SAFETY DATA SHEET

Revision Date: 05/07/2015

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND COMPANY

Product Name: Emerald Isle Solutions Fairway SeaQuential 6-0-2

Recommended use

This product is a concentrated liquid fertilizer for landscape use.

Supplier/Manufacturer

Lebanon Seaboard Corporation 1600 East Cumberland Street Lebanon PA 17042 Tel: 800-233-0628

(717-273-0628

Supplier Email: customerservice@lebsea.com

Emergency telephone numbers Chemtrec (Spill) 1-800-424-9300

Chemtrec (Spill) 1-800-424-9300 Prosar (Health) 888-208-1368

2. HAZARDS IDENTIFICATION

Signal Word: Warning

Hazard Statements:

H315: Causes skin irritation (Category 2)

H317: May cause an allergic skin reaction in sensitive individuals. (Category 1B)

H320: Causes eye irritation (Category 2B) May irritate the digestive tract if ingested.

Pictogram: Exclamation Point

Precautionary Statements for handling: See also Section 7.

P261: Avoid breathing spray mist.

P264: Wash hands thoroughly after handling.

P280: Wear protective gloves/protective clothing/eye protection/face protection.

P332, P352: If on skin: Wash with plenty of soap and water. Seek medical attention if irritation persists or rash occurs.

P351; P337: In case of eye contact: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If eye irritation persists, get medical attention.

P362: Take off contaminated clothing and wash before reuse.

P272: Contaminated work clothing should not be allowed out of the workplace.

P280: Wear protective gloves/protective clothing/eye protection/face protection.

Precautionary Statements for disposal - Dispose in accordance with all federal, state and local regulations.

Hazards not otherwise classified (HNOC): None

Unknown acute toxicity 0% of the mixture consists of ingredients of unknown toxicity.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name	CAS No.	Weight %		
Seaweed extract aqueous solution	84775-78-0	46.76		
Ferrous sulfate	7720-78-7	26.72		
Urea	57-13-6	14.72		
EDTA tetrasodium salt	64-02-8	4.01		
Potassium citrate	6100-05-6	3.68		
Citric acid	77-92-9	2.01		
Fulvic Acid; 70% aqueous solution	479-66-3	2.01		
Potassium sorbate (preservative)	590-00-1	0.09		

4. FIRST AID MEASURES

Symptoms: Causes eye irritation with burning, redness, tearing. May irritate skin with redness, itching rash, and/or

discomfort. May irritate the digestive tract if ingested in quantity, causing nausea, vomiting and diarrhea. Large oral doses of nitrates may cause dizziness, abdominal pain, vomiting, bloody diarrhea, weakness, convulsions, and collapse. May interfere with blood's capability to carry oxygen (methemoglobinemia), as evidenced by

Revision Date: 05/07/2015

bluish color to skin and lips.

Eve Contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue

rinsing. If eye irritation persists: Get medical advice/attention.

Skin Contact: Wash with plenty of soap and water. Seek medical attention if rash occurs or if irritation persists.

Inhalation If inhaled and discomfort occurs, move to fresh air, and keep person at rest in a position comfortable for

breathing. If difficulty in breathing occurs and/or persists, administer oxygen and get medical attention. If

medical advice is needed, have product container or label on hand.

Ingestion: If swallowed: IF SWALLOWED: Rinse mouth. Seek medical attention if you feel unwell. If discomfort

occurs, seek medical attention. Do not induce vomiting of an unconscious person.

<u>Self-protection of the first aider</u>: When spraying, use dust/mist mask or any appropriate personal protective equipment as required.

Most important symptoms and effects, both acute and delayed:

Symptoms: Mist inhalation can result in irritation with nasal discomfort; skin irritation possible, but not likely with normal use. Large oral doses of nitrates may cause dizziness, abdominal pain, vomiting, bloody diarrhea, weakness, convulsions, and collapse. May interfere with blood's capability to carry oxygen (methemoglobinemia), as evidenced by bluish color to skin and lips.

Indication of any immediate medical attention and special treatment needed: See Symptoms (above).

