

**BIVIGRO**  
CREATE NEW TYPE OF FEED ADDITIVE

# Cleantec

**New Generation Disinfectant  
Potassium Monopersulfate Compound**

**BIVIGRO ANIMAL HEALTH LIMITED**

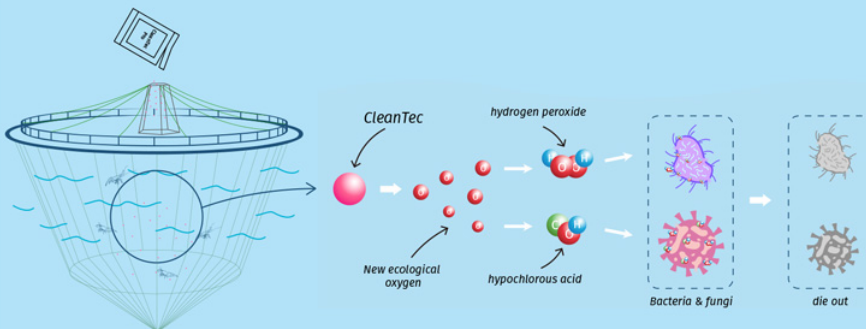
# 01 Cleantec® Pro

CLEANTEC PRO is a high efficiency new generation disinfectant appears light pink powder with slightly lemon flavor with characteristics of broad-spectrum bactericidal, it is mainly composed of potassium monopersulfate compound and its synergist and stabilizer which acts as superior formula disinfectant.



## Working Principles

Based on strong oxidation functions of PMS to react its synergist and stabilizer, CLEANTEC PRO plays chain reaction to keep generate new ecological oxygen, hypochlorous acid, free hydroxyl, hydrogen peroxide to rupture pathogenic bacteria, achieve the purpose of killing bacteria, fungi, protozoa, and viruses.



## Disinfection Duration

Based on the ideal formula of CLEANTEC PRO, the disinfecting effect which calculated as effective chlorine can working last for 7days

	Degradation of effective chlorine content			
Time	0-48 hours	48-72 hours	3-5 days	5-7 days
PH	2.08	2.36	2.78	3.41
Effective Chlorine	10.2	9.80	9.20	8.30

## Specifications

The content, effect and dosage of CLEANTEC PRO

Cleantec Pro	
Main Ingredient	Potassium Monopersulfate Compound 50% Excipients q.s. (synergists and stabilizers) 100%
Specification	Available chlorine 10%min
Effect	Thoroughly And Safely Kill Pathogenic Bacteria, Viruses, Fungi, Spores
Application	Dissolved into water and splash into pond evenly
Dosage	500-800g/1000m <sup>3</sup> depending on technical guidance
Package	1kg/bottle, 12bottles/box; Shelf Life is 24 months

## High Density Pond Recommend



CLEANTEC PRO is firstly recommend for high density breeding pond (high level shrimp pond), the disinfecting duration can last for 7days, and the disinfecting effect is much stronger than other kinds of disinfectant

## Dissolved Splash Into Pond



CLEANTEC PRO can be totally dissolved into water, and then splash into pond evenly, it can be used every 15-20days depending on actual water quality and shrimp breeding stages

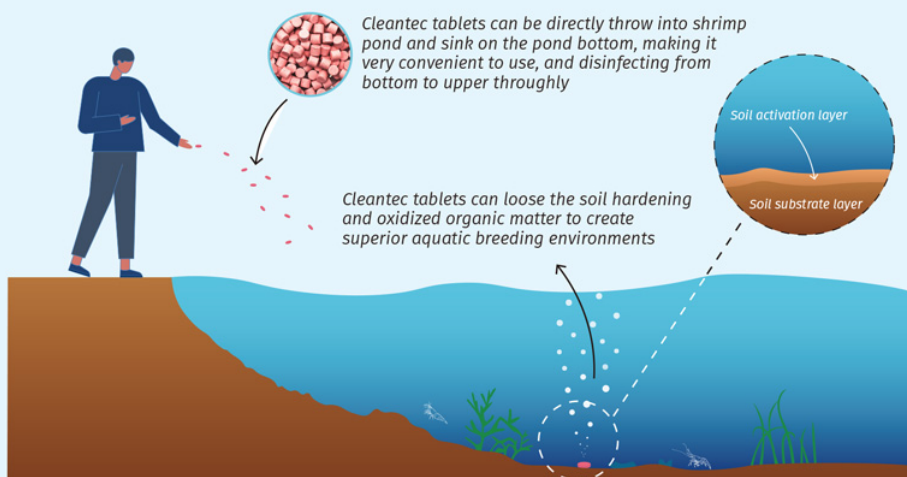
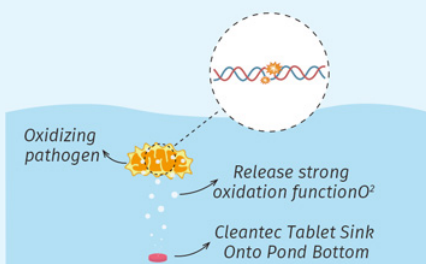
# 02 Cleantec® Tablet

