

X-Fresh™



1 Sulphite-Free Formula for seafood shelf-life extension and melanosis control

ND Pharma & Biotech



X-Fresh TM

by

ND Pharma & Biotech

Seafood, specially shell-protected seafood are a sensible material, difficult to protect and preserve to offer to consumers with the better possible state.

Historically the fight against bio-deterioration and melanosis were made through sulphite and sulphite derived compounds, with more restrictions as the public health and scientific knowledge about these compounds became deeper and more accessible to general public.

The concerns of industry about safe, easy-to-use and non-residual/clean label (regarding to allergies), is constantly increasing, especially

those relatives to the onset of melanosis both on wild-capture and farmed species.

ND Pharma & Biotech developed a single formula that increase significantly the shelf life of these products that is converted undoubtedly into an incremented market value, in terms of quality expressed and perceived by clients and consumers.

X-Fresh TM is more safe and easy-to-use than sulphite. Sulphite and derived compounds are products which an effect of masking melanosis, in fact, turning whitening off the black color. Sulphite, (specifically sodium metabisulphite) do not fight with other bio-deterioration elements resulting into degradation of shellfish, malodors, poor-quality products and shorter shelf life.

Sulphite and sulphite-derived compounds are corrosive and can cause migration of materials into product as well as damages to plants and equipment within factories. Sulphite cause also health and occupational problems to operators and employees especially due to uncontrolled uses within fleets and processing plants.

X-Fresh TM is designed and engineered to solve that problems associated to shellfish. The active ingredient is safe and easy to use and do not leave chemical residues or taints. His main effect is to inhibit the enymes present within the shellfish and thus far to avoid the malanosic "black color", sustaining natural color and appearance with a shelf life extension significantly longer than sulphite-treated species. The taste became also improved.

X-Fresh TM is approved within the European Union (EC2006/52) and Nordic Economic area. Additive approval as E-586

In the USA is regulated by FDA 21 CFR S.101.100 (a) (3) (ii) (c)

In China is regulated by FAHS (GB 2760-1996). Antioxidant classification (04.013)

Other relevant legislation, as Australia, New Zealand, South Africa, Canada, etc., please consult us.

#1 Worldwide Sulphite-Free Multi-Purpose/Multi-Function Product Line.

X-Fresh™



ND Pharma & Biotech.

Leading Innovation for Life.

- *Better Taste*
- *Better color, odor and texture products*
- *Suitable to use on-board, fish-farms, processing facilities, elaboration plants, etc.*
- *Longer Shelf Life*
- *Allows sweet natural flavor of products*
- *Elimination of Bacteria in fish and shellfish used in conjunction with SterilFood TM*
- *Easy to Use*
- *Perfect for those desiring “chemical-free” products and processing*
- *Control of undesirable enzymatic activity in shell-coated species*
- *No downside effects of SMBS*
- *No shells erosion as in SMBS*
- *Enhances performance of handing , storage, processing, and other manipulation of raws*
- *Up to 10 days retail – life*
- *Top quality product placement for retailers*
- *Dramatically improvement of shelf life.*
- *Improvement of appearance*
- *Virtually zero-rejects from customers*
- *Higher added value to certain species as in *Paenus Vannamei**
- *Higher degree of satisfaction from final consumers*
- *No tails-turn black after cooking*
- *No health concerns due to allergic reactions, especially in children.*
- *No breathing problems and other safety and/or health concerns for operators and employees.*
- *Innovation and Safety*
- *Healthier additive for consumers*
- *Liquid Technology*



Information about regulatory aspects of this product is extracted from different Governmental and Regulatory Bodies from different countries. Despite the fact that our company is concerned to be up-to-date and expose the more accurate possible relevant legislation, it may be possible to appear as unexact or due to legislative changes relatively obsolete. ND Pharma & Biotech decline any responsibility regarding this matters. Any further specific comprobation should be made directly with the relevant local, national, or supranational authorities. (c) ND Pharma & Biotech Publishing Co. Great Portland Street, London, UK. All rights reserved. This information is for commercial and informative use only. No liability derived from any other uses of this information or the statements contained within. Results may vary even with strict accordance to the application protocol established by ND Pharma & Biotech. Information regarding content, please query to: info@ndpharmabiotech.com.