



TWIN CHEMICALS, INC.

Specifications

MicroRid Disinfectant Concentrate 20 oz. Canister and 5 lbs. Canister

Appearance:	White Powder
Odor:	Bland
Boiling Point:	212°F
Vapor Density:	2.2
pH:	Neutral
Flash Point:	None
DOT Shipping Class:	55
Shipping Weight:	5 gal. pail 40 lbs. 55 gal. drum 386 lbs.
Specific Gravity:	1
Solubility:	Complete
Coverage Rate:	Hand pump sprayer - 500-2000 sq. ft. per gallon
Reactivity:	Stable
HMIS Rating:	0-0-0
Shelf Life:	2 years
DOT Shipping Name:	Consumer Commodity, ORM-D
DOT Hazard Label:	None



MicroRid is Twin-Chem.'s unique and highly effective mold and mildew stain remover. It is designed to be effective against all types of microbes - bacteria, mold, mildew, fungus and algae. The powdered concentrate with its "rapid dispersion technology" quickly dissolves in water to create the most powerful water-based mold and mildew stain and odor remover on the market. **MicroRid's** unique formulation is specifically designed to leave a long lasting "micro-layer" coating that retards the re-establishment of odors & stains caused by bacteria, mold, mildew and algae. MicroRid can be used on interior and exterior wall surfaces including stone, drywall, stucco, plaster, concrete, brick, fiberglass, Formica, as well as a multitude of other surfaces. Test for colorfastness before applying MicroRid.

Directions:

Read and understand the material safety data sheet when using this product.

1. Mix 4 oz. of MicroRid Powder Concentrate for every gallon of water, mix thoroughly until dissolved.
2. MicroRid may be applied by a variety of simple techniques. It may be applied manually with a spray bottle or garden sprayer and may be applied mechanically with an airless sprayer or fogger. A bristle broom or scrub brush can be used to agitate the area.
3. Rinse if needed, otherwise spray MicroRid on and leave it. MicroRid can be applied to any surface compatible with water such as floors, ceilings, walls, upholstery, rugs, carpets, duct-board, fiberglass, HVAC systems, air purification equipment and air filters.
4. If spraying on any painted or dyed surfaces or materials, test for color fastness in a small inconspicuous area before using this product to insure satisfactory results.

Twin-Chemicals
Atlanta, Georgia

(800) 442-4958
(770) 924-6147 fax

www.twin-chemicals.com



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MATERIAL SAFETY DATA SHEET MICRORID POWDER CONCENTRATE MOLD & MILDEW STAIN AND ODOR REMOVER

HAZARD RATINGS
NFPA HMIS DATA
HEALTH 1 0=
MINIMAL
1= SLIGHT FIRE
2=MODERATE
3=HIGH
REACTIVITY 1
4=EXTREME

SECTION I

MANUFACTURED BY: TWIN-CHEM, INC.
ADDRESS: 6175 HICKORY FLAT HWY. SUITE 110-344
CANTON, GEORGIA 30115
EMERGENCY PHONE NUMBER: (800) 552-3787 (CERTS - CHEMICAL EMERGENCIES ONLY)
PHONE NUMBER FOR INFORMATION: (800) 442-4958
DATE REVISED: August 20, 2009
NAME OF PREPARER: SALIENT CORPORATION CLIFFORD M. CANTRELL

SECTION II HAZARDOUS INGREDIENTS/INFORMATION

INGREDIENT	CAS NO.	OSHA PEL TWA	ACIGH TLV	OTHER STEL	% OR RNG	S K
SODIUM BORATE DECAHYDRATE	1330-43-4		5 mg/m ³	5 mg/m ³	< 50	
SODIUM NITRITE	7632-00-0		Not Estab.	Not Estab.	< 50	

NOTE: AN 'x' UNDER 'SKIN' INDICATES THAT OSHA REQUIRES SKIN PROTECTION TO PREVENT OR REDUCE EXPOSURE

TO THIS INGREDIENT. DOES NOT CONTAIN ANY SARA TITLE III, SECTION 313 SUBSTANCES. SEE SECTION IX FOR REPORTING REQUIREMENTS.

EPA HAZARD CATEGORIES

ACUTE HEALTH

SECTION III - PHYSICAL/CHEMICAL CHARACTERISTICS

Boiling Point: N.A Bulk Density (Grams/liter) 1045 - 1155

Vapor Pressure (mm Hg) NIL Melting Point > 400 F

Vapor Density (Air=1) N/A Evaporation Rate (Water=1) N/A

Solubility in Water: COMPLETE

Appearance and odor: White, granular material with bland odor.

SECTION IV- FIRE AND EXPLOSION HAZARD DATA

Flash Point (Method Used): None Flammable Limits: LEL: N/A UEL: N/A

Extinguishing Media: WATER FLOOD

Special Fire Fighting Procedures: OXIDIZER! FLOOD WITH WATER FROM AS FAR A DISTANCE AS POSSIBLE. DO NOT USE ORGANIC FOAMS. FIREFIGHTERS SHOULD WEAR SELF-CONTAINED BREATHING APPARATUS AND FULL PROTECTIVE CLOTHING WHEN FIGHTING FIRES INVOLVING THIS PRODUCT.

Unusual Fire and Explosion Hazards: OXIDIZER! DRY MATERIAL MAY CAUSE OXIDIZABLE MATERIALS TO IGNIGHT WITHOUT EXTERNAL HEAT SOURCE.

SECTION V- REACTIVITY DATA

Stability: Stable

Incompatibility (Materials to Avoid): Do not mix with acids, oxidizable materials, bleach or reducing agents. Do not mix with anything but water.

Hazardous Decomposition or Byproducts: Heated dry material may release oxygen which can increase intensity of fire.

