

Tectonic windows, especially those of Kruja zone, are of cupola pattern due to the evaporite diapirism and the extensional tectonics which has acted during Pliocene-Quaternary in the Eastern Regions of Albania.

So in the eastern regions of Albania a pile of nappe sheets is evidenced (from top to bottom) as follows:

- Korabi nappe sheet,
- Mirdita nappe sheet,
- Krasta nappe sheet,
- Kruja nappe sheet.

Amplitude of the tectonic covering from Mali me Gropa to Dibra e Madhe is over sixty kilometres.

ARAGONITE WHITINGS OF PLIOCENE AND PLEISTOCENE AGE IN THE AREA OF CORINTHOS

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White laminae of aragonitic needles and stellate clusters up to 10 μm in diameter are intercalated within two marly sequences of the Corinthian area: A. Top sequence of the Corinthian Marl (directly west of Corinthos) - Upper Pliocene/Lower Pleistocene age based on foraminifers and ostracods; B. uppermost meters of sediments within the Saronic Gulf (core SAR 19, 270 m water depth) - 18250 to 19080 years B.P. based on radiocarbon dating. All aragonites have a high Sr and a heavy C/O isotope content, but the values of the layers of the two localities differ significantly:

Locality	Sr in ppm	$\delta^{13}\text{C}$ (PDB)	$\delta^{18}\text{O}$ (PDB)	samples
A	7600/8400	+1,5/+2,4	-0,1/+0,2	5
B	4200/5300	+4,8/+7,4	+4,4/+4,8	5

Because the aragonitic needles and stellate clusters are identical to those known from the Dead Sea we interpret the white layers as results of whittings too. The different composition of the aragonites of localities A and B is due to the development of the sequences. In both localities the white varves are intercalated in the transition zone between nonmarine and marine formations. The nonmarine environment is established by lacustrine events in the Gulf of Corinthos and the Saronic Gulf corresponding to glacial periods, when the sea-level was significantly lower than today. With rising

sea-level the lakes (*with different water composition due to different drainage areas and freshwater influx*) became flooded by the sea. At such times in the eight Plio/Pleistocene megasequences of the Corinthian area especially precipitation of aragonite took place.

For the genesis of the aragonitic whittings we assume high temperatures during summer times combined with algal blooms extracting CO₂ from the sea water. Because of the specific water of each lake the ingresions of the sea resulted in different aragonite compositions.

PEGMATITES AND "METASOMATIC" ROCKS IN THE METABASIC SERIES OF EAST/SOUTHEAST RHODOPE: MINERALOGY - PETROLOGY - GEOCHEMISTRY

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Pegmatites appear in the eneiss-migmatite and the marble-amphibolitic series of the metamorphic units of Central and Eastern Rhodope. They are genetically associated with the large granite bodies of Rhodope (e.g. Skaloti-Echinos, Kavala, Serres). A large number of outcrops of pegmatites occur in the metabasic series of East/Southeast, Rhodope although acid plutonic bodies are absent in the area. Vein-type igneous intrusives and amphibolites altered to leucocratic rocks are observed in the same series. The "metasomatic" rocks are dominated by the following *neofomed* minerals: albite/oligoclase, quartz, almandine garnet, muscovite/paragonite, clinozoisite/epidote (torthite), rutile and recrystallized hornblende. "Metasomatic" rocks with more than 50% scapolite (mizzonite) are worth to be mentioned. The progressive metamorphism of the metamorphic Units of Rhodope influenced the neofomation of minerals of the "metasomatic" rocks.

A geochemical study indicates that the leucocratic members of the "metasomatic" rock types (e.g. the vein type intrusives of leucosomes) are depleted in potassium and they are considered as being derived from trondjemitic melts of continental anatectic origin. Pegmatites with similar geochemical affinities, which intruded the amphibolite-"metasomatic" rocks complex, have probably the same magmatic origin. The "trondjemitic tendency" of these pegmatites is further more substantiated by comparing their geochemical characteristics with those of pegmatites from Central/West Rhodope. The latter are potassium rich and show "granitic affinities".