

First record of Zarudny's Jird, *Meriones zarudnyi* Heptner, 1937 (Rodentia: Muridae) in Shirvan, Northeast Iran

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Among the rodent specimens deposited in the collections of Rodentology Research Department at Ferdowsi University of Mashhad, one specimen of Zarudny's Jird was found which has been collected from Shirvan, in Northern Khorasan Province, Iran. This species is a new record for the fauna of Iran. The species *Meriones zarudnyi* Heptner, 1937 was recorded for the first time from Kushka in Turkmenistan (Fig.1A) and is distributed in the arid steppes of northern Afghanistan and southern Turkmenistan (Musser & Carleton, 2005). *Meriones zarudnyi* is endemic in the Badkhez region of southern Turkmenistan (semi-arid highland habitats), but has not been reported in the Iranian Plateau. *Meriones zarudnyi* was considered a race of *M. crassus* by Ellerman & Morrison-Scott (1966). Kuznetsov (1965) tentatively treated it as a distinct species, while Lay (1972), based on additional evidence from Afghanistan, emphasized that it was distinct from both *M. crassus* and *M. tristrami*. The presence of this species in Afghanistan was confirmed by Hassinger (1973) who stated that *M. zarudnyi* is restricted to Turkmenistan and Afghanistan. The studied specimen collected from the Shirvan confirmed that this species is widely distributed towards W of Turkmenistan and NE of Iran.

The diagnostic characters of *M. zarudnyi* are ambiguous and overlap with those of other species of *Meriones*; its distinction from other *Meriones* species is difficult and a detailed study of external and cranial morphology of this species might be appropriate. This species differs from *M. tristrami* in having a hairy hind foot. The underbelly is white; the upper part of the tail light gray and its lower part yellowish; the tail is longer than the head and body; the tuft of the tail is well developed as in *M. persicus*, and its proximal part is off-white in both the upper and lower areas and the extremity short, dark brown to maroon dark yellow. The sole of the hind foot is partially covered with fur and the heel is bare. Claws are yellow and its upper part is a mixture of brown and chestnut color with a tendency towards a dark sand-like color. The auditory bulla is remarkably similar to *M. persicus*, but its posterior edges are flattened (Fig. 1B). The auditory meatus lacks a curtain, is flat with the anterior edge of the meatus slightly curved; the suprimeatal triangle is large, isosceles, and closed. Suprimeatal space is large with an upper empty half. The upper part of the suprimeatal triangle is equal to the lower suprimeatal process. Zygomatic plate is rectilinear (Vinogradov & Argyrupola, 1968).

Material examined: Zoological Museum, Ferdowsi University of Mashhad (ZMFUM-2288) (Skull, skin and tissue), adult male, Shirvan (37° 36'N, 57° 42'E, 1089 m), Northern Khorasan Province, Iran, 2011, leg. A. Mahmoodi. Morphometric data of material examined is given in Table 1.



FIGURE 1. A: Sampling locality of *Meriones zarudnyi* in Iran (Shirvan) and the type locality of the species in Turkmenistan (Kushka). B: Skull of *Meriones zarudnyi*, lateral view.

TABLE 1. Morphometric characters of *Meriones zarudnyi*.

Variable	Length/Width (mm)
Lower cheek teeth row length from crown	4.92
Upper cheek teeth row length from crown	4.82
Length of first upper molar	2.66
Width of first upper molar	1.71
Occipito-nasal length (greatest length of skull)	40.21
Condylobasal length of skull	37.72
Bullar width (from meatus to paraoccipital process)	8.90
Bullar length	10.63
Bullar height from lateral view	10.78
Mastoid length	4.77
Tail length (with tuft)	160.00
Head and body length	155.00
Hind foot length	30.00
Ear length	20.00

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