

# Cannibalism in the endemic Madeiran wall lizard *Teira dugesii*, an observation of intraspecific predation in its native range

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Endemic to the Madeira Archipelago, the Madeiran wall lizard *Teira dugesii* is a lacertid species widely distributed across the islands. Thriving in a variety of habitats, from rocky beaches and urban environments to laurel forests and mountain peaks, the species seeks refuge in stone walls and natural rock crevices (Sadek, 1981). *Teira dugesii* exhibits generalist feeding behaviour, with a diet primarily consisting of fruits, flowers and invertebrates. However, through observational studies and faecal analysis, it has also been shown to prey on Moorish Geckos *Tarentola mauritanica* and seabird chicks, including Monteiro's storm petrel *Hydrobates monteiroi* and Scopoli's shearwater *Calonectris diomedea* (Matias et al., 2009; Neves et al., 2022; Rato et al., 2022). Dietary flexibility allows the species to exploit a wide range of resources across different habitat types, contributing to its exceptionally high population densities – which are among the highest recorded for any terrestrial vertebrate (Koleska et al., 2017; Arbuckle & Nichols, 2023).

Here we report the first case of cannibalism within the species' native range. The predation event was observed at 11:10 h on 31 October 2024 along the Pico Ruivo hiking trail, at an altitude of 1,696 m (32° 45'37.9" N, 16° 56'20.7" W). We noticed approximately ten juveniles on a wall adjacent to the trail and stopped to observe. A large male emerged rapidly from a crevice and captured a juvenile by the neck, before retreating into the wall. One minute after the event, the adult re-emerged with the juvenile, which now appeared to be deceased and had been inverted (Fig. 1). The adult adjusted its grip on the juvenile multiple times, before retreating into the wall once again.

Gloor & Benito (2023) first reported cannibalism in *T. dugesii* in an invasive population in Lisbon. While these observations were caveated with the potential for opportunism, we believe that this additional report from the species' native range provides significant support to the proposal that cannibalism in *T. dugesii* is driven by high population density and intense intraspecific competition. During our visit to Madeira, we also noted that a large proportion of *T. dugesii* sightings across a range of sites were of juveniles. Given this seasonal abundance of juveniles, and the significantly larger size of adult males, cannibalism would benefit larger lizards by reducing competition whilst simultaneously allowing them to acquire the calories needed in environments with intense intraspecific



**Figure 1.** An adult Madeiran wall lizard *Teira dugesii* preying on a juvenile of the same species

competition (Cooper et al., 2015). Cannibalism among lacertids has been documented in various island species, where limited resources and high population densities are often cited as contributing factors (Žagar & Carretero, 2012; Mateo & Pleguezuelos, 2015; Madden & Brock, 2018).

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