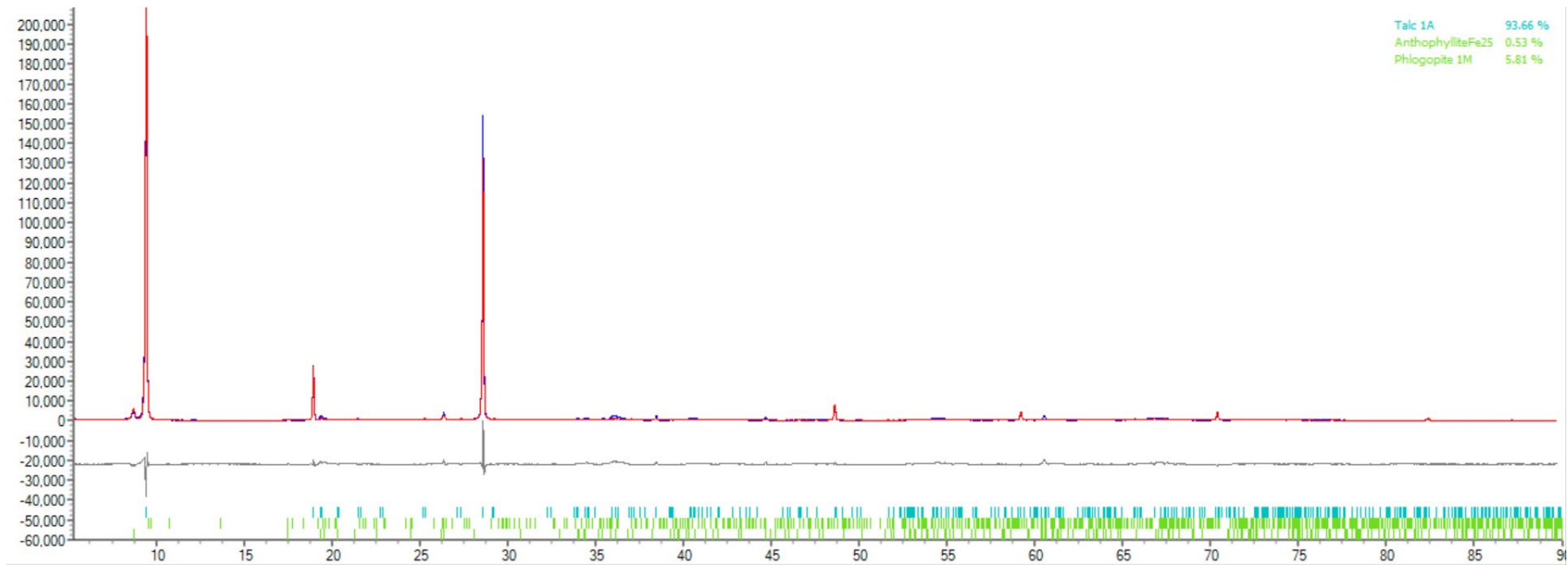


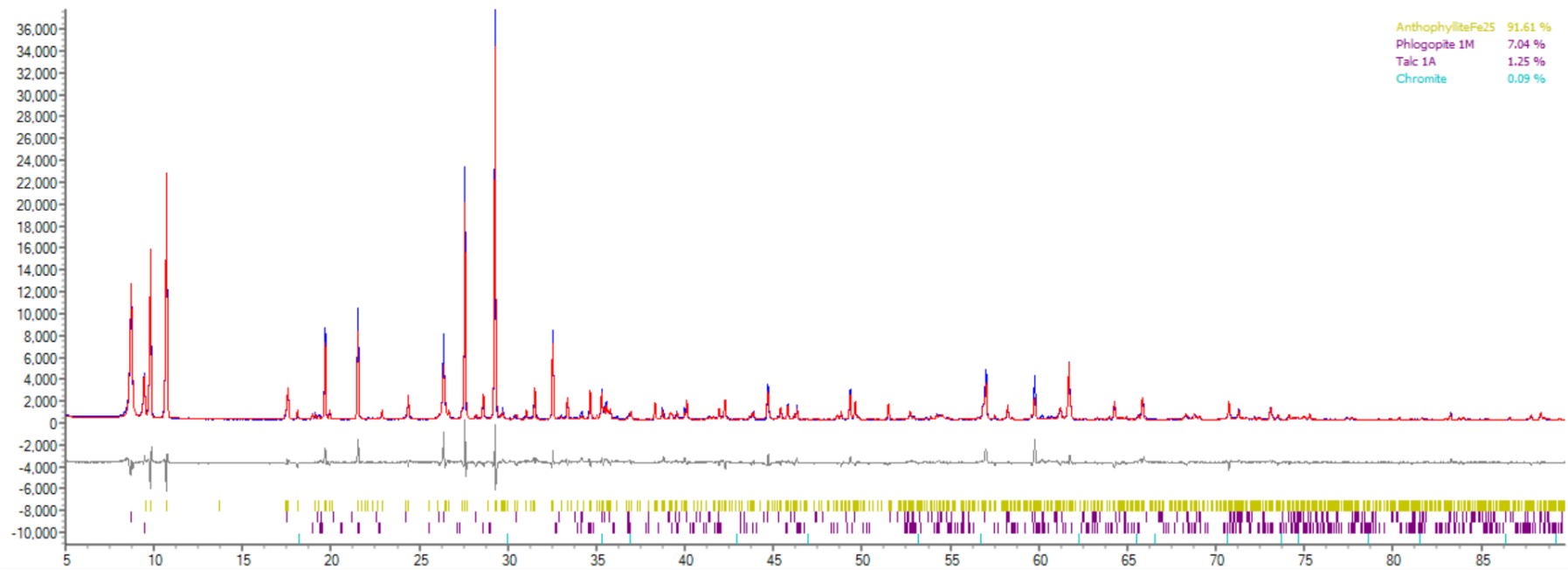
# Supplementary figures

## PXRD diagrams