	SAFETY DATA SHEET	Version:	1.0
	<b>BLASTING CAP No. 8</b>	Issued on:	
		Updated on:	
	<i>This Safety Data Sheet complies with the requirements of Regulation (EC) No 1907/2006 REACH, as amended.</i>	Page:	1 of 20

## SECTION 1: IDENTIFICATION OF THE SUBSTANCE/ MIXTURE AND OF THE COMPANY/ UNDERTAKING.

### 1.1 Product identifier

Trade name:	BLASTING CAP No.8
IUPAC name	Not applicable
Index/ CAS number	Not applicable
Registration number:	Not applicable
Contains:	Lead (II) azide, Lead triresorcinate, PETN

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

The product is used for general blasting applications in underground and open-pit mining, tunnel drilling, demolition and seismic works. It is **forbidden** to use the products in conditions of firedamp and/ or coal dust explosion hazard.

### 1.3 Details of the supplier of the safety data sheet

Company name:	NITROERG S.A.	
Address:	pl. Alfreda Nobla 1 43-150 Bieruń Poland	
Production plant:	pl. Alfreda Nobla 1 43-150 Bieruń Poland	
Contact number:	Bieruń	(+48) 32 46 61 900
	Krupski Młyn	(+48) 32 46 62 103
Fax:	Bieruń	(+48) 32 46 61 357
	Krupski Młyn	(+48) 32 46 62 100
E-mail:	sds@nitroerg.pl	

### 1.4 Emergency telephone number

NITROERG S.A.	+48 32 46 62 000 (6 <sup>00</sup> - 15 <sup>00</sup> , Monday - Friday)
Police	Depends on the country.



SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 2 z 20

Fire brigade	Depends on the country.
Ambulance services	Depends on the country.
Emergency services:	112, 911 or 999 (from cell phone).

**SECTION 2: HAZARDS IDENTIFICATION**

**2.1 Classification of the substance or mixture**

Expl. 1.1 H201	Explosive, subclass 1.1
STOT RE 2 H373	Specific target organ toxicity, cat. 2
Repr. 1A H360f	Reprotoxic, cat. 1A
Aquatic Acute 1 H400	Acute toxicity for aquatic life, cat. 1
Aquatic Chronic 1 H410	Chronic toxicity for aquatic life, cat. 1

All the hazardous substances and mixtures present in the product are sealed. Full meaning of H- and P-phrases in sections 2-15: see SECTION 16.

**2.2 Label elements**

Hazard pictogram(s):		
Signal word:	DANGER	
H-phrases(s):	H201	Explosive; mass explosion hazard
P-phrase(s):	P210	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
	P370+P380	In case of fire: Evacuate area.
	P372	Explosion risk in case of fire.
	P373	DO NOT fight fire when fire reaches explosives.
	P401	Store in accordance with local regulations for explosives storage.



SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 3 z 20

P-phrase(s):	P501	Dispose of contents/container to in accordance with national regulation.
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**2.3 Other hazards**

During the heating and combustion, highly toxic nitrogen oxides are created. Combustion of small quantities in confined space or large quantities may lead to detonation. Fire hazard may occur as a secondary effect of detonation.

**SECTION 3: COMPOSITION/ INFORMATION ON INGREDIENTS**

**3.1 Substances**

Not applicable.

**3.1 Mixtures**

Name:	Lead (II) azide	Lead triresorcinate	PETN
IUPAC name:	Diazidolead	Lead 2,4,6-trinitrobenzene-1,3-diolate	[3-Nitrooxy-2,2-bis(nitrooxymethyl)propyl] nitrate
EC number:	236-542-1	239-290-0	201-084-3
CAS number:	13424-46-9	15245-44-0	78-11-5
Registration number:	01-2119475503-38-0004	05-2114121065-65-0000	-
Classification:	Unst. Expl. H200	Expl. 1.1 H201	Unst. Expl. H200
	Acute Tox. 4 H302	Acute Tox. 4 H302	-
	Acute. Tox. 4 H332	Acute Tox. 4 H332	-
	Repr. 1A H360Df	Repr. 1A H360Df	-
	STOT RE 2 H373	STOT RE 2 H373	-
	Aquatic Acute 1 H400	Aquatic Acute 1 H400	-
	Aquatic Chronic 1 H410	Aquatic Chronic 1 H410	-
Concentration [%]	approx. 18 %	approx. 5%	approx. 77 %
EU limit values:	No data	No data	No data

