



vaPUREx[®] 3% F-15 #7343



FLUORINE FREE FOAM CONCENTRATE

Special surfactants of the latest generation, foam stabilizers and antifreeze agents are the bases of this powerful product and its very good extinguishing performance at forceful (direct) application onto large fires of non-polar liquids. The high extinguishing performance and a particularly good spreading low expansion foam recommend vaPUREx[®] 3% F-15 for AFFF-like applications wherever non-polar*¹ hydrocarbons are produced, processed, decanted, transported or stored.

vaPUREx[®] 3% F-15 is easily and completely biodegradable and free of organic fluorine compounds*², preservatives and silicone compounds.

Performance

vaPUREx[®] 3% F-15 foams very well to yield an exceptionally well flowing and - sealing low expansion foam with very high extinguishing performance. Due to its special stability, vaPUREx[®] 3% F-15 is suitable for direct application on liquid hydrocarbons that are not miscible with water (e.g. mineral oils, gasoline and diesel fuels).

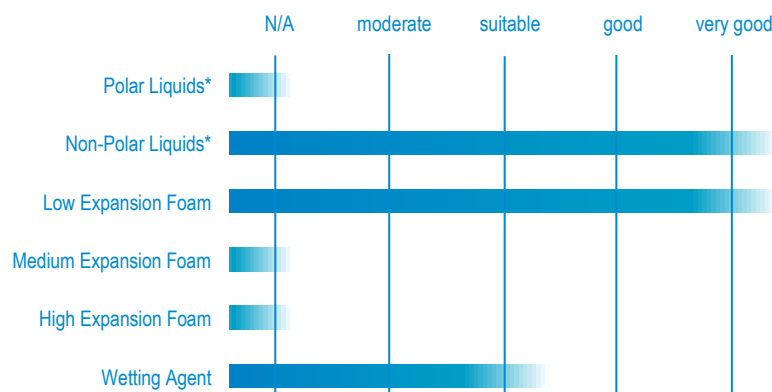
As a particularly environmentally compatible firefighting foam agent, vaPUREx[®] 3% F-15 is composed of novel surface- and surface-active substances, foam stabilizers and antifreeze agents, which are made from renewable raw materials to a large extent. The particularly good environmental profile of vaPUREx[®] 3% F-15 is proven by its classification in water hazard class (WGK) 1, or the classification of the concentrate with one point according to the Bavarian environmental classification model*³.

Technical Specification

Appearance	colourless/yellow
Fire Class/-es	A + B
Lowest Use Temperature	-15 [°C]
Max. Storage Temperature	max. +50 [°C]
Specific Gravity (20°C)	1,070 ± 0,02 [g/ml]
pH value (20°C)	6,5 - 8,5
Viscosity (20°C)	< 800(400) [mPa*s bei 75(375) 1/s]
Sedimentation	Sediment Free

Foam Properties acc. to EN1568 at 20°C

Induction Rate	3%
Expansion Rate	7 - 11
25% Drainage Time	8 - 12 [min]
50% Drainage Time	16 - 20 [min]
Expansion Types	Low Expansion Foam



*as mentioned in the respective test standard or in the text

Performance Tests

DIN EN 1568 EN 1568:2018 - Approval-No.: KB-88/19 Part 3 (Heptane): IA/-

Special Fire Test IA on Kerosene following EN1568-3 using Fresh Water

¹ flammable liquids that are not miscible with water.

² We define fluorine-free as products that are manufactured without the intentional addition of fluoroorganic compounds for the purpose of improving performance in such a way that, according to currently commercially available analysis of PFAS in firefighting foam concentrates, they do not contain any quantity of fluoroorganic substances in excess of the ubiquitous regional background contamination (e.g. in the drinking water used for production).

³ The Bavarian environmental classification is a simplified model for evaluating the toxicological and ecotoxicological profile of firefighting foam agents, which was developed on behalf of the Bavarian Ministry of the Interior and is increasingly being used in Germany. For more information on this topic, please read our T1 020-Environmental Classification Foam.

