Module title: Level One Module Working Methods (LGy)
Abbreviation: 09-GeoGy-AM-MT-102-m01

Module coordinator: Managing Director of the Institute of Geography and Geology
Module offered by: Institute of Geography and Geology

ECTS: 10
Method of grading: numerical grade
Only after succ. compl. of module(s): --

Duration: 1 semester
Module level: undergraduate
Other prerequisites: --

Contents:
Regarding the compulsory area: Introduction to "Cartography" and to the collection and processing of geodata. Core compulsory courses: a) quantitative or qualitative regional analysis or b) working methods system solid earth. Concerning a) Procedure of quantitative area studies, multivariate statistical processes, processes of regional modelling and simulation. Or: Processes of qualitative social and regional research. Presentation and discussion of methods, criticism of methods. Application of methods based on typical examples. Concerning b) Basic observations on geological materials that can already be made in the field and which can lead to a first interpretation of geological processes, which took place, as well as the creation of value of geomaterials. Students will be provided with distinctive features and characteristics of the most important rock-forming and economically relevant minerals by means of selected visuals. Subsequently, the classification of the most important sedimentary, igneous and metamorphic rock types will be elucidated and practised on the basis of their in the handpiece identifiable mineral existence and structure. Or: In the following modular section, the understanding of two-dimensional display of three-dimensional display of geological phenomena like the geographical distribution of different rock types or tectonic structures will be developed in form of geological maps and sections as well as simple structural-geological diagrams.

Intended learning outcomes:
Mandatory part: Basics of Cartography and use of geodata. Mandatory course: Quantitative and procedural skills will be applied to regional-analytical methods, skills of evaluation and assessment of the application and efficiency of processes. Students will be able to identify the most important mineral types in the handpiece and name and interpret rock samples, as far as it is possible without using additional analytical tools, correctly. or: They will possess the ability to interpret geological maps properly and to display geological field observations in maps, profiles and appropriate diagrams.

Courses (type, number of weekly contact hours, language — if other than German)
This module has 5 components; information on courses listed separately for each component.
- 09-KART-1-082: V + T (no information on language and number of weekly contact hours available)
- 09-MT3-1-082: S (no information on language and number of weekly contact hours available)
- 09-MT3-2-082: Ü (no information on language and number of weekly contact hours available)
- 09-MT2-1-082: Ü (no information on language and number of weekly contact hours available)
- 09-MT4-2-102: S (no information on language and number of weekly contact hours available)

Method of assessment (type, scope, language — if other than German, examination offered — if not every semester, information on whether module is creditable for bonus)
This module has the following 5 assessment components. To pass the module as a whole students must pass the first assessment component and one of the remaining four.

Assessment in module component 09-KART-1-082: Kartographie und Geodaten (Cartography and Geodata)
- 5 ECTS credits, numerical grading
- written examination (approx. 75 minutes) and practice work (approx. 30 hours for creating approx. 3 maps or diagrams); weighted 1:1

Assessment in module component 09-MT3-1-082: Mineral- und Gesteinsbestimmung (Mineral and Rock Identification)
- 5 ECTS credits, numerical grading
- written or oral examination of one candidate each (30 minutes each)
Assessment in module component 09-MT3-2-082: Geologische Karten und Strukturen (Geological Maps and Structures)
- 5 ECTS credits, numerical grading
- written or oral examination of one candidate each (approx. 30 minutes each) or term paper (approx. 20 pages)

Assessment in module component 09-MT2-1-082: Theorien, Methodologie, Modelle der Humangeographie (Theories, Methods and Modelling in Human Geography)
- 5 ECTS credits, numerical grading
- written examination (45 minutes) and presentation (approx. 20 minutes), weighted 1:1

Assessment in module component 09-MT4-2-102: Qualitative Regionalanalyse (Qualitative Regional Analysis)
- 5 ECTS credits, numerical grading
- a) presentation (approx. 30 minutes) with written elaboration (approx. 20 pages), weighted 1:1 or b) 2 short presentations (10 minutes each) and one portfolio (including approx. 5 logs of practical exercises as well as approx. 3 exercises), weighted 1:1:2

Allocation of places

Additional information

Referred to in LPO I (examination regulations for teaching-degree programmes)
§ 66 (1) 2. Geographie Methoden der Geographie

Module appears in
First state examination for the teaching degree Gymnasium Geography (2009)