Material Safety Data Sheet

Chloroacetone, 96% stabilized with 0.5% CaCO3

ACC# 97297

Section 1 - Chemical Product and Company Identification

MSDS Name: Chloroacetone, 96% stabilized with 0.5% CaCO3

Catalog Numbers: AC173470000, AC173470010, AC173470250, AC173472500

Synonyms: Chloro-2-propanone; Monochloroacetone; 1-Chloro-2-propanone; Chloracetone;

Chlorinated acetone; 1-Chloro-2-ketopropane.

Company Identification:

Acros Organics N.V. One Reagent Lane Fair Lawn, NJ 07410

For information in North America, call: 800-ACROS-01 For emergencies in the US, call CHEMTREC: 800-424-9300

Section 2 - Composition, Information on Ingredients

CAS#	Chemical Name	Percent	EINECS/ELINCS
78-95-5	Chloroacetone	>96	201-161-1
471-34-1	Calcium carbonate	0.5	207-439-9

Section 3 - Hazards Identification

EMERGENCY OVERVIEW

Appearance: purple-brown to brown liquid. Flash Point: 32 deg C.

Danger! Causes eye and skin burns. Causes digestive and respiratory tract burns. May be fatal if inhaled or absorbed through skin. Harmful if swallowed. **Flammable liquid and vapor.** Vesicant (agent that induces blistering). Marine pollutant.

Target Organs: Kidneys, liver, spleen, lungs, eyes, skin, mucous membranes.

Potential Health Effects

Eye: Causes eye burns. Lachrymator (substance which increases the flow of tears). May cause chemical conjunctivitis and corneal damage. Even small amounts in the eyes may result in permanent damage. (ACGIH Documentation of the TLVs, 7th Edition)

Skin: Causes severe skin irritation. May be fatal if absorbed through the skin. This material is a vesicant, that is, it will induce blistering.

Ingestion: Harmful if swallowed. May cause liver and kidney damage. May cause burns to the digestive tract. May cause spleen damage.

Inhalation: May be fatal if inhaled. Vapors are extremely irritating to the respiratory tract. **Chronic:** Effects may be delayed. Repeated inhalation exposures to chloroacetone for 11 days to

15 ppm caused no deaths but rats showed congestion of the lungs, heart, kidneys, liver, and spleen.

Section 4 - First Aid Measures

Eyes: In case of contact, immediately flush eyes with plenty of water for a t least 15 minutes. Get medical aid immediately.

Skin: POISON material. In case of contact, get medical aid immediately. Immediately flush eyes or skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Destroy contaminated shoes.

Ingestion: If swallowed, do NOT induce vomiting. Get medical aid immediately. If victim is fully conscious, give a cupful of water. Never give anything by mouth to an unconscious person. **Inhalation:** POISON material. If inhaled, get medical aid immediately. Remove victim to fresh

air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.

Notes to Physician: Treat symptomatically and supportively.

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. Vapors may form an explosive mixture with air. During a fire, irritating and highly toxic gases may be generated by thermal decomposition or combustion. Use water spray to keep fire-exposed containers cool. Flammable liquid and vapor. Vapors are heavier than air and may travel to a source of ignition and flash back. Vapors can spread along the ground and collect in low or confined areas.

Extinguishing Media: Use water spray, dry chemical, carbon dioxide, or chemical foam.

Flash Point: 32 deg C (89.60 deg F)

Autoignition Temperature: 600 deg C (1,112.00 deg F)

Explosion Limits, Lower:Not available.

Upper: Not available.

NFPA Rating: (estimated) Health: 3; Flammability: 3; Instability: 1

Section 6 - Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8. **Spills/Leaks:** Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container. Avoid runoff into storm sewers and ditches which lead to waterways. Clean up spills immediately, observing precautions in the Protective Equipment section. Remove all sources of ignition. Use a spark-proof tool. Provide ventilation. Evacuate unnecessary personnel. Approach spill from upwind.

