

# Bioclean Aqua

## A Better Environment for Your Fish Instead of Fish Kills

Improve hatching & growth rate, control fish pathogens, reduce the risk of fish kills!



**Mala**TECH  
water

### Benefits of Bioclean Aqua bioremediation:

#### Freshwater lakes, and ponds:

- **Can heal fish** suffering from viral, or bacterial infections in an all-natural way
- **Reduces** pathogenic count
- **Prevents**, or radically lowers the risk of **fish kills** caused by bacterial or viral infections
- Prevents the overgrowth of multicellular algae, and various aquatic weed species
- **Improves water transparency**
- **Improves self-purification processes**
- Provides a better environment for fish and other higher aquatic life forms
- **100% all-natural & biodegradable, non-GMO, non-toxic, non-hazardous product with long shelf life, Works effectively without introducing environmentally hazardous chemicals**



#### Aquaculture:

- **Promotes growth rate** and hence production. Increases product weight
- Improves feed conversion ratio
- **Decomposes organic sludge**, reducing the need for water exchanges
- **Reduces Ammonium concentration**, and hence controls algae, and aquatic weed growth
- **Stabilizes Dissolved Oxygen** concentration, so that the fish can breathe easier
- Stabilizes bloom conditions and **prevents over-blooming of algae**
- Reduces off-flavoured product
- **Boosts immunity** of animal, **reduces mortality and improves survival rates**
- **Allows higher stocking rates**
- **Reduces length of growth cycle**, hence time taken to market is lower
- Improves animal health, improves immune reactions against diseases
- Prevents and treats floating clumps resulting from dead planktons
- **Reduces formation of Hydrogen Sulphide**
- **Reduces BOD and COD concentrations**
- **100% all-natural & biodegradable, non-GMO, non-toxic, non-hazardous product with long shelf life, Works effectively without introducing environmentally hazardous chemicals**

## Hatcheries:

- **Reduces the organic carbon** load in water
- **Controls foul odour** by lowering Ammonia and Hydrogen Sulphide concentrations
- **Ensure adequate Dissolved Oxygen** concentration
- **Reduction of BOD and COD**
- Reduces fungal load
- **Regulates heavy metal toxicity** in water
- **Reduction of Coliforms and other pathogens**
- **Induces molting**
- **Strengthens the immune system** of aquatic organisms
- **Increases the survival rates**
- **100% all-natural & biodegradable, non-GMO, non-toxic, non-hazardous product with long shelf life, works effectively without introducing environmentally hazardous chemicals**



## Product description:

Bioclean Aqua is a proprietary blend of carefully selected naturally occurring microorganisms isolated from soil, and natural freshwater bodies, which secrete enzymes and growth stimulating factors for aquatic lifeforms. It is a balanced formula of multiple different microbial strains, which work synergistically to **lower the toxicity level** in the pond and create a **healthier and more beneficial environment for freshwater fish**. The toxic pollutants are broken down to non-toxic by-products such as Carbon Dioxide and water. This is also evident when there will be a remarkable **reduction in foul odours** in the pond water. Bioclean Aqua **boosts Ammonium, and ortho-Phosphate removal rate**. Our microbial strains are competitors for food of pathogenic bacteria, which means Bioclean Aqua **lowers pathogenic count** significantly. The product, by creating a healthier aquatic environment, optimizes the metabolic system of freshwater fish, resulting a much better food conversion ratio, and improved immune system for the aquatic animals. **Bioclean Aqua is also a supplemental add-on for freshwater bioremediation processes** executed with Bioclean Pond Clarifier, focusing on the higher life forms in the aquatic ecosystem.

The stand-alone application of Bioclean Aqua is in aquaculture. In case of aquacultural ponds, and basins, it is preferable to pre-treat the water with Bioclean Aqua before introduction of the culture into the pond. **The amount of water exchange can be reduced** by using Bioclean Aqua. In aquaculture, massive quantities of organic compounds leach out from the feed into the pond water. These organic compounds may be rich in nitrate and phosphate, which disturbs the ecology of the pond by stimulating only certain type of life forms. The microbial communities become unstable. The toxicity of the pond goes up due to the incomplete decomposition of the organic matter. The discharge of fecal matter by the aquatic animals into the pond adds to the toxicity of the water. This deterioration of the water quality increases the culture's susceptibility to stress and disease. The partially decomposed sludge starts breeding certain pathogenic bacteria. High amount of toxic wastes induces blue green algae to thrive, and become unstable, the incidence of disease and stunted growth increases, and mortality rates soar. In response to these problems we have created a unique microbial system, Bioclean Aqua for total pond management. **Healthier fish, improved weight increase, and habitat, stronger immune system, less mortality rate, better taste** can be expected by using Bioclean Aqua in aquaculture.