Rietveld refinement

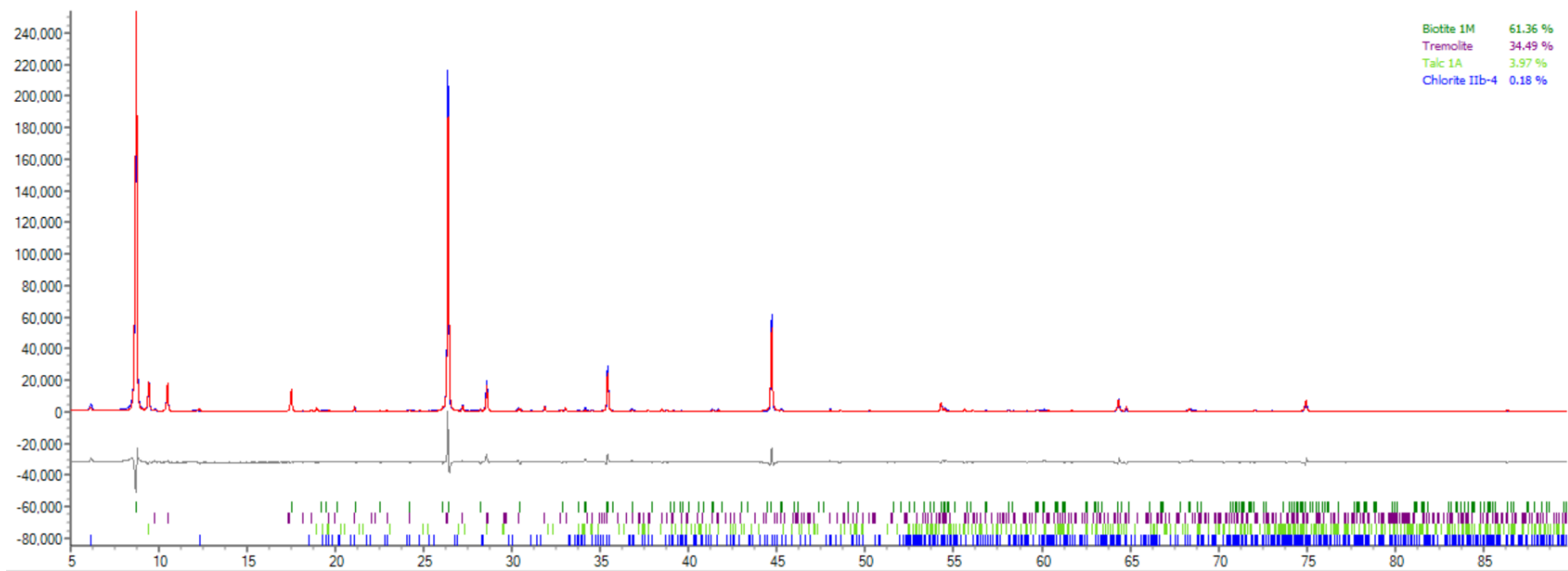
Blue: experimental pattern, red: calculated, grey: difference



