

## 1. Identification

|   |   |                 |
|---|---|-----------------|
| <b>Product identifier</b>                                     | <b>Pesticide Standard Mixture B</b>                       |                 |
| <b>Other means of identification</b>                          |   |                 |
| <b>Item</b>   | M-CLP19AC99   |                 |
| <b>Recommended use</b>  | For Laboratory Use Only                                   |                 |
| <b>Recommended restrictions</b>                               | None known.   |                 |
| <b>Manufacturer/Importer/Supplier/Distributor information</b> |   |                 |
| <b>Manufacturer</b>   |   |                 |
| <b>Company name</b>   | Chem Service, Inc.  |                 |
| <b>Address</b>  | 660 Tower Lane<br>West Chester, PA 19380<br>United States |                 |
| <b>Telephone</b>  | Toll Free   | 800-452-9994    |
|   | Direct  | 610-692-3026    |
| <b>Website</b>  | www.chemservice.com                                       |                 |
| <b>E-mail</b>   | info@chemservice.com                                      |                 |
| <b>Emergency phone number</b>                                 | Chemtrec US   | 800-424-9300    |
|   | Chemtrec outside US                                       | +1 703-527-3887 |

## 2. Hazard(s) identification

|                              |  |                             |
|------------------------------|--|-----------------------------|
| <b>Physical hazards</b>      | Flammable liquids                                      | Category 2                  |
| <b>Health hazards</b>        | Acute toxicity, oral                                   | Category 2                  |
|                              | Acute toxicity, inhalation                             | Category 4                  |
|                              | Skin corrosion/irritation                              | Category 2                  |
|                              | Serious eye damage/eye irritation                      | Category 2A                 |
|                              | Reproductive toxicity (fertility, the unborn child)    | Category 2                  |
|                              | Specific target organ toxicity, single exposure        | Category 3 narcotic effects |
|                              | Specific target organ toxicity, repeated exposure      | Category 1                  |
| <b>Environmental hazards</b> | Hazardous to the aquatic environment, acute hazard     | Category 1                  |
|                              | Hazardous to the aquatic environment, long-term hazard | Category 2                  |
| <b>OSHA defined hazards</b>  | Not classified.  |                             |

### Label elements



|                                |   |
|--------------------------------|---|
| <b>Signal word</b>             | Danger  |
| <b>Hazard statement</b>        | Highly flammable liquid and vapor. Fatal if swallowed. Causes skin irritation. Causes serious eye irritation. Harmful if inhaled. May cause drowsiness or dizziness. Suspected of damaging fertility. Suspected of damaging the unborn child. Causes damage to organs through prolonged or repeated exposure. Very toxic to aquatic life. Toxic to aquatic life with long lasting effects.  |
| <b>Precautionary statement</b> |   |
| <b>Prevention</b>              | Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Use only outdoors or in a well-ventilated area. Keep container tightly closed. Ground/bond container and receiving equipment. Use explosion-proof electrical/ventilating/lighting equipment. Use only non-sparking tools. Take precautionary measures against static discharge. Do not breathe the mist or vapor. Wash thoroughly after handling. Do not eat, drink or smoke when using this product. Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection. |

|  |  |
|--|--|
| <b>Response</b>                                  | If swallowed: Immediately call a poison center/doctor. If on skin (or hair): Take off immediately all contaminated clothing. Rinse skin with water/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. If exposed or concerned: Get medical advice/attention. Call a poison center/doctor if you feel unwell. Specific treatment (see this label). Rinse mouth. If skin irritation occurs: Get medical advice/attention. If eye irritation persists: Get medical advice/attention. Take off contaminated clothing and wash before reuse. In case of fire: Use appropriate media to extinguish. Collect spillage. |
| <b>Storage</b>                                   | Store in a well-ventilated place. Keep container tightly closed. Store in a well-ventilated place. Keep cool. Store locked up.   |
| <b>Disposal</b>                                  | Dispose of contents/container in accordance with local/regional/national/international regulations.  |
| <b>Hazard(s) not otherwise classified (HNOC)</b> | Static accumulating flammable liquid can become electrostatically charged even in bonded and grounded equipment. Sparks may ignite liquid and vapor. May cause flash fire or explosion.  |
| <b>Supplemental information</b>                  | 0.05% of the mixture consists of component(s) of unknown acute oral toxicity. 0.09% of the mixture consists of component(s) of unknown acute inhalation toxicity. 0.07% of the mixture consists of component(s) of unknown acute hazards to the aquatic environment. 0.07% of the mixture consists of component(s) of unknown long-term hazards to the aquatic environment.  |

### 3. Composition/information on ingredients

#### Mixtures

| Chemical name                 | Common name and synonyms | CAS number | %     |
|-------------------------------|--------------------------|------------|-------|
| n-Hexane                      |                          | 110-54-3   | 49-50 |
| Toluene                       |                          | 108-88-3   | 49-50 |
| 4,4'-DDE                      |                          | 72-55-9    | 0.02  |
| b-Endosulfan                  |                          | 33213-65-9 | 0.02  |
| Decachlorobiphenyl            |                          | 2051-24-3  | 0.02  |
| Endosulfan sulfate            |                          | 1031-07-8  | 0.02  |
| Endrin aldehyde               |                          | 7421-93-4  | 0.02  |
| Endrin ketone                 |                          | 53494-70-5 | 0.02  |
| Hydroquinone                  |                          | 123-31-9   | 0.02  |
| 2,4,5,6-Tetrachloro-m-xylene  |                          | 877-09-8   | 0.01  |
| Aldrin (TM)                   |                          | 309-00-2   | 0.01  |
| BHC (beta isomer)             |                          | 319-85-7   | 0.01  |
| BHC (delta isomer)            |                          | 319-86-8   | 0.01  |
| cis-Chlordane                 |                          | 5103-71-9  | 0.01  |
| Heptachlor epoxide (Isomer B) |                          | 1024-57-3  | 0.01  |
| trans-Chlordane               |                          | 5103-74-2  | 0.01  |