Cleantec effervescent tablets is combined by potassium monopersulfate compound and its synergist, it can directly throw into pond and sink onto bottom for disinfecting which easy to use, its strong oxidation functions ensure disinfecting pond water from bottom to top thoroughly without any chemical residue.



## Working Principle

The new oxygen will be generated after CLEANTEC TABLET dissolved into pond which provide with very strong oxidizing ability, it can denature the proteins of bacteria and viruses to destroy the synthesis of pathogenic bacteria.



## Specifications

The content, effect and dosage of CLEANTEC TABLET

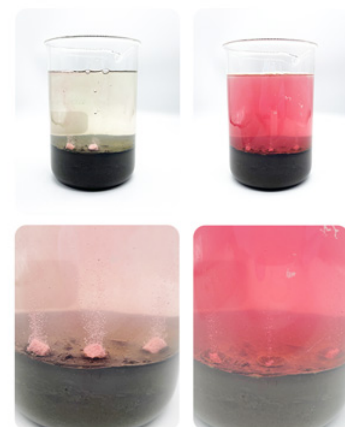
Cleantec Tablet	
Main Ingredient	Potassium Monopersulfate Compound 50% Excipients q.s. (synergists and stabilizers) 100%
Specification	Potassium Monopersulfate Compound 50%
Effect	Thoroughly And Safely Kill Pathogenic Bacteria, Viruses, Fungi, Spores
Application	Directly throw cleantec tablet into aquatic pond evenly
Dosage	500-800g/1000m <sup>3</sup> depending on technical guidance
Package	1kg/bag 12bags/box; Shelf Life is 24 months

## Soil Pond Recommend



Since CLEANTEC TABLETS provides strong oxidation functions, so it is suggested for soil pond disinfecting purpose, it not only can kill pathogenic bacteria, but also can loosening pond bottom substrate to create suitable growing environmental.

## Trial For Loose Soil Bottom



CLEANTEC TABLET can loose hardening soil to creat better environments, and oxidize ammonia nitrogen and give back clean water quality.

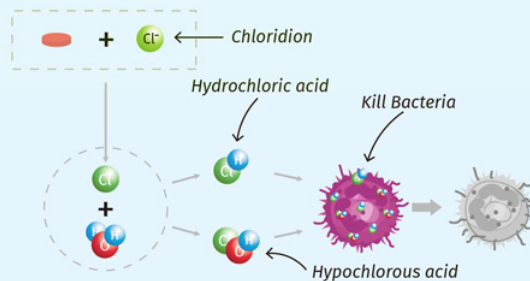
# 03

# Cleantec® The Application

Both Cleantec Pro and Tablet are perior disinfectant which mainly contains potassium monopersulfate compound, Cleantec Pro is perfer to used for high level aquatic pond, and Cleantec Tablet is perfer to used for soil pond, both disinfectant provides with its features and brings farmers purified water quality.

## Anti-Pathogenic Bacteria Effect

Based on super oxidation capacity and its chain reaction with synergist, Cleantec provides a strong disinfection ability to kill bacteria, fungi, spores, vibrio, and viruses thoroughly and effectively.



