

**FERRIAN K-FELDSPAR - PRODUCT  
OF THE CELADONITE THERMAL BREAKDOWN  
(EXPERIMENTAL RESULTS)**

*Savko K.A., Fonarev V.I., Konilov A.N., Chigarev A.G., Pilugin S.M.*

Ferrian sanidine was synthesized by thermal breakdown experiments of natural dioctahedral Al-free mica – celadonite at 1 kbar, 750°C, and hematite-magnetite - buffer (Fe-Fsp = 0.407-0766 a.u.). So ferrian sanidine, tetraferribiotite and quartz are forming by the celadonite thermal breakdown at relatively high oxygen fugacity. Ferrian Kfeldspar are not forming by the more reduced conditions (buffer NiNiO), and tetraferribiotite and quartz are the celadonite breakdown products.