





Bioremediation Technology Using Quantum Powder and Oxygen Powder to Degrease and Clean the Floor of Shrimp Culture Soil Ponds

Salehi M.¹; Faizbakhsh R.²; Aziz Mofrad S.³

- 1-Faculty of Natural Resources, University of Tehran
- 2- Guest lecturer of Shahid Beheshti University, Tehran
- 3- Specialist at Basco Co, Mackenzie, Texas, 75070
- *Corresponding author's email: Mahsa.salehi.oa@gmail.com

Abstract

Development of shrimp farming has faced problems, one of which is the sludge and sediments of shrimp esters, which cause stress and barriers to production. Bioremediation is a method that can be used to prevent the formation of sludge and harmful substances in shrimp ponds by using microorganisms or enzymes produced. Shrimp pools acted. In this study, using SA material, which is composed of microorganisms that prevent the production of harmful substances and sludge in the pool cell, as well as oxygen powder has been used. In this research, 8 experimental treatments, including 8 one-hectare earthen pools, have been carried out in Hormozgan, near Jask city. Treatment No. 1 has been observed and 7 other treatments have been used in different amounts of SA substance and oxygen powder. The results show that as the use of SA and oxygen powder increases, the amount of sludge in the pool floor decreases. Therefore, this experiment confirms the usefulness of these substances in preventing the occurrence of sludge. Also, using economic evaluations, we concluded that treatment number 5 was the best treatment in this experiment because it has good results and is also economical and can be used as a formula used in shrimp farms

Keywords: Shrimp Breeding, Shrimp Biotechnology, Biomedicine, Marine Environment, Quantum Powder, Oxygen Powder, Sludge Disposal, Shrimp Ponds