



U.S. ENVIRONMENTAL PROTECTION AGENCY  
 Office of Pesticide Programs  
 Antimicrobials Division (7510P)  
 1200 Pennsylvania Ave., N.W.  
 Washington, D.C. 20460

EPA Reg. Number:

94602-43

Date of Issuance:

5/9/23

NOTICE OF PESTICIDE:

Registration  
 Reregistration  
 (under FIFRA, as amended)

Term of Issuance:

Conditional

Name of Pesticide Product:

GBS 468-50% WT

Name and Address of Registrant (include ZIP Code):

Christina M. Swick  
 Agent for  
 GRAY BEARD, LLC  
 Electronic Transmittal: cswick@lewisharrison.com

**Note:** Changes in labeling differing in substance from that accepted in connection with this registration must be submitted to and accepted by the Antimicrobials Division prior to use of the label in commerce. In any correspondence on this product always refer to the above EPA registration number.

On the basis of information furnished by the registrant, the above named pesticide is hereby registered under the Federal Insecticide, Fungicide and Rodenticide Act (FIFRA).

Registration is in no way to be construed as an endorsement or recommendation of this product by the Agency. In order to protect health and the environment, the Administrator, on his motion, may at any time suspend or cancel the registration of a pesticide in accordance with the Act. The acceptance of any name in connection with the registration of a product under this Act is not to be construed as giving the registrant a right to exclusive use of the name or to its use if it has been covered by others.

This product is conditionally registered in accordance with FIFRA section 3(c)(7)(A). You must comply with the following conditions:

1. Submit and/or cite all data required for registration/reregistration/registration review of your product under FIFRA when the Agency requires all registrants of similar products to submit such data.

Signature of Approving Official:

Tara Flint Silva, Acting Product Manager 31  
 RMBI, Antimicrobials Division (7510P)

Date:

5/9/23

2. You are required to comply with the data requirements described in the DCI Order identified below:

- a. ADBAC GDCI-069104-30881

You must comply with all of the data requirements within the established deadlines. If you have questions about the Generic DCI Order listed above, you may contact the Reevaluation Team Leader (Team 36): <http://www2.epa.gov/pesticide-contacts/contacts-office-pesticide-programs-antimicrobial-division>

3. Make the following label changes before you release the product for shipment:
  - Revise the EPA Registration Number to read, “EPA Reg. No. 94602-43.”
4. Submit one copy of the final printed label for the record before you release the product for shipment.

Should you wish to add/retain a reference to the company’s website on your label, then please be aware that the website becomes labeling under FIFRA and is subject to review by the Agency. See FIFRA section 2(p)(2). If the website is false or misleading, the product would be misbranded and unlawful to sell or distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) lists examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product’s label, claims made on the website may not substantially differ from those claims approved through the registration process, FIFRA section 12(a)(1)(B). Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA’s Office of Enforcement and Assurance.

If you fail to satisfy these data requirements, EPA will consider appropriate regulatory action including, among other things, cancellation under FIFRA section 6(e). Your release for shipment of the product constitutes acceptance of these conditions. A stamped copy of the label is enclosed for your records. Please also note that the record for this product currently contains the following CSFs:

- Basic CSF dated 04/26/2023
- Alternate CSF #s 1-5 dated 04/26/2023

If you have any questions, you may contact [FlintSilva.Tara@epa.gov](mailto:FlintSilva.Tara@epa.gov) or [Oiguenblik.Emilia@epa.gov](mailto:Oiguenblik.Emilia@epa.gov).

Enclosure: Stamped label

# Gray Beard, LLC

1931G Rohlwing Road • Rolling Meadows, IL 60008 • 800-837-0499

## GBS 468-50% WT

EPA Reg. No. 94602-  
EPA Est. No

**ACCEPTED**

05/09/2023

Under the Federal Insecticide, Fungicide  
and Rodenticide Act as amended, for the  
pesticide registered under  
EPA Reg. No. 94602-43

(Note to Reviewer: Marketing claims may be used on the front panel.)

