

Metadata Report

Project Name

Survey of Pamir Frontal Thrust fault, trench site T1, Alai Valley, Kyrgyzstan, July 2017.

Summary

UAV survey of trenching site to measure the vertical and horizontal offsets across a fault scarp.

This dataset is part of extended trenching study along the central segment of the Pamir Frontal Thrust fault.

Data Collectors

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Processing and upload:

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Site Information

The Achyk-Suu trenching site T1 is situated on alluvial-fan deposits at the westernmost end of the cPFT. Trench T1 is part of an abandoned gravel pit that was excavated in the faulted alluvial-fan deposits close to the village of Achyk-Suu. The trench consisted of a 7-m-long and up to 3-m-deep east wall across the 14-m-high fault scarp in the eastern part of the pit.

Survey objective: Paleoseismology

Survey date: 2017-07-25

Site location: 39.475834°N 72.498149°E

Survey Info

UAV: DJI Phantom 2

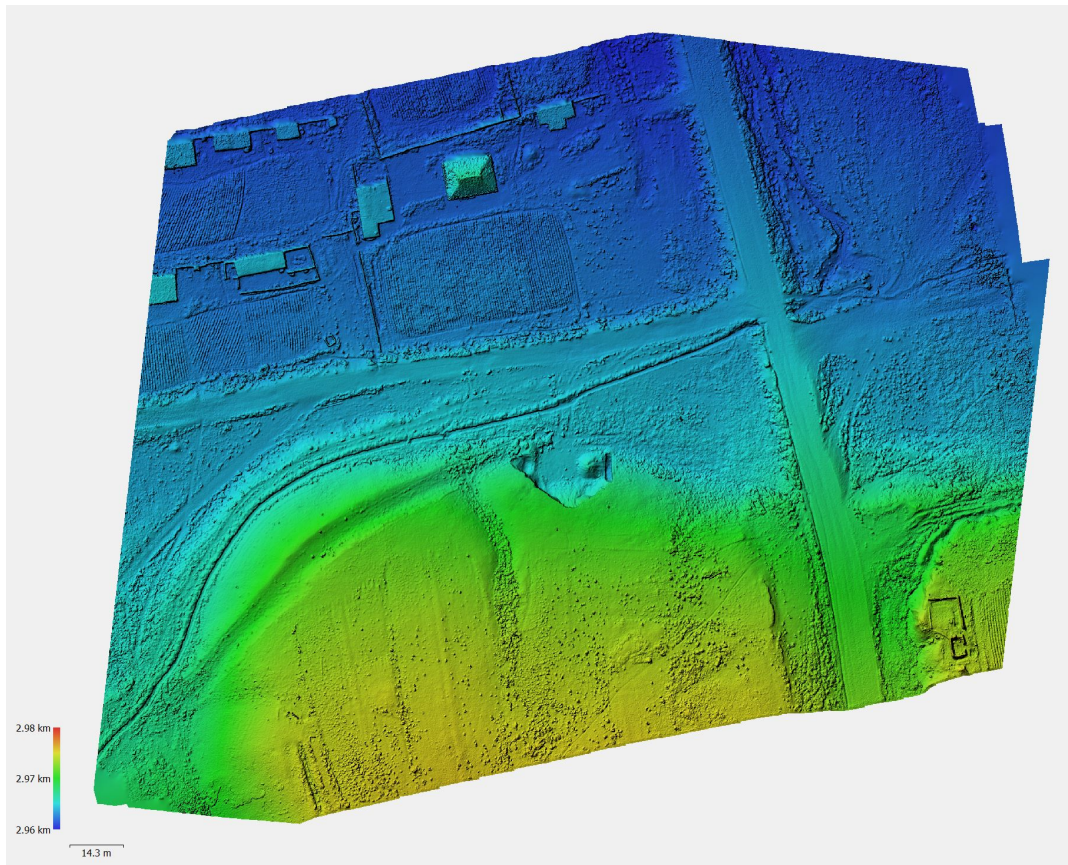
Flight altitude: 60-80 m

Camera photo resolution: 4000 x 3000 px

Positioning: global navigation satellite system (GNSS) with a 10 m accuracy; ground control points measured with RTK DGPS

Survey method: Structure-from-Motion from UAV aerial images

SfM software: AgiSoft Photoscan Professional



Product info

Number of photos: 180

Number of ground control points: 10

Number of tie points: 63,496

Dense cloud: 111,077,002

DEM size: 2589 x 2479

DEM resolution: 0.1 m/px

Coordinate system of dataset: WGS 84 UTM Zone 43N (ESPG:32643)

Orthophoto resolution: 0.05 m/px

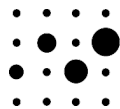
Misc Notes

Funding: This project is part of the CaTeNA-project within the Client II program of and funded by the Federal Ministry of Education and Research (BMBF; Sub-project grant 03G0878E to Manfred Strecker). Part of this work was supported by the Volkswagen Foundation grant AZ 86860 to O. Korup.

Our fieldwork was kindly supported by the Institute of Seismology at the National Academy of Science of Kyrgyzstan (Bishkek, Kyrgyzstan).



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Related work: this dataset is included in a doctoral thesis of Magda Patyniak