

**SECTION 1: Product and company identification**

Product name : Bio Flow  
Use of the substance/mixture : Bacterial digestant  
Product code : 0543  
Company : Total Solutions  
P.O. Box 245013  
Milwaukee, WI 53224 - USA  
T (414) 354-6417  
Emergency number : Chemtrec: (800) 424-9300

**SECTION 2: Hazards identification**

**2.1. Classification of the substance or mixture**

**Classification (GHS-US)**

Not classified

**2.2. Label elements**

**GHS-US labeling**

No labeling applicable

**2.3. Other hazards**

No additional information available

**2.4. Unknown acute toxicity (GHS US)**

Not applicable

**SECTION 3: Composition/information on ingredients**

**3.1. Substance**

Not applicable

Full text of H-phrases: see section 16

**3.2. Mixture**

Not applicable

**SECTION 4: First aid measures**

**4.1. Description of first aid measures**

First-aid measures general : If you feel unwell, seek medical advice (show the label where possible).  
First-aid measures after inhalation : Remove the victim into fresh air.  
First-aid measures after skin contact : Rinse skin with water/shower.  
First-aid measures after eye contact : Rinse immediately with plenty of water. Remove contact lenses, if present and easy to do. Continue rinsing.  
First-aid measures after ingestion : Rinse mouth with water. Do NOT induce vomiting.

**4.2. Most important symptoms and effects, both acute and delayed**

Symptoms/injuries : Not expected to present a significant hazard under anticipated conditions of normal use.  
Symptoms/injuries after inhalation : None under normal use.  
Symptoms/injuries after skin contact : Contact during a long period may cause light irritation.  
Symptoms/injuries after eye contact : May cause slight irritation.  
Symptoms/injuries after ingestion : Gastrointestinal complaints.

**4.3. Indication of any immediate medical attention and special treatment needed**

No additional information available

**SECTION 5: Firefighting measures**

**5.1. Extinguishing media**

Suitable extinguishing media : All extinguishing media allowed.

**5.2. Special hazards arising from the substance or mixture**

Reactivity : Upon combustion: CO and CO2 are formed.

**5.3. Advice for firefighters**

Firefighting instructions : Exercise caution when fighting any chemical fire. Use water spray or fog for cooling exposed containers. Take account of environmentally hazardous firefighting water.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

**SECTION 6: Accidental release measures**

**6.1. Personal precautions, protective equipment and emergency procedures**

General measures : Isolate from fire, if possible, without unnecessary risk.

**6.1.1. For non-emergency personnel**

Protective equipment : Protective goggles. Gloves. Protective clothing.

Emergency procedures : Evacuate unnecessary personnel. Avoid contact with skin, eyes and clothing. Ventilate spillage area.

**6.1.2. For emergency responders**

Protective equipment : Equip cleanup crew with proper protection.

Emergency procedures : Stop leak if safe to do so. Stop release. Ventilate area.

**6.2. Environmental precautions**

Avoid release to the environment. Prevent entry to sewers and public waters.

**6.3. Methods and material for containment and cleaning up**

For containment : Contain released substance, pump into suitable containers.

Methods for cleaning up : This material and its container must be disposed of in a safe way, and as per local legislation.

**6.4. Reference to other sections**

No additional information available

**SECTION 7: Handling and storage**

**7.1. Precautions for safe handling**

Precautions for safe handling : Comply with the legal requirements. Do not handle until all safety precautions have been read and understood. Use personal protective equipment as required. Do not eat, drink or smoke when using this product. Do not get in eyes, on skin, or on clothing.

Hygiene measures : Wash thoroughly after handling. Wash contaminated clothing before reuse.

**7.2. Conditions for safe storage, including any incompatibilities**

Technical measures : Comply with applicable regulations.

Storage conditions : Keep container closed when not in use.

Storage area : Meet the legal requirements. Store in a cool area. Store in a well-ventilated place.

Special rules on packaging : meet the legal requirements.

**SECTION 8: Exposure controls/personal protection**

**8.1. Control parameters**

Not applicable

**8.2. Exposure controls**

Personal protective equipment : Use appropriate personal protective equipment when risk assessment indicates this is necessary.

**SECTION 9: Physical and chemical properties**

**9.1. Information on basic physical and chemical properties**

Physical state : Liquid

Appearance : Hazy, green liquid.

