

Première mention de la musaraigne alpine en Savoie

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En décembre 1986, André Miquet découvrait sur la route de Courbaton, rive gauche de l'Isère, commune de Bourg-Saint-Maurice (45°37'N/6°48'E), une musaraigne au pelage entièrement noir, gelée et en parfait état de conservation. Examinée au Laboratoire d'Ecologie de l'Université de Savoie (où le spécimen est déposé) par Hubert Tournier, elle s'est révélée être une Musaraigne alpine *Sorex alpinus* (longueur totale 136 mm, queue 71 mm, pied postérieur 16 mm).

Le site s'inscrit dans la Sapinière-Peissière de Malgovert, à 1 250 m d'altitude, dans un faciès humide à strate muscinale particulièrement développée en exposition NNW. La station concernée est conforme, au plan écologique, aux autres données françaises ; nous pensons que l'espèce pourrait être assez répandue en Tarentaise et en Savoie, bien qu'il s'agisse ici à notre connaissance de la première mention dans ce département.

Attempt of free ranging readaptation in two small carnivores in Doñana National Park

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During the last years an increasing concern for genetic diversity conservation has been evident (Soule 1980). It has given rise, among others, to a proliferation of test on captive reproduction, re-stocking, traslocations, etc., in animals (Brambell 1977, Kleiman 1980, 1989 ; Herrendtschmidf and Léger 1987, Delibes 1988). The adaptation to nature in birds born or kept during some time in captivity, has generally been successfull (Wiemeyer 1981), but the tests with mammals are much more scarce and their results more contradictory (Kleiman 1989). For this reason, we estimate of interest to make known any experience on the matter, positive or negative, since it can help to improve the techniques for free ranging life readaptation.

During the 1987 and 1988 winters we returned to free ranging life two small carnivores, an Egyptian mongoose, *Herpestes ichneumon*, and a genet, *Genetta genetta*, at the Coto Rey in Doñana National Park, SW Spain (approx. 37° N,

6° 30' W). The Doñana National Park is characterized by sandy soils practically plain, where three biotopes mainly can be distinguished: the marshes or « marisma »; the scrubland; and the dunes (for more detail about the area see Valverde (1958) and Rivas-Martinez *et al.* (1980). Each of the two animals was equipped with a radio-collar for monitoring their movements and controlling the results of the adaptation to free living.

The mongoose was a female from Cadiz province, where Dr. J.A. Valverde found it overrun, being 2/3 months old, and then cared for by the same. So as to integrate it in a family group of the area, when it were about 8 months old and weighing 1900 g. It was kept captive for two weeks in the company of a similarly sized young female captured in Coto Rey, and which usually was with other two individuals. During captivity both animals related perfectly. Previous marking of both mongoose with 70 g radio-collars, they were released together on 7th December 1987 at 1250 solar hour in the place where the autochthonous mongoose had been captured.

The first night both mongooses were located resting in the same den. Later we located the recuperated mongoose for 11 times at places habitually used by mongooses in Doñana (Palomares and Delibes 1989), always at less than 400 m from the release place. From the first night on, it was never located together with the autochthonous individual. On 18th December its collar got loose and all recapture attempts were unsuccessful. On 8th February 1988, we found its body remains next to *Pistacia lentiscus*, at 270 m from the release place. It was recognized by an earring that we had put in one of its ear. We were not able to elucidate the reasons of its death.

The genet was a young male from the Huelva mountains. At about one month old it had been stolen from the field, and later recuperated by the ICONA staff at Doñana National Park, where it was kept in captivity in a $2.2 \times 0.6 \times 0.6$ m cage set in an isolated place. The genet was equipped with a 55 g radio-collar when approximately 8 months old, weighting 1300 g, and released on 10th December 1988 at 1700 solar hour in Coto Rey, in a place with an optimum habitat for genets (Palomares and Delibes 1988). The next day the genet was located in the same release place, inactive among dense vegetation, a common behaviour in Doñana genets (Palomares and Delibes 1988). On the second day, it was found dead at 200 m far from the release place, in a pinewood. The necropsy proved that it had been killed by a dog.

The situation of both animals was different. The mongoose had enjoyed free living, whereas the genet, at the age it was stolen from nature, still remained in the den. On the other hand, the ages of both individuals in the release moment were sufficient for selfsupply, not needing parental care (Roeder and Pallaud 1980, Delibes 1981, author, pers. obser.), although mongooses, at that age habitually stroll in small family groups.

In the genet case we had verified that it was able to kill some live prey (quails, *Coturnix coturnix*; doves, *Columba* sp.; rats, *Rattus* sp.), however, perhaps it might not have developed the learned capacity of protection in front of depredation (Kleiman 1980, 1989). In the mongoose case, at least two different factors might have contributed to its death. On the one hand, the habitat change, since the animal came from Cadiz mountains. On the other hand, the meteorological conditions especially adverse in December of that year, with important floods, that no doubt limited both prey disponibility and mongoose ability for their capture.

The failure in the two re-stocking attempts; once more manifest the difficulty of readaptation to wild life in mammals kept in captivity. On the other hand, to the problems already shown (inexperience in the face of predators, scarce ability for feeding, etc.) we must add individual different capacities before reintroduction, and re-stocking, or an ineffective training during captivity (Carbyn 1986, Kleiman 1980, 1989).

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