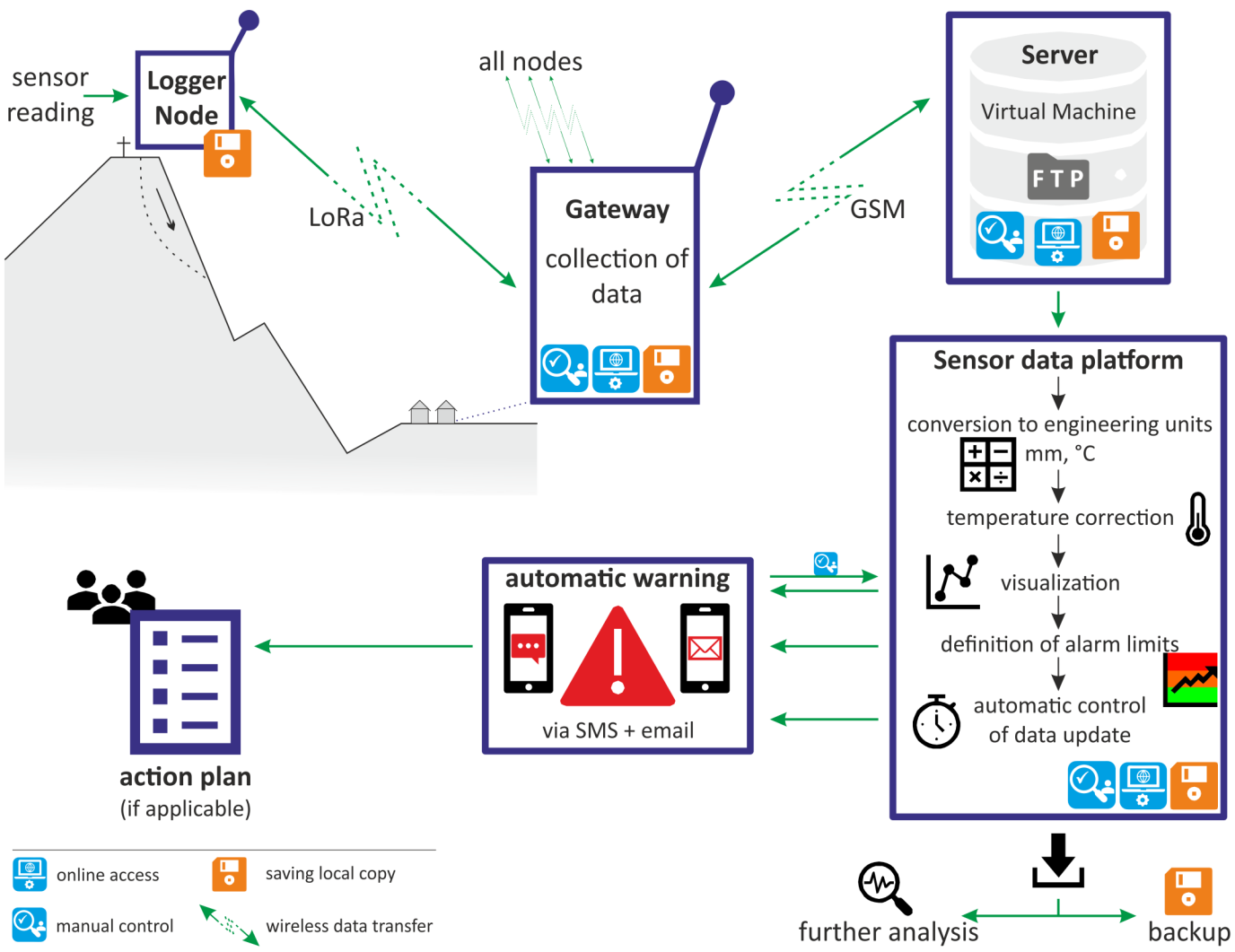
Process dynamics, real time monitoring and early warning at an imminent cliff fall (Hochvogel, Allgäu Alps)

Johannes Leinauer[1], Benjamin Jacobs[1], Michael Krautblatter[1]
[1]Technical University of Munich, Chair of Landslide Research, Munich, Germany
johannes.leinauer@tum.de

