

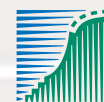
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Waterbirds around the world

A global overview of the conservation,
management and research of the
world's waterbird flyways

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Harvesting status of migratory waterfowl in northern Iran: a case study from Gilan Province

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Commercial and recreational waterfowl hunting is a well established part of the culture of northern Iran and migratory waterbirds have an important role in the economic and social development of this area. This survey was carried out to determine the abundance and diversity of hunted waterfowl in Gilan province, northern Iran, from November 2001 to February 2002. The results showed that 393 693 individual birds from 49 species and eight families were harvested from the aquatic ecosystems of Gilan province during the study period (Table 1). Anatidae were the most abundantly hunted group of species.

Due to its ecology and geographical situation, northern Iran is an important key wintering area for waterbirds in the Middle-East (Mansori 1984). It contains diverse habitats which attract many different species. Gilan province (36°02'- 38°27'N and

48°30'-50°30'E) covers 14 711 km², has three Ramsar sites and numerous other aquatic ecosystems making this area a key site for wintering migratory waterbirds. The legal and illegal harvesting of these migratory waterbirds is an important source of income for the indigenous people of this state.

Surveys found that the main local markets for hunted birds are in the cities of Rashat, Anzali and Langrud. In order to determine the number of birds harvested, counting was carried out during the four months of November, December, January and February in these three cities. Each week data was collected on the diversity and numbers of species in the bird markets of these cities.

From November 2001 to February 2002 a total of 393 693 waterbirds were harvested. Comparison of the three main cities suggested that the harvesting rate in Anzali was the highest, about 39% of all hunted birds (Fig. 1). The highest number of birds was recorded in January, with a total of 160 514 birds (Fig. 2).

Commercial and recreational waterbird hunting is a well established part of the culture of northern Iran. It is recognized

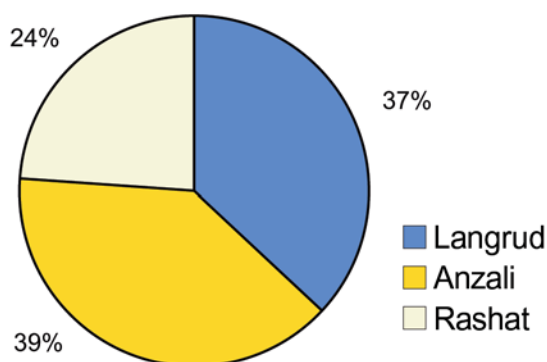


Fig. 1. Harvesting percentages in each location.

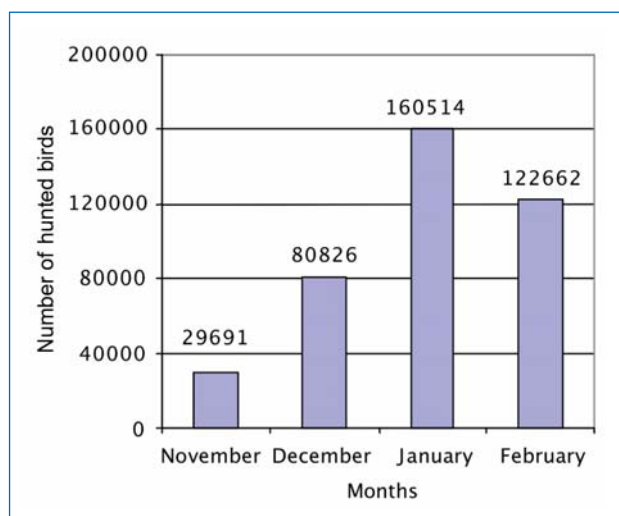


Fig. 2. Number of hunted waterfowl in different months (November 2001-February 2002)



Fig. 3. Hunted waterfowl for sale in Gilan Province, northern Iran.

Table 1. Number of hunted individuals of each species in Gilan Province, northern Iran.

Species		Number of Hunted Birds			
		Feb.2002	Jan.2002	Dec.2001	Nov.2001
<i>Tachybaptus ruficollis</i>	Little Grebe	63	130	86	95
<i>Podiceps nigricollis</i>	Eared Grebe	52	23	23	44
<i>Podiceps cristatus</i>	Great Crested Grebe	63	54	43	58
<i>Phalacrocorax carbo</i>	Great Cormorant	33	8	15	17
<i>Phalacrocorax pygmaeus</i>	Pygmy Cormorant	33	16	17	17
<i>Anser anser</i>	Greylag Goose	14	11	17	14
<i>Tadorna ferruginea</i>	Ruddy Shelduck	40	14	15	27
<i>Tadorna tadorna</i>	Common Shelduck	45	28	37	16
<i>Anas platyrhynchos</i>	Mallard	10 410	13 732	19 602	9 098
<i>Anas crecca</i>	Teal	54 681	75 465	40 910	15 659
<i>Anas strepera</i>	Gadwall	620	494	494	410
<i>Anas penelope</i>	Wigeon	149	127	173	14
<i>Anas acuta</i>	Pintail	55	46	38	6
<i>Anas querquedula</i>	Garganey	707	313	255	178
<i>Anas clypeata</i>	Shoveler	974	797	424	199
<i>Netta rufina</i>	Red Crested Pochard	149	538	258	217
<i>Aythya ferina</i>	Eurasian Pochard	585	508	707	226
<i>Aythya nyroca</i>	Ferruginous Duck	46	37	31	16
<i>Aythya fuligula</i>	Tufted Duck	86	118	126	15
<i>Aythya marila</i>	Greater Scaup	101	85	109	49
<i>Gallinula chloropus</i>	Common Moorhen	54	164	132	198
<i>Porphyrio porphyrio</i>	Purple Swamphen	56	80	76	107
<i>Fulica atra</i>	Eurasian Coot	52 682	66 550	16 439	2 581
<i>Vanellus vanellus</i>	Northern Lapwing	32	33	15	2
Charadriidae	plovers and lapwings	407	275	144	80
Scolopacidae	sandpipers	525	868	472	197
Laridae	gull and terns	-	-	168	151
Total		122 662	160 514	80 826	29 691

as a legitimate activity within the context of sustainability but requires management. Harvesting of these species by recreational hunters is minimal. The management of commercial harvesting is achieved through the declaration of an annual waterbird hunting season with regulation of the length of each



Ruddy Shelduck *Tadorna ferruginea*. Photo: Anastasia Popovkina.

season, setting of daily opening and closing times and the setting of daily bag limits and total possession limits. Estimates of total waterbird populations are used to vary these parameters in order to restrict the harvest to sustainable levels (Balmaki 2002). The standard waterbird hunting season lasts three months but may be extended in 'good' years and reduced in 'bad' years.

Surveys showed that 83 Pygmy Cormorant *Phalacrocorax pygmaeus* and 130 Ferruginous Duck *Aythya nyroca* were hunted during this period. These species are listed as threatened in the IUCN Red List (BirdLife International 2000). The presence of these species in the bird markets indicates that management of the traditional harvest is extremely difficult due to cultural constraints in Gilan, and is not being fully implemented at present.

The most abundant group of harvested waterbird in this region was the Anatidae family with the Eurasian Coot *Fulica atra* the most popular prey for hunters.

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