

SOME NOMENCLATRURAL CHANGES FOR ACARI (IXODIDA AND ORIBATIDA)

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ABSTRACT: The paper gives remarks on the nomenclatural validity of the subgenus name *Segalia* Dias, 1968 and the genus name *Hammeriella* Paschoal, 1989. In addition to this, some junior homonyms were detected among the oribatid mite genus group names and the following replacement names are proposed: *Fberninia* nom. nov. for *Berniniella* Özdikmen, 2008; *Zetorchella* Berlese, 1916 for *Chaunoproctus* Pearce, 1906 and *Salvus* nom. nov. for *Pterobates* Balogh & Mahunka, 1977. Accordingly, new combinations are herein proposed for the species currently included in these genus group names. Two family group names *Zetorchellidae* nom. nov. and *Salvidae* nom. nov. are also proposed for *Chaunoproctidae* Balogh, 1961 and *Pterobatidae* Balogh & Mahunka, 1977 respectively.

KEY WORDS: nomenclatural changes, homonymy, replacement names, Acari, Ixodida, Oribatida.

Order IXODIDA Family IXODIDAE Genus *HAEMAPHYSALIS* Koch, 1844 Subgenus *SEGALIA* Dias, 1968

Fonsecaia Dias, 1963. Mems Estud. Mus. zool. Univ. Coimbra No. 285: 28. (Acari: Parasitiformes: Ixodida: Ixodoidea: Ixodidae: Haemaphysalinae: *Haemaphysalis*). Preoccupied by *Fonsecaia* Pinto, 1918. Brazil-Medico, 32, 233; 1922, Mem. Inst. Oswaldo Cruz, 15, 86. (Protozoa: Apicomplexa: Conoidasida: Gregarinasina: Eugregarinorida: Septatorina: Stenophoricae: Stenophoridae).

Remarks on the validity of the subgenus name *Segalia* Dias, 1968: Firstly, Özdikmen (2008) stated that the genus group name *Fonsecaia* Dias, 1963 (Acari) was a junior homonym of the genus *Fonsecaia* Pinto, 1918 (Protozoa). So he proposed a new replacement name *Diasjatia* Özdikmen, 2008 for the subgenus name *Fonsecaia* Dias, 1963. Unfortunately, *Diasjatia* Özdikmen, 2008 is an unnecessary replacement name. Since *Fonsecaia* Dias, 1963 has at least two synonyms as *Segalia* Dias, 1968 and *Paraphysalis* Hoogstraal, 1974. So I propose that the senior synonym name *Segalia* Dias, 1968 must be used as a valid name and a replacement name for the subgenus name *Fonsecaia* Dias, 1963 under ICZN (1999).

Summary of nomenclatural changes:

Segalia Dias, 1968

= *Fonsecaia* Dias, 1963 (non Pinto, 1918) [preoccupied].

= *Paraphysalis* Hoogstraal, 1974 [synonym]

= *Diasjatia* Özdikmen, 2008 [unnecessary replacement name for *Fonsecaia* Dias, 1963]

Haemaphysalis (Segalia) montgomeryi (Nuttall, 1912)
= *Haemaphysalis (Fonsecaia) montgomeryi* (Nuttall, 1912).

Order ORIBATIDA
Family HAMMERIELLIDAE
Genus HAMMERIELLA Paschoal, 1989

Hammeriella Paschoal, 1989. Rev. Bras. Zool. 6 (1): 18. (Acari: Acariformes: Oribatida: Brachyphylina: Plateremaeoidea: Hammeriellidae).

Paschoalia Subias, 2004 [a replacement name for *Hammeriella* Paschoal, 1989].

Remarks on the validity of the genus name *Hammeriella* Paschoal, 1989: Subias (2004b) proposed a replacement name *Paschoalia* Subias, 2004 for *Hammeriella* Paschoal, 1989. Since he wrongly accepted *Hammeriella* Paschoal, 1989 was a junior homonym of *Hammerella* Balogh, 1983. However, these generic names are not homonyms according to article 56.2 of the Code (ICZN, 1999). So *Paschoalia* Subias, 2004 is an unnecessary replacement name and invalid. Finally, *Hammeriella* Paschoal, 1989 must be used as a valid name under the Code.

