**Санкт-Петербургский филиал федерального государственного   
автономного образовательного учреждения высшего образования   
"Национальный исследовательский университет**

**"Высшая школа экономики"**

Факультет Санкт-петербургская школа экономики и менеджмента

Департамент менеджмента

**Рабочая программа дисциплины**  
Макроэкономика

(Macroeconomics)

для направления 38.06.01 «Экономика»

подготовки научно-педагогических кадров в аспирантуре,

образовательная программа «Менеджмент», «Экономика»

Разработчик(и) программы:

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Санкт-Петербург, 2019

*Настоящая программа не может быть использована другими подразделениями университета и другими вузами без разрешения кафедры-разработчика программы.*

**Аннотация**

|  |  |  |  |
| --- | --- | --- | --- |
| Название дисциплины | **Макроэкономика** | | |
| Образовательная программа | Экономика, Менеджмент | | |
| Тип дисциплины[[1]](#footnote-1) | По выбору | | |
| Требования к уровню знаний студентов, необходимых для освоения дисциплины (пререквизиты) | Эмпирические методы и их применение в экономике и менеджменте  Микроэконометрика и панельные данные | | |
| Объем з.е. | 3 | | |
| Объем в часах | Аудиторная работа | Самостоятельная работа | Всего |
| 36 | 78 | 114 |
| Краткое описание курса | Курс ориентирован на развитие у аспирантов исследовательских навыков в области макроэкономики. Кроме этого аспиранты знакомятся с передовыми исследованиями и концепциями в макроэкономике. Материалы дисциплины охватывают основные теории и модели, а также их применение к различным областям макро. В дополнение, студентам потребуется развивать свои навыки по работе с макроэкономическими моделями. | | |
| Образовательные результаты по дисциплине | Студенты должны уметь читать и понимать научные статьи по макроэкономике;  Студенты будут способны критически оценивать последние исследования по макроэкономике;  Студенты будут способны проводить собственные исследования по макроэкономике. | | |
| Краткое содержание дисциплины | Основы макроэкономики  Неоклассические модели экономического роста  Модели эндогенного экономического роста  Модели долгосрочного роста в экономике с множеством отраслей  Экономический рост и неравенство доходов  Деловые циклы  Микроэкономические основы кривой AD-AS  Безработица  Дополнительные главы по исследованию деловых циклов  Стабилизационная политика | | |
| Образовательные технологии | Итоговая оценка=0.3\* Тест 1+0.3\*Тест 2+0.4\*Экзамен  **Краткое описание форм контроля:**  Тест 1 и тест 2:студентам необходимо найти решения к предложенному перечню задач. Задачи могут предполагать проверку различных свойств макроэкономических моделей, поиск доказательств теорем, написание коротких и критических эссе о макро моделях.  Экзамен:студентам необходимо найти решения к предложенному перечню задач. Задачи могут предполагать проверку различных свойств макроэкономических моделей, поиск доказательств теорем, написание коротких и критических эссе о макро моделях. | | |
| Формы контроля | Mandatory  Ljungqvist, Lars, and Thomas J. Sargent. *Recursive Macroeconomic Theory*, MIT Press, 2012. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3339507>.  Optional  Barro, Robert J., and Xavier I. Sala-i-Martin. *Economic Growth*, MIT Press, 2003. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3338813>.  Aghion, Philippe, and Peter W. Howitt. *Endogenous Growth Theory*, MIT Press, 1997. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3338812> | | |
| Литература | Final grade=0.3\* Test 1+0.3\*Test 2+0.4\*Exam  **List of possible assignments:**  Test 1 and test 2: students have to find solutions for the list of exercises. Exercise might be about examining different properties of macroeconomic models, finding proofs for simple theorems, writing short and critical paragraphs about macroeconomic models  Exam: students have to find solutions for the list of exercises. Exercise might be about examining different properties of macroeconomic models, finding proofs for simple theorems, writing short and critical paragraphs about macroeconomic models | | |
| Преподаватель | Ущев Ф. А., [fuschev@hse.ru](mailto:fuschev@hse.ru) | | |

