Age determination of archer fishes (Toxotes jaculatrix and Toxotes chatareus) inhabiting Malaysian estuaries

ABSTRACT

In this study the most common bony structure (scales) and method was investigated for age determination of archer fishes. A total of 85 specimens of archer fishes (Toxotes chatareus and Toxotes jaculatrix) from the estuaries of South Johore, Malaysia were examined for age. Scale length is linearly proportion (r = 0.816) to standard length (SL). Relationship between scale length (L) and scale weight (W) can be expressed by the formula W = 0.0155L2.917. Daily growth rings and annulus of scales count up demonstrated that the ages of the samples for both species were mostly 1-2 years and a handful samples of T. jaculatrix were above 2 years.

Keyword: Archer fish; Toxotes chatareus; Toxotes jaculatrix; Daily growth rings; Scale