

SAFETY DATA SHEET according to Regulation (EC) No. 1907/2006**MAGNESIUM OXIDE FEED**

Version 2.0

Print Date 14.02.2024

Revision date / valid from 13.02.2024

SECTION 1: Identification of the substance/mixture and of the company/undertaking**1.1. Product identifier**

Trade name : MAGNESIUM OXIDE FEED
Substance name : Magnesium oxide
CAS-No. : 1309-48-4
EC-No. : 215-171-9
REACH Status : Substance is exempted from registration obligations according to Article 2 (7) (b) (Annex V) of the Regulation (EC) No 1907/2006

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

Use of the Substance/Mixture : At this time we do not yet have information on identified uses. They will be included in this safety data sheet when available.
Uses advised against : At this moment we have not identified any uses advised against

1.3. Details of the supplier of the safety data sheet

Company : Brenntag N.V.
Nijverheidslaan 38
BE 8540 Deerlijk
Telephone : +32 (0)56 77 6944
Telefax : +32 (0)56 77 5711
E-mail address : info@brenntag.be
Responsible/issuing person : Master Data Administration

Company : Brenntag Nederland B.V.
Donker Duyvisweg 44
NL 3316 BM Dordrecht
Telephone : +31 (0)78 65 44 944
Telefax : +31 (0)78 65 44 919
E-mail address : info@brenntag.nl
Responsible/issuing person : Master Data Administration

1.4. Emergency telephone number

Emergency telephone number : Belgium: Antipoison Center - Brussels TEL: +32(0)70 245 245
Netherlands: National Poisoning Information Center - Bilthoven
TEL: +31(0) 88 755 8000 (Only for the purpose of informing

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medical personnel in cases of acute intoxications)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008

The product is not classified as dangerous according to Regulation (EC) No. 1272/2008.

Most important adverse effects

- Human Health : See section 11 for toxicological information.
- Physical and chemical hazards : See section 9/10 for physicochemical information.
- Potential environmental effects : See section 12 for environmental information.

2.2. Label elements

Labelling according to Regulation (EC) No 1272/2008

The product is not labeled as dangerous according to Regulation (EC) No. 1272/2008.

Additional Labelling:

Handle in accordance with good industrial hygiene and safety practice.

2.3. Other hazards

The PBT or vPvB criteria of Annex XIII to the REACH Regulation does not apply to inorganic substances.

Ecological information: No information available about endocrine disruption properties for environment.

Toxicological information: No information available about endocrine disruption properties for human health.

SECTION 3: Composition/information on ingredients

3.1. Substances

Remarks : No dangerous ingredients according to Regulation (EC) No. 1907/2006

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Non-hazardous component

Chemical name	Identification Number	Amount [%]
Magnesium oxide	CAS-No. : 1309-48-4 EC-No. : 215-171-9	<= 100

SECTION 4: First aid measures

4.1. Description of first aid measures

- General advice : Move out of dangerous area. If symptoms call a physician.
- If inhaled : Remove to fresh air. If symptoms persist, call a physician.
- In case of skin contact : Wash off with soap and water. If skin irritation persists, call a physician.
- In case of eye contact : Rinse thoroughly with plenty of water, also under the eyelids. If eye irritation persists, consult a specialist.
- If swallowed : Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Do NOT induce vomiting. If symptoms persist, call a physician.

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

- Symptoms : See Section 11 for more detailed information on health effects and symptoms.
- Effects : Health injuries are not known or expected under normal use. Dust in the eyes may cause mechanical irritation. See Section 11 for more detailed information on health effects and symptoms.

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

- Treatment : Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

- Suitable extinguishing media : The product itself does not burn. Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
- Unsuitable extinguishing media : High volume water jet

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5.2. Special hazards arising from the substance or mixture

- Specific hazards during firefighting : Reacts exothermically with water. In case of fire hazardous decomposition products may be produced such as:
Hazardous combustion products : Burning produces noxious and toxic fumes.

5.3. Advice for firefighters

- Special protective equipment for firefighters : In the event of fire, wear self-contained breathing apparatus. Choose protective equipment according to size of fire.
Further advice : Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

- Personal precautions : Use personal protective equipment. Ensure adequate ventilation. Avoid dust formation. Avoid contact with skin and eyes.

