

ON SOME SCORPIONS COLLECTED IN NORTH-  
WESTERN ARGENTINE AND BOLIVIA BY  
BARON ERLAND NORDENSKIÖLD

DETERMINED BY

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Baron ERLAND NORDENSKIÖLD, having just returned from an expedition to the interior of South America, has handed over to me for determination the Scorpions collected by himself and other members of the expedition. There are no new species in this collection but as the districts (Northwestern Argentine and the Bolivian Chaco) investigated by this expedition are only little and incompletely known in zoological respect I have thought it suitable to prepare the following short notes.

The collection comprises four species.

Fam. **Buthidæ.**

Subfam. **Centrurinae.**

*Tityus trivittatus* KRÆPELIN var. *confluens* BORELLI.

Several specimens collected in the Bolivian Chaco (at Tarendanda and other places) seemed to me to belong to this species, and more especially to the variety named *confluens* by BORELLI<sup>1</sup>. KRÆPELIN has also distinguished the same variety

<sup>1</sup> Boll. Mus. Zool. Anat. Comp. Torino Vol. XIV, N:o 336, 1899.

with the following words. »Andererseits finden sich auch Exemplare, deren Cephalothorax und Abdomen bis auf das letzte Segment beraucht ist (wohl als Varietät zu trennen)»<sup>2</sup>. None of the specimens now on hand showed namely the three longitudinal stripes on the back of the trunk. The genus *Tityus* includes, however, so many uniform and only with difficulty discernible species that I wanted to make sure by asking the author of this species about his opinion. I had the more reason to do so, as I had no suitable material for comparison. Director KRÆPELIN most kindly answered at once: »Der *Tityus* entspricht in jeder Hinsicht meinem *T. trivittatus* wie Sie bereits vermuteten», and he added that the dark colouration of the back was most probably to be regarded as a juvenile characteristic. The largest specimen collected by Baron NORDENSKIÖLD has a total length of about 55 mm, but it is dark coloured all over the back with the exception of the last segment. Director KRÆPELIN says, however, in his letter that this one is »erheblich kleiner» than the striped specimens of the Hamburg Museum. Dr. BORELLI has found a specimens of his variety *confluens* measuring 60 mm. in length. This one was also found in Bolivia. But the same author has striped specimens from Paraguay and Argentine only measuring 55 mm. in an adult stage. The length of the species is in »Tierreich» (l. c.) indicated to be »bis 50 mm.». The small young in Baron NORDENSKIÖLD's collection have an identical colouration as the large ones although the legs and tail are of a paler yellow. Comprising all these facts I think I may be justified in expressing my opinion in the following way. In Bolivia is to be found a variety of *Tityus trivittatus* KRÆPELIN, named by BORELLI *confluens*, which even in the adult stage has retained a juvenile characteristic viz. a dark colouration of the back with the exception of the last segment.

The striped type-specimens were from Paraguay.

<sup>2</sup> Tierreich: 8. Lief. Scorpiones p. 83. Berlin 1899.

Fam. **Bothriuridæ.***Brachio sternus Weijenberghi* (THOR.) forma *intermedia* n.

Two specimens from Ojo de agua in the province de Salta, Northwestern Argentine, are interesting because they seem to be intermediate between *B. Weijenberghi* and *B. Ehrenbergi* such as these are defined by KRÆPELIN (Tierreich l. c.). They resemble namely the latter species therein that a granulated median keel can be distinguished on the lower surface of the fifth caudal segment, and the proximal granules of the lateral series on the movable finger have a tendency to move in among the main series. On the other hand, however, there are only three trichobothria on the lower surface of the tibia and 5—6 such ones on the lower side of the hand as in *B. Weijenberghi*. The first caudal segment is as broad as long, the second conspicuously longer than broad. From this it becomes probable that future investigations shall show that the western *B. Ehrenbergi* is connected with the eastern, *B. Weijenberghi* by a series of intermediate forms and these specimens having been collected rather far west constitute some of the intergraduating links.

*Bothriurus Dorbignyi* (GUÉR.).

This species is represented by several specimens from different localities viz. 2 sp. from Tatarenda, Bolivian Chaco, 1 young sp. from Crevaux at Pilcomayo, Bolivian Chaco, 1 young sp. from Arroyo del medio, Prov. de Jujuy, Northwestern Argentine, 1 sp. from Aqua Blanca in the same province and 2 large specimens from Sta Clara in the same province. The two last ones are remarkable for their great size as they have attained a length of 106 mm. This is not less than 20 mm. more than the maximum length recorded by KRÆPELIN (l. c.). BORELLI did not obtain any larger than 75 mm.

*Bothriurus vittatus* (GUÉR.).

Two specimens from Tatarenda in the Bolivian Chaco. BORELLI has also found it in Bolivia and it is also known as well from Argentine and Brazil, as from Chili and Peru.

All these four species are typically South American like their congeners, and thus certainly indigenous.

## SÄLLSYNTARE COLEOPTERA.

## III. Från Stockholmstrakten.

*Helophorus strigifrons* THOMS. Sthlm (Skanstull) maj 1901.

*Cercyon littoralis* GYLL. Sthlm (Skanstull) vid en bäck aug. 1900.

*Philonthus chalcus* STEPH. Sthlm (Skanstull, Djurgården m. fl. st.) ej sällsynt i utsipprande saft vårtiden.

*Quedius scintillans* GRAV. Sthlm (Djurgården) i rutten svamp okt. 1901.

*Sunius pulchellus* HEER. Sthlm (Rackarebergen) juni 1901, april 1902. Förut funnen i Hall, vid Fjärås af I. B. ERICSON samt vid Kalmar af E. L. HAGLUND.

*Oligota subtilis* KRAATZ. Sthlm (Rackarebergen, Skanstull) under stenar april 1902.

*Baryodma verna* SAY. Sthlm (Skanstull) juni 1901.

*Leptusa fumida* ER. Sthlm (Djurgården) under bark 24 maj 1902.

*Gnypeta carbonaria* MANNH. Sthlm (Skanstull) vid en bäck maj 1901.

*Homalota occulta* ER. Sthlm (Skanstull) maj 1901.

*Tachyporus solutus* ER. Sthlm (Skanstull) våren 1901.

*Phlaeostiba plana* PAYK. Sthlm (Skanstull) i björksaft 27 maj 1902.

*Bolitobius trivotatus* ER. Sthlm (Skanstull) i björksaft 18 maj 1902.

*Agathidium badium* ER. Sthlm (Skanstull) under almbark våren 1901.

*Scaphisoma boleti* PANZ. Sthlm (Skanstull) på trädsvamp (*Boletus*) juni 1901.

*Epuræa longula* ER. Sthlm (Skanstull) våren 1901.

*Cantharis pellucida* FABR. Sthlm (Skanstull) 1901.

*Hypophlæxus fasciatus* FABR. Sthlm (Djurgården, Albano) under ekbark maj, aug. 1902.

*Ceuthorrhynchus chalybeus* GERM. Sthlm (Skanstull) 1900.

*Longitarsus tabidus* FABR. Sthlm (Skanstull) 1900.

*Longitarsus pratensis* PANZ. Sthlm (Skanstull) 1900.

Stockholm, aug. 1902.

Eric Mjöberg.