

Comments to paper on *Radiastraea* by Andreas May

TOMASZ WRZOŁEK

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Tomasz Wrzolek, University of Silesia, Faculty of Earth Sciences, ul. Będzińska 60, PL 41-200 Sosnowiec, Poland; wrzolek@us.edu.pl

It is a good practice to use old paleontological collections for taxonomic revisions, and Andreas May rightly used such material, housed in the Museo Geominero in Madrid (May 2006). On the other hand, however, there are significant risks connected with using museum material and they are clearly seen in his paper.

It should be emphasised, that the type is not only a specimen, but it must be accompanied by exact stratigraphical and geographical data of its sampling location. As it happens so often these data may be missing, dubious or openly false. And it seems this is also the case with *Phillipsastrea torreana minuta* as revised and presented by May. Knowing that he cannot indicate the precise stratigraphic horizon of the holotype, May decided to select the only existing specimen (at Museo Geominero) as the lectotype, which can be either from the Sta. Lucia Fm. (spanning the Emsian/Eifelian boundary) or from the upper Portilla Fm. (Upper Givetian). As for the taxonomy of this material there is some doubt, because of its poor longitudinal section, which is off-axis. Measurements I have made and comparison with my other material indicate that this colony falls into the variability range for the upper Givetian *Phillipsastrea* “*pradoana*”, as presented in my recent paper (Wrzolek 2005, table 3, see also remarks at p. 178), with rather thin septa, as opposed to thicker septa of *Ph. torreana*. My taxonomy is based on 8 specimens from the Cantabrian Mts, so it is probably better than those of May (1 specimen) but of course it may not hold when more material becomes available. As it happens, “*pradoana*” is not a good species name for a *Phillipsastrea* because, as Coen-Aubert noted (2002,

p. 33), the holotype of *Acervularia pradoana* Haime in de Verneuil & Barrande is a representative of the genus *Argutastraea*. So there is a nomenclatorial problem, to find a suitable species to accommodate those phillipsastreids erroneously assigned to *Phillipsastrea pradoana*, but due to the above-outlined problems with its type material the name *Ph. minuta* should not be used at present.

As for *Radiastraea arachne* as presented by May, I would hesitate to accept if it is conspecific with *R. arachne*, but I have little or no doubt it is not congeneric with *Phillipsastrea*. Among the phillipsastreid species groups (Wrzolek 2005, p. 164 and the following) somewhat similar are the Famennian species of the Sudetes (Berkowski 2002: *Scruttonia kunthi* and the other species), lacking the horseshoe dissepiments, with very thin septa and negligible septal expansion, whereas May’s material has shorter septa and is of much older age.

It is a pity that Andreas May did not make additional sampling, as it might have allowed him to recognize the original sampling horizon(s) of Almela and Revilla; if done, it might give him more material, and a new perspective of better knowledge of the species studied, the nomenclature, variability, affinities and biogeographic significance. I hope this can and will be done.

References

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