HALLIBURTON

SAFETY DATA SHEET

according to Regulation (EC) No. 453/2010

FE-3A

Revision Date: 20-Dec-2012 Revision Number: 11

1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

Product Identifier

Product Name FE-3A

Relevant identified uses of the substance or mixture and uses advised against

Recommended Use Iron Control Agent
Uses Advised Against No information available

Details of the supplier of the safety data sheet

Halliburton Energy Services

Halliburton House, Howemoss Place

Kirkhill Industrial Estate

Dyce

Aberdeen, AB21 0GN

United Kingdom

Emergency Phone Number: +44 1224 795277 or +1 281 575 5000

www.halliburton.com

For further information, please contact

E-Mail address: fdunexchem@halliburton.com

Emergency telephone number

+44 1224 795277 or +1 281 575 5000

Emergency telephone §45	- (EC)1272/2008				
Europe	112				
Denmark	Poison Control Hotline (DK): +45 82 12 12 12				
France	ORFILA (FR): + 01 45 42 59 59				
Germany	Poison Center Berlin (DE): +49 030 30686 790				
Italy	Poison Center, Milan (IT): +39 02 6610 1029				
Netherlands	National Poisons Information Center (NL): +31 30 274 88 88 (NB: this service is only available to health professionals)				
Norway	Poisons Information (NO):+ 47 22 591300				
Poland	Poison Control and Information Centre, Warsaw (PL): +48 22 619 66 54; +48 22 619 08 97				
Spain	Poison Information Service (ES): +34 91 562 04 20				
United Kingdom	NHS Direct (UK): +44 0845 46 47				

2. HAZARDS IDENTIFICATION

Classification of the substance or mixture REGULATION (EC) No 1272/2008

Acute Oral Toxicity	Category 4- H302
Serious Eye Damage / Eye Irritation	Category 2- H319
Carcinogenicity	Category 2- H351

Classification according to EU Directives 67/548/EEC or 1999/45/EC

For the full text of the R-phrases mentioned in this Section, see Section 16

2. HAZARDS IDENTIFICATION

Xn - Harmful.

Risk Phrases R22 Harmful if swallowed.

R40 Limited evidence of a carcinogenic effect.

Label Elements

Classification

Hazard Pictograms





Warning

Signal Word

Hazard Statements

H351 - Suspected of causing cancer

H302 - Harmful if swallowed

H319 - Causes serious eye irritation

Contains

SubstancesCAS NumberOrganic saltProprietary

Precautionary Statements - EU (§28, 1272/2008)

P201 - Obtain special instructions before use

P202 - Do not handle until all safety precautions have been read and understood

P264 - Wash face, hands and any exposed skin thoroughly after handling

P281 - Use personal protective equipment as required

P308 + P313 - IF exposed or concerned: Get medical advice/attention

P301+ P312 - IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell

P330 - Rinse mouth

P305 + P351 + P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

P337 + P313 - If eye irritation persists: Get medical advice/attention

Other Hazards

None known

3. COMPOSITION/INFORMATION ON INGREDIENTS						
Substances	EINECS	CAS Number	PERCENT	EEC Classification	EU - CLP Substance Classification	REACH No.
Organic salt	Not Listed	Proprietary	60 - 100%	Xn,Xi; R22-36	Acute Tox. 4 (H302)	No data available

Carc. 2 (H351)

For the full text of the R-phrases mentioned in this Section, see Section 16

4. FIRST AID MEASURES

Description of first aid measures

Inhalation If inhaled, remove from area to fresh air. Get medical attention if respiratory

irritation develops or if breathing becomes difficult.

Eyes Immediately flush eyes with large amounts of water for at least 15 minutes. Get

immediate medical attention.

Skin In case of contact, immediately flush skin with plenty of soap and water for at least

15 minutes. Get medical attention.

Ingestion Do not induce vomiting. Slowly dilute with 1-2 glasses of water or milk and seek

medical attention. Never give anything by mouth to an unconscious person.

Most Important symptoms and effects, both acute and delayed

May cause eye and skin irritation.

Indication of any immediate medical attention and special treatment needed

Notes to Physician Treat symptomatically

5. FIREFIGHTING MEASURES

Extinguishing mediaó

Suitable Extinguishing Media

All standard fire fighting media

Extinguishing media which must not be used for safety reasons

None known.

Special hazards arising from the substance of mixture

Special Exposure Hazards

Decomposition in fire may produce toxic gases.

Advice for firefighters

Special Protective Equipment for Fire-Fighters

Full protective clothing and approved self-contained breathing apparatus required for fire fighting personnel.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Use appropriate protective equipment. Avoid creating and breathing dust.

See Section 12 for additional information

Environmental precautions

Prevent from entering sewers, waterways, or low areas.

Methods and material for containment and cleaning up

Scoop up and remove.

Reference to other sections

See Section 12 for additional information.

7. HANDLING AND STORAGE

Precautions for Safe Handling

Avoid contact with eyes, skin, or clothing. Avoid creating or inhaling dust. Wash hands after use. Launder contaminated clothing before reuse.

Hygiene Measures

Handle in accordance with good industrial hygiene and safety practice

Conditions for safe storage, including any incompatibilities

Store in a cool, dry location.

Specific End Use(s)

Exposure ScenarioNo information availableOther GuidelinesNo information available

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Substances	EU	UK OEL	Netherlands	France OEL	Germany MAK/TRK
Organic salt	Not applicable				

Substances	Italy	Poland	Hungary	Czech Republic	Denmark
Organic salt	Not applicable				

Derived No Effect Level (DNEL)
Predicted No Effect Concentration

No information available. No information available.