### ACTIVE INGREDIENTS:

Alkyl (60%C<sub>14</sub>, 30%C<sub>16</sub>, 5%C<sub>12</sub>, 5% C<sub>18</sub>)  
dimethyl benzyl ammonium chloride ..... 50.0%

**OTHER INGREDIENTS** ..... 50.0%

**TOTAL:** ..... 100.0%

{Weight Approx. 8.04 lbs./gallon}

## KEEP OUT OF REACH OF CHILDREN DANGER {PELIGRO}

{See [{left} {back} {side} {right} {insert} {panel} {of label}] {below} for {additional}  
{precautionary statements}}.

(Note to Reviewer: In accordance with 40 CFR 156.68(d), all first aid statements, as prescribed, will appear on the front panel of the product label.)

### FIRST AID

In case of emergency, call a poison control center or doctor for treatment advice. Have the product container or label with you when calling a poison control center or doctor, or going for treatment.

**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.

**IF ON SKIN:** Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes.

**IF INHALED:** 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.

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

**NOTE TO PHYSICIAN:** Probable mucosal damage may contraindicate the use of gastric lavage.

Have the product container or label with you when calling a poison control center or doctor or going for treatment. For non-emergency and general information on product use, etc., information pertaining to this product, call the National Pesticides Information Center (NPIC) at 1-800-858-7378, Monday – Friday, 8:00 am – 12:00 pm Pacific Time; email: npic@ace.orst.edu; or visit the web site: www.npic.orst.edu. For emergencies, call [{the poison control center 1-800-222-1222} {insert number of emergency contact} {hours of operation} {24 hours a day} {7 days a week}}.

(Note to Reviewer: This referral statement may be organized in any order to be grammatically correct.) The term “x” is a place holder for numerical digits. Punctuation and plural/singular word forms may be adjusted to allow for grammatical correctness. Appropriate metric or imperial unit conversion may be added as optional supplemental information.)

{{Consult} {See {additional} {sheet} {insert} {inside} {outer container} {Product Information} {Bulletin} for {other} {directions for use} {and} {information} {claims} {organisms} {applications}}.

Manufactured for: Gray Beard LLC  
1931G Rohlwing Road  
Rolling Meadows, IL 60008

Net Contents:

{{Batch} {Lot} No} {Manufacturing Date}:  
{Product of USA} {Made in the USA}

## MARKETING CLAIMS

*(Note to Reviewer: Marketing text is considered optional. Commas and the words “and” “or” can be added to phrases to make text grammatically correct.)*

*(Note to Reviewer: In the case where a location, surface, or marketing claim is not registered in the State of California the statement “(Not for use in CA.)” may be added to the relevant text.)*

### {LOCATIONS/SURFACES}

*(Note to Reviewer: The locations/surfaces have been grouped for space purposes only; they can be used individually or grouped together in any order however at least **one** location/surface must appear on the label. In the case where one or more location/surface is chosen, an “and” “&” “or” may be used to link locations/surfaces.)*

This product is for use in *(insert location)*

For use {in} {on} *(insert location/surface)*.

### {LOCATIONS}

**{Water Treatment}** *{Not for use in California}*

- Air washers
- Auxiliary water systems
- Commercial recirculating cooling water towers
- Drilling, completion and workover fluids systems
- Gas production and transmission pipeline and systems
- Gas storage wells and systems
- Hydrotesting facilities
- Industrial {and/or} {commercial} recirculating cooling towers.
- Oil field water flood or salt water disposal systems {and fracturing fluid systems}
- Oil field injection and waste water
- Once through fresh {and sea} water cooling systems
- Once through freshwater systems
- Packer fluid systems
- Pipeline pigging and scraping operations
- Recirculating water systems
- Retort water systems
- Waste water systems
- Water cooling systems
- Paper manufacturing
- Pulp and paper mills {water process systems}

### {SURFACES}

- Paper and paperboard

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## WATER TREATMENT MARKETING CLAIMS *{Not for use in California}*

*(Note to Reviewer: The following marketing claims may be used with the prefix “This product” or “This product is {a} {an}”.)*