6.2. Environmental precautions

- Environmental precautions : Do not flush into surface water or sanitary sewer system. Avoid subsoil penetration. If the product contaminates rivers and lakes or drains inform respective authorities. If material reaches soil inform authorities responsible for such cases.

6.3. Methods and materials for containment and cleaning up

- Methods and materials for containment and cleaning up : Use mechanical handling equipment. Keep in suitable, closed containers for disposal.
Further information : Treat recovered material as described in the section "Disposal considerations".

6.4. Reference to other sections

- See Section 1 for emergency contact information.
See Section 8 for information on personal protective equipment.
See Section 13 for waste treatment information.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Advice on safe handling : Keep container tightly closed. Ensure adequate ventilation. Avoid dust formation. Avoid breathing fume. Handle in accordance with good industrial hygiene and safety practice.

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Hygiene measures : Keep away from food, drink and animal feedingstuffs. Smoking, eating and drinking should be prohibited in the application area. Wash hands before breaks and at the end of workday. Take off all contaminated clothing immediately.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage areas and containers : Store in original container.

Advice on protection against fire and explosion : The product is not flammable. Normal measures for preventive fire protection.

Further information on storage conditions : Keep tightly closed in a dry and cool place.

Advice on common storage : Keep away from food, drink and animal feedingstuffs. Do not store near acids.

7.3. Specific end use(s)

Specific use(s) : No information available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Contains no substances with occupational exposure limit values.

Component:	Magnesium oxide	CAS-No. 1309-48-4
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Other Occupational Exposure Limit Values

||| Belgium. OELs. Exposure Limit Values to Chemical Substances at Work, Code of Well-being at work, Book VI, Title 1, as amended, Time Weighted Average (TWA):, Fumes
10 mg/m³

8.2. Exposure controls

Appropriate engineering controls

Refer to protective measures listed in sections 7 and 8.

Personal protective equipment

Respiratory protection

Advice : Required, if exposure limit is exceeded (e.g. OEL).
Required if dust is released
Respiratory protection complying with EN 141.
Recommended Filter type:
Particle filter:P2

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Hand protection

Advice : Wear suitable gloves.
Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. Also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion, and the contact time.
Protective gloves should be replaced at first signs of wear.

Material : Acrylonitrile-butadiene rubber (NBR)
Break through time : > 480 min
Glove thickness : $\geq 0,11$ mm

Eye protection

Advice : Safety goggles

Skin and body protection

Advice : Protective work clothing

Environmental exposure controls

General advice : Do not flush into surface water or sanitary sewer system.
Avoid subsoil penetration.
If the product contaminates rivers and lakes or drains inform respective authorities.
If material reaches soil inform authorities responsible for such cases.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Form : powder

Physical state : solid

Colour : white

Odour : odourless

Odour Threshold : Not applicable

Melting point/range : ca. 2.800 °C

Boiling point/boiling range : 3.600 °C

Flammability (solid, gas) : does not ignite

Upper explosion limit / Upper flammability limit : Not applicable

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Lower explosion limit / Lower flammability limit	:	Not applicable
Flash point	:	Not applicable
Auto-ignition temperature	:	No data available
Decomposition temperature	:	No data available
Self-Accelerating decomposition temperature (SADT)	:	No data available
pH	:	10,3 (20 °C)
Viscosity		
Viscosity, dynamic	:	Not applicable
Viscosity, kinematic	:	Not applicable
Flow time	:	No data available
Solubility(ies)		
Water solubility	:	insoluble
Solubility in other solvents	:	No data available
Dissolution Rate	:	No data available
Partition coefficient: n-octanol/water	:	No data available
Dispersion Stability	:	No data available
Vapour pressure	:	Not applicable
Relative density	:	No data available
Density	:	3,58 g/cm ³ (25 °C)
Bulk density	:	No data available
Relative vapour density	:	No data available
Particle characteristics		
No data available		

9.2 Other information

Explosives	:	Product is not explosive.
Evaporation rate	:	Not applicable

SECTION 10: Stability and reactivity

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10.1. Reactivity

Advice : No decomposition if stored and applied as directed.

10.2. Chemical stability

Advice : Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

Hazardous reactions : Reacts exothermically with water. May react with strong reducing agents under heat (powdered aluminium, potassium metal etc.).