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	4 z 20

## SECTION 4: FIRST AID MEASURES

### 4.1 Description of first aid measures

#### 4.1.1 General information

Never place anything inside the mouth of unconscious person.

#### 4.1.2 Intoxication by inhalation

Not expected if the product is used accordingly to manufacturers specification. The hazardous substances are sealed inside the product. The products of thermal decomposition and detonation are toxic. In case of intoxication with those products, remove the person from the place of exposure and call medical service (P311; P304+340).

#### 4.1.3 In contact with skin

Not expected if the product is used accordingly to manufacturers recommendations. The hazardous substances are sealed inside the product. In case of accidental release and direct skin contact with the product components, one should rinse the contaminated skin with running water with soap (P302+352). In case of malaise call medical service.

#### 4.1.4 In contact with eyes

Not expected route of exposure. The hazardous substances are sealed inside the product. In case of accidental release and contact with eyes, rinse the eyes cautiously with large amount of running water for several minutes (P305+351+338). Call medical service. The eyes may be also damaged due to fragmentation of the product during blasting operations. In such case immediately call medical assistance (P311).

#### 4.1.5 Intoxication by ingestion


There is no possibility of ingestion of the product components, if the product is used accordingly to manufacturers recommendations. In case of accidental release and ingestion of the product components, give the injured person water to drink and call medical assistance. Do not induce vomiting (P301+330+331). The nitrates present in the mixture may cause gastrointestinal disorders, blood pressure drop and symptoms of methemoglobinemia.

#### 4.1.6 Safety equipment for person providing assistance

Not required.

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

Shortness of breath, headache, nausea and methemoglobinemia may occur due to intoxication by the inhalation of the products of explosive decomposition and accidental ingestion of the mixture. In case of direct skin contact

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	5 z 20

allergic reactions may also occur, e.g. skin reddening, irritation or rash.

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

Show the SDS and the label to the doctor. In case of clinical symptoms of methemoglobinemia, the injured person should be given immediately 100% oxygen for breathing and 1g of ascorbinic acid intravenously. If there is a doctor near the accident - give 10 - 50 ml of methylene blue.

### SECTION 5: FIREFIGHTING MEASURES

#### 5.1 Extinguishing media

Suitable:	If the fire did not reach the product use any suitable extinguishing media for adjacent fire. Use water to cool the product.
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Unsuitable:	Do not use water near the electrical equipment and installations.
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#### 5.2 Special hazards arising from the substance or mixture

Do not attempt to extinguish fire if it has covered the product due to explosion risk. Toxic nitrogen oxides and carbon oxide are created during thermal decomposition of the product.

#### 5.3 Advice for firefighters

Do not attempt to extinguish fire if it has covered the product (P373). Use water to cool the product if the fire did not reach the article.

Use autonomic breathing apparatus together with gas-tight clothing, compliant with EN469 standard. Immediately evacuate all personnel from the endangered area. Use all the natural protection and covers, avoid direct contact with the location of the accident and order people to move away from the windows. Stop all the traffic and close the danger zone within the radius of 500 m. Evacuate unnecessary personnel (P370+380+375).

In case of fire of the mean of transport, disconnect the tractor from the trailer and move the tractor to a safe place (if possible).

In case of fire of the wagon, disconnect it from the rest of the carriage and move it to a safe place (if possible).

