

## 1. Identification

|   |  |                |
|---|--|----------------|
| <b>Product identifier</b>                                     | <b>Sesamin EC</b>  |                |
| <b>Other means of identification</b>                          |  |                |
| <b>Product code</b>   | 19006  |                |
| <b>Recommended use</b>  | Agricultural/ Horticultural Use- Nematicide- Refer to product label.   |                |
| <b>Recommended restrictions</b>                               | Refer to product label.  |                |
| <b>Manufacturer/Importer/Supplier/Distributor information</b> |  |                |
| <b>Manufacturer</b>   |  |                |
| <b>Company name</b>   | Brandt Consolidated, Inc.  |                |
| <b>Address</b>  | 2935 South Koke Mill Road<br>Springfield, IL 62711<br>United States  |                |
| <b>Telephone</b>  | Corporate Office   | 1-217-547-5800 |
| <b>Website</b>  | www.brandt.co  |                |
| <b>E-mail</b>   | msds@brandt.co   |                |
| <b>Contact person</b>   | EH&S / Regulatory Department   |                |
| <b>Emergency phone number</b>                                 | CHEMTREC (24 hours):<br>USA, Canada, Puerto Rico 1-800-424-9300<br>Virgin Islands 1-800-424-9300<br>International Maritime +1 (703) 527-3887 |                |

## 2. Hazard(s) identification

|                       |                                   |            |
|-----------------------|-----------------------------------|------------|
| Physical hazards      | Not classified.                   |            |
| Health hazards        | Skin corrosion/irritation         | Category 2 |
|                       | Serious eye damage/eye irritation | Category 2 |
| Environmental hazards | Not classified.                   |            |
| OSHA defined hazards  | Not classified.                   |            |
| Label elements        |                                   |            |



|  |   |
|--|---|
| <b>Signal word</b>                               | Warning   |
| <b>Hazard statement</b>                          | Causes skin irritation. Causes serious eye irritation.  |
| <b>Precautionary statement</b>                   |   |
| <b>Prevention</b>                                | Wear eye/face protection. Wash thoroughly after handling. Wear protective gloves.   |
| <b>Response</b>                                  | If on skin: Wash with plenty of water. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Specific treatment (see this label). If skin irritation occurs: Get medical advice/attention. If eye irritation persists: Get medical advice/attention. Take off contaminated clothing and wash before reuse. |
| <b>Storage</b>                                   | Store away from incompatible materials.   |
| <b>Disposal</b>                                  | Dispose of waste and residues in accordance with local authority requirements.  |
| <b>Hazard(s) not otherwise classified (HNOC)</b> | None known.   |
| <b>Supplemental information</b>                  | None.   |

## 3. Composition/information on ingredients

### Mixtures

| Chemical name | Common name and synonyms | CAS number | %  |
|---------------|--------------------------|------------|----|
| Sesame Oil    |                          | 8008-74-0  | 70 |
| Soya Lecithin |                          | 138-22-7   | 30 |

\*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

## 4. First-aid measures

|   |   |
|---|---|
| <b>Inhalation</b>   | Move to fresh air. Call a physician if symptoms develop or persist.   |
| <b>Skin contact</b>   | Remove contaminated clothing. Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention. Wash contaminated clothing before reuse.                                 |
| <b>Eye contact</b>  | Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists. |
| <b>Ingestion</b>  | Rinse mouth. Get medical attention if symptoms occur.   |
| <b>Most important symptoms/effects, acute and delayed</b>                     | Symptoms may include stinging, tearing, redness, swelling, and blurred vision. May cause redness and pain. Severe eye irritation.   |
| <b>Indication of immediate medical attention and special treatment needed</b> | Provide general supportive measures and treat symptomatically. Keep victim under observation. Symptoms may be delayed.  |
| <b>General information</b>  | Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.  |

## 5. Fire-fighting measures

|  |   |
|--|---|
| <b>Suitable extinguishing media</b>                                  | Water fog. Foam. Dry chemical powder. Carbon dioxide (CO2).                                   |
| <b>Unsuitable extinguishing media</b>                                | Do not use water jet as an extinguisher, as this will spread the fire.                        |
| <b>Specific hazards arising from the chemical</b>                    | During fire, gases hazardous to health may be formed.   |
| <b>Special protective equipment and precautions for firefighters</b> | Self-contained breathing apparatus and full protective clothing must be worn in case of fire. |
| <b>Fire fighting equipment/instructions</b>                          | Move containers from fire area if you can do so without risk.                                 |
| <b>Specific methods</b>  | Use standard firefighting procedures and consider the hazards of other involved materials.    |
| <b>General fire hazards</b>  | No unusual fire or explosion hazards noted.   |

