

ACCORDING TO GHS

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 GHS Product Identifier

Product Name Biobor®JF
Trade Name Biobor®JF

Synonyms CAS 8063-89-6 (Substituted Dioxaborinanes)

1.2 Recommended use of the chemical and restrictions on use

Identified Use(s)

Biocide additive for petroleum products.

Uses Advised Against No Data Available

1.3 Supplier's details

Manufacturer

Company Identification Hammonds Fuel Additives, Inc.

Address of Manufacturer 6951 W Little York
Postal code Houston, TX 77040
Telephone: +1 800-548-9166
E-mail sales@biobor.com

Office hours Monday-Friday 8:00am-5:00pm EST

Supplier

Company Identification Hammonds Fuel Additives, Inc.

Address of Supplier 6951 W Little York
Postal code Houston, TX 77040
Telephone: +1 800-548-9166
E-mail sales@biobor.com

Office hours Monday-Friday 8:00am-5:00pm EST

1.4 Emergency telephone number

National Poisons Centre Phone 0800 765 766

National Poisons Centre Address National Poisons Centre, Dunedin School of Medicine, University of Otago, PO

Box 56, Dunedin 9054, New Zealand

Emergency Phone No Within United States; Canada; Puerto Rico; US Virgin Islands: 1-800-255-3924

Outside North America: +1-813-248-0585 (Collect calls accepted)

Contact ChemTel

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

GHS Classification Flam. Lig. 3: Flammable liquid and vapour.

Skin Irrit. 2: Causes skin irritation.

Eye Dam. 1 : Causes serious eye damage.

2.2 GHS label elements, including precautionary statements

GHS

Product Name Biobor®JF



Hazard Pictogram(s)





Signal Word(s) Danger

Hazard Statement(s) H226: Flammable liquid and vapour.

H315: Causes skin irritation.

H318: Causes serious eye damage.

Precautionary Statement(s) P210: Keep away from heat, hot surfaces, sparks, open flames and other ignition

sources. No smoking.

P280: Wear protective gloves/protective clothing/eye protection/face protection. P303+P361+P353: IF ON SKIN (or hair): Take off immediately all contaminated

clothing. Rinse skin with water.

P305+P351+P338: IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

P310: Immediately call a POISON CENTER/doctor.

P501: Dispose of contents in accordance with local, state or national legislation.

2.3 Other hazards which do not result in classification

None known.

2.4 Additional Information

For full text of H/P Statements see section 16.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1 Substances

HAZARDOUS INGREDIENT(S)	CAS No.	%W/W	Hazard Statement(s)	Hazard
				Pictogram(s)
2,2'-[(1-methylpropane-1,3-diyl)bis(oxy)]bis[4-	2665-13-6	67.60	Not classified.	None
methyl-1,3,2-dioxaborinane]				
2,2'-oxybis[4,4,6-trimethyl-1,3,2-dioxaborinane]	14697-50-8	27.40	Not classified.	None
Low boiling point naphtha	64742-89-8	4.50	Flam. Liq. H226	GHS08
			Asp. Tox. 1 H304	
			Muta. 1B H340	
			Carc. 1B H350	
Non-hazardous and other ingredients below		0.50	Not classified.	None
reportable levels				

Substance registered as 8063-89-6

3.2 Mixtures

Not applicable.



SECTION 4: FIRST AID MEASURES

4.1 Description of necessary first-aid measures

Inhalation Treat symptomatically.

Skin Contact Take off contaminated clothing and wash it before reuse. If skin irritation occurs:

Get medical advice/attention. Specific treatment (see Medical Advice on this label). Take off immediately all contaminated clothing. Rinse skin with water. Rinse cautiously with water for several minutes. Remove contact lenses, if

Trinse cautiously with water for several minutes. Tremove contact lenses, in

present and easy to do. Continue rinsing. Immediately call a POISON

CENTER/doctor.

Ingestion Treat symptomatically.

4.2 Most important symptoms/effects, acute and delayed

Skin irritation and eye damage.

4.3 Indication of immediate medical attention and special treatment needed, if necessary

Specific treatment (see Medical Advice on this label). Immediately call a POISON

CENTER/doctor. Treat symptomatically.

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media

Eye Contact

Unsuitable extinguishing media Water jet spray

5.2 Special hazards arising from the chemical

Flammable liquid and vapour. Combustion or thermal decomposition will evolve

toxic and irritant vapours.

5.3 Special protective actions for fire-fighters

Fire fighters should wear complete protective clothing including self-contained breathing apparatus. If it is safe to do so, containers should be removed from fire

area because they are likely to rupture under fire conditions.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

Provide adequate ventilation. Use non-sparking ventilation systems, approved explosion-proof equipment, and intrinsically safe electrical systems. Wear

suitable protective clothing, gloves and eye/face protection.

6.2 Environmental precautions

This material and its container must be disposed of in a safe way.

6.3 Methods and material for containment and cleaning up

Adsorb spillages onto sand, earth or any suitable adsorbent material. Transfer to a container for disposal. Containers must not be punctured or destroyed by burning, even when empty.

6.4 Reference to other sections

See Also Section 8, 13.



SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling

Wash hands and exposed skin thoroughly after handling. Wear protective gloves/protective clothing/eye protection/face protection. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Keep

container tightly closed. Use explosion-proof

electrical/ventilating/lighting/equipment. Use non-sparking tools. Take action to

prevent static discharges.

7.2 Conditions for safe storage, including any incompatibilities

Store in a well-ventilated place. Keep cool.

Storage temperature Ambient.

Storage life Stable under normal conditions.

Incompatible materials None known.

7.3 Specific end use(s)

Biocide additive for petroleum products.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

8.1.1 Occupational Exposure Limits No Occupational Exposure Limit assigned.

8.2 Exposure controls

8.2.1. Appropriate engineering controls Use non-sparking ventilation systems, approved explosion-proof equipment, and

intrinsically safe electrical systems. Ensure adequate ventilation. A washing

facility/water for eye and skin cleaning purposes should be present.

8.2.2. Individual protection measures



Eye Protection Wear eye protection with side protection (EN166).



Skin protection Wear protective clothing and gloves: Impervious gloves (EN 374).



Respiratory protection Normally no personal respiratory protection is necessary. Handling of larger

amounts A suitable mask with filter type A (EN14387 or EN405) may be

appropriate.



Thermal hazards None known.

8.2.3. Environmental Exposure Controls Avoid release to the environment.



SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Appearance Liquid.

Colour: Yellow

Odour Aromatic
Odour threshold Not known.
pH Not known.
Melting point/freezing point Not known.
Initial boiling point and boiling range Not known.
Flash Point 40.56 ° C

Evaporation rate < 1 n-Butyl Acetate = 1

Flammability (solid, gas) Not known. Upper/lower flammability or explosive Not known.

limits

 $\begin{array}{lll} \mbox{Vapour pressure} & \mbox{Not known.} \\ \mbox{Vapour density} & > 1 \mbox{ Air=1} \\ \mbox{Density (g/ml)} & \mbox{Not known.} \\ \mbox{Relative density} & 1.05 \end{array}$

Solubility (ies) Solubility (Water): Not known.

Solubility (Other): Not known.

Partition coefficient: n-octanol/water Not known.

Auto-ignition temperature Not known.

Decomposition Temperature (° C) Not known.

Viscosity $CST@40^{\circ} C = 21.31$

Explosive properties Not known.

Oxidising properties Not known.

9.2 Other information

None.

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity

None anticipated.

10.2 Chemical Stability

Stable under normal conditions.

10.3 Possibility of hazardous reactions

No hazardous reactions known if used for its intended purpose.

10.4 Conditions to avoid

Avoid friction, sparks, or other means of ignition.

10.5 Incompatible materials

Not known.

10.6 Hazardous decomposition products

No hazardous decomposition products known.



SECTION 11: TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Acute toxicity - Ingestion Not classified.

Acute toxicity - Skin Contact Not classified.

Acute toxicity - Inhalation Not classified.

Skin corrosion/irritation Causes skin irritation.
Serious eye damage/irritation Causes serious eye damage.

Skin sensitization data Not classified.

Respiratory sensitization data Not classified.

Germ cell mutagenicity There is no evidence of mutagenic potential.

Carcinogenicity No evidence of carcinogenicity.

Reproductive toxicity
Lactation
Not classified.
STOT - single exposure
Not classified.
STOT - repeated exposure
Not classified.
Aspiration hazard
Not classified.

11.2 Other information

Not known.

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity

Toxicity - Aquatic invertebrates Low toxicity to invertebrates.

Toxicity - Fish Low toxicity to fish.

Toxicity - Algae Low toxicity to algae.

Toxicity - Sediment Compartment Not classified.

Toxicity - Terrestrial Compartment Not classified.

12.2 Persistence and degradability

Not known.

12.3 Bioaccumulative potential

Not known.

12.4 Mobility in soil

Not known.

12.5 Other adverse effects

Not known.

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Disposal Method

Dispose of contents in accordance with local, state or national legislation. Recycle only completely emptied packaging. Containers must not be punctured or destroyed by burning, even when empty. Do not allow to enter drains, sewers or watercourses. Do NOT landfill. Normal disposal is via incineration operated by an accredited disposal contractor. Send to a licensed recycler, reclaimer or incinerator. Dispose at suitable refuse site.



13.2 Additional Information

SECTION 14: TRANSPORT INFORMATION

14.1 UN number

UN No. 1993

14.2 UN proper shipping name

UN proper shipping name FLAMMABLE LIQUID, N.O.S. (mixed dioxaborinanes, naphtha)

14.3 Transport hazard class(es)

ADR/RID

ADR/RID Class 3
ADR Classification Code F1
Special Provisions 274 601
Limited Quantities 5 L
Excepted Quantities E1
Emergency Action Code •3Y

Mixed Packing Instructions for P001 IBC03 LP01 R001

Packages

Special Packing Provisions for

Packages

Mixed Packing Instructions for MP19

Packages

Packing Instructions for Portable Tanks T4

Special Provisions for Portable Tanks TP1 TP29

Tank Code for Tanks LGBF

Special Provisions for Tanks

Vehicle for Tank Carriage FL
ADR Transport Category 3
Tunnel Restriction Code D/E
Special Provisions for Carriage - V12