**Course Syllabus**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Title of the course | | **Macroeconomics** | | | | | | |
| Title of the Academic Programme | | Economics, Management | | | | | | |
| Type of the course | | Elective | | | | | | |
| Prerequisites | | Microeconomics and Panel Data  Empirical Methods and Applications in Economics and Management | | | | | | |
| ECTS workload | | 3 | | | | | | |
| Total indicative study hours | | Directed Study | | Self-directed study | | | Total | |
| 36 | | 78 | | | 114 | |
| Course Overview | | This course trains students with advanced research skills in macroeconomics and brings them to the research frontier. The course discusses primary models in macroeconomics research with different applications. To find solutions for the selected problems students use classic ‘by pencil’ methods. | | | | | | |
| Intended Learning Outcomes (ILO) | | -Students have to be able to read and understand research papers in macroeconomics;  -Students have to be able to critically analyze current research in macroeconomics;  -Students have to be able to comprehensive studies based on system research approach. | | | | | | |
| Teaching and Learning Methods | | Paper presentation;  In-class discussions;  Reading papers. | | | | | | |
| Content and Structure of the Course | | | | | | | | |
| **№** | **Topic / Course Chapter** | | **Total** | | **Directed Study** | | | **Self-directed Study** |
| **Lectures** | **Tutorials** | |
| 1 | A primer in macroeconomics | | 9 | | 1 | 2 | | 6 |
| 2 | Neoclassical growth models | | 11 | | 1 | 2 | | 8 |
| 3 | Endogenous growth | | 11 | | 1 | 2 | | 8 |
| 4 | Long-run growth in multi-sector economies | | 11 | | 1 | 2 | | 8 |
| 5 | Economic growth and income inequality | | 11 | | 1 | 2 | | 8 |
| 6 | Business cycles | | 11 | | 1 | 2 | | 8 |
| 7 | Micro-founding AD-AS curve | | 11 | | 1 | 2 | | 8 |
| 8 | Unemployment | | 13 | | 1 | 4 | | 8 |
| 9 | Alternative explanations of business cycles | | 13 | | 1 | 4 | | 8 |
| 10 | Stabilisation policy | | 13 | | 1 | 4 | | 8 |
| **Total study hours** | | | 114 | | 10 | 26 | | 78 |
| Indicative Assessment Methods and Strategy | | Final grade=0.3\* Test 1+0.3\*Test 2+0.4\*Exam  **List of possible assignments:**  Test 1 and test 2: students have to find solutions for the list of exercises. Exercise might be about examining different properties of macroeconomic models, finding proofs for simple theorems, writing short and critical paragraphs about macroeconomic models  Exam: students have to find solutions for the list of exercises. Exercise might be about examining different properties of macroeconomic models, finding proofs for simple theorems, writing short and critical paragraphs about macroeconomic models | | | | | | |
| Readings / Indicative Learning Resources | | Mandatory  Ljungqvist, Lars, and Thomas J. Sargent. Recursive Macroeconomic Theory, MIT Press, 2012. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3339507>.  Optional  Barro, Robert J., and Xavier I. Sala-i-Martin. Economic Growth, MIT Press, 2003. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3338813>.  Aghion, Philippe, and Peter W. Howitt. Endogenous Growth Theory, MIT Press, 1997. ProQuest Ebook Central, <https://ebookcentral.proquest.com/lib/hselibrary-ebooks/detail.action?docID=3338812> | | | | | | |
| Indicative Self- Study Strategies | | **Type** | | | | **+/–** | | **Hours** |
| Reading for seminars / tutorials (lecture materials, mandatory and optional resources) | | | | + | | 35 |
| Assignments for seminars / tutorials / labs | | | | + | | 35 |
| Preparation for the exam | | | | + | | 8 |
| Academic Support for the Course | | Academic support for the course is provided via LMS, where students can find: guidelines and recommendations for doing the course; guidelines and recommendations for self-study; samples of assessment materials | | | | | | |
| Facilities, Equipment and Software | | No | | | | | | |
| Course Instructor | | Philip A. Ushchev,[fuschev@hse.ru](mailto:fuschev@hse.ru) | | | | | | |

