# Case 3171

# Cryphops Richter & Richter, 1926 (Trilobita): proposed conservation

## D.J. Holloway

Museum Victoria, PO Box 666E, Melbourne, Victoria 3001, Australia (e-mail: dhollow@museum.vic.gov.au)

## K.S.W. Campbell

Department of Geology, Australian National University, PO Box 4, Canberra, ACT 0200, Australia (e-mail: ken.campbell@anu.edu.au)

Abstract. The purpose of this application is to conserve the name *Cryphops* Richter & Richter, 1926 for a genus of Late Devonian trilobites (family PHACOPIDAE). This name is a junior objective synonym of *Gortania* Cossmann, 1909, which had been proposed as a replacement for *Microphthalmus* Gortani, 1907 *non* Mecznikow, 1865. *Cryphops* has been universally accepted as the valid name for the taxon whereas *Gortania* has never been used as a valid name since its establishment and its suppression is proposed.

**Keywords.** Nomenclature; taxonomy; Trilobita; phacopoid trilobites; PHACOPIDAE; *Cryphops*; Devonian.

1. Gortani (1907, p. 229) proposed the name *Microphthalmus* as a subgenus of *Trimerocephalus* McCoy, 1849, and listed a number of species including *Phacops* cryptophthalmus Emmrich, 1844 (p. 15), *P. (Trimerocephalus) acuticeps* Kayser, 1889, *P. mastophthalmus* Reinhard Richter, 1856, and two new species *Trimerocephalus (Microphthalmus) pseudogranulatus* and *T. (M.) roemeri*; the last two were regarded by Rudolf Richter & Emma Richter (1926, p. 159) as junior synonyms of *Phacops cryptophthalmus*. Gortani did not designate a type species for *Microphthalmus*.

2. In reviewing Gortani's paper, Cossmann (1908, p. 245) briefly noted the erection of *Microphthalmus*, mentioning only *Phacops cryptophthalmus* as belonging to the taxon; his intention in listing only one species is not clear, but the statement does not qualify as the designation of a type species nor would it had he explicitly excluded all the other originally included specific names, since fixation by elimination does not constitute type fixation (Article 69.4 of the Code).

3. In a brief statement the following year, Cossmann (1909, p. 67) proposed the name *Gortania* as a replacement for *Microphthalmus* Gortani, 1907 because the latter is a junior homonym of *Microphthalmus* Mecznikow, 1865 (p. 334), a genus of polychaete worms. Again no type species was designated for *Gortania*.

4. Vogdes (1925, p. 114) subsequently designated *Phacops cryptophthalmus* Emmrich, 1844 as type species of *Microphthalmus* Gortani, 1907; this serves also as type species designation for *Gortania* (Article 67.8), although Vogdes did not mention *Gortania*.

5. Richter & Richter (1926, p. 157) proposed *Cryphops* as a subgenus of *Phacops*, naming *Phacops cryptophthalmus* as type species; *Cryphops* is thus a junior objective synonym of *Gortania*. Richter & Richter listed the preoccupied name *Microphthalmus* Gortani, 1907 as a synonym of *Cryphops*, but were apparently unaware of the existence of *Gortania* or that Vogdes had the previous year fixed *P. cryptophthalmus* as the type of *Microphthalmus* Gortani.

6. In the *Treatise on Invertebrate Paleontology* (1959, p. 463), Richter, Richter & Struve listed *Microphthalmus* Gortani, 1907 and *Gortania* Cossmann, 1909 as objective synonyms of *Cryphops*, and indicated that an application by Struve to the Commission to conserve *Cryphops* was pending. We are advised by Dr P.K. Tubbs (Executive Secretary of the Commission) that no such application was ever received.

7. Since its erection *Cryphops* has been accepted universally as the valid name for the taxon, which has been regarded either as a subgenus of *Phacops* or more recently as an independent genus. Authors who have used the name include Reed (1927), Delo (1935), Hupé (1953), Maksimova (1955), Richter, Richter & Struve (1959), Kramarenko & Maksimova (1960), Osmólska (1963), Lütke (1968), Hahn & Hahn (1975), Chlupáč (1977), Struve (1989), Feist & Schindler (1994) and Crônier & Feist (2000) — this list is not exhaustive. On the other hand, to the best of our knowledge *Gortania* has never been used as a valid name.

8. The Code seeks to preserve the stability of established usage of names by ensuring that a younger name in prevailing usage is not displaced by an older but long-unused name (Article 23.9). However, this Article cannot be automatically applied in the present case as the unused senior synonym (*Gortania*) was proposed after 1899.

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

- to use its plenary power to suppress the generic name *Gortania* Cossmann, 1909 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 Cryphops Richter & Richter, 1926 (gender: masculine), type species by original designation Phacops cryptophthalmus Emmrich, 1844;
- (3) to place on the Official List of Specific Names in Zoology the name *cryptophthalmus* Emmrich, 1844, as published in the binomen *Phacops cryptophthalmus* (specific name of the type species of *Cryphops* Richter & Richter, 1926);
- (4) to place on the Official Index of Rejected and Invalid Generic Names in Zoology the following names:
  - (a) Gortania Cossmann, 1909, as suppressed in (1) above;
  - (b) *Microphthalmus* Gortani, 1907 (a junior homonym of *Microphthalmus* Mecznikow, 1865).

