



SLUDGE BLANKET REMOVAL CITY IN CALIFORNIA

Plant Profile

Startup date: 1975

Service population: 10,000

Number of Operators: 2

Flow: 974,000 gpd

Lagoons: 3 aerated, 1 polishing/holding, 2 evaporation/percolation basins

Capacity: 17.6 MG

During the latter part of 2003 the chief operator at the City's wastewater lagoon system began making preparations to remove the sludge from his lagoons. Because mechanical dredging and sludge hauling and land filling would cost hundreds of thousands of dollars, the city sought less costly alternatives.

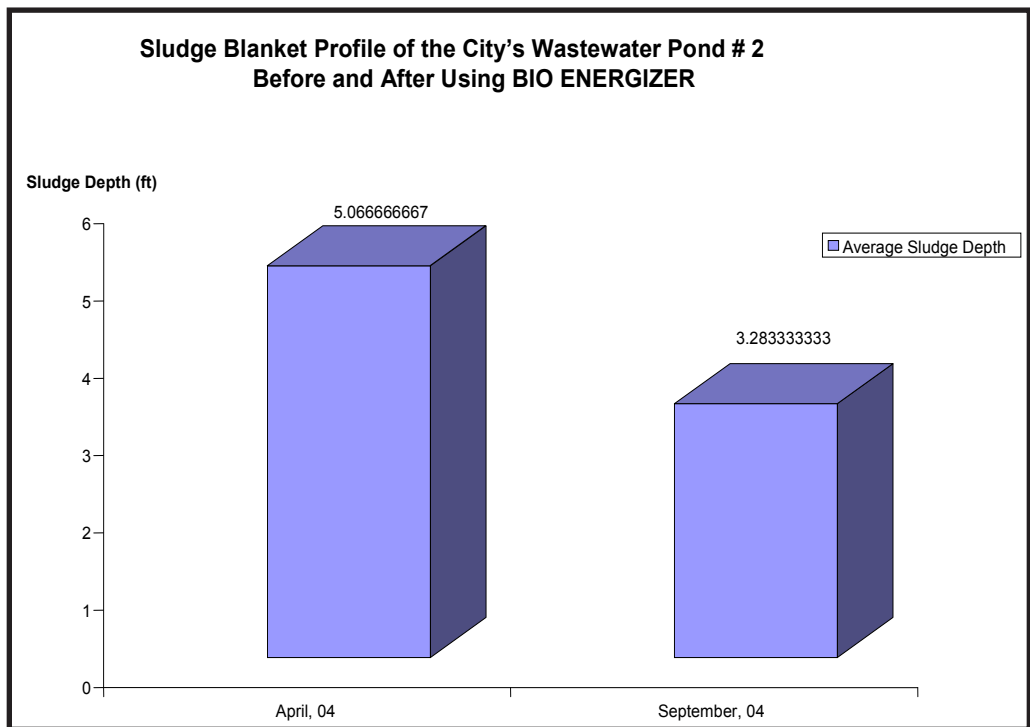
In April 2004, the City decided to save money by biologically oxidizing their sludge to gas while the lagoons remained on line. To do this they began adding BIO ENERGIZER, a biological activator that accelerates the natural oxidation of sludge into harmless carbon

dioxide and water. After just 6 months, 21.36 inches of the sludge blanket was removed at a fraction of the cost of mechanically removing, drying, and hauling their sludge.

