long-term systemic effects	55.2 mg/kg bw/day (general population)

(Contd. on page 4)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 3)

Inhalative	Long-term systemic effects	128.9 mg/kg bw/day (worker) 9.4 mg/m ³ (general population) 33.5 mg/m ³ (worker)
------------	----------------------------	--------------------------------------------------------------------------------------------------------------

- **PNECs**

- **CAS: 6484-52-2 Ammonium nitrate**

- Sewage Treatment Plant

18 mg/L

- **CAS: 7757-79-1 Potassium nitrate**

- Sewage Treatment Plant

18 mg/L

- **CAS: 12125-02-9 Ammonium chloride**

- Freshwater

250 – 1,200 µg/L

- Freshwater - Intermittent releases

430 – 1,200 µg/L

- Marine water

25 – 11,200 µg/L

- Sewage Treatment Plant

16.2 mg/L

- Soil

163 – 50,700 µg/kg

- **Additional information:** The lists valid during the making were used as basis.

- **8.2 Exposure controls**

- **Appropriate engineering controls** No further data; see section 7.

- **Individual protection measures, such as personal protective equipment**

- **General protective and hygienic measures:**

- The usual precautionary measures are to be adhered to when handling chemicals.

- Take note of assigned Workplace Exposure Limits.

- Do not eat or drink while working.

- Do not breathe dust

- Keep away from foodstuffs, beverages and feed.

- Immediately remove all soiled and contaminated clothing

- Wash hands before breaks and at the end of work.

- Avoid contact with the eyes and skin.

- Ensure that eyewash stations and safety showers are close to the workstation location.

- **Respiratory protection:**

- During dust-raising work: Use respiratory equipment with particle filter, type P2. The use of filtering respirators should be limited to max. 3 hours per day.

- **Hand protection**



- Protective gloves.

- Use gloves tested and approved under appropriate government standards such as NIOSH (US) or EN374 (EU).

- The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

- Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

- **Material of gloves**

- Nitrile rubber, NBR

- PVC gloves

- The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

- **Penetration time of glove material**

- The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

- **Eye/face protection**



- Safety glasses with side-shields conforming to EN166.

- Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

(Contd. on page 5)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 4)

· **Body protection:**

Protective work clothing

Body protection must be chosen depending on product properties, activity and possible exposure.

· **Environmental exposure controls** Do not allow to enter drains, sewers or watercourses.

SECTION 9: Physical and chemical properties

· **9.1 Information on basic physical and chemical properties**· **General Information**

· Physical state	Solid
· Colour:	According to product specification
· Odour:	Possible slight ammonia
· Odour threshold:	Not determined.
· Melting point/freezing point:	Undetermined.
· Boiling point or initial boiling point and boiling range	Undetermined.
· Flammability	Not determined.
· Lower and upper explosion limit	
· Lower:	Not determined.
· Upper:	Not determined.
· Flash point:	Not applicable.
· Decomposition temperature:	Not determined.
· pH	Not applicable.
· Viscosity:	
· Kinematic viscosity	Not applicable.
· Dynamic:	Not applicable.
· Solubility	
· water:	Not determined.
· Partition coefficient n-octanol/water (log value)	Not determined.
· Vapour pressure:	Not applicable.
· Density and/or relative density	
· Density:	Not determined.
· Relative density	Not determined.
· Vapour density	Not applicable.

· **9.2 Other information**

· Appearance:	
· Form:	Granulate
· Important information on protection of health and environment, and on safety.	
· Ignition temperature:	Product is not self-igniting.
· Explosive properties:	Product does not present an explosion hazard.
· Solvent content:	
· Solids content:	100.0 %
· Change in condition	
· Evaporation rate	Not applicable.

· **Information with regard to physical hazard classes**

· Explosives	Void
· Flammable gases	Void
· Aerosols	Void
· Oxidising gases	Void
· Gases under pressure	Void
· Flammable liquids	Void

(Contd. on page 6)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 5)

· Flammable solids	Void
· Self-reactive substances and mixtures	Void
· Pyrophoric liquids	Void
· Pyrophoric solids	Void
· Self-heating substances and mixtures	Void
· Substances and mixtures, which emit flammable gases in contact with water	Void
· Oxidising liquids	Void
· Oxidising solids	Void
· Organic peroxides	Void
· Corrosive to metals	Void
· Desensitised explosives	Void

SECTION 10: Stability and reactivity

- **10.1 Reactivity** No further relevant information available.
- **10.2 Chemical stability**
- **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **10.3 Possibility of hazardous reactions**
Product is not classified as oxidizing. However, it may combustion of other substances.
- **10.4 Conditions to avoid** Heat and static discharge.
- **10.5 Incompatible materials:** Strong oxidising agents.
- **10.6 Hazardous decomposition products:**
Carbon monoxide and carbon dioxide
Chlorine compounds
Nitrogen oxides (NOx)
Toxic metal oxide smoke

SECTION 11: Toxicological information

- **11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008**
- **Acute toxicity** Based on available data, the classification criteria are not met.

· LD/LC50 values relevant for classification:

ATE (Acute Toxicity Estimates)

Oral	LD50	94,000 mg/kg (rat)
------	------	--------------------

CAS: 6484-52-2 Ammonium nitrate

Oral	LD50	2,950 mg/kg (rat)
Inhalative	LC50/4 h	> 88 mg/l (rat) > 5,000 mg/l (rabbit)

CAS: 7757-79-1 Potassium nitrate

Oral	LD50	> 2,000 mg/kg (rat)
Dermal	LD50	> 5,000 mg/kg (rabbit)

CAS: 12125-02-9 Ammonium chloride

Oral	LD50	1,410 mg/kg (rat)
Dermal	LD50	> 2,000 mg/kg (rabbit)

- **Primary irritant effect:**
- **Skin corrosion/irritation** Based on available data, the classification criteria are not met.
- **Serious eye damage/irritation** Based on available data, the classification criteria are not met.
- **Respiratory or skin sensitisation** Based on available data, the classification criteria are not met.
- **Germ cell mutagenicity** Based on available data, the classification criteria are not met.
- **Carcinogenicity** Based on available data, the classification criteria are not met.
- **Reproductive toxicity** Based on available data, the classification criteria are not met.