## 6. Accidental release measures

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| <b>Personal precautions, protective equipment and emergency procedures</b> | Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Keep out of low areas. Wear appropriate protective equipment and clothing during clean-up. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see section 8 of the SDS.  |
| <b>Methods and materials for containment and cleaning up</b>               | <p>Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Cover with plastic sheet to prevent spreading. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.</p> <p>Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.</p> <p>Never return spills to original containers for re-use. Prevent entry into waterways, sewer, basements or confined areas. For waste disposal, see section 13 of the SDS.</p> |
| <b>Environmental precautions</b>   | Avoid discharge into drains, water courses or onto the ground.   |

## 7. Handling and storage

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|---|--|
| <b>Precautions for safe handling</b>                                | Avoid contact with eyes. Avoid contact with eyes, skin, and clothing. Avoid prolonged exposure. Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices. |
| <b>Conditions for safe storage, including any incompatibilities</b> | Store in original tightly closed container. Keep container tightly closed. Store away from incompatible materials (see Section 10 of the SDS).   |

## 8. Exposure controls/personal protection

### Occupational exposure limits

#### US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

| Components                 | Type | Value    | Form                 |
|----------------------------|------|----------|----------------------|
| Sesame Oil (CAS 8008-74-0) | PEL  | 5 mg/m3  | Respirable fraction. |
|                            |      | 15 mg/m3 | Total dust.          |

#### US. ACGIH Threshold Limit Values

| Components                   | Type | Value |
|------------------------------|------|-------|
| Soya Lecithin (CAS 138-22-7) | TWA  | 5 ppm |

#### US. NIOSH: Pocket Guide to Chemical Hazards

| Components                   | Type | Value    | Form        |
|------------------------------|------|----------|-------------|
| Sesame Oil (CAS 8008-74-0)   | TWA  | 5 mg/m3  | Respirable. |
|                              |      | 10 mg/m3 | Mist.       |
| Soya Lecithin (CAS 138-22-7) | TWA  | 25 mg/m3 |             |
|                              |      | 5 ppm    |             |

### Biological limit values

No biological exposure limits noted for the ingredient(s).

### Appropriate engineering controls

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Eye wash facilities and emergency shower must be available when handling this product.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** Wear safety glasses with side shields (or goggles).

#### Skin protection

**Hand protection** Wear appropriate chemical resistant gloves.

**Other** Wear appropriate chemical resistant clothing.

**Respiratory protection** In case of insufficient ventilation, wear suitable respiratory equipment. Respiratory protection not required.

**Thermal hazards** Wear appropriate thermal protective clothing, when necessary.

### General hygiene considerations

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.

## 9. Physical and chemical properties

|                       |                           |
|-----------------------|---------------------------|
| <b>Appearance</b>     | Liquid.                   |
| <b>Physical state</b> | Liquid.                   |
| <b>Form</b>           | Liquid.                   |
| <b>Color</b>          | Yellow to Brown. or Amber |

**Odor** Slight. Oily.

**Odor threshold** Not available.

**pH** 6.6

**Melting point/freezing point** 32 °F (0 °C)

**Initial boiling point and boiling range** Not available.

**Flash point** Not available.

**Evaporation rate** Not available.

**Flammability (solid, gas)** Not available.

### Upper/lower flammability or explosive limits

**Flammability limit - lower (%)** Not available.

|   |                      |
|---|----------------------|
| Flammability limit - upper (%)          | Not available.       |
| Explosive limit - lower (%)             | Not available.       |
| Explosive limit - upper (%)             | Not available.       |
| Vapor pressure                          | Not available.       |
| Vapor density                           | Not available.       |
| Relative density                        | 0.949 g/ml (typical) |
| Solubility(ies)                         |                      |
| Solubility (water)                      | Not available.       |
| Partition coefficient (n-octanol/water) | Not available.       |
| Auto-ignition temperature               | Not available.       |
| Decomposition temperature               | Not available.       |
| Viscosity                               | Not available.       |
| Other information                       |                      |
| Density                                 | 0.90 g/cm3 estimated |
| Specific gravity                        | 0.9 estimated        |