- Algaecide
- Aids in the control of bacterial, fungal and algal slimes in evaporative condensers, heat exchange water systems, industrial and commercial cooling towers, air washers, retorts, pasteurizers, and industrial water scrubbing systems.
- Water treatment microbiocide for industrial and/or commercial recirculating cooling water towers, retort water systems and flood systems and fracturing fluids.
- Aids in the control of bacterial, fungal and algal slimes in evaporative condensers, heat exchange water systems, industrial and commercial cooling towers, Influent systems such as flow through filters and lagoons, industrial water systems and brewery pasteurizers.
- Aids in the control of bacterial, fungal and algal slimes in retort water systems
- Water treatment microbiocide for industrial and/or commercial recirculating cooling water towers, and oil field flood/salt water disposal systems and fracturing fluids.
- Microbiocide for use in controlling sulfate-reducing bacteria and slime forming bacteria in oil well drilling, oil field processing applications, oil field water systems, oil and gas productions and transmission pipelines and systems, and gas storage fields and equipment; such as steam-injection water holding tanks, flood water, injection water, holding pond water, disposal-well water, water holding tanks, fuel storage tanks and related refinery and oil field closed systems, industrial recirculating water handling systems.

- Water treatment microbiocide for use in controlling microorganisms such as sulfate-reducing bacteria, slime forming bacteria, algae, and mold and yeast in oil and gas systems, and building and industrial cooling tower systems.
- Microbiocide for use in controlling slime forming bacteria, sulfate-reducing bacteria (SRB) and fungi (yeast and molds) and algae in air washers and industrial scrubbing systems, process water systems including those that contain reverse osmosis membranes and in service water and auxiliary systems and heat transfer systems and in wastewater systems including wastewater sludge and holding tanks, and in paper mills and paper mill process water systems and water based coatings for paper and paperboard.
- Controls, algae and algal slime growth in industrial and/or commercial recirculating cooling water towers and once through freshwater cooling systems.
- Effective against the growth of algae.
- For control of algae, algal, fungal and bacterial slimes in recirculating water systems, auxiliary water and waste water systems and water cooling systems, oil field water flood systems.
- Has been designed specifically for control of sulfate-reducing bacteria that contribute to souring, the production of sulfide, and abiotic corrosion in water cooling systems, paper mill process water systems, oil field systems, gas production and transmission pipelines and systems.
- Helps inhibit the growth of unsightly algae.
- Is a microbiocide that helps clean and loosen slime debris from cooling and flooding system surfaces.
- Kills and prevents algae.
- The residual effectiveness of this algaecide tends to stabilize the total chemical treatment system.
- This product is effective for the control of odor-forming and slime-forming bacterial, fungi and algae in auxiliary service water systems such as fire protection systems and pump or screen bays, waste water systems such as storage tanks, storage piles, associated piping, setting ponds or lagoons, transport spillways or canals and disposal wells.
- This product reduces bacterial contamination and degradation of fracturing fluids and gels used in oil and gas well stimulations.
- To control algae and bacterial slimes, use this water treatment microbiocide as directed.

### PULP AND PAPER MILL MARKETING CLAIMS (Not for use in CA)

**(Note to Reviewer:** The following marketing claims may be used with the prefix “This product” or “This product is {a} {an}”.) x

- Is used to inhibit fungal growth, which causes discoloration, odor and degradation of paper, paperboard or wet lap.
- Can be used as a slimicide in the manufacture of paper and paperboard, depending on the type of stock, quality of raw water, complexity of the system, and degree of contamination.
- For control of bacterial and fungal slimes in pulp mills, paper mills and paper manufacturing.
- This product can be used as a slimicide in the manufacture of paper and paperboard, depending on the type of stock, quality of raw water, complexity of the system, and degree of contamination. Do not use to treat paper or paperboard which will contact food.
- This product is used to inhibit fungal growth which causes discoloration, odor and degradation of paper, paperboard or wet lap.

### GENERAL MARKETING CLAIMS

**(Note to Reviewer:** The following marketing claims may be used with the prefix “This product” or “This product is {a} {an}”.)

- Efficient and non-staining when used as directed.
- Is non-staining
- Mold and mildew and algae stain remover
- No Bleach
- Non-Acidic
- Non-Caustic
- Will not damage tile, concrete, metal or plastics.

### PACKAGING CLAIMS

- Concentrate{d}
- 50% Concentration
- 50% Concentration Easy to use.
- Economy size. **(Note to Reviewer:** To be used on applicable container)
- Is an economical concentrate.
- Make (insert value) [{Gal.} {quarts} {Containers}]
- This [{container} {bottle}] is made of {at least} (x)% post-consumer recycled plastic.

## DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

**(Note to Reviewer (General Considerations):** Numbered instructions will be used if label space permits, otherwise may appear in paragraph format. Unit abbreviations can be spelled out. When choosing optional text, appropriate punctuation can be inserted or deleted. Equivalent use dilution ratios may be substituted within the directions.)