10.4. Conditions to avoid

Conditions to avoid : humid air and water
Heat
Thermal decomposition : No data available

10.5. Incompatible materials

Materials to avoid : ammonia, Strong acids, Chlorine trifluoride, Phosphorus pentachloride

10.6. Hazardous decomposition products

Hazardous decomposition products : Fire may cause evolution of: toxic metal oxide fume products

SECTION 11: Toxicological information

11.1. Information on the hazard classes within the meaning of Regulation (EC) No. 1272/2008

Component:	Magnesium oxide	CAS-No. 1309-48-4
Acute toxicity		
Oral		
LDLo	: 5000 mg/kg (Mouse)	
LDLo	: 3000 mg/kg (Rabbit)	
Inhalation		
Inhalation of dust or fume may cause temporary irritation of upper respiratory tract, skin, nose and eyes.		
Dermal		
No data available		
Irritation		

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Skin

Result : Contact with dust can cause mechanical irritation or drying of the skin.

Eyes

Result : Dust in the eyes may cause mechanical irritation.

Sensitisation

Result : No data available

CMR effects

CMR Properties

Carcinogenicity : Not classified
 Mutagenicity : It is not considered mutagenic.
 Teratogenicity : No data available
 Reproductive toxicity : No data available

Specific Target Organ Toxicity

Single exposure

Remarks : No data available

Repeated exposure

Remarks : No data available

Other toxic properties

Aspiration hazard

No data available,

11.2. Information on other hazards

Data for the product

Endocrine disrupting properties

Assessment : No information available about endocrine disruption properties for human health.

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SECTION 12: Ecological information

12.1. Toxicity

Component:	Magnesium oxide	CAS-No. 1309-48-4
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Acute toxicity

Fish

: No data available

Toxicity to daphnia and other aquatic invertebrates

: No data available

algae

: No data available

12.2. Persistence and degradability

Component:	Magnesium oxide	CAS-No. 1309-48-4
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Persistence and degradability

Persistence

Result : No data available

Biodegradability

Result : The methods for determining the biological degradability are not applicable to inorganic substances.

12.3. Bioaccumulative potential

Component:	Magnesium oxide	CAS-No. 1309-48-4
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Bioaccumulation

Result : Bioaccumulation is not expected.

12.4. Mobility in soil

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Component:	Magnesium oxide	CAS-No. 1309-48-4
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Mobility

: No data available

12.5. Results of PBT and vPvB assessment

Data for the product

Results of PBT and vPvB assessment

Result : The PBT or vPvB criteria of Annex XIII to the REACH Regulation does not apply to inorganic substances.

Component:	Magnesium oxide	CAS-No. 1309-48-4
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Results of PBT and vPvB assessment

Result : The PBT or vPvB criteria of Annex XIII to the REACH Regulation does not apply to inorganic substances.

12.6. Endocrine disrupting properties

Data for the product

Endocrine disrupting potential : No information available about endocrine disruption properties for environment.

12.7. Other adverse effects

Data for the product

Additional ecological information

Result : Do not flush into surface water or sanitary sewer system. Avoid subsoil penetration.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Product : Disposal together with normal waste is not allowed. Special disposal required according to local regulations. Do not let product enter drains. Contact waste disposal services. This product shall be disposed of or recovered in compliance with Directive 2008/98/EC on waste as lastly amended.

Contaminated packaging : Empty contaminated packagings thoroughly. They can be recycled after thorough and proper cleaning. If recycling is not practicable, dispose of in compliance with local regulations.

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European Waste Catalogue Number : No waste code according to the European Waste Catalogue can be assigned for this product, as the intended use dictates the assignment. The waste code is established in consultation with the regional waste disposer.

SECTION 14: Transport information

Not dangerous goods for ADR, RID, IMDG and IATA.

14.1. UN number or ID number

Not applicable.

14.2. UN proper shipping name

Not applicable.

14.3. Transport hazard class(es)

Not applicable.

14.4. Packaging group

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 for product as supplied.

