Safety Data Sheet

1. Identification

Product Name : HELENA LIQUID FERTILIZER 28-0-0-2S
Synonyms : None
Product Use : Blend of plant nutrients
Manufacturer/Supplier : Helena Agri-Enterprises, LLC
Address : 225 Schilling Blvd. Collierville, TN 38017
General Information : 901-761-0050
Transportation Emergency Number : CHEMTREC:800-424-9300

2. Hazard Identification

Signal Word : Warning
Skin Irritation : Causes skin irritation
Eye Irritation : Causes serious eye irritation
Acute Toxicity Oral : May be harmful if swallowed
Acute Toxicity Dermal : May be harmful in contact with skin

Hazard Categories : Oral/Dermal/Inhalation Toxicity-5/5/5; Eye/Skin Irritation-2A/2

Hazard Statement : May be harmful if swallowed
May be harmful in contact with skin
Causes skin irritation
Causes serious eye irritation
May be harmful if inhaled

3. Composition / Information on Ingredients

Component	CAS Number	Weight %
Blend of plant nutrients derived from urea ammonium nitrate solution and ammonium thiosulfate.	Proprietary	100.00
GUARANTEED ANALYSIS:		
Total Nitrogen (N):		28.00%
Sulfur (S):		2.00%

4. First Aid Measures

Eye : Hold eyes open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for further treatment advice.

Skin : Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

Inhalation : Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Ingestion : Call a poison control center or doctor immediately for treatment advice. Rinse mouth with water. Do not induce vomiting. Do not give anything by mouth if unconscious.

Indication of Immediate Medical Attention and Special Treatment Needed : In the event of an adverse response, treatment should be directed toward control of the symptoms.

5. Fire Fighting Measures

Extinguishing Media : Use extinguishing media suitable for underlying cause of fire.
Specific Hazards Arising from the Chemical : No information found
Special Fire Fight Proc : Wear self-contained breathing apparatus and full protective clothing.

6. Accidental Release Measures

Personal Precautions : Keep unprotected and unnecessary personnel out of spill area.
Protective Equipment : Splashproof goggles or face shield, impervious gloves, impervious apron and footwear. Respiratory protection not normally needed. Eyewash and emergency shower should be available in work area.
Emergency Procedures : Contain spilled product to prevent spreading and contamination of soil, waterways, drains or sewers.
Methods and Materials for Containment and Cleanup : Cover spilled product with absorbent, if needed. Collect by sweeping or scooping up. Reuse as product, if uncontaminated. If contaminated, place in suitable containers for proper disposal.

7. Handling and Storage

Precautions for Safe Handling : Keep locked up and out of reach of children. Do not contaminate water, food or feed by storage, handling or disposal. Keep container tightly closed. Do not allow water to be introduced into the contents of the container.
Conditions for Safe Storage : Store in original container only. Do not store near heat or open flame. Do not store with oxidizing agents or ammonium nitrate.

8. Exposure Controls / Personal Protection

TLV/PEL : No TLV or PEL available.
Appropriate Engineering Controls : Local exhaust is sufficient.
Personal Protective Equipment : Splashproof goggles or face shield, impervious gloves, impervious apron and footwear. Respiratory protection not normally needed. Eyewash and emergency shower should be available in work area.

9. Physical and Chemical Properties

Odor/Appearance : Liquid with mild ammonia and sulfur odor.
Flash Point, °F : Not flammable
Boiling Point, °F : No information found
Melting Point(Freezing point), °C : No information found
Vapor Pressure, mm Hg @ 20 °C : No information found
Vapor Density : No information found
Solubility in Water : Soluble
Molecular Formula : Not applicable, formulated mixture.
Density, g/mL @ 25 °C : 1.307
Evaporation Rate(Butyl Acetate = 1) : No information found
Octanol/Water Partition Coefficient : No information found
pH : 6.8 to 7.5
Flammable Limits (approximate volume % in air) : Not applicable

Auto-ignition Temperature	: Not applicable
Decomposition temperature	: Not applicable

10. Stability and Reactivity

Reactivity	: Not reactive
Chemical Stability	: Stable
Hazardous Decomposition Products	: May emit oxides of carbon and nitrogen.
Hazardous Polymerization	: Will not occur
Conditions to Avoid	: None currently known.
Incompatible Materials	: None currently known.

11. Toxicological Information

Acute Toxicity (Oral LD50)	: No LD50 data available. May be harmful if swallowed.
Acute Toxicity (Dermal LD50)	: No LD50 data available. May be harmful in contact with skin.
Acute Toxicity Inhalation LC50	: No LC50 available. May be harmful if inhaled.
Likely Routes of Exposure	: Skin, eyes
Skin Irritation	: Causes skin irritation.
Eye Irritation	: Causes serious eye irritation.
Skin Sensitization	: Not a contact sensitizer.
Carcinogenic	: Not listed by IARC, NTP or OSHA.
Chronic Effects	: None currently known.
Other Hazards	: None currently known.

12. Ecological Information

Ecotoxicity	: No information found
Persistence and Degradability	: No information found
Bioaccumulative Potential	: No information found
Mobility in Soil	: No information found
Other Adverse Effects	: No information found

13. Disposal Considerations

Waste Disposal Method	: This must be disposed of according to Federal, State or Local procedures under the Resource Conservation and Recovery Act.

14. Transport Information

UN Proper Shipping Name	: Not regulated by D.O.T.
Transport Hazard Class	: None
UN Identification Number	: None
Packaging Group	: None
Environmental Hazards	: No information found
Transport in Bulk	: No information found
Special Precautions for Transportation	: No information found
Freight Classification	: Fertilizing Compound, (Manufactured Fertilizer), Liquid, NOIBN (NMFC Item 68140, Sub 6, Class 70)

15. Regulatory Information

National Fire Protection Association Rating :

Health: 1 Fire: 0 Reactivity: 0
Rating Level: (4-Extreme, 3-High, 2-Moderate, 1-Slight, 0-Minimum)

S.A.R.A Title III Hazard Classification (Yes/No) :

Immediate(Acute) Health: Y
Delayed (Chronic) Health: N
Sudden Release of Pressure: N
Fire: N
Reactive: N

16. Other Information

Data of Preparation/Revision : 30-October-2018