



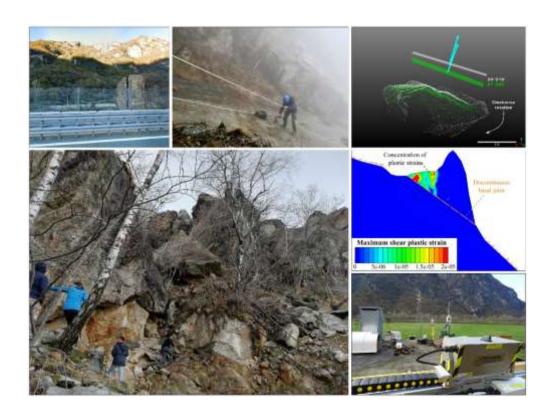
Seminario di Geologia Applicata:

mercoledì 26 febbraio 2025 @14.00, aula U4-2041

Instability of poorly accessible rock slopes: integrated investigation tools and hazard management at the Quincinetto rockslide (Western Italian Alps)

Dott. Tommaso Carlà

Università degli Studi di Firenze, Dipartimento di Scienze della Terra (DST)



Steep alpine rock slopes undergoing deformation may give rise to concurrent landslide hazards of different type and magnitude. The underlying mechanisms of instability are often challenging to investigate due to their inherent complexity; furthermore, they may occur on poorly accessible terrain, inhibiting proper awareness of hazards and limiting the collection of data by traditional field techniques. In the 1960s, the Turin-Aosta A5 highway was unknowingly constructed tangentially to the distal edge of the talus cone formed by the Quincinetto rockslide, which is considered to have collapsed prior to the last pulse of Würmian glacial advance. In May 2012, a ~45 m³ rockfall originated from the slide toe and stopped within a few meters from the highway, making local authorities suddenly aware of the impending hazard. A variety of investigations, including in situ/remote sensing displacement monitoring, repeat topographic surveying, and finite-element analysis, were thus undertaken to gain insights into the ongoing instability mechanisms. These specifically focused on the kinematic styles, damage patterns, and overall modes of failure of two highly precarious blocks having a volume more than 10³ m³, providing a foundation for the development of mitigation and early-warning strategies.

Il seminario, aperto a tutti i colleghi del DISAT, potrà essere seguito anche da remoto al link:

https://unimib.webex.com/unimib/j.php?MTID=m7bb0f5764058c3b46be7501ef91f799e

Per informazioni: federico.agliardi@unimib.it