

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 1

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

### 1. Identification of the Substance/Mixture and of the Company/Undertaking

#### 1.1. Product Identifier

*Product Name:* Magnetite, coarse

*Article No.:* 48806

#### 1.2. Relevant identified Uses of the Substance or Mixture and Uses advised against

*Identified uses:*

*Technical application*

*Uses advised against:*

#### 1.3. Details of the Supplier of the Safety Data Sheet (Producer/Importer)

*Company:* Kremer Pigmente GmbH & Co. KG

*Address:* Hauptstr. 41-47, 88317 Aichstetten, Germany

*Tel./Fax.:* Tel +49 7565 914480, Fax +49 7565 1606

*Internet:* www.kremer-pigmente.de

*E-Mail:* info@kremer-pigmente.de

*Importer:* --

#### 1.4. Emergency No.

*Emergency No.:* +49 7565 914480 (Mon-Fri 8:00 - 17:00)

### 2. Hazards Identification

#### 2.1. Classification of the Substance or Mixture

*Classification according to Regulation (EC) No. 1272/2008 (CLP/GHS)*

*This product does not require classification and labelling as hazardous according to CLP/GHS.*

*Classification according to Directive No. 67/548/EC or No. 1999/45/EC*

*The material is not subject to classification according to EC lists.*

*Safety Phrases:*

*Possible Environmental Effects:*

#### 2.2. Label Elements

*Classification according to Regulation (EC) No. 1272/2008 (CLP/GHS)*

*Hazard designation:*

*Signal word:*

*Hazard designation:*

*Safety designation:*

*Hazardous components for labelling:*

#### 2.3. Other Hazards

*After eye contact: can cause slight irritation.*

*After skin contact: can cause slight irritation.*

*After skin contact: long-term contact can cause irritation.*

next page: 2

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 2

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

### 3. Composition/Information on Ingredients

#### 3.1. Substance

#### 3.2. Mixture

*Chemical Characterization:* Natural iron oxide, Magnetite, Fe<sub>3</sub>O<sub>4</sub>

*Information on Components / Hazardous Ingredients:*

Triiron tetraoxide (Fe <sub>3</sub> O <sub>4</sub> ), Pigment Black 11.77499; REACH Reg. No. 01-2119457646-28- 0008	88 - 99.2 %	CAS-Nr: 1317-61-9 EINECS-Nr: 215-277-5 EC-Nr:
---	-------------	---

Rock-forming minerals	0.8 - 12 %	CAS-Nr: 999999-99-4 EINECS-Nr: 310-127-6 EC-Nr:
-----------------------	------------	---

*Additional information:*

*Exempted from the mandatory REACH Registration (Annex V No. 7)*

### 4. First Aid Measures

#### 4.1. Description of the First Aid Measures

*General information:*

*Seek medical attention in case of complaints.*

*After inhalation:*

*Supply fresh air.*

*After skin contact:*

*Wash off with plenty of water and soap. Consult a physician if irritation persists.*

*After eye contact:*

*Rinse open eyes with plenty of water for at least 15 minutes.  
Consult physician.  
Remove contact lens.*

*After ingestion:*

*After swallowing larger amount of product give plenty of water to drink and rinse mouth thoroughly with water.  
If symptoms persist consult physician.*

#### 4.2. Most important Symptoms and Effects, both Acute and Delayed

*Symptoms:*

*No further information available.*

*Effects:*

#### 4.3. Indication of any Immediate Medical Attention and special Treatment needed

*Treatment:*

*No further information available.*

### 5. Fire-Fighting Measures

#### 5.1. Extinguishing Media

next page: 3

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 3

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

*Suitable extinguishing media:*

*Product itself does not burn.  
All extinguishing agents suitable.*

*Unsuitable extinguishing media:*

### 5.2. Special Hazards arising from the Substance or Mixture

*Special hazards:*

*Product is not flammable.*

### 5.3. Advice for Firefighters

*Protective equipment:*

*Wear self-contained respiratory protective device and full protective gear.*

*Further information:*

---

## 6. Accidental Release Measures

### 6.1. Personal Precautions, Protective Equipment and Emergency Procedures

*Personal precautions:*

*Wear appropriate protective equipment. Keep spectators away.  
Do not inhale dust.  
Avoid contact with skin.*

### 6.2. Environmental Precautions

*Environmental precautions:*

*Prevent contamination of soil, drains and surface waters.*

### 6.3. Methods and Material for Containment and Cleaning Up

*Methods and material:*

*Take up mechanically and collect in suitable containers for disposal. Avoid dust formation.*

### 6.4. Reference to other Sections

*Dispose of contaminated material according to Section 13.*

---

## 7. Handling and Storage

### 7.1. Precautions for Safe Handling

*Instructions on safe handling:*

*Provide good ventilation and/or exhaust at the workplace. Ensure adequate ventilation. Handle and open container with care.*

*Hygienic measures:*

### 7.2. Conditions for Safe Storage, including any Incompatibilities

*Storage conditions:*

*Store in tightly sealed containers in a dry room.  
Protect against heat, ignition sources and direct sunlight.*

