

SAFETY DATA SHEET

according to Globally Harmonized System of Classification and Labelling of Chemicals (GHS)
ST/SG/AC.10/30/Rev.8

Ammonium phosphate sulphate NPS 16:20:12

Revision Date 18.12.2023 Version G-EN-2 Date of previous issue: 17.01.2022

SECTION 1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Trade name : Ammonium phosphate sulphate NPS 16:20:12
Synonyms : Sulfoammophos
Use of the Substance/Mixture : mineral fertilizer
Company : Manufacturer: LLC «Almaz Fertilizers»
Legal address: Russia, 357341, Lermontov, Stavropolskiy reg. st. Promyshlennaya 7, room 60
Postal address: Russia, 357341, Lermontov, Stavropolskiy reg. st. Promyshlennaya 7, room 60

Provider: CASHMERE CAPITAL LTD
1N room, premises II, floor 5, building 2, house 4/7, Vozdvizhenka street, Moscow, 125009, Russia
Telephone : Manufacturer: +7 (879-35) 3-76-59
Provider: +7 (495) 989-70-73
E-mail address : info@a-group.com
Emergency telephone number : Note: please, consult with your local/national competent authorities for the emergency number in your country.

SECTION 2. HAZARDS IDENTIFICATION

Classification and labelling according to Globally Harmonized System of Classification and Labelling of Chemicals (GHS), ST/SG/AC.10/30/Rev.8

<u>Hazard Class and Category Code(s):</u>	<u>Hazard Statement(s):</u>
Eye irritation, Category 2A	Causes serious eye irritation.
Acute toxicity, oral, Category 5	May be harmful if swallowed.
Skin corrosion/irritation, Category 2	Causes skin irritation.

Hazard pictogram (s) :



Exclamation mark

Signal Word : Warning
Hazard statements : H315 Causes skin irritation..
H319 Causes serious eye irritation..
H373 May affect the respiratory system as a result of repeated or prolonged exposure.
Prevention:
Precautionary statements : P264: Wash hands thoroughly after handling.
P280: Wear protective gloves, eye protection, face protection.
P260: Do not breathe dust/fume/gas/mist/vapours/spray.

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Response:

P312 Call a POISON CENTER/doctor if you feel unwell
P302 + P352 : IF ON SKIN: Wash with plenty of water.
P321: Specific treatment... (manufacturer/ supplier to specify treatment)
P332+P311: If skin irritation occurs: Call a POISON CENTER/doctor
P362 + P364 : Take off contaminated clothing and wash it before reuse
P305 + P351 + P338 : IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P337+P311 If eye irritation persists: Call a POISON CENTER/doctor

Disposal:

Dispose of contents or container to in accordance with local regulations

Other hazards:

No data available.

SECTION 3. COMPOSITION, INFORMATION ON INGREDIENTS

The product is a chemical substance within the meaning of Regulation (EC) No. 1272/2008 [CLP]

Chemical Name	Concentration, wt. %	CAS-No	Regulation (EC) No. 1272/2008 [CLP]
Ammonium dihydrogenorthophosphate	>70	7722-76-1	Not classified
Ammonium sulphate	≥20	7783-20-2	Not classified
Diammonium hydrogen phosphate	≤ 9	7783-28-0	Not classified
Water	≤ 1	7732-18-5	Not classified

There are no additional ingredients, which are presented existing within the current supplier's knowledge and classified, contributed to the substance's classification and consequently required reporting in this section.

SECTION 4. FIRST AID MEASURES

- General advice : In the case of accident or if you feel unwell, seek medical advice immediately (show the label where possible). Never give anything by mouth to an unconscious person.
- Inhalation : If breathed in, move person into fresh air. Keep patient warm and at rest. Get medical advice or attention if you feel unwell.
- Skin contact : In case of contact, flush skin with soap and plenty of water. If skin irritation persists, call a physician.
- Eye contact : If easy to do, remove contact lens, if worn. In the case of contact with eyes, rinse with plenty of water. If symptoms persist, call a physician..
- Ingestion : Rinse mouth with water. If you feel unwell, call a physician.
- Most important symptoms and effects, both acute and delayed
Inhalation: no data available.
Skin contact: redness.
Eye contact: redness, opacity, swelling.
Ingestion: headache, nausea, vomiting, diarrhea

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SECTION 5. FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable extinguishing media : Water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Unsuitable extinguishing media : Do not use water jet.