### SECTION 6: ACCIDENTAL RELEASE MEASURES

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

##### 6.1.1 For non-emergency personnel

Safety equipment:	No needed if the components of the product were not released. If the components of the product were released, depending on the exposure risk use:
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	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	6 z 20

Safety equipment:	<ul style="list-style-type: none"> <li>• Protective mask (compliant with EN149)</li> <li>• Protective eyewear (compliant with EN166)</li> <li>• Protective gloves (compliant with EN374)</li> </ul>
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Safety procedures:	<p>Inform surroundings about danger. Secure the product and location of the accident from unauthorized personel. Remove all ignition sources and announce smoking ban. In case of serious failure, evacuate all personnel from the location of the accident and call emergency services.</p>
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### 6.1.2 For emergency personel

Use anti-electrostatic clothing, cat. I, anti-dust masks (compliant with EN141), protective gloves (compliant with EN166), and an autonomic breathing apparatus - in case of high temperature, when there is no danger of explosion.

### 6.2 Environmental precautions

The mixture components are highly toxic for aquatic life. One should not allow the product and its components to penetrate to sewage systems, surface and ground waters.

### 6.3 Methods and material for containment and cleaning up

#### 6.3.1 Preventing the contamination from spreading

If the content of the product was not released, cautiously collect the product and put it in a collective box. Carefully examine the product. Damaged blasting caps should be disposed. If the content of the product was released, secure the area and remove the source of contamination. Carefully collect the product components with non-sparking tools. Put the material in a tight container and dispose

#### 6.3.2 Removing contamination

If released into environment:

Small quantities:	Collect the product. Avoid sparking and other potential sources of ignition.
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Large quantities:	Call emergency services.
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#### 6.3.3 Other information

None.

### 6.4 Reference to other sections

Personal protection measures: see SECTION 8.

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	7 z 20

Disposal considerations: see SECTION 13.

## SECTION 7: HANDLING AND STORAGE

### 7.1 Precautions for safe handling

Do not eat, drink or smoke during handling the product (P270). Follow the GHP (P202) and GMP rules. Use personal protection measures. Work in dry, well ventilated places to protect the product from dampness. Ensure the cleanliness of means of transport. Avoid mechanical shock, friction, high temperatures or any energetic stimuli which may cause detonation. Protect the product from adverse weather conditions (excessive sunlight, rain, lightning, etc.)

### 7.2 Conditions for safe storage, including any incompatibilities

Technical measures and storage conditions:	The product should be kept in original packages. Storage temperature: 0 °C ÷ 30 °C at RH < 65%. Product shelf life: 12 months from the production date.
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Packaging material:	Cardboard box.
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Requirements concerning the storage:	According to national regulations on storage of explosives.
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Storage class:	1
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Storage with other materials:	Strictly with other class 1 materials, compatibility group B and S (according to ADR regulation)
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Acceptable quantity:	Defined by local regulations.
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### 7.3 Specific end use(s)

None.

## SECTION 8: EXPOSURE CONTROL/ PERSONAL PROTECTION

### 8.1 Control parameters

#### 8.1.1 For substance(s), mixture(s) or mixture components listed in SECTION 3.

Substance/ Mixture:	Lead (II) azide	Lead triresorcinate	PETN
CAS/ Registration No:	13424-46-9	15245-44-0	78-11-5
Poland	TLV-TWA	No data	No data
	TLV-STL	No data	No data



SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 8 z 20

Poland	TLV-C	No data	No data	No data
Standard:		-	-	-
Biological Exposure Limit:		No data	-No data	No data

**8.1.2 For air contaminants resulting from intended use**

Substance:		Nitrogen dioxide	Carbon monoxide
CAS/ Registration No:		10102-44-0	6030-08-0
Poland (EU)	TLV-TWA	0,7 mg/m <sup>3</sup> (0,2 ppm)	23 mg/m <sup>3</sup>
Poland (EU)	TLV-STL	1,5 mg/m <sup>3</sup>	117 mg/m <sup>3</sup>
	TLV-C	-	-
Standard:		PN-Z-04009-11:2008 PN-Z-04317:2006	PN-Z-04094-02:1974 PN-Z-04094-03:1974
Biological Exposure Limit:		-	-

**8.1.3 Legal basis**

The Threshold Limit Value (TLV) of specific substances depends on the country and is regulated by local law. Please keep in mind, that the values given above for these particular chemical compounds, may be different in your country.

