

Interaction between Monk Seals, *Monachus monachus* (Hermann, 1779), and artisanal fisheries in the Foça Pilot Monk Seal Conservation Area, Turkey

by Harun Güçlüsoy

Abstract. The present study examines some aspects of the interaction between critically endangered Monk Seals *Monachus monachus* and artisanal fisheries in the Foça Pilot Monk Seal Conservation Area, Turkey, between 1994 and 2002. One to four permanent researchers collected the data on this interaction during seal sighting data enquiries. Interviews with the fishermen provided a total of 448 seal sighting records, of which 142 were collected around the fishing gear. *Loligo vulgaris* taken from a lure and *Conger conger* were reported by fishermen for the first time as Monk Seal prey. Of the 142 encounters by Monk Seals with the fishing gear, 6 were of animals entangled by the floating rope of the nets. The establishment of permanent or temporary no-fishing zones (in view of the 4-month lactation period) to prevent the entanglement of suckling pups in breeding sites is proposed as an appropriate management practice.

Key words. Aegean Sea, İzmir Bay, endangered species, operational interaction, marine mammal.

Introduction

Marine mammals have often been seen as our non-human competitors for the protein resources of the seas. One of the main reasons why they have been perceived in this way has always been their regular interaction with fishermen and fisheries since very early times (JOHNSON & LAVIGNE 1999, BEARZI 2002). It is unfortunate that the nature of this interaction has negative consequences for fishermen, for not only do marine mammals try to “snatch the catch” but they also frequently damage fishing gear during these attempts (NORTHIDGE & HOFMAN 1999, MOORE 2003, LAURIANO et al. 2004). Unfortunately, too, they may get entangled in the fishing gear and drown (HALL et al. 2000, BEARZI 2002, READ et al. 2006). Even in the case of a critically endangered species such as the Mediterranean Monk Seal *Monachus monachus* (Hermann, 1779) (IUCN 2007), which is protected by the Barcelona (Fourth protocol species), Bonn (Appendix I and II) and Bern (Appendix II) Conventions as well as by CITES (Appendix I), the situation is no different (JOHNSON & KARAMANLIDIS 2000, GÜÇLÜSOY 2008).

The Monk Seal, the only seal species to live in Turkish waters, has an estimated overall population there of 100 (GÜÇLÜSOY et al. 2004a). The species has been officially under national protection since 1977 and 1978 as a result of the legislative efforts of the Ministry of Forestry (which later became the Ministry of Environment and Forestry) and of the Ministry of Agriculture and Rural Affairs respectively. Together with the cetacean species present in the study area (GÜÇLÜSOY et al. 2004b & 2005), the Monk Seal is known to have thrived in the vicinity of Foça town since antiquity (JOHNSON & LAVIGNE 1999). Since the 1960s, the