Effect of CLEANTEC results of antibacterial experiment in vitro for aquatic harmful bacteria

	A.hydrophila	E. tarda	Edwardsiella	A. sobvia	P. fluorescens
MIC (µg/ml)	0.125	0.25	1	0.25	0.5
MBC (µg/ml)	0.125	0.25	1	0.25	0.5

Effect of CLEANTEC results of antibacterial experiment in vitro for aqatic harmful vibrio

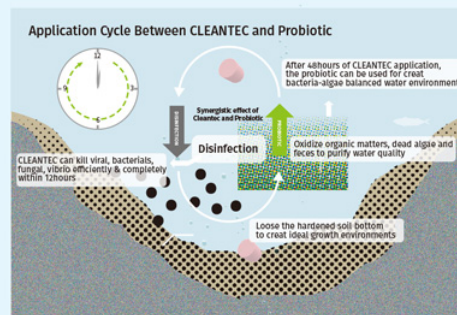
	A.hydrophila	E. tarda	Edwardsiella	A. sobvia	P. fluorescens
MIC (µg/ml)	0.45	0.45	0.45	0.45	0.45
MBC (µg/ml)	0.6	0.6	0.6	0.6	0.6

## The application cycle between CLEANTEC and Probiotic

The perfect disinfecting effect of both CLEANTEC PRO and TABLET will be palyed within 12hours, pathogenic bacteria will be significantly eliminated and total water bacterias count is reduced in large scale.

The probiotic can be used in 48hours after CLEANTEC applied to create dominant beneficial bacterias water environments.

The application principle, when water quality going bad or pathogens increased to cause diseases, using CLEANTEC firstly, after 48hours using probiotic, to create ideal water quality to suitable aquatic animal growth.



## Difference of Pro & Tablet



Firstly, both Cleantec Pro & Tablets are disinfectant with superior disinfecting effect, both types can be used for high density breeding or soil pond breeding.

The differ is that Cleantec Pro is using chain reaction by PMS with it synergist to provides with long disinfecting duration which can last for 7days, so as, the disinfecting effect is more thoroughly for water body, it is more suitable for high density breeding / high level aquatic pond which no needs to rely beneficial algae to maintain water flora balances.

Cleantec tablet is more preferring to be used in soil pond, it can directly throw into pond and sink onto bottom, so as, it can loose harden soil on bottom, and oxidize organic matters, to give back the clean water. based on the oxidation function of Cleantec Tablet, it will not affect the beneficial algae growth, so as it can quickly kill all pathogenic bacteria, and easy to reach bacteria-algae balance after the disinfecting process.

# 04 Cleantec® The Contrast

Besides the anti-bacterial functions, the metabolites of Cleantec will not affect human life and the environment, which can be the most safety disinfectant on the market, it also provides the prevention and treatment effect for fish bacterial sepsis, shrimp white spot syndrome virus and red appendages disease of prawn etc., especially because of its fewer irritating characteristics, it can be applied for shrimp stress treatment and daily water disinfection.

## The Safty For Application

In practical usage, Cleantec also shown a unique water purification effect and oxygenation effect when compared with the existing chlorine and iodine disinfection preparations, it can not only sterilizing water, but also improve water quality and provides better biocompatibility.

The Contrast Between cleantec And Tranditional Disinfectant									
Category	Products	Anti-Bacteria	Anti-Fungl	Anti-Virus	Anti-Spore	Anti-Stability	Aquatic Irritant	Harmful Resldue	Store Safety
Quaternary ammonium salt	Benzalkonium Bromide	√	×	×	×	Stable	No Irritant	No Resldue	Safe
Heavy Metal salts	Potasslum Permanganate	√	√	×	×	No Stable	Has Irritant	Has Resldue	Safe
Aldehydes	Formaldehyde	√	√	√	√	Stable	Has Irritant	Has Resldue	Safe
	Glutaraldehyde								
Iodine	Povidone Iodine	√	√	√	×	Stable	No Irritant	No Resldue	Safe
Inorganic Chlorine	Sodlum Hypochlorite	√	√	√	√	No Stable	Has Irritant	Has Resldue	No Safe
	Calclum Hypochlorite								
Organic Chlorine	Sodlum Dichloro Cyanurate	√	√	√	√	Stable	Has Irritant	Has Resldue	No Safe
	Trichlorololocyanuric Acid								
Superoxide	Chiorine Dioxide	√	√	√	√	Stable	Has Irritant	No Resldue	No Safe
	Cleantec								



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Bivigro® is an innovative technology-based company focusing on research, production and sales of antibiotic substitutes and animal nutritional products, the aim is to offer animal performance solutions, and making your effort to be more efficiency.

Learn more at [www.bivigro-animal-health.com](http://www.bivigro-animal-health.com)

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