

## SAFETY DATA SHEET

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

MOL No. 2009-68Standards for Classification and Labeling of Chemical Substances and Material Safety Data Sheet (MSDS)

Issue Date: 04/Jun/2019 Revision Number: 1.3

Print Date: 12/Jun/2019 Page 1 of 9

### Section 1: PRODUCT AND COMPANY IDENTIFICATION

A. Product name Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox®

AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827;

Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Chemical Name Substance : Al<sub>2</sub>O<sub>3</sub> Al<sub>2</sub>O<sub>3</sub>

Pure substance/mixture Substance

Aluminum oxide

**CAS Number** 1344-28-1 **Weight-%** >99

B. Recommended use and Limitations on use

Recommended Use Abrasive Adsorbent(s) Catalyst Filler Chemical industry (raw material for the

production of other aluminium compounds), etc.

Uses advised against None known

C. Supplier information

Company Name MARTINSWERK GmbH

Kölner Strasse 110 50127 Bergheim

Germany

Tel.: +49-2271-90.22.78 Fax.: +49-2271-90.27.17

E-mail hubermaterials@huber.com

Internet www.hubermaterials.com

Contact person CHEMTREC

Emergency phone number +1 800 424 9300 International +1 703 527 3887

## Section 2: HAZARDS IDENTIFICATION

A. Hazard category/Classification

Physical Hazards Not classified

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

**Print Date:** 12/Jun/2019 **Page 2 of 9** 

Health Hazards Not classified

Environmental Hazards Not classified

B. Warning label items including precautionary statement

**Label Elements** 

Symbols/Pictograms None

Signal Words None

Hazard Statements None

**Precautionary statement** 

**Prevention** Employ good industrial hygiene practice

Do not handle until all safety precautions have been read and understood.

Do not breathe dust

Wear protective gloves/protective clothing/eye protection/face protection

**Response** IF INHALED: Remove to fresh air and keep at rest in a position comfortable for

breathing

IF ON SKIN: Wash with plenty of soap and water

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact

lenses, if present and easy to do. Continue rinsing

If swallowed, rinse mouth with water (only if the person is conscious)

Drink plenty of water

**Storage** Store away from incompatible materials

**Disposal** Dispose of contents/containers in accordance with local regulations

Additional Information: None.

C. Other hazards not included in the hazard category criteria (e.g. dust explosion hazard)

None known

# **Section 3: COMPOSITION/INFORMATION ON INGREDIENTS**

Pure substance/mixture Substance

Chemical Name	CAS Number	S. Korea (KECL)	Korean GHS Classification	TSCA: United States	Weight-%
Aluminum oxide	1344-28-1	KE-01012	Not classified	Υ	>99

Legend

X / Y: Complies , - / N: Not Listed , Exempt

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

**Print Date:** 12/Jun/2019 **Page 3 of 9** 

## **Section 4: FIRST AID MEASURES**

**A. In case of eye contact**Rinse with water. Get medical attention if irritation develops and persists.

B. In case of skin contact Wash off with soap and water. Get medical attention if irritation develops and

persists.

**C. In case of inhalation** Move to fresh air. Call a physician if symptoms develop or persist.

**D. In case of swallowing** Rinse mouth. Get medical attention if symptoms occur.

**E. Note to physician** Treat symptomatically.

### **Section 5: FIRE FIGHTING MEASURES**

Water fog. Foam. Dry chemical powder. Carbon dioxide (CO2).

A. Suitable (and unsuitable) extinguishing media

Suitable extinguishing

Unsuitable extinguishing

media

None known

media

B. Specific hazards arising from the chemical (example: hazardous combustion products)

**Explosion hazard:** None known

C. Specific methods of fire-fighting

Self-contained breathing apparatus and full protective clothing must be worn in case of fire. In the event of fire and/or explosion do not breathe fumes. Move container from fire area if it can be done without risk.

## Section 6: SPILLAGE, ACCIDENTAL RELEASE MEASURES

- **A. Personal precautions, protective equipment and emergency measures** Ensure adequate ventilation. Avoid dust formation. See section 8 for more information.
- **B. Environmental precautions** Not considered to be harmful to aquatic life. Avoid discharge into drains, water courses or onto the ground.
- **C. Methods and materials for containment and cleaning up** Vacuum or sweep material and place in a disposal container.

### Section 7: HANDLING AND STORAGE

A. Precautions for safe handling

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

Page 4 of 9

In case of exposure to environments exceeding the occupational exposure limit, wear a respirator in compliance with national legislation.