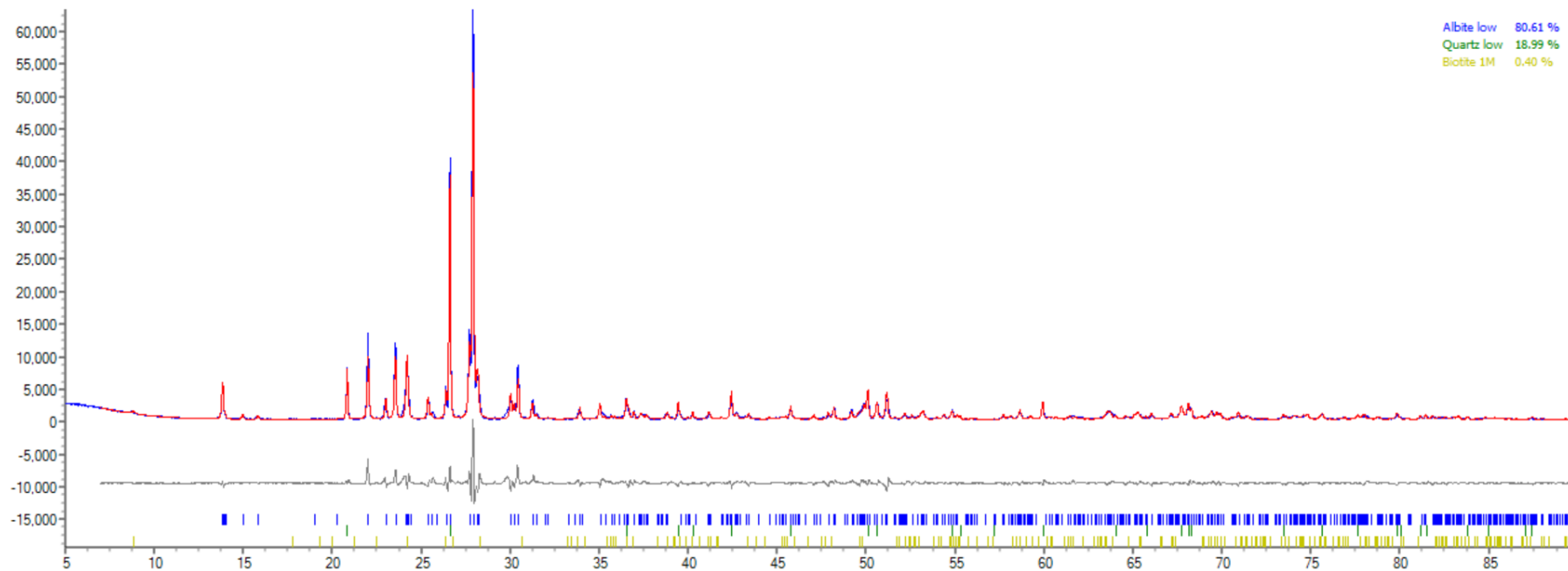
**Figure S1.** Talc zone at the dunite side of metasomatic contact with 93.66% talc, 5.81% phlogopite, and 0.53% anthophyllite.



