

# SAFETY DATA SHEET

Creation Date 13-October-2009

Revision Date 18-December-2025

Revision Number 9

This safety data sheet was created pursuant to the requirements of: Canada WHMIS 2015 which includes the amended Hazardous Products Act (HPA) and the Hazardous Products Regulation (HPR) - SOR 2022-272

## 1. Identification

<b>Product Name</b>	Ethyl acetate
<b>Cat No. :</b>	E195-1; E195-4; E195N1-19; E195N2-19; E195RS-19; E195RS-50; E195RS-115; E195RS-200; E195SK-1; E195SK-4; E195SK4004; E195SK4005; E195SK4006; E195SS-19; E195SS-50; E195SS-115; NC1308052; NC1899880
<b>CAS-No</b>	141-78-6
<b>Synonyms</b>	Acetic acid ethyl ester
<b>Recommended Use</b>	Laboratory chemicals.
<b>Uses advised against</b>	Food, drug, pesticide or biocidal product use.

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

#### Company

##### **Importer/Distributor**

Fisher Scientific  
112 Colonnade Road,  
Ottawa, ON K2E 7L6,  
Canada  
Tel: 1-800-234-7437

##### **Manufacturer**

Fisher Scientific Company  
One Reagent Lane  
Fair Lawn, NJ 07410  
Tel: (201) 796-7100

#### **Emergency Telephone Number**

CHEMTREC®, Inside the USA: 800-424-9300  
CHEMTREC®, Outside the USA: 001-703-527-3887

## 2. Hazard(s) identification

### Classification

**WHMIS 2015 Classification** This product is hazardous in accordance with the Canada Hazardous Products Act (HPA) and Hazardous Products Regulation (HPR), as amended (SOR/2022-272)

<b>Flammable liquids</b>	Category 2
<b>Serious Eye Damage/Eye Irritation</b>	Category 2
<b>Specific target organ toxicity (single exposure)</b>	Category 3
Target Organs - Central nervous system (CNS).	
<b>Health Hazards Not Otherwise Classified</b>	Category 1
Repeated exposure may cause skin dryness or cracking	

### Label Elements

**Signal Word**

Danger

**Hazard Statements**

Highly flammable liquid and vapor  
 Causes serious eye irritation  
 May cause drowsiness and dizziness  
 Repeated exposure may cause skin dryness or cracking

**Precautionary Statements****Prevention**

Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking  
 Keep container tightly closed  
 Ground and bond container and receiving equipment  
 Use explosion-proof electrical/ventilating/lighting/equipment  
 Do not breathe dust/fumes/gas/mist/vapours/spray  
 Wash face, hands and any exposed skin thoroughly after handling  
 Use only outdoors or in a well-ventilated area  
 Wear protective gloves/protective clothing/eye protection/face protection  
 Use non-sparking tools  
 Take action to prevent static discharges

**Response**

IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower  
 IF INHALED: Remove person to fresh air and keep comfortable for breathing  
 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing  
 Call a POISON CENTER/ doctor if you feel unwell  
 In case of fire: Use dry sand, dry chemical or alcohol-resistant foam to extinguish

**Storage**

Store in a well-ventilated place. Keep container tightly closed  
 Store locked up

**Disposal**

Dispose of contents/container to an approved waste disposal plant

### 3. Composition/Information on Ingredients

Component	CAS-No	Weight %
Ethyl acetate	141-78-6	<=100

### 4. First-aid measures

**General Advice**

If symptoms persist, call a physician.

**Eye Contact**

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Get medical attention.

**Skin Contact**

Wash off immediately with plenty of water for at least 15 minutes. If skin irritation persists, call a physician.

