SAFETY DATA SHEET

SECTION 1: Identification of the substance /Preparation and the Company

1.1 Product Identification	FOMTEC EXT Ultra
1.2 Use	For Fire Extinguisher: Oryx Fire Extinguisher F9 Model Contained in fire extinguishers or propellant cartridges or cylinders for fire extinguishers
1.3 Supplier Division	International Gulf Trading Company Fire Extinguisher Division Building no. 272, Area 81,Street 9 New SME, New Industrial Area P.O. Box 6572, Doha - Qatar Tel. No. +974 44088222 Fax. No. +974 44088444

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008 [CLP / GHS]	Eye Dam. 1; H318 Skin Irrit. 2; H315 Aquatic Chronic 3; H412

2.2. Label elements

Hazard pictograms (CLP)

Composition on the label	Alcohols, C12-14, ethoxylated, sulfates, sodium salts 4 - 8 %, Sulfonic acids, C14-17-sec-alkane, sodium salts 3 -9 %
Signal word	Danger
Hazard statements	H315 Causes skin irritation. H318 Causes serious eye damage. H412 Harmful to aquatic life with long lasting effects.
Precautionary statements	P280 Wear protective gloves / protective clothing / eye protection / face protection. P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P302+P352 IF ON SKIN: Wash with plenty of soap and water. P310 Immediately call a POISON CENTER or doctor / physician. P332+P313 If skin irritation occurs: Get medical advice / attention. P273 Avoid release to the environment.

2.3. Other hazards

PBT / vPvB	The product does not meet the criteria for PBT (persistent / bioaccumulative / toxic) or vPvB (very persistent / very bioaccumulative).

SECTION 3: Composition / information on ingredients

3.2. Mixtures

Substance	Identification	Classification	Contents
Alcohols, C12-14, ethoxylated, sulfates, sodium salts	CAS No.: 68891-38-3 EC No.: 500-234-8	Skin Irrit. 2; H315; Eye Dam. 1; H318; Aquatic Chronic 3; H412;	4 - 8 %
Sulfonic acids, C14-17-sec-alkane, sodium salts	CAS No.: 97489-15-1 EC No.: 307-55-2 REACH Reg. No.: 01-2119489924-20-0000, 01-2119489924-20-0001	Acute tox. 4; H302 Skin Irrit. 2; H315 Eye Irrit. 2; H318	3 -9 %
N-[3-(dimethylamino) propyl] -3,3,4,4,5,5,6,6,7,7,8,8, 8-tridecafluorooctanesulphonamide N-oxide	CAS No.: 80475-32-7 EC No.: 279-481-6	Aquatic Chronic 2; H411	1 - 5 %
Diethylene glycol monobutyl ether	CAS No.: 112-34-5 EC No.: 203-961-6 Index No.: 603-096-00-8	Eye Irrit. 2; H319;	10 -15 %
2-Methylpentane-2,4-diol	CAS No.: 107-41-5	Eye Irrit. 2; H319	0,1 -0,5 %

	EC No.: 203-489-0 Index No.: 603-053-00-3 REACH Reg. No.: 01-2119539582-35	Skin Irrit. 2; H315	
Ethanediol	CAS No.: 107-21-1 EC No.: 203-473-3 Index No.: 603-027-00-1 REACH Reg. No.: 01-2119456816-28	Acute Tox. 4;H302	1 -5 %
Diethylene glycol monomethyl ether	CAS No.: 111-77-3 EC No.: 203-906-6 Index No.: 603-107-00-6 REACH Reg. No.: 01-2119475100-52	Repr. 2;H361d*	0,1 -0,5 %
Methanol	CAS No.: 67-56-1 EC No.: 200-659-6 Index No.: 603-001-00-X REACH Reg. No.: 01-2119392409-28	Flam. Liq. 2; H225 Acute tox. 3; H331 Acute tox. 3; H311 Acute tox. 3; H301 STOT SE1; H370	1 -3 %
Ethanol	CAS No.: 64-17-5 EC No.: 200-578-6 Index No.: 603-002-00-5	Flam. Liq. 2; H225;	1 -5 %

SECTION 4: First aid measures

4.1. Description of first aid measures

General	Provide rest, warmth and fresh air. Get medical attention if any discomfort continues.
Inhalation	Fresh air and rest. Get medical attention if any discomfort continues.
Skin contact	Remove contaminated clothing and launder thoroughly before re-use. Wash skin thoroughly with soap and water for several minutes. Get medical attention if any discomfort continues.
Eye contact	Immediately rinse with plenty of lukewarm water for at least 15 minutes. Make sure to remove any contact lenses from the eyes before rinsing. Contact physician immediately. Continue flushing during transport to hospital.
Ingestion	Immediately rinse mouth and drink plenty of water. Keep person under observation. If person becomes uncomfortable seek hospital and bring these instructions.
Recommended personal protective equipment for first aid responders	No recommendation given.

