Zonal division of Caucasian uppercretaceous-lowerpaleocene deposits according to echinoids

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Echinoids is one of the class of echinodermata type which development history covers 500 million years.In the progress of echinoids development there are several of levels high evolution, which includes carboniferous period, middlejurassic, latecretaceous-earlypaleocene and miocene epochs.

According to a total confession of researchers the highest tempo of echinoids evolution development coincides with the latecretaceous-earlypaleocene epoch. We have the same picture in the Caucasus ,where the increase in evolution growth of tempo exists especially in campanian, maastrichtian and danian ages.

Mainly, high level of evolution was the reason of great biostratigraphical importance of caucasian latecretaceous-earlypaleocene echinoids.Having such consideration is basically, on the one hand highly spread of echinofauna in the caucasian uppercretaceous-lowerpaleocene sediments,and on the other hand existence of different echinofaunist complexes at the various stratigraphycal level. It creates not only splitting into some stages,but also into much more smaller parties(biozone) basis of classification of above mentioning echinoids.

We have separated 12 echinoids zone in the Caucasian uppercretaceous-lowerpaleocene (danian) sediments***: Holaster subglobosus*** – upper senomanian. ***Conulus ellipticus*** – lower turonian, ***Sternotaxis planus*** – upper turonian***, Echinocorys gravesi*** – lower coniacian, ***Micraster heberti*** – lower santonian***, Micraster schroederi*** – lower kampanian***, Micraster brongniarti*** – upper campanian, ***Guettaria rocardi*** – lower maastrichtian, ***Cyclaster integer*** – upper maastrichtian, ***Cyclaster danicus*** – lower danian***, Cyclaster gindrei*** – middle danian, ***Pseudogibbaster tercensis –*** upper danian.

In this way, the research of caucasian latecretaceous-earlypaleocene echinoids approves the opinion about the great biostratigraphycal importance of this very interesting group of sea animals.