5. FIRE FIGHTING MEASURES

Suitable extinguishing media

Liquid product is not a fire hazard, and will not burn. Use extinguishing media suitable to local circumstances and the surrounding environment. Options in this case include water, CO₂, ABC Dry Chemical extinguisher, or foam.

Specific hazards arising from the chemical

If evaporated to dryness, the solid residue may pose a fire hazard. Dry ingredients in this product are an oxidizing agents, which may cause spontaneous ignition of combustible materials in dry form. Do not allow nitrates to evaporate to dryness (fire hazard). Thermal decomposition can lead to release of irritating and toxic gases and vapors. In the event of fire, do not breathe fumes.

Explosion data

Sensitivity to mechanical impact: None Sensitivity to static discharge: None

Protective equipment and precautions for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and standard protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment, and emergency procedures

skin, and to avoid breathing mist.

Emerald Isle Solutions Fairway SeaQuential 6-0-2

Environmental precautions Prevent entry into waterways, sewers, basements or confined areas. Do not flush into

surface water or sanitary sewer system. See Section 12 for additional ecological

Revision Date: 05/07/2015

information.

Methods for containment Prevent further leakage or spillage, if safe to do so.

Methods for clean-up Use reasonable personal protective equipment as required. Soak up excess with inert

absorbent material, or take up mechanically, placing in appropriate containers for

disposal. Avoid creating mist. Clean contaminated surface thoroughly.

7. HANDLING AND STORAGE

Safe Handling Use personal protective equipment during use as required to prevent contact with eyes or skin, and

to avoid breathing mist. Wash hands thoroughly after handling.

Storage Conditions Keep containers tightly closed in a cool, well- ventilated place. Keep out of the reach of children.

Incompatible materials
Avoid strong acids or alkali, or other reactive substances.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH*	
Iron salts, soluble, as Fe	1 mg/m³	None established	None established	

^{*}IDLH refers to amounts that are "Immediately Dangerous to Life or Health"

Other Information:

Engineering controls: Avoid creating fine, inhalable mists during application.

Individual protection measures

P280: Wear protective gloves/protective clothing/eye protection/face protection.

Eye protection Safety glasses, or goggles if eye contact with concentrated product or diluted

mist is likely.

Skin and Body Protection Gloves and normal work coveralls recommended.

exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Respiratory protection must be provided in

accordance with current local regulations.

General Hygiene When using product, do not eat, drink or smoke. Wash hands thoroughly after

handling. Remove and wash contaminated clothing before reuse.

9. PHYSICAL AND CHEMCIAL PROPERTIES

Physical state Aqueous Liquid

Appearance Solution

Emerald Isle Solutions Fairway SeaQuential 6-0-2

Color Mixed, various

Odor Slight

Odor Threshold No information available

pH 3.4

Melting point/freezing point

Boiling point / boiling range

No information available
No information available

Flash point Not applicable

Evaporation rate No information available

Flammability (solid, gas) Will not burn

Flammability Limit in Air

Upper flammability limit: Will not burn
Lower flammability limit: Will not burn
Vapor pressure Similar to water

Vapor density No information available

Specific Gravity 1.298 g/cc

Water solubility Fully soluble in water
Solubility in other solvents No information available
Partition coefficient No information available

Autoignition temperature Will not burn

Decomposition temperature No information available Oxidizing properties No information available

10. STABILITY AND REACTIVITY

Revision Date: 05/07/2015

Reactivity

No data available

Chemical stability

Stable.

Possibility of Hazardous Reactions

May release heat and fumes when mixed in solution with incompatible reactive materials.

Hazardous polymerization

Will not occur.

Conditions to avoid

None known

Incompatible materials

Strong acids or alkali, or other reactive substances.

Hazardous Decomposition Products

May emit toxic fumes under fire conditions, such as Nitrogen oxides (NOx), Ammonia, Oxides of sulfur, Hydrogen chloride and Carbon monoxide.

11. TOXICOLOGICAL INFORMATION

Routes of exposure: Ingestion, eyes (contact), skin (contact), mist inhalation

Symptoms Causes eye irritation with burning, redness, tearing. May irritate skin with redness, itching and/or discomfort.