Summary of nomenclatural changes:

Hammeriella Paschoal, 1989
= *Paschoalia* Subia, 2004 [wrongly proposed unnecessary replacement name for *Hammeriella* Paschoal, 1989]

Family ORIBATELLIDAE
Genus FBERNINIA nom. nov.

Berniniella Özdikmen, 2008. Munis Entomology & Zoology 3 (1): 226. (Acari: Acariformes: Oribatida: Oribatelloidea: Oribatellidae). Preoccupied by *Berniniella* Balogh, 1983. Acta zool. hung. 29 (1-3): 24. (Acari: Acariformes: Oribatida: Brachyphylina: Oppioidea: Oppiidae).

Remarks: Özdikmen (2008) proposed a new replacement name *Berniniella* Özdikmen, 2008 for the genus name *Cavernella* Bernini, 1975. Unfortunately, the generic name was already preoccupied by Balogh (1983), who had described the genus *Berniniella* with the type species *Oppia aeoliana* Bernini, 1973 in Acari. Thus, the genus name *Berniniella* Özdikmen, 2008 is a junior homonym of the generic name *Berniniella* Balogh, 1983. So I propose a new replacement name *Fberninia* nom. nov. for *Berniniella* Özdikmen, 2008.

Etymology: The genus name "*Fberninia*" is dedicated to F. Bernini.

Summary of nomenclatural changes:

Fberninia nom. nov.
= *Cavernella* Bernini, 1975 (non Morozova, 1974).

= *Berniniella* Özdikmen, 2008

Fberniniella helenae (Bernini, 1975) **comb. nov.**

= *Cavernella helenae* Bernini, 1975

= *Berniniella helenae* (Bernini, 1975)

Family ZETORCHELLIDAE nom. nov.
Genus ZETORCHELLA Berlese, 1916

Chaunoproctus Pearce, 1906. J. R. micr. Soc., 1906, 271. (Acari: Acariformes: Oribatida: Poronota: Oripodoidea: Zetorchellidae). Preoccupied by *Chaunoproctus* Bonaparte & Schlegel 1850. Mon. Loxiens, 31; 1850, Consp. Av., 1 526. (Aves: Passeriformes: Fringillidae).

Remarks on nomenclatural change: The monotypic fossil genus *Chaunoproctus* was described by Bonaparte & Schlegel (1850) with the type species *Chaunoproctus ferreorostris* (Vigors, 1829) in the family Fringillidae (Aves: Passeriformes). It is currently a valid generic name in Aves.

The oribatid mite genus *Chaunoproctus* was proposed by Pearce (1906) with the type species *Chaunoproctus cancellatus* Pearce, 1906 from India in Acari (Trave, 1976; Mahunka, 1992). The name is currently used as a valid generic name in Oribatida as the type genus of the family Chaunoproctidae Balogh, 1961. Subias (2004) used Caloppiidae Balogh, 1960 for this group as family name. Type genus of Caloppiidae Balogh, 1960 is *Caloppia* Balogh, 1958 (type sp. *Caloppia basilewskyi* Balogh 1958). On the other side, *Caloppia* Balogh, 1958 is a junior subjective synonym of the genus *Chaunoproctus* Pearce, 1906 now. So I think that Subias (2004a) preferred Caloppiidae instead of Chaunoproctidae as family name due to priority.

However, the name *Chaunoproctus* Pearce, 1906 is invalid under the rule of homonymy, being a junior homonym of *Chaunoproctus* Bonaparte & Schlegel, 1850. Under the International Code of Zoological Nomenclature (ICZN 1999) it must be rejected and replaced. *Chaunoproctus* Pearce, 1906 has three junior subjective synonyms as *Zetorchella* Berlese, 1916, *Caloppia* Balogh, 1958 and *Pabulozetes* Tseng, 1912. So, in accordance with article 60 of the International Code of Zoological Nomenclature, fourth edition (1999), I propose to substitute the junior homonym *Chaunoproctus* Pearce, 1906 for the senior synonym *Zetorchella* Berlese, 1916.

As a result of this, *Chaunoproctus* Pearce, 1906 is replaced with the name *Zetorchella* Berlese, 1916.