4.2. Most important symptoms and effects, both acute and delayed

General symptoms and effects	Ingestion of large quantities may cause nausea, vomiting, dizziness, confusion, lost of consciousness. Causes eye irritation. Irritating to skin.

4.3. Indication of any immediate medical attention and special treatment needed

Medical treatment	Treat Symptomatically.

Medical monitoring for delayed effects	No recommendation given.
Separate first aid equipment	No recommendation given.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media	This product is not flammable.

5.2. Special hazards arising from the substance or mixture

Fire and explosion hazards	None.

5.3. Advice for firefighters

Fire fighting procedures	Follow the general fire precautions indicated by the workplace.

SECTION 6: Accidental release measures

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Handling	Avoid contact with skin and eyes. Avoid inhalation of vapours. Wash hands before breaks and before smoking, eating or drinking. Wash hands and contaminated areas with water and soap after finished work. Container must be kept tightly closed.

7.2. Conditions for safe storage, including any incompatibilities

Storage	Store at specified temperature. Keep container tightly closed. Protect against direct sunlight.

7.3. Specific end use(s)

Specific use(s)	See EWC-code under Section 13.

SECTION 8: Exposure controls / personal protection

8.1. Control parameters

Substance	Identification	Value	TWA Year
Alcohols, C12-14, ethoxylated, sulfates, sodium salts	CAS No.: 68891-38-3		
Sulfonic acids, C14-17-sec-alkane, sodium salts	CAS No.: 97489-15-1		
N-[3-(dimethylamino) propyl] -3,3,4,4,5,5,6,6,7,7,8,8,8-tridecafluorooctanesulphonamide N-oxide	CAS No.: 80475-32-7		
Diethylene glycol monobutyl ether	CAS No.: 112-34-5		
2-Methylpentane-2,4-diol	CAS No.: 107-41-5	TWA (8h) : 25 ppm TWA (8h) : 123 mg/m3 **OEL short term value** Value: 123 mg/m3	TWA Year: 2011
Ethanediol	CAS No.: 107-21-1	TWA (8h) : 20 ppm, vapour TWA (8h) : 52 mg/m3, vapour **OEL short term value** Value: 40 ppm vapour **OEL short term value** Value: 104 mg/m3 vapour	
Ethanol	CAS No.: 64-17-5		

DNEL / PNEC

Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
DNEL	**Group:** Worker **Route of exposure:** Long term (repeated) - Inhalation - Systemic effect **Value:** 35 mg/m3 **Group:** Worker **Route of exposure:** Long term (repeated) - Dermal - Systemic effect **Value:** 5 mg/kg bw/day **Group:** Consumer **Route of exposure:** Long term (repeated) - Oral - Systemic effect **Value:** 7,1 mg/kg bw/day **Group:** Worker **Route of exposure:** Short term (acute) - Dermal - Local effect **Value:** 2,8 mg/cm2 **Group:** Consumer **Route of exposure:** Long term (repeated) - Inhalation - Systemic effect **Value:** 12,4 mg/m3

	Group: Consumer **Route of exposure:** Long term (repeated) - Dermal - Systemic effect **Value:** 3,6 mg/kg bw/dat **Group:** Consumer **Route of exposure:** Short term (acute) - Dermal - Local effect **Value:** 2,8 mg/cm2
Substance	Diethylene glycol monomethyl ether
PNEC	**Comments:** Predicted No Effect Concentration 12 mg/L aquatic organisms 100 mg/L microorganisms 1,4 mg/kg terrestrial environment 90 mg/kg predators

8.2. Exposure controls

Safety signs

Precautionary measures to prevent exposure

Appropriate engineering controls	An eye wash bottle must be available at the work site.