Hazardous Polymerization: Will Not Occur

SECTION VI- HEALTH HAZARD DATA

Route(s) of Entry: Inhalation? No Skin? Yes Ingestion? Yes Eyes? Yes

Health Hazards (Acute and Chronic): None known.

Carcinogenicity:

NTP? Ingredients not listed.

IARC Monographs? Ingredients not listed.

OSHA Regulated? Ingredients not listed.

Signs and Symptoms of Exposure:

INHALATION: Possible irritation of respiratory system as from nuisance dust.

INGESTION: Toxic by ingestion. Ingestion of small quantities may cause diarrhea, nausea and other symptoms of gastric distress. .

SKIN CONTACT: Possible severe irritation from exposure to the undiluted material.

EYE CONTACT: Severe irritation.

Medical Conditions Generally Aggravated by Exposure: Allergies to nitrates.

Emergency and First Aid Procedures:

INHALATION: Remove victim to fresh air. If breathing does not return to normal within a few minutes, seek medical advice.

EYE CONTACT: Rinse eyes in clear running water for at least 15 minutes lifting upper and lower lids periodically to assure complete rinsing. If irritation results and persists, GET MEDICAL ATTENTION.

SKIN CONTACT: Immediately wash thoroughly with soap and water. If irritation results and persists, GET MEDICAL ATTENTION.

INGESTION: Rinse mouth and dilute stomach contents with 3 to 4 glasses of water or preferably, milk. Induce vomiting. GET IMMEDIATE MEDICAL ATTENTION.

OTHER INFORMATION: Not known to be mutagenic or carcinogenic.

VII- PRECAUTIONS FOR SAFE HANDLING AND USE

Steps to Be Taken in Case Material is Released or Spilled:

SPILLS: SWEEP UP AND PLACE IN SEABLE PLASTIC CONTAINERS FOR DISPOSAL OR REUSE. DO NOT ALLOW TO CONTACT ORGANIC MATERIALS.

Waste Disposal Method: DISPOSE OF WASTE IN AN APPROVED HAZARDOUS WASTE FACILITY IN ACCORDANCE WITH LOCAL, STATE AND FEDERAL REGULATIONS.

Precautions to Be Taken in Handling and Storing: KEEP CONTAINER CLOSED WHEN NOT IN USE. AVOID CONTAMINATION. DO NOT MIX WITH OTHER CHEMICALS.

Other Precautions: KEEP THIS AND ALL CHEMICALS OUT OF REACH OF CHILDREN.

SECTION VIII- Control Measures

Respiratory Protection (Specify Type): When handling dry material or when sweeping up spills use an approved dust/mist mask to prevent inhalation of borax dust.

Ventilation: General as required for comfort.

Protective Gloves: Rubber or neoprene recommended to reduce skin contact.

Eye Protection: Chemical goggles always recommended under any dusting condition.

Other Protective Clothing or Equipment: As required to prevent/reduce skin contact.

Work/Hygienic Practices: Wash product from clothes and skin. Use good housekeeping practices.

SECTION IX - Additional Information

ENVIRONMENTAL

BIODEGRADABILITY: BIODEGRADABLE.

WASTE DISPOSAL METHODS: DISPOSE OF IN AN AUTHORIZED WASTE FACILITY IN ACCORDANCE WITH LOCAL,

STATE AND FEDERAL REGULATION

ADDITIONAL INFORMATION

EMPTY CONTAINER HANDLING: WARNING! EMPTIED CONTAINER RETAINS PRODUCT RESIDUE.

OBSERVE ALL PRECAUTIONS EVEN AFTER CONTAINER IS EMPTIED. KEEP EMPTY CONTAINER CLOSED TIGHTLY.

SARA TITLE III REPORTING REQUIREMENTS

SECTION 302- EXTREMELY HAZARDOUS SUBSTANCES REPORTING NOT REQUIRED

SECTION 304- HAZARDOUS RELEASES REPORTING NOT REQUIRED

SECTION 311- COMMUNITY RIGHT TO KNOW (R-T-K) REPORTING REQUIRED FOR INVENTORY ABOVE TPQ.

SECTION 312- R-T-K INVENTORY DATA REPORTING REQUIRED FOR INVENTORY ABOVE TPQ.

SECTION 313- EMISSIONS AND RELEASE REPORTING NOT REQUIRED

CERCLA SAME AS SECTION 304

REFERENCES

TOXIC SUBSTANCE CONTROL ACT LIST (TSCA) - INGREDIENTS LISTED.

PERMISSIBLE EXPOSURE REFERENCES:

REGISTRY OF TOXIC EFFECTS OF CHEMICAL SUBSTANCES

TITLE 29 CODE OF FEDERAL REGULATIONS

NATIONAL TOXICOLOGY PROGRAM (NTP) REPORT ON CARCINOGENS

INTERNATIONAL AGENCY FOR RESEARCH ON CANCER (IARC) MONOGRAPHS

REGULATORY STANDARDS:

DOT TITLE 49 CODE OF FEDERAL REGULATIONS 172.101

SARA TITLE III

NUCLEAR REGULATORY AGENCY

DOT SHIPPING NAME: CONSUMER COMMODITY, ORM-D

DOT HAZARD LABEL: NONE

THIS DOCUMENT COMPLIES WITH OSHA FORM 174 AS REQUIRED UNDER 29 CFR 1910.1200.

THE INFORMATION CONTAINED HEREIN is believed to be accurate but is not warranted to be so. Users are advised to confirm in advance of need that information is current, applicable and suited to the circumstances of use. Vendor assumes no responsibility for injury to vendee or third persons proximately caused by the material if reasonable safety procedures are not adhered to as stipulated in the data sheet. Furthermore, vendor assumes no responsibility for injury caused by abnormal use of this material even if reasonable safety procedures are followed.

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