<b>Inhalation</b>	Remove to fresh air. If not breathing, give artificial respiration. Get medical attention if symptoms occur.
<b>Ingestion</b>	Clean mouth with water and drink afterwards plenty of water.
<b>Most important symptoms/effects</b>	Difficulty in breathing. May cause central nervous system depression: Inhalation of high vapor concentrations may cause symptoms like headache, dizziness, tiredness, nausea and vomiting
<b>Notes to Physician</b>	Treat symptomatically

## 5. Fire-fighting measures

<b>Suitable Extinguishing Media</b>	Water spray, carbon dioxide (CO <sub>2</sub> ), dry chemical, alcohol-resistant foam.
<b>Unsuitable Extinguishing Media</b>	Water may be ineffective, Do not use a solid water stream as it may scatter and spread fire
<b>Flash Point</b>	-4 °C / 24.8 °F
<b>Method -</b>	CC (closed cup)
<b>Autoignition Temperature</b>	427 °C / 800.6 °F
<b>Explosion Limits</b>	
<b>Upper</b>	11.5 vol %
<b>Lower</b>	2.0 vol %
<b>Oxidizing Properties</b>	Not oxidising
<b>Sensitivity to Mechanical Impact</b>	No information available
<b>Sensitivity to Static Discharge</b>	No information available

### Specific Hazards Arising from the Chemical

Flammable. Risk of ignition. Vapors may form explosive mixtures with air. Vapors may travel to source of ignition and flash back. Containers may explode when heated.

### Hazardous Combustion Products

Carbon monoxide (CO). Carbon dioxide (CO<sub>2</sub>).

### Protective Equipment and Precautions for Firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

### NFPA

<b>Health</b> 2	<b>Flammability</b> 3	<b>Instability</b> 0	<b>Physical hazards</b> N/A
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## 6. Accidental release measures

<b>Personal Precautions</b>	Use personal protective equipment as required. Ensure adequate ventilation.
<b>Environmental Precautions</b>	Should not be released into the environment. See Section 12 for additional Ecological Information.

**Methods for Containment and Clean Up** Soak up with inert absorbent material. Keep in suitable, closed containers for disposal.

## 7. Handling and storage

<b>Handling</b>	Ensure adequate ventilation. Wear personal protective equipment/face protection. Do not get in eyes, on skin, or on clothing. Avoid ingestion and inhalation.
<b>Storage.</b>	Flammables area. Keep away from heat, sparks and flame. Keep container tightly closed in

a dry and well-ventilated place. Incompatible Materials. Strong oxidizing agents. Strong acids. Amines. Peroxides.

## 8. Exposure controls / personal protection

### Exposure Guidelines

Component	Alberta	British Columbia	Ontario TWAEV	Quebec
Ethyl acetate	TWA: 400 ppm TWA: 1440 mg/m <sup>3</sup>	TWA: 150 ppm	TWA: 400 ppm	TWA: 400 ppm TWA: 1440 mg/m <sup>3</sup>

Component	Manitoba	New Brunswick	Newfoundland and Labrador	Nova Scotia
Ethyl acetate	TWA: 400 ppm	TWA: 400 ppm	TWA: 400 ppm	TWA: 400 ppm

Component	Nunavut	Prince Edward Island	Saskatchewan	Yukon
Ethyl acetate	TWA: 400 ppm STEL: 500 ppm	TWA: 400 ppm	TWA: 400 ppm STEL: 500 ppm	TWA: 400 ppm TWA: 1400 mg/m <sup>3</sup> STEL: 400 ppm STEL: 1400 mg/m <sup>3</sup>

Component	ACGIH TLV	OSHA PEL	NIOSH
Ethyl acetate 141-78-6 ( ≤100 )	TWA: 400 ppm	(Vacated) TWA: 400 ppm (Vacated) TWA: 1400 mg/m <sup>3</sup> TWA: 400 ppm TWA: 1400 mg/m <sup>3</sup>	IDLH: 2000 ppm TWA: 400 ppm TWA: 1400 mg/m <sup>3</sup>

#### Legend

ACGIH - American Conference of Governmental Industrial Hygienists

OSHA - Occupational Safety and Health Administration

NIOSH: NIOSH - National Institute for Occupational Safety and Health

### Engineering Measures

Ensure adequate ventilation, especially in confined areas. Use explosion-proof electrical/ventilating/lighting/equipment. Ensure that eyewash stations and safety showers are close to the workstation location.

