Georg-August-Universität Göttingen **Module M.WIWI-QMW.0026: Development Macroeconometrics**	6 C 4 WLH

Learning outcome, core skills: Upon successful completion of the course, students will be able to: • discuss the strengths and weaknesses of contemporary macroeconometric tools that are widely applied in development economics, • apply these macroeconometric methods on real world data using the statistical software Stata and interpret estimation results, • take tabular data, clean it, and run several inferential statistical analyses using Stata, • identify and explain the most important determinants of growth, poverty and inequality that have been receiving robust empirical support, • critically review published articles in development economics.	**Workload:** Attendance time: 56 h Self-study time: 124 h

Courses:	

1. Development Macroeconometrics (Lecture)
Contents:
 	
1. Introduction to growth theory
2. Econometrics of growth
 	
    a. Pure cross sectional regressions,
    b. Panel data approaches: pooled OLS, fixed effects estimator, random effects estimator, difference and system GMM estimators, mean-group and panel mean group estimators
    c. Time series approaches: unit root tests, cointegration tests, estimation of the long run parameters, Vector autoregressive models, vector error correction model, Granger causality
    d. Panel generalizations of time series approaches: panel unit root and cointegration tests, panel dynamic OLS
3. Introduction to poverty and inequality
4. Econometrics of inequality
 	
    a. Macro-level approaches: model specifications of selected papers on the link between inequality and economic growth
	2 WLH

2. Development Macroeconometrics (Exercise) *Contents*: The exercise starts with an introduction to Stata. Subsequent sessions are devoted to applying the econometric tools discussed in the lecture on empirical data, thereby deepening the students' understanding of the econometric methods. Following the topics discussed in the lecture, students will receive exercises (accompanied by real data) that they should try to solve using Stata before coming to the Stata session, where we will solve the exercises together. Stata do-files will be made available at the end of each session.	2 WLH

Examination: Written examination (90 minutes) or oral examination (approx. 20 minutes)	6 C

Examination requirements:	
In the exam, students are expected to show their familiarity with and understanding of main macroeconometric tools used in the research on growth and inequality. In addition to the economic and econometric concepts, they are expected to write Stata codes for solving a given empirical question and interpret Stata outputs.	

Admission requirements:	Recommended previous knowledge:
none	M.WIWI-QMW.0004 Econometrics I
Language:	**Person responsible for module:**
English	Prof. Dr. Helmut Herwartz
Course frequency:	**Duration:**
irregular	1 semester[s]
Number of repeat examinations permitted:	**Recommended semester:**
twice	2 - 4
Maximum number of students:	
30	