

## MATERIAL SAFETY DATA SHEET

### Section 1. Company Contact and Chemical Product Information

**Product Name:** DIQUAT DIBROMIDE 37.3 % SL

Rowrunner AG

Rowrunner ATO

**EPA Reg. No.:** 83979-2 (Rowrunner AG)

83979-3 (Rowrunner ATO)

**Product Code:** FH-017

**Corporate Contact:** 1-866-927-6826 (toll free); 1-305-599-2221

**Emergency number for spills and cleanup: CHEMTREC: 1-800-424-9300**

**Chemical Name of Active Ingredient (IUPAC):**

1,1'-ethylene-2,2'-bipyridylium dibromide

**Chemical Formula of Active Ingredients:**

$C_{12}H_{12}Br_2N_2$

**CAS Registry Number of Active Ingredient:**

85-00-7

201-579-4

### Section 2. Composition/Information on Ingredients

Component	CAS Number	EEC No.	Symbol	R Phrase	Content (%)
Diquat dibromide	85-00-7	201-579-4	T+; N	22-26- 36/37/38- 43-48/25- 50/53	37.3
Inert ingredients					62.7

### Section 3. Hazards Identification

Harmful if inhaled. Harmful if swallowed. Causes moderate eye irritation. Avoid breathing spray mist. Avoid contact with eyes, skin or clothing.

## **Section 4. First Aid Measures**

**If in Eyes:** Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

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

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

**If Swallowed:** Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

## **Section 5. Fire Fighting Measures**

**Firefighting media:** Foam, carbon dioxide, dry chemical to extinguish fire.

**Firefighting Precaution:** High volume water jet.

**Special protective equipment for fire-fighters:** Use dry chemical, foam or CO<sub>2</sub> extinguishing media. Wear full protective clothing and self-contained breathing apparatus. Evacuate nonessential personnel from the area to prevent human exposure to fire, smoke, fumes or products of combustion. Prevent use of contaminated buildings, area, and equipment until decontaminated. Water runoff can cause environmental damage. If water is used to fight fire, dike and collect runoff.

## **Section 6. Accidental Release Measures**

Control the spill at its source. Contain the spill to prevent it from spreading, contaminating soil, or entering sewage and drainage systems or any body of water. Clean up spills immediately. Cover entire spill with absorbing material and place into compatible disposal container. Pick up wash liquid with additional absorbent and place into compatible disposal container. Once all material is cleaned up and placed in a disposal container, seal container and arrange for disposition.

## **Section 7. Handling and Storage**

**Handling precautions:** Avoid getting in eyes, on skin or clothing. Do not eat, drink or smoke while mixing and applying or before washing hands and face. Remove contaminated clothing and wash thoroughly after handling.

**Storage precautions:** Store in original container and keep closed. Store in cool and dry place. Do not contaminate water, other pesticides, fertilizer, food, or feed in storage, disposal, or cleaning of equipment. Keep out of reach of children, uninformed persons and animals.

## **Section 8. Exposure Controls/Personal Protection**

This product reacts with aluminum to produce flammable hydrogen gas. Do not mix or store in containers or systems made of aluminum or having aluminum fittings. Store the material in a well-ventilated, secure area out of reach of children and domestic animals. Do not store food, beverages or tobacco products in the storage area. Prevent eating, drinking, tobacco use, and cosmetic application in areas where there is a potential for exposure to the material. Wash thoroughly with soap and water after handling.

## **Section 9. Physical and Chemical Properties**

<b>Appearance</b>	Reddish brown clear liquid
<b>Odor</b>	Mild characteristic odor
<b>pH</b>	4.0 ~ 8.0
<b>Explosive properties</b>	Unlikely to produce explosion

## **Section 10. Stability and Reactivity**

**Stability:** Stable under normal use and storage conditions.

**Incompatibilities:** Concentrate should not be stored in aluminum containers. Spray solutions should not be mixed, stored or applied in containers other than plastic, plastic-lined steel, stainless steel or fiberglass.

**Hazard decomposition:** Can decompose at high temperatures forming toxic gases.

**Hazard polymerization:** Will not occur.

## **Section 11. Toxicological Information**

**Acute Oral Toxicity:** LD<sub>50</sub> for female rats is > 300 mg/kg and < 2000 mg/kg. The LD<sub>50</sub> cut off value is 500 mg/kg

**Acute Dermal Toxicity:** LD<sub>50</sub> for rats > 2000 mg/kg

**Acute Inhalation Toxicity:** LC<sub>50</sub> (4hr) between 0.06 – 0.25 mg/L air

**Skin Irritation:** Moderately Irritating

**Eye Irritation:** Non-Irritating

## **Section 12. Ecological Information**

**Birds:** Acute oral LD<sub>50</sub> for mallard ducks 155, partridges 295 mg/kg

**Fish:** LC<sub>50</sub> (96 h) for rainbow trout 39, mirror carp 125 mg/l

**Bee:** LD<sub>50</sub> (oral, 120 h) 22 µg/bee

**Worms:** LC<sub>50</sub> (14 d) 243 mg/kg

## **Section 13. Disposal Considerations**

Disposal of product would be treated, stored, transported, and disposed of according to the local waste regulation. Do not flush to surface water or sanitary sewer system.

## **Section 14. Transport Information**

### **US DOT Classification**

<b>Proper Shipping Name:</b>	Corrosive Liquid, N.O.S. (diquat dibromide, 37.3%)
<b>Class:</b>	8
<b>UN No.:</b>	1760
<b>Packaging Group:</b>	III

**B/L Freight Classification:** Herbicides, NOIBN

**Comments:** International Transportation  
Corrosive Liquid, N.O.S. (diquat dibromide, 37.3%)

<b>Class:</b>	8
<b>UN No.:</b>	1760
<b>Packaging Group:</b>	III

## **Section 15. Regulatory Information**

### **USEPA Registered Company Address:**

Rotam North America, Inc., 1400 NW 107th Avenue, Suite 310, Miami, FL 33172

### **European/International Regulation:**

#### **Hazard Symbol(s):**

T	Toxic
N	Dangerous for the environment

#### **R-phrase(s):**

R 48/25	Toxic: danger of serious damage to health by prolonged exposure if swallowed.
R 22	Harmful if swallowed.
R 36/37/38	Irritating to eyes, respiratory system and skin.
R 43	May cause sensitization by skin contact.
R 50/53	Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

#### **S-phrase(s):**

S (1/2-)28-36/37/39-45-60-61

## **Section 16. Other Information**

**Disclaimer:** The information provided by Rotam North America, Inc. contained herein is given in good faith and correct to the best of our knowledge. However, the information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification.