

Kontext:

Jan Cermak hat zum Wintersemester 2016/2017 die Professur für Geophysikalische Fernerkundung angetreten. Er ist am Institut für Photogrammetrie und Fernerkundung (IPF, Campus Süd) sowie am Institut für Meteorologie und Klimaforschung (IMK-ASF, Campus Nord) angesiedelt. Mehr zu seiner Arbeit: <http://orcid.org/0000-0002-4240-595X>

Eckdaten zur Veranstaltung:

- Vorlesung Donnerstag 9:45-11:15, Raum 029 (Geb. 20.40)
- Übung nach Vereinbarung
- Kann auch auf Deutsch angeboten werden

Kontakt und Anmeldung: jan.cermak@kit.edu

Module:	Remote Sensing of a Changing Climate
Code of module:	
Coordinator of module:	Jan Cermak
Level:	
Credits:	3+1
SWS	2V + 1Ü
Degree program and subject:	
Duration of module:	1 semester
Exam:	The assessment consists of an oral exam (20 min.) according § 4 para. 2 No. 2 SPO M.Sc. Geodäsie und Geoinformatik or a written exam (90 min.) according § 4 para. 2 No. 1 SPO M.Sc. Geodäsie und Geoinformatik.
Particularities of exam:	Successful completion of exercises is a requirement for exam participation.
Grade of module:	The grade of the module is the grade of the exam.
Requirements:	-
Preconditions:	-
Recommendation:	Knowledge in geosciences/climate and statistics are helpful.
Objectives:	Students explain the contribution of remote sensing to the assessment of climate change and its consequences in time and space. They relate how remote sensing assessments help further the understanding of processes driving global change. Students independently choose and apply methods and data sets suited for the analysis of specific aspects of global change.
Workload:	Total workload: 120 hours Contact hours: 45 hours - courses plus course-related examination - field work in the monitoring project Self-study: 105 hours - consolidation of subject by recapitulation of lectures - consolidation of subject by use of references and by own inquiry - preparation of the monitoring project

	<ul style="list-style-type: none"> - data analysis and data processing - preparations for exam
Content:	<ul style="list-style-type: none"> - Basics of global change: Mechanisms and patterns - Remote sensing approaches to analysing patterns of global change: <ul style="list-style-type: none"> ○ Land and ocean surface ○ Atmosphere - Remote sensing approaches to analysing mechanisms of global change <ul style="list-style-type: none"> ○ Land and ocean surface ○ Atmosphere - Links between remote sensing and other methods in global-change research
Offered partial items of module (exams and transcripts related to lectures/labs):	