#### Acknowledgement

We thank Dr Robin Wilson for providing the reference to the publication by Mecznikow (1865).

### References

- Chlupáč, I. 1977. The phacopid trilobites of the Silurian and Devonian of Czechoslovakia. Rozpravy Ustredního Ustavu Geologického, 43: 1–172.
- **Cossmann, M.** 1908. Contribuzioni allo studio del paleozoico carnico III: la Fauna a Climenie del Monte Primosio, per M. Gortani. *Revue critique de paléozoologie*, **12**: 245–246.

Cossmann, M. 1909. Rectifications de nomenclature. Revue critique de paléozoologie, 13: 67-68.

Crônier, C. & Feist, R. 2000. Evolution et systématique du group *Cryphops* (Phacopinae, Trilobita) du Dévonien supérieur. *Senckenbergiana Lethaea*, **79**: 501–515.

**Delo, D.M.** 1935. A revision of the phacopid trilobites. *Journal of Paleontology*, **9**: 402–420. **Emmrich, H.F.** 1844. *Zur Naturgeschichte der Trilobiten*. 28 pp., 1 pl. Meiningen.

- Feist, R. & Schindler, E. 1994. Trilobites during the Frasnian Kellwasser Crisis in European Late Devonian cephalopod limestones. *Courier Forschungsinstitut Senckenberg*, 169: 195–223.
- Gortani, M. 1907. Contribuzioni allo studio del Paleozoico Carnico. III. La fauna a Climenie del Monte Primoso. *Memorie della Reale Accademia delle Scienze dell'Istituto di Bologna*, (6)4: 201–245.
- Hahn, G. & Hahn, R. 1975. Die Trilobiten des Ober-Devon, Karbon und Perm. Leitfossilien, 1: 1–127.
- Hupé, P. 1953. Classe des trilobites. Pp. 44–246 in Piveteau, J. (Ed.), *Traité de paléontologie*, vol. 3. Masson et Cie, Paris.
- Kramarenko, N.N. & Maksimova, Z.A. 1960. Nadsemeistvo Phacopoidea Hawle et Corda, 1847. Pp. 162–171 in Chernysheva, N.E. (Ed.), Osnovy paleontologii. Chlenistonogie trilobitoobraznye i rakoobraznye. 515 pp. Nedra, Moscow.
- Lütke, F. 1968. Trilobiten aus dem Oberdevon des Südwest-Harzes Stratigraphie, Biotop und Systematik. *Senckenbergiana Lethaea*, **49**: 119–191.
- Maksimova, Z.A. 1955. Trilobity srednego i verkhnego devona Urala i severnykh Mugodzhar. Trudy Vsesoyuznogo Nauchno-Issledovateľ skogo Geologicheskogo Instituta, 3: 1–264.
- Mecznikow, E. 1865. Beiträge zur Kenntniss der Chaetopoden. Zeitschrift für wissenschaftliche Zoologie, 15: 328–341.
- Osmólska, H. 1963. On some Famennian Phacopinae (Trilobita) from the Holy Cross Mountains (Poland). Acta Palaeontologica Polonica, 8: 495–523.

Reed, F.R.C. 1927. Recent work on the Phacopidae, part 1. Geological Magazine, 64: 308-322.

- Richter, R. & Richter, E. 1926. Die Trilobiten des Oberdevons. Beiträge zur Kenntnis devonischer Trilobiten. 4. Abhandlungen der Preussischen geologischen Landesanstalt, 99: 1–314.
- Richter, R., Richter, E. & Struve, W. 1959. Subfamily Phacopinae. Pp. 463–466 in Moore, R.C. (Ed.), *Treatise on invertebrate paleontology. Part O. Arthropoda 1.* Geological Society of America and University of Kansas Press. 560 pp. Lawrence, Kansas.
- Struve, W. 1989. Rabienops evae aus dem späten Ober-Devon des Rheinischen Gebirges. Bulletin de la Société Belge de Géologie, 98: 335–342.
- **Vogdes, A.W.** 1925. Palaeozoic Crustacea. Part 2. An alphabetical list of the genera and subgenera of the Trilobita. *Transactions of the San Diego Society of Natural History*, **4**: 89–115.

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).



Holloway, D J and Campbell, K.S.W. 2001. "Cryphops Richter And Richter, 1926 (Trilobita): Proposed Conservation." *The Bulletin of zoological nomenclature* 58, 97–99.

View This Item Online: <u>https://www.biodiversitylibrary.org/item/105441</u> Permalink: <u>https://www.biodiversitylibrary.org/partpdf/41812</u>

**Holding Institution** Harvard University, Museum of Comparative Zoology, Ernst Mayr Library

**Sponsored by** Harvard University, Museum of Comparative Zoology, Ernst Mayr Library

# **Copyright & Reuse**

Copyright Status: In copyright. Digitized with the permission of the rights holder. Rights Holder: International Commission on Zoological Nomenclature License: <u>http://creativecommons.org/licenses/by-nc-sa/3.0/</u> Rights: <u>https://biodiversitylibrary.org/permissions</u>

This document was created from content at the **Biodiversity Heritage Library**, the world's largest open access digital library for biodiversity literature and archives. Visit BHL at https://www.biodiversitylibrary.org.