Section 7 - Handling and Storage

Handling: Wash thoroughly after handling. Ground and bond containers when transferring

material. Use spark-proof tools and explosion proof equipment. Do not get in eyes, on skin, or on clothing. Empty containers retain product residue, (liquid and/or vapor), and can be dangerous. Keep container tightly closed. Discard contaminated shoes. Do not pressurize, cut, weld, braze, solder, drill, grind, or expose empty containers to heat, sparks or open flames. Keep away from heat, sparks and flame. Do not breathe vapor or mist. Pure vapor will be uninhibited and may polymerize in vents or other confined spaces. Use only with adequate ventilation or respiratory protection.

Storage: Store in a tightly closed container. Refrigerator/flammables. Store protected from light.

Section 8 - Exposure Controls, Personal Protection

Engineering Controls: Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use adequate general or local explosion-proof ventilation to keep airborne levels to acceptable levels.

Exposure Limits

Chemical Name	ACGIH	NIOSH	OSHA - Final PELs
Chloroacetone	Skin - potential significant contribution to overall exposure by the cutaneous r oute; 1 ppm Ceiling	none listed	none listed
Calcium carbonate	10 mg/m3 TWA (particulate matter containing no asbestos and < 1% crystalline sil ica)	10 mg/m3 TWA (total dust); 5 mg/m3 TWA (respirable dust) (listed under Calcium carbonate).	15 mg/m3 TWA (total dust); 5 mg/m3 TWA (respirable fraction) (listed under Calcium carbonate).

OSHA Vacated PELs: Chloroacetone: No OSHA Vacated PELs are listed for this chemical.

Calcium carbonate: No OSHA Vacated PELs are listed for this chemical.

Personal Protective Equipment

Eyes: Wear chemical splash goggles and face shield.

Skin: Wear appropriate protective gloves to prevent skin exposure.

Clothing: Wear appropriate protective clothing to prevent skin exposure.

Respirators: A respiratory protection program that meets OSHA's 29 CFR 1910.134 and ANSI Z88.2 requirements or European Standard EN 149 must be followed whenever workplace

conditions warrant respirator use.

Section 9 - Physical and Chemical Properties

Physical State: Liquid

Appearance: brown green - purple-brown to brown

Odor: strong, pungent - unpleasant odor

pH: Not available.

Vapor Pressure: 11 mm Hg @ 25 deg C

Vapor Density: 3.19 (air=1) **Evaporation Rate:**Not available.

Viscosity: 1.11 mPas 25 deg C

Boiling Point: 119 deg C

Freezing/Melting Point:-44.5 deg C

Decomposition Temperature:Not available.

Solubility: Soluble.

Specific Gravity/Density:1.1600 g/ml

Molecular Formula:C3H5ClO Molecular Weight:92.52

Section 10 - Stability and Reactivity

Chemical Stability: Stable. However, it may undergo explosive polymerization if uninhibited.

Conditions to Avoid: Light, ignition sources, excess heat, confined spaces.

Incompatibilities with Other Materials: Strong oxidizing agents, strong bases, amines,

Corrosive to steel and aluminum..

Hazardous Decomposition Products: Hydrogen chloride, carbon monoxide, irritating and toxic fumes and gases, carbon dioxide.

Hazardous Polymerization: May occur.

Section 11 - Toxicological Information

RTECS#:

CAS# 78-95-5: UC0700000 **CAS**# 471-34-1: FF9335000

LD50/LC50:

CAS# 78-95-5:

Dermal, guinea pig: LD50 = 100 uL/kg; Inhalation, rat: LC50 = 262 ppm/1H; Oral, mouse: LD50 = 127 mg/kg; Oral, rat: LD50 = 100 mg/kg; Skin, rabbit: LD50 = 141 mg/kg;

CAS# 471-34-1:

Draize test, rabbit, eye: 750 ug/24H Severe; Draize test, rabbit, skin: 500 mg/24H Moderate;

Oral, rat: LD50 = 6450 mg/kg;

Inhalation, rat: LC50 = 50-100 ppm/6H (Eastman Kodak).

