PALYOORA OR PLAINS RAT

*Pseudomys australis*

The Plains Rat was formerly widely distributed across inland Australia, but now is essentially restricted to cracking clay habitats in northern South Australia. Plains Rats dig complex, shallow burrow systems with surface runways that connect neighboring burrows. Plains Rats acquire all of their water needs from their food which includes seeds, leaves (especially saltbush) and insects.

**DETECTION AND IDENTIFICATION**

The Plains Rats are nocturnal and are most often seen in headlights running at high speed across tracks and away from vehicles. The adults are relatively large reaching a weight of up to 85 grams (about one and a half times bigger than a House Mouse), and are brownish-grey to grey with a silvery sheen on the back and sides. The undersides are whitish and the head, ears and eyes are relatively large. They grow to a head and body length of 14cm. The tail, which is plain and brushless can be up to 12cm long. Plains Rats are considerably larger than any other rodents that may occupy the same habitat. Although they have an impressive list of sounds, including distress calls chirping and squeals when fearful, they are generally placid and quiet when handled.

**DISTRIBUTION AND HABITAT**

Plains Rats are found on stony plains and mild slopes. The vegetation is predominantly saltbush shrubs. They have also been found on the Moon Plain east of Coober Pedy.

**POTENTIAL THREATS TO PLAINS RATS**

Predators (including foxes, cats and raptors), extreme weather, and declining resource availability may contribute to the decline of these populations. Grazing stock and introduced herbivores may damage burrow systems and compact the soft cracking clays where Plains Rats live.

**FOCUS QUESTION**

What is the difference between the Plains Rat and a House Mouse?

Adult male Plains Rat. Photograph by Peter Canty.

Plains Rats sometimes form extensive burrow systems in cracking clay soils and gilgais on gibber plains. Photograph by Michelle Watson.
SOUTHERN MARSUPIAL MOLE

Notoryctes typhlops

The mysterious Southern marsupial Mole is a unique Australian animal of great interest. Marsupial Moles spend almost all of their time underground, making capture and study of this curious mammal rare. They have been kept in captivity on only a few occasions and never for more than a few months.

IDENTIFICATION

This small mammal has short, thick, golden fur, no eyes and its ear openings are completely hidden by fur, the snout is leathery, and the finger nails are very big and scoop-like to enable it to dig through the compacted sand of its preferred habitats. Southern Marsupial moles do not often come to the surface. On dry, sandy surfaces, the ‘swimming’ strokes of their arms and legs leave a distinctive track, with the tail dragging between.

HABITAT AND DISTRIBUTION

In South Australia marsupial Moles have been recorded in the Anangu-Pitjantjatjara lands, the Maralinga lands, Yellabinna Regional Reserve and the western Simpson Desert. Within these areas, sand dunes, sand plains, and some sandy inland river flats are the preferred habitats of marsupial Moles. In these areas the vegetation is usually woodland including Mallee or Acacia shrubs and grasses including spinifex or canegrass.

POTENTIAL THREATS TO SOUTHERN MARSUPIAL MOLE

Over the last 30 years the number of reports and findings of Moles by Aboriginal People has decreased, and this may be an indication that they are declining in some areas. Moles tunneling near the surface may be susceptible to foxes, whose acute sense of smell enables them to locate underground prey. High concentrations of introduced herbivores in mole habitats may cause compaction and damage to mole tunnels.