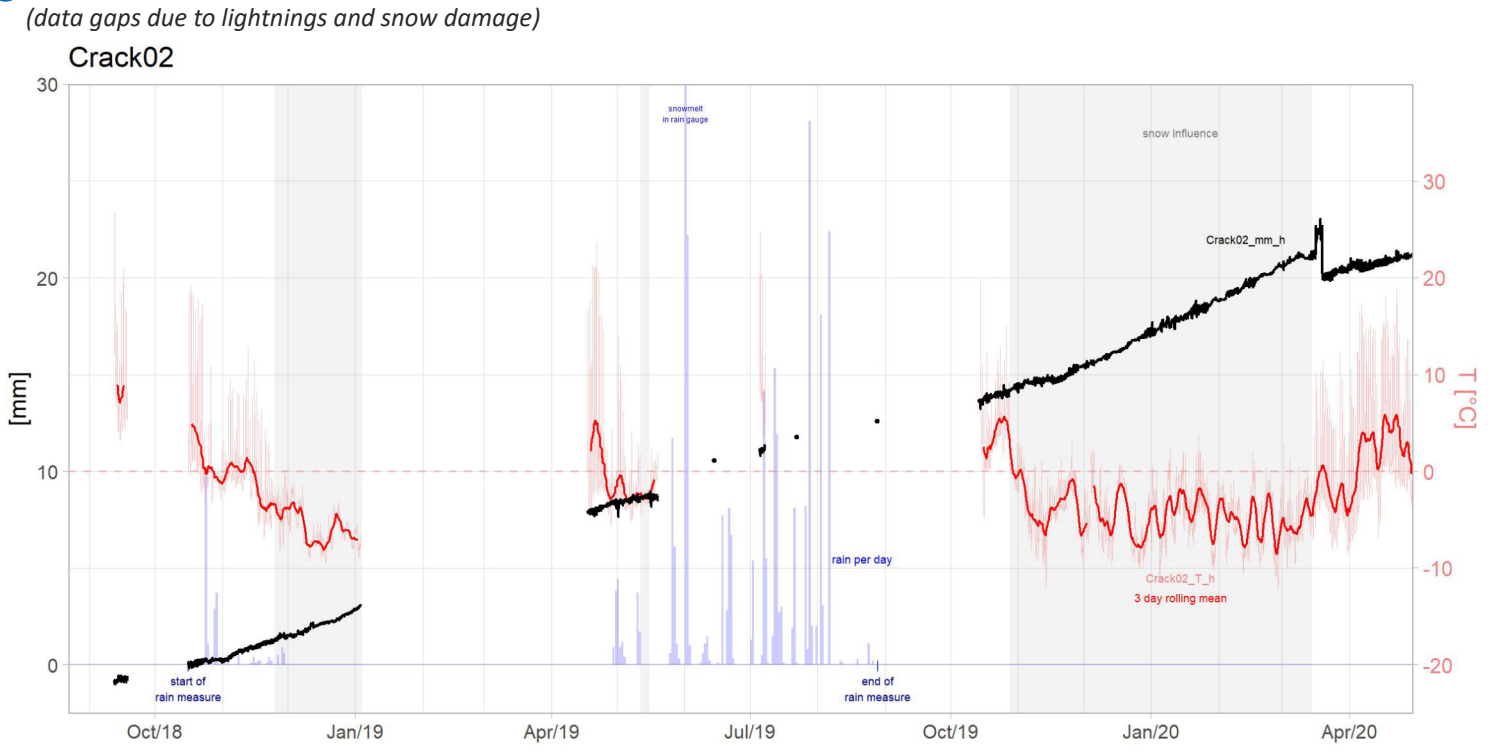
- (near) real-time high alpine monitoring system, developed within the AlpSenseBench project
- Hochvogel: rock slope failure at the summit currently in its preparation
- >200,000 m³ of potential failure volume

setup and data flow of the Hochvogel system



example high resolution crackmeter data

(data gaps due to lightnings and snow damage)



crackmeter data with stronger snow influence (crackmeter beeing puched down)

(data gaps due to lightnings and snow damage)

upcoming tasks

- improve data filtering
- quantify and improve reliability
- decipher anticipative signals of an alpine rock slope failure
- combine geotechnical measurements with geodetic, photogrammetric and seismic measurements