Eye / face protection

Suitable eye protection	Wear approved, tight fitting safety glasses where splashing is probable.

Hand protection

Skin- / hand protection, long term contact	In cases of prolonged, repeated or extensive exposure, wear protective gloves.
Suitable gloves type	Rubber or plastic.

Skin protection

Suitable protective clothing	Use protective clothes in order to avoid skin contact.

Respiratory protection

Respiratory protection necessary at	In case of inadequate ventilation and work of brief duration, use suitable respiratory equipment.

Hygiene / environmental

Specific hygiene measures	No specific hygiene procedures noted, but good personal hygiene practices are always advisable, especially when working with chemicals.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	Clear, yellowish liquid.
Colour	Yellowish.
Odour	Slight odour.
Odour limit	Comments: No information.
pH	Status: In delivery state Value: 6,5 - 8,5
Melting point / melting range	Comments: No information.
Freezing point	Value: 0 °C
Boiling point / boiling range	Comments: No information.
Flash point Evaporation	Comments: Not relevant.
rate Flammability (solid,	Comments: No information.
gas) Explosion limit	Not relevant.
Vapour pressure	Comments: Product is not explosive.
Vapour density	Comments: No information.
Relative density	Comments: No information.
Solubility	Value: ~ 1,095 g/ml
Partition coefficient: n-octanol/ water	Comments: Soluble in water.
Spontaneous combustability	Comments: No information.
Decomposition temperature	Comments: Not relevant.
Viscosity	Comments: No information.
Explosive properties	Value: ≤ 30 mPas Method: Brookfield DV
Oxidising properties	Product is not explosive.
	Does not meet the criteria for oxidising.

9.2. Other information

SECTION 10: Stability and reactivity

10.1. Reactivity

Reactivity	Stable product under normal conditions of handling and storage.

10.2. Chemical stability

Stability	Stable product under normal conditions of handling and storage.

10.3. Possibility of hazardous reactions

Possibility of hazardous reactions	Stable product under normal conditions of handling and storage.

10.4. Conditions to avoid

Conditions to avoid	Not known under normal conditions of handling and storage.

10.5. Incompatible materials

Materials to avoid	Alkali earth metals.

10.6. Hazardous decomposition products

Hazardous decomposition products	Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapours.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Substance	Alcohols, C12-14, ethoxylated, sulfates, sodium salts
Acute toxicity	**Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Oral **Value:** > 2000 mg/kg **Test reference:** OECD 404
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Acute toxicity	**Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Oral **Value:** > 2000 mg/kg **Animal test species:** Rat **Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Dermal **Value:** > 2000 mg/kg **Animal test species:** Mouse
Substance	N-[3-(dimethylamino)propyl]-3,3,4,4,5,5,6,6,7,7,8,8, 8-tridecafluorooctanesulphonamide N-oxide
Acute toxicity	**Type of toxicity:** Acute **Effect tested:** LC50 **Route of exposure:** Inhalation. **Duration:** 4h **Value:** > 24 mg/l **Animal test species:** Rat **Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Oral **Value:** ~ 17800 mg/kg **Animal test species:** Rat
Substance	2-Methylpentane-2,4-diol
Acute toxicity	**Type of toxicity:** Acute

	Effect tested: LD50 **Route of exposure:** Oral **Value:** = 3700 mg/kg bw **Animal test species:** Rat **Comments:** Non-acute toxic. **Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Dermal **Value:** = 7920 mg/kg bw **Animal test species:** Rabbit **Comments:** Non-acute toxic.
Substance	Ethanediol
Acute toxicity	**Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Dermal **Value:** = 9530 mg/kg bw **Animal test species:** Rabbit **Comments:** Non-acute toxic.
Substance	Diethylene glycol monomethyl ether
Acute toxicity	**Type of toxicity:** Acute **Effect tested:** LC50 **Route of exposure:** Oral **Value:** = 4000 mg/kg bw **Animal test species:** Rat **Comments:** Non-acute toxic. **Type of toxicity:** Acute **Effect tested:** LD50 **Route of exposure:** Dermal **Value:** = 6720 mg/kg bw **Animal test species:** Rabbit **Comments:** Non-acute toxic.