*Requirements for storage areas and containers:*

*Keep container tightly closed.  
Close open containers with care to avoid quality impairments by humidity.*

next page: 4

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 4

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

*Information on fire and explosion protection:*

*Take measures to prevent electrostatic discharge.*

*Avoid dust formation.*

*Do not store together with inflammable products, sparks and open flames.*

*Storage class (VCI):*

*13; Non combustible solids*

*Further Information:*

### 7.3. Specific End Use(s)

*Further information:*

## 8. Exposure Controls/Personal Protection

### 8.1. Parameters to be Controlled

*Parameters to be controlled (DE):*

*Iron(II,III) oxide (CAS 1317-61-9):*

*3 mg/m<sup>3</sup> (OEC; inhalable fraction, long-term exposure)*

*10 mg/m<sup>3</sup> (OEC; inhalable fraction, short-term exposure)*

*Parameters to be controlled:*

*Derived No-Effect Level (DNEL):*

*Iron(II,III)-oxide (CAS 1317-62-9):*

*10 mg/m<sup>3</sup> (worker, inhalation, long-term exposition - local effects)*

*3 mg/m<sup>3</sup> (worker, inhalation, long-term exposition - local effects)*

*Rock-forming minerals: 10 mg/m<sup>3</sup> (worker, inhalation, long-term exposition - local effects)*

*Predicted No-Effect Concentration (PNEC):*

*Additional Information:*

### 8.2. Exposure Controls

*Technical protective measures:*

*Use appropriate local exhaust ventilation to control airborne levels.*

*Personal Protection*

*General protective measures:*

*Avoid contact with skin.*

*Do not inhale dust. Do not eat, drink or smoke while working.*

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

*Respiratory protection:*

*A respiratory protection program meeting OSHA 1910.134 and ANSI Z88.2 requirements must be followed whenever workplace conditions warrant a respirator's use.*

*Hand protection:*

*Protective gloves (EN 374)*

*Protective glove material:*

*Eye protection:*

next page: 5

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 5

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

*Safety glasses with protective shields (EN 166).*

*Body protection:*

*Environmental precautions:*

---

### 9. Physical and Chemical Properties

#### 9.1. Information on Basic Physical and Chemical Properties

<i>Form:</i>	<i>powder</i>
<i>Color:</i>	<i>black metallic</i>
<i>Odor:</i>	<i>odorless</i>
<i>Odor threshold:</i>	
<i>pH-Value:</i>	<i>6 - 8 (50 g/l H<sub>2</sub>O)</i>
<i>Melting temperature:</i>	<i>&gt; 1500°C</i>
<i>Boiling temperature:</i>	<i>not applicable</i>
<i>Flash point:</i>	<i>not combustible</i>
<i>Evaporation rate:</i>	<i>not applicable</i>
<i>Flammability (solid, gas):</i>	<i>non-combustible</i>
<i>Upper explosion limit:</i>	<i>no information available</i>
<i>Lower explosion limit:</i>	<i>no information available</i>
<i>Vapor pressure:</i>	<i>not applicable</i>
<i>Vapor density:</i>	
<i>Density:</i>	<i>5.2 g/cm<sup>3</sup></i>
<i>Solubility in water:</i>	<i>insoluble</i>
<i>Coefficient of variation (n-Octanol/Water):</i>	<i>not applicable</i>
<i>Auto-ignition temperature:</i>	<i>not applicable</i>
<i>Decomposition temperature:</i>	<i>not applicable</i>
<i>Viscosity, dynamic:</i>	<i>not applicable</i>
<i>Explosive properties:</i>	<i>Product does not present an explosion hazard.</i>

next page: 6

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 6

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

*Oxidizing properties:*

*not oxidizing*

*Bulk density:*

*2.5 - 3.5 g/cm<sup>3</sup>*

### 9.2. Further Information

*Solubility in solvents:*

*Soluble in strong acids.*

*Viscosity, kinematic*

*Burning class:*

*Solvent content:*

*Solid content:*

*Particle size:*

*Other information:*

---

## 10. Stability and Reactivity

### 10.1. Reactivity

*Oxidation to Fe<sub>2</sub>O<sub>3</sub>. The reaction is exothermic.*

### 10.2. Chemical Stability

*Stable if used according to specifications.*

### 10.3. Possibility of Hazardous Reactions

*No information available.*

### 10.4. Conditions to Avoid

*Conditions to avoid:*

*Thermal decomposition:*

*Product is instable above 300°C and can then oxidize causing additional heat. Do not store near sources of heat.*

