

SECTION 1: Product and company identification

Product name : Alum-Kleen
 Use of the substance/mixture : Cleaner
 Product code : 0663
 Company : Metropolitan Compounds
 3343 N University Drive
 Hollywood, FL 33024 - USA
 T (855) 474-6781
 Contact: Technical Department
 Emergency number : Chemtrec: 1-800-424-9300

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

GHS-US classification
 Eye Irrit. 2 H319
 Repr. 1B H360

2.2. Label elements

GHS US labelling
 Hazard pictograms (GHS US) :



GHS07 GHS08

Signal word (GHS US) : Danger
 Hazard statements (GHS US) : Causes serious eye irritation.
 May damage fertility or the unborn child.
 Precautionary statements (GHS US) : Obtain special instructions before use.
 Do not handle until all safety precautions have been read and understood.
 Wash thoroughly after handling
 Wear protective gloves/protective clothing/eye protection/face protection.
 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 If exposed or concerned: Get medical advice/attention.
 If eye irritation persists: Get medical advice/attention.
 Store locked up.
 Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.

2.3. Other hazards

No additional information available

2.4. Unknown acute toxicity (GHS US)

Not applicable.

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	GHS-US classification
Sodium Carbonate (Chelating agent)	(CAS-No.) 497-19-8	30-60	Eye Irrit. 2, H319
Sodium Borate (Cleansing Agent)	(CAS-No.) 1303-96-4	7.0-13.0	Eye Irrit. 2A, H319 Repr. 1B, H360
Sodium Orthosilicate (Cleansing Agent)	(CAS-No.) 1344-09-8	5.0-10.0	Skin Irrit. 2, H315 Eye Dam. 1, H318

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Disodium EDTA (Chelating agent)	(CAS-No.) 139-33-3	1-5	Acute Tox. 4 (Inhalation:dust,mist), H332
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All hazardous chemicals, as determined by 29 CFR 1910.1200 have been listed. A specific chemical identity and/or percentage of composition has been withheld as a trade secret. Any concentration shown as a range is to protect confidentiality or is due to batch variation.

SECTION 4: First aid measures

4.1. Description of first aid measures

- First-aid measures general : If you feel unwell, seek medical advice (show the label where possible).
- First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. Get medical advice/attention if you feel unwell.
- First-aid measures after skin contact : Take off immediately all contaminated clothing and wash it before reuse. Rinse skin with water/shower. If skin irritation occurs: Get medical advice/attention.
- First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER/doctor.
- First-aid measures after ingestion : Rinse mouth. Do NOT induce vomiting. Get medical advice/attention if you feel unwell.

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

- Symptoms/effects : Causes severe skin burns and eye damage.
- Symptoms/effects after inhalation : May cause respiratory irritation.
- Symptoms/effects after skin contact : Caustic burns/corrosion of the skin.
- Symptoms/effects after eye contact : Causes serious eye damage. Corrosion of the eye tissue. Permanent eye damage.
- Symptoms/effects after ingestion : Harmful if swallowed. Gastrointestinal complaints. Burns to the gastric/intestinal mucosa.

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

Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

- Suitable extinguishing media : All extinguishing media allowed.

5.2. Special hazards arising from the substance or mixture

- Reactivity : Powder may produce chlorine gas when wet. Upon combustion: CO and CO₂ are formed. If the product is involved in a fire, it can release toxic chlorine gases.

5.3. Advice for firefighters

- Firefighting instructions : Exercise caution when fighting any chemical fire. Use water spray or fog for cooling exposed containers. Take account of environmentally hazardous firefighting water.
- Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

- General measures : Isolate from fire, if possible, without unnecessary risk.

6.1.1. For non-emergency personnel

- Protective equipment : Protective goggles. Gloves. Protective clothing.
- Emergency procedures : Evacuate unnecessary personnel. Avoid contact with skin, eyes and clothing. Ventilate spillage area.

6.1.2. For emergency responders

- Protective equipment : Equip cleanup crew with proper protection.
- Emergency procedures : Stop leak if safe to do so. Stop release. Ventilate area.

6.2. Environmental precautions

Avoid release to the environment. Prevent soil and water pollution.

6.3. Methods and material for containment and cleaning up

- For containment : Contain released product, collect/pump into suitable containers.
- Methods for cleaning up : Absorb spillage to prevent material damage. This material and its container must be disposed of in a safe way, and as per local legislation.

6.4. Reference to other sections

No additional information available

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Precautions for safe handling : Comply with the legal requirements. Do not handle until all safety precautions have been read and understood. Use personal protective equipment as required. Do not eat, drink or smoke when using this product. Do not get in eyes, on skin, or on clothing. Handle and open the container with care.
- Hygiene measures : Wash thoroughly after handling. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities

- Technical measures : Comply with applicable regulations.
- Storage conditions : Store in corrosive resistant container with a resistant inner liner. Keep container closed when not in use.
- Incompatible products : Acids. reducing agents.
- Storage area : Keep only in the original container. Store in a dry area. Store in a cool area.
- Special rules on packaging : meet the legal requirements. Keep only in original container.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Sodium Carbonate (497-19-8)

Not applicable

Disodium EDTA (139-33-3)

Not applicable

Sodium Borate (1303-96-4)

Not applicable

Sodium Orthosilicate (1344-09-8)

Not applicable

8.2. Exposure controls

- Personal protective equipment : Use appropriate personal protective equipment when risk assessment indicates this is necessary. Safety glasses. Gloves. Protective clothing.



SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

- Physical state : Solid
- Appearance : Fine white powder
- Odour : chlorine-like
- Odour threshold : No data available
- pH : No data available
- Melting point : No data available
- Freezing point : No data available
- Boiling point : No data available
- Flash point : > 200 °F Closed Cup
- Relative evaporation rate (butylacetate=1) : No data available
- Flammability (solid, gas) : No data available
- Explosive limits : No data available
- Explosive properties : No data available
- Oxidising properties : No data available
- Vapour pressure : No data available
- Relative density : NA
- Relative vapour density at 20 °C : No data available
- Solubility : Soluble in water.
- Partition coefficient n-octanol/water (Log Pow) : No data available
- Partition coefficient n-octanol/water (Log Kow) : No data available
- Auto-ignition temperature : No data available
- Decomposition temperature : No data available
- Viscosity : No data available
- Viscosity, kinematic : No data available
- Viscosity, dynamic : No data available

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VOC content : 0 %

SECTION 10: Stability and reactivity

10.1. Reactivity

Powder may produce chlorine gas when wet. Upon combustion: CO and CO₂ are formed. If the product is involved in a fire, it can release toxic chlorine gases.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

Refer to section 10.1 on Reactivity.

10.4. Conditions to avoid

No additional information available

10.5. Incompatible materials

No additional information available

10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Not classified

Sodium Carbonate (497-19-8)	
LD50 oral rat	2800 mg/kg (Rat, Male / female, Experimental value, Oral, 14 day(s))
LD50 dermal rabbit	> 2000 mg/kg (16 CFR 1500.40, 24 h, Rabbit, Experimental value, Dermal)
LC50 Inhalation - Rat	(2 h, Rat, Male, Experimental value)
ATE CLP (oral)	2800 mg/kg bodyweight
ATE CLP (vapours)	2.3 mg/l/4h
ATE CLP (dust,mist)	2.3 mg/l/4h

Sodium Orthosilicate (1344-09-8)	
LD50 oral rat	> 2000 mg/kg (Rat, Oral)

Skin corrosion/irritation : Not classified
Serious eye damage/irritation : Causes serious eye irritation.
Respiratory or skin sensitisation : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified

Reproductive toxicity : May damage fertility or the unborn child.
STOT-single exposure : Not classified

STOT-repeated exposure : Not classified

Aspiration hazard : Not classified
Symptoms/effects after inhalation : May cause respiratory irritation.
Symptoms/effects after skin contact : Caustic burns/corrosion of the skin.
Symptoms/effects after eye contact : Causes serious eye damage. Corrosion of the eye tissue. Permanent eye damage.
Symptoms/effects after ingestion : Harmful if swallowed. Gastrointestinal complaints. Burns to the gastric/intestinal mucosa.

SECTION 12: Ecological information

12.1. Toxicity

Sodium Carbonate (497-19-8)	
LC50 - Fish [1]	300 mg/l (96 h, Lepomis macrochirus, Static system, Fresh water, Experimental value, Lethal)
EC50 - Crustacea [1]	200 – 227 mg/l (48 h, Ceriodaphnia sp., Semi-static system, Fresh water, Experimental value, Locomotor effect)

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Sodium Orthosilicate (1344-09-8)	
LC50 - Fish [1]	3185 mg/l (96 h, Brachydanio rerio, Not neutralized)
EC50 - Crustacea [1]	216 mg/l (96 h, Daphnia magna)
EC50 - Crustacea [2]	160 mg/l (96 h, Amphipoda)

12.2. Persistence and degradability

Sodium Carbonate (497-19-8)	
Persistence and degradability	Biodegradability: not applicable.
Chemical oxygen demand (COD)	Not applicable (inorganic)
ThOD	Not applicable (inorganic)

Sodium Orthosilicate (1344-09-8)	
Persistence and degradability	Biodegradability: not applicable.
Chemical oxygen demand (COD)	Not applicable
ThOD	Not applicable
BOD (% of ThOD)	Not applicable

12.3. Bioaccumulative potential

Sodium Carbonate (497-19-8)	
Partition coefficient n-octanol/water (Log Pow)	-6.19 (Estimated value)
Bioaccumulative potential	Not bioaccumulative.

Sodium Orthosilicate (1344-09-8)	
Bioaccumulative potential	Bioaccumulation: not applicable.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Product/Packaging disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

SECTION 14: Transport information

Department of Transportation (DOT)

In accordance with DOT : Not regulated for transport

Additional information

Other information : No supplementary information available.

ADR

No additional information available

Transport by sea

Not regulated for transport

Air transport

Not regulated for transport

SECTION 15: Regulatory information

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory.

This product or mixture does not contain a toxic chemical or chemicals in excess of the applicable de minimis concentration as specified in 40 CFR §372.38(a) subject to the reporting requirements of section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372.

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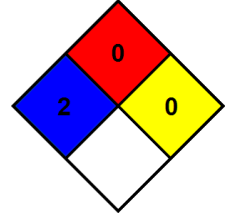
⚠ WARNING

This product can expose you to Ethylene Oxide, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov.

SECTION 16: Other information

Training advice : Normal use of this product shall imply use in accordance with the instructions on the packaging.

- NFPA health hazard : 2 - Materials that, under emergency conditions, can cause temporary incapacitation or residual injury.
- NFPA fire hazard : 0 - Materials that will not burn under typical fire conditions, including intrinsically noncombustible materials such as concrete, stone, and sand.
- NFPA reactivity : 0 - Material that in themselves are normally stable, even under fire conditions.



Prepared by: Technical Department

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product. No warranty is expressed or implied regarding the accuracy of this data or the results obtained from the use thereof. Our company assumes no responsibility for personal injury or property damage to the vendee, users or third parties caused by the material. Such vendees or users assume all risks associated with the use of this material.