May irritate the digestive tract if ingested in quantity, causing nausea, vomiting and diarrhea.

Mist inhalation can result in irritation with nasal discomfort; skin irritation possible, but not likely with normal use.

May irritate the digestive tract if ingested in quantity, causing nausea, vomiting and diarrhea.

Emerald Isle Solutions Fairway SeaQuential 6-0-2

Sensitization Citric acid has been known to cause allergic sensitization in susceptible individuals. (Note that

citric acid is often used as an approved food additive and flavoring.)

Germ cell mutagenicity Potassium Sorbate induced chromosome aberrations in cultured Chinese hamster cells.

Cytogenetic Analysis (Hamster-Lung) 10 gm/L; Cytogenetic Analysis (Hamster-Fibroblast) 4 gm/L/48 hours; Sister Chromatid Exchange (Hamster Lung) 10 gm/L. (Note that potassium

sorbate is often used as an approved food preservative.)

Carcinogenicity Not classified as carcinogenic, although ingested nitrates that can result in endogenous

nitrosation, producing substances which are probably carcinogenic in humans (IARC-Group 2A).

Revision Date: 05/07/2015

Contains EDTA. EDTA is not carcinogenic, but substances similar to EDTA (Nitrilotriacetic acid [NTA] and its salts) were determined to be "possibly carcinogenic to humans" (Group 2B) by IARC, a compound which "may reasonably be anticipated to be a carcinogen" by NTP and a

"select carcinogen" by OSHA. EDTA may contain trace amounts of NTA.

Reproductive toxicity STOT - single exposure STOT - repeated exposure Chronic toxicity Target Organ Effects Aspiration hazard

No information available No information available No information available No information available No information available

No information available

12. ECOLOGICAL INFORMATION

Fertilizers may be harmful to aquatic life with short term effects, causing algal bloom and increased BOD, depending on the amount released.

Persistence and degradability
Bioaccumulation
Other adverse effects
No information available
No information available

13. DISPOSAL CONSIDERATIONS

This material, as supplied is not a hazardous waste according to federal regulations (40 CFR 261).

Disposal of wastes:

This product is a non-hazardous waste material suitable for approved solid waste landfills.

No EPA Waste Numbers are applicable for this product's components.

Dispose of in accordance with Local, State, and Federal regulations.

Contaminated packaging

No US Federal special packaging considerations at the date of this document. Follow local regulations.

14. TRANSPORT INFORMATION

DOT Description: None

This product is not a hazardous material and is not regulated by the United States Department of Transportation (D.O.T).

IMDG: Not a dangerous good. ICAO/IATA: Not a dangerous good.

15. REGULATORY INFORMATION

Revision Date: 05/07/2015

A: General Product Information

All components are on the U.S. EPA TSCA Inventory List.

SARA 311/312 Hazard Categories

Acute: Yes
Chronic: Yes
Fire: No
Sudden release of pressure: No
Reactive: No

B: Component Analysis

This material contains one or more of the following chemicals required to be identified under SARA Section 302 (40 CFR 355 Appendix A), SARA Section 313 (40 CFR 372.65) and/or CERCLA (40 CFR 302.4):

CERCLA:

Ferrous sulfate- RQ = 1000 Lbs

EDTA: RQ = 5000 Lbs

Clean Air Act: No information is available.
Clean Water Act: No information is available.

State Regulations

Component Analysis - State

The following components appear on one or more of the following state hazardous substances lists:

Component	CAS#	CA	MA	MN	NJ	PA	RI
Ferrous sulfate	7720-78-7	Yes ¹	Yes ¹	No	Yes ¹	Yes ¹	No

Other state regulations may apply. Check individual state requirements.

This product contains detectable quantities of a chemical (EDTA) known to the State of California to cause cancer.

Component Analysis - WHMIS IDL

The following components are identified under the Canadian Hazardous Products Act Ingredient Disclosure List: Ferrous sulfate.

16. OTHER INFORMATION

Other Information

Disclaimer

The information provided in this material safety data sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as guidance for safe handling, use, processing, storage, transportation, disposal, and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.