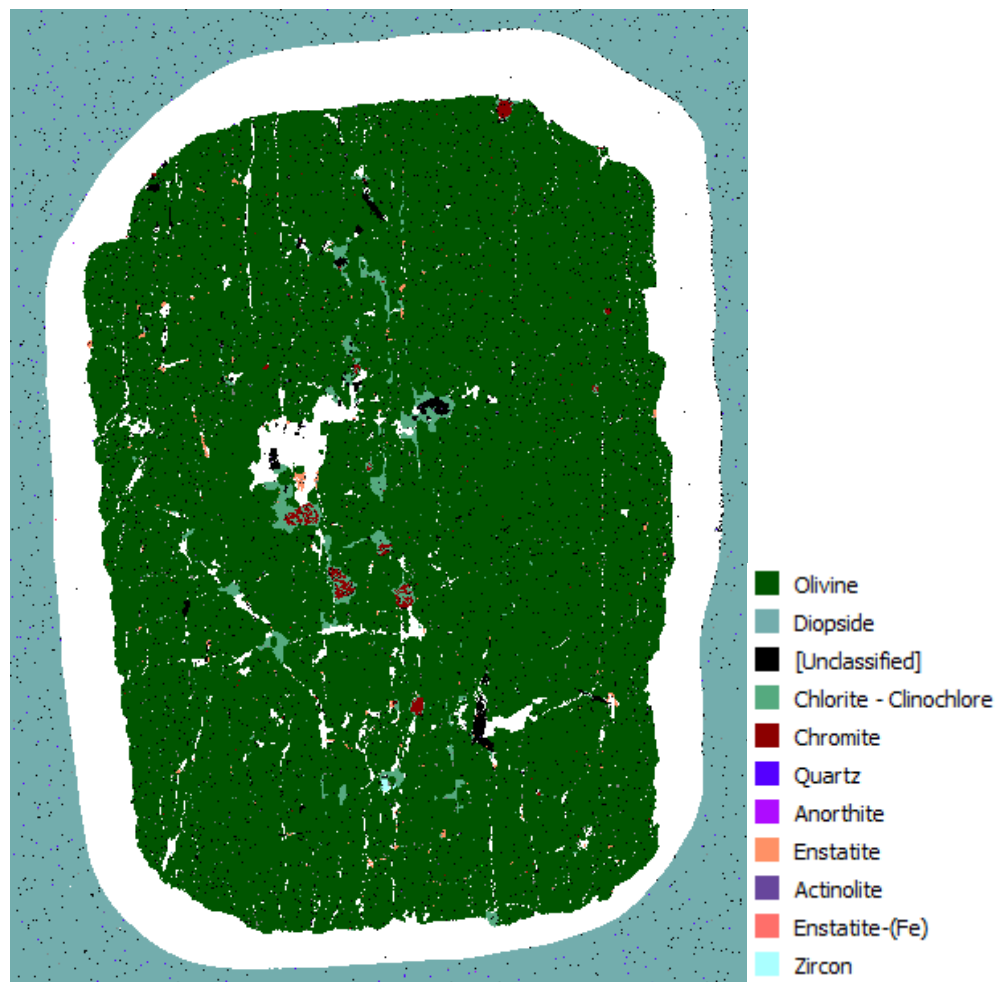
**Figure S2.** Amphibole zone with 91.61% anthophyllite, 7.04% phlogopite, 1.25% talc, and 0.09% chromite.