Unusual fire and explosion hazards

Specific hazards : Hazardous decomposition products may be formed under fire conditions (see section 10).

Special firefighting procedures

Special protective equipment for fire-fighters : In the event of fire, wear self-contained breathing apparatus. Use personal protective equipment.

Further information : Standard procedure for chemical fires. Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Collect contaminated fire extinguishing water separately. This must not be discharged into drains. Fire residues and contaminated fire extinguishing water must be disposed in accordance with local regulations.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions : Refer to protective measures listed in sections 7 and 8. Use personal protective equipment. Ensure adequate ventilation, especially in confined areas. Avoid dust formation. Avoid breathe dust. Avoid contact with skin and eyes..

Environmental precautions : Do not flush into surface water or sanitary sewer system. If the product contaminates rivers and lakes or drains inform respective.

Methods for cleaning up : Spills should be collected and used as intended. Collect unsuitable product in a container for disposal in accordance with local / national legislation. Pick up and arrange disposal without creating dust. Avoid pollution of environment..

Reference to other sections : See section 8 for personal protective equipment and section 13 for waste disposal.

SECTION 7. HANDLING AND STORAGE

Handling

Advice on safe handling : For personal protection see section 8. Avoid formation of dust. Avoid breathe dust. Avoid contact with skin and eyes. Provide appropriate exhaust ventilation at places where dust is formed.

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Advice on protection : Normal measures for preventive fire protection.
against fire and explosion

Storage

Requirements for storage : Keep container in a dry and well-ventilated place. Store in bags
areas and containers or specialized soft containers.

Further information on stor- : Protect from moisture.
age conditions

Advice on common storage : Keep away from food, drink and animal feeding stuffs. Store
separate from alkalis, organic substances, fertilizers and pesti-
cides.

Storage period : 9 months.

Other data : No data available.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Occupational exposure limits

Contains no substances with occupational exposure limits.

Exposure controls

Engineering measures : Provide sufficient air exchange and/or exhaust in work rooms.
Highly effective exhaust ventilation.

Personal protective equipment

Respiratory protection : A respirator with a filter against harmful particles.

Skin and body protection : Protective clothing made of dust-proof fabric, cotton, broad-
cloth.

Eye protection : Safety glasses.

Hand protection : Protective gloves..

Personal protective equip-
ment (pictograms) :



Hygiene measures : Handle in accordance with good industrial hygiene and safety
practice.
General industrial hygiene practice.
Avoid formation of dust.
When using do not eat, drink or smoke.
Wash hands before breaks and at the end of workday.
Wash contaminated clothing before re-use.

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SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state	: Solid. [granules]
Shape	: granules
Colour	: White
Odour	: Odorless.
pH	: No data available
Melting point	: Ammonium dihydrogenorthophosphate 192 °C; Ammonium sulphate -350°C; Diammonium hydrogen phosphate 155 °C
Boiling point/range	: No data available.
Flash point	: Not applicable. The product is a solid at normal conditions.
Evaporation rate	: Not applicable.
Flammability	: No data available.
Lower explosion limit	: No data available.
Upper explosion limit	: No data available.
Vapour pressure	: Not applicable. The product is a solid at normal conditions.
Vapour density	: Not applicable. The product is a solid at normal conditions.
Density	: : 0,87-0,92 g/sm ³ at 19 °C
Bulk density	: 0.9 - 1.1 kg/dm ³
Solubility	: No data available
Partition coefficient n-octanol/ water (log Pow)	: No data available.
Auto-ignition temperature	: No data available.
Decomposition point/range	: > 200 °C
Viscosity, kinematic	: Not applicable.
Viscosity, dynamic	: Not applicable.

SECTION 10. STABILITY AND REACTIVITY

Chemical stability	: Stable.
Reactivity	: Interacts with alkalis and strong acids. Able to enter into an exchange reaction.
Possibility of hazardous reactions	: Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid	: Incompatible with alkalis, strong acids, magnesium. Avoid heating above 200 °C (decomposes).
Hazardous decomposition products	: Ammonia, oxides of nitrogen, oxides of sulfur and oxides of phosphorus

SECTION 11. TOXICOLOGICAL INFORMATION

Acute oral toxicity

Ammonium dihydrogenorthophosphate	: LD ₅₀ (rat): > 5750 mg/kg LD ₅₀ (mice): 5000 mg/kg
Ammonium sulphate	LD ₅₀ (rat): 4 540 mg/kg LD ₅₀ (mice): > 2450 mg/kg

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Diammonium hydrogen
Phosphate

LD₅₀ (rat): > 5750 mg/kg
LD₅₀ (mice): > 5000 mg/kg

Acute inhalation toxicity

Ammonium
dihydrogenorthophosphate : LC₅₀ (rat): > 5 000 mg/m³ (No mortality)
Exposure time: 4 h

Acute dermal toxicity

Ammonium : LD₅₀ (rat): > 2500 mg/kg
dihydrogenorthophosphate
Diammonium hydrogen phosphate LD₅₀ (rabbit): > 7 950 mg/kg

Acute toxicity (other routes of administration)

No data available.