Wherever possible, engineering control measures such as the isolation or enclosure of the process, the introduction of process or equipment changes to minimise release or contact, and the use of properly designed ventilation systems, should be adopted to control hazardous materials at source

### Personal protective equipment

#### Eye Protection

Goggles

#### Hand Protection

Wear appropriate protective gloves and clothing to prevent skin exposure.

Glove material	Breakthrough time	Glove thickness	Glove comments
Butyl rubber	> 120 minutes	0.5 - 0.7 mm	Permeation rate 8 µg/cm <sup>2</sup> /min
Nitrile rubber	< 200 minutes		As tested under EN374-3
			Determination of Resistance to Permeation by Chemicals

Inspect gloves before use. observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. (Refer to manufacturer/supplier for information) gloves are suitable for the task: Chemical compatibility, Dexterity, Operational conditions, User susceptibility, e.g. sensitisation effects, also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion. gloves with care avoiding skin contamination.

#### Respiratory Protection

No protective equipment is needed under normal use conditions.

**Environmental exposure controls**

No information available.

**Hygiene Measures**

Handle in accordance with good industrial hygiene and safety practice. Keep away from food, drink and animal feeding stuffs. Do not eat, drink or smoke when using this product. Remove and wash contaminated clothing and gloves, including the inside, before re-use. Wash hands before breaks and after work.

## 9. Physical and chemical properties

**Appearance****Physical State**

Liquid

**Color**

Colorless

**Odor**

sweet

**Odor Threshold**

50 ppm

**Property****Values****Remarks****• Method****Melting Point/Range**

-83.5 °C / -118.3 °F

**Softening Point**

No data available

**Boiling Point/Range**

75 - 78 °C / 167 - 172.4 °F

**Flash Point**

-4 °C / 24.8 °F

**Method -** CC (closed cup)**Flammability (liquid)**

Highly flammable

On basis of test data

**Flammability (solid,gas)**

Not applicable

Liquid

**Explosion Limits****Lower** 2 Vol%**Upper** 12 Vol%**Autoignition Temperature**

427 °C / 800.6 °F

**Decomposition Temperature**

No data available

**pH**

No information available

**Viscosity**

0.45 cP @ 20 °C

Dynamic

**Water Solubility**

80 g/l

20 °C

**Solubility in other solvents**

Miscible Alcohol acetone

**Partition Coefficient (n-octanol/water)****Component****log Pow**

Ethyl acetate

0.73

**Vapor Pressure**

103 mbar @ 20°C

**Density / Specific Gravity**

0.902

@ 20 °C

**Bulk Density**

Not applicable

Liquid

**Vapor Density**

3.04

(Air = 1.0)

**Particle characteristics**

Not applicable (liquid)

**Other Information****Molecular Formula**

C4 H8 O2

**Molecular Weight**

88.11

**Explosive Properties**

Not explosive Vapors may form explosive mixtures with air

**Oxidizing Properties**

Not oxidising (based on the chemical structure of the substance and oxidation states of the constituent elements)

**Evaporation Rate**

6.2 - (Butyl Acetate = 1.0)

**Surface tension**

24 mN/m @ 20°C

## 10. Stability and reactivity

**Reactive Hazard**

None known, based on information available

**Stability**

Stable under normal conditions.

<b>Conditions to Avoid</b>	Incompatible products. Keep away from open flames, hot surfaces and sources of ignition.
<b>Incompatible Materials</b>	Strong oxidizing agents, Strong acids, Amines, Peroxides
<b>Hazardous Decomposition Products</b>	Carbon monoxide (CO), Carbon dioxide (CO <sub>2</sub> )
<b>Hazardous Polymerization</b>	Hazardous polymerization does not occur.
<b>Hazardous Reactions</b>	None under normal processing.

## 11. Toxicological information

### Information on expected route of exposure

<b>Inhalation</b>	INHALATION MAY CAUSE CENTRAL NERVOUS SYSTEM EFFECTS. May cause irritation of respiratory tract. May be harmful if inhaled.
<b>Ingestion</b>	May be harmful if swallowed. May cause central nervous system effects. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.
<b>Eyes</b>	Irritating to eyes.
<b>Skin</b>	May cause irritation. May be harmful in contact with skin. Repeated exposure may cause skin dryness or cracking.