### B. Conditions for safe storage (including any incompatibilities)

Keep container tightly closed in a dry and well-ventilated place

### Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

#### A. Exposure limit values, biological limit values, etc

Aluminum oxide

Print Date: 12/Jun/2019

 Korea
 TWA: 10 mg/m³

 ACGIH
 TWA: 10 mg/m³

ACGIH TLV

OSHA

TWA: 1 mg/m³ respirable fraction
TWA: 15 mg/m³ total dust

TWA: 5 mg/m³ respirable fraction (vacated) TWA: 10 mg/m³ total dust (vacated) TWA: 5 mg/m³ respirable fraction

B. Engineering Controls. Engineering Measures

Do not handle until all safety precautions have been read and understood

Ensure adequate ventilation, especially in confined areas

Provide a good standard of controlled ventilation (10 to 15 air changes per hour) Use exhaust ventilation to keep airborne concentrations below exposure limits

In case of insufficient ventilation, wear suitable respiratory equipment

C. Personal protective equipment

Eye protection
 Hand protection
 If contact is likely, safety glasses with side shields are recommended.
 For prolonged or repeated skin contact use suitable protective gloves.

• **Body protection** Wear suitable protective clothing.

Hygiene Measures Always observe good personal hygiene measures, such as washing after handling

the material and before eating, drinking, and/or smoking. Routinely wash work

clothing and protective equipment to remove contaminants.

### Section 9: PHYSICAL AND CHEMICAL PROPERTIES

Physical State Solid

Granules

Color White Odor Odorless

Odor Threshold No information available

pH: Not available Melting point / Freezing point 2045 °C / 3713 °F

Flash Point: Not applicable

Product/Substance is inorganic

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

**Print Date:** 12/Jun/2019 **Page 5 of 9** 

Solid

**Evaporation Rate** Not applicable Melting Point : > 300°C

Flammability (solid, gas) No information available

Upper flammability limit:
Lower flammability limit:
Vapor Pressure
Vapor Density

No data available
No data available
1 hPa (2158 °C)
Not applicable

Melting Point: > 300°C

Relative Density 4 g/cm3 (20°C)
Water Solubility Insoluble

Solubility in other solvents No information available Not applicable : Product/Substance is inorganic No

information available

Kinematic viscosity

Dynamic viscosity

No data available.

Not applicable. Solid.

**Explosive Properties** None **Oxidizing Properties** None

9.2. Other information

No data available

### Section 10: STABILITY AND REACTIVITY

A. Stability and hazardous reaction potential

Stability Stable under normal conditions

Hazardous reaction

potential

None known

- **B.** Conditions to avoid (e.g. static discharge, shock or Vibration, etc) Avoid creating dust. Incompatible materials.
- **C. Incompatible materials** Strong oxidizing agents
- **D. Hazardous decomposition products** No hazardous decomposition products are known.

## **Section 11: TOXICOLOGICAL INFORMATION**

A. Information on likely routes of exposure

Mouth Not an expected route of exposure

Eyes Dust contact with the eyes can lead to mechanical irritation
 Skin Prolonged skin contact may cause temporary irritation.

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 **Revision Number: 1.3** 

Print Date: 12/Jun/2019 Page 6 of 9

#### B. Information on health hazards

Aluminum oxide

Serious eve damage/eve

irritation

Non-irritant: Rabbit

Mutagenicity

Skin Corrosion/Irritation

Non-irritant: Rabbit

**Reproductive Effects** 

in vitro in vivo Based on available data, the classification criteria are not met

No indication of effects on fertility.

Lungs

No indication of effects on developmental toxicity.

**Target Organ Effects** 

Specific target organ toxicity No information available

- Single exposure

Specific target organ toxicity Repeated dose toxicity Inhalation 28-d Rat NOAEL (No observed adverse effect

- Repeated exposure level) 70 mg(AI)/m<sup>3</sup>

Repeated dose toxicity 1- Year Rat NOAEL (No observed adverse effect level)

>=30 mg Al/kg bw

**Acute Toxicity** Al<sub>2</sub>O<sub>3</sub>

Repeated dose toxicity Inhalation 28-d Rat NOAEL (No observed adverse effect

level) 70 mg(Al)/m<sup>3</sup>. Target Organs Lungs Respiratory system

Repeated dose toxicity 1- Year Oral Rat NOAEL (No observed adverse effect

level) >=30 mg Al/kg bw

Based on available data, the classification criteria are not met **Respiratory Sensitization** 

Serious eye damage/eye

irritation

Non-irritant: Rabbit

Draize Test Guinea pig: No sensitization responses were observed

Skin Corrosion/Irritation Non-irritant: Rabbit

Mutagenicity Based on available data, the classification criteria are not met

Based on available data, the classification criteria are not met. **Reproductive Effects** 

Based on available data, the classification criteria are not met. Reproductive Toxicity

Carcinogenicity This product does not contain any carcinogens or potential carcinogens as listed

by OSHA, IARC or NTP.

