



## **Monitoring of white spot syndrome disease in carriers and crustaceans isolated from water intake areas leading to shrimp aquaculture stations in Hormozgan province using molecular markers**

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### **Abstract:**

Monitoring of white spot syndrome disease in carriers and crustaceans isolated from water intake areas leading to shrimp aquaculture stations in Hormozgan province using molecular methods viral diseases are the factors which causes the reducing production in shrimp aquaculture industry. Since 1992, a viral syndrome has been found in family *Penaeidea*, commonly referred to as "white spot disease. The symptoms of this disease can be easily seen in young and mature samples. The white spots first appear on the carapace of the shrimp and the 5 to 6 bands of the body, and during the development stage the whole body is covered with white spots with a thickness of 5.5 to a few millimeters. The spread of the disease occurs through the movement of infected larvae or Carriers. This project was carried out with the aim of tracking the carriers of the disease in other crustaceans such as crabs and other crustaceans in the shrimp farms in Hormozgan province, using accurate PCR test. The results of PCR molecular tests over a two-year period showed that all samples as well as the wild shrimp tested, did not have any signs for white spot syndrome disease. It can be noted that the use of Molecular tools such as PCR can be helpful in quickly diagnosing white spot disease.

**Keywords:** Hormozgan province, white spot, disease, shrimp