{Please read entire label and use strictly in accordance with precautionary statements and directions.}

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### WATER TREATMENT *{Not for use in California}*

Do not use water containing residues from use of this product to irrigate crops for food or feed.

**(Note to Reviewer:** The following sentence must be used with the air washer use listed in the direction:)

For use only in industrial air washers and air washer systems which have mist-eliminating components.

**AIR WASHERS, INDUSTRIAL {{AND/OR} COMMERCIAL} RECIRCULATING COOLING WATER TOWERS, RETORT WATER SYSTEMS, EVAPORATIVE CONDENSERS, HEAT {{EXCHANGE} {TRANSFER}} {WATER} SYSTEMS, INFLUENT SYSTEMS, {BREWERY} PASTEURIZERS AND WARMERS:** For best results, clean heavily contaminated systems before treatment with this product. If soap or anionic detergent is used, rinse thoroughly before charging with this algacide. {Cooling tower waters that are inherently low in algae growth and bacteria count may be adequately controlled by the lower range of these dosages.} Repeat every seven days or increase frequency if needed. Should slime develop again, repeat initial dosage.

1. **Dosing Location:** This product is to be applied at a point in the system where it will be uniformly mixed, such as the basin area, the sump, or another reservoir or collecting area.
2. **Dosing Conditions:** This product must be applied when the system is in jeopardy of being affected or after cleaning systems where efficiency is already impaired. {Tower bleed off valves must be closed to permit a retention time of 4 hours.}
3. **Method of Application:**
  - a) **INTERMITTENT OR SLUG METHOD**

**Initial Dose:** When the system is noticeably fouled, apply 5.25 – 10.25 oz. of this product per 1,000 gal. of water {(20-40 ppm active)} in the system. Repeat until control is achieved.

**Subsequent Dose:** When microbial control is evident, add 1.33 – 3.85 oz. of this product per 1,000 gal. of water {(5-15 ppm active)} in the system weekly or as needed to maintain control. Badly fouled systems must be cleaned before treatment is begun.
  - b) **MODIFIED INTERMITTENT METHOD**

**Initial Dose:** When the system is noticeably fouled, apply 5.25- 10.25 oz. of this product per 1,000 gal. of water {(20-40 ppm active)} in the system. Apply half this initial dose when half of the water in the system has been lost by blowdown.

**Subsequent Dose:** When microbial control is evident, add 1.33 – 3.85 oz. of this product per 1,000 gal. of water {(5-15 ppm active)} in the system. Apply half this initial dose when half of the water in the system has been lost by blowdown.
  - c) **CONTINUOUS FEED METHOD**

**Initial Dose:** When the system is noticeably fouled, apply 5.25 – 10.25 oz. of this product per 1,000 gal. of water {(20-40 ppm active)} in the system.

**Subsequent Dose:** Maintain this treatment by starting a continuous feed of 1.33 – 3.85 oz. {of this product per 1,000 gal. of water {(5-15 ppm active)} lost by blowdown. Badly fouled systems must be cleaned before treatment is begun.

**ONCE THROUGH FRESH {AND SEA} WATER COOLING SYSTEMS:** Use of this product in either public/municipal or single or multiple family private/residential potable/drinking water systems is strictly prohibited. Use of the product in any cooling water system that discharges effluent within ¼ mile of either public/municipal or single or multiple family private/residential potable/drinking water intake is strictly prohibited

{For best results, slug feed. The frequency of addition of microbicide needed depends on many factors. To optimize your use of water treatment microbicide, follow this procedure.}

1. **Dosing Location:** This product is to be applied at a point in the system where it will be uniformly mixed, such as at the sump.
2. **Dosing Conditions:** This product must be applied when the system is in jeopardy of being affected or after cleaning systems where efficiency is already impaired.
3. **Method of Applications:**
  - a) Wear safety glasses, rubber gloves and impervious apron.
  - b) To reduce foaming, mix 2 parts of water to 1 part of this product.
  - c) {Use} {Add} 0.26 to 2.6 fluid oz. {(1- 10 ppm on an active quaternary basis)} per 1,000 gal.
  - d) Do not discharge without performing proper deactivation. To perform deactivation use Bentonite Clay. The minimum ratio to be used is 5 ppm of clay to 1 ppm of product



- e) Treatment time cannot exceed 120 hours/application nor exceed 4 times per year.
- f) Avoid oxidizers and reducing agents. Product is cationic and must not be mixed with soap or anionic surfactants.

