

Biological study on *Pampus argenteus* and *Otolithes ruber*

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Abstract: This study was done on *Otolithes ruber*, showed this fish distributes in all coastal of Persian Gulf specially coastal of Khuzestan province. Seasonal spawning *O. ruber* is from middle of Esfand to last Farverdin. In mature *O. ruber* diet is small shrimp and crustacean and adults diets small fishes. Absolute fecundity of this species are 81726 to 1483369 for 275 to 474 millimeter. The first length of adult (male) is 151 to 200 millimeter and (female) 201 to 200 millimeter .

1- Relative between length and weight (*otolithes ruber*)

$$W = 0.041 L^{2.41}$$

$$r = 0.98$$

2 - Relative fecundity and oval diameter (*otolithes ruber*)

$$\log F = 1.7 + 3.01 \times \log OVA.D$$

$$r = 0.31$$

3 - Relative fecundity and gonad weight (*otolithes ruber*)

$$\log F = 4.14 + 0.81 \times \log GW$$

$$r = 0.89$$

Pampus argenteus live in deep 5 meters to 80 meters coastal waters. The absolute fecundity this species *P. argenteus*

determined between 67896 to 280150 as fishes with 332 to 360 millimeter total length.

1 - Relative between total length and total weight (*Pampus argenteus*)

$$W = 0.083 \times 10^{-4} \times L^{3.271}$$

$$r = 0.96$$

2 - Relative fecundity and fork length (*Pampus argenteus*)

$$\log F = 8.69 + 0.569 \times \log FL$$

$$r = 0.21$$

3 - Relative fecundity and total weight (*Pampus argenteus*)

$$\log F = 8.793 + 0.465 \times \log TW$$

$$r = 0.35$$

Pampus argenteus diet copepods and calanoeads on small length groups, and its diet copepods and Nematodes and diatoms on high length groups. The first length of adult (male) is 131 to 160 millimeter and (female) 221 to 250 millimeter. The seasonal spawning of *P. argenteus* are from between middle of Ordibehesht to middle of khordad in Khuzestan coastal water.

Keywords: Absolute fecundity - copepods - Adult fishes - Length group