\*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>   | Remove victim to fresh air and keep at rest in a position comfortable for breathing. Oxygen or artificial respiration if needed. Do not use mouth-to-mouth method if victim inhaled the substance. Induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. Call a POISON CENTER or doctor/physician if you feel unwell.                                |
| <b>Skin contact</b>   | Take off immediately all contaminated clothing. Rinse skin with water/shower. If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash 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>  | Call a physician or poison control center immediately. Rinse mouth. Do not induce vomiting without advice from poison control center. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs. Do not use mouth-to-mouth method if victim ingested the substance. Induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. |
| <b>Most important symptoms/effects, acute and delayed</b>                     | Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Skin irritation. Vapors have a narcotic effect and may cause headache, fatigue, dizziness and nausea. May cause redness and pain. Prolonged exposure may cause chronic effects.   |
| <b>Indication of immediate medical attention and special treatment needed</b> | Provide general supportive measures and treat symptomatically. Thermal burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. In case of shortness of breath, give oxygen. Keep victim warm. Keep victim under observation. Symptoms may be delayed.   |

|  |   |
|--|---|
| <b>General information</b>   | Take off all contaminated clothing immediately. IF exposed or concerned: Get medical advice/attention. Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. Wash contaminated clothing before reuse.  |
| <b>5. Fire-fighting measures</b>   |   |
| <b>Suitable extinguishing media</b>  | Water fog. Foam. Carbon dioxide (CO <sub>2</sub> ). Dry chemical powder, carbon dioxide, sand or earth may be used for small fires only.  |
| <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>                          | Vapors may form explosive mixtures with air. Vapors may travel considerable distance to a source of ignition and flash back. This product is a poor conductor of electricity and can become electrostatically charged. If sufficient charge is accumulated, ignition of flammable mixtures can occur. To reduce potential for static discharge, use proper bonding and grounding procedures. This liquid may accumulate static electricity when filling properly grounded containers. Static electricity accumulation may be significantly increased by the presence of small quantities of water or other contaminants. Material will float and may ignite on surface of water. 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>                                | In case of fire and/or explosion do not breathe fumes. 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>  | Highly flammable liquid and vapor.  |
| <b>6. Accidental release measures</b>                                      |   |
| <b>Personal precautions, protective equipment and emergency procedures</b> | Immediately evacuate personnel to safe areas. Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Keep out of low areas. Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area). Wear appropriate protective equipment and clothing during clean-up. Do not breathe mist or vapor. Fully encapsulating, vapor protective clothing should be worn for spills and leaks with no fire. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ventilate closed spaces before entering them. Use appropriate containment to avoid environmental contamination. Transfer by mechanical means such as vacuum truck to a salvage tank or other suitable container for recovery or safe disposal. 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>               | Eliminate all ignition sources (no smoking, flares, sparks, or flames in immediate area). Take precautionary measures against static discharge. Use only non-sparking tools. Keep combustibles (wood, paper, oil, etc.) away from spilled material. This material is classified as a water pollutant under the Clean Water Act and should be prevented from contaminating soil or from entering sewage and drainage systems which lead to waterways.<br><br>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. Use a non-combustible material like vermiculite, sand or earth to soak up the product and place into a container for later disposal. Following product recovery, flush area with water.<br><br>Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination. |
| <b>Environmental precautions</b>   | Never return spills to original containers for re-use. For waste disposal, see section 13 of the SDS. Avoid release to the environment. Contact local authorities in case of spillage to drain/aquatic environment. Prevent further leakage or spillage if safe to do so. Do not contaminate water. Avoid discharge into drains, water courses or onto the ground. Use appropriate containment to avoid environmental contamination.  |

## 7. Handling and storage

### Precautions for safe handling

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Vapors may form explosive mixtures with air. Do not handle, store or open near an open flame, sources of heat or sources of ignition. Protect material from direct sunlight. Minimize fire risks from flammable and combustible materials (including combustible dust and static accumulating liquids) or dangerous reactions with incompatible materials. Handling operations that can promote accumulation of static charges include but are not limited to: mixing, filtering, pumping at high flow rates, splash filling, creating mists or sprays, tank and container filling, tank cleaning, sampling, gauging, switch loading, vacuum truck operations. Take precautionary measures against static discharges. All equipment used when handling the product must be grounded. Use non-sparking tools and explosion-proof equipment. Do not breathe mist or vapor. Do not taste or swallow. Avoid contact with skin. Avoid contact with eyes. Avoid contact during pregnancy/while nursing. Avoid prolonged exposure. Avoid contact with clothing. Use only outdoors or in a well-ventilated area. Wear appropriate personal protective equipment. Observe good industrial hygiene practices. When using, do not eat, drink or smoke. Wash hands thoroughly after handling. Avoid release to the environment. Do not empty into drains.

For additional information on equipment bonding and grounding, refer to the Canadian Electrical Code in Canada, (CSA C22.1), or the American Petroleum Institute (API) Recommended Practice 2003, "Protection Against Ignitions Arising out of Static, Lightning, and Stray Currents" or National Fire Protection Association (NFPA) 77, "Recommended Practice on Static Electricity" or National Fire Protection Association (NFPA) 70, "National Electrical Code".

### Conditions for safe storage, including any incompatibilities

Store locked up. Keep away from heat, sparks and open flame. Prevent electrostatic charge build-up by using common bonding and grounding techniques. Avoid spark promoters. Eliminate sources of ignition. Ground/bond container and equipment. These alone may be insufficient to remove static electricity. Store in original tightly closed container. Store in a cool, dry place out of direct sunlight. Store in a well-ventilated place. Refrigeration recommended. Store away from incompatible materials (see Section 10 of the SDS). Keep in an area equipped with sprinklers.

