

PEER-EDITED NOTE

SOCIAL INTERACTIONS WITHIN AND BETWEEN SPECIES BY
LITTLE STRIPED WHIPTAILS (*ASPIDOSCELIS INORNATUS*)JASMYN D. ZIMMERMAN¹, MARIA A. EIFLER¹, DAHTIYA R. STANLEY²,
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Abstract.— The Little Striped Whiptail (*Aspidoscelis inornatus*) is a bisexual lizard native to the Chihuahuan Desert. Aside from being involved in a few hybridization events, nothing is known about its social behavior or interspecific interactions. At the Dalquest Desert Research Station (Presidio and Brewster counties, Texas, USA), we documented aggressive intraspecific encounters involving postural displays, biting, and pursuit, indicating potential territorial behavior. We also observed interspecific interactions, including avoidance of the Greater Earless Lizard (*Cophosaurus texanus*) and aggressive displacement of the Common Checkered Whiptail (*Aspidoscelis tessellatus*). Our observations provide insight into the social behaviors of *A. inornatus* and underscores the need for further study of its social dynamics.

Key Words.—aggression; Chihuahuan Desert; lizard; social behavior; Texas.

The Little Striped Whiptail (*Aspidoscelis inornatus*; Fig. 1) is a bisexual species of lizard (Wright and Lowe 1993) found in the Chihuahuan Desert with its range extending from central Mexico into the southwestern U.S. (i.e., western Texas, New Mexico, and Arizona; Duellman and Zweifel 1962; Wright and Lowe 1993; Stebbins 2003). Previous research on *A. inornatus* reported their hybridization with congeners that are normally parthenogenetic: the New Mexico Whiptail (*A. neomexicanus*); the Chihuahuan Spotted Whiptail (*A. exsanguis*); and the Desert Grassland Whiptail (*A. uniparens*; Wright and Lowe 1993), but nothing is known about *A. inornatus* socially, either within or between species.

We observed both intra- and interspecific interactions while conducting focal observations of *A. inornatus* for a separate study at the Dalquest Desert Research Station in Presidio and Brewster counties, Texas, USA (29.563°N, 103.806°W). The habitat where we observed lizards was Chihuahuan Desert scrub, characterized by open patches of sand interspersed with vegetation, primarily Creosote Bush (*Larrea tridentata*), cactuses (e.g., *Cylindropuntia* spp. and *Echinocereus* spp.), monocot shrubs (e.g., Lechuguilla, *Agave lechuguilla*, Green Sotol, *Dasyllirion leiophyllum*), and Ocotillo (*Fouquieria splendens*; Fig. 2). We observed one aggressive encounter between two male *A. inornatus* on 17 June 2025, at about 1100 (both with a snout-vent length = 56 mm). Initially, we saw one of our marked *A. inornatus* alone beneath some vegetation. Shortly afterward, a second unmarked *A. inornatus* emerged from a dense patch of vegetation and moved toward the shade of a nearby Creosote Bush located near the first male. Both lizards emerged from cover and approached each other. When the two saw

each other, both lizards paused briefly, elevated their postures, and inflated their throats before simultaneously charging. The first lizard initiated physical contact by biting the second on the neck, triggering a vigorous struggle, with both individuals biting and rolling over each other repeatedly. The first lizard eventually bit the snout of the second male (Fig. 3). The second lizard attempted to pull away while the first lizard maintained its grip. The resulting tug-of-war lasted approximately 3 min before the second lizard successfully escaped and fled (> 128 m), passing between observers. The first lizard briefly pursued the second (for about 1 m) before breaking off and returning to the original site of the interaction. Following the aggressive interaction, the first lizard remained in the area for approximately 40 min and revisited the same cluster of vegetation where the aggressive encounter occurred multiple times. The first individual chased another smaller *A. inornatus*, located near the location of the described aggressive encounter, out of the area.



FIGURE 1. Adult male Little Striped Whiptail (*Aspidoscelis inornatus*) on the study site in Texas. (Photographed by Maria Eifler).



FIGURE 2. The habitat where Little Striped Whiptails (*Aspidoscelis inornatus*) occurred at the Dalquest Desert Research Station, Texas, with the station buildings visible in the background. (Photographed by Jasmyn Zimmerman).



FIGURE 3. Aggressive interaction involving two male Little Striped Whiptails (*Aspidoscelis inornatus*) on 17 June 2025. The lizard on the left is described in the text as the first lizard, and the one on the right is the second lizard. (Photographed by Maria Eifler).

We also observed interactions between *A. inornatus* and two other lizard species on our study site. On 11 June 2025 at 1643, we observed an interspecific encounter between *A. inornatus* and a Common Checkered Whiptail (*A. tessellatus*; a parthenogenetic, all-female species). The two individuals were similar in size even though *A. tessellatus* can be larger than *A. inornatus* (Stebbins 2003). We speculate that the *A. tessellatus* was probably a young individual whereas the *A. inornatus* was a large adult. While foraging, the *A. tessellatus* entered the shaded area between two bushes, with the *A. inornatus* simultaneously approaching the bushes from a different direction. Upon seeing the *A. tessellatus*, the *A. inornatus* froze momentarily, while the *A. tessellatus* continued foraging, apparently unaware of the *A. inornatus*. When the *A. tessellatus* came within about 30 cm of the *A. inornatus*, the *A. inornatus* elevated its posture and charged forward. The *A. tessellatus* reacted when the *A.*

inornatus came within a body length, retreating rapidly and fleeing past the observers. The *A. inornatus* pursued briefly before turning back to the original bush, while the *A. tessellatus* continued moving in the opposite direction, resuming foraging activity.

On 22 June 2025 at 1524 h during a brief interspecific encounter, we saw another *A. inornatus* moving toward a larger Greater Earless Lizard (*Cophosaurus texanus*). Like *A. inornatus*, *C. texanus* are insectivorous (Maury 1995) making them potential competitors. Upon observing the *Cophosaurus*, the *A. inornatus* abruptly darted away.

Our observations provide insight into the behavior of *A. inornatus* during social interactions, conspecifically and with other species. We interpret their behavior as indicating the possibility of home ranges that overlap, with some areas potentially defended (i.e., territoriality) against other *A. inornatus*, as well as other lizard species.

In addition, the possibility of predation occurring between lizard species merits investigation. Further study is needed to understand *A. inornatus* social dynamics, both within and between species.

Acknowledgments.—We are grateful to William Cook and Midwestern State University for providing us with access to the Dalquest Desert Research Station. Field work was conducted in accordance with the guidelines for the ethical treatment of animals of the Animal Behavior Society and the Herpetological Animal Care and Use Committee of the American Society of Ichthyologists and Herpetologists under the approval of the Animal Care and Use Committee of the Erell Institute (IACUC proposal no. F2025-01). Our research was funded by the Erell Institute, in part by a grant from the Dunlap Charitable Fund. For help in the field, we thank Robyn Altham, Michelle Fan, Ale Granda, Sarah Heckmann, Janine Klein, Samantha Molino, Alicia Pham, and Kaera Utsumi.

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