

Gonadal Anomalies in European Sea Bass (*Dicentrarchus labrax* Linnaeus, 1758) and Common Sole (*Solea solea* Linnaeus, 1758) from Güllük Bay, Southern Aegean Sea

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ABSTRACT

European seabass and common sole are commercially important species for worldwide fisheries. A European sea bass, *Dicentrarchus labrax*, specimen (TL 45.3 cm and W 1203.21 g) and a common sole, *Solea solea*, (TL 26.2 cm and W 180.52 g) were caught off the coast of Boğaziçi, located in Güllük Bay, Muğla, Turkey by a trammel net in December 2013 and in October 2015, respectively. In European sea bass inside the abdominal cavity, abnormally, both new and unabsorbed gonad tissues were observed, together. Although unabsorbed gonad had a membrane, it was surrounded by a new membrane. Unabsorbed and dark colored gonads were found atrophic and new gonad membrane were coated old gonad tissue and egg production were found in normal. In common sole, when the ovaries should be placed in eyeless and eyed side, eyeless side of ovary was in eyed side of abdominal cavity. In this case, it was found that there was no side-separation in ovaries. Industrial and domestic pollution may cause serious environmental problems which are closely related to anomalies in aquatic organisms. On the other hand, genetic characteristics of organisms may be another factor of this kind of abnormalities.

Keywords: Aegean Sea, common sole, European seabass, small-scale fishery, Turkey