**POLAND:** Regulation of the Minister of Labour and Social Policy of 6 June 2014. On maximum permissible concentration and intensity of harmful factors in the work environment (Dz. U. 2014 pos. 187), as amended.

**8.1.4 DNEL**

**Lead (II) Azide**

Information published in the available literature is insufficient.

**Lead resorcinate**

Information published in the available literature is insufficient.



	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	9 z 20

<b>PETN</b>		
EFFECT	ROUTE OF EXPOSURE	DNEL
Systemie chronic	Inhalation	220,4 mg/m <sup>3</sup>
<b>8.1.5 PNEC</b>		
No data available for the components of the product.		
<b>8.2 Exposure controls</b>		
<b>8.2.1 Applied technical means of control</b>		
Ventilation	Using ventilation as a part of GMP.	
<b>8.2.2 Individual protection measures, such as personal protective equipment</b>		
PROTECTION OF:	PROTECTION MEASURES	STANDARD
Eyes	Protective glasses with side shields, transparent, made of PC, optical class I.	EN166
Respiratory tract	Disposable hygienic mask.	-
Skin	Anti-electrostatic protective clothing, cat.I.	EN340
Hands	Disposable protective gloves, cat.I, made of nitrile, vinyl or latex.	EN374
<b>8.2.3 Environmental exposure control</b>		
See subsection 6.2 i 6.3.		
<b>SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES</b>		
<b>9.1 Information on basic physical and chemical properties</b>		
Appearance:	Solid.	
Odour:	No odour.	
Odour treshold:	Not applicable. The mixture has no odour.	
pH:	Not applicable.	
Melting point/freezing point:	Not relevant.	



## SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 10 z 20

Initial boiling point and boiling range:	Not relevant.
Flash point:	Not relevant.
Evaporation rate:	Not relevant.
Flammability (solid, gas):	Not relevant.
Upper/lower flammability or explosive limits:	Not relevant.
Vapour pressure:	Not relevant.
Vapour density:	Not relevant.
Relative density:	Not relevant.
Solubility(ies):	The product is insoluble in water.
Partition coefficient: n-octanol/water:	Not relevant.
Auto-ignition temperature:	Not relevant.
Decomposition temperature:	Not relevant.
Viscosity:	Not relevant.
Explosive properties:	The product is classified as explosive material. There is a risk of mass explosion hazard.
Oxidising properties:	Not relevant.
<b>9.2 Other information.</b>	
None.	
<b>SECTION 10: STABILITY AND REACTIVITY</b>	
<b>10.1 Reactivity</b>	
The product is non-reactive under normal conditions of transportation, storage, handling and use.	
<b>10.2 Chemical stability</b>	
The product is chemically inert under normal, specified by the manufacturer conditions of transportation, storage, handling and use.	



SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 11 z 20

**10.3 Possibility of hazardous reactions**

Combustion of large quantity of the material or small quantities in confined space may lead to detonation.

**10.4 Conditions to avoid**

Avoid fire, high temperature, static electricity, friction, mechanical shock and other energetic stimuli which may cause detonation of the product.

**10.5 Incompatible material**

Strong acids, bases and organic solvents. See subsection 14.6.

**10.6 Hazardous decomposition products**

None.

**SECTION 11: TOXICOLOGICAL INFORMATION**

**11.1 Information on toxicological effects**

**11.1.1 Acute toxicity**

- Lead (II) azide:**

Exposure route	Oral	Dermal	Inhalation
LD <sub>50</sub> or EC <sub>50</sub> rat	500 mg/kg	No data available.	1,5 mg/l/4h

- Lead triresorcinate:**

Exposure route	Oral	Dermal	Inhalation
LD <sub>50</sub> or EC <sub>50</sub> rat	No data available.	No data available.	No data available.

