

Interactive comment on “Magma storage and plumbing of adakite-type post-ophiolite intrusions in the Sabzevar ophiolitic zone, NE Iran” by K. Jamshidi et al.

H. Shafaii Moghadam (Referee)

hadishafaii@yahoo.com

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Review# I was very interested in reading this paper. There are lots of good issues in the manuscript, and is therefore indeed a valuable contribution, but it needs some minor modification. I think most of my comments can be addressed with a reasonable quantum of confidence, and therefore might also make the paper more appealing to a diverse audience. Introduction; reference Khalatbari Jafari et al., 2013 is related to the Khoy ophiolite (NW Iran), not Sabzevar! As we are studying on the same region (on same rocks; adakitic-like and calc-alkaline lavas from NE Iran), it would be good to mention that these all these rocks (both northern intermediate rocks and northern

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adakitic-like dome) have same ages; Eocene. Our Ar-Ar as well as U-Pb zircon dating confirms this. So, it would be good if the authors lower their tone about the age of felsic domes. Also these rocks are neither real-adakite, nor partial melts of thickened lower crust. As the authors also confirm this, the felsic rocks (domes) are amphibole-plagioclase-dominated fractional products of more mafic rocks. This is in agreement also with our modeling as well as our Sr-Nd-Pb isotope data.

And finally I cannot see if the Sabzevar Ocean subducted toward the north. We have not trace of dominant arc volcanism-plutonism in northern Sabzevar ophiolites except some adakitic-like rocks (again felsic domes) that may are related to relaxation and doming of the region after the Tethys subduction and closure beneath the Iran or transition from compression to extension above the Tethys subduction zone. These rocks are widespread everywhere in Iran and change in composition from alkaline to adakitic-like signature.

Hadi Shafaii Moghadam

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