



Aqua FENSE a microbial tool for aquaculture bioremediation

水域生态环境修复良方

A major challenge affecting shrimp and fish farmers globally is the disposal of accumulated organic matter. Improper treatment and disposal contributes many problems including poor water quality, high levels of stress, runaway disease problems, and excessive costs of production affecting profitability, and regional pollution that is inconsistent with sustainable production.

影响全球鱼虾养殖户的一个主要挑战是处理积累的有机物质。不正当的处理导致许多问题，包括水质差、压力大、失控的传染性疾病，过高的生产成本影响盈利以及区域污染导致的可持续生产不一致等问题。

Aqua FENSE

Contains **proprietary blend of Bacillus strains**
 Naturally occurring strains and safe to use
 Broad range of enzymatic and metabolic activities
 含芽孢杆菌属的独制配方
 含天然菌株，安全使用
 广泛的酶促和代谢活动

Introducing **AquaFENSE**, a microbial tool which contains proprietary tableted blend of Bacillus strains, designed for the proactive management of water quality in both high and low intensity production ponds, hatchery tanks, home aquariums and RAS systems.

AquaFENSE是一种含芽孢杆菌属的独制配方，用于管理高低密度生产池，孵化池，家庭水族箱和RAS系统中的水质。

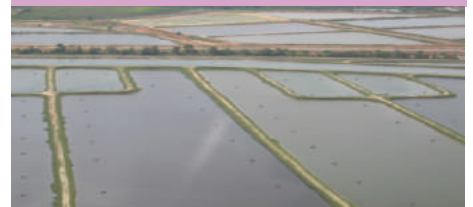
Before application - dirty shrimp ponds
 使用前-肮脏的池塘



Bacillus strains
 芽孢杆菌属



After application - cleaner ponds
 使用后-更洁净的虾场



Advantages of Tablet Form Over Traditional Powder Form 片剂的优点

Ease of Use 方便使用 No messy powders to handle. Add tablets directly to pond bottoms, provide long term shelf stability 无杂乱的粉末。可直接将剂片添加到池塘底部, 提供长期的稳定性。	No Activation Required 无需活化 Tablets dissolve and bacteria germinate. 剂片容易溶解, 有助细菌滋生。
Potent 有效 Each tablet contains approximately 64 billion CFU 每片含大约64亿CFU。	Direct Delivery 可直接消化 To pond bottom where sludge needs to be digested. 直接在池塘底部消化污泥。

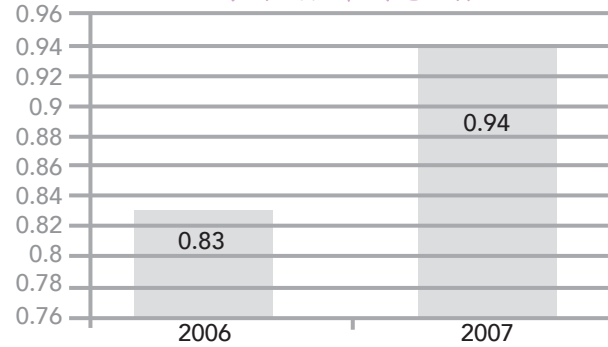
Every pond is different. Application rates will vary depending on pond type, size, stocking density, water exchange rates, pond location, amount of biomass in the ponds, amount of protein in the feed, the presence of stress related disease problems, etc.

每个池塘都不同。施用率将根据池塘类型、大小、放养密度、水交换率、池塘位置、池塘中的生物量、饲料中的蛋白质含量、压力相关疾病问题等的存在而变化。

Guidelines for hatchery usage 孵化场的使用指南

- One to two tablets daily from stocking of nauplii to day before harvesting PLs for 5 to 10 MT of water.
- 5至10公吨的水: 从放养无节幼体到收成, 每日一至两颗粒剂。

Weekly Growth Rate (grams/week)
每周成长率 (克/周)



Benefits 使用效益

Improved Feed Conversions 改善饲料转化 Healthier animal waste, less feed required. Use feed more efficiently for growth. 减少饲料使用, 让虾群有更良好食欲, 更有效地消耗所食饲料。	Excellent Cost Benefit 卓越的成本效益 Cost benefits in a recent trial were better than 10:1. A savings of more than 10 for every dollar spent. 对于典型养殖场, 成本效益逾10:1。相等于每一美元可节省超过10美元。
Increased Growth Rate 提高增长率 Study reported that a 14% increase in weekly growth (23 ponds over 148 days). (P<.005). 每周增长14%(测试于23虾池, 逾148天)。 (P <0.005) 。	Less Water Exchange 减少水供替换 Reduced water exchange by more than 75%. AquaFENSE produces a more stable pond environment with much higher levels of beneficial algae and fewer blue green algae. Use of the tablets has cut costs and increased profits. 实验证实可减少超过75%水替换的机率。 AquaFENSE 营造了更稳定的池塘环境, 更多的有益藻类和较少的蓝绿藻。
Cleaner Pond Bottoms 更洁净的池塘底部 Shorter time between cycles and less use of oxidizing agents. Fouling organism were controlled, lower levels of waste accumulated on the tank. The AquaFENSE helped in reducing the stress factors in pond environment including ammonia, nitrite, and Vibrio loads. A stable plankton bloom was noticed in the three experimental ponds up to the harvest. 更短的循环周期, 减少氧化剂的使用, 防止污垢生物, 减少池底废物积聚率。 AquaFENSE 有助于减少制造池塘环境中压力的因素, 包括氨, 亚硝酸盐和弧菌。至收获期间, 证实可产生稳定数量的浮游生物。	Eliminated Use Of Antibiotics 取代抗生素 The bacteria in AquaFENSE compete against potential pathogens lessening impact of disease. Adding AquaFENSE to pond with shrimp affected by black spots eliminated the problem quickly. AquaFENSE 与有害细菌竞争, 不但有助病菌消除, 还可取代抗生素。

Speedy Assay Sdn Bhd 586317-W

A member of Revongen Corporation
 Revongen Corporation Center
 No. 12A, Jalan TP5, Taman Perindustrian UEP,
 47600 Subang Jaya, Selangor Darul Ehsan, Malaysia.

t . +6 03 8025 1603
 f . +6 03 8025 1637
 e . info@speedyassay.com
 w . www.speedyassay.com



f www.facebook.com/speedyassay