PRO DEFENCE

FOODS FOR FISH AND FRY WITH PROBIOTIC





PROBIOTIC IN FISH FEEDING

Probiotics are living microorganisms that, if administered in adequate quantities, have a beneficial effect on fish's health.

WHAT EFFECT DO PROBIOTICS HAVE ON FISH?

- colonize the gastrointestinal tract, adhering to the intestinal epithelium, thus creating a barrier to the colonization of unwanted bacteria
- ✓ produce substances (organic acids, bacteriocins, hydrogen peroxide, lysozyme) which inhibit the growth of pathogenic bacteria
- restrict the access of pathogenic bacteria to nutrients
- affect the immune system, stimulating it to produce antibodies and increasing macrophage activity

BENEFITS FOR FISH FROM USING FOODS WITH PROBIOTIC



increased resistance to pathogens



faster growth of fish and greater fertility



stronger and larger fry



better utilization of food



better survival rate of the fry



increased resistance to stress

PRO DEFENCE FOODS CONTAIN THE PROBIOTIC BACTERIA BACILLUS SUBTILIS IN THE FORM OF VIABLE ENDOSPORES

Endospores are a type of spore that allow bacteria to survive in extremely adverse environmental conditions. Endospores are resistant to high temperatures of up to 100° C, drought, UV radiation and inappropriate pH of the environment. Thanks to these properties of *Bacillus subtilis* endospores, the probiotic added to Pro Defence foods retains its vitality for a long time, and germination of endospores occurs only in the gastrointestinal tract of fish.



Tropica 🖟 Tropica

PRO DEFENCE MICRO SIZE food with probiotic for fry

food with probiotic for fry and small species of fish hi-protein (57%) micro granules

with fish's feces

SIZE XXS

PRO DEFENCE

PRO DEFENCE SIZE S and M food with probiotic for all aquarium fish

- hi-protein (60%) powder with probiotic for everyday feeding of the
- viable Bacillus subtilis endospores, which stabilize gut microflora, boosting fish resistance to pathogens and facilitating utilization of nutrients, which in turn accelerates fish's growth and reduces contamination of water with fish's feces
- the synergic effect of probiotic, beta--glucan, vitamins and carotenoids significantly enhances the immune system of the fry, increasing its resistance to pathogens
- probiotic increases the survival rate of the fry and its resistance to stress
- high content of protein, including essential amino acids, ensures healthy growth and development of fish
- properly selected vitamins, macronutrients and trace elements prevent avitaminosis, rickets and supports organ and bone development

probiotic added to the food contains . / probiotic added to the food contains viable Bacillus subtilis endospores, which stabilize gut microflora, boosting fish resistance to pathogens and facilitating utilization of nutrients, which in turn accelerates fish's growth

and reduces contamination of water

(0.5 mm) with probiotic for everyday

feeding of fry and small species of fish

- . I the synergic effect of probiotic, beta-glucan, vitamins and carotenoids significantly enhances the immune system of fish, increasing their resistance to pathogens
- probiotic positively influences reproduction and alleviates stress caused by transportation, spawning, intra-species aggression, rivalry etc.
- feeding the fry increases their survival, has a positive effect on their growth rate and increases their resistance to stress
- high content of protein, including essential amino acids, ensures healthy growth and development of fish
- properly selected vitamins, macronutrients and trace elements prevent avitaminosis, rickets and support organ and bone development

- ✓ slowly sinking granules with probiotic for everyday feeding of fish
- probiotic added to the food contains viable Bacillus subtilis endospores, which stabilize gut microflora, facilitating utilization of nutrients, which in turn reduces contamination of water with fish's feces
- the synergic effect of probiotic, beta--glucan, vitamins and carotenoids significantly improves fish's overall condition and their immune system, hence food is recommended also during diseases, recovery or acclimatization
- probiotic positively influences reproduction, increasing fish's fertility and the survival rate of the fry and alleviates stress caused by transportation, spawning, intra-species aggression, rivalry etc.
- high content of protein, including essential amino acids, ensures healthy growth and development of fish

Available packing units: tin 100 ml.

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Available packing units: tins 100 ml, 250 ml, 1000 ml,





