



**CE Elantech, Inc.**

## **SAFETY DATA SHEET**

According to Regulation (EC) No. 1907/2006

Version 1.1 Revision Date 27.06.2014

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GENERIC EU MSDS - NO COUNTRY SPECIFIC DATA - NO OEL DATA

### **SECTION 1: Identification of the substance/mixture and of the company/undertaking**

#### **1.1 Product identifiers**

Product name : Cobaltous/ic Oxide

Product number : 338-228-00

REACH No. : A registration number is not available for this substance as the substance or its uses are exempted from registration, the annual tonnage does not require a registration or the registration is envisaged for a later registration deadline.

CAS-No. : 1308-06-1

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

Identified uses : Laboratory chemicals, Manufacture of substances

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

Company : CE Elantech, Inc.  
170 Oberlin Avenue North  
Suite 5  
Lakewood, NJ 08701 USA

Telephone : 732-370-5559

Fax : 732-370-3888

E-mail : [sales@ceelantech.com](mailto:sales@ceelantech.com)

Internet : [www.ceelantech.com](http://www.ceelantech.com)

#### **1.4 Emergency telephone number**

Emergency Phone # : 911

### **SECTION 2: Hazards identification**

#### **2.1 Classification of the substance or mixture**

##### **Classification according to Regulation (EC) No 1272/2008**

Respiratory sensitisation (Category 1), H334

Carcinogenicity, Inhalation (Category 1A), H350i

For the full text of the H-Statements mentioned in this Section, see Section 16.

##### **Classification according to EU Directives 67/548/EEC or 1999/45/EC**

T Toxic R49

Xi Irritant R42

For the full text of the R-phrases mentioned in this Section, see Section 16.

#### **2.2 Label elements**

##### **Labelling according Regulation (EC) No 1272/2008**

Pictogram



Signal word	Danger
Hazard statement(s)	
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H350i	May cause cancer by inhalation.
Precautionary statement(s)	
P201	Obtain special instructions before use.
P261	Avoid breathing dust.
P308 + P313	IF exposed or concerned: Get medical advice/ attention.
Supplemental Hazard Statements	none
Restricted to professional users.	

### 2.3 Other hazards - none

## SECTION 3: Composition/information on ingredients

### 3.1 Substances

Formula	: Co3O4
Molecular Weight	: 240,8 g/mol
CAS-No.	: 1308-06-1
EC-No.	: 215-157-2

#### Hazardous ingredients according to Regulation (EC) No 1272/2008

Component	Classification	Concentration
<b>Tricobalt tetraoxide with Nickel Oxide impurity</b>		
CAS-No. EC-No.	1308-06-1 215-157-2	Resp. Sens. 1; Carc. 1A; H334, H350i
		<= 100 %

#### Hazardous ingredients according to Directive 1999/45/EC

Component	Classification	Concentration
<b>Tricobalt tetraoxide with Nickel Oxide impurity</b>		
CAS-No. EC-No.	1308-06-1 215-157-2	T, Carc.Cat.1, R49 - R42
		<= 100 %

For the full text of the H-Statements and R-Phrases mentioned in this Section, see Section 16

## SECTION 4: First aid measures

### 4.1 Description of first aid measures

#### General advice

Consult a physician. Show this safety data sheet to the doctor in attendance. **If inhaled**  
If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician. **In case of skin contact**

Wash off with soap and plenty of water. Consult a physician. **In case of eye contact**

Flush eyes with water as a precaution. **If swallowed**

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician. **4.2**

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

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

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

no data available

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## SECTION 5: Firefighting measures

### 5.1 Extinguishing media

#### Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.5.2

#### Special hazards

#### arising from the substance or mixture

Cobalt/cobalt oxides

### 5.3 Advice for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.5.4 Further information  
no data available

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## SECTION 6: Accidental release measures

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

Use personal protective equipment. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Evacuate personnel to safe areas. Avoid breathing dust.  
For personal protection see section 8.

### 6.2 Environmental precautions

Prevent further leakage or spillage if safe to do so. Do not let product enter drains.

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

Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.

### 6.4 Reference to other sections

For disposal see section 13.

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## SECTION 7: Handling and storage

### 7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Avoid exposure - obtain special instructions before use. Provide appropriate exhaust ventilation at places where dust is formed. For precautions see section 2.2.

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

Keep container tightly closed in a dry and well-ventilated place. Store in cool place. 7.3 Specific end use(s)

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

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## SECTION 8: Exposure controls/personal protection

### 8.1 Control parameters

#### Components with workplace control parameters

### 8.2 Exposure controls

#### Appropriate engineering controls

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

#### Personal protective equipment

##### Eye/face protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

##### Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

### **Body Protection**

Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

### **Respiratory protection**

Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type N100 (US) or type P3 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

### **Control of environmental exposure**

Prevent further leakage or spillage if safe to do so. Do not let product enter drains.