## 8. Exposure controls/personal protection

### Occupational exposure limits

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

| Components                                    | Type | Value                 |
|---|------|-----------------------|
| Aldrin (TM) (CAS 309-00-2)                    | PEL  | 0.25 mg/m3            |
| cis-Chlordane (CAS 5103-71-9)                 | PEL  | 0.5 mg/m3             |
| Decachlorobiphenyl (CAS 2051-24-3)            | PEL  | 1 mg/m3               |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | PEL  | 0.5 mg/m3             |
| Hydroquinone (CAS 123-31-9)                   | PEL  | 2 mg/m3               |
| n-Hexane (CAS 110-54-3)                       | PEL  | 1800 mg/m3<br>500 ppm |
| trans-Chlordane (CAS 5103-74-2)               | PEL  | 0.5 mg/m3             |

#### US. OSHA Table Z-2 (29 CFR 1910.1000)

| Components             | Type    | Value   |
|------------------------|---------|---------|
| Toluene (CAS 108-88-3) | Ceiling | 300 ppm |
|                        | TWA     | 200 ppm |

#### US. ACGIH Threshold Limit Values

| Components                                    | Type | Value      | Form                          |
|---|------|------------|-------------------------------|
| Aldrin (TM) (CAS 309-00-2)                    | TWA  | 0.05 mg/m3 | Inhalable fraction and vapor. |
| b-Endosulfan (CAS 33213-65-9)                 | TWA  | 0.1 mg/m3  | Inhalable fraction and vapor. |
| cis-Chlordane (CAS 5103-71-9)                 | TWA  | 0.5 mg/m3  |                               |
| Decachlorobiphenyl (CAS 2051-24-3)            | TWA  | 1 mg/m3    |                               |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | TWA  | 0.05 mg/m3 |                               |
| Hydroquinone (CAS 123-31-9)                   | TWA  | 1 mg/m3    |                               |
| n-Hexane (CAS 110-54-3)                       | TWA  | 50 ppm     |                               |
| Toluene (CAS 108-88-3)                        | TWA  | 20 ppm     |                               |

**US. ACGIH Threshold Limit Values**

| Components                      | Type | Value     | Form |
|---------------------------------|------|-----------|------|
| trans-Chlordane (CAS 5103-74-2) | TWA  | 0.5 mg/m3 |      |

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

| Components                                    | Type    | Value                |
|---|---------|----------------------|
| Aldrin (TM) (CAS 309-00-2)                    | TWA     | 0.25 mg/m3           |
| b-Endosulfan (CAS 33213-65-9)                 | TWA     | 0.1 mg/m3            |
| cis-Chlordane (CAS 5103-71-9)                 | TWA     | 0.5 mg/m3            |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | TWA     | 0.5 mg/m3            |
| Hydroquinone (CAS 123-31-9)                   | Ceiling | 2 mg/m3              |
| n-Hexane (CAS 110-54-3)                       | TWA     | 180 mg/m3<br>50 ppm  |
| Toluene (CAS 108-88-3)                        | STEL    | 560 mg/m3<br>150 ppm |
|   | TWA     | 375 mg/m3<br>100 ppm |
| trans-Chlordane (CAS 5103-74-2)               | TWA     | 0.5 mg/m3            |

**Biological limit values**

**ACGIH Biological Exposure Indices**

| Components              | Value     | Determinant                        | Specimen            | Sampling Time |
|-------------------------|-----------|------------------------------------|---------------------|---------------|
| n-Hexane (CAS 110-54-3) | 0.4 mg/l  | 2,5-Hexanedion, without hydrolysis | Urine               | *             |
| Toluene (CAS 108-88-3)  | 0.3 mg/g  | o-Cresol, with hydrolysis          | Creatinine in urine | *             |
|                         | 0.03 mg/l | Toluene                            | Urine               | *             |
|                         | 0.02 mg/l | Toluene                            | Blood               | *             |

\* - For sampling details, please see the source document.

**Exposure guidelines**

**US - California OELs: Skin designation**

|   |                                   |
|---|-----------------------------------|
| Aldrin (TM) (CAS 309-00-2)                    | Can be absorbed through the skin. |
| b-Endosulfan (CAS 33213-65-9)                 | Can be absorbed through the skin. |
| cis-Chlordane (CAS 5103-71-9)                 | Can be absorbed through the skin. |
| Decachlorobiphenyl (CAS 2051-24-3)            | Can be absorbed through the skin. |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Can be absorbed through the skin. |
| n-Hexane (CAS 110-54-3)                       | Can be absorbed through the skin. |
| Toluene (CAS 108-88-3)                        | Can be absorbed through the skin. |
| trans-Chlordane (CAS 5103-74-2)               | Can be absorbed through the skin. |

**US - Minnesota Haz Subs: Skin designation applies**

|   |                           |
|---|---------------------------|
| Aldrin (TM) (CAS 309-00-2)                    | Skin designation applies. |
| b-Endosulfan (CAS 33213-65-9)                 | Skin designation applies. |
| cis-Chlordane (CAS 5103-71-9)                 | Skin designation applies. |
| Decachlorobiphenyl (CAS 2051-24-3)            | Skin designation applies. |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Skin designation applies. |
| Toluene (CAS 108-88-3)                        | Skin designation applies. |
| trans-Chlordane (CAS 5103-74-2)               | Skin designation applies. |

**US - Tennessee OELs: Skin designation**

|   |                                   |
|---|-----------------------------------|
| Aldrin (TM) (CAS 309-00-2)                    | Can be absorbed through the skin. |
| b-Endosulfan (CAS 33213-65-9)                 | Can be absorbed through the skin. |
| cis-Chlordane (CAS 5103-71-9)                 | Can be absorbed through the skin. |
| Decachlorobiphenyl (CAS 2051-24-3)            | Can be absorbed through the skin. |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Can be absorbed through the skin. |
| trans-Chlordane (CAS 5103-74-2)               | Can be absorbed through the skin. |

**US ACGIH Threshold Limit Values: Skin designation**

|   |                                   |
|---|-----------------------------------|
| Aldrin (TM) (CAS 309-00-2)                    | Can be absorbed through the skin. |
| b-Endosulfan (CAS 33213-65-9)                 | Can be absorbed through the skin. |
| cis-Chlordane (CAS 5103-71-9)                 | Can be absorbed through the skin. |
| Decachlorobiphenyl (CAS 2051-24-3)            | Can be absorbed through the skin. |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Can be absorbed through the skin. |

n-Hexane (CAS 110-54-3) Can be absorbed through the skin.  
trans-Chlordane (CAS 5103-74-2) Can be absorbed through the skin.

