herpy

GECKOS

Common dwarf gecko

Lygodactylus capensis

Lygodactylus capensis is a small, greyish-brown dwarf gecko from southern and eastern Africa, where it lives on trees in savanna and open woodland and often on house walls. It is diurnal, grows to 7-9 cm including the tail and weighs less than 1 g. The species is the type species of its genus and common in the wild, but rarely kept.

Family: Gekkonidae Former name: *Hemidactylus capensis; Lygodactylus strigatus*

KEY FACTS

THE ANIMAL

Adult size	**7-9 cm** total length incl. tail
Weight	**0.7-1.1 g**
Lifespan	**4-6 years**
Active	**By day**
Lifestyle	**Arboreal**
Habitat	**Savanna**
Difficulty	**Experienced**

CARE

Min. enclosure	**30 × 30 × 40 cm** L × W × H for 2 adults
Temperature, day	**25-30 °C**
Basking spot	**30-35 °C**
Temperature, night	**18-22 °C**
Humidity	**50-75%**
Water	**No water dish**
UVB	**Recommended** Ferguson zone 2
Diet	**Insects and small invertebrates (springtails, fruit flies)**
Kept	**In pairs or one male with several females**

BREEDING

Reproduction	**Egg-laying**
Sexually mature	**9-15 months**
Clutch size	**1-2 eggs**
Incubation	**60-120 days** at 24-27 °C

PROTECTION AND PAPERWORK

CITES	**Not listed**
EU annex	**Not listed**
IUCN	**Least Concern (LC)**

About the species

Lygodactylus capensis is the type species of the genus *Lygodactylus*. It was described in 1849 as *Hemidactylus capensis*, and the name *capensis* refers to the type locality north of the former Cape Colony. The animal is a small, diurnal dwarf gecko and more subdued than the brightly coloured East African species: the back is greyish brown with a dark stripe from the snout to the shoulder or further, the throat is mottled with grey or brown, and the belly is cream.

From snout to vent adults measure 33-43 mm, and the original tail is about as long, so the total length is 7-9 cm. An adult gecko weighs only about 0.9 g. Under the toes sit adhesive lamellae, and the underside of the tail tip is covered with similar lamellae, so the tail works as a fifth limb. The tail is easily shed and grows back quickly, but without it the animal runs more slowly and climbs less well on vertical surfaces.

The taxonomy has changed several times. *Lygodactylus grotei* and *Lygodactylus pakenhami*, which were formerly subspecies, are now regarded as separate species in the same species group. In the enclosure, *L. capensis* is an animal to watch, not to handle.

Distribution and habitat

Lygodactylus capensis is distributed across southern and eastern Africa: north-eastern South Africa, Eswatini, Mozambique, Zimbabwe, Botswana, Namibia, Angola, Zambia, Malawi, southern DR Congo, Tanzania including the island of Pemba, and Kenya.

In South Africa the species has spread south and west since the 1980s, all the way to the coastal areas of the Eastern and Western Cape, probably with plants from nurseries and with tourism. The populations there are introduced, but the records on the map include them. The species is common and is not assessed as threatened.

> **Native range:** South Africa, Eswatini, Mozambique, Zimbabwe, Botswana, Namibia, Angola, Zambia, Malawi, Congo - Kinshasa, Tanzania and Kenya.

HABITAT

Lygodactylus capensis lives in savanna, open woodland and scrub and is common in towns and gardens, where it sits on trees, garden walls and house walls. It climbs on trunks and branches, often in full sun, and slips into crevices and behind loose bark when disturbed.

The climate over most of the range is hot, with a rainy season in summer and a dry, cooler winter. The habitat is drier and sunnier than that of the genus's East African forest species. The species tolerates cold less well than the nocturnal geckos in the same area, but tolerates somewhat more cold at night than by day. Ants make up 30-50 % of the diet; the rest is other small arthropods.

Care

THE ENCLOSURE

Little is known about the care of *Lygodactylus capensis*. The climate in the range is hot, with rain in summer and a dry, cooler winter, and the species lives on trees in savanna and open woodland. *Lygodactylus grotei*, which until recently was regarded as a subspecies of *L. capensis*, and *Lygodactylus picturatus* are better known in captivity and have similar requirements. The figures for temperature, humidity, light, breeding and lifespan are borrowed from them.

A pair can be kept in an enclosure of at least 30 × 30 × 40 cm (length × width × height), and a male with two females in 40 × 30 × 40 cm. Height counts for more than floor area, because the animal lives on trunks and branches.

The enclosure must be completely escape-proof for such small animals and their feeder insects: fine mesh in the lid and fine ventilation grilles at the bottom and top. Seal the side and back walls so that no animals are crushed behind the furnishings. Make the base a drainage layer of expanded clay pebbles under a mixture of coconut fibre and a little sand, optionally covered with a little leaf litter. Furnish with thin and thick branches, cork bark placed on edge as hides and sturdy plants such as sansevieria. The enclosure is furnished and run slightly dry, and standing moisture on the bottom should be avoided.

Read more: Humidity, misting and ventilation Read more: Terrarium construction and bioactive substrate

TEMPERATURE

By day the background temperature should be 25-30 °C with a basking spot of 30-35 °C under a small spot lamp. The heat lamp does not need to be on all day: two to four periods of 30-45 minutes in summer and two in winter are enough. At night the temperature falls to 18-22 °C. In winter the daytime temperature can be 23-28 °C and the night 18-20 °C.