**Target Organ Effects** Lungs.

Specific target organ toxicity -

Single exposure

No information available.

Specific target organ toxicity -

No information available.

Repeated exposure

### **Section 12: ECOLOGICAL INFORMATION**

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 **Revision Number: 1.3** Print Date: 12/Jun/2019

Page 7 of 9

A. Ecotoxicity

Hazardous to the aquatic Not classified

environment, acute hazard Avoid runoff to waterways and sewers

Hazardous to the aquatic

Not classified

environment, long-term

Avoid runoff to waterways and sewers

hazard

- B. Persistence/degradability No data available
- C. Bioaccumulative potential No data available
- D. Mobility in soil No data available
- E. Other adverse effects No data available

### Section 13: DISPOSAL CONSIDERATIONS

#### A. Method of disposal

Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose in accordance with all applicable regulations.

B. Disposal considerations (including disposal of contaminated containers or packaging) Disposal should be in accordance with applicable regional, national and local laws and regulations

### **Section 14: TRANSPORT INFORMATION**

Mode of Transportation (Road, Water, Air, Rail)

**ADR** Not regulated Not regulated IATA IMDG/IMO Not regulated **ICAO** Not regulated

14.1. UN number None

14.2. UN proper shipping name None

14.3. Transport hazard class(es) None

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

Print Date: 12/Jun/2019 Page 8 of 9

14.4. Packing group None

14.5. Environmental hazards No

**14.6. Special precautions for** Not applicable

user

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

## **Section 15: REGULATORY INFORMATION**

#### **National Regulations**

Aluminum oxide

**CAS Number** 1344-28-1 **Weight-%** >99

Korean GHS Classification Not classified Not applicable

Chemicals - Group 1

Toxic Release Inventory >=1.0%

Chemicals - Group 2

#### Other domestic and foreign regulations

#### **Global Inventories**

Chemical Name	CAS Number	EC No	REACH registrati on number	Australia (AICS)	Canada (DSL)	China (IECSC)	Japan	S. Korea (KECL)	Mexico		Philippine s (PICCS)	Taiwan	TSCA: United States
Aluminum oxide	1344-28-1		01-211952 9248-35-x xxx 01-211952 9248-35-0 017		Y	Y	(1)-23 (ENCS)(ISH L)	KE-01012	Y	Y	Y	Υ	Y

Legend

X / Y: Complies , - / N: Not Listed , Exempt

## **Section 16: OTHER INFORMATION**

#### A. Source of Information

Abbreviations and acronyms International Agency for Research on Cancer (IARC) International Air Transport Association (IATA)

International Maritime Dangerous Goods (IMDG)

Compalox® AN/V-801; Compalox® AN/V-802; Compalox® AN/V; Compalox® AN/V-812; Compalox® AN/V-813; Compalox® AN/V-825; Compalox® AN/V-827; Compalox® AN/V-850; Compalox® AN/V-800; Compalox® AN/V-005

Issue Date: 04/Jun/2019 Revision Number: 1.3

Print Date: 12/Jun/2019 Page 9 of 9

International Uniform Chemical Information Database (IUCLID)

Workplace Hazardous Materials Information System (WHMIS) status and classification

EPA SARA Title III Section 312 (40 CFR 370) Hazard Classification

DOT (Department of Transportation)

OSHA (Occupational Safety and Health Administration of the US Department of Labor)

TWA - Time-Weighted Average

The Classification, Labeling and Packaging of Substances and Mixtures (CLP) Regulation (EC

1272/2008)

PPE - Personal Protection Equipment

NIOSH - National Institute for Occupational Safety and Health

TDG (Transport of Dangerous Goods) Canada

CERCLA (Comprehensive Environmental Response, Compensation, and Liability Act)

Reportable Quantity (RQ) (RQ/% in mixture)

STEL - Short Term Exposure Limit TLV® - Threshold Limit Value Derived No Effect Level (DNEL)

SVHC: Substances of Very High Concern for Authorization:

Land transport (ADR/RID)

Biochemical oxygen demand (BOD) Chemical oxygen demand (COD)

ICAO (air)

(IMDG) International Maritime Dangerous Goods

Positive Pressure Self-Contained Breathing Apparatus (SCBA)

Predicted No Effect Concentration (PNEC) Globally Harmonized System (GHS)

**B. Issue Date:** 04/Jun/2019 **Print Date:** 12/Jun/2019

C. Number of revisions and Date 1.3 of most recent revision

D. Other

Prepared by Huber Engineered Materials Global Regulatory Affairs

email: regulatory.affairs@huber.com

**Disclaimer** The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text

**End of Safety Data Sheet**