

Case 3268***Conidophrys* Chatton & Lwoff, 1934 (Ciliophora, Pilisuctorida):
proposed conservation**

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Abstract. The purpose of this application, in relation to Article 23.9.3 of the Code, is the conservation of the widely used name *Conidophrys* Chatton & Lwoff, 1934 for a genus of pilisuctorid ciliates (family CONIDOPHRYIDAE Kirby, 1941) parasitic on marine crustaceans. The older name *Mycodinium* Averinzeff, 1916 is a probable subjective synonym, but it has never been used and its suppression is proposed.

Keywords. Nomenclature; taxonomy; Ciliophora; Pilisuctorida; CONIDOPHRYIDAE; *Conidophrys*; *Mycodinium*; *Conidophrys pilisuctor*; parasitic ciliates.

1. Averinzeff (1916, p. 183) described, illustrated and named *Mycodinium fucatum* n.g., n.sp., a protist parasitic on a marine amphipod belonging to the genus *Caprella* Lamarck, 1801; his work was entirely based on fixed material received from Trieste, Italy. Averinzeff was unsure about the taxonomic position of *M. fucatum* but considered that it was probably a dinoflagellate. His generic name remained unused until it was cited by Jankowski in 1989 (see para. 5 below); his specific name has never been used.

2. Chatton & Lwoff (1934, p. 697) described and illustrated the new genus and species *Conidophrys pilisuctor*, parasitic on the amphipod *Corophium acherusicum* Costa, 1857 at Sète, France. Chatton & Lwoff (p. 699) diagnosed a new family 'Pilisuctoridae' to contain *C. pilisuctor* as the only known species.

3. Kirby (1941) spelled Chatton & Lwoff's generic name as *Conidiophrys*, and pointed out that under the Code their family name 'Pilisuctoridae' was unavailable because it was not based on the name of a type genus. This remains true under Article 29.1 of the current Code (however, ordinal names such as Pilisuctorida and the vernacular term 'pilisuctorid' are not invalidated by the Code). Kirby (1941, p. 954) proposed the family name Conidiophryidae. Guilcher (1951) corrected Kirby's spellings but under Article 35.4.1, the valid family name is CONIDOPHRYIDAE Kirby, 1941 (and not Guilcher, 1951).

4. The literature on species of *Conidophrys* is very extensive (see for example Chatton & Lwoff, 1934, 1935, 1936; Guilcher, 1951; Raabe, 1964; Fenchel, 1965; Jankowski, 1966, 1972; Jones & Khan, 1970; Puytorac, 1994; Morado & Small, 1995; Dovgal, 1998; Boshko & Dovgal, 2000).

5. Jankowski (1989, p. 86) suggested in a brief purely nomenclatural note that *Conidophrys* Chatton & Lwoff, 1934 was a junior synonym of *Mycodinium* Averinzeff, 1916 and should therefore be replaced. He also stated that

CONIDOPHRYIDAE should be replaced by the new family name MYCODINIIDAE, but under Article 40.1 this would not be so even if *Mycodinium* were to be accepted as the valid senior subjective synonym of *Conidophrys*.

6. As mentioned above, the names *Conidophrys* and CONIDOPHRYIDAE have been in continuous and wide use for many years, but, apart from Jankowski's note, *Mycodinium* has not been used in any work since its original publication in 1916; to now replace *Conidophrys* by *Mycodinium* (in the family CONIDOPHRYIDAE) would cause confusion.

7. The International Commission on Zoological Nomenclature is accordingly asked:

- (1) to use its plenary power to suppress the name *Mycodinium* Averinzeff, 1916 for the purposes of the Principle of Priority but not for those of the Principle of Homonymy;
- (2) to place on the Official List of Generic Names in Zoology the name *Conidophrys* Chatton & Lwoff, 1934 (gender: feminine), type species by original designation *Conidophrys pilisuctor* Chatton & Lwoff, 1934;
- (3) to place on the Official List of Specific Names in Zoology the name *pilisuctor* Chatton & Lwoff, 1934, as published in the binomen *Conidophrys pilisuctor* (specific name of the type species of *Conidophrys* Chatton & Lwoff, 1934);
- (4) to place on the Official List of Family-Group Names in Zoology the name CONIDOPHRYIDAE Kirby, 1941, type genus *Conidophrys* Chatton & Lwoff, 1934;
- (5) to place on the Official Index of Rejected and Invalid Generic Names in Zoology the name *Mycodinium* Averinzeff, 1916, as suppressed in (1) above.