#### US NIOSH Pocket Guide to Chemical Hazards: Skin designation

Aldrin (TM) (CAS 309-00-2) Can be absorbed through the skin.  
b-Endosulfan (CAS 33213-65-9) Can be absorbed through the skin.  
cis-Chlordane (CAS 5103-71-9) Can be absorbed through the skin.  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3) Can be absorbed through the skin.  
trans-Chlordane (CAS 5103-74-2) Can be absorbed through the skin.

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

Aldrin (TM) (CAS 309-00-2) Can be absorbed through the skin.  
cis-Chlordane (CAS 5103-71-9) Can be absorbed through the skin.  
Decachlorobiphenyl (CAS 2051-24-3) Can be absorbed through the skin.  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3) Can be absorbed through the skin.  
trans-Chlordane (CAS 5103-74-2) Can be absorbed through the skin.

**Appropriate engineering controls** Explosion-proof general and local exhaust ventilation. 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** If engineering controls do not maintain airborne concentrations below recommended exposure limits (where applicable) or to an acceptable level (in countries where exposure limits have not been established), an approved respirator must be worn.

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

**General hygiene considerations** When using, do not eat, drink or smoke. 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

### Appearance

**Physical state** Liquid.

**Form** Liquid

**Color** Not available.

**Odor** Not available.

**Odor threshold** Not available.

**pH** Not available.

**Melting point/freezing point** -138.82 °F (-94.9 °C) estimated

**Initial boiling point and boiling range** 155.66 °F (68.7 °C) estimated

**Flash point** -7.0 °F (-21.7 °C) estimated

**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** 120.09 hPa estimated

**Vapor density** Not available.

**Relative density** Not available.

### Solubility(ies)

**Solubility (water)** Not available.

|  |                           |
|--|---------------------------|
| <b>Partition coefficient (n-octanol/water)</b> | Not available.            |
| <b>Auto-ignition temperature</b>               | 437 °F (225 °C) estimated |
| <b>Decomposition temperature</b>               | Not available.            |
| <b>Viscosity</b>                               | Not available.            |
| <b>Other information</b>                       |                           |
| <b>Density</b>                                 | 0.760217 g/cm3 estimated  |
| <b>Flammability class</b>                      | Flammable IB estimated    |
| <b>Percent volatile</b>                        | 49.99 % estimated         |
| <b>Specific gravity</b>                        | 0.76 estimated            |
| <b>VOC (Weight %)</b>                          | 49.99 % estimated         |

## 10. Stability and reactivity

|   |  |
|---|--|
| <b>Reactivity</b>                         | The product is stable and non-reactive under normal conditions of use, storage and transport.  |
| <b>Chemical stability</b>                 | Material is stable under normal conditions.  |
| <b>Possibility of hazardous reactions</b> | Hazardous polymerization does not occur.   |
| <b>Conditions to avoid</b>                | Avoid heat, sparks, open flames and other ignition sources. Avoid temperatures exceeding the flash point. Contact with incompatible materials. |
| <b>Incompatible materials</b>             | Strong oxidizing agents.   |
| <b>Hazardous decomposition products</b>   | No hazardous decomposition products are known.   |

## 11. Toxicological information

### Information on likely routes of exposure

|                     |  |
|---------------------|--|
| <b>Ingestion</b>    | Fatal if swallowed.  |
| <b>Inhalation</b>   | Vapors have a narcotic effect and may cause headache, fatigue, dizziness and nausea. Harmful if inhaled. May cause damage to organs by inhalation. |
| <b>Skin contact</b> | Causes skin irritation.  |
| <b>Eye contact</b>  | Causes serious eye irritation.   |

**Symptoms related to the physical, chemical and toxicological characteristics** Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Skin irritation. May cause redness and pain. Symptoms of overexposure may be headache, dizziness, tiredness, nausea and vomiting.

### Information on toxicological effects

**Acute toxicity** Fatal if swallowed. Harmful if inhaled. Narcotic effects. Expected to be a low hazard for usual industrial or commercial handling by trained personnel.

| Components                    | Species | Test Results |
|-------------------------------|---------|--------------|
| 4,4'-DDE (CAS 72-55-9)        |         |              |
| <b>Acute</b>                  |         |              |
| <i>Oral</i>                   |         |              |
| LD50                          | Mouse   | 700 mg/kg    |
|                               | Rat     | 880 mg/kg    |
| Aldrin (TM) (CAS 309-00-2)    |         |              |
| <b>Acute</b>                  |         |              |
| <i>Dermal</i>                 |         |              |
| LD50                          | Rabbit  | 150 mg/kg    |
|                               | Rat     | 98 mg/kg     |
| <i>Oral</i>                   |         |              |
| LD50                          | Mouse   | 44 mg/kg     |
|                               | Rat     | 39 mg/kg     |
| <i>Other</i>                  |         |              |
| LD50                          | Mouse   | 21 mg/kg     |
| b-Endosulfan (CAS 33213-65-9) |         |              |
| <b>Acute</b>                  |         |              |
| <i>Dermal</i>                 |         |              |
| LD50                          | Rabbit  | 90 mg/kg     |