**Intended Learning Outcomes (ILO) Delivering**

|  |  |  |  |
| --- | --- | --- | --- |
| **Programme ILO(s)** | **Course**  **ILO(s)** | **Teaching and Learning Methods for delivering ILO(s)** | **Indicative Assessment Methods of Delivered ILO(s)** |
| be able to conduct comprehensive studies based on system research approach | Students have to be able to read and understand research papers in macroeconomics; | Seminars, Lecturers, Readings | Tests, Exams |
| be able to use economic research methods and theories in professional field | Students have to be able to critically analyze current research in macroeconomics; | Seminars, Lecturers, Readings | Tests, Exams |
| be able to conduct research activity in an educational institutions and management of students' research activity | Students have to be able to comprehensive studies based on system research approach. | Seminars, Lecturers, Readings | Tests, Exams |

**Course Content**

**Тема 1. A primer in macroeconomics.** Long-run vs short-run perspective. Aggregate indicators. Models as a basic tool. Examples of (building blocks of) macroeconomic models: neoclassical production function; capital accumulation equation; Keynesian cross; IS-LM; AD-AS. Microfounding a production function (Jones, 2005).

Anna Jones (2005) Culture and context: critical thinking and student learning in introductory macroeconomics, Studies in Higher Education, 30:3, 339-354, DOI: 10.1080/03075070500095788

**Тема 2. Neoclassical growth models.** Stylized facts about economic growth. Ramsey model: competitive equilibriunm and social optimum. Phase diagrams. Balanced growth path, speed of convergence. OLG models (Diamond, 1965) and dynamic inefficiency. Empirical application: convergence hypotyhesis and its various formulations (Barro and Sala-i-Martin, 1992). Spatial growth and spatial convergence (Ertur and Koch, 2007).

Diamond, Peter A. "National debt in a neoclassical growth model." TheAmericanEconomicReview 55.5 (1965): 1126-1150.

Barro, Robert J., and Xavier Sala-i-Martin. "Convergence." Journal of political Economy 100.2 (1992): 223-251.

Ertur, Cem, and Wilfried Koch. "Growth, technological interdependence and spatial externalities: theory and evidence." Journalofappliedeconometrics 22.6 (2007): 1033-1062.

**Тема 3. Endogenous growth.**Growth accounting. Horizontal innovation (Romer 1990, Grossman and Helpman 1991). Creative distruction (Aghion and Howitt, 1992).

Romer, Paul M. "Endogenous technological change." Journal of political Economy 98.5, Part 2 (1990): S71-S102.

Grossman, Gene M., and Elhanan Helpman. "Trade, knowledge spillovers, and growth." Europeaneconomicreview 35.2-3 (1991): 517-526.

Aghion, Philippe, and Peter Howitt. "A Model of Growth through." (1992).

**Тема 4. Long-run growth in multi-sector economies**: non-homothetic preferences (Matsuyama, 2019); directed technical change (Acemoglu, 2002); Dutch disease (Sachs and Warner, 1995; Matsuyama, 1992).

Matsuyama, Kiminori. "Engel's Law in the Global Economy: Demand‐Induced Patterns of Structural Change, Innovation, and Trade." Econometrica 87.2 (2019): 497-528.

Acemoglu, Daron. "Technical change, inequality, and the labor market." Journalofeconomicliterature 40.1 (2002): 7-72.

Sachs, Jeffrey D., et al. "Economic reform and the process of global integration." Brookingspapersoneconomicactivity 1995.1 (1995): 1-118.

Matsuyama, Kiminori. "Agricultural productivity, comparative advantage, and economic growth." Journalofeconomictheory 58.2 (1992): 317-334.

**Тема 5. Economic growth and income inequality**: stylized facts (Kuznets, 1955; Piketty and Saez, 2003). Measures of income inequality (Bourgignon, 1979; Matsuyama, 2003). Symmetry-breaking and endogenous inequality of nations (Matsuyama, 2004).

Kuznets, Simon. "Economic growth and income inequality." *TheAmericaneconomicreview* 45.1 (1955): 1-28.

Piketty, Thomas, and Emmanuel Saez. "Income inequality in the United States, 1913–1998." The Quarterly journal of economics 118.1 (2003): 1-41.

Bourgignon, François. "Decomposable inequality measures." *Econometrica* 47.4 (1979): 901-920.

Matsuyama, Kiminori. "Financial market globalization, symmetry‐breaking, and endogenous inequality of nations." Econometrica 72.3 (2004): 853-884.