- PETN:**

Exposure route	Oral	Dermal	Inhalation
LD <sub>50</sub> or EC <sub>50</sub> rat	1660 mg/kg	No data available.	1 - 5 mg/dm <sup>3</sup>

- Acute Toxicity Estimate of mixture (ATE<sub>mix</sub>)**

ATE <sub>mix</sub>	Oral	Not classified.
	Dermal	Not classified.

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	12 z 20

ATE <sub>mix</sub>	Inhalation	Not classified.
<b>11.1.2 Skin corrosion/ irritation</b>		
Not classified. Skin may be damaged due to product fragmentation during detonation.		
<b>11.1.3 Serious eye damage/ eye Irritation</b>		
Not classified. Eyes may be damaged due to product fragmentation during detonation.		
<b>11.1.4 Respiratory or skin sensitization</b>		
Not classified.		
<b>11.1.5 Germ cell mutagenicity</b>		
Not classified.		
<b>11.1.6 Carcinogenicity</b>		
Not classified.		
<b>11.1.7 Reproductive toxicity</b>		
Substance:	Lead (II) azide and lead triresorcinate are classified as reprotoxic. These compounds may damage unborn child and are suspected of damaging fertility.	
Mixture:	Lead (II) azide and lead triresorcinate concentration present in the mixture does affect the mixture classification. Therefore the mixture has reprotoxic properties.	
<b>11.1.8 Summary of CMR properties</b>		
Substance:	Lead (II) azide and lead resorcinate are classified as reprotoxic.	
Mixture:	The mixture has reprotoxic properties.	
<b>11.1.9 Specific target organ toxicity – single exposure</b>		
Not classified.		
<b>11.1.10 Specific target organ toxicity – repeated exposure</b>		
Substance:	Lead (II) azide and lead resorcinate are classified as causing specific target organ toxicity (blood) on repeated exposure.	

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	13 z 20

Mixture:	Lead (II) azide and lead resorcinate concentration present in the mixture does affect the the mixture classification. Therefore the mixture is classified as causing specific target organ toxicity on repeated exposure.
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#### 11.1.11 Aspiration toxicity

Not classified.

#### 11.1.12 Symptoms related to physical, chemical and toxicological properties of the product.

EXPOSURE ROUTE	SYMPTOMS	
	ACUTE	CHRONIC
Inhalation	Dizziness and headache, shortness of breath.	Migraines, cough, pain in the chest, irritation of mucous membranes
Skin	Allergic symptoms such as: skin red- dening, itch, irritation, eczema.	Rash, itch and other allergic reac- tions.
Oral	Gastro - intestinal disorders, short- ness of breath, bluish lips and nails, loss of consciousness.	Methemoglobinemia, thyroid disor- ders, acute abdominal pain, col- lapse, convulsions, coma.

The above mentioned symptoms may only occur if the contents of the product were released due to accident or intended use, contrary to the manufacturer recommendations.


### SECTION 12: ECOLOGICAL INFORMATION

#### 12.1 Toxicity

##### 12.1.1 Acute toxicity of substance or mixture.

Aquatic organisms	<p>Lead (II) azide and lead resorcinate are highly toxic for aquatic life. The concentration of these compounds in the mixture does affect the the mixture classification. Therefore the mixture is classified as causing acute toxicity for aquatic organisms.</p> <ul style="list-style-type: none"> <li>• PETN: <ul style="list-style-type: none"> <li>- LC50 fish (96 hours) : 27000 mg/l</li> <li>- LC50 Crustaceans (48 hours): 8500 mg/l</li> </ul> </li> </ul>
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Terrestrial organisms	See subsection 11.1
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	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	14 z 20

