ISSN 1026-2296

RUSSIAN JOURNAL of HERPETOLOGY

FOLIUM PUBLISHING COMPANY VOLUME 33 NUMBER 1 JANUARY–MARCH 2026

Darevskia praticola **(Eversmann, 1834)**
Orlovsky Forest, Stavropol Krai, Russia
May 26, 2010.
Photo by Konstantin Yu. Lotiev

Russian Journal of Herpetology

ISSN 1026-2296

RJH is founded in 1993

Founders

- Editorial Council
  (N. B. Ananjeva, L. J. Borkin,
  and N. L. Orlov)
- Folium Publishing Company

Subscriptions

One volume per year, in four issues.

Date of publication of
***Russian Journal of Herpetology*,**
Vol. 33, No. 1 (2026):
April 16, 2026.

All inquiries about subscriptions
should be addressed to

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SHORT COMMUNICATIONS

DOI: 10.30906/1026-2296-2026-33-1-66-70

ON THE DISTRIBUTION OF ROCK LIZARDS OF THE *Darevskia* (SUPERSPECIES *praticola*) IN THE NORTH CAUCASUS

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Submitted August 31, 2025.

Representatives of the *Darevskia* (superspecies *praticola*) have been discovered in the North Caucasus, and these new finds have been analysed. The discovery of *Darevskia pontica* in Svetly village (Stavropol Krai) suggests that its range is expanding. The northern boundary can be defined by a line running from Staroshcherbinovskaya village to the vicinity of Sonino village, then to the vicinity of Otradovka village, then to the vicinity of Storozhi Vtoroye village, then to Vostochny Sosyk village, then to Svetly settlement, then to Stavropol city. Previously, only *D. praticola* was known in the Kislovodsk area, although *D. pontica* was recorded nearby. The new data enable us to identify the area where the ranges of the Pontic lizard and the Meadow lizard overlap in the northern spurs of the Borgustansky Ridge, between the villages of Borgustanskaya and Yasnaya Polyana, in the interfluve of the Bolshoy Essentuchok and Bugunta rivers.

Keywords: *Darevskia* (superspecies *praticola*); distribution; North Caucasus; systematics.

The lizards of the *Darevskia* (superspecies *praticola*) have the most widespread distribution range of any rock lizard in the genus of *Darevskia* Arribas, 1999: from the Balkan Peninsula to the western Caspian region (Sindaco and Jeremčenkova, 2008; Doronin, 2015). This was made possible by their change in lifestyle, which allowed them to move away from the petrophilous life (life on the rocks) and populate such a vast territory. In Ciscaucasia, where the northern boundary of this complex's range and the Caucasian rock lizard genus passes, meadow lizards often inhabit intrazonal biotopes. These are corridors through which species migrate into adjacent natural zones (Ostrovskikh, 2020; Doronin and Smirnova, 2022). The taxonomic status of the species and subspecies of this complex is controversial (Tuniyev et al., 2011; Freitas et al., 2016; Speybroeck et al., 2020).

The published cadaster of the Pontic lizard, *D. pontica* (Lantz et Cyrén, 1918) lists 12 localities in Stavropol Krai (Central Ciscaucasia), including Kochubeevsky, Shpakovsky districts, and Stavropol city (Doronin, 2013). During the studies, this species was discovered on 28 June 2025 in Svetly village in the Novoaleksandrovsky district (45°32′52″ N 41°19′00″ E, 145 m a.s.l.) (Fig. 1). It inhabits vegetable gardens and orchards in this area. Four specimens were caught and deposited at the Zoological Institute of the Russian Academy of Sciences (ZISP 33325 – 33328). In the village and its environs, *D. pontica* occurs sympatrically with *Lacerta agilis exigua* Eichwald, 1831.

According to our data, the Pontic lizard first appeared in the forest belts about 15 years ago, before spreading

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Fig. 1. Group of *Darevskia pontica* in the Svetly village, Novoaleksandrovsky district, Stavropol Krai, June 28, 2025.

deeper into the village. This suggests that the range of meadow lizards in the North Caucasus is expanding. We noted something similar earlier (Doronin, 2015). The new find was made approximately 57 km from the species' nearest known location in the middle reaches of the Kuban River (in the Black Sea basin), where it is continuously distributed. It is reasonable to assume that this lizard was introduced to the steppe zone (feather-grass-fescue-forb steppes without ravine forests) along the numerous forest belts. The forest belts adjacent to Svetly village consist of *Elaeagnus angustifolia*, *Robinia pseudoacacia*, *Gleditsia triacanthos*, and *Quercus robur*, among others. We expect to discover new populations to the north of the new registration point, in the Rasshevatka River valley, and to the south, near the Gorkaya Balka River.