(OR)

*(Note to reviewer: Alternate Method of Application language can be used in place of item #3 directly above.)*

### 3) Method of Application:

#### INTERMITTENT OR SLUG METHOD

**Initial Dose:** When the system is noticeably fouled, apply 0.154 – 1.54 oz. of this product per 1000 gal. of water {(0.6 - 6 ppm active)} based on system flow rates. The minimum treatment is 6 to 24 hours. Repeat until control is achieved. Deactivation must be conducted prior to discharge from the system by using bentonite clay at a minimum ratio of 5 ppm clay to 1 ppm product.

**Subsequent Dose:** When microbial control is evident, add 0.077 – 0.77 oz. of this product per 1000 gal. of water {(0.3 - 3 ppm active)} based on system flow rates on an as needed basis to maintain control. Frequency of feed must be tied to an in-plant monitoring program for macro clogging growth. Deactivation must be conducted prior to discharge from the system by using bentonite clay at a minimum ratio of 5 ppm clay to 1 ppm product.

*(Note to Reviewer: Deactivation instructions must be used with the above Once Through directions for use.)*

**DEACTIVATION:** Use bentonite clay at the minimum ratio of 5 ppm clay to 1 ppm product. Deactivation must occur prior to discharge of the NPDES outfall. Do not apply this product more than 4 times a year.

#### BACTERIAL, FUNGAL AND ALGAE {SLIME} CONTROL IN RECIRCULATING AUXILIARY AND WASTE WATER SYSTEMS, AND {BREWERY} PASTEURIZERS:

**Initial dose:** Add this product at an initial dosage of 5.25 – 10.25 oz. of product per 1,000 gal. of system water {(20 – 40 ppm active)}. Repeat until the desired level of control is achieved. Heavily contaminated systems must be pre-cleaned.

**Subsequent dose:** Once control is achieved, add maintenance dosages of 1.33 – 5.25 oz. of product per 1,000 gal. of system water {(5 – 20 ppm active)} weekly or as needed to maintain control. Apply this product to a point in the system where it will be uniformly mixed and distributed, such as the tower sump

**AUXILIARY SERVICE WATER AND WASTEWATER SYSTEMS:** Add 1.5 – 46.25oz. of this product per 3,000 gal. of water {(5-180 ppm active)} in the system continuously. This product must be added to the system at a point of uniform mixing by slug or intermittent feed or by spraying onto a waste pile. The frequency of feed or spray and the duration of treatment will depend upon the severity of the contamination. Additions to water systems must be made during the pumping operation and as close to the pump as possible to ensure adequate mixing.

**INDUSTRIAL WASTEWATER SYSTEMS {Wastewater Systems, Wastewater Sludge and Wastewater Holding Tanks}:** This product is added to a wastewater system or sludge at a convenient point of uniform mixing such as digester. Add 0.5 - 2.50 gal. of this product per 1,000 gal. of wastewater or sludge {(250 -1250 ppm active)}.

## OIL FIELD, GAS PRODUCTION AND TRANSMISSION PIPELINE AND SYSTEMS

*{Not for use in California}*

**{OIL FIELD} {GAS PRODUCTION} {TRANSMISSION PIPELINE} {AND} {SYSTEMS}:** Specific treatment requirements vary among oil and/or gas field sites and subsystem components. {Oil field fluids and subsystems most commonly requiring microbial contamination control are raw water sources, separators, ballasts, storage and mixing tanks, screens, surface injection equipment, production equipment {(such as injection and production piping casing, completion and valving)} and the formation itself.} The primary point of treatment will vary among oil and/or gas field operations depending on the site problems, water-flood treatment methods and equipment. This product must be added where it will disperse rapidly and uniformly to the desired area of treatment.

Additions of this product must be made with the proper type of metering pump equipment, suction (low pressure) side of pumping equipment or similar device. This product must be added to the system by slug, continuous or on an intermittent basis, depending on the degree of system fouling.

**{OIL FIELD} WATER FLOOD {or SALT WATER} {DISPOSAL} SYSTEMS, AND FRACTURING FLUIDS:** This product must be added to the water flood at a point of uniform mixing.

