



### 1. PRODUCT AND COMPANY IDENTIFICATION

#### 1.1 Product identifiers

Product name : CSE, from *Escherichia coli* O113:H10  
Product Number : PN000249, EC010-5

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

Identified uses : Laboratory chemical/standard

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

Company : Associates of Cape Cod, Inc.  
124 Bernard E. St. Jean Drive  
East Falmouth, MA 02536  
USA

Telephone : +1 888-395-2221  
: +1 508-540-3444

#### 1.4 Emergency telephone number

Emergency Phone # : (800) 424-9300 Chemtrec® Domestic North America  
: (703) 527-3887 Chemtrec® International

### 2. HAZARDS IDENTIFICATION

#### 2.1 Classification of the substance or mixture

**GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)**

**Acute toxicity, Oral (Category 2)**

#### 2.2 GHS Label elements, including precautionary statements

Pictogram



Signal word

**Danger**

#### Hazard statement(s)

- Fatal if swallowed

#### Precautionary statement(s)

- Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.
- Wash skin thoroughly after handling.
- Do not eat, drink or smoke when using this product.
- Use only in a well-ventilated area.
- Wear protective gloves/ protective clothing/ eye protection.
- Obtain special instructions before use. Do not handle until all safety precautions have been read and understood.
- If exposed or concerned: Get medical advice/attention.
- IF SWALLOWED: Call a POISON CENTER or doctor/ physician if you feel unwell. Rinse mouth.



- IF ON SKIN: Wash with plenty of soap and water. Call a POISONCENTER or doctor/ physician if you feel unwell.
- IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor/ physician if you feel unwell.
- Wash contaminated clothing before reuse.
- Store product in locked container. Dispose of contents/ container to an approved waste disposal plant in accordance with local/regional/national/international regulations.

### 2.3 Hazards not otherwise classified (HNOC) or not covered by GHS

- This material is a bioinfectious substance under HNOC

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

### 3.1 Substances

CAS Registry Number : 93572-42-0

## 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 inhaled, 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. Consult a physician.

#### If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Take victim immediately to hospital. 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 section 2.2 and in section 11

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

No data available

## 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

Nature of decomposition products not known.

### 5.3 Advice for firefighters

Wear self-contained breathing apparatus for fire-fighting if necessary.



### 5.4 Further information

No data available.

## 6. ACCIDENTAL RELEASE MEASURES

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

Wear respiratory protection. Avoid breathing vapors or mist. Ensure adequate ventilation. Evacuate personnel to safe areas.

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.

## 7. HANDLING AND STORAGE

### 7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid formation of aerosols.

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.

Recommended storage temperature 2 - 8 °C.

Keep in a dry place.

Storage class (TRGS 510): Non-combustible, acute toxic Cat. 2 toxic hazardous materials

### 7.3 Specific end use(s)

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

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### 8.1 Control parameters

#### Exposure Guidelines

Contains no substances with occupational exposure limit values.

### 8.2 Exposure controls

Avoid contact with skin, eyes and clothing. Wash hands before breaks and immediately after handling the product.

#### 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.

### 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

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.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

### 9.1 Information on basic physical and chemical properties

a) Appearance	Form: film, lyophilized
b) Odor	No data available
c) Odor 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	No data available
h) Evaporation rate	No data available
i) Flammability (solid, gas)	No data available
j) Upper/lower flammability or explosive limits	No data available
k) Vapor pressure	No data available
l) Vapor 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

## 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

Strong oxidizing agents

### 10.6 Hazardous decomposition products

Other decomposition products - No data available.

In the event of fire: see section 5

## 11. TOXICOLOGICAL INFORMATION

### 11.1 Information on toxicological effects

#### Acute toxicity

TYPE OF TEST	: LD50 - Lethal dose, 50 percent kill
ROUTE OF EXPOSURE	: Oral
SPECIES OBSERVED	: Rodent - rat
DOSE/DURATION	: 48300 µg/kg
TOXIC EFFECTS	: Details of toxic effects not reported other than lethal dose value
REFERENCE	: KBIJEK Korean Biochemical Journal. (Biochemical Society of the Republic of Korea, POB 226, Mapo, Seoul, 121-600, South Korea) V. 26(4)-1993-Volume (issue)/page/year: 27, 413, 1994

Inhalation: No data available

Dermal: No data available

#### Symptoms

Fever - this is a bioinfectious material.

#### Skin corrosion/irritation

No data available

#### Serious eye damage/eye irritation

No data available

#### Respiratory or skin sensitization

No data available

#### Germ cell mutagenicity

Mutagenic effects

#### Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

ACGIH: No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.

NTP: No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

OSHA: No component of this product present at levels greater than or equal to 0.1% is identified



as a carcinogen or potential carcinogen by OSHA.

**Reproductive toxicity**

May cause reproductive disorders

**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: Not available

---

## 12. ECOLOGICAL INFORMATION

### 12.1 Toxicity

No data available.

### 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.

---

## 13. DISPOSAL CONSIDERATIONS

### 13.1 Waste treatment methods

**Product**

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

**Contaminated packaging**

Dispose of as unused product.

---

## 14. TRANSPORT INFORMATION

**DOT (US)**

Not Regulated

**IMDG**



## SAFETY DATA SHEET

Version 1  
Revision Date 04 Dec 2017

Not Regulated

**IATA**

Not Regulated

### 15. REGULATORY INFORMATION

#### SARA 302 Components

No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

#### SARA 313 Components

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

#### SARA 311/312 Hazards

Acute Health Hazard, Chronic Health Hazard

#### Massachusetts Right To Know Components

No components are subject to the Massachusetts Right to Know Act.

#### Pennsylvania Right To Know Components

Lipopolysaccharides from Escherichia coli

CAS-No.	Revision Date
93572-42-0	

#### New Jersey Right To Know Components

Lipopolysaccharides from Escherichia coli

CAS-No.	Revision Date
93572-42-0	

#### California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

### 16. OTHER INFORMATION

#### HMIS Rating

Health hazard:	3
Flammability:	0
Physical Hazard	0

#### NFPA Rating

Health hazard:	3
Fire Hazard:	0
Reactivity Hazard:	0

#### Further information

Associates of Cape Cod, Inc. (ACC). All rights reserved. The above information is believed to be current and accurate; however, ACC makes no warranty of any type with respect to such information and assumes no liability for any loss or injury which may result from the use of this information. Users should conduct their own investigations to determine the suitability of the information for their intended use.

#### Preparation Information

Associates of Cape Cod, Inc.

Version: 01

SDS CSE