| Components                         | Species | Test Results       |
|------------------------------------|---------|--------------------|
|                                    | Rat     | 34 mg/kg           |
| <i>Inhalation</i>                  |         |                    |
| LC50                               | Rat     | 0.08 mg/l, 4 Hours |
| <i>Oral</i>                        |         |                    |
| LD50                               | Cat     | 2 mg/kg            |
|                                    | Dog     | 76.7 mg/kg         |
|                                    | Hamster | 118 mg/kg          |
|                                    | Mouse   | 7.36 mg/kg         |
|                                    | Rabbit  | 28 mg/kg           |
|                                    | Rat     | 18 mg/kg           |
| <i>Other</i>                       |         |                    |
| LD50                               | Hamster | 80 mg/kg           |
|                                    | Mouse   | 7 mg/kg            |
|                                    | Rabbit  | 360 mg/kg          |
|                                    | Rat     | 8 mg/kg            |
| BHC (beta isomer) (CAS 319-85-7)   |         |                    |
| <b>Acute</b>                       |         |                    |
| <i>Dermal</i>                      |         |                    |
| LD50                               | Rat     | 0.9 mg/kg          |
| <i>Oral</i>                        |         |                    |
| LD50                               | Mouse   | 1500 mg/kg         |
|                                    | Rat     | 6 g/kg             |
| <i>Other</i>                       |         |                    |
| LD50                               | Rabbit  | 75 mg/kg           |
| BHC (delta isomer) (CAS 319-86-8)  |         |                    |
| <b>Acute</b>                       |         |                    |
| <i>Dermal</i>                      |         |                    |
| LD50                               | Rat     | 0.9 mg/kg          |
| <i>Oral</i>                        |         |                    |
| LD50                               | Rat     | 1000 mg/kg         |
| <i>Other</i>                       |         |                    |
| LD50                               | Rabbit  | 75 mg/kg           |
| cis-Chlordane (CAS 5103-71-9)      |         |                    |
| <b>Acute</b>                       |         |                    |
| <i>Dermal</i>                      |         |                    |
| LD50                               | Rat     | 590 - 840 mg/kg    |
| <i>Inhalation</i>                  |         |                    |
| LC50                               | Cat     | 0.1 mg/l, 4 Hours  |
| <i>Oral</i>                        |         |                    |
| LD50                               | Mouse   | 430 mg/kg          |
|                                    | Rabbit  | 300 mg/kg          |
|                                    | Rat     | 590 mg/kg          |
| TD                                 | Rat     | 25 mg/kg           |
| <i>Other</i>                       |         |                    |
| LD50                               | Rat     | 343 mg/kg          |
| Decachlorobiphenyl (CAS 2051-24-3) |         |                    |
| <b>Acute</b>                       |         |                    |
| <i>Dermal</i>                      |         |                    |
| LD50                               | Rabbit  | 8.65 g/kg          |
| <i>Oral</i>                        |         |                    |
| LD50                               | Rat     | 0.794 g/kg         |



| Components                                    | Species    | Test Results   |
|---|------------|--|
| Endrin aldehyde (CAS 7421-93-4)               |            |  |
| <b>Acute</b>                                  |            |  |
| <i>Oral</i>                                   |            |  |
| LD50  | Mouse      | > 500 mg/kg  |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) |            |  |
| <b>Acute</b>                                  |            |  |
| <i>Dermal</i>                                 |            |  |
| LD50  | Guinea pig | 116 mg/kg  |
|   | Rabbit     | 500 - 2000 mg/kg   |
|   | Rat        | 119 mg/kg  |
| <i>Inhalation</i>                             |            |  |
| LC50  | Rat        | 200 mg/l, 4 Hours  |
| <i>Oral</i>                                   |            |  |
| LD50  | Cat        | 67 mg/kg   |
|   | Guinea pig | 116 mg/kg  |
|   | Hamster    | 100 - 160 mg/kg  |
|   | Mouse      | 68 - 180 mg/kg   |
|   | Rabbit     | 80 - 90 mg/kg  |
|   | Rat        | 40 - 100 mg/kg   |
| TD  | Calf       | 20 mg/kg   |
| <i>Other</i>                                  |            |  |
| LD50  | Mouse      | 10 mg/kg   |
| Hydroquinone (CAS 123-31-9)                   |            |  |
| <b>Acute</b>                                  |            |  |
| <i>Dermal</i>                                 |            |  |
| LD50  | Guinea pig | > 1000 mg/kg   |
|   | Rabbit     | > 2000 mg/kg   |
|   | Rat        | > 900 mg/kg  |
| <i>Oral</i>                                   |            |  |
| LD50  | Cat        | 50 mg/kg   |
|   | Dog        | 299 mg/kg  |
|   | Guinea pig | 550 mg/kg  |
|   | Mouse      | 245 mg/kg  |
|   | Rabbit     | 540 mg/kg  |
|   | Rat        | 300 - 600 mg/kg  |
| <i>Other</i>                                  |            |  |
| LD50  | Mouse      | 100 mg/kg  |
|   | Rabbit     | 125 mg/kg  |
|   | Rat        | 115 mg/kg  |
| n-Hexane (CAS 110-54-3)                       |            |  |
| <b>Acute</b>                                  |            |  |
| <i>Dermal</i>                                 |            |  |
| LD50  | Rabbit     | > 2000 mg/kg<br>> 5 ml/kg                                  |
| <i>Inhalation</i>                             |            |  |
| LC50  | Mouse      | 48000 ppm, 4 Hours   |
|   | Rat        | > 5000 ppm, 24 Hours<br>> 31.86 mg/l<br>73860 ppm, 4 Hours |
| <i>Oral</i>                                   |            |  |
| LD50  | Rat        | 24 mg/kg<br>24 ml/kg                                       |

| Components                      | Species    | Test Results   |
|---------------------------------|------------|--|
|                                 | Wistar rat | 49 mg/kg   |
| Toluene (CAS 108-88-3)          |            |  |
| <b>Acute</b>                    |            |  |
| <i>Dermal</i>                   |            |  |
| LD50                            | Rabbit     | > 5000 mg/kg<br>14.1 ml/kg   |
| <i>Inhalation</i>               |            |  |
| LC50                            | Mouse      | 6405 - 7436 ppm, 6 Hours<br>5320 ppm, 8 Hours<br>400 ppm, 24 Hours   |
|                                 | Rat        | 26700 ppm, 1 Hours<br>12200 ppm, 2 Hours<br>8000 ppm, 4 Hours<br>5879 - 6281 ppm, 6 Hours<br>12.5 - 28.8 mg/l, 4 Hours |
| <i>Oral</i>                     |            |  |
| LD50                            | Rat        | 2.6 g/kg   |
| <i>Other</i>                    |            |  |
| LD50                            | Mouse      | 59 mg/kg   |
|                                 | Rat        | 1332 mg/kg   |
| trans-Chlordane (CAS 5103-74-2) |            |  |
| <b>Acute</b>                    |            |  |
| <i>Dermal</i>                   |            |  |
| LD50                            | Rat        | 590 - 840 mg/kg  |
| <i>Inhalation</i>               |            |  |
| LC50                            | Cat        | 0.1 mg/l, 4 Hours  |
| <i>Oral</i>                     |            |  |
| LD50                            | Mouse      | 430 mg/kg  |
|                                 | Rabbit     | 300 mg/kg  |
|                                 | Rat        | 590 mg/kg  |
| TD                              | Rat        | 25 mg/kg   |
| <i>Other</i>                    |            |  |
| LD50                            | Rat        | 343 mg/kg  |

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

**Skin corrosion/irritation** Causes skin irritation.

**Serious eye damage/eye irritation** Causes serious eye irritation.

**Respiratory or skin sensitization**

**ACGIH sensitization**

Hydroquinone (CAS 123-31-9) Sensitizer.

