



ALBINISM IN MOLINA'S HOG-NOSED SKUNK, *Conepatus chinga* (MAMMALIA, CARNIVORA, MEPHITIDAE)

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ABSTRACT

The present report describes a case of albinism in *Conepatus chinga* in a countryside area of Uruguay, thus enhancing disclosure about color mutation of Neotropical mammals.

Keywords: Mutation; Albinism; Uruguay.

RESUMO

Albinismo em zorrilho, *Conepatus chinga* (Mammalia, Carnivora, Mephitidae). O presente relato descreve episódio de albinismo em *Conepatus chinga* em uma área rural no Uruguai, contribuindo assim com a divulgação acerca de mutações cromáticas em mamíferos neotropicais.

Palavras-chave: Mutação; Albinismo; Uruguai.

INTRODUCTION

Albinism is considered a rare event on wild animals, and it has rarely been reported on such creatures (Abreu *et al.*, 2013). It is a natural genetic variation of recessive and mutational order caused by a deficit in melanin production (Walter, 1938). True albinism consists in the complete absence of pigmentation where the protein is supposed to be present, skin, fur, stratum corneum (horns, shells and hoofs) and eyes (iris) (Sazima and Pombal, 1986; Sazima and Di-Bernardo, 1991; Rodrigues *et al.*, 1999; García-Morales, 2010). Other depigmentation forms, which include white stains over the body or variations on the chromatic pattern are regarded as “partial albinism”

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(Geiger and Pacheco, 2006; Oliveira, 2009a; 2009b), or “leucism”, (Van Grouw, 2006; Abreu *et al.*, 2013), and those are more prone to happen in wild animals than total albinism.

Albino or leucistic South American mammals in freedom are reported in several taxons, such as chiroptera (Walley, 1971; Ochoa and Sanchez 1988; Moreira *et al.*, 1992; Veiga and Oliveira, 1995; Geiger and Pacheco, 2006; García-Morales *et al.*, 2010), small rodents (Pessoa and Reis, 1995; Cademartori and Pacheco, 1999) and medium sized rodents, like the agoutis (Oliveira, 2009a; 2009b). Albinism and leucism in carnivora mustelidae have been documented in *Mephitis mephitis* (Hollister, 1943; McCardle, 2012), *Mustela erminea* (Schamberger, 1972), *Mustela putorius furo* (Błaszczuk *et al.*, 2007) and *Lontra longicaudis* (Toledo *et al.*, 2014). So far, there have been no registers of albinism in *Conepatus chinga*, but there was one leucistic specimen in Argentina noted by Castillo (2011).

Conepatus chinga, best known in Uruguay, Argentina and the South of Brazil as zorrillo (or zorrillo, zorrino), is a small-sized land mammal of thick dark-colored fur, which may vary between black and dark brown with two dorsal white stripes that spread from head to tail. This species inhabits open field areas and shows crepuscular, nightly and lonesome behavior, taking shelter in dens. As a defense strategy, this species sprays a substance of very strong and distinctive smell from perianal glands, as means to scatter potential predators (Silva, 1994; Achaval *et al.*, 2007; Canevari and Balboa, 2007).

The present report aims to describe an encounter with an albino specimen of *C. chinga*, in the countryside region of the state of Salto, Uruguay.

OCCURRENCE DESCRIPTION

The register was made at the 6th registration section of Salto state, in Uruguay, in a place known as “Matajojo chico” or “Sopas”, in June, 21st, 2016 around noon, -31.35°S, -56.25°W. According to dwellers of the place, two similar individuals had already been spotted in this area. Nonetheless, only one of them was photographed (Figure 1A and B).

Even though *C. chinga* is not considered an endangered species, maintenance of open areas that are not used for agriculture or forestry is an advantage to the future of the species' population. Nevertheless, hunting the species for its fur is still common in Argentina and in the South of Brazil. Moreover, smallholder farmers from the region, frequently slaughter *C. chinga* blaming the species for the disappearance of small domestic animals, birds specially, from their estate (Kasper *et al.*, 2013).

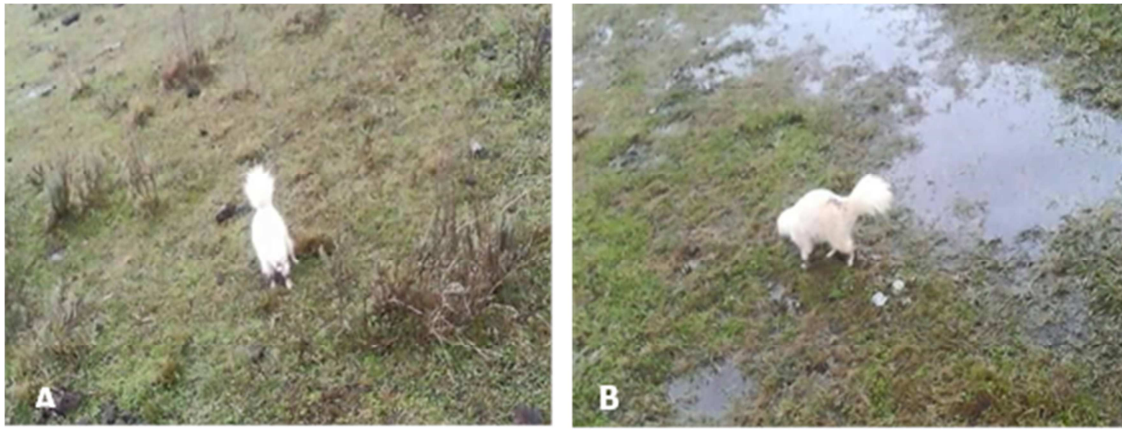


Figure 1. A) Sample of albino *C. chinga* (frontal view). B) Lateral view, observed at 6th registration section of Salto, Uruguay. Picture: Manuel Duarte.

This report is relevant for the awareness of biology and for future studies involving the genetic factors responsible for the manifestation of albinism in the species, as well as notifying the genetic anomaly as means to boost the search for information on the behaviour implications of albinism in *C. chinga*, as for instance in sexual selection (with the trait possibly interfering in mating) or in the influence of the mutation on hunting or on susceptibility to predation.

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