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## **SECTION 9: Physical and chemical properties**

### **9.1 Information on basic physical and chemical properties**

- |                                                 |                   |
|-------------------------------------------------|-------------------|
| a) Appearance                                   | Form: powder      |
| b) Odour                                        | no data available |
| c) Odour Threshold                              | no data available |
| d) pH                                           | no data available |
| e) Melting point/freezing point                 | no data available |
| f) Initial boiling point and boiling range      | no data available |
| g) Flash point                                  | not applicable    |
| h) Evaporation rate                             | no data available |
| i) Flammability (solid, gas)                    | no data available |
| j) Upper/lower flammability or explosive limits | no data available |
| k) Vapour pressure                              | no data available |
| l) Vapour density                               | no data available |
| m) Relative density                             | no data available |
| n) Water solubility                             | no data available |
| o) Partition coefficient: n-octanol/water       | no data available |
| p) Auto-ignition temperature                    | no data available |
| q) Decomposition temperature                    | no data available |
| r) Viscosity                                    | no data available |
| s) Explosive properties                         | no data available |
| t) Oxidizing properties                         | no data available |

### **9.2 Other safety information**

no data available

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## SECTION 10: Stability and reactivity

### 10.1 Reactivity

no data available

### 10.2 Chemical stability

Stable under recommended storage conditions.

### 10.3 Possibility of hazardous reactions

no data available

### 10.4 Conditions to avoid

no data available

### 10.5 Incompatible materials

Reducing agents **10.6 Hazardous decomposition products**

In the event of fire: see section 5

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## SECTION 11: Toxicological information

### 11.1 Information on toxicological effects

#### Acute toxicity

LD50 Oral - rat - > 5.000 mg/kg

Remarks: Nutritional and Gross Metabolic: Weight loss or decreased weight gain.

LC50 Inhalation - rat - 4 h - > 4830 ppm

LD50 Dermal - rat - > 2.000 mg/kg

LD50 Intraperitoneal - mouse - 1.890 mg/kg

#### Skin corrosion/irritation

Skin - rat

Result: No skin irritation

#### Serious eye damage/eye irritation

no data available

#### Respiratory or skin sensitisation

no data available

#### Germ cell mutagenicity

no data available

#### Carcinogenicity

May cause cancer by inhalation.

IARC: 2B - Group 2B: Possibly carcinogenic to humans (Tricobalt tetraoxide with Nickel Oxide impurity)

#### Reproductive toxicity

#### Specific target organ toxicity - single exposure

no data available

#### Specific target organ toxicity - repeated exposure

no data available

#### Aspiration hazard

no data available **Additional Information**

RTECS: GG2500000

Effects due to ingestion may include:., Burning pain in mouth, throat and stomach., Prolonged or repeated exposure may cause:., Fatigue, Cardiac irregularities, Convulsions, Vomiting

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## SECTION 12: Ecological information

### 12.1 Toxicity

Toxicity to fish

LC50 - Danio rerio (zebra fish) - > 136 mg/l - 96 h

- 12.2 Persistence and degradability**  
no data available
- 12.3 Bioaccumulative potential**  
no data available
- 12.4 Mobility in soil**  
no data available
- 12.5 Results of PBT and vPvB assessment**  
PBT/vPvB assessment not available as chemical safety assessment not required/not conducted
- 12.6 Other adverse effects**  
no data available

### SECTION 13: Disposal considerations

#### 13.1 Waste treatment methods

**Product**

Offer surplus and non-recyclable solutions to a licensed disposal company. Dissolve or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber.

**Contaminated packaging**

Dispose of as unused product.

### SECTION 14: Transport information

#### 14.1 UN number

ADR/RID:	IMDG:	IATA:
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#### 14.2 UN proper shipping name

ADR/RID:	Not dangerous goods
IMDG:	Not dangerous goods
IATA:	Not dangerous goods

#### 14.3 Transport hazard class(es)

ADR/RID:	IMDG:	IATA:
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#### 14.4 Packaging group

ADR/RID:	IMDG:	IATA:
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#### 14.5 Environmental hazards

ADR/RID: no	IMDG Marine pollutant: no	IATA: no
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#### 14.6 Special precautions for user

no data available

### SECTION 15: Regulatory information

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

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

no data available

#### 15.2 Chemical Safety Assessment

For this product a chemical safety assessment was not carried out

### SECTION 16: Other information

#### Full text of H-Statements referred to under sections 2 and 3.

Carc.	Carcinogenicity
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H350i	May cause cancer by inhalation.

Resp. Sens.            Respiratory sensitisation

**Full text of R-phrases referred to under sections 2 and 3**

T	Toxic
R42	May cause sensitisation by inhalation.
R49	May cause cancer by inhalation.

**Further information**

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Säntis Analytical AG shall not be held liable for any damage resulting from handling or from contact with the above product. This document is protected by copyright. All duplication for commercial purposes requires approval by Säntis Analytical AG.

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