## Partial and General Equilibrium Modeling

<table>
<thead>
<tr>
<th>Code: APO-210</th>
<th>Workload (h)</th>
<th>Credits (LP)</th>
<th>Duration</th>
<th>Turnus</th>
</tr>
</thead>
<tbody>
<tr>
<td>POS: 749142040</td>
<td>180</td>
<td>6</td>
<td>1</td>
<td>SS</td>
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</tbody>
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**Coordinator**
PD Dr. Wolfgang Britz

**Lecturers**
PD Dr. Wolfgang Britz

**Teaching unit(s)**
Agrar-, Forst- und Ernährungswissenschaften

### Usability
- **Course program**: M.Sc. Agricultural and Food Economics
- **Mode**: WPF
- **Study semester**: 2.

### Learning objectives
With the completion of this course, the students have acquired advanced competence in the concepts, formulation and interpretation of theory-based partial and general equilibrium models for policy analysis. Furthermore, they have been introduced to the General Algebraic Modelling System (GAMS) and are capable of independently modifying market-scale economic simulation models in this modelling language.

### Key competences
Conceptualization of market-scale problems, computer programming, quantitative analysis of policy instruments

### Learning content
1) Introduction to GAMS
2) Profit and utility maximization in GAMS
3) Key elements of Multi-Commodity market models (MCM)
4) Flexible functional forms and parameter calibration, welfare analysis
5) Modelling international trade: point markets, spatial arbitrage, Armington approach
6) Simulation exercises with selected MCMs
7) The structure of a Social Accounting Matrix
8) Key elements of Computable General Equilibrium model (CGE)
9) Simulation exercises with selected CGE models

### Language
English

**Prerequisites**
Modul BAS -130 or equivalent

### Maximum number of students

### Courses

<table>
<thead>
<tr>
<th>Teaching method</th>
<th>Topic</th>
<th>Class size</th>
<th>Contact time per week</th>
<th>Workload [h]</th>
</tr>
</thead>
<tbody>
<tr>
<td>V Ü</td>
<td>Simulation Models for Policy Analysis (ratio V:Ü 3:1)</td>
<td>15</td>
<td>4,0</td>
<td>180</td>
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### Examination(s)

<table>
<thead>
<tr>
<th>Code</th>
<th>Type of examination</th>
<th>Duration of examination</th>
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<tbody>
<tr>
<td>749142049</td>
<td>Written exam (50%)</td>
<td>60 min semesterbegleitend</td>
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<tr>
<td>749142048</td>
<td>Assignments (to be solved in groups) (50%)</td>
<td>graded</td>
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### Prerequisites for admission to the exam
None

### Other

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