**Respiratory sensitization** Not available.

**Skin sensitization** This product is not expected to cause skin sensitization.

**Germ cell mutagenicity** No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

**Carcinogenicity** This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

**IARC Monographs. Overall Evaluation of Carcinogenicity**

|   |   |
|---|---|
| Aldrin (TM) (CAS 309-00-2)                    | 3 Not classifiable as to carcinogenicity to humans. |
| BHC (beta isomer) (CAS 319-85-7)              | 2B Possibly carcinogenic to humans.                 |
| BHC (delta isomer) (CAS 319-86-8)             | 2B Possibly carcinogenic to humans.                 |
| cis-Chlordane (CAS 5103-71-9)                 | 2B Possibly carcinogenic to humans.                 |
| Decachlorobiphenyl (CAS 2051-24-3)            | 1 Carcinogenic to humans.                           |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | 2B Possibly carcinogenic to humans.                 |
| Hydroquinone (CAS 123-31-9)                   | 3 Not classifiable as to carcinogenicity to humans. |
| Toluene (CAS 108-88-3)                        | 3 Not classifiable as to carcinogenicity to humans. |

trans-Chlordane (CAS 5103-74-2)

2B Possibly carcinogenic to humans.

**US. National Toxicology Program (NTP) Report on Carcinogens**

BHC (beta isomer) (CAS 319-85-7)

Reasonably Anticipated to be a Human Carcinogen.

BHC (delta isomer) (CAS 319-86-8)

Reasonably Anticipated to be a Human Carcinogen.

Decachlorobiphenyl (CAS 2051-24-3)

Reasonably Anticipated to be a Human Carcinogen.

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

Not listed.

|   |  |
|---|--|
| <b>Reproductive toxicity</b>                              | Suspected of damaging the unborn child. Suspected of damaging fertility.                             |
| <b>Specific target organ toxicity - single exposure</b>   | Narcotic effects.  |
| <b>Specific target organ toxicity - repeated exposure</b> | Causes damage to organs through prolonged or repeated exposure.                                      |
| <b>Aspiration hazard</b>                                  | Not available.   |
| <b>Chronic effects</b>                                    | Prolonged inhalation may be harmful. Causes damage to organs through prolonged or repeated exposure. |

**12. Ecological information**

**Ecotoxicity** Very toxic to aquatic life. Toxic to aquatic life with long lasting effects. Accumulation in aquatic organisms is expected.

| Components                                    | Species | Test Results  |
|---|---------|---|
| 4,4'-DDE (CAS 72-55-9)                        |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Brown shrimp ( <i>Penaeus aztecus</i> )                         |
| Fish  | LC50    | Rainbow trout,donaldson trout<br>( <i>Oncorhynchus mykiss</i> ) |
| Aldrin (TM) (CAS 309-00-2)                    |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Ostracod, Seed shrimp ( <i>Cypridopsis vidua</i> )              |
| Fish  | LC50    | Rainbow trout,donaldson trout<br>( <i>Oncorhynchus mykiss</i> ) |
| b-Endosulfan (CAS 33213-65-9)                 |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Water flea ( <i>Daphnia carinata</i> )                          |
| Fish  | LC50    | Snake-head catfish ( <i>Channa punctata</i> )                   |
| BHC (beta isomer) (CAS 319-85-7)              |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Water flea ( <i>Daphnia pulex</i> )                             |
| Fish  | LC50    | Guppy ( <i>Poecilia reticulata</i> )                            |
| BHC (delta isomer) (CAS 319-86-8)             |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Water flea ( <i>Daphnia pulex</i> )                             |
| Fish  | LC50    | Zebra danio ( <i>Danio rerio</i> )                              |
| cis-Chlordane (CAS 5103-71-9)                 |         |   |
| <b>Aquatic</b>                                |         |   |
| Fish  | LC50    | Bluegill ( <i>Lepomis macrochirus</i> )                         |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Water flea ( <i>Daphnia pulex</i> )                             |
| Fish  | LC50    | Bluegill ( <i>Lepomis macrochirus</i> )                         |
| Hydroquinone (CAS 123-31-9)                   |         |   |
| <b>Aquatic</b>                                |         |   |
| Crustacea                                     | EC50    | Water flea ( <i>Daphnia magna</i> )                             |
| Fish  | LC50    | Rainbow trout,donaldson trout<br>( <i>Oncorhynchus mykiss</i> ) |

| Components                      | Species | Test Results   |
|---------------------------------|---------|--|
| n-Hexane (CAS 110-54-3)         |         |  |
| <b>Aquatic</b>                  |         |  |
| Fish                            | LC50    | Fathead minnow ( <i>Pimephales promelas</i> ) 2.101 - 2.981 mg/l, 96 hours     |
| Toluene (CAS 108-88-3)          |         |  |
| <b>Aquatic</b>                  |         |  |
| Crustacea                       | EC50    | Water flea ( <i>Daphnia magna</i> ) 5.46 - 9.83 mg/l, 48 hours                 |
| Fish                            | LC50    | Coho salmon, silver salmon ( <i>Oncorhynchus kisutch</i> ) 8.11 mg/l, 96 hours |
| trans-Chlordane (CAS 5103-74-2) |         |  |
| <b>Aquatic</b>                  |         |  |
| Fish                            | LC50    | Bluegill ( <i>Lepomis macrochirus</i> ) 0.0308 - 0.0827 mg/l, 96 hours         |