Skin irritation : Causes skin irritation.

Eye irritation : Causes serious eye irritation.

Skin sensitisation : Non sensitizing.

Respiratory sensitisation : Non respiratory sensitizing.

Specific target organ toxicity after single exposure

No data available.

Specific target organ toxicity after repeated exposure (sub-acute / sub-chronic)

Ammonium : NOAEL (sub-acute, rat): = 250 mg/kg bw/day
dihydrogenorthophosphate : Route of application: oral
Exposure time: 6 weeks

CMR effects:

Mutagenicity : No mutagenic effect.
Carcinogenicity : No carcinogenic effect.
Toxicity for reproduction : No reproductive effect.

Aspiration hazard : Not applicable. The product is a solid at normal conditions.

SECTION 12. ECOLOGICAL INFORMATION

Toxicity to fish:

Ammonium : LC₅₀ (Pimephales promelas): > 155 mg/l
dihydrogenorthophosphate : Exposure time: 96 h
Diammonium sulfate : LC₅₀ (Oncorhynchus mykiss): 53 mg/l
Exposure time: 96 h

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Diammonium hydrogen phosphate LC_{50} (Pimephales promelas): 155 mg/l
Exposure time: 96 h

Toxicity to daphnia and other aquatic invertebrates:

Ammonium dihydrogenorthophosphate EC_{50} (Daphnia magna): > 100 mg/l
Exposure time: 48 h

Diammonium sulfate : EC_{50} (Ceriodaphnia): 121.7 mg/l
Exposure time: 48h
 LC_{50} (Daphnia magna): 423 mg/l),
Exposure time: 24h

Toxicity to aquatic plants:

Ammonium dihydrogenorthophosphate EC_{50} (Pseudokirchneriella subcapitata): > 100 mg/l
Exposure time: 72 h

Diammonium sulfate : EC_{50} (Chlorella vulgaris): 2 700 mg/l
Exposure time: 18 h

Long-term study fish/daphnia and other aquatic invertebrates/aquatic plants:

No data available.

Persistence and degradability

Biodegradability : An inorganic substance, biodegradation studies are not applicable.

Bioaccumulation potential

Simple inorganic salts with high aqueous solubility will exist in a dissociated form in an aqueous solution. Such a substance has a low potential for bioaccumulation.

Mobility in soil

No data available.

Adsorption coefficient : No data available.

Further information on ecology

Additional ecological information : The product should not be allowed to enter drains, water courses or the soil.

SECTION 13. DISPOSAL CONSIDERATIONS

Methods of disposal

Advice on disposal and packaging : Disposal:
In accordance with local and national regulations. Do not dispose of waste into sewer. This material and its container must be disposed of in a safe way. Do not dispose of together with household waste. Waste codes should be assigned by the user based on the application for which the product was used.

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SECTION 14. TRANSPORT INFORMATION

Regulatory information	UN number	Proper shipping name	Class	Packing group
DOT	-	Not dangerous goods.	-	-
ADR / RID	-	Not dangerous goods.	-	-
IMDG	-	Not dangerous goods.	-	-
IATA	-	Not dangerous goods.	-	-

Transport in bulk according to Annex II of MARPOL and the IBC Code: Not applicable

SECTION 15. REGULATORY INFORMATION

A chemical safety assessment has been performed

Ozone depleting substances

Not listed.

Seveso Directive

Not listed.

Montreal Protocol

Not listed.

Stockholm Convention on Persistent organic Pollutants

Not listed.

Rotterdam Convention on Prior Informed Consent

Not listed.

SECTION 16. OTHER INFORMATION

Abbreviations and acronyms : ADR = The European Agreement concerning the International Carriage of Dangerous Goods by Road
IATA = International Air Transport Association
IMDG = International Maritime Dangerous Goods
MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution)
RID = The Regulations concerning the International Carriage of Dangerous Goods by Rail

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