Application

vaPUREx® 3% F-15 can be foamed to Low Expansion Foam with all commercially available foam systems and equipment and used as extinguishing foam against fires of class A fires + B (e.g. fires of plastics and mineral oil products).

vaPUREx® 3% F-15 is insensitive to different fresh water qualities (e.g. water hardness). The proportioning rate to the fire water is 3%. The suitability of the proportioning devices should be checked beforehand.

Low expansion foam made from vaPUREx® 3% F-15 provides a particularly fine-bubbled, compact and stable foam blanket that sticks well to solid surfaces cooling them and insulating them very effectively against radiant heat against radiant heat. Low expansion foam made from vaPUREx® 3% F-15 can be applied directly onto fires of non-polar*¹ liquids (indirect foam application is usually more efficient and preferable). Due to its resistant structure, the foam can also be applied to pools of flammable liquids for vapour suppression or as a preventive fire protection measure.

The foam blanket slowly and evenly releases foam solution to the substrate and is thus able to very efficiently wet and penetrate deeply into solid (e.g. motor vehicles, Li-ion batteries, recycling materials, etc.) and ember-forming (e.g. wood, paper, tires, ...) materials. An non-expanded application of the premix is only effective on Class A fires under certain conditions.

After use, all parts which were in contact to vaPUREx® 3% F-15 must be thoroughly rinsed with water and cleaned to prevent any product buildup. Dried-in adhesions may require longer time soaking for removal.

Compatibility

When mixing different firefighting foam agents, it must be considered that the resulting mixture is a new chemical product which is not tested as firefighting foam agent and also must be re-evaluated and labeled according to hazardous materials regulations.

vaPUREx® 3% F-15 shall under no circumstances be mixed with other firefighting foam concentrates or -solutions, neither as a concentrate nor as a premix. Even the smallest quantities can render the products concerned non-useable, respectively lead to precipitation or agglomeration and consequently to equipment failure.

The foam produced from vaPUREx® 3% F-15 is fully compatible with all other ready expanded firefighting foams.

Storage & Shelf Life

When synthetic firefighting foam agents and concentrates are stored, only certain materials and also only in certain combi-

nations are suitable for permanent media contact. Our detailed Technical Information Nos. 014 (Storage of synthetic firefighting foam concentrates) and 009 (Material suitability polymers) provide information on this and other important aspects for the optimum storage of our products. Please do not hesitate to contact us. On short-term contact and subsequent thorough cleaning with water, vaPUREx® 3% F-15 or a premix solution made from it will not corrode metals such as copper, aluminum, brass, admiralty brass or bronze.

Elevated temperatures up to a maximum of +50°C or temporary freezing at temperatures below the specified frost resistance limit do not affect this high-quality product adversely (see our further Technical Information on the storage of firefighting foam agents). Temperature should not exceed +50°C. Before filling storage tanks, these tanks and all supply lines, pumps, valves or other parts carrying media must be thoroughly cleaned, free of grease and free of residues from a previous filling. Before filling up stocks of our vaPUREx® 3% F-15 we recommend to have a quality test of the stock to be filled up carried out in our laboratory. If stored according to our storage recommendations, a shelf life of well over ten years is possible.

Environment

vaPUREx® 3% F-15 was fully toxicologically tested. Unused product (concentrate) must not be released into the environment. Disposal must be carried out in consultation with local authorities and specialised waste treatment companies. Please also note further information in our safety data sheet!

Transport

vaPUREx® 3% F-15 is available in the following packaging units: PE-canister (20 ltr, 25 ltr and 60 ltr), PE-canister according to DIN 14452 (20 ltr); PE-drum (200 ltr), PE-IBC (600 ltr und 1.000 ltr) or bulk.

Please contact us for special packing sizes.



For further Documentation please scan the Qr code or see <http://sthamer.de/qr/7343>



Safety Advice: Please bear in mind that foam solutions are electroconductive liquids. The use in proximity to electrical/electronic equipment can require specific safety measures.



Safety Advice: Please see our Technical Information regarding "Mixing of Foam Concentrates" for further information

Disclaimer:

Any information in this product data sheet bases upon our best knowledge and expertise at the time of this issue. We reserve the right to change the content of this document or adopt to newer information. Please ask for the most recent revision of this data sheet.

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