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

**Persistence and degradability** No data is available on the degradability of this product.

**Bioaccumulative potential** No data available.

**Partition coefficient n-octanol / water (log Kow)**

|                               |      |
|-------------------------------|------|
| 4,4'-DDE                      | 6.51 |
| Aldrin (TM)                   | 6.5  |
| b-Endosulfan                  | 3.83 |
| BHC (beta isomer)             | 3.78 |
| BHC (delta isomer)            | 4.14 |
| cis-Chlordane                 | 5.16 |
| Decachlorobiphenyl            | 4.11 |
| Endosulfan sulfate            | 3.66 |
| Endrin aldehyde               | 5.6  |
| Heptachlor epoxide (Isomer B) | 5.4  |
| Hydroquinone                  | 0.59 |
| n-Hexane                      | 3.9  |
| Toluene                       | 2.73 |
| trans-Chlordane               | 5.16 |

**Mobility in soil** No data available.

**Other adverse effects** 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

**Disposal instructions** Collect and reclaim or dispose in sealed containers at licensed waste disposal site. This material and its container must be disposed of as hazardous waste. Do not allow this material to drain into sewers/water supplies. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of contents/container in accordance with local/regional/national/international regulations.

**Local disposal regulations** Dispose in accordance with all applicable regulations.

**Hazardous waste code** The waste code should be assigned in discussion between the user, the producer and the waste disposal company.

**US RCRA Hazardous Waste P List: Reference**

|   |      |
|---|------|
| Aldrin (TM) (CAS 309-00-2)                    | P004 |
| b-Endosulfan (CAS 33213-65-9)                 | P050 |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | P059 |

**US RCRA Hazardous Waste U List: Reference**

|                                 |      |
|---------------------------------|------|
| cis-Chlordane (CAS 5103-71-9)   | U036 |
| Toluene (CAS 108-88-3)          | U220 |
| trans-Chlordane (CAS 5103-74-2) | U036 |

**Waste from residues / unused products** 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).

**Contaminated packaging** 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**

**UN number** UN1993

**UN proper shipping name** Flammable liquids, n.o.s. (Toluene RQ = 2000 LBS, n-Hexane RQ = 10040 LBS), MARINE POLLUTANT

**Transport hazard class(es)**

**Class** 3

**Subsidiary risk** -

**Label(s)** 3

**Packing group** II

**Environmental hazards**

**Marine pollutant** Yes

**Special precautions for user** Read safety instructions, SDS and emergency procedures before handling.

**Special provisions** IB2, T7, TP1, TP8, TP28

**Packaging exceptions** 150

**Packaging non bulk** 202

**Packaging bulk** 242

**IATA**

**UN number** UN1993

**UN proper shipping name** Flammable liquid, n.o.s. (Toluene, n-Hexane)

**Transport hazard class(es)**

**Class** 3

**Subsidiary risk** -

**Packing group** II

**Environmental hazards** No.

**ERG Code** 3H

**Special precautions for user** Read safety instructions, SDS and emergency procedures before handling.

**Other information**

**Passenger and cargo aircraft** Allowed.

**Cargo aircraft only** Allowed.

**IMDG**

**UN number** UN1993

**UN proper shipping name** FLAMMABLE LIQUID, N.O.S. (Toluene, n-Hexane), MARINE POLLUTANT

**Transport hazard class(es)**

**Class** 3

**Subsidiary risk** -

**Packing group** II

**Environmental hazards**

**Marine pollutant** Yes

**EmS** F-E, S-E

**Special precautions for user** Read safety instructions, SDS and emergency procedures before handling.

**Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code** Not available.

**DOT**



**IATA; IMDG**





## 15. Regulatory information

### US federal regulations

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

One or more components are not listed on TSCA.

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

Decachlorobiphenyl (CAS 2051-24-3) 0.00005 % Annual Export Notification required.

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

|   |         |
|---|---------|
| 4,4'-DDE (CAS 72-55-9)                        | Listed. |
| Aldrin (TM) (CAS 309-00-2)                    | Listed. |
| b-Endosulfan (CAS 33213-65-9)                 | Listed. |
| BHC (beta isomer) (CAS 319-85-7)              | Listed. |
| BHC (delta isomer) (CAS 319-86-8)             | Listed. |
| cis-Chlordane (CAS 5103-71-9)                 | Listed. |
| Endosulfan sulfate (CAS 1031-07-8)            | Listed. |
| Endrin aldehyde (CAS 7421-93-4)               | Listed. |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Listed. |
| Hydroquinone (CAS 123-31-9)                   | Listed. |
| n-Hexane (CAS 110-54-3)                       | Listed. |
| Toluene (CAS 108-88-3)                        | Listed. |
| trans-Chlordane (CAS 5103-74-2)               | Listed. |

### SARA 304 Emergency release notification

|                                 |         |
|---------------------------------|---------|
| Aldrin (TM) (CAS 309-00-2)      | 1 LBS   |
| b-Endosulfan (CAS 33213-65-9)   | 1 LBS   |
| cis-Chlordane (CAS 5103-71-9)   | 1 LBS   |
| Hydroquinone (CAS 123-31-9)     | 100 LBS |
| trans-Chlordane (CAS 5103-74-2) | 1 LBS   |

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

Not listed.

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

|                          |                        |
|--------------------------|------------------------|
| <b>Hazard categories</b> | Immediate Hazard - Yes |
|                          | Delayed Hazard - Yes   |
|                          | Fire Hazard - Yes      |
|                          | Pressure Hazard - No   |
|                          | Reactivity Hazard - No |

### SARA 302 Extremely hazardous substance

| Chemical name   | CAS number | Reportable quantity | Threshold planning quantity | Threshold planning quantity, lower value | Threshold planning quantity, upper value |
|-----------------|------------|---------------------|-----------------------------|--|--|
| b-Endosulfan    | 33213-65-9 | 1                   |                             | 10 lbs                                   | 10000 lbs                                |
| Hydroquinone    | 123-31-9   | 100                 |                             | 500 lbs                                  | 10000 lbs                                |
| Aldrin (TM)     | 309-00-2   | 1                   |                             | 500 lbs                                  | 10000 lbs                                |
| cis-Chlordane   | 5103-71-9  | 1                   | 1000 lbs                    |  |  |
| trans-Chlordane | 5103-74-2  | 1                   | 1000 lbs                    |  |  |

**SARA 311/312 Hazardous chemical** No

### SARA 313 (TRI reporting)

| Chemical name | CAS number | % by wt. |
|---------------|------------|----------|
| n-Hexane      | 110-54-3   | 49-50    |
| Toluene       | 108-88-3   | 49-50    |

### Other federal regulations

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

4,4'-DDE (CAS 72-55-9)  
cis-Chlordane (CAS 5103-71-9)

Heptachlor epoxide (Isomer B) (CAS 1024-57-3)  
Hydroquinone (CAS 123-31-9)  
n-Hexane (CAS 110-54-3)  
Toluene (CAS 108-88-3)  
trans-Chlordane (CAS 5103-74-2)

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

Not regulated.