<b>12.1.1 Chronic toxicity of substance or mixture.</b>	
Aquatic organisms	Lead (II) azide and lead styphnate are highly toxic for aquatic life. Therefore the mixture is classified as causing chronic toxicity for aquatic organ-
Aquatic organisms	- isms due to concentration of these compounds.
Terrestrial organisms	Lead present in lead (II) azide and lead resorcinat has bioaccumulative potential and may cause chronic toxicity in terrestrial organisms.
<b>12.2 Persistence and degradability</b>	
The mixture is not readily biodegradable.	
<b>12.3 Bioaccumulative potential</b>	
The mixture does contain components which have bioaccumulative potential (lead)	
<b>12.4 Mobility in soil</b>	
No data available.	
<b>12.5 Results of PBT and vPvB assessment</b>	
The mixture and its components are not classified as PBT and vPvB.	
<b>12.6 Other adverse effects</b>	
Do not allow the product or its components to penetrate to sewers, water systems or/and soil.	
<b>SECTION 13: DISPOSAL CONSIDERATIONS</b>	
<b>13.1 Waste treatment methods</b>	
<b>13.1.1 Disposal of the product/ packaging</b>	
Product disposal	The product should be disposed by detonation (see subsection 13.1.4) Waste code: 16 04 03*
Packaging disposal	The packaging should be disposed by combustion in open air or in special devices and installations adapted for this purpose (see subsection 13.1.4) Waste code: 15 01 10*

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	15 z 20

### 13.1.2 Waste processing - essentials information

The waste should not be processed for safety reasons. For disposal considerations see subsection 13.1.4.

### 13.1.3 Wastewater discharge - essentials information

Do not discharge the waste to sewage system.

### 13.1.4 Other information about wastes disposal

Special safety measures

See SECTION 7.

Legal basis:

Depends on the national legislation.

**POLAND:** The Act of 14 December 2012. About Waste (DZ.U.2013 No. 0, pos. 21), as amended.

Disposal of the waste may be carried out by authorized personnel only. Disposal of the product should comply to requirements of environmental safety, legislation on waste disposal and requirements of local authorities.

The manufacturer will accept any explosive waste and packaging contaminated with explosive material, manufactured by NITROERG S.A.

## SECTION 14: TRANSPORT INFORMATION

### 14.1 UN number

UN 0029

### 14.2 UN proper shipping name

Polish

ZAPALNIKI NIEELEKTRYCZNE

English

DETONATORS, NON-ELECTRIC

German

SPRENGKAPSELN NICHT ELEKTRISCH

French

DÉTONATEURS, NON - ÉLECTRIQUES

### 14.3. Transport hazard class(es)

Class

1

Division

1.1B

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	16 z 20

<b>14.4. Packing group</b>	
Not applicable.	
<b>14.5 Environmental hazards</b>	
The product components are highly toxic for aquatic life, may damage unborn child and are suspected of damaging fertility. Do not allow the product to enter the sewage systems, water systems and/or soil.	
<b>14.6 Special precautions for user</b>	
Packaging method and package labeling as well as the labeling of the means of transport of explosives of class 1.1B, subject to regulations appropriate for specific mean of transport (ADR/ RID, IMDG, IATA/ ICAO).	
<b>14.7 Transport in bulk according to Annex II of Marpol and the IBC Code</b>	
Not applicable.	
<b>SECTION 15: REGULATORY INFORMATION</b>	
<b>15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture</b>	
EU Regulations	<p>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), establishing a European Chemicals Agency, amending Directive 1999/45/EC and repealing Council Regulation (EEC) No 793/93 and Commission Regulation (EC) No 1488/94 as well as Council Directive 76/769/EEC and Commission Directives 91/155/EEC, 93/67/EEC, 93/105/EC and 2000/21/EC, as amended.</p> <p>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.</p>
Authorizations	<p>Certificate No 1453.EXP.05.0066</p> <p>Certificate of granting an ID number for explosives for civil use:</p> <p>MW-PL-89/05-P</p>



	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	17 z 20

Restrictions on use	Arrising from (EC) No 1907/2006 (REACH).
Other international regulations	<p>Council Directive 93/15/EEC of 5 April 1993 on the harmonization of the provisions relating to the placing on the market and supervision of explosives for civil uses</p> <p>Directive 2012/18/EU of the European Parliament and of the Council of 4 July 2012 on the control of major-accident hazards involving dangerous substances, amending and subsequently</p>
Other international regulations	<p>repealing Council Directive 96/82/EC Text with EEA relevance.</p> <p>European Agreement concerning the International Carriage of Dangerous Goods by Road (ADR).</p>
Local/ national regulations:	Depends on the country/ local legislation.
Professional limitations:	Depends on the country/ local legislation.