(Contd. on page 7)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 6)

- **STOT-single exposure** Based on available data, the classification criteria are not met.
- **STOT-repeated exposure** Based on available data, the classification criteria are not met.
- **Aspiration hazard** Based on available data, the classification criteria are not met.
- **Subacute to chronic toxicity:** Prolonged or repeated skin contact may irritate and cause dermatitis.
- **Additional toxicological information:**
Absorption of significant amounts of nitrates may cause: abdominal pain; blue lips or fingernails; blue skin; dizziness; laboured breathing; confusion; convulsions; diarrhoea; headache; nausea; unconsciousness.
Inorganic nitrate and nitrite substances are carcinogenic when present under conditions of endogenous nitrosation, i.e. if present in conjunction with secondary amines, under certain physical and thermal conditions, leading to the formation of hazardous and carcinogenic nitrosamines.
- **11.2 Information on other hazards**

· Endocrine disrupting properties
None of the ingredients are listed.

SECTION 12: Ecological information

- **12.1 Toxicity**

- **Aquatic toxicity:**

CAS: 7757-79-1 Potassium nitrate
EC50 (96 h) > 1,000 mg/l (Bacteria)
CAS: 12125-02-9 Ammonium chloride
EC50 (96 h) 101 mg/l (Bacteria)

- **12.2 Persistence and degradability** No further relevant information available.

- **12.3 Bioaccumulative potential** No further relevant information available.

- **12.4 Mobility in soil** No further relevant information available.

- **12.5 Results of PBT and vPvB assessment**

- **PBT:** Not applicable.

- **vPvB:** Not applicable.

- **12.6 Endocrine disrupting properties**

The product does not contain substances with endocrine disrupting properties.

- **12.7 Other adverse effects**

- **Additional ecological information:**

- **General notes:**

Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

SECTION 13: Disposal considerations

- **13.1 Waste treatment methods**

- **Recommendation**

Recommended Hierarchy of Controls:

- Minimise waste;
- Reuse if not contaminated;
- Recycle, if possible; or
- Safe disposal (if all else fails).

Must not be disposed together with household garbage. Do not allow product to reach sewage system.

Contact waste processors for recycling information.

Used, degraded or contaminated product may be classified as hazardous waste. Anyone classifying hazardous waste and determining its fate must be qualified in accordance with state and international legislation.

- **Uncleaned packaging:**

- **Recommendation:**

Empty contaminated packagings thoroughly. They may be recycled after thorough and proper cleaning.

(Contd. on page 8)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 7)

Disposal must be made according to official regulations.

Containers, even those that are "empty," may contain residues that can develop flammable and/or hazardous vapours upon heating. Do not cut, drill, grind, weld, or perform similar operations on or near empty containers.

- **Recommended cleansing agents:** Water, if necessary together with cleansing agents.

SECTION 14: Transport information

· 14.1 UN number or ID number · ADR/RID/ADN, IMDG, IATA	Not applicable
· 14.2 UN proper shipping name · ADR/RID/ADN, IMDG, IATA	Not applicable
· 14.3 Transport hazard class(es) · ADR/RID/ADN, ADN, IMDG, IATA · Class	Not applicable
· 14.4 Packing group · ADR/RID/ADN, IMDG, IATA	Not applicable
· 14.5 Environmental hazards:	Not applicable.
· 14.6 Special precautions for user	Not applicable.
· 14.7 Maritime transport in bulk according to IMO instruments	Not applicable.
· UN "Model Regulation":	Not applicable

SECTION 15: Regulatory information

- **15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**
- **Poisons Act**

· **Regulated explosives precursors**

CAS: 6484-52-2	Ammonium nitrate	10%
----------------	------------------	-----

· **Regulated poisons**

None of the ingredients are listed.

· **Reportable explosives precursors**

CAS: 7757-79-1	Potassium nitrate	Listed
----------------	-------------------	--------

· **Reportable poisons**

None of the ingredients are listed.

- **Control Of Major Accident Hazards Regulations 2015 (COMAH)**

- **Named dangerous substances - ANNEX I** None of the ingredients are listed.

- **15.2 Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

This Safety Data Sheet is in compliance with Regulation (EC) No 1907/2006, Article 31 as amended by Regulation (EU) 2020/878.

- **Relevant phrases**

H272 May intensify fire; oxidiser.

H302 Harmful if swallowed.

(Contd. on page 9)

Safety data sheet

according to UK REACH (SI 2020/1577) as amended

Printing date 19.01.2025

Version number 1

Revision: 19.01.2025

Trade name: Polyon 24-5-8 FINE (6-7 months)

(Contd. of page 8)

H319 Causes serious eye irritation.

· **Department issuing SDS:** Product safety department.· **Abbreviations and acronyms:**

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

DNEL: Derived No-Effect Level (UK REACH)

PNEC: Predicted No-Effect Concentration (UK REACH)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

vPvB: very Persistent and very Bioaccumulative

ATE: Acute toxicity estimate values

Ox. Sol. 2: Oxidizing solids – Category 2

Ox. Sol. 3: Oxidizing solids – Category 3

Acute Tox. 4: Acute toxicity – Category 4

Eye Irrit. 2: Serious eye damage/eye irritation – Category 2

GB