## 10. Stability and reactivity

|                                    |   |
|------------------------------------|---|
| Reactivity                         | The product is stable and non-reactive under normal conditions of use, storage and transport. |
| Chemical stability                 | Material is stable under normal conditions.   |
| Possibility of hazardous reactions | No dangerous reaction known under conditions of normal use.                                   |
| Conditions to avoid                | Avoid temperatures exceeding the flash point. Contact with incompatible materials.            |
| Incompatible materials             | Strong acids. Strong oxidizing agents.  |
| Hazardous decomposition products   | No hazardous decomposition products are known.  |

## 11. Toxicological information

### Information on likely routes of exposure

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| Inhalation   | Prolonged inhalation may be harmful.   |
| Skin contact   | Causes skin irritation.  |
| Eye contact  | Causes serious eye irritation.   |
| Ingestion  | Expected to be a low ingestion hazard.   |
| Symptoms related to the physical, chemical and toxicological characteristics | Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Skin irritation. Severe eye irritation. May cause redness and pain. |

### Information on toxicological effects

#### Acute toxicity

| Product      | Species | Test Results |
|--------------|---------|--------------|
| Sesamin EC   |         |              |
| <u>Acute</u> |         |              |
| Dermal       |         |              |
| Liquid       |         |              |
| LD50         | Rat     | > 2000 mg/kg |
| Inhalation   |         |              |
| Liquid       |         |              |
| LC50         | Rat     | > 2.07 mg/kg |

| Product                              | Species | Test Results |
|--------------------------------------|---------|--------------|
| <b>Oral</b><br><i>Liquid</i><br>LD50 | Rat     | > 5000 mg/kg |

\* Estimates for product may be based on additional component data not shown.

|   |  |
|---|--|
| <b>Skin corrosion/irritation</b>                                      | Causes skin irritation.  |
| <b>Serious eye damage/eye irritation</b>                              | Causes serious eye irritation.   |
| <b>Respiratory or skin sensitization</b>                              |  |
| <b>Respiratory sensitization</b>                                      | Not available.   |
| <b>Skin sensitization</b>   | This product is not expected to cause skin sensitization.  |
| <b>Germ cell mutagenicity</b>   | No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic. |
| <b>Carcinogenicity</b>  | This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.                                  |
| <b>IARC Monographs. Overall Evaluation of Carcinogenicity</b>         |  |
| Not listed.   |  |
| <b>OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)</b> |  |
| Not regulated.  |  |
| <b>US. National Toxicology Program (NTP) Report on Carcinogens</b>    |  |
| Not listed.   |  |
| <b>Reproductive toxicity</b>  | This product is not expected to cause reproductive or developmental effects.                                     |
| <b>Specific target organ toxicity - single exposure</b>               | Not classified.  |
| <b>Specific target organ toxicity - repeated exposure</b>             | Not classified.  |
| <b>Aspiration hazard</b>  | Not available.   |
| <b>Chronic effects</b>  | Prolonged inhalation may be harmful.   |

## 12. Ecological information

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|--------------------|--|
| <b>Ecotoxicity</b> | The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment. |
|--------------------|--|

| Product                      |      | Species                    | Test Results             |
|------------------------------|------|----------------------------|--------------------------|
| Sesamin EC                   |      |                            |                          |
| Aquatic                      |      |                            |                          |
| Acute                        |      |                            |                          |
| Crustacea                    | EC50 | Daphnia                    | 1066.6666 mg/l, 48 hours |
| Fish                         | LC50 | Fish                       | 186.6667 mg/l, 96 hours  |
| Components                   |      | Species                    | Test Results             |
| Soya Lecithin (CAS 138-22-7) |      |                            |                          |
| Aquatic                      |      |                            |                          |
| Crustacea                    | EC50 | Water flea (Daphnia magna) | 320 - 399 mg/l, 48 hours |
| Fish                         | LC50 | Zebra danio (Danio rerio)  | 56 - 100 mg/l, 96 hours  |

\* Estimates for product may be based on additional component data not shown.

|                                      |   |
|--------------------------------------|---|
| <b>Persistence and degradability</b> | No data is available on the degradability of this product.  |
| <b>Bioaccumulative potential</b>     | Not available.  |
| <b>Mobility in soil</b>              | No data available.  |
| <b>Other adverse effects</b>         | No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component. |

## 13. Disposal considerations

|                              |  |
|------------------------------|--|
| <b>Disposal instructions</b> | Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local/regional/national/international regulations. |
|------------------------------|--|

|  |  |
|--|--|
| <b>Local disposal regulations</b>            | Dispose in accordance with all applicable regulations.   |
| <b>Hazardous waste code</b>                  | The waste code should be assigned in discussion between the user, the producer and the waste disposal company.   |
| <b>Waste from residues / unused products</b> | Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions). |
| <b>Contaminated packaging</b>                | Empty containers should be taken to an approved waste handling site for recycling or disposal. Since emptied containers may retain product residue, follow label warnings even after container is emptied.       |

## 14. Transport information

### DOT

Not regulated as dangerous goods.

