

LIQUINOX *Company*

221 WEST MEATS AVENUE ORANGE, CALIFORNIA 92865-3386
PHONE (714) 637-6300

MATERIAL SAFETY DATA SHEET

1. PRODUCT IDENTIFICATION

Trade Name: LIQUINOX START VITAMIN B-1
Chemical Name: Aqueous Fertilizer Solution

Manufacturer's Name: Liquinox Company
221 West Meats Avenue
Orange, California 92667

Emergency Phone: (714) 970-2334
Business Phone: (714) 637-6300

Prepared by: Hap Garner
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2. HAZARDOUS INGREDIENTS

<u>CHEMICAL NAME</u>	<u>CAS #</u>	<u>PERCENT</u>
Thiamine Mononitrate	532-43-4	0.01%
Orthophosphoric Acid	7664-38-2	2.00%
Ethylenediaminetetra Acetate Iron	NONE	0.10%
Aqueous Yucca Extract Solution	NONE	1.50%

3. PHYSICAL PROPERTIES

Vapor Density: Heavier Melting Point or Range: F
Specific Gravity: 1.220 Boiling Point or Range: F
Solubility in Water: Total
Vapor Pressure, mmHg at 20° C 5.65 mmHg
Evaporation Rate: (Butyl Acetate = 1); Slower than either
Appearance and Odor: Light brown; minimum odor
How to detect this substance: Avoid breathing fumes; possible irritation.

4. FIRE AND EXPLOSION

Flash Point: N/A
Autoignition Temperature: N/A
Flammable Limits in Air, Volume %: LOWER
Fire extinguishing materials: Water spray, foam, carbon dioxide
-Special fire-fighting procedures: **None required.** Use large amounts of water and/or foam.
-Unusual fire and explosion hazards: None

5. HEALTH HAZARD INFORMATION

Symptoms of Overexposure:

- **INHALED:** Remove from area. Clear airway and start mouth-to-mouth contact. Use respirator or manual oxygen supply.
- **CONTACT WITH SKIN OR EYES:** Flush immediately with large amounts of water for at least 15 minutes. Call physician.
- **ABSORBED THROUGH SKIN:** Flush with large amounts of water. Call physician.
- **SWALLOWED:** Give large amounts of water. Do NOT induce vomiting or give mouth-to-mouth contact. Use respirator or manual oxygen supply.

Health Effects or Risks from Overexposure:

- **ACUTE:** Skin irritation – flush with water and see physician regularly.
- **CHRONIC:** Prolonged or repeated skin contact may result in dermatitis or skin burn.

First Aid Emergency Procedures:

- **EYE CONTACT:** Flush well with large amounts of water, call physician.
- **SKIN CONTACT:** Flush well with large amounts of water, call physician. Remove contaminated clothing and wash.
- **INHALED:** Remove person from area. Start mouth-to-mouth contact and use oxygen source if available.
- **SWALLOWED:** Give large amounts of water. Do NOT induce vomiting; call physician.

Medical Conditions Aggravated by Exposure:

- Possible skin burn and dermatitis; respiratory track irritation.

Recommendations to Physician:

- Flush areas with generous supply of clean water.

SUSPECTED CANCER AGENT: **NO**

6. REACTIVITY DATA

STABILITY:.....Stable
CONDITIONS TO AVOID :Strong Alkaline
INCOMPATIBILITY:Steel or other non-corrosion resistant metals
HAZARDOUS DECOMPOSITION PRODUCTS:None
HAZARDOUS POLYMERIZATION:Will Not Occur

7. SPILL, LEAK, AND DISPOSAL PROCEDURES

Spill Response Procedures: Use adequate amounts of water for flushing. Spread baking soda or soda ash on spill. Confine spill to limited area. Call (800) 424-9300 for additional help.

Preparing Wastes for Disposal: Use soda ash or baking soda to neutralize spilled area.

NOTE: DISPOSE OF ALL WASTES IN ACCORANCE WITH FEDERAL, STATE, AND LOCAL REGULATIONS.

8. SPECIAL HANDLING INFORMATION

- Ventilation and Engineering Controls: General mechanical ventilation will be sufficient to keep vapor concentration within specified limits.
- Respiratory Protection: None needed in normal use.
- Eye Protection: Safety glasses, goggles, or face shield.
- Gloves: Use impermeable plastic or rubber gloves.
- Other clothing and equipment: Use plastic or rubber aprons. Do NOT use cloth aprons.
- Work Practices: Keep out of reach of children.
- Hygienic Practices: Flush with generous amounts of water.
- Other Handling and Storage Requirements: Read directions, close containers after using. Store away from activity areas. For best use, store in a cool area. Use ample amounts of water in spilled area.
- Protective Measures During Maintenance of Contaminated Equipment: Use goggles, face shield, or plastic aprons and gloves. Have water supply nearby.

9. LABELING

- Harmful if absorbed through skin. Avoid contact with skin, eyes, or clothing. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, or using tobacco. Remove and wash contaminated clothing before reuse.
- Do not apply directly to water. Do not contaminate water by cleaning of equipment or disposal of waste. Drift and runoff may be hazardous to aquatic organisms in water adjacent to treatment areas.

DO NOT CONTAMINATE WATER, FOOD, OR FEED BY STORAGE OR DISPOSAL:

PESTICIDE STORAGE: Store product in original container in a cool, dry, locked place out of reach of children. Do not put product into food or drink containers.

- **PESTICIDE DISPOSAL:** If empty, do not reuse this container. Place in trash or offer for recycling if available. If partly filled, call your local solid waste agency or 1-800-CLEANUP for disposal instructions. Never place unused product down any indoor or outdoor drain.

NOTICE: To the extent permitted by law, user or buyer assumes all responsibility for safety, use, and disposal, not in accordance with directions.