

PROBIOTIC CAPSULES ADMINISTRATION TO FISH

Description:

In previous studies carried out, *Shewanella* PDP11 has been confirmed as a potential probiotic for aquaculture fish. However, when incorporated into feed for oral administration to animals, it completely loses its viability after short periods of time. Thus, it has been considered that it is necessary to prepare a preparation that maintains its viability and allows its administration to the fish independently of the feed. In this sense, the present invention consists of a preparation for the oral administration of the probiotic *Shewanella* PDP11 to fish consisting of capsules in the form of spherical particles of uniform morphology and modifiable size to adapt to fish of different sizes. These capsules contain organoleptic and / or nutritional additives that act as attractants for animals.

Keywords:

[Feeding](#), [Aquaculture](#), [Probiotic](#), [Encapsulation](#)

Sectors:

[Fisheries](#), [Agriculture and Marine Resources](#), [Agri-food](#)

Areas:

[Food](#), [Marine and Aquaculture](#), [Industrial](#)



Advantages:

Among the advantages of the present invention are:

- The inclusion of the indicated probiotic preparation in the capsules makes it survive longer, allowing its use on a commercial scale.
- The capsules are stable in the aquatic environment.
- The capsules support the passage through the digestive tract of the fish, on which it exerts favorable biological effects.
- The administration of the capsules is independent of the usual food, thus avoiding the inactivation of the microorganism during the manufacture of the feed. On the other hand, they also highlight:
- The cultivation of the *Shewanella* PDP11 strain is simple and can be carried out on an industrial scale.
- The manufacture of the capsules does not require an excessively expensive apparatus.
- The substances used in the manufacture of the capsules are ingredients authorized for food use, easily accessible and cheap.

Uses and Applications:

The present technology has its utility as a preparation for the oral administration of probiotic in fish, being of special interest for the aquaculture industry.

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