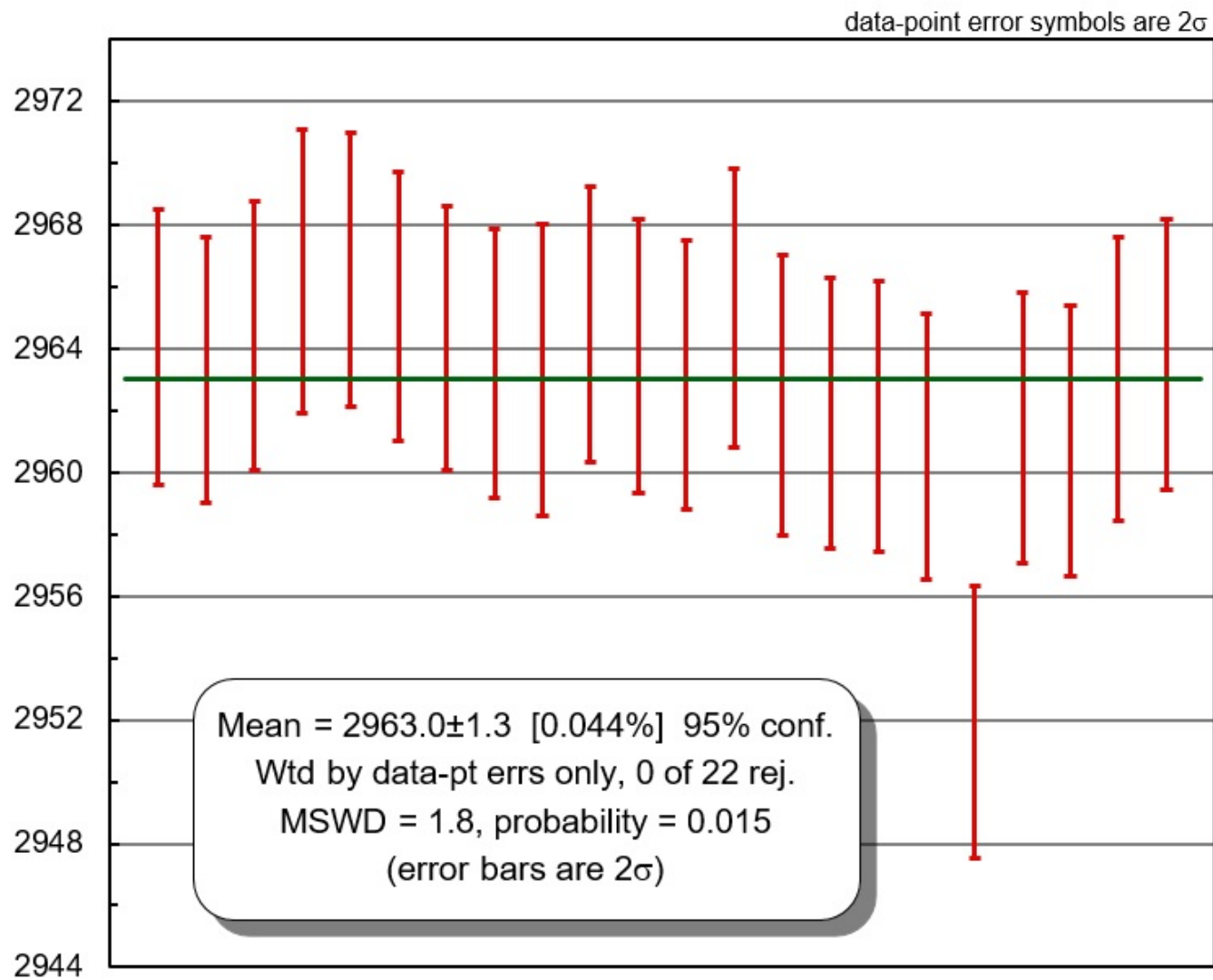
**Figure S3.** Mica zone on the pegmatite-side of the contact with 61.36% phlogopite, 34.49% tremolite, 3.97% talc, and 0.18% chlorite.



**Figure S4.** Trondhjemite with 80.61% albite, 18.99% quartz, and 0.40% biotite.



**Figure S5.** Olivine porphyroblast in sample 186460 using a TESCAN Integrated Mineral Analyzer (TIMA), which is a fully automated SEM-based analysis system that provides quantitative mineralogical and textural data on the basis of automated point counting. The instrument contains a custom-built electron-beam platform equipped with four energy dispersive X-ray spectrometers (EDS) for mineral and compound identification within a wide range of sample types.



**Figure S6.** Mean age plot for zircon U-Pb isotope data for sample 186460.