Dating of 'geological' obsidian

The formation of obsidian is an instantaneous process in geological history. It can be dated by various methods, notably fission track, K/Ar, U/Pb and (U-Th)/He zircon (apatite) dating. The resulting chronological data are important for reconstructing volcanological events, geohistory and can be also used for source characterisation. There are, however, factors influencing our efficiency like accidental or planned heat effects - which can be used, sometimes, for dating other events in connection with the life of the artefacts. How does chronological investigation interfere with sourcing and temporal arrangement of various obsidians?