CHELODESMID STUDIES I

THE STATUS OF THE GENERIC NAME HOFFMANODESMUS SCHUBART (DIPLOPODA: POLYDESMIDA) 1

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The milliped genus Camptomorpha was proposed by F. Silvestri in 1897, to receive two new species from Ecuador. The original drawings were small and uninformative, but additional species were later referred to Camptomorpha by Count Attems, who disliked proposing new generic names so long as any others, no matter how dubious, were available to serve as catch-alls. In his 1938 treatment, Attems converted Camptomorpha into a real “assemblage of incongruities” most of which were not even congeneric among themselves, much less with the still uncertain type species, C. dorsalis Silvestri.

Being dissatisfied with the systematic dissimilarities and zoogeographic improbabilities inherent in the Attemsian concept of Camptomorpha, I looked into the matter some years ago, and the results were set forth in a short paper published in 1953 (see appended Note 1). Here Camptomorpha was restricted to a small group of similar species of the northern Andean region, which had independently acquired the younger generic names Phantasmodesmus Verhoeff, 1927, and Eucampesmus Chamberlin, 1941. The status of the various species excluded from Camptomorpha was left unsettled, as I then had no familiarity with the chelodesmoids of southern Brasil.

The allocation of these Attemsian Camptomorpha species was undertaken by the late Dr. Otto Schubart in an article published just before his death in 1962. Here the species bohlsi Attems and volutatus, cognatus, and iheringi Brölemann were placed in a new genus Camptomorphoides (type: Leptodesmus bohlsi Attems), and the disjunct form ornithopus Brölemann designated the type of a second new genus called Hoffmannodesmus.

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2. Radford College, Radford, Virginia, U.S.A.
From the standpoint of comparative morphology, these groupings of species are of course quite distinctive and homogeneous. Nomenclatorially, the arrangement is marred by a set of circumstances through which, by no fault of his own, Dr. Schubart was led into proposing an invalid generic name. I believe that the recurrent difficulties surrounding this group of millipedes can now be laid to rest permanently, with the following account.

The type species of *Hoffmanodesmus* (*Leptodesmus ornithopus* Brölemann, 1902) is a millipede with a very distinctive gonopod structure (see figure). The primary element of the telopodite is a simple, slender, unbranched, sinously-curved process carrying the seminal groove; actually the greater part of the telopodite is the rather massive, distally biramous prefemoral process. Two other names have been based upon Brasilian millipedes which are apparently conspecific with *ornithopus*, these are *Camptomorpha phoenicopterus* Schubart, 1943, and *Iguazus leius* Chamberlin, 1952. The original description of the former name admits the great similarity of that species with *ornithopus*, but the description of *leius* does not compare it with any other genus or species, thus leaving the burden of proof up to subsequent workers.

This very brief and inadequate description is the starting point for considerable difficulty. To begin with, the gonopod drawing erroneously shows the subterminal branch of the prefemoral process to be the solenomerite. Moreover, on Plate III of Chamberlin’s 1952 paper, many of the figure numbers do not correspond to the right drawings. Dr. Schubart recognized this discrepancy and published a footnote correction but unfortunately his emendations are also badly incorrect. Thus he was led to think that Fig. 17, a sketch of the gonopod of the *ornithopus* type, represented the species named *Leptodesmus therezopolis* by Chamberlin, when in actuality it is the gonopod of the species *Iguazus leius*! I could establish this relationship after a close study of the textual descriptions and more recently could make a final confirmation by the examination of a male paratype of *leius* in Dr. Chamberlin’s personal collection.

If Dr. Schubart was correct in considering the three names mentioned above as all congeneric and conspecific, as I think he was, it then follows that *Iguazus* must be taken as the correct generic name, having 10 years priority over *Hoffmanodesmus*. It is no source of pleasure for me to abolish my one generic patronym, particularly in light of the needless confusion which led to its proposal, but I do not think anyone else could sink *Hoffmanodesmus* with as much authority. The nomenclatorial outline is as follows:

**Genus Iguazus Chamberlin**


*Iguazus* Chamberlin, 1952: 568 (type species: *Iguazus leitus* Chamberlin, by original designation and monotypy).
**Hoffmanodesmus** Schubart, 1962: 255 (type species: *Leptodesmus ornithopus* Brölemann, by original designation). NEW SYNONYMY!

The gonopod characteristic of this genus are well shown in the accompanying figure, drawn from a male paratype of *I. leius*. The simplification of the acropodite as opposed to the elaboration of the prefemoral process, is particularly to be noted. Schubart named a second species, *H. roseofasciatus*, which appears to be congeneric with *ornithopus*.

![Diagram](image)

The nomenclatorial changes of the types species are given below:

**Iguazus ornithopus** (Brölemann), new combination

Figure

*Leptodesmus ornithopus* Brölemann, 1902: 87.
Camptomorpha phoenicopterus Schubart, 1943: 147.
Iguazus leius Chamberlin, 1952: 568. NEW SYNONYMY!

The species is abundant and widespread in southern São Paulo. Schubart (1955) reported material from the municipalities of Cerqueira Cesar, São Manoel, Leme, Pirassununga, Brotas, Novo Horizonte, Avanhandava, and Andradina. The type of *I. leius* was collected at the Iguacu Falls, so the species presumably occurs also entirely across western Paraná.

In mistakenly referring *Leptodesmus therezopolis* to the synonymy of *ornithopus*, Schubart remarked that “A localidade Teresópolis, 1.200 m, RJ, aparentemente isolada da área conhecida desta espécie, perdeu sua peculiaridade ultimante, sendo assinalado até Espírito Santo num vasto material diplopodológico atualmente em estudo.” This geographical improbability is herewith explained as non-existent.

**Supplementary Notes**

1. It is worthy of mention in passing that although my original evaluation of the characters of *Camptomorpha* was made entirely from literature information, the inferences were correctly deduced. In 1960, I was able to examine specimens of *C. dorsalis* in the Museum d'Histoire Naturelle, Geneve, which had been compared directly with Silvestri's type specimen by Dr. J. Carl, and could therefore confirm the gonopod characters suggested by the small original drawings. Illustrations made from the Geneve specimens will be published in connection with a future report.

2. For the benefit of other workers who may be led astray by the confused numbering on Plate III of Dr. Chamberlin's 1952 paper American polydesmoid millipeds, I give here a corrected concordance:

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<th>Figure N.°</th>
<th>Original corresponding name</th>
<th>Correct name</th>
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<td>14</td>
<td>Chondrodesmus araguanus</td>
<td>Chondrodesmus araguanus</td>
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<td>15</td>
<td><em>Iguazus leius</em></td>
<td>Euphollus dybasi</td>
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<td>16</td>
<td><em>Leptodesmus piraputangus</em></td>
<td>Euphollus dybasi</td>
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<td>17</td>
<td><em>Leptodesmus therezopolis</em></td>
<td><em>Iguazus leius</em></td>
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<td>18</td>
<td><em>Leptodesmus therezopolis</em></td>
<td><em>Leptodesmus piraputangus</em></td>
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REFERENCES


