



Sustainability in Business & Economics

WFI

January 27, 2025

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Academic and Scientific Skills

Module title	Academic and Scientific Skills
Module title German	Wissenschaftliche Schlüsselqualifikationen
Module number	82-021-SBE01-H-0723
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Public Finance Economics, esp. Microeconomics
Module Coordinator	Prof. Dr. Dominika Langenmayr
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *After completing the module, students have comprehensive knowledge of the basics of academic work and the philosophy of science, as well as their applications in economics, management and sustainability research.*
- *Students learn how to deal responsibly and critically with scientific sources, as well as how to analyze and correctly use them in the context of academic work. They can apply this knowledge to their own scientific work.*
- *The students are able to structure their own research project, to work on it with scientific methods and to communicate the results in writing and orally within science as well as to other stakeholders and (social) media.*

Contents/Topics:

- *Actors and institutions of the science system*
- *Philosophy of science and hypothesis development in sustainability research*
- *Qualitative research methods*
- *Finding and evaluating literature*
- *Locating, evaluating and assessing other sources (judgements, statistics etc.)*

- *Project planning for academic projects*
- *Structure and style of academic papers*
- *Academic writing*
- *Correct citation*
- *Presentation techniques for different target groups*

The examples in the course relate to different topics on sustainable business, economics and social responsibility.

Formal requirements for participation:

- *Only students of the Bachelor Sustainability in Business & Economics B.Sc.*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lectures*
- *Workshops*
- *Discussions*
- *Independent scientific work, group work*

ECTS awarding criteria:

- *The students prepare a collection of coordinated performances on the contents of the module alone or in small teams during the semester.*

Workload / Distribution of ECTS credits:

- *30 h = Attendance time lectures and workshops*

- 30 h = Preparation and follow-up of lectures and workshops
- 30 h = Group meetings
- 60 h = Portfolio preparation
- 150 h = Total workload

Module grade:

- Portfolio

Polyvalence with other degree programs/accessibility notes: -

Remarks:

Readings:

- Theisen, M. R. (2021): *Wissenschaftliches Arbeiten*, 18. Edition, Vahlen, Munich.
- Further literature will be announced in the course.

Alternative Economies and Spaces

Module title	Alternative Economies and Spaces
Module title German	Alternative Economies and Spaces
Module number	
Level	Bachelormodul
Course rotation	SoSe
Degree program hosting the module	Geographie
Institutional anchoring	Mathematisch-Geographische Fakultät
Subjects involved	Wirtschaftsgeographie
Module Coordinator	Prof. Dr. Hans-Martin Zademach
Credit Points (ECTS)	5 ECTS-Punkte

Learning Outcomes:

- *Fähigkeit, sich grundlegende sowie zeitgenössische humangeographische Perspektiven und Forschungsansätze durch Erarbeitung von Lesetexten zu erschließen*
- *Fähigkeit zur kritischen Reflexion und Diskussion*
- *Fähigkeit zum autonomen, akademischen Selbststudium*
- *Fähigkeit, eine wissenschaftliche Fragestellung pointiert in Form eines Essays zu bearbeiten*

Contents/Topics:

- *Auf der Basis von Grundlagentexten bietet das Lektüreseminar zunächst eine Einführung in Grundbegriffe und Konzepte raumbezogenen Denkens. Daran anschließend werden verschiedene heterodoxe Perspektiven zur Analyse von Umweltveränderungen im politischen, gesellschaftlichen und ökonomischen Kontext in den Blick genommen (z.B. Politische Ökologie). Diese Betrachtungsweisen werden im Nachgang anhand aktueller wissenschaftlicher Publikationen zu Problemstellungen im Nachhaltigkeitskontext diskutiert.*
- *Im zweiten Teil des Moduls werden zeitgenössische sozialwissenschaftliche Forschungsansätze unter Einnahme einer räumlichen Perspektive behandelt. Eine zentrale Rolle spielen dabei das Forschungsfeld der Nachhaltigkeitstransitionen (Sustainability Transitions) sowie die Diskurse um alternative Ansätze des Wirtschaftens (u.a. Diverse Economies Framework sowie wachstumskritische Ansätze).*