Our findings specify the northern boundary of the species' range, which can be roughly drawn along line running from Staroshcherbinovskaya village to the vicinity of Sonino village, then to the vicinity of Otradovka village, then to the vicinity of Storozhi Vtoroye village, then to Vostochny Sosyk village, then to Svetly settlement, then to Stavropol city.

The habitat of *D. pontica* in the Kuma River basin (part of the Caspian Sea basin) on the western edge of the Central Caucasus has been confirmed in recent years. It has been found on the edges of ravine forests and in post-forest biotopes on the Ryabin-Syrt Plateau, 4 km south of Krasnovostochny village in the Republic of Karachay-Cherkessia (43°54′39.9″ N 42°16′36.3″ E; 1314 m a.s.l.), as well as in the upper reaches of the Bolshaya Darya River (Bukovich Klin tract), west of Borgustanskaya village in the Stavropol Krai (44°01′50.6″ N 42°22′39.7″ E; 1113 m a.s.l.) (Fig. 2) (Lotiev, 2020).

The Bukovich Klin tract is located approximately 27 km northwest of the city of Kislovodsk, where the

Fig. 2. Habitats of *Darevskia pontica* in the upper reaches of the Bolshaya Darya River, Stavropol Krai, August 24, 2016.

Meadow lizard, *D. praticola* (Eversmann, 1834) was first described. It was caught by Eduard A. Eversmann near the Narzan mineral spring in the city center. The holotype was lost (Doronin, 2016) and the description provided by the author does not allow for unambiguous differentiation between *D. praticola* and *D. pontica*. Currently, it seems that representatives of the *Darevskia* (*praticola*) complex do not inhabit the Kislovodsk Basin. Nevertheless, there is every reason to believe that Eversmann described *D. praticola*: the ZISP (7900) houses a specimen caught in Kislovodsk in 1888 by F. V. Ovsyannikov (no exact localization) (Fig. 3). On 18 April 2016, this species was found on the terraced slopes of the Dzhinalsky Ridge above the 'Dolina ocharovaniya' (= Chuguevskaya Gully) near Podkumok village (43°58′13″ N 42°48′33.6″ E, 866 m a.s.l.), less than 10 km northeast of the type locality.

It should be noted that on the GIS map of the predicted area of the species' geographic distribution (created using the Maxent 3.3.3k program) (Doronin, 2015), the above-described habitats of the Pontic lizard in the north and east of the range were not included in those suitable for its habitation (Fig. 4). This once again confirms the assumption that the use of spatial distribution modeling for a species inhabiting intrazonal biotopes and capable of surviving in the presence of suitable micro-

Fig. 3. Topotype of *Darevskia praticola*, caught in 1888 (ZISP 7900). Scale bar is 1 cm.

biotopic conditions currently does not have the necessary sensitivity threshold (Doronin and Smirnova, 2022).

The information obtained on the distribution of these lizards on the Djinalsky and Borgustansky Ridges enables us to determine the location of the zone of sympatry or parapatry of the Pontic and Meadow lizards in the North Caucasus. This is important for making an objective assessment of the taxonomic status of the species in this complex. As previously mentioned, the issue of the overlapping ranges of *D. pontica* and *D. praticola* remains unresolved; their joint discovery on the Stavropol Upland (Tertyshnikov, 2002) is most likely due to errors in labelling and mapping the species.

New data enable us to determine the contact zone between the ranges of the Pontic and Meadow lizards: it is situated in the northern spurs of the Borgustansky Ridge, between the villages of Borgustanskaya and Yasnaya Polyana, in the interfluve of the Bolshoy Essentuchok and Bugunta rivers. As previously mentioned, the Pontic lizard is found southwest of Borgustanskaya, while the Meadow lizard inhabits the Bolshoy Essentuchok State Nature Reserve (Zakaznik), located 25 km east (44°1′12″ N 42°42′36″ E, 842 m a.s.l.; one specimen was captured here on 6 July 2022, ZISP 32121). However, specimens in these populations exhibit asymmetry of the chin shields (the number of contacting pairs of chin shields is one of the main diagnostic features for the taxa of the complex), which may indicate hybridisation. It is important to note that this feature was also observed by us in populations on the border of the range.