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

**Drug Enforcement Administration (DEA). List 2, Essential Chemicals (21 CFR 1310.02(b) and 1310.04(f)(2) and Chemical Code Number**

Toluene (CAS 108-88-3) 6594

**Drug Enforcement Administration (DEA). List 1 & 2 Exempt Chemical Mixtures (21 CFR 1310.12(c))**

Toluene (CAS 108-88-3) 35 %WV

**DEA Exempt Chemical Mixtures Code Number**

Toluene (CAS 108-88-3) 594

**US state regulations**

**US. Massachusetts RTK - Substance List**

4,4'-DDE (CAS 72-55-9)  
Aldrin (TM) (CAS 309-00-2)  
b-Endosulfan (CAS 33213-65-9)  
BHC (beta isomer) (CAS 319-85-7)  
BHC (delta isomer) (CAS 319-86-8)  
cis-Chlordane (CAS 5103-71-9)  
Endosulfan sulfate (CAS 1031-07-8)  
Endrin aldehyde (CAS 7421-93-4)  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3)  
Hydroquinone (CAS 123-31-9)  
n-Hexane (CAS 110-54-3)  
Toluene (CAS 108-88-3)  
trans-Chlordane (CAS 5103-74-2)

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

Aldrin (TM) (CAS 309-00-2) 500 LBS  
b-Endosulfan (CAS 33213-65-9) 10 LBS  
cis-Chlordane (CAS 5103-71-9) 500 LBS  
Decachlorobiphenyl (CAS 2051-24-3) 500 LBS  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3) 500 LBS  
Hydroquinone (CAS 123-31-9) 500 LBS  
n-Hexane (CAS 110-54-3) 500 LBS  
Toluene (CAS 108-88-3) 500 LBS  
trans-Chlordane (CAS 5103-74-2) 500 LBS

**US. Pennsylvania RTK - Hazardous Substances**

4,4'-DDE (CAS 72-55-9)  
Aldrin (TM) (CAS 309-00-2)  
b-Endosulfan (CAS 33213-65-9)  
BHC (beta isomer) (CAS 319-85-7)  
BHC (delta isomer) (CAS 319-86-8)  
cis-Chlordane (CAS 5103-71-9)  
Endosulfan sulfate (CAS 1031-07-8)  
Endrin aldehyde (CAS 7421-93-4)  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3)  
Hydroquinone (CAS 123-31-9)  
n-Hexane (CAS 110-54-3)  
Toluene (CAS 108-88-3)  
trans-Chlordane (CAS 5103-74-2)

**US. Rhode Island RTK**

4,4'-DDE (CAS 72-55-9)  
Aldrin (TM) (CAS 309-00-2)  
b-Endosulfan (CAS 33213-65-9)  
BHC (beta isomer) (CAS 319-85-7)  
BHC (delta isomer) (CAS 319-86-8)  
Endosulfan sulfate (CAS 1031-07-8)  
Endrin aldehyde (CAS 7421-93-4)  
Heptachlor epoxide (Isomer B) (CAS 1024-57-3)  
Hydroquinone (CAS 123-31-9)  
n-Hexane (CAS 110-54-3)  
Toluene (CAS 108-88-3)

## US. California Proposition 65

WARNING: This product contains a chemical known to the State of California to cause cancer and birth defects or other reproductive harm.

### US - California Proposition 65 - CRT: Listed date/Carcinogenic substance

|   |                         |
|---|-------------------------|
| 4,4'-DDE (CAS 72-55-9)                        | Listed: January 1, 1989 |
| Aldrin (TM) (CAS 309-00-2)                    | Listed: July 1, 1988    |
| BHC (beta isomer) (CAS 319-85-7)              | Listed: October 1, 1989 |
| BHC (delta isomer) (CAS 319-86-8)             | Listed: October 1, 1987 |
| cis-Chlordane (CAS 5103-71-9)                 | Listed: July 1, 1988    |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Listed: July 1, 1988    |
| trans-Chlordane (CAS 5103-74-2)               | Listed: July 1, 1988    |

### US - California Proposition 65 - CRT: Listed date/Developmental toxin

|   |                         |
|---|-------------------------|
| 4,4'-DDE (CAS 72-55-9)                        | Listed: March 30, 2010  |
| Decachlorobiphenyl (CAS 2051-24-3)            | Listed: January 1, 1991 |
| Heptachlor epoxide (Isomer B) (CAS 1024-57-3) | Listed: August 20, 1999 |
| Toluene (CAS 108-88-3)                        | Listed: January 1, 1991 |

### US - California Proposition 65 - CRT: Listed date/Female reproductive toxin

|                        |                        |
|------------------------|------------------------|
| Toluene (CAS 108-88-3) | Listed: August 7, 2009 |
|------------------------|------------------------|

### US - California Proposition 65 - CRT: Listed date/Male reproductive toxin

|                        |                        |
|------------------------|------------------------|
| 4,4'-DDE (CAS 72-55-9) | Listed: March 30, 2010 |
|------------------------|------------------------|

## International Inventories

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

\*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   | 10-10-2014                                     |
| Version #    | 01   |
| NFPA ratings | Health: 2<br>Flammability: 3<br>Instability: 0 |



## Disclaimer

The above information is believed to be correct on the date it was last revised and must not be considered all inclusive. The information has been obtained only by a search of available literature and is only a guide for handling the chemicals. OSHA regulations require that if other hazards become evident, an upgraded SDS must be made available to the employee within three months. RESPONSIBILITY for updates lies with the employer and not with CHEM SERVICE, Inc.

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