### IATA

Not regulated as dangerous goods.

### IMDG

Not regulated as dangerous goods.

## 15. Regulatory information

**US federal regulations** This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

### **TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)**

Not regulated.

### **CERCLA Hazardous Substance List (40 CFR 302.4)**

Not listed.

### **SARA 304 Emergency release notification**

Not regulated.

### **OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)**

Not regulated.

### **Superfund Amendments and Reauthorization Act of 1986 (SARA)**

#### **Hazard categories**

Immediate Hazard - Yes  
Delayed Hazard - No  
Fire Hazard - No  
Pressure Hazard - No  
Reactivity Hazard - No

#### **SARA 302 Extremely hazardous substance**

Not listed.

**SARA 311/312 Hazardous chemical** No

#### **SARA 313 (TRI reporting)**

Not regulated.

### **Other federal regulations**

#### **Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List**

Not regulated.

#### **Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)**

Not regulated.

**Safe Drinking Water Act (SDWA)** Not regulated.

#### **FEMA Priority Substances Respiratory Health and Safety in the Flavor Manufacturing Workplace**

Soya Lecithin (CAS 138-22-7)

Other Flavoring Substances with OSHA PEL's

### **US state regulations**

#### **US. California Controlled Substances. CA Department of Justice (California Health and Safety Code Section 11100)**

Not listed.

#### **US. Massachusetts RTK - Substance List**

Sesame Oil (CAS 8008-74-0)

Soya Lecithin (CAS 138-22-7)

**US. New Jersey Worker and Community Right-to-Know Act**

Soya Lecithin (CAS 138-22-7)

**US. Pennsylvania Worker and Community Right-to-Know Law**

Sesame Oil (CAS 8008-74-0)

Soya Lecithin (CAS 138-22-7)

**US. Rhode Island RTK**

Not regulated.

**US. California Proposition 65**

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

**International Inventories**

| Country(s) or region        | Inventory name   | On inventory (yes/no)* |
|-----------------------------|--|------------------------|
| Australia                   | Australian Inventory of Chemical Substances (AICS)                     | Yes                    |
| Canada                      | Domestic Substances List (DSL)   | Yes                    |
| Canada                      | Non-Domestic Substances List (NDSL)                                    | No                     |
| China                       | Inventory of Existing Chemical Substances in China (IECSC)             | Yes                    |
| Europe                      | European Inventory of Existing Commercial Chemical Substances (EINECS) | Yes                    |
| Europe                      | European List of Notified Chemical Substances (ELINCS)                 | No                     |
| Japan                       | Inventory of Existing and New Chemical Substances (ENCS)               | No                     |
| Korea                       | Existing Chemicals List (ECL)  | Yes                    |
| New Zealand                 | New Zealand Inventory  | Yes                    |
| Philippines                 | Philippine Inventory of Chemicals and Chemical Substances (PICCS)      | Yes                    |
| United States & Puerto Rico | Toxic Substances Control Act (TSCA) Inventory                          | Yes                    |

\*A "Yes" indicates that all components of this product comply with the inventory requirements administered by the governing country(s)

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

**16. Other information, including date of preparation or last revision**

**Issue date** 04-27-2016

**Version #** 01

**Disclaimer** The information provided in this Safety Data Sheet is correct to the best of Manufacturer's knowledge, information and belief at the date of its publication; however, it is provided only as a guidance for safe handling, use, processing, storage, transportation, disposal and release of the Product. No warranties of any kind, either expressed or implied, including warranties of merchantability or fitness for a particular purpose, are made with respect to the Product or the information provided herein, or that the Product or information herein may be used without infringing the intellectual property rights of others. The information provided in this Safety Data Sheet relates only to the specific Product designated and may not be valid if the Product is used in combination with other materials or in any other process, unless specified herein. The user assumes all risk and liability for loss, injury, damage or expense due to any use, handling, storage or disposal of the Product, and Manufacturer recommends that the user conducts its own tests of the Product to determine suitability of the Product for user's particular use.