

## ***Interactive comment on “Influence of meteorological factors on rockfall occurrence in a middle mountain limestone cliff” by J. D’Amato et al.***

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The authors present a high resolution rockfall data set that allows a more accurate analysis of the rockfall triggers. The influence of the freeze-thaw periods or rainfall is clearly highlighted and the paper contributes to a better understanding of the rockfall initiation conditions, in particular of the cooling conditions. In my opinion the paper should be accepted. I suggest addressing a few issues:

(a) Section 5.1. Considering that the influence of freeze-thaw mechanism is well illustrated using DB1 but not so clearly with DB2. Then, is the freeze-thaw effect dependent on the size of the detachable mass? (b) Section 5.6. In my opinion, the term hazard

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is not used appropriately in the manuscript. It is now widely accepted that the term hazard involves both the magnitude and the frequency of the events, which is not the case. (c) Associated to the latter, a more in depth discussion on the applicability of the relation would be welcomed. The regression coefficients (table 4) may be acceptable for proving that the relation exists but no meaningful magnitude-frequency relation could be established. To what extent can the relation be used for hazard assessment?

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