Final Evaluation and replies to authors

The authors clearly replied and explained very well the weak points I marked. They fixed these weak points in the manuscript and improved it following my comments accordingly. The manuscript can be published.

I have few replies to the authors' replies to my review comments. These replies are mostly suggestions for ideas and/or stimulations for future further investigations.

Reply to authors' reply to comment 2:

If it is possible, can the authors specify the final water content in the residual melt after decompression? This would show how much gas exsolved from the melt in the decompression range used during authors' experiments.

As the authors reply, the structure of the glass is insensitive to changes in pressure. However, in 2008 S. Urukawa submitted an abstract for AGU Fall Meeting in San Francisco (http://adsabs.harvard.edu/abs/2008AGUFMMR33C..10U). I found this abstract a bit enigmatic because Urukawa claims: "Decompression has a little effect on the glass structure, which is mainly caused by elongation of atomic distances. This decompression effect must, however, affect the number of oxygen coordinated aluminum and *the distribution of bridging and non bridging oxygen*". Unfortunately there is no publication record concerning this work. However, this has intrigued me because, if decompression affects bridging and non bridging oxygen coordination, this should have an effect on melt viscosity and the dynamics of bubble nucleation, growth and coalescence. I may be wrong, but I find that this is a quite interesting topic.

Reply to authors' reply to comment 8:

The authors said in the reply: "*The effect of viscosity on vesicle textures and distributions is a field mostly unexplored in petrology and volcanology*". I totally disagree with this statement. I strongly invite the authors to explore the literature, because there are many papers that concern the effect of viscosity on the bubble textures. The group of Gardner and coworkers have done a lot (e.g., Larsen and Gardner, 2000, EPSL; Larsen et al., 2004, Geoch. Cosm. Acta; Burgisser and Gardner, 2005, Bull. Volcanol.; Gardner, 2007, JVGR). It is true that studies on basaltic systems are few (Cashman and Mangan, 1994, JVGR; Mangan and Cashman, 1996, JVGR; Namiki and Manga, 2005, EPSL), but, learning from the studies focused on viscous systems (i.e., rhyolites), the authors can explore several factors affecting viscosity that, in turns, influences several aspects in bubble textures, such as: effective water removal and gas exsolution in silicic melts (e.g., Navon et al., 1998, EPSL), type of bubble growth (viscous-limited and diffusion-limited; e.g., Lensky et al., 2004, JVGR) type of rheology (e.g., Lejeune and Richet, 1995, EPSL; Manga and Lowenberg, 2001, JVGR), capillary number (e.g., Llewellin and Manga, 2005, JVGR), gas permeability (e.g., Rust and Cashman, 2004; EPSL; Castro et al., 2012, Bull. Volcanol.).