**Тема 6. Business cycles.** Unpredictable shocks propagation: the Frisch-Slutsky paradigm. The AD-AS approach to studying business cycles. Stylized facts about business cycles: persistence, volatility, and comovements of macroeconomic time series. Procyclical and countercyclical macroeconomic variables.

**Тема 7. Micro-founding AD-curve: intertemporal consumer behavior**. Stylized facts about consumption. Standard I. Fisher's intertemporal choice model. Euler equation. Permanent vs transitory income (Friedman, 1970). Random walk hypothesis (Hall, 1978). Precautionary saving (Kimball, 1990). The role of interest rate. Keynes-Ramsey rule.

Friedman, Milton. "A theoretical framework for monetary analysis." journal of Political Economy 78.2 (1970): 193-238

Hall, Robert E. "Stochastic implications of the life cycle-permanent income hypothesis: theory and evidence." Journalofpoliticaleconomy 86.6 (1978): 971-987.

Kimball, Miles S. "Precautionary Saving in the Small and in the Large." Econometrica 58.1 (1990): 53-73.

**Тема 8. Micro-founding AD-curve: q-theory of investment**. Stylized facts about investment. A primer in financial markets: efficient market, fundamental value of a firm, Tobin's q. Failure of the standard microeconomic firm-theory approach to investment. Installation cost model (Hayashi, 1985). Forward-looking firm's behavior. Effects of permanent vs temporary capital taxation and/or a permanent vs temporary reduction of the interest rate.

Hayashi, Fumio. "The permanent income hypothesis and consumption durability: analysis based on Japanese panel data." The Quarterly Journal of Economics 100.4 (1985): 1083-1113.

**Тема 9.** **Micro-founding AS-curve: the role of expectations**. Stylized facts about money and inflation. Adaptive vs rational expectations. Phillips curve, its emergence, disappearance, and resurrection. The role of private information: Lucas supply curve. Monetary policy and the Lucas critique.

**Тема 10. Unemployment.** Stylized facts about unemployment. Labor market and search frictions (Mortensen and Pissarides, 1994).

Mortensen, Dale T., and Christopher A. Pissarides. "Job creation and job destruction in the theory of unemployment." Thereviewofeconomicstudies 61.3 (1994): 397-415.

**Тема 11.** **Alternative explanations of business cycles**. Granular origins of aggregate fluctuations (Gabaix, 2011). Network origins of aggregate fluctuations (Acemoglu et al., 2012). Endogenous firm entry driving business cycles (Bilbiie et al., 2012).

Gabaix, Xavier. "The granular origins of aggregate fluctuations." Econometrica 79.3 (2011): 733-772.

Acemoglu, Daron, and James A. Robinson. "Is This Time Different? Capture and Anti-Capture of US Politics." (2012).

Bilbiie, Florin O., Fabio Ghironi, and Marc J. Melitz. "Endogenous entry, product variety, and business cycles." *JournalofPoliticalEconomy* 120.2 (2012): 304-345.

**Тема 12.** **Stabilisation policy**. Objectives of and issues with stabilisation policy. Time inconsistency (Kydland and Prescott, 1977), the Gordon and Barro (1982) model.

Kydland, Finn E., and Edward C. Prescott. "Rules rather than discretion: The inconsistency of optimal plans." *Journal of political economy* 85.3 (1977): 473-491.

**Assessment Methodsand Criteria**

**Assessment Methods**

|  |  |  |  |
| --- | --- | --- | --- |
| **Types of Assessment** | **Forms of Assessment** | **Modules** | |
| **1** | **2** |
| Formative Assessment | Test | \* | \* |
| SummativeAssessment | Exam |  | \* |

**AssessmentCriteria**

**Sample test and exam**

1.     Consider a Solow economy that is on its balanced growth path. Assume for simplicity that there is no technological progress. Now suppose that the rate of population growth falls.

a.     What happens to the balanced-growth-path values of capital per worker, output per worker, and consumption per worker? Sketch the paths of these variables as the economy moves to its new balanced growth path.

b.     Describe the effect of the fall in population growth on the path of output (that is, total output, not output per worker).

2.     The major feature of the tax code that affects the user cost of capital in the case of owner-occupied housingintheUnitedStatesisthatnominalinterestpaymentsaretax-deductible. Thus the after-tax real interest rate relevant to home ownership is r − τi, where r is the pre tax real interest rate, i is the nominal interest rate, and τ is the marginal tax rate. In this case, how does an increase in inflation for a given r affect the user cost of capital and the desired capital stock?