### Toxicology data for the components

Component	LD50 Oral	LD50 Dermal	LC50 Inhalation
Ethyl acetate	10,200 mg/kg ( Rat )	> 20 mL/kg ( Rabbit ) > 18000 mg/kg ( Rabbit )	58 mg/l (rat; 8 h)

**Toxicologically Synergistic Products** No information available

**(b) skin corrosion/irritation;**  
**Test method** OECD 404  
**Test species** rabbit  
**Observational endpoint** No skin irritation

**(c) serious eye damage/irritation;**  
**Test method** OECD 405  
**Test species** rabbit eye  
**Observation end point** Irritating to eyes

**(d) respiratory or skin sensitization;**  
**Respiratory** Based on available data, the classification criteria are not met  
**Skin** Based on available data, the classification criteria are not met

Component	Test method	Test species	Study result
Ethyl acetate 141-78-6 ( <=100 )	OECD Test Guideline 406	guinea pig	- non-sensitising

**(e) germ cell mutagenicity;** Based on available data, the classification criteria are not met

Component	Test method	Test species	Study result
Ethyl acetate 141-78-6 ( <=100 )	OECD Test Guideline 471 AMES test	in vitro Bacteria	negative
	OECD Test Guideline 473 Chromosomal aberration assay	in vitro Mammalian	negative
	OECD Test Guideline 476	in vitro	negative

	Gene cell mutation ----- OECD Test Guideline 474 Mouse micronucleus assay	Mammalian ----- in vivo Mammalian	----- negative
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**(f) carcinogenicity;** Based on available data, the classification criteria are not met

The table below indicates whether each agency has listed any ingredient as a carcinogen

Component	CAS-No	IARC	NTP	ACGIH	OSHA	Mexico
Ethyl acetate	141-78-6	Not listed	Not listed	Not listed	Not listed	Not listed

**(g) reproductive toxicity;** Based on available data, the classification criteria are not met

Component	Test method	Test species / Duration	Study result
Ethyl acetate 141-78-6 ( <=100 )	OECD Test Guideline 416	Oral mouse 2 Generation	NOAEL = 26400 mg/kg bw/day
	OECD Test Guideline 414	Inhalation Rat	NOAEC = 73300 mg/m <sup>3</sup>

**(h) STOT-single exposure;** Category 3

**Results / Target organs** Central nervous system (CNS).

**(i) STOT-repeated exposure;** Based on available data, the classification criteria are not met

<b>Test method</b>	EPA OTS 795.2600	EPA OTS 798.2450
<b>Test species / Duration</b>	Rat / 90 days	Rat / 90 days
<b>Study result</b>	NOAEL = 900 mg/kg bw/day LOAEL = 3600 mg/kg	NOEC = 1.28 mg/l
<b>Route of exposure</b>	Oral	Inhalation
<b>Target Organs</b>	None known.	

**(j) aspiration hazard;** Based on available data, the classification criteria are not met

**Symptoms / effects, both acute and delayed** May cause central nervous system depression. Inhalation of high vapor concentrations may cause symptoms like headache, dizziness, tiredness, nausea and vomiting.

**Other Adverse Effects** The toxicological properties have not been fully investigated.

**Endocrine Disrupting Properties** This product does not contain any known or suspected endocrine disruptors.

## 12. Ecological information

### Ecotoxicity

Do not empty into drains.

Component	Freshwater Algae	Freshwater Fish	Microtox	Water Flea
Ethyl acetate	EC50 = 3300 mg/L/48h	Fathead minnow: LC50: 230 mg/l/ 96h Gold orfe: LC50: 270 mg/L/48h	EC50 = 1180 mg/L 5 min EC50 = 1500 mg/L 15 min EC50 = 5870 mg/L 15 min EC50 = 7400 mg/L 2 h	EC50 = 717 mg/L/48h

**Persistence and Degradability** Persistence is unlikely based on information available.

**Bioaccumulation/ Accumulation** No information available.

**Mobility** Will likely be mobile in the environment due to its volatility.

Component	log Pow
Ethyl acetate	0.73

### 13. Disposal considerations

**Waste Disposal Methods** Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. Chemical waste generators must also consult local, regional, and national hazardous waste regulations to ensure complete and accurate classification.

