

## MICROPALAEONTOLOGY NOTEBOOK

## Comments on the spelling of ‘archaeopyle’, the germination aperture in dinoflagellate cysts

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## INTRODUCTION

During editorial work for the *Journal of Micropalaeontology*, a discussion arose between authors, reviewers and editors on the correct spelling of a technical term in palynology: ‘archeopyle’ or ‘archaeopyle’, the germination aperture in dinoflagellate cysts. One opinion was that there is only one correct spelling, namely ‘archeopyle’, with a single ‘e’ in the middle of the word, irrespective of the use of British English or American English. The other opinion was that spelling of the word should follow the language used in the rest of the text – allowing for ‘archeopyle’ with ‘e’ in American English and ‘archaeopyle’ with ‘ae’ in British English. This Notebook illustrates the reasons for this controversy and argues for the alternative spellings of the word according to American or British English spelling used.

## THE CAUSE OF THE ‘PROBLEM’ AND LINE OF ARGUMENT

The term ‘archeopyle’ was introduced in 1961 by William R. Evitt in one of his seminal papers on the morphology of fossil dinoflagellates, in which he recognized that many organic microfossils, then called ‘hystrichospheres’, showed a germination opening and were actually of dinoflagellate affinity. As derivation of the word he gave the following information: ‘... the presence of this opening (pyle – gate, orifice) in fossil (archo – ancient) dinoflagellates ...’ (Evitt, 1961, p. 389). Since then, the term has become accepted and used widely by palaeontologists and biologists alike. Definitions and descriptions of the word itself and derivative terms can be looked up in the latest glossary of terminology by Williams *et al.* (2000). In the glossary ‘ARCHAEOPYLE’ refers to ‘See ARCHEOPYLE’ and one can find all the relevant entries under this spelling with ‘e’ only. From all the authors cited, there are only two who used the spelling with ‘ae’ (see Williams *et al.*, 2000, pp. 17–20).

The near unanimity is most obviously a coincidence. Bill Evitt is American and published the definition of the term ‘archeopyle’ in a North American journal (Evitt, 1961). Almost all the cited entries on archaeopyle in the glossary of terminology (Williams *et al.*, 2000) are by North American authors or were published in North American journals or editing houses, and the glossary itself is published by the American Association of Stratigraphic Palynologists (AASP). The two exceptions, the authors using archaeopyle in its British English spelling, are Bill Sarjeant and Jon Bujak, who are both native Englishmen. Interestingly, Jon Bujak used British spelling in Bujak *et al.* (1980), a monograph published in England, whereas he used American spelling in Bujak & Davies (1983), published by AASP. Fensome *et al.* (1993, p. 250) are the first authors who mentioned the possibility of alternative spellings: ‘Archeopyle:

The opening in the cyst wall through which excystment takes place. “Archaeopyle” is an alternate spelling’.

## RECOMMENDATION

The term archaeopyle derives from Greek *αρχαιος*, transliterated *archaios*, meaning ancient, old, and *πόλη*, transliterated *pyli* or *pule*, meaning gate or orifice (cf. Brown, 1979; Stearn, 1983; Thayer & Smith; Kypros-Net Inc.). The word component *archaios* is also found in other foreign words used in modern language; the most readily coming to mind and closest to our discipline, is archaeology. Correct spelling of this word is ‘archaeology/archeology’ in British/American English, ‘archéologie’ in French, and ‘Archäologie’ in German. A similar construction is found in the word palaeontology, which derives from Greek *παλαιος*, transliterated *palaios*, meaning ancient or old. Its well-known equivalents in different languages are ‘palaeontology/paleontology’ in British/American English, ‘paléontologie’ in French, and ‘Paläontologie’ in German. Following the same rules of transcription of the Greek-rooted words into modern languages, the dinoflagellate cyst opening reads ‘archéopyle’ in French, and ‘Archäopyle’ in German and should be ‘archaeopyle’ and ‘archeopyle’ in British and American English, respectively. There is no good reason to make an exception to the rule in the case of the word archaeopyle, even though Evitt (1961) originally introduced it in accordance with American spelling.

Based on the above, the word ‘archeopyle’, with ‘e’ only, is considered to be the American English spelling, while ‘archaeopyle’, with ‘ae’, the British English spelling of the word. In manuscripts edited in British English, the word ‘archaeopyle’ should therefore be spelled with ‘ae’. Changing the orthography of words with the component *archaios* to the standard spelling in a modern language does not, of course, apply to taxon names such as *Archaeodinium*, *Archaeohystichosphaeridium* or *Archeotectatum*, where the literal spelling of the original publication must be retained.

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