1. **Continuous Use:** Add 0.1 - 0.2 gal. of this product per 10,000 gal. of water {(5-10 ppm active)} to control slime forming and sulfate reducing bacteria. Levels for effective control will vary depending on conditions at the site.
2. **Intermittent Use:** Add at a rate of 0.1 - 0.4 gal. of this product per 10,000 gal. of water {(5 - 20 ppm active)} for 4 - 8 hrs. per day, one to four times a week as needed to maintain control.
3. **Treatment of flow back return water {(Post Hydraulic Fracturing)}:** Dose at a rate of 0.1 - 0.4 gal. of this product per 10,000 gal. of water of water {(5 - 20 ppm active)} for 4 - 8 hours per day, one to four times a week as needed to maintain control.

**OIL FIELD INJECTION AND WASTE WATER:** This product must be added to the water handling system at a point of uniform mixing such as the area of addition of make-up water to the holding tank.

### Method of Application:

1. **Continuous Injection:** Add this product at 7.75 oz. of this product per 1,000 gal. of water {{30 ppm {active}}} when system is noticeably fouled. When microbial control is evident, add 3.84 oz. of this product per 1,000 gal. of water {{15 ppm {active}}} to maintain control.
2. **Batch Treatment:** Add this product at 46.25 oz. of this product per 1,000 gal. of water {{180 ppm {active}}} over a period of 4 – 6 hours one or more times per week when the system is noticeably fouled. When microbial control is evident, add 23.1 oz. of this product per 1,000 gal. of water {{90 ppm {active}}} over a period of 4 – 6 hours one or more time per week.

(OR)

For use in oil field and/or petrochemical water subsurface injection systems of secondary and/or tertiary oil recovery systems to reduce the number of anaerobic bacteria, aerobic bacteria, and sulfate-reducing bacteria.

1. **Dosing Location:** This product is to be applied at a point in the recovery system where it will be uniformly mixed, such as at the screens, storage tanks, and other mixing device locations.
2. **Dosing Conditions:** This product should be applied when the system is in jeopardy of being affected. Badly fouled systems must be cleaned before treatment is begun.
3. **Equipment Used:** Use the injection pump to apply the product.
4. **Use Limitations:** Dependent upon pH, temperature and salt content, adjust according to conditions found at the site as needed to maintain control.
5. **Method of Application:**

#### SLUG METHOD

**Initial Dose:** When the system is noticeably fouled, apply 15.25 ounces (60 ppm active ingredient) of this product per 1000 gallons of water in the system. Apply for 3 to 8 hours daily until control is achieved.

**Subsequent Dose:** When microbial control is evident, add 7.5 ounces (30 ppm active ingredient) of this product per 1000 gallons of water in the system daily or as needed to maintain control.

#### INTERMITTENT DOSAGE

**Initial Dose:** When the system is noticeably fouled, apply 15.25 ounces (60 ppm active ingredient) of this product per 1000 gallons of water in the system. Apply for 3 to 8 hours daily until control is achieved.

**Maintenance Dose:** When control of microbial growth is evident, apply 7.5 gallons (30 ppm active ingredient) of this product per 1000 gallons of water in the system daily or as needed to maintain control.

#### CONTINUOUS FEED METHOD

**Initial Dose:** When the system is noticeably fouled, apply 3.75 ounces (15 ppm active ingredient) of this product per 1000 gallons of water in the system.

**Subsequent Dose:** Maintain this treatment by starting a continuous feed of 3.75 ounces (15 ppm active ingredient) of this product per 1000 gallons of water daily or as needed to maintain control

**{FRACTURING} {FRAC} FLUIDS:** Add this product to the frac water storage tanks or directly into the well head injection pipeline as the water is being pumped down-hole. Dose Range; Add 0.1 - 0.4 gal. of this product per 10,000 gal. of water {{5 - 20 ppm active}} to control slime forming and sulfate reducing bacteria. Levels for effective control will vary depending on conditions at the site.