In addition to this, I herein propose the replacement name Zetorchellidae new name for the family name Chaunoproctidae because its type genus *Chaunoproctus* Pearce, 1906 is invalid and the type genus of a family-group name must be valid.

SYSTEMATICS

Order Oribatida

Family **Zetorchellidae** new name

= Chaunoproctidae Balogh, 1961

= Caloppiidae Balogh, 1960

Type genus.—*Zetorchella* Berlese, 1916.**Remarks.**—The name *Chaunoproctus* has been used in Oribatida as a stem for a family-group name, and should be automatically replaced with the new name. According to Subias (2004), the family Zetorchellidae includes 22 species of 4 genera. These genera are *Zetorchella* Berlese, 1916 (16 species), *Stelechobates* Grandjean, 1965 (2 species); *Brassiella* Balogh, 1970 (1 species), *Chaunoproctellus* Mahunka, 1992 (3 species).Genus **Zetorchella** Berlese, 1916*Chaunoproctus* Pearce, 1906, junior homonym of *Chaunoproctus* Bonaparte & Schlegel, 1850.**Type species.**—*Zetorchella pedestris* Berlese, 1916 by original designation.**Species account and distribution:** 16 species; known from Pantropical area.The following new combinations are proposed and the species is removed from *Chaunoproctus*:**Zetorchella Berlese, 1916**= *Chaunoproctus* Pearce, 1906 [preoccupied by *Chaunoproctus* Bonaparte & Schlegel, 1850]= *Caloppia* Balogh, 1958 [junior subjective synonym]= *Pabulozetes* Tseng, 1982 [junior subjective synonym]*Zetorchella abalai* (Bhaduri, Bhattacharya and Chakrabarti, 1975) **comb. nov.**= *Chaunoproctus abalai* Bhaduri, Bhattacharya and Chakrabarti, 1975

DIST.: N India.

Zetorchella asperulus (Pearce, 1906) **comb. nov.**= *Chaunoproctus asperulus* Pearce, 1906

DIST.: India (Sikkim).

Zetorchella basilewskyi (Balogh, 1958) **comb. nov.**= *Caloppia basilewskyi* Balogh, 1958= *Chaunoproctus basilewskyi* (Balogh, 1958)

DIST.: Congo.

Zetorchella cancellatus (Pearce, 1906) **comb. nov.**= *Chaunoproctus cancellatus* Pearce, 1906

DIST.: India (Sikkim).

Zetorchella deleoni (Higgins, 1966) **comb. nov.**= *Chaunoproctus deleoni* Higgins, 1966

DIST.: British Guiana [Guyana].

Zetorchella latior (Berlese, 1913) **comb. nov.**= *Oppia latior* Berlese, 1913= *Chaunoproctus latior* (Berlese, 1913)= *Chaunoproctus clavisetosus* Bhaduri, Bhattacharya and Chakrabarti, 1975

DIST.: Oriental.

Zetorchella longipilosus (Mahunka, 1974) **comb. nov.**= *Caloppia longipilosus* Mahunka, 1974= *Chaunoproctus longipilosus* (Mahunka, 1974)

DIST.: Zimbabwe.

Zetorchella longisetosus (Dhali and Bhaduri, 1981) **comb. nov.**= *Chaunoproctus longisetosus* Dhali and Bhaduri, 1981

DIST. : India (Sikkim).

Zetorchella minor (Balogh, 1958) **comb. nov.**= *Caloppia minor* Balogh, 1958= *Chaunoproctus minor* (Balogh, 1958)

DIST. : Angola to India.

Zetorchella orbiculatus (Wen and Zhao, 1994) **comb. nov.**= *Chaunoproctus orbiculatus* Wen and Zhao, 1994

DIST. : China.

Zetorchella pedestris Berlese, 1916= *Chaunoproctus pedestris* (Berlese, 1916)= *Caloppia papillata* Balogh, 1958= *Chaunoproctus crinitus* Karppinen, 1966

DIST.: Ethiopia.

Zetorchella plumosus (Tseng, 1982) **comb. nov.**= *Pabulozetes plumosus* Tseng, 1982= *Chaunoproctus plumosus* (Tseng, 1982)

DIST.: Taiwan [Formosa].

