Material Safety Data Sheet
Water Lynx 398

1. Identification of the Product and the Company

Product Name: Water Lynx 398
Synonyms: Polyacryamide, Anionic Polyacrylamide, Acrylamide-acrylate-co-polymer, Anionic Polymer, PAM, APAM.
Chemical Family: Polyacrylamide
Material Uses: Water Lynx 398 is used as a flocculating agent in municipal and industrial water and wastewater treatment.
Supplier: Clearflow Enviro Systems Group Inc.
#140, 134 Pembina Road
Sherwood Park, AB T8H 0M2
Ph. 780-410-1403
Fx. 780-410-1406
www.clearflowgroup.com

In Case of Emergency: 780-410-1403

Product Type: Gel Block

2. Composition / Information on Ingredients

<table>
<thead>
<tr>
<th>Name</th>
<th>CAS Number</th>
<th>% by Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acrylamide</td>
<td>79-06-1</td>
<td>&lt;0.05</td>
</tr>
<tr>
<td>Acrylamide-acrylate-co-polymer</td>
<td>9003-05-8</td>
<td>proprietary</td>
</tr>
<tr>
<td>Binders, dissolution additives</td>
<td>-</td>
<td>proprietary</td>
</tr>
</tbody>
</table>

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

3. Hazard Identification

Potential Acute Health Effects

Inhalation: Inhalation of vapours, mists or dusts of the product may be irritating to the respiratory system. May irritate mouth, nose, and throat.

Ingestion: May cause irritation of the lining of the stomach.

Skin: Mild to Moderate irritation can occur. Prolonged or repeated contact may cause defatting and drying of the skin. Prolonged or repeated contact may cause discomfort and local redness.

Eyes: May cause eye irritation. May result in mild to moderate irritation to eyes.
4. First Aid Measures

**Inhalation:** Remove person to fresh air. If not breathing, give artificial respiration. If breathing is difficult, get immediate medical attention.

**Skin contact:** In case of contact, rinse with soap and water. Remove contaminated clothing and launder before reuse.

**Eye Contact:** In case of contact, or suspected contact, immediately flush eyes with plenty of water for at least 15 minutes. Seek medical attention if irritation persists.

**Ingestion:** Do NOT induce vomiting. Never give anything by mouth to an unconscious or convulsing person. If vomiting occurs spontaneously, keep head below hips to prevent aspiration of liquid into the lungs.

**Notes to Physician:** Treatment based on sound judgement of physician and individual reactions of patient.

5. Fire-Fighting Measures

**Flash Point:** None.

**Flash Point Method:** Not applicable.

**Autoignition Temperature:** Not available.

**Flammable Limits in Air (%):** Not available.

**Extinguishing Media**

**Suitable:** Use an extinguishing media suitable for the surrounding fire.

**Not Suitable:** None known.

**Hazardous Thermal Decomposition Products:** Carbon and Nitrogen Oxides.

**Special Protective Equipment for Fire-Fighters:** Fire fighters should wear full protective clothing, including self-contained breathing equipment.

**NFPA Ratings for this product are:**

- HEALTH 1
- FLAMMABILITY 0
- INSTABILITY 1

**HMIS Ratings for this product are:**

- HEALTH 1
- FLAMMABILITY 0
- REACTIVITY 1

6. Accidental Release Measures

**Personal precautions:** Wear appropriate protective equipment. Wet product and aqueous solutions of product are very slippery. Trace amounts of product on smooth surfaces can become extremely slippery when wet.

**Environmental Precautions:** Prevent entry of concentrated solutions into sewers or streams, dike if needed.

**Procedure for Clean-up:** Sweep or scoop dry material and place in appropriate container. Absorb aqueous solutions with a dry inert material, such as clay, and place in an appropriate waste disposal container. After most of the material has been cleaned-up clean the area with warm, soapy water.

7. Handling and Storage

**Handling:** For industrial use only. Handle and open containers with care. Avoid contact with eyes, skin and clothing. Do not ingest. Keep the containers closed when not in use. Protect against physical damage. Use appropriate personnel protective equipment.

**Storage:** Store in a cool, dry area. Store in accordance with good industrial practices. Keep away from direct sunlight. Protect against physical damage.
8. Exposure Controls / Personal Protection

**Personal Protection**

**Respiratory:** A respirator should not be required when working with Water Lynx 398.

**Hands:** Use gloves appropriate for work or task being performed. Recommended: PVC, vinyl, or rubber.

**Eyes:** Safety eyewear should be used when there is a likelihood of exposure. Recommended: Chemical goggles; also wear a face shield if splashing hazard exists.

