

# TECHNICAL BULLETIN





19 Motivation Dve Wangara, WA, 6065 AUSTRALIA  
T +61 8 9302 4000 | FREE 1800 999 196 | F +61 8 9302 5000

## FERRIC SULPHATE 42% Coagulation Agent for Water Treatment

**FERRIC SULFATE 42%** Ferric sulfate is coagulant for potable water treatment  
Contains: 40-42% Ferric Sulfate

**DANGER**  
**May be corrosive to Metals**  
**Harmful if swallowed**  
**Causes severe skin burns and eye damage.**


Do not breathe mists. Wash skin thoroughly after handling. Wear protective gloves/ protective clothing/ eye protection/face protection.  
IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.  
IF ON SKIN (or hair): Remove/ Take off immediately all contaminated clothing. Rinse skin with water/shower.  
IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.  
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.  
Wash contaminated clothing before reuse. Store locked up. Dispose of contents/ container in accordance with local/regional/ national/ international Regulations




**EMERGENCY INFORMATION:** Additional information is listed in the Material Safety Data Sheet  
**IN AN EMERGENCY DIAL 000 POLICE OR FIRE BRIGADE**

**BATCH NO. 16312** **CONTENTS 1000 L**

**UN 3264 CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (FERRIC SULFATE) CLASS 8 HAZCHEM 2X PG III**



1 1 3 0 0 2 6 0

 T: +61 8 9302 4000 E: sales@environex.net.au  
F: +61 8 9302 5000 W: www.environex.net.au  
FREE 1800 999 196 19 Motivation Drive, Wangara, WA 6065

### MATERIAL & FUNCTION

**FERRIC SULPHATE 42%** is a liquid coagulation agent for the treatment of wastewater prior to disposal. **FERRIC SULPHATE 42%** coagulates colloidal and semi colloidal solids as well as phosphate and other anions. In addition it also assists in dewatering sludge due to the density of the floc formed.

**FERRIC SULPHATE** is also useful in reducing organic and inorganic soluble and suspended matter, reducing COD/BOD and “splitting” emulsions. However, generalisations cannot be made and **FERRIC SULPHATE 42%** should be evaluated for each use.

# TECHNICAL BULLETIN



19 Motivation Dve Wangara, WA, 6065 AUSTRALIA  
T +61 8 9302 4000 | FREE 1800 999 196 | F +61 8 9302 5000

## APPEARANCE

Dark brown, heavy liquid.

## APPLICATION

**FERRIC SULPHATE 42%** can be added manually or automatically dosed into water treatment tank at the secondary treatment stage. Rates of addition can be determined by the user, refer to Technical Data Sheet "**FERRIC SULPHATE 42% - User Evaluation Information**".

## USER EVALUATION INFORMATION

To evaluate your optimum dose rate for using **FERRIC SULPHATE 42%** in your water treatment system, a laboratory trial should be undertaken. The primary factors affecting **FERRIC SULPHATE** as a coagulant are:-

- 1) Dose rate of Coagulant
- 2) pH of filtered water
- 3) Floc Size
- 4) Turbidity, BOD and suspended solids of clarified water.

## OUTLINE OF TESTING

Prepare a 10 mg/L solution of **FERRIC SULPHATE 42%** by diluting 10 gm to 1000 ml of water, remove a 1ml sample and dilute to 1L with water.

Perform a jar test with a known quantity of wastewater using a flocculator or "gang" stirrer. Add the dose of **FERRIC SULPHATE** dilutions from (1) above and mix at 100 rpm for 2 minutes. Slow the stirrer to 25 rpm and mix for 10 minutes then switch off the stirrer and allow to settle for 15 minutes. The volume or weight of the floc is the primary determinant for the effectiveness of the process.

Tests over pH ranges, typically 5 to 9 should be used in combination with rate trials in section 2. Any general-purpose alkali may be used to adjust pH. A matrix results based on pH and dose rate will dictate the optimum use rate of **FERRIC SULPHATE**.

## PACKAGING

1000 Litre container

# TECHNICAL BULLETIN



19 Motivation Dve Wangara, WA, 6065 AUSTRALIA  
T +61 8 9302 4000 | **FREE** 1800 999 196 | F +61 8 9302 5000

## **IMPORTANT NOTICE TO CUSTOMER**

*Since the use of this product is beyond the control of either seller or manufacturer, their only obligation shall be to replace any quantity of product which is proven defective. They cannot assume any risk or liability in excess of the purchase price of the product itself, which does not include labour or any consequential damages resulting from the use of this product. Determining the suitability of this product for any intended use shall be solely the responsibility of the user. ALWAYS TEST FIRST.*