

### DESCRIPTION

BIO FOR N is a wetting and foaming additive for forest fires, urban fires and industrial fires fighting. It can be used at very low concentration :

Wetting effect 0.1 – 0.5% / Foaming effect 0.5 – 1%.

▲ **Wetting power** : the water with BIO FOR N deeply penetrates all solids, so multiplying the extinguishing power and preventing early fire restart. BIO FOR N increases the speed of extinction on vegetation fires, car fires, house fires, dumping site fires, plastic fires, tyre fires... The saving of water eases the cleaning of destroyed houses.

▲ **Foaming power** : BIO FOR N is usable at Low, Medium and High Expansion with all known equipment. Its foam clings and sticks to vertical structure for a long time.

▲ **Corrosion** : BIO FOR N contains an additive NITRATE-FREE with a strong inhibition effect against metal corrosion.

▲ **Fuel fires** : BIO FOR N is efficient on all hydrocarbon fires, such as diesel, kerosene, petrol... So it is perfectly usable for any vehicle fires.

▲ **Environment** : BIO FOR N is harmless for environment and totally biodegradable.

BIO FOR N is totally fluorine-free.

### PHYSICAL DATA

Appearance	red liquid
Specific gravity at 20°C	1.02 ± 0.02 Kg/dm <sup>3</sup>
pH at 20°C	7.0 ± 1.0
Viscosity at 20°C	9 ± 2 cStokes
Sediments	0 %
Surface tension at 0.6 %	24 ± 2 mN/m
Freezing point	- 10°C
Temperature of use	- 5°C / + 50°C

### FOAM QUALITY AT 1 %

Low Expansion	> 8*
Drainage time 25 %	> 4 minutes
Medium Expansion	> 50*
High Expansion	> 700*

\* Foam expansion values depend on the equipment



### PERFORMANCES & APPLICATIONS

BIO FOR N complies with standards :

- ▲ EN 1568-1 ■ EN 1568-2 ■ EN 1568-3
- ▲ Navy : Bureau Veritas certificate
- ▲ UL : NFPA 18

BIO FOR N can be used with Compressed Air Foam Systems (CAFs).

BIO FOR N can be used for all structural fires with tap water, sea water and brackish water. Depending on the fuel and the intervention – extinction or protection – we recommend different methods of application :

FIRES	APPLICATION	CONCENTRATION
Low fires: bush, grass, sawdust, tundra, muskeg...	Wetting	0.2 %
High fires : standing timber, structures, farms...	Wetting foaming LE*	0.5 %
Urban fires : flat, houses, warehouses	Foaming LE*	0.5 %
Vehicles fires : cars, tractors...	Foaming LE* / ME*	1.0 %
Solid fires : plastic, tyres, wood, cotton...	Wetting foaming LE*	0.5 %
Warehouse flooding	Foaming HE*	1.0 %
Hydrocarbon fires	Foaming LE*	1.0 %

\* LE : Low Expansion \* ME : Medium Expansion \* HE : High Expansion

### WARRANTY & SERVICES

BIO FOR N has a 10 years warranty in its original packaging and at storage temperatures -30°C/+60°C.

Our Quality Control Laboratory offers its analytical expertise BIO-LAB.

Safety Data and Environment Data are available upon request : [contact@bio-ex.fr](mailto:contact@bio-ex.fr)

**bio-ex s.a.s.**

[www.bio-ex.com](http://www.bio-ex.com)