**Skin**
Skin Contact should be prevented through the use of suitable protective clothing, gloves and footwear, selected for conditions of use and exposure potential. Consideration must be given both to durability as well as permeation resistance.

**Other Personal Protection Data:** Ensure that eyewash stations and safety showers are proximal to the work-station location.

**Engineering Controls:** Local exhaust ventilation as necessary to maintain exposure to within applicable limits.

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9. Physical and Chemical Properties

**Physical State:** partially hydrated gel block

**Color:** White or off-white

**Odor:** Slightly Acidic

**pH:** ~7

**Specific Gravity:** ~1.1

**Boiling/Condensing Point:** Not available.

**Melting/Freezing Point:** Not available.

**Vapour Pressure:** Not available.

**Vapour Density:** Not available.

**% Volatile by Volume:** Not available.

**Evaporation Rate:** Not available.

**Solubility:** Completely soluble but dissolves very slowly.

**VOCs:** Not available.

**Viscosity:** Concentration dependant.

**Molecular Weight:** Not available.

**Other:** None
10. Stability and Reactivity

**Chemical Stability:** The product is stable.

**Hazardous Polymerization:** Will not occur.

**Conditions to Avoid:** High temperatures.

**Materials to Avoid:** Strong bases such as sodium hydroxide may cause the release of ammonia.

**Hazardous Decomposition Products:** At high temperatures carbon oxides and nitrogen oxides may be released upon decomposition.

**Additional Information:** No additional information.

11. Toxicological Information

**Principle Routes of Exposure**

- **Ingestion:** May cause irritation of the lining of the stomach.
- **Skin contact:** Mild to moderate irritation can occur. Prolonged or repeated contact may cause defatting and drying of the skin. Prolonged or repeated contact may cause discomfort and local redness.
- **Inhalation:** Inhalation of vapours, mists or dusts of the product may be irritating to the respiratory system. May irritate mouth, nose, and throat.
- **Eye Contact:** May cause eye irritation. May result in mild to moderate irritation to eyes.

**Additional Information:** Prolonged and repeated contact with the skin can cause defatting and drying of the skin resulting in skin irritation and dermatitis.

**Acute Toxicity**

- **Acute Oral LD50:** Oral LD50 (Rat) > 5000 mg/kg
- **Acute Dermal LD50:** Not available.
- **Acute Inhalation LC50:** Not available.

**Carcinogenicity**

Acrylamide is a suspected human carcinogen.

**Carcinogenicity Comment:** No additional information available.

**Reproductive Toxicity / Teratogenicity / Embryotoxicity / Mutagenicity:** Not available.

12. Ecological Information

**Aquatic Ecotoxicity**

Based on testing of related granular product on Rainbow Trout (*Oncorhynchus mykiss*) toxicity is expected to be >450 mg/L.

**Other Information:**

- **Bioaccumulation:** The product is not expected to bioaccumulate.
- **Persistence / Degradability:** Not readily biodegradable.
13. Disposal Considerations

**Disposal of Waste Method:** Disposal of all wastes must be done in accordance with municipal, provincial and federal regulations.

**Contaminated Packaging:** Empty containers should be recycled or disposed of through an approved waste management facility.

14. Transport Information

<table>
<thead>
<tr>
<th>Regulatory Information</th>
<th>UN Number</th>
<th>Proper Shipping Name</th>
<th>Hazard Class</th>
<th>PG*</th>
<th>Label</th>
<th>Additional Information</th>
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</thead>
<tbody>
<tr>
<td>DOT (U.S.)</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>not a regulated product</td>
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<tr>
<td>TDG (Canada)</td>
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<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>not a regulated product</td>
</tr>
</tbody>
</table>

PG*: Packaging Group

15. Regulatory Information

**U.S. TSCA Inventory Status:** All components of this product are either on the Toxic Substances Control Act (TSCA) Inventory List or exempt.

**Canadian DSL Inventory Status:** All components of this product are either on the Domestic Substances List (DSL), the Non-Domestic Substances List (NDSL) or exempt.
16. Other Information

Additional Information: This product has been classified in accordance with the hazard criteria of the Canadian Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

Prepared By: Clearflow Enviro Systems Group, Inc.

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Date of Previous Issue: 07/12/2011

Version: 6

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***END OF MSDS***