The spot lamp must suit the size of the enclosure, because a powerful lamp in a small enclosure quickly raises the whole temperature. Use a thermostat or dimmer, and measure both high up and low down. An animal that sits motionless with its mouth open at the warmest spot is too hot.

Read more: Heat and temperature

HUMIDITY AND WATER

Humidity is kept at 50-60 % by day and 60-75 % at night. Mist lightly every morning, so that leaves and walls get droplets, and let the enclosure dry out during the day. The species is sensitive to standing moisture, and constantly wet branches and a wet substrate lead to mould and skin problems.

The animals drink droplets from leaves and walls, so a water dish is unnecessary and is a risk for such small animals. They need water every day, but cope with a single dry day. Keep a particular eye on summer heat and the placement of the enclosure, because small animals dry out quickly.

LIGHTING AND UVB

Lygodactylus capensis often sits in full sun and needs strong, even light. Use T5 fluorescent tubes or daylight LEDs, combined with a UVB tube. Use a moderate UVB tube (Ferguson zone 2) over part of the enclosure; the strength is an estimate. Leave shade and cover in the rest of the enclosure.

Keep the light on for 14-16 hours in summer and 12-14 hours in winter, controlled by a timer. A cool winter period with shorter days is an advantage if the animals are to breed.

Read more: Lighting and UVB

FEEDING

Ants make up 30-50 % of the diet in the wild. In the enclosure the diet consists of small live feeder insects: small crickets, fruit flies, springtails, bean weevils, small isopods and small cockroaches. Ants and termites can be offered if they come from places without pesticides. The feeder insect must be smaller than the distance between the animal's eyes.

Dust the feeder insects lightly with calcium with vitamin D3, and give the females a small dish of pure calcium that they can take from themselves. Feed every day or every other day without overfeeding. Several relatives also take fruit puree or prepared diet for fruit-eating geckos, but whether *L. capensis* does so is not documented.

Read more: Feeder animals: keeping and breeding Read more: Calcium, vitamins and supplements

BEHAVIOUR AND HANDLING

Lygodactylus capensis is fast and can easily escape or be injured, and the tail is easily shed, so the species is not suited to handling. Open the doors only briefly, and watch for gaps through which the animals can escape. The animal is shy and often hides when work is done in the enclosure.

Keep a pair or a male with one or two females. Two males are territorial and must not be kept together. Watch for bite marks and bitten-off tails, and separate animals that are being chased. The animals rest in the shade if the heat becomes too high.

Breeding

SEXUAL MATURITY AND SEXING

The male is recognised by a thickened tail base with two hemipenal bulges and by the preanal pores in front of the vent, which often secrete a waxy substance. The female has a slender tail base, and in adult females distinct calcium sacs are often visible. Sexual maturity is not documented for the species. The genus typically becomes sexually mature after 9-15 months, but the animals should preferably be 14-18 months old before they are put to breed.

MATING

Mating has not been described for *Lygodactylus capensis* in captivity. In *Lygodactylus grotei* the animals mate all year, and a cool winter period with shorter days and a slightly lower temperature is an advantage for breeding, because the female has time to build up calcium. Keep a pair or a male with one or two females together with many hides, so that the female can get away from the male, and move the male if he chases her persistently.

EGG-LAYING AND CLUTCHES

The female lays 1-2 hard-shelled eggs at a time, as all in the genus do. In *L. grotei* the eggs are about 5 mm and are laid at intervals of 4-6 weeks in bamboo tubes, small tins, bromeliads, under cork bark or on the floor. Provide several egg-laying sites that can be taken out of the enclosure. The eggs stick fast and break easily if they are detached, so it is better to take out the whole egg-laying site. Egg laying is hard on the female, who needs plenty of calcium.

INCUBATION

The eggs are moved carefully, without turning them, to a small box with slightly damp vermiculite and small air holes in the lid. The temperature is kept at 24-27 °C. The eggs hatch after about 60-120 days. This figure is borrowed from *Lygodactylus williamsi*.

REARING THE YOUNG

In *L. grotei* the young are 16-17 mm at hatching, and the young of *L. capensis* are probably just as small. Place them in a small, completely escape-proof enclosure with thin branches and a slightly damp corner, and mist daily. Give the very smallest feeder insects: springtails, fruit flies and newly hatched small crickets, dusted with calcium and vitamin D3. Keep the young separate from the adults. There must be food at all times, because such small animals have almost no reserves.

Health and common mistakes

Diseases in captivity have not been described for *Lygodactylus capensis*, but the typical problems in small dwarf geckos are:

- Too little water and too much heat in a small enclosure. Small animals dry out quickly. Use a thermostat or dimmer.
- Lack of calcium and vitamin D3, especially in females that lay eggs.
- An enclosure that is too wet, which causes mould and skin problems in a species from a drier climate.
- Shedding problems with retained skin on the toes and tail tip, which can cut off the blood supply. Loosen it carefully with lukewarm water.
- Mites, which sit as small red or black dots in skin folds. This requires treatment by a vet.
- Fights between males with bites and lost tails.
- Small animals that are crushed or get lost in gaps behind the furnishings.

A healthy animal is lively, has clear eyes and a plump tail base. See a vet with reptile experience if the animal loses weight, sits lethargically or stops eating.

Read more: Common diseases and signs of illness

Always ask someone who knows

This guide is a good place to start, but it cannot replace experience. Animals differ, and much of what matters most is learned from people who have kept the species for years. Talk to a breeder, an experienced keeper or a vet who knows reptiles and amphibians before you get the animal - and again if anything looks wrong.