References

- Averinzeff, S.V. 1916. On a new organism of the type of Protozoa. *Revue Zoologique Russe*, 1(6/7): 180–185.
- Boshko, E.G. & Dovgal, I.V. 2000. The first record of pilisuctorid ciliates (Ciliophora, Pilisuctorida) in the Black Sea. *Vestnik Zoologii*, 34(6): 112.
- Chatton, E. & Lwoff, A. 1934. Sur un infusoire parasite des poils sécréteurs des Crustacés Edriophthalmes et la famille nouvelle des Pilisuctoridae. *Comptes Rendus des Séances de l'Académie des Sciences (Paris)*, 199(16): 696–699.
- Chatton, E. & Lwoff, A. 1935. Les cilies apostomes. Morphologie, cytologie, éthologie, évolution, systématique. I. Aperçu historique et générale. Étude monographique des genres et des espèces. *Archives de Zoologie Expérimentale et Générale*, 77: 1–453.
- Chatton, E. & Lwoff, A. 1936. Les Pilisuctoridae Ch. et Lw. Désmodexie, orientation et polarité chez les infusoires. *Bulletin Biologique de la France et de la Belgique*, 70: 86–144.
- Dovgal, I.V. 1998. The origin and evolution of the adhesive organelles in infusoria (Ciliophora). *Vestnik Zoologii*, 32(1/2): 18–29.
- Fenchel, T. 1965. On the ciliate fauna associated with the marine species of the amphipod genus *Gammarus* J.C. Fabricius. *Ophelia*, 2: 281–303.
- Guilcher, I. 1951. Contribution à l'étude des Cilies Gemmipares, Chonotriches et Tentaculifères. *Annales des Sciences Naturelles (Zoologie)*, 13: 33–132.
- Jankowski, A.W. 1966. Morphology and evolution of Ciliophora. VI. Morphology and life-cycle of *Conidophrys enkystotrophos* sp. nov. and the problem of phylogeny and taxonomic position of the family Conidophryidae Guilcher, 1951. Pp. 123–129 in: *Materials of the IV conference of Young Scientists of Moldavia, Zoology* (Kishinev).
- Jankowski, A.W. 1972. Recapitulation of phylogenesis in ciliate ontogeny. Pp. 95–123 in: *Problems of Evolution*, vol. 2. Nauka, Novosibirsk.
- Jankowski, A.W. 1989. Replacement of unavailable generic names in Ciliophora. *Vestnik Zoologii*, 23(2): 86.

- Jones, M.B. & Khan, M.A.** 1970. The occurrence of *Conidophrys* species (Protozoa, Ciliata) on members of the *Jaera albifrons* Leach group. *Acta Protozoologica*, **8**: 149–153.
- Kirby, H.** 1941. Relationships between certain protozoa and other animals. Pp. 890–1008 in: *Protozoa in biological research*. Columbia University Press, New York.
- Morado, J.F. & Small, E.B.** 1995. Ciliate parasites and related diseases of Crustacea: a review. *Reviews in Fisheries Science*, **3**: 275–354.
- Puytorac, P.** 1994. Sous-classe des Apostomatia. Systématique. Pp. 823–846 in: *Traité de Zoologie* (Anatomie, systématique, biologie), vol. 2, fasc. 2. (Infusoires ciliés). Masson, Paris.
- Raabe, Z.** 1964. *Zarys Protozoologii*. 283 pp. Polish Scientific Publications, Warsaw.

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Comments on this case are invited for publication (subject to editing) in the *Bulletin*; they should be sent to the Executive Secretary, I.C.Z.N., c/o The Natural History Museum, Cromwell Road, London SW7 5BD, U.K. (e-mail: iczn@nhm.ac.uk).