

P-T paths of tracers producing LP and MP TTG source melt.
Paths indicate a rapid burial and stagnant position at the crust bottom


LP/MP TTG formation are formed continuousely after rapid burial and horizontal motion at crust bottom.


HP TTG formation


P-T paths of tracers producing HP TTG source melt.
These paths indicate a much slower burial which requires additional dynamics.


HP TTGs are formed via a delamination or subduction related process and can only be generated during an overturn event.

LP/MP TTGs are formed continuously, while HP TTGs are only formed during an overturn event.
This leads to a change in ratios of LP/MP/HP TTGs during a crustal growth and overturn cycle.


