

## Barremian–Aptian plankton foraminiferal stratigraphy of the southern framing of the East European platform (Crimea and Ulyanovsk Volga region)

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Although detailed scale for this region was developed in 1986 (GORBATCHIK, 1986), a new stratigraphic and systematic data call for reinvestigation of mid-Cretaceous deposits of the Tethys realm of the former USSR (Crimea and Ulyanovsk Volga region).

Taxonomy of lower Cretaceous planktonic foraminifera is still under study and revision. There are several divergent views on the systematics of the group, which resulted in existence of genera with not distinct definitions (e.g. in hedbergellids – *Hedbergella*, *Clavihedbergella*, *Praehedbergella*, *Blufuscuiana*, etc.). According to the most accepted opinion, all the mid-cretaceous trochoid forms belong to the *Hedbergella* (except the late Aptian *Paraticinella*), and all planispiral forms belong to the *Globigerinelloides* (except ones with elongate chambers – *Leupoldina*, *Pseudoshackoina*). The present study, using a set of criteria, reveals a clear distinction between *Blowiella* and *Globigerinelloides*, and between *Clavihedbergella* and *Hedbergella*. These genera helped to divide the studied deposits into the following zones (using zone definitions from: COCCIONI et al., 2007; MOULLADE et al., 2015; GRADSTEIN et al., 2012; OGG et al., 2016): Upper Barremian: *Blowiella blowi*, *Hedbergella ruka*, *H. excelsa*. The lower border of latter is below for several meters the br/ap border (based on magnetic cron M0). Lower Aptian: *H. excelsa*, *L. cabri*, *Clavihedbergella luterbacheri*. Upper Aptian: *Globigerinelloides ferreolensis*, *G. barri*, *G. algerianus*, *H. trocoidea*, *Paraticinella rohri*.

Though all zones of the Mediterranean region were found, not all of them are detected in all outcrops. Everywhere the basis of the complex is *Hedbergella infracretacea*. The index types of taxa are rare (especially in the range from *L. cabri* to *G. barri*), besides *Globigerinelloides* represented only by juvenile forms. All these factors indicate the poor conditions for these genera in the basin. Probably, the reason for the almost absence of all other morphotypes, except *Hedbergella infracretacea*, is the lack of the open ocean conditions in this area during the Barrem–Aptian. However, not only *Globigerinelloides* meets these conditions, as it is widely known, but also other forms – such as *Leupoldina*, *Clavihedbergella* and *Paraticinella*. Therefore, in epicontinental basins, despite the presence of planktonic foraminifera, it is complicated to determine the exact zones.

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