Carcinogenicity:

CAS# 78-95-5: Not listed by ACGIH, IARC, NTP, or CA Prop 65. CAS# 471-34-1: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

Epidemiology: No information found **Teratogenicity:** No information found

Reproductive Effects: No information found

Mutagenicity: No information found **Neurotoxicity:** No information found

Other Studies:

Section 12 - Ecological Information

No information available.

Section 13 - Disposal Considerations

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

RCRA P-Series: None listed. RCRA U-Series: None listed.

Section 14 - Transport Information

	US DOT	Canada TDG	
Shipping Name:	CHLOROACETONE, STABILIZED	CHLOROACETONE, STABILIZED	
Hazard Class:	6.1	6.1(3)(8)	
UN Number:	UN1695	UN1695	
Packing Group:	I	I	

Section 15 - Regulatory Information

US FEDERAL

TSCA

CAS# 78-95-5 is listed on the TSCA inventory.

CAS# 471-34-1 is listed on the TSCA inventory.

Health & Safety Reporting List

None of the chemicals are on the Health & Safety Reporting List.

Chemical Test Rules

None of the chemicals in this product are under a Chemical Test Rule.

Section 12b

None of the chemicals are listed under TSCA Section 12b.

TSCA Significant New Use Rule

None of the chemicals in this material have a SNUR under TSCA.

CERCLA Hazardous Substances and corresponding RQs

None of the chemicals in this material have an RQ.

SARA Section 302 Extremely Hazardous Substances

None of the chemicals in this product have a TPQ.

SARA Codes

CAS # 78-95-5: immediate, fire, reactive.

CAS # 471-34-1: immediate.

Section 313 No chemicals are reportable under Section 313.

Clean Air Act:

This material does not contain any hazardous air pollutants.

This material does not contain any Class 1 Ozone depletors.

This material does not contain any Class 2 Ozone depletors.

Clean Water Act:

None of the chemicals in this product are listed as Hazardous Substances under the CWA.

None of the chemicals in this product are listed as Priority Pollutants under the CWA.

None of the chemicals in this product are listed as Toxic Pollutants under the CWA.

OSHA:

None of the chemicals in this product are considered highly hazardous by OSHA.

STATE

CAS# 78-95-5 can be found on the following state right to know lists: New Jersey, Pennsylvania, Minnesota, Massachusetts.

CAS# 471-34-1 can be found on the following state right to know lists: Pennsylvania, (listed as Calcium carbonate), Minnesota, (listed as Calcium carbonate), Massachusetts, (listed as Calcium carbonate).

California Prop 65

California No Significant Risk Level: None of the chemicals in this product are listed.

European/International Regulations

European Labeling in Accordance with EC Directives Hazard Symbols:

TN

Risk Phrases:

R 10 Flammable.

R 23/24/25 Toxic by inhalation, in contact with skin and if swallowed.

R 37/38 Irritating to respiratory system and skin.

R 41 Risk of serious damage to eyes.

R 50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Safety Phrases:

S 16 Keep away from sources of ignition - No smoking.

S 23 Do not inhale gas/fumes/vapour/spray.

S 24/25 Avoid contact with skin and eyes.

S 26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S 33 Take precautionary measures against static discharges.

S 9 Keep container in a well-ventilated place.

WGK (Water Danger/Protection)

CAS# 78-95-5: 3

CAS# 471-34-1: 0

Canada - DSL/NDSL

CAS# 78-95-5 is listed on Canada's DSL List.

CAS# 471-34-1 is listed on Canada's DSL List.

Canada - WHMIS

This product has a WHMIS classification of B3, D1A, E.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all of the information required by those regulations.

Canadian Ingredient Disclosure List

CAS# 78-95-5 is listed on the Canadian Ingredient Disclosure List.

CAS# 471-34-1 is not listed on the Canadian Ingredient Disclosure List.

Section 16 - Additional Information

MSDS Creation Date: 7/02/1998 **Revision #7 Date:** 10/03/2005

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall Fisher be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if Fisher has been advised of the possibility of such damages.