SECTION 15: Regulatory information

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

Component:	Magnesium oxide	CAS-No. 1309-48-4
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EU. Chemicals Subject to PIC Procedure: Regulation 649/2012/EU on export and import of dangerous chemicals, as amended : ; Not listed

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EU. REACH, Annex XVII, : ; Not listed
Marketing and Use
Restrictions (Regulation
1907/2006/EC)

EU. Directive : ; The substance/mixture does not fall under this legislation.
2012/18/EU (SEVESO
III) on major accident
hazards involving
dangerous substances,
Annex I

Notification status Magnesium oxide:

Regulatory List	Notification	Notification number
EINECS	YES	215-171-9
DSL	YES	
KECI (KR)	YES	KE-22728
ENCS (JP)	YES	(1)-465
ISHL (JP)	YES	(1)-465
NZIOC	YES	
INSQ	YES	
ONT INV	YES	
IECSC	YES	
TCSI	YES	
PICCS (PH)	YES	
TSCA	YES	
PHARM (JP)	YES	
VN INVL	YES	
TH INV	YES	2519.90
TH INV	YES	55-1-01345
TH INV	YES	3824.90
AU AIICL	YES	

15.2. Chemical safety assessment

A Chemical Safety Assessment according to Regulation No. 1907/2006 (Reach) is not required for this substance.

SECTION 16: Other information

Abbreviations and Acronyms

AU AIICL

Australia. Industrial Chemicals Act (AIIC) List

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BCF	bioconcentration factor
BOD	biochemical oxygen demand
CAS	Chemical Abstracts Service
CLP	Classification, Labelling and Packaging
CMR	carcinogenic, mutagenic or toxic to reproduction
COD	chemical oxygen demand
DNEL	derived no-effect level
DSL	Canada. Environmental Protection Act, Domestic Substances List
EINECS	European Inventory of Existing Commercial Chemical Substances
ELINCS	European List of Notified Chemical Substances
ENCS (JP)	Japan. Kashin-Hou Law List
GHS	Globally Harmonized System of Classification and Labelling of Chemicals
IECSC	China. Inventory of Existing Chemical Substances
INSQ	Mexico. National Inventory of Chemical Substances
ISHL (JP)	Japan. Inventory of Industrial Safety & Health
KECI (KR)	Korea. Existing Chemicals Inventory
LC50	median lethal concentration
LOAEC	lowest observed adverse effect concentration
LOAEL	lowest observed adverse effect level
LOEL	lowest observed effect level
NDSL	Canada. Environmental Protection Act. Non-Domestic Substances List
NLP	no-longer polymer
NOAEC	no observed adverse effect concentration
NOAEL	no observed adverse effect level
NOEC	no observed effect concentration
NOEL	no observed effect level
NZIOC	New Zealand. Inventory of Chemicals
OECD	Organisation for Economic Cooperation and Development
OEL	occupational exposure limit
ONT INV	Canada. Ontario Inventory List
PBT	persistent, bioaccumulative and toxic
PHARM (JP)	Japan. Pharmacopoeia Listing
PICCS (PH)	Philippines. Inventory of Chemicals and Chemical Substances
PNEC	predicted no-effect concentration
REACH Auth. No.:	REACH Authorisation Number
REACH AuthAppC. No.	REACH Authorisation Application Consultation Number
UK REACH Auth. No.:	UK REACH Authorisation Number
UK REACH AuthAppC. No.	UK REACH Authorisation Application Consultation Number
UK REACH-Reg.No	UK REACH Registration Number

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STOT	specific target organ toxicity
SVHC	substance of very high concern
TCSI	Taiwan. Existing Chemicals Inventory
TH INV	Thailand. Existing Chemicals Inventory from FDA
TSCA	US. Toxic Substances Control Act
UVCB	substance of unknown or variable composition, complex reaction products or biological materials
VN INVL	Vietnam. National Chemical Inventory
vPvB	very persistent and very bioaccumulative

Further information

Key literature references and sources for data	:	Supplier information and data from the "Database of registered substances" of the European Chemicals Agency (ECHA) were used to create this safety data sheet.
Methods used for product classification	:	The classification for human health, physical and chemical hazards and environmental hazards were derived from a combination of calculation methods and if available test data.
Hints for trainings	:	The workers have to be trained regularly on the safe handling of the products based on the information provided in the Safety Data Sheet and the local conditions of the workplace. National regulations for the training of workers in the handling of hazardous materials must be adhered to.
Other information	:	<p>The information provided in this Safety Data Sheet is correct to our knowledge at the date of its revision. The information given only describes the products with regard to safety arrangements and is not to be considered as a warranty or quality specification and does not constitute a legal relationship.</p> <p>The information contained in this Safety Data Sheet relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text.</p>

|| Indicates updated section.