Master's Thesis

Microfacies in Anisian (Middle Triassic) carbonates of Nevada, USA

Geowissenschaftliche Sammlung of the University of Bremen.

Keywords: Anisian (Middle Triassic), lithostratigraphy, carbonate microfacies, chemostratigraphy, paleoenvironment

The Anisian (Middle Triassic) sediments that crop out in a few mountain ranges in northwestern Nevada, USA, were deposited in a rather shallow part of the Panthalassic Ocean. Of particular interest to this study is the Fossil Hill Member (Star Peak Group), which is a fossil-rich sequence with alternate layers of carbonates and marlstones.





In the course of the DFG-project "The Anisian (Middle Triassic) Ammonoids of Nevada - An Integrated Approach to understand Morphological Change" a first field campaign took place in summer of 2017. We measured lithostratigraphic sections and collected rock samples and fossils. The former will be processed to thin sections. We are currently looking for a Master's student to investigate the carbonate microfacies and/or the chemostratigraphy (δ^{13} C) of the measured sections in Nevada, USA. The integration of chemostratigraphy is expected to tighten the biostratigraphical scheme and provide a better understanding of the paleoenvironmental conditions.

About you:

You should have a background in geology with some basic knowledge of stratigraphy, chemostratigraphy, sedimentology, and paleontology. We expect you to be able to work independently, but also as a member of a group and a common goal. In the summer of 2018 we will return to Nevada to continue with the fieldwork. Therefore, the scope of this proposed Master's project is still open to some extent. You are of course very welcome to incorporate your own ideas.

Interested?

Please send inquiries or a brief expression of interest to Jens Lehmann (jens.lehmann@uni-bremen.de) and/or Eva Bischof (bischof@uni-bremen.de).