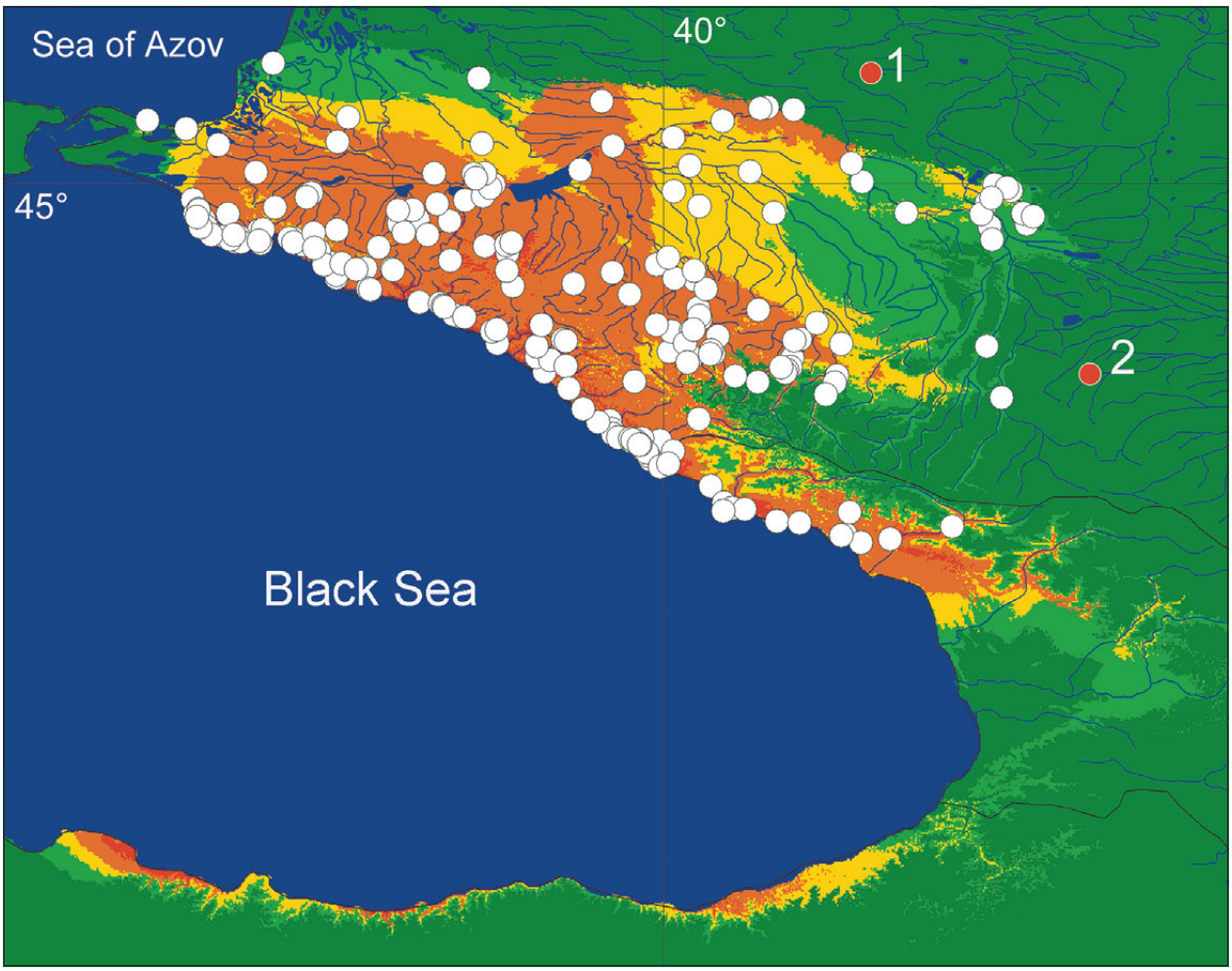

Fig. 4. Map of the predicted area of geographic distribution of *Darevskia pontica* in the Caucasus and adjacent territory, created using Maxent 3.3.3k software (Doronin, 2015, with additions). Areas with red (high; 100 – 74%), yellow (medium; 74 – 56%), and light green (low probability; 56 – 37%) fill are supposedly suitable territories; white circles are previously known locations of finds. Locations of finds in the Svetly village (1) and in the upper reaches of the Bolshaya Darya River (2) are marked with red circles.

The experimental protocols were approved by the Bioethics Commission of the Zoological Institute of the Russian Academy of Sciences (conclusion No. 1-3/15-06-2021).

Acknowledgments. This study was supported by the Russian Science Foundation (grant number 25-24-00013).

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