Component	RCRA - U Series Wastes	RCRA - P Series Wastes
Ethyl acetate - 141-78-6	U112	-

### 14. Transport information

#### DOT

UN-No UN1173  
 Proper Shipping Name ETHYL ACETATE  
 Hazard Class 3  
 Packing Group II

#### TDG

UN-No UN1173  
 Proper Shipping Name ETHYL ACETATE  
 Hazard Class 3  
 Packing Group II

#### IATA

UN-No UN1173  
 Proper Shipping Name ETHYL ACETATE  
 Hazard Class 3  
 Packing Group II

#### IMDG/IMO

UN-No UN1173  
 Proper Shipping Name ETHYL ACETATE  
 Hazard Class 3  
 Packing Group II

### 15. Regulatory information

#### International Inventories

Component	CAS-No	DSL	NDSL	TSCA	TSCA Inventory notification - Active-Inactive	EINECS	ELINCS	NLP
Ethyl acetate	141-78-6	X	-	X	ACTIVE	205-500-4	-	-

Component	CAS-No	IECSC	KECL	ENCS	ISHL	TCSI	AICS	NZIoC	PICCS
Ethyl acetate	141-78-6	X	KE-00047	X	X	X	X	X	X

#### Legend:

X - Listed '-' - Not listed

KECL - NIER number or KE number (<http://ncis.nier.go.kr/en/main.do>)

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances

IECSC - Chinese Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

ENCS - Japanese Existing and New Chemical Substances

AICS - Australian Inventory of Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

#### Canada

SDS in compliance with provisions of information as set out in Canadian Standard - Part 4, Schedule 1 and 2 of the Hazardous Products Regulations (HPR) and its amendments and meets the requirements of the HPR (Paragraph 13(1)(a) of the revised Hazardous Products Act (HPA)).

Component	Canada - National Pollutant Release Inventory (NPRI)	Canadian Environmental Protection Agency (CEPA) - List of Toxic Substances	Canada's Chemicals Management Plan (CEPA)
Ethyl acetate	Part 5, Individual Substances Part 4 Substance		

#### Other International Regulations

#### Authorisation/Restrictions according to EU REACH

Component	REACH (1907/2006) - Annex XIV - Substances Subject to Authorization	REACH (1907/2006) - Annex XVII - Restrictions on Certain Dangerous Substances	REACH Regulation (EC 1907/2006) article 59 - Candidate List of Substances of Very High Concern (SVHC)
Ethyl acetate	-	Use restricted. See entry 75. (see link for restriction details)	-

#### REACH links

<https://echa.europa.eu/substances-restricted-under-reach>

#### Contains component(s) that meet a 'definition' of per & poly fluoroalkyl substance (PFAS)?

Not applicable

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

Component	CAS-No	OECD HPV	Persistent Organic Pollutant	Ozone Depletion Potential	Restriction of Hazardous Substances (RoHS)
Ethyl acetate	141-78-6	Listed	Not applicable	Not applicable	Not applicable

Component	CAS-No	Seveso III Directive (2012/18/EC) - Qualifying Quantities for Major Accident Notification	Seveso III Directive (2012/18/EC) - Qualifying Quantities for Safety Report Requirements	Rotterdam Convention (PIC)	Basel Convention (Hazardous Waste)
Ethyl acetate	141-78-6	Not applicable	Not applicable	Not applicable	Annex I - Y42

## 16. Other information

#### Prepared By

Product stewardship (Regulatory Affairs)  
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#### Creation Date

13-October-2009

#### Revision Date

18-December-2025

#### Print Date

18-December-2025

#### Revision Summary

This document has been updated to comply with the requirements of WHMIS 2015 which includes the amended Hazardous Products Act (HPA) and the Hazardous Products Regulation (HPR) to align with the Globally Harmonised System (GHS) (V7/8) for the Classification and Labelling of Chemicals.

#### 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 SDS**