(PNEC)

Exposure controls

Engineering Controls Use in a well ventilated area.

Personal protective equipment

Respiratory Protection Dust/mist respirator. (N95, P2/P3)

Hand Protection Impervious rubber gloves.

Skin Protection Rubber apron.

Eye Protection Wear safety glasses or goggles to protect against exposure. **Other Precautions** Eyewash fountains and safety showers must be easily accessible.

Environmental Exposure Controls No information available

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical State: Powder Color: White

Odor: Aminoacetate Odor Threshold: No information available

Property Values
Remarks/ Method

pH: 11 (1%)

Melting Point/Range No data available

Freezing Point/Range (C): No data available **Boiling Point/Range** No data available No data available **Flash Point Evaporation rate** No data available **Vapor Pressure** No data available No data available **Vapor Density Specific Gravity** No data available No data available **Water Solubility** No data available Solubility in other solvents No data available Partition coefficient: n-octanol/water **Autoignition Temperature** No data available No data available **Decomposition Temperature** No data available **Viscosity**

Explosive PropertiesNo information availableOxidizing PropertiesNo information available

Other information

VOC Content (%) No data available

10. STABILITY AND REACTIVITY

Reactivity

Not applicable

Chemical Stability

Stable

Possibility of Hazardous Reactions

Will Not Occur

Conditions to Avoid

None anticipated

10. STABILITY AND REACTIVITY

Incompatible Materials

Strong oxidizers. Strong alkalis.

Hazardous Decomposition Products

Oxides of nitrogen. Carbon monoxide and carbon dioxide.

11. TOXICOLOGICAL INFORMATION

Information on Toxicological Effects

Acute Toxicity

May cause respiratory irritation. Coughing, chest pains, and breathing difficulty may occur. Inhalation

Eye Contact Causes moderate eye irritation. May cause eye burns.

Skin Contact May cause mild skin irritation.

Irritation of the mouth, throat, and stomach. Ingestion

Chronic Effects/Carcinogenicity Contains nitrilotriacetic acid or its salts, which is listed as a suspect carcinogen of the urinary tract and kidneys by NTP, based on feeding studies with laboratory animals. According to the ACGIH guidelines, NTA would "not be considered an occupational carcinogen of any significance." IARC cancer review classification: 2B (Possibly Carcinogenic to Humans)

Substances	LD50 Oral	LD50 Dermal	LC50 Inhalation
Organic salt	1450 mg/kg	> 10000 mg/kg	No data available

12. ECOLOGICAL INFORMATION

Toxicity

Ecotoxicity Effects

Substances	Toxicity to Algae	Toxicity to Fish	Toxicity to Microorganisms	Daphnia Magna (Water Flea)
Organic salt	EC50 (96 hour): 780 mg/l (Clorella vulgaris) EC50 (96 hour): 331 mg/l (Navicula)	TLM96: 98 mg/l (Oncorhynchus mykiss) TLM96: 312 mg/l (Lepomis macrochirus)	No information available	EC50: 780 mg/l (Daphnia magna)

Persistence and degradability

Readily biodegradable

Bioaccumulative potential

No information available

Mobility in soil

No information available

Results of PBT and vPvB assessment

No information available.

Other adverse effects

Endocrine Disruptor Information

This product does not contain any known or suspected endocrine disruptors

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal Method Bury in a licensed landfill according to federal, state, and local regulations.

Contaminated Packaging Follow all applicable national or local regulations.

14. TRANSPORT INFORMATION

IMDG/IMO

UN Number: Not restricted. **UN Proper Shipping Name:** Not restricted Transport Hazard Class(es): Not applicable

RID

UN Number: Not restricted. **UN Proper Shipping Name:** Not restricted Transport Hazard Class(es): Not applicable

ADR

UN Number: Not restricted. Not restricted **UN Proper Shipping Name:** Transport Hazard Class(es): Not applicable

IATA/ICAO

Not restricted. **UN Number: UN Proper Shipping Name:** Not restricted Transport Hazard Class(es): Not applicable

Special Precautions for User

None Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable

15. REGULATORY INFORMATION

Safety, health and environmental regulations/legislation specific for the substance or mixture

International Inventories

This product, and all its components, complies with EINECS **EINECS Inventory**

All components listed on inventory or are exempt. **US TSCA Inventory Canadian DSL Inventory** All components listed on inventory or are exempt.

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

Germany, Water Endangering

Classes (WGK)

WGK 2: Hazard to waters.

Chemical Safety Assessment

No information available

16. OTHER INFORMATION

Full text of R-phrases referred to under Sections 2 and 3

R22 Harmful if swallowed.

R40 Limited evidence of a carcinogenic effect.

16. OTHER INFORMATION

Key literature references and sources for data

www.ChemADVISOR.com/

Revision Date: 20-Dec-2012 **Revision Note** Not applicable

This safety data sheet complies with the requirements of Regulation (EC) No. 1907/2006

Disclaimer Statement

This information is furnished without warranty, expressed or implied, as to accuracy or completeness. The information is obtained from various sources including the manufacturer and other third party sources. The information may not be valid under all conditions nor if this material is used in combination with other materials or in any process. Final determination of suitability of any material is the sole responsibility of the user.

End of Safety Data Sheet