Odor : Pleasant scent

Odor threshold : No data available

pH : 6.2 - 6.5

Melting point : No data available

Freezing point : No data available

Boiling point : No data available

Flash point : > 200 °F None - Closed Cup

Relative evaporation rate (butyl acetate=1) : No data available

Flammability (solid, gas) : No data available

Explosion limits : No data available

Explosive properties : No data available

Oxidizing properties : No data available

Vapor pressure : No data available

|                                 |                     |
|---------------------------------|---------------------|
| Relative density                | : No data available |
| Relative vapor density at 20 °C | : No data available |
| Specific gravity / density      | : 1 g/ml            |
| Solubility                      | : Soluble in water. |
| Log Pow                         | : No data available |
| Log Kow                         | : No data available |
| Auto-ignition temperature       | : No data available |
| Decomposition temperature       | : No data available |
| Viscosity                       | : No data available |
| Viscosity, kinematic            | : No data available |
| Viscosity, dynamic              | : No data available |
| VOC content                     | : < 0.5 %           |

## SECTION 10: Stability and reactivity

### 10.1. Reactivity

Upon combustion: CO and CO2 are formed.

### 10.2. Chemical stability

No additional information available

### 10.3. Possibility of hazardous reactions

Refer to section 10.1 on Reactivity.

### 10.4. Conditions to avoid

No additional information available

### 10.5. Incompatible materials

No additional information available

### 10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

|  |  |
|--|--|
| Acute toxicity                                     | : Not classified   |
| Skin corrosion/irritation                          | : Not classified<br>pH: 6.2 - 6.5                          |
| Serious eye damage/irritation                      | : Not classified<br>pH: 6.2 - 6.5                          |
| Respiratory or skin sensitization                  | : Not classified   |
| Germ cell mutagenicity                             | : Not classified   |
| Carcinogenicity                                    | : Not classified   |
| Reproductive toxicity                              | : Not classified   |
| Specific target organ toxicity (single exposure)   | : Not classified   |
| Specific target organ toxicity (repeated exposure) | : Not classified   |
| Aspiration hazard                                  | : Not classified   |
| Symptoms/injuries after inhalation                 | : None under normal use.                                   |
| Symptoms/injuries after skin contact               | : Contact during a long period may cause light irritation. |
| Symptoms/injuries after eye contact                | : May cause slight irritation.                             |
| Symptoms/injuries after ingestion                  | : Gastrointestinal complaints.                             |

## SECTION 12: Ecological information

### 12.1. Toxicity

No additional information available

### 12.2. Persistence and degradability

No additional information available

### 12.3. Bioaccumulative potential

No additional information available

**SECTION 13: Disposal considerations**

**13.1. Waste treatment methods**

Waste disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

**SECTION 14: Transport information**

**Department of Transportation (DOT)**

In accordance with DOT : Not regulated for transport

**Additional information**

Other information : No supplementary information available.

**ADR**

No additional information available

**Transport by sea**

No additional information available

**Air transport**

No additional information available

**SECTION 15: Regulatory information**

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All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory except for:

Chemical(s) subject to the reporting requirements of Section 313 or Title III of the Superfund Amendments and Reauthorization Act (SARA) of 1986 and 40 CFR Part 372.

|                         |                 |           |
|-------------------------|-----------------|-----------|
| 1,4-dioxane             | CAS No 123-91-1 | <0.0002   |
| ethylene oxide, oxirane | CAS No 75-21-8  | <=0.00001 |

California Proposition 65 - This product contains, or may contain, trace quantities of a substance(s) known to the state of California to cause cancer and/or reproductive toxicity

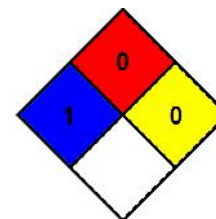
**SECTION 16: Other information**

Training advice : Normal use of this product shall imply use in accordance with the instructions on the packaging.

NFPA health hazard : 1 - Exposure could cause irritation but only minor residual injury even if no treatment is given.

NFPA fire hazard : 0 - Materials that will not burn.

NFPA reactivity : 0 - Normally stable, even under fire exposure conditions, and are not reactive with water.



Prepared by: Technical Department

*This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product. No warranty is expressed or implied regarding the accuracy of this data or the results obtained from the use thereof. Our company assumes no responsibility for personal injury or property damage to the vendee, users or third parties caused by the material. Such vendees or users assume all risks associated with the use of this material.*