

Response to Anonymous Referee #2

Reviewer comment	Response
<p>This manuscript reviews the progresses in modeling land surface processes on the Tibetan Plateau (TP) in the past decade from four aspects listed in abstract. The review is relatively comprehensive. The manuscript is also well written. Regarding to the modeling land surface processes on TP, I have several comments, which have not been mentioned or mentioned but not well addressed in the manuscript.</p>	<p>We thank the reviewer for providing a thorough and insightful review of our manuscript.</p>
<p>1) In the past decade, the LSM simulations have been performed on more fine scales in comparison with previous, which were benefited from the fine resolution forcing datasets and the improved model parameterization schemes.</p>	<p>We are glad the reviewer agrees with the point that development of meteorological forcing data is important. We will introduce how the improvement of forcing data and parameterization schemes help the fine scale simulation in our revised version.</p>
<p>2) The implication of satellite observation, in particular, in the ungauged/non-observational areas, has been greatly improved our understanding the land surface processes. For example, the satellite observation provides high resolution precipitation (e.g., CMORPH, FY-x), the revolutionary of land use/land cover, and the streamflow information etc.</p>	<p>We thank the reviewer's suggestions. In the revised version, we will consider the contribution of remote sensing data to improve land surface modeling and understanding.</p>
<p>3) In recent years, more in-situ meteorological stations have been installed and more field trips have also been conducted in the TP (e.g., the Second Tibetan Plateau Scientific Expedition and Research). All of them bring new information over TP which are known little in previous.</p>	<p>We thank the reviewer's suggestions. We fully agree with the reviewer. As we stated in the perspectives part, "new experimental activities (e.g. the Second Scientific Expedition to the Tibetan Plateau and the Third Atmospheric Science Experiment on the Tibetan Plateau) may provide new observations" to improve land surface modeling.</p>