Packages

Special Provisions for Carriage - $\operatorname{\mathsf{Bulk}}$

Special Provisions for Carriage -Loading, Unloading and Handling

Special Provisions for Carriage - S2

Operation

ADR HIN 30

IMDG

IMDG Class3Special Provisions274 601

Limited Quantities 5 L
Excepted Quantities E1

Mixed Packing Instructions for

for P001 IBC03 LP01 R001

Packages

Special Packing Provisions for

Packages

Packing Instructions for Portable Tanks T4



Special Provisions for Portable Tanks TP1 TP29

IMDG EMS F-E, S-E

Stowage and Handling Category A

Segregation

Marine Pollutant

ICAO/IATA

IATA Proper Shipping Name FLAMMABLE LIQUID, N.O.S. (mixed dioxaborinanes, naphtha)

Excepted Quantities E1
Passenger and Cargo Aircraft Limited Y344

Quantities Packing Instructions

Passenger and Cargo Aircraft Limited 10L

Quantities Max net Qty

Passenger and Cargo Aircraft Packing 355

Instructions

Passenger and Cargo Aircraft Max net 60L

Qty

Cargo Aircraft Packing Instructions 366
Cargo Aircraft Max net Qty 220L
Special Provisions A3
Emergency Response Guidebook (ERG) 3L

Code Labels

Labels



14.4 Packing Group, if applicable

Packing group III

14.5 Environmental hazards

Environmental hazards Not classified as a Marine Pollutant.

14.6 Special precautions for user

Special precautions for user Not known.

14.7 Transport in bulk according to Annex II of Marpol and the IBC Code

No information available

SECTION 15: REGULATORY INFORMATION

15.1 Safety, health and environmental regulations specific for the product in question

OSPAR List of Chemicals for Priority Not listed

Action

NTP (National Toxicology Program) Not listed IARC (International Agency for Research Not listed

on Cancer)

NZIoC (New Zealand Inventory of Listed 8063-89-6

Chemicals

New Zealand EPA Group Standard HSR002495



SECTION 16: OTHER INFORMATION

The following sections contain revisions or new statements:

LEGEND

Hazard Pictogram(s)





GHS08: GHS: Health hazard

Hazard classification Flam. Liq. 3 : Flammable liquid, Category 3

Asp. Tox. 1: Aspiration hazard, Category 1

Skin Irrit. 2: Skin corrosion/irritation, Category 2

Eye Dam. 1 : Serious eye damage/irritation, Category 1

Muta. 1B: Germ cell mutagenicity, Category 1B (64742-89-8)

Carc. 1B: Carcinogenicity, Category 1B (64742-89-8)

Hazard Statement(s) H226: Flammable liquid and vapour.

H304: May be fatal if swallowed and enters airways.

H315: Causes skin irritation.

H318: Causes serious eye damage.

H340: May cause genetic defects. (64742-89-8)

H350: May cause cancer. (64742-89-8)

Precautionary Statement(s) P210: Keep away from heat, hot surfaces, sparks, open flames and other ignition

sources. No smoking.

P233: Keep container tightly closed.

P240: Ground and bond container and receiving equipment.

P241: Use explosion-proof electrical/ventilating/lighting/equipment.

P242: Use non-sparking tools.

P243: Take action to prevent static discharges.

P264: Wash hands and exposed skin thoroughly after handling.

P280: Wear protective gloves/protective clothing/eye protection/face protection.

P302+P352: IF ON SKIN: Wash with plenty of water.

 ${\sf P303+P361+P353: IF\ ON\ SKIN\ (or\ hair):\ Take\ off\ immediately\ all\ contaminated}$

clothing. Rinse skin with water.

P305+P351+P338: IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

P310: Immediately call a POISON CENTER/doctor.



P321: Specific treatment (see Medical Advice on this label).

P332+P313: If skin irritation occurs: Get medical advice/attention.

P362+P364: Take off contaminated clothing and wash it before reuse.

 ${\sf P370+P378:} \ {\sf In\ case\ of\ fire:}\ \ {\sf Use\ water\ spray,\ dry\ powder\ or\ carbon\ dioxide\ to}$

extinguish.

P403+P235: Store in a well-ventilated place. Keep cool.

P501: Dispose of contents in accordance with local, state or national legislation.

ADN : European Agreement concerning the International Carriage of Dangerous

Goods by Inland Waterways

ADR: European Agreement concerning the International Carriage of Dangerous

Goods by Road

CAS: Chemical Abstracts Service

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

IATA: International Air Transport Association

IBC: Intermediate Bulk Container

ICAO : International Civil Aviation Organization
IMDG : International Maritime Dangerous Goods

LTEL: Long term exposure limit

PNEC: Predicted No Effect Concentration

RID: Regulations concerning the International Carriage of Dangerous Goods by

Rail

STEL: Short term exposure limit STOT: Specific Target Organ Toxicity

UN: United Nations

Disclaimers

Acronyms

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