### 10.5. Incompatible Materials

*No information available.*

### 10.6. Hazardous Decomposition Products

*None if stored and handled according to specifications.*

### 10.7. Further Information

---

## 11. Toxicological Information

### 11.1. Information on Toxicological Effects

*No information available.*

*Acute Toxicity*

*LD<sub>50</sub>, oral:*

*> 5000 mg/kg (rat)*

*LD<sub>50</sub>, dermal:*

*No information available.*

*LC<sub>50</sub>, inhalation:*

*No information available.*

*Primary effects*

next page: 7

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 7

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

*Irritant effect on skin:*

*Non irritating*

*Irritant effect on eyes:*

*Non-irritating to eyes  
Particles can cause mechanical irritation.*

*Inhalation:*

*No irritant effect known.*

*Ingestion:*

*No irritant effect known.*

*Sensitization:*

*Non sensitizing (guinea pig; OECD 406).*

*Mutagenicity:*

*Not mutagenic (Ames Test; Salmonella typhimurium: negative)*

*Reproductive toxicity:*

*No relevant data found.*

*Carcinogenicity:*

*Iron oxides are currently determined as non-cancerogenic substances according to IARC (International Agency for Research on Cancer). Magnetite, Fe<sub>3</sub>O<sub>4</sub>, is not listed in the IARC Monograph, Vol. 1-102.*

*Teratogenicity:*

*No information available.*

*Specific target organ toxicity (STOT):*

*No relevant data found.*

*Additional toxicological information:*

---

## 12. Ecological Information

### 12.1. Aquatic Toxicity

*Fish toxicity:*

*LC0: > 10000 mg/l (96h, Danio rerio)*

*Daphnia toxicity:*

*EC0: > 10000 mg/l (48h, Daphnia magna)*

*Bacteria toxicity:*

*EC50: > 1000 mg/l (Pseudomonas fluorescens)*

*Algae toxicity:*

*No information available.*

### 12.2. Persistency and Degradability

*Very insoluble product and can thus be removed from water mechanically in suitable effluent treatment plants.*

### 12.3. Bioaccumulation

*No bioaccumulation.*

### 12.4. Mobility

*No information available.*

next page: 8

# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 8

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

### 12. 5. Results of PBT- und vPvP Assessment

*This product is neither a PBT or vPvB substance nor does it contain a PBT or vPvB substance.*

### 12. 6. Other Adverse Effects

*Water hazard class:*

*Not hazardous.*

*Behaviour in sewage systems:*

*Further ecological effects:*

*No special effects or hazards known.*

*AOX Value:*

---

## 13. Disposal Considerations

### 13. 1. Waste Treatment Methods

*Product:*

*If possible reuse product.*

*Product can be taken to a waste disposal site according to local regulations.*

*European Waste Code (EWC):*

*Uncleaned packaging:*

*Uncontaminated packaging may be recycled. Completely empty packaging can be disposed of with the regular waste.*

*Waste Code No.:*

---

## 14. Transport Information

### 14. 1. UN Number

*ADR, IMDG, IATA*

### 14. 2. UN Proper Shipping Name

*ADR/RID:*

*No hazardous goods according to ADR (land transportation).*

*IMDG/IATA:*

*No hazardous goods according to IMDG.*

### 14. 3. Transport Hazard Classes

*ADR Class:*

*not applicable*

*Hazard no.:*

*Classification code:*

*Tunnel restriction code:*

*IMDG Class (sea):*

*Hazard no.:*

*EmS No.:*

*IATA Class:*

*not applicable*

next page: 9



# Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)



## 48806 Magnetite, coarse

Page 9

Revised edition: 01.07.2017

Version: 9

Printed: 24.08.2018

---

*Hazard no.:*

### 14. 4. Packaging Group

*ADR/RID:*

*not applicable*

*IMDG:*

*IATA:*

### 14. 5. Environmental Hazards

*Not classified as environmentally hazardous.*

### 14. 6. Special Precautions for User

*Not classified as a dangerous good under transport regulations.*

### 14. 7. Transportation in Bulk according to Annex II of MARPOL 73/78 and IBC-Code

*not applicable*

### 14. 8. Further Information

---

## 15. Regulatory Information

### 15. 1. Safety, Health and Environmental Regulations/Legislation specific for the Substance or Mixture

*Water hazard class:*

*0, not hazardous (German Regulation, Assessment by list)*

*Local regulations on chemical accidents:*

*Employment restrictions:*

*Restriction and prohibition of application:*

*Technical instructions on air quality:*

### 15. 2. Chemical Safety Assessment

*Exempted from the mandatory REACH Registration (Annex V No. 7)*

*EC SVHC-List: This product does not contain a substance in the candidate list for substances of very high concern (REACH Regulation (EC) 1907/2006, Article 57)*

### 15. 3. Further Information

*Regulation (EC) 2037/2000 - Substances that Deplete the Ozone Layer: not regulated / not applicable*

*RoHS Compliance: The products comply to the RoHS Directive 2002/95/EC and does not contain any Cr(VI).*

*Listed in the following inventories:*

*EINECS (EU), TSCA (US), AICS (AUS), DSL/NDL (CA), ENCS (JP), KECI (KR), NZIoC (NZ), PICCS (PH), TCSI (TW), INSQ (MX), Swiss Code (G-8310)*

---

## 16. Other Information

*This product should be stored, handled and used in accordance with good hygiene practices and in conformity with any legal regulations. This information contained herein is based on the present state of knowledge and is intended to describe our product from the point of view of safety requirements. It should be therefore not be construed as guaranteeing specific properties.*