Zetorchella reticulatus (Willmann, 1933) **comb. nov.**= *Lucoppia reticulatus* Willmann, 1933= *Chaunoproctus reticulatus* (Willmann, 1933)

DISTRIBUCIÓN: Sumatra.

Zetorchella sejugatus (Ramani and Haq, 1997) **comb. nov.**= *Caloppia sejugatus* Ramani and Haq, 1997= *Chaunoproctus sejugatus* (Ramani and Haq, 1997)

DIST.: India (Kerala).

Zetorchella sottoetgarciai (Corpuz-Raros, 1979) **comb. nov.**= *Caloppia sottoetgarciai* Corpuz-Raros, 1979= *Chaunoproctus sottoetgarciai* (Corpuz-Raros, 1979)

DIST.: Philippines.

Zetorchella vargai (Balogh, 1959) **comb. nov.**= *Caloppia vargai* Balogh, 1959= *Chaunoproctus vargai* (Balogh, 1959)

DIST. : Tanzania.

Family SALVIDAE nom. nov.
Genus SALVUS nom. nov.

Pterobates Balogh & Mahunka, 1977. Acta zool.hung. 23: 247. (Acari: Acariformes: Oribatida: Brachypylina: Cepheoidea: Pterobatidae). Preoccupied by *Pterobates* Bezzi, 1921. Bombyl. Ethiopian Reg., 273. (Insecta: Diptera: Bombyliidae).

Remarks on nomenclatural change: The monotypic fly genus *Pterobates* was described by Bezzi (1921) with the type species *Anthrax pennipes* Wiedemann, 1821 in the family Bombyliidae (Diptera). It is currently a valid generic name in Diptera (e.g. Evenhuis, 2007).

The monotypic oribatid mite genus *Pterobates* was proposed by Balogh & Mahunka (1977) with the type species *Pterobates incertus* Balogh & Mahunka, 1977 from Brazil in Acari. The name is currently used as a valid generic name in Oribatida as the type genus of the family Pterobatidae Balogh & Mahunka, 1977.

However, the name *Pterobates* Balogh & Mahunka, 1977 is invalid under the rule of homonymy, being a junior homonym of *Pterobates* Bezzi, 1921. Under the International Code of Zoological Nomenclature (ICZN 1999) it must be rejected and replaced. *Pterobates* Balogh & Mahunka, 1977 has no any synonym name now. So, in accordance with article 60 of the International Code of Zoological Nomenclature, fourth edition (1999), I propose to substitute the junior homonym *Pterobates* Balogh & Mahunka, 1977 for the nomen novum *Salvus*.

As a result of this, *Pterobates* Balogh & Mahunka, 1977 is replaced with the name *Salvus* nom. nov.

In addition to this, I herein propose the replacement name Salvidae new name for the family name Pterobatidae because its type genus *Pterobates* Balogh & Mahunka, 1977 is invalid and the type genus of a family-group name must be valid.

SYSTEMATICS

Order Oribatida

Family **Salvidae** new name

= Pterobatidae Balogh & Mahunka, 1977

Type genus.—*Salvus* nom. nov.

Remarks.—The name *Pterobates* has been used in Oribatida as a stem for a family-group name, and should be automatically replaced with the new name. According to Subias (2004), the family Salvidae nom. nov. includes only 1 species of 1 genera.

Genus **Salvus** nom. nov.

Pterobates Balogh & Mahunka, 1977, junior homonym of *Pterobates* Bezzi, 1921.

Type species.— *Pterobates incertus* Balogh & Mahunka, 1977 by original designation.

Etymology.—from the Latin word “salvus” meaning alive, good, original in English.

Species account and distribution: 1 species as the type species; known from Neotropical region.

The following new combination is proposed and the species is removed from *Pterobates*:

***Salvus* nom. nov.**

= *Pterobates* Balogh & Mahunka, 1977 (non Bezzi, 1921)

Salvus incertus (Balogh & Mahunka, 1977) **comb. nov.**

= *Pterobates incertus* Balogh & Mahunka, 1977

DIST.: Brazil.

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