Formal requirements for participation:

- *Keine*

Recommended requirements for participation::

- *Grundkenntnisse aus den Modulen "Humangeographie 1" und "Wirtschaft und Raum" sind hilfreich, können aber auch gut im Selbststudium nachgeholt werden*

Teaching and Examination language:

- *Deutsch*

Teaching methods/Course types:

- *Seminar (2 SWS)*

ECTS awarding criteria:

- *Abgabe einer Hausarbeit am Ende des Semesters*

Workload / Distribution of ECTS credits:

- *30 h = Regelmäßige Teilnahme am Seminar oder Selbststudium*
- *60 h = Vor-, Nachbereitung inkl. intensiver Erarbeitung von Lesetexten*
- *60 h = Hausarbeit*

Module grade:

- *Hausarbeit*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Teilnehmerbeschränkung 20*

Balancing and Business Taxation

Module title	Balancing and Business Taxation
Module title German	Jahresabschluss und Unternehmensbesteuerung
Module number	82-021-BWL14-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration, B. Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration and Business Taxation
Module Coordinator	Prof. Dr. Reinald Koch
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The lecture provides the fundamental regulation of German income taxation. With regard to the determination of income, the relevant provisions under German financial and tax accounting law are presented.*
- *Students gain the ability to solve income taxation cases and transfer their knowledge to new cases. In doing so, they also learn how to handle the relevant legal texts.*
- *Students learn to critically evaluate tax regulations and to reflect tax planning approaches against the background of ethical values.*
- *When participating successfully students have gained a comprehensive overview over the German income tax, corporation tax and trade tax regulations and know the interdependencies between these different types of taxes.*

Contents/Topics:

- *Fundamentals of financial and tax accounting*
- *Fundamentals of the individual income tax*
- *Fundamentals of the corporation tax*
- *Fundamentals of the trade tax*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Operational Accounting*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *performance record assessed with at least "sufficient":*
- *Exam (100%)*

Workload / Distribution of ECTS credits:

- *42 h = Contact/self-study in lecture and tutorial*
- *70 h = Preparation and follow-up (includes coursework)*
- *38 h = Preparation assessment*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *International Business Administration B.Sc.*

Remarks: -

Basic Principles of Financial Accounting according to IFRS

Module title	Basic Principles of Financial Accounting according to IFRS
Module title German	Grundlagen der internationalen Rechnungslegung
Module number	82-021-AC01-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration, Auditing and Management Accounting
Module Coordinator	Prof. Dr. Max Götsche
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *This module provides students with an introduction to IAS/IFRS accounting.*
- *They will gain an understanding of the different accounting concepts and will be able to assess and evaluate them.*
- *Students gain the ability to comprehend complex accounting cases in their entirety and solve them in accordance with the relevant IAS/IFRS standards.*
- *They learn how to handle relevant IAS/IFRS standards and their interpretations.*
- *After completing the module students are acquainted with the objects and general IFRS accounting principles as well as important IAS/IFRS standards and will be able to transfer this knowledge to real accounting cases.*

Contents/Topics:

- *Theory of IAS/IFRS*
- *Institutional frame of IFRS*
- *Outline concept*

- *Essential standards*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Accountancy and Cost Accounting*
- *Balancing and Business Taxation*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Interactive Lecture*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient": Final Exam 100 %.*

Workload / Distribution of ECTS credits:

- *21 h = Time of Attendance Lecture*
- *35 h = Preparation and postprocessing Lecture*
- *21 h = Time of Attendance Tutorial*
- *35 h = Preparation and postprocessing Tutorial*
- *38 h = Exam Preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration International B.Sc.*
- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Capital Market Theory

Module title	Capital Market Theory
