

Safety Data Sheet
according to the Regulation EC No. 453/2010
Urea prilled - AM

1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product identifier: Urea

Registration number: **01-2119463277-33-0018**

Trade name: Urea prilled- AM

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

Use in industrial:

- as an intermediate for production of AdBlue.

1.3. Details of the supplier of the safety data sheet:

Duslo, a.s.

Administratívna budova ev.č. 1236

927 03 Šaľa

Slovenská republika

tel.: +421 31 775 2961

fax.: +421 31 775 3014

e-mail: ejurisova@duslo.sk

1.4. Emergency

Company dispatching center

tel.: +421 31 775 4112

telephone number:

fax: +421 31 775 3040

e-mail: duslo@duslo.sk

NÁRODNÉ TOXIKOLOGICKÉ INFORMAČNÉ CENTRUM,

Klinika pracovného lekárstva a toxikológie, Bratislava

Tel.č. 02/5477 4166, Fax.č. 02/5477 4605 e-mail.: ntic@ntic.sk

2. HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture: Substance is not classified as dangerous according to the Regulation (EC) No 1272/2008 of the European parliament and of the council, on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006.

Risk identification: None.

2.2. Label elements: None.

Classification and labeling according Directive 67/548/EEC:

Symbol: --

R- phrases: --

S- phrases: --

2.3. Other hazards: No information available.

3. COMPOSITION/INFORMATION ON INGREDIENTS

3.1. Substances:

Classification:	CAS:	EC:	Category:	H-phrases:	Pictogram:	Content (%)
urea	57-13-6	200-315-5	--	--	--	≥ 97%
Impurities:						
biuret	108-19-0	203-559-0	--	--	--	≤ 1

3.2. Mixtures:

Classification:	Contains no hazardous mixtures.					
	CAS:	EC:	Category:	H-phrases:	Pictogram:	Content (%)
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Notes: *Full text H - phrases is referred to in point 16

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4. FIRST AID MEASURES

4.1. Description of first aid measures:

Inhalation: Remove from exposure. In severe cases, or if recovery is not rapid or complete seek medical attention.

Ingestion: Wash out mouth with water. Do not induce vomiting. If patient is conscious, give water to drink. If patient feels unwell seek medical attention.

Eye Contact: Irrigate thoroughly with water for at least 10 minutes. Obtain medical attention.

Skin Contact: Rinse with plenty of water. Remove contaminated clothing and wash before reuse. If irritation persists seek medical attention.

4.2. Most important symptoms and effects, both acute and delayed:

Dust may cause mechanical irritation to eyes and respiratory tract.

4.3. Indication of any immediate medical attention and special treatment needed:

Large volume may cause stomach-enteric histis and in the extreme (for infants especially) infant cyanosis (raised cyanosis around mouth).

5. FIREFIGHTING MEASURES

5.1. Extinguishing media:

5.1.1. Suitable extinguishing media: Use extinguishers suitable to cause of fire.

5.1.2. Unsuitable extinguishing media: None.

5.2. Special hazards arising from the substance or mixture:

Irritating substances may be emitted upon thermal combustion.

5.3. Advice for firefighters:

Self-contained breathing apparatus will be required.

6. ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures:

Wear suitable protective clothing.

6.2. Environmental precautions:

Prevent large quantities from contacting vegetation or waterways. Keep animals away from large spills.

6.3. Methods and material for containment and cleaning up:

Vacuum or sweep up and place into approved containers for later disposal.

6.4. Reference to other sections:

For more information on protective equipment see section 8.

For more information on on the disposal of substance, see section 13.

7. HANDLING AND STORAGE

7.1. Precautions for safe handling:

Avoid contact with eyes. Avoid repeated or prolonged contact with skin or clothing. Avoid dust inhalation. Wear suitable protective clothing.

7.2. Conditions for safe storage, including any incompatibilities:

Tore under cool dry conditions.

7.3. Specific end use(s):

See point 1.2.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters:

Highest exposure limits (NPEL) based on Slovak Order No. 355/2006:

Substance	EC	NPEL				Remark
		average		Short-term		
		ml.m ⁻³ (ppm)	(mg.m ⁻³)	category	mg.m ⁻³	

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ammonia	231-635-3	20	14	--	36	--
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8.2. Exposure controls:

Ensure sufficient local ventilation. Avoid abnormal dust formation. By technical and organizational measures avoid to the skin contact and do not exceed the highest exposure limit.

a) Eye/face protection:

Use suitable protective goggles.

b) Skin protection:

I. Hand protection: Protective gloves. Selection of a suitable glove material, consult the supplier of gloves.

II. Other: Put on suitable protective clothes and shoes.

c) Respiratory protection:

Use a protective dust respirator.

d) Thermal hazards:

Information is not available.

8.3. Environmental exposure controls:

Prevent uncontrolled release to environment.