3.     Describe how each of the following affect equilibrium employment and the wage in the Shapiro–Stiglitz model:

a.     An increase in workers’ discount rate, ρ.

b.     An increase in the job break up rate, b.

c.     A positive multiplicative shock to the production function (that is, suppose the production function is AF (L), and consider an increase in A).

4.     If the tax rate follows a random walk, then with probability 1 it will eventually exceed 100 percent or be negative. Does this observation suggest that the tax-smoothing model with quadratic distortion costs is not useful as either a positive or normative model of fiscal policy, since it has an implication that is both clearly incorrect as a description of the world and clearly undesirable as a prescription for policy? Explain your answer briefly.

**Tests and Exam**

|  |  |
| --- | --- |
| **Grades** | **Assessment Criteria** |
| «Excellent» (8-10) | Solutions follow academic standards and provide the readers with clear statements and conclusions. There are no mistakes in mathematics **and** in the code among all solutions. The solutions are reliable enough to be presented for the academic audience. |
| «Good» (6-7) | Solutions follow academic standards and provide the readers with clear statements and conclusions. There are tiny mistakes in mathematics **or** in the code among a couple solutions. There are a couple of solutions reliable enough to be presented for the academic audience. |
| «Satisfactory»(4-5) | Solutions follow academic standards and provide the readers with clear statements and conclusions. There are small mistakes in mathematics **and** in the code among a couple solutions. There are no solutions reliable enough to be presented for the academic audience. |
| «Fail» (0-3) | Solutions follow academic standards and provide the readers with clear statements and conclusions. There are mistakes in mathematics **and** in the code among the majority of solutions. There are no solutions reliable enough to be presented for the academic audience. |

**Recommendations for students about organization of self-study**

Self-study is organized in order to:

* Systemize theoretical knowledge received at lectures;
* Extendingtheoreticalknowledge;
* Learn how to use legal, regulatory, referential information and professional literature;
* Development of cognitive and soft skills: creativity and self-sufficiency;
* Enhancing critical thinking and personal development skills;
* Developmentofresearchskills;
* Obtaining skills of efficient independent professional activities.

Self-study, which is not included into a course syllabus, but aimed at extending knowledge about the subject, is up to the student’s own initiative. A teacher recommends relevant resources for self-study, defines relevant methods for self-study and demonstrates students’ past experiences.  Tasks for self-study and its content can vary depending on individual characteristics of a student. Self-study can be arranged individually or in groups both offline and online depending on the objectives, topics and difficulty degree. Assessment of self-study is made in the framework of teaching load for seminars or tests.

In order to show the outcomes of self-study it is recommended:

* Make a plan for 3-5 presentation which will include topic, how the self-study was organized, main conclusions and suggestions and its rationale and importance.
* Supply the presentation with illustrations. It should be defined by an actual task of the teacher.

**Recommendations for essay**

An essay is a written self-study on a topic offered by the teacher or by the student him/herself approved by teacher. The topic for essay includes development of skills for critical thinking and written argumentation of ideas. An essay should include clear statement of a research problem; include an analysis of the problem by using concepts and analytical tools within the subject that generalize the point of view of the author.

Essay structure:

1. *Introduction and formulation of a research question.*

2.*Body of the essay* and theoretical foundation of selected problem and argumentation of a research question.

3. *Conclusion* and argumentative summary about the research question and possibilities for further use or development.

**Special conditions for organization of learning process for students with special needs**

The following types of comprehension of learning information (including e-learning and distance learning) can be offered to students with disabilities (by their written request) in accordance with their individual psychophysical characteristics:

1. *for persons with vision disorders:* a printed text in enlarged font; an electronic document; audios (transferring of learning materials into the audio); an individual advising with an assistance of a sign language interpreter; individual assignments and advising.
2. *for persons with hearing disorders: a* printed text; an electronic document; video materials with subtitles; an individual advising with an assistance of a sign language interpreter; individual assignments and advising.
3. *for persons with muscle-skeleton disorders: a* printed text; an electronic document; audios; individual assignments and advising.

1. ***Notes:***

   Обязательный/повыбору [↑](#footnote-ref-1)