wir906 - Resource and Energy Economics

Module label: Resource and Energy Economics
Module code: wir906
Credit points: 6.0 KP
Workload: 180 h

Used in course of study:
- Master's Programme Sustainability Economics and Management > Basic and Accentuation Modules
- Master's Programme Water and Coastal Management > Socioeconomics

Contact person:
Module responsibility:
- Christoph Böhringer

Authorized examiners:
- Die im Modul Lehrenden

Module counseling:
- Emmanuel Asane-Otoo
- Jan Schneider

Entry requirements:
Skills to be acquired in this module:
- Understanding the (normative) problems of resource use
- Rationales and instruments for policy intervention into (energy) markets
- Command of analytical methods (incl. role of analytical and numerical models in policy analysis)
- Ability to judge energy policy issues based on sound economic analysis (theory)
- Ability to quantify the relevance of arguments (empirics).

Module contents:
The course deals with the following subjects: Resource economics - Economics of sustainable resource use, methods of resource economics, non-renewable resources, renewable resources, Energy economics - Markets and regulation: competitive markets as efficiency benchmark; market failures as a rationale for regulation - Fundamentals of energy system/market analysis: definitions and concepts; energy statistics and balances; elasticities and incidence of policy interference - Market imperfections and regulatory design: environmental externalities, imperfect competition - Electricity markets: supply, demand, market interactions, market failures and regulatory responses.

Methods of teaching: The course is designed as a lecture that teaches the relevant methods, concepts and models and illustrates them with reference to practical examples.

Reader's advisory:
Steven Stoft, Power System Economics : Designing Markets for Electricity, New York 2002;
IEA: World energy outlook, annual.

Links:
Language of instruction: English
Duration (semesters): 1 Semester
Module frequency: yearly
Module capacity: unlimited
Moduleart: je nach Studiengang Pflicht oder Wahlpflicht
Lern-/Lehrform / Type of program: Lectures
Vorkenntnisse / Previous knowledge:
Examination:
Final exam of module:
Course type: Lecture
Lecture: Comment: 4.00
Time of examination: Frequency: 56 h
Type of examination: Written exam
Workload attendance: 56 h
Seminar: 0 h
Total time of attendance for the module: 56 h