Our **Bioclean Aqua solution for hatcheries** in aquaculture is natural and biological designed for tackling the issues specific to hatcheries. It is formulated from multiple strains of microbes, which work synergistically to lower the toxicity levels in the growth habitats as well as create a healthier and more beneficial environment for the larvae and post larvae stages. **In aquaculture, the vast amount of nutrition for animals (fish) is responsible for the deterioration of water quality as a habitat. The microbes and enzymes in Bioclean Aqua degrade the nutrient that is left unutilized.** Apart from unutilized food, sludge formation is further aggravated by fecal matter emitted by the larvae, as well as pollution from other sources. This serves to an unhealthy environment and increases the susceptibility to diseases caused by pathogenic organisms. **Bioclean Aqua is a complex solution for pathogenic bacteria count, fungal load reduction, and water quality improvement,** including the breakdown of particulate, and soluble organic compounds, nutrient removal, and regulating heavy metal toxicity.

## Fields of application:

- Freshwater Lakes
- Water reservoirs
- Oxbows
- Decoration ponds
- Slow-moving rivers, and canals
- RAS (Recycling Aquaculture Systems)
- Extensive, intensive, super-intensive, flow-through aquaculture systems
- Hatcheries



## Application of Bioclean Aqua:

### IMPORTANT INFORMATION:

Recommended daily dosages are guidelines only, given in ppm for the solid product, based on lake net volume.

For determining exact dosages for your lake, reservoir, pond, basin or hatchery, please provide us information by sending us our questionnaire filled with information.

**Whenever you have any questions, do not hesitate to contact us!**

### 1) Freshwater lakes:

**Dosage for one treatment:** 0.1-0.6 ppm per treatment based on lake's water volume. Exact dosage rate depends on water quality, ecological state of the lake, and the load of pollution/nutrients. Product can be mixed with Bioclean Pond Clarifier, and dosed as a common suspension for freshwater lake bioremediation.

**Number of treatments per year:** 4-8 treatments per year together with Bioclean Pond Clarifier, depending on water quality, ecological state, the load of pollution/nutrients, and geographic location of the lake.

**Method for the proper execution of a treatment:** Bioclean Aqua, and Bioclean Pond Clarifier needs to be premixed with water before application! Pure water, or preferably the lake's own water should be used! After stirred and mixed well, the suspension of Bioclean Aqua, and Bioclean Pond Clarifier must be sprayed onto the water surface by **EVENLY COVERING THE ENTIRE WATER SURFACE OF THE LAKE WITH THE SUSPENSION OF THE MIXTURE!**

For smaller lakes, treatments can be done from the shore from multiple locations by using a container for the suspension, and a pump with a sprayer. For bigger lakes treatments are done from a boat.

## **2) Smaller freshwater (decoration/garden) ponds:**

**Dosage for one treatment:** 0.4-1.1 ppm per treatment based on pond's water volume. Exact dosage rate depends on water quality, the load of pollution/nutrients, and the number of fish.

**Number of treatments per year:** Once per month in season.

**Method for the proper execution of a treatment:** like described in section "1) Freshwater lakes" above.

## **3) Aquaculture ponds**

**Dosage for one treatment:** 0.2-0.9 ppm per treatment based on lake's water volume. Exact dosage rate depends on water quality, ecological state of the lake, and the load of pollution/nutrients.

**Number of treatments in season:** 4-8

**Method for the proper execution of a treatment:** Like described in section "1) Freshwater lakes" above.

## **4) Hatcheries**

2-4 ppm from hatching to packing stage, based on water volume in the basin. Apply once in 2-3 days

## **Packaging information:**

The product is available in:

- 25 kg net carton box in bulk for larger lakes
- 15 kg net carton box (60X250 g metal pouches) for smaller ponds, and hatcheries

which are the lowest units for ordering.

## **Storage information & shelf life:**

Keep the product in a cool and dry place below 30 Celsius. Avoid exposure to direct sunlight. Shelf life is 5 years from manufacturing date.