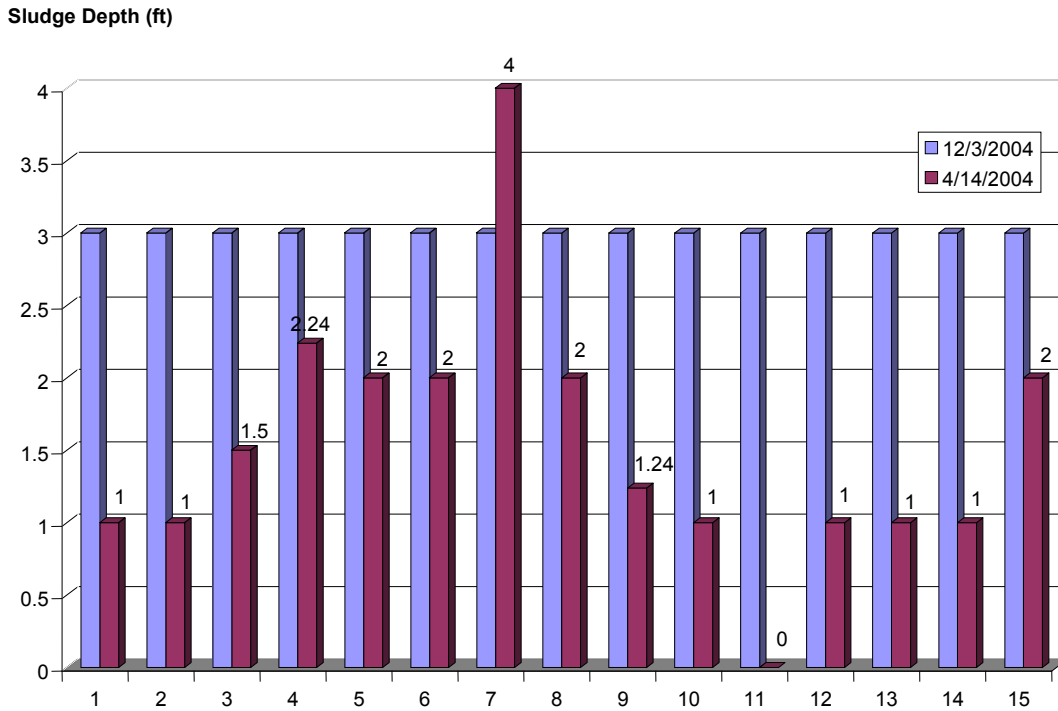
Lagoon de-sludging with BIO ENERGIZER is typically one-fifth to one-tenth the cost of mechanical dredging and land applying or land filling.

Before it was added to pond # 2, BIO ENERGIZER was added to the primary cell to see the results. After a few short months, 50% of the sludge was removed at a cost of a few thousand dollars. BIO ENERGIZER saved the City the expense of dredging, handling, and sludge removal costs in pond # 1.

Sludge Blanket Profile of the City's Wastewater Pond # 2 Before and After Using BIO ENERGIZER



Sludge Blanket Profile of Wastewater Pond # 1 Before and After Using BIO ENERGIZER



BIO ENERGIZER is a broad-spectrum bio-activator containing over 29 essential microbial growth-promoting factors. By design, BIO ENERGIZER is a balanced formulation of vitamins, trace nutrients, enzymes, organic acids, and bio-stimulants that motivate the existing microbial community to greater metabolic capacity and efficiency. BIO ENERGIZER is not a bacterium.

For over fifteen years wastewater operators have continued to use BIO ENERGIZER to cut their sludge hauling costs.

Operators Using BIO ENERGIZER Report:

- 1) **The elimination of expensive dredging costs.** BIO ENERGIZER converts sludge into gases and water, reducing sludge accumulations. No draining, drying, excavating, or inconvenient down time.
- 2) **The reduction of odors and aeration costs.** Probiotic enhance aerobic and facultative biological eco-systems to reduce the production of objectionable and offensive odors and enhances dissolved oxygen levels.
- 3) **Increases in BOD removal efficiency.** BIO ENERGIZER improves treatment plant removal efficiency to increase plant treatment capacity and more easily meet effluent requirements.

BIO ENERGIZER enhances endogenous respiration for faster and more complete oxidation of sludge into carbon dioxide and water. BIO ENERGIZER is non-toxic, safe, and presents no danger to personnel.

Call Toll Free Today for Your Free Pond Evaluation and Sludge Removal Quote
1 (800) 961-1220 ext. 231