

Modulcode	AEF-agr826
Nr. für Prüfungsanmeldung/QIS	Konto 64900 mit PL 64910
Modulname	Prinzipien der Hydraulik von Flüssen und Seen
Modulname - englisch	Principles of Hydraulics of Rivers and Lakes
Studiengang und -abschnitt	M.Sc./fachrichtungsübergreifendes Wahlpflichtmodul
Studiengang und -abschnitt	MSc Agricultural Sciences, MSc Environmental Management, MSc Ecohydrology, MSc Applied Ecology
Häufigkeit des Angebots	yearly in WS
Modulverantwortlicher	Prof. Dr. N. Fohrer
Studienberatung zum Modul	Prof. Dr. N. Fohrer, Dr. H. Messal
Lehrveranstaltungen und Dozenten	<p>Lecture: Hydraulic Processes in Rivers and Lakes, Prof. Dr. N. Fohrer by Dr. H. Messal and guests lectures</p> <p>Practice: Hydraulic Modelling, Prof. Dr. N. Fohrer by Dr. H. Messal and Anne Krischker</p> <p>Excursion: Hydraulic Measurements, Prof. Dr. N. Fohrer by Dr. H. Messal and Anne Krischker</p>
Vorkenntnisse	Basics of Hydrology, Basic Knowledge of Personal Computers
Sprache	English
Plätze	unlimited, Application up to 27 th October 2014 at Dr. H. Messal, hmessel@hydrology.uni-kiel.de
Lehrformen (Präsenzstunden/Workload)	Lecture (45 h / 135 h), Practice (10 h / 30 h), Excursion (10 h / 15 h)
Ablauf	weekly in the lecture period
Art und Gewichtung der Prüfungsleistungen	Protocol: 100 % – Prof. Dr. N. Fohrer by Dr. H. Messal
European Credit Points des Moduls	6
Ziele des Moduls	The students apply hydraulic measurements in rivers and lakes. They are familiar with hydraulic methods and understand basic processes of river hydraulics and lakes. They can carry out hydraulic measurements and morphological mapping; They are able to apply basic hydraulic software and to interpret the results.
Inhalte des Moduls	Fundamentals of hydraulics and morphology, hydraulic phenomena of rivers and lakes, overview of mathematical descriptions of flow processes in rivers and lakes, lake retention, river and lake restoration measures, parameterization and application of a one-dimensional river model, water physics.
Vermittelte Kompetenzen	professional, learning, methodological and practical competence
Studienhilfsmittel	Online-documentation of the transparencies and slides of the lecture, http://www.hydrology.uni-kiel.de ; Houghtalen, R. J.; Hwang, N. H. C.; Akan, A. O.: „Fundamentals of Hydraulic Engineering Systems: International Version“;