**OIL AND GAS PRODUCTION AND TRANSMISSION PIPELINES AND SYSTEMS:** For the control of sulfate-reducing bacteria and slime forming bacteria, this product must be added to a gas production or transmission pipeline via direct injection at a point where uniform and maximum distribution will occur. The application must be conducted to ensure maximum distribution of the product through the internal surface of the pipeline by adding an amount of biocide which eventually comes out the other end of the pipeline. Criteria for success of the treatment will be reduction in bacterial count and/or corrosion rates. To facilitate application, it is desirable to dilute the product with an appropriate solvent immediately before use. The concentration in the solvent must not fall below an active concentration range of 500 to 5,000 ppm based on the volume of water in the pipeline. Injections to the system must be weekly, or as needed to maintain control.

**GAS STORAGE WELLS AND SYSTEMS:** To treat individual injection wells add 15.5 oz. - 2 gal. of this per product per 1,000 gal. {{65 – 1,000 ppm active}} to produce an effective concentration. Update treatment rate as needed. This product must be diluted by the water present in the formation. Injection takes place before gas is injected and may be repeated yearly or as needed to maintain control

**PIPELINE PIGGING AND SCRAPING OPERATIONS:** Add this product to slug water immediately following the scraper {{keep the water volume to a minimum and contained between the scraper and the {{following} {trailing}} pig}}. Add an effective concentration of 2 – 12.88 oz. of product per 100 gal. of water {{75-500 ppm active}} depending on the length of the pipeline and the severity of the biofouling.

**DRILLING {(MUDS)}, COMPLETION AND WORKOVER FLUIDS SYSTEMS:** This product is to be added to these fluid systems at a point of uniform mixing, such as a circulating, holding or mud tank. Levels for effective control will vary depending on conditions at the site and the severity of the contamination.

1. **Initial treatment:** Add 0.13– 2 gal. of this product per 1,000 gal. {{65 – 1,000 ppm active}} to a freshly prepared fluid.
2. **Maintenance dosage:** Add 0.13– 2 gal. of this product per 1,000 gal. {{65 – 1,000 ppm active}} to a freshly prepared fluid.



**PACKER FLUIDS:** This product is to be added to the packer fluid at a point of uniform mixing such as a circulating holding tank {and} {other mixing device locations}. Add 0.13-2 gal. of this product per 1,000 gal. of packer fluid {(65 - 1000 ppm active)} to a freshly prepared fluid. Levels for effective control vary depending on conditions at the site and the severity of contamination. Seal the treated packer fluid in the wall between the casing and the production tube.

**HYDROTESTING:** Treat water used to hydro test pipelines or vessels by adding 16.5 – 256 oz. of this product per 1,000 of water {(65-1,000 ppm active)} depending on the water quality and length of time the equipment will remain idle.

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## PULP AND PAPER MILLS AND PAPER MANUFACTURING *{Not for use in California}*

Do not use to treat paper or paperboard which will contact food.

**Slimicide Application:** Do not use to treat paper or paperboard which will contact food. Apply this product to the paper making system at a point of uniform mixing such as thin or thick stock chests, save-all tank, process tank or whitewater tank.

**Initial Dose:** When system is noticeably contaminated, add 0.2 – 40 gal. of this product per 100,000 gal. of whitewater {(1 – 200 ppm of product)} to be treated as a continuous or slug dose. Repeat until control is achieved. Heavily fouled systems must be boiled out prior to initial treatment.

**Subsequent Dose:** When microbial control is evident, add 0.2 – 20 gal. of this product per 100,000 gal. of whitewater {(1 – 100 ppm of product)} to be treated as necessary to maintain control.

### **Control Of Bacterial, Fungi/Mold & Algae {Slime} on Pulp, Paperboard & Wet Lap**

Application of this product must be made at a point in the system where mixing action is good or can be made at the size press or water box. For inhibition of wet lap or sheet pulp this product must be applied to the dewatered pulp surface via applicator rolls or showers

**Dosing Application:** Apply at a rate of 0.4 – 80 lbs. of this product per ton {(dry basis)} of pulp or paperboard produced. This product may be drip fed continuously from the drum, diluted and showered to the wet sheet or fed by suitable pumps.

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## STORAGE AND DISPOSAL

Do not contaminate water, food, or feed by storage and disposal.

**{PESTICIDE} STORAGE:** Store only in original container. Keep this product under locked storage sufficient to make it inaccessible to children or persons unfamiliar with its proper use.

**PESTICIDE DISPOSAL:** Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide, spray mixture or rinsate is a violation of Federal Law. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste Representative at the nearest EPA Regional Office for guidance.

