Nat. Hazards Earth Syst. Sci. Discuss., https://doi.org/10.5194/nhess-2020-137-RC2, 2020 
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## **NHESSD**

Interactive comment

## Interactive comment on "Deriving slope movements for an imminent landslide along the Jinsha river" by Wentao Yang et al.

## **Anonymous Referee #2**

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The author use optical remote technique to study Mindu landslide ,and systematically studies the deformation of Mindu landslide since 2018. The stage of landslide stabilization and landslide activity were determined, and the response of landslide activity and regional climate, as well as the deformation characteristics of different periods inside the landslide, were found. To carry out research on this kind of landslide with potential river blocking is not only forward-looking, but also of great significance for disaster prevention and mitigation. The article has clear logic, rich content, sufficient arguments and fluent writing. The Baige landslide caused the downstream flood. The author selected the same type of Mindu landslide as the research object, derived the sub-pixel displacement of the landslide using sentinel 2 optical image in 2015 and later, and found that the landslide was in the stable stage before November 2018 and in the ac-

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tive stage after November 2018. The spatial-temporal model of landslide deformation is analyzed, and the potential risk of river blocking is revealed. This work is conducive to the identification, monitoring and early warning of landslides in mountain areas, and it is of great scientific and practical significance. But there are some problems with the article: 1. For landslide, the paper lacks the basic description of landslide, such as scale, slope, sliding material, etc. It is suggested to add the above contents. 2. For the data, we know that there are 13 bands in sentinel 2 image, the article does not mention which band was used. It is recommended to supplement the band number and outline the reason. 3. For the stable area, first of all, the attribute of the stable area should be explained, which is bedrock or stable accumulation or others. When correcting errors with a stable area, the noise reduction process needs to be described in detail. 4. For the illustration, figure 3 lacks the picture that matches the description, and Figure 4 lacks the introduction of the right half.

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