Other information regarding health hazards

Skin contact	Irritating to skin.
Eye contact	Severe irritation which might cause damage to eyes.
Ingestion	In case of ingestion of large quantities may cause nausea, vomiting, dizziness, confusion, loss of consciousness.
Sensitisation	No known chronic or acute health risks.
Mutagenicity	No known chronic or acute health risks.
Carcinogenicity, other information	No known chronic or acute health risks.
Reproductive toxicity	No known chronic or acute health risks.

Symptoms of exposure

In case of ingestion	Ingestion of large quantities may cause cause nausea, vomiting, dizziness, confusion, loss of consciousness.

In case of skin contact	Irritating.
In case of eye contact	Serious eye irritation which may cause damage to eyes.

SECTION 12: Ecological information

12.1. Toxicity

Substance	Alcohols, C12-14, ethoxylated, sulfates, sodium salts
Acute aquatic, fish	**Value:** 10 - 100 mg/l **Method:** ISO 7346/2
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Acute aquatic, fish	**Value:** ~ 10 mg/l **Test duration:** 96 h **Species:** Zebra fish **Method:** OECD 203
Substance	2-Methylpentane-2,4-diol
Acute aquatic, fish	**Toxicity type:** Acute **Value:** = 8510 mg/l **Exposure time:** 96 hour(s) **Species:** Gambusia affinis **Comments:** Not hazardous for environment.
Substance	Ethanediol
Acute aquatic, fish	**Toxicity type:** Acute **Value:** = 18500 mg/l **Effect dose concentration :** LC50 **Exposure time:** 96 hour(s) **Species:** Oncorhynchus mykiss **Comments:** Not hazardous for environment.
Substance	Diethylene glycol monomethyl ether
Acute aquatic, fish	**Toxicity type:** Acute **Value:** = 1000 mg/l **Effect dose concentration :** LC50 **Exposure time:** = 96 h **Species:** Oncorhynchus mykiss **Comments:** Not hazardous for environment.
Substance	Methanol
Acute aquatic, fish	**Toxicity type:** Acute **Value:** = 15400 mg/l **Effect dose concentration :** LC50 **Exposure time:** = 96 hour(s) **Species:** Lepomis macrochirus **Comments:** Not hazardous for environment.
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Acute aquatic, algae	**Value:** > 61 mg/l **Test duration:** 72 h **Species:** Scenedesmus Subspicatus

	Method: OECD 201
Substance	N-[3-(dimethylamino)propyl]-3,3,4,4,5,5,6,6,7,7,8,8, 8-tridecafluorooctanesulphonamide N-oxide
Acute aquatic, algae	**Value:** 8,5 mg/l **Test duration:** 72 h **Species:** Skeletonema Costatum
Substance	Ethanediol
Acute aquatic, algae	**Toxicity type:** Acute **Value:** = 2000 mg/l **Effect dose concentration :** IC50 **Exposure time:** = 72 hour(s) **Comments:** Not hazardous for environment.
Substance	Diethylene glycol monomethyl ether
Acute aquatic, algae	**Toxicity type:** Acute **Value:** > 500 mg/l **Effect dose concentration :** IC50 **Exposure time:** 72 hour(s) **Species:** Scenedesmus subspicatus **Comments:** Not hazardous for environment.
Substance	Methanol
Acute aquatic, algae	**Toxicity type:** Acute **Value:** = 441 mg/l **Effect dose concentration :** IC50 **Exposure time:** = 72 hour(s) **Comments:** Not hazardous for environment.
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Acute aquatic, Daphnia	**Value:** ~ 10 mg/l **Test duration:** 48 h **Species:** Daphnia Magna **Method:** OECD 202
Substance	N-[3-(dimethylamino)propyl]-3,3,4,4,5,5,6,6,7,7,8,8, 8-tridecafluorooctanesulphonamide N-oxide
Acute aquatic, Daphnia	**Value:** = 13 mg/l **Test duration:** 48h
Substance	2-Methylpentane-2,4-diol
Acute aquatic, Daphnia	**Toxicity type:** Acute **Value:** = 2800 mg/l **Exposure time:** 48 hour(s) **Species:** Ceriodaphnia sp. **Comments:** Not hazardous for environment.
Substance	Ethanediol
Acute aquatic, Daphnia	**Toxicity type:** Acute **Value:** = 51000 mg/l **Effect dose concentration :** EC50 **Exposure time:** = 48

	Species: Daphina magna **Comments:** Not hazardous for environment.
Substance	Diethylene glycol monomethyl ether
Acute aquatic, Daphnia	**Toxicity type:** Acute **Value:** = 1192 mg/l **Effect dose concentration :** EC50 **Exposure time:** = 48 hour(s) **Species:** D. magna **Comments:** Not hazardous for environment.
Substance	Methanol
Acute aquatic, Daphnia	**Toxicity type:** Acute **Value:** = 24500 mg/l **Effect dose concentration :** EC50 **Exposure time:** = 48 hour(s) **Species:** D.magna **Comments:** Not hazardous for environment.
Ecotoxicity	Harmful to aquatic life with long lasting effects.