### **CONTAINER HANDLING:**

*{(Note to Reviewer: One or more of the following paragraphs for Container Handling will be selected, depending on packaging use/type.)}*

*{For non-refillable containers equal to or less than 5 gallons}*

Non-Refillable Container. Do not reuse or refill this container. Triple rinse container {(or equivalent)} promptly after emptying. Triple rinse as follows: Fill the container ¼ full with water and recap. Shake for 10 seconds. Drain for 10 seconds after the flow begins to drip. Follow Pesticide Disposal instructions for rinsate disposal. Repeat this procedure two more times. Then offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration.

*{For non-refillable containers greater than 5 gallons}*

Non-Refillable Container. Do not reuse or refill this container. Triple rinse container {(or equivalent)} promptly after emptying. Triple rinse as follows: Fill the container ¼ full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip back and forth several times. Turn the container over onto its other end and tip back and forth several times. Follow Pesticide Disposal instructions for rinsate disposal. Repeat this procedure two more times. Then offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration.

*{Refillable containers}*

Refillable Container. Refill this container with this product only. Do not reuse this container for any other purpose. Cleaning the container before final disposal is the responsibility of the person disposing of the container. Cleaning before refilling is the responsibility of the refiller. To clean the container before final disposal, empty the remaining contents from this container into application equipment or a mix tank. Fill container about 10 percent full with water. Agitate vigorously or recirculate water with the pump for 2 minutes. Pour or pump rinsate into application equipment or rinsate collection system. Repeat this rinsing

procedure two more times.

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## PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS

**DANGER.** Corrosive. Causes irreversible eye damage and skin burns. May be fatal if inhaled. Harmful if swallowed or absorbed through the skin. Do not get in eyes, on skin or on clothing. Do not breathe vapor or spray mist. Wear a minimum of a NIOSH-approved elastomeric half mask respirator with organic vapor (OV) cartridges and combination N1, R, or P filters; OR a NIOSH-approved gas mask with OV canisters; OR a NIOSH-approved powered air purifying respirator with OV cartridges and combination HE filters. Wear goggles or face shield, chemical-resistant gloves and protective clothing when handling. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco or using the toilet. Remove contaminated clothing and wash before reuse.

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## PHYSICAL OR CHEMICAL HAZARDS

Do not mix with soap, anionic detergents or oxidizers. Do not use or store near heat or open flame.

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## ENVIRONMENTAL HAZARDS

*(If container is equal to or greater than 5 gallons, the following statement must appear on the label.)*

This product is toxic to fish, aquatic invertebrates, oysters and shrimp. Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product into sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA

*(If container is less than 5 gallons, use the following as an alternate to the above statement.)*

This product is toxic to fish, aquatic invertebrates, oysters and shrimp.

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## {SPANISH ADVISORY STATEMENTS}

*(Note to Reviewer: This statement is optional except when used on labels with agricultural uses.)*

{SI USTED NO ENTIENDE LA ETIQUETA, BUSQUE A ALGUIEN PARA QUE SE LA EXPLIQUE A USTED EN DETALLE. IF YOU DO NOT UNDERSTAND THE LABEL, FIND SOMEONE TO EXPLAIN IT TO YOU IN DETAIL.}

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## {GRAPHICS AND ICONS}

*(Note to Reviewer: These are representative icons for use sites/application methods that may appear on the label with the appropriate directions for use, PPE or package type.)*

{Baby Drowning in Bucket Warning Graphic}

{Made in USA Logo/Flag}

{Recycling Logo}

{Mixing Chemical Warning Graphic}

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## {WARRANTY STATEMENT}

*(Note to Reviewer: This statement is optional.)*

Read Product Safety Data Sheet prior to use, PRODUCT WARRANTY, DISCLAIMER AND LIMITATION OF LIABILITY ARE FOUND on the Product Material Safety Data Sheet. Unless inconsistent with applicable law, use of Product signifies agreement with these provisions.

Lea la Hoja de Seguridad del Producto antes de usarlo. LA GARANTIA DEL PRODUCTO, DESCARGO DE RESPONSABILIDAD Y LIMITACIÓN DE RESPONSABILIDAD SE ENCUENTRAN en la Hoja de Seguridad del Producto. A menos de que sea inconsistente con la ley, el use del producto significa el acuerdo con estas disposiciones.

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