## 15.2 Chemical safety assessment

Chemical safety assessment for mixture is not needed.

## SECTION 16: OTHER INFORMATION

### 16.1 Changes from the previous version of the SDS

- Version 1.0:
  - First version;

### 16.2 Abbreviations and acronyms

#### 16.2.1 H-phrases

H200	Unstable explosive.
H201	Explosive; mass explosion hazard
H302	Harmful if swallowed.
H332	Harmful if inhaled.
H360Df	May damage the unborn child. Suspected of damaging fertility.
H373	May cause damage to organs through prolonged or repeated exposure.
H400	Very toxic to aquatic life.

	SAFETY DATA SHEET	Version:	1
	<b>BLASTING CAP No. 8</b>	Updated on:	-
		Page:	18 z 20

H410	Toxic to aquatic life with long-lasting effects.
<b>16.2.2 P-phrases</b>	
P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P210	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P270	Do not eat, drink or smoke when using this product.
P311	Call a POISON CENTER/ doctor/...
P372	Explosion risk in case of fire.
P373	DO NOT fight fire when fire reaches explosives.
P309+311	In case of exposure of malaise: contact poison center or doctor.
P304+340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P302+352	IF ON SKIN: Wash with plenty of water or water with soap.
P370+380	In case of fire: Evacuate area.
P305+351+338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do - continue rinsing.
P301+330+331	IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
P370+380+375	In case of fire: Evacuate area. Fight fire remotely due to the risk of explosion.
P401	Store ...
P501	Dispose of contents/container to ...
<b>16.2.3 Other</b>	
TLV-TWA	Threshold limit value - Time weighted average
TLV-STEL	Threshold limit value - Short-term exposure limit
TLV-C	Threshold limit value - Ceiling limit
DNEL	Derived no-effect level.



## SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 19 z 20

PNEC	Predicted No Effect Concentration.
LD <sub>50</sub>	Median lethal dose.
EC <sub>50</sub>	half maximal effective concentration.
EC number	EINECS number
CAS	Unique numerical identifier assigned by Chemical Abstracts Service to every chemical substance.
CMR	Carcinogenic, Mutagenic or Toxic for Reproduction
Unst. Expl.	Unstable explosive.
Expl. 1.1	Explosive material. Mass explosion hazard.
Acute Tox. 4	Acute toxicity, cat 4.
Repr. 1A	Reprotoxic, cat 1A
Aquatic Acute 1	Acute toxicity for aquatic life, cat. 1
Aquatic Chronic 1	Chronic toxicity for aquatic life, cat. 1

**16.3 Literature and data sources**

- SDS of raw materials, practical knowledge and experience. All the provided data is related to the product in the form in which it is used.
- GESTIS and ECOTOX databases;

**16.4. The procedure used for the mixture classification in accordance with Regulation (EC) No. 1272/2008**

Expl. 1.1 H201	Weight of evidence.
STOT RE 2 H373	Computational method.
Repr. 1A H360f	Computational method.
Aquatic Acute 1 H400	Computational method.
Aquatic Chronic 1 H411	Computational method.

**16.5 Training**

Personnel involved in handling the mixture should be trained in handling, safety and work hygiene while working with the product.



SAFETY DATA SHEET

Version: 1

**BLASTING CAP No. 8**

Updated on: -

Page: 20 z 20

**16.6 Closing remarks**

All information and data included in this Safety Data Sheet were prepared on the basis of the abovementioned documents, reference documentation, our knowledge and experience. Information and data included should be interpreted as safety issues description and must not be interpreted as parameters guaranteed by the manufacturer. The User is solely responsible for ensuring safe storage and safe conditions while using the product. This Safety Data Sheet only refers to intended and recommended uses of the product. The User is solely liable for the result of any improper handling and/or use of the product.