12.2. Persistence and degradability

Substance	Alcohols, C12-14, ethoxylated, sulfates, sodium salts
Biodegradability	**Value:** = 90 % **Method:** degradation in 28 days OECD 301D **Comments:** Readily biodegradable.
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Biodegradability	**Value:** ~ 78 % **Method:** OECD 301 B **Test period:** 28 days
Substance	2-Methylpentane-2,4-diol
Biodegradability	**Value:** = 0,02 **Method:** BOD5/COD
Substance	Ethanediol
Biodegradability	**Value:** = 56 % **Method:** degradation in 28 days OECD 301C **Comments:** Not readily biodegradable.
Substance	Diethylene glycol monomethyl ether
Biodegradability	**Value:** = 100 % **Method:** degradation in 7 days OECD 302B **Comments:** Readily biodegradable.
Substance	Methanol
Biodegradability	**Value:** = 99 % **Method:** degradation in 28 days OECD 301D **Comments:** Readily biodegradable.
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
Chemical oxygen demand (COD)	**Value:** ~ 1501 mg/g

Persistence and degradability, comments	The product is expected to be biodegradable.

12.3. Bioaccumulative potential

Bioaccumulative potential	Bioaccumulation: Is not expected to be bioaccumulable.
Substance	2-Methylpentane-2,4-diol
Bioconcentration factor (BCF)	**Value:** < 10 **Comments:** No bioaccumulation expected.
Substance	Ethanediol
Bioconcentration factor (BCF)	**Value:** = 10 **Comments:** No bioaccumulation expected.
Substance	Diethylene glycol monomethyl ether
Bioconcentration factor (BCF)	**Value:** = 0,2 **Comments:** No bioaccumulation expected.
Substance	Methanol
Bioconcentration factor (BCF)	**Value:** = 1 **Comments:** No bioaccumulation expected.

12.4. Mobility in soil

Mobility	The product contains substances, which are water soluble and may spread in water systems.

12.5. Results of PBT and vPvB assessment

PBT assessment results	Not Classified as PBT/vPvB by current EU criteria.
Substance	Sulfonic acids, C14-17-sec-alkane, sodium salts
PBT assessment results	Not Classified as PBT/vPvB by current EU criteria.

12.6. Other adverse effects

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Specify the appropriate methods of disposal	Dispose of waste and residues in accordance with local authority requirements.
EWC waste code	EWC waste code: 160305 organic wastes containing dangerous substances Classified as hazardous waste: Yes
EU Regulations	Directive 2008/98/EC of the European Parliament and of the Council of 19 November 2008 on waste and repealing certain Directives. Annex III to Directive 2008/98/EC.

SECTION 14: Transport information

Dangerous goods	No

14.1. UN number

Comments	Not relevant.

14.2. UN proper shipping name

Comments	Not relevant.

14.3. Transport hazard class(es)

Comments	Not relevant.

14.4. Packing group

Comments	Not relevant.

14.5. Environmental hazards

Comments	Not relevant.

14.6. Special precautions for user

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

Additional information	The product is not covered by international regulation on the transport of dangerous goods (IMDG, IATA, ADR/RID).

SECTION 15: Regulatory information

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

EEC-directive	Commission Directive 2006/15/EC of 7 February 2006 establishing a second list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC and amending Directives 91/322/EEC and 2000/39/EC. Commission Directive 2012/45/EU adapting for the second time the Annexes to Directive 2008/68/EC of the European Parliament and of the Council on the inland transport of dangerous goods to scientific and technical progress.
Legislation and regulations	Commission Regulation (EU) 2015/830 of 28 May 2015 amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council on the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH). Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006.

15.2. Chemical safety assessment

Chemical safety assessment performed	Yes

SECTION 16: Other information