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties:

Appearance:	solid, prille
Granulometry:	0,5 – 3,15 mm
Color:	White
Odour:	slight ammonia-like odour.
Odour threshold:	n.a.
pH:	9 – 10 (10% solution)
Melting point/freezing point:	132,7 °C, granuled 130 – 133 °C
Initial boiling point and boiling range:	n.a.
Flash point:	(370 ± 10) °C
Evaporation rate:	n.a.
Flammability (solid, gas):	n.a.
Upper/lower flammability or explosive limits:	n.a.
Vapour pressure:	n.a.
Vapour density:	n.a.
Relative density:	n.a.
Solubility(ies):	Well soluble in water (590 g/l pri 20°C). Insoluble in organic solvents.
Partition coefficient: n-octanol/water:	n.a.
Auto-ignition temperature:	> 650 °C
Decomposition temperature:	n.a.
Viscosity:	n.a.
Explosive properties:	n.a.
Oxidising properties:	n.a.
9.2. Other information:	
Molecular weight:	60,056 kg/kmol
Specific weight:	1333,5 kg/m ³
Bulk density:	700 – 760 kg/m ³
Combustion heat:	-634,7 kJ/mol

10. STABILITY AND REACTIVITY

10.1. Reactivity:

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Stable under recommended storage and handling conditions (see section 7, handling and storage).

10.2. Chemical stability:

Stable under recommended storage and handling conditions (see section 7, handling and storage).

10.3. Possibility of hazardous reactions:

Stable under recommended storage and handling conditions (see section 7, handling and storage).

10.4. Conditions to avoid:

Heating over melting point. Heating causes thermal decomposition and the gases formation: CO₂, NH₃, NO_x.

Before welding or burning the equipment must be decontaminated.

10.5. Incompatible materials:

Strong oxidants, acids, bases, hypochlorites.

10.6. Hazardous decomposition products:

NO_x, NH₃, CO₂

11. TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects:

a) acute toxicity:

Acute oral toxicity: (rat)LD₅₀ > 2000 mg/kg

b) skin corrosion/irritation:

Skin irritation (rabbit): short term irritation – not harmful.

c) serious eye damage/irritation:

Eyes irritation (rabbit): slightly irritating.

d) respiratory or skin sensitisation:

Repeated and long-lasting contact with skin may cause sensibilization.

e) germ cell mutagenicity:

No information available.

f) carcinogenicity:

No information available.

g) reproductive toxicity:

No information available.

h) STOT – single exposure:

No information available.

i) STOT – repeated exposure:

No information available.

j) aspiration hazard:

No information available.

12. ECOLOGICAL INFORMATION

12.1. Toxicity:

Product has low water toxicity. In the event of watercourses affected by large amount of product, adverse effects on aquatic fauna and flora can occur because of high consumption of oxygen.

12.2. Persistence and degradability:

Significant biodegradation in water and soil.

12.3. Bioaccumulative potential:

Low bioaccumulation potential.

12.4. Mobility in soil:

Soluble in water.

12.5. Results of PBT and vPvB assessment:

Not evaluated.

12.6. Other adverse effects:

Improper handling may result in pollution of surface and ground waters.

13. DISPOSAL CONSIDERATIONS

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13.1. Waste treatment methods:

Depending on the degree and character of contamination use for agricultural purposes or dispose of under control by authorised waste disposal contractors.

Empty container damaged through using must be stored at the designed place and disposed of in a solid waste incineration plant.

14. TRANSPORT INFORMATION

Product is not classified as dangerous good for transport according to ADR/RID/IMDG Code.

14.1. UN number: None.

14.2. UN proper shipping name: Urea prilled – AM.

14.3. Transport hazard class(es): No information available.

14.4. Packing group: No information available.

14.5. Environmental hazards: Substance is not classified as dangerous for environment according to the ADR/RID/IMDG Code.

14.6. Special precautions for user: Transport in sealed body vehicles covered with watertight tarpaulin.

14.7. Transport in bulk according to Annex II of MARPL 73/78 and the IBC Code: No information available.

Packing: Product is packed to big-bags of 1000 kg weight, stabilized on pallets or without pallets.

15. REGULATORY INFORMATION

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture: Corrigendum to Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH);

REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006;

Commission Regulation (EC) No 790/2009 of 10 August 2009 amending, for the purposes of its adaptation to technical and scientific progress, Regulation (EC) No 1272/2008 of the European Parliament and of the Council on classification, labelling and packaging of substances and mixtures; REGULATIONS COMMISSION REGULATION (EU) No 453/2010 of 20 May 2010 amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council on the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH);

Decree No. 300/2007 Coll. of the Government of the Slovak Republic amending Decree No. 355/2006 Coll. of the Government of the Slovak Republic on health protection of employees against occupational risks related to the exposition to chemical factors;

Order No. 3/2010 of 15 April 2010 of the Ministry of Economy of the Slovak Republic;

Act No. 409/2006 Coll. of the National Council of the Slovak Republic - full text of Act No. 223/2001 Coll. on waste and on amendments of certain Acts in the wording of later regulations

15.2. Chemical safety assessment:

According to the Regulation REACH, Article 14 was carried out a chemical safety assessment of this substance.

16. OTHER INFORMATION

16.1 Used information sources:

IUCLID 5 database.

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16.2 Instructions for the training:

Instruction in work with product shall be included into the educational system about the safety work (initial training, training at the workplace, repeated training) according to concrete conditions at the workplace.

16.3. List of relevant H phrases:

H- phrases: None.

16.4. Changes made in the revision:

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16.5 Other information:

Information is available.

Issued: DUSLO, a.s. Quality Assurance

Contact : Ing. Emília Jurisová, Head of Quality Assurance

tel.. +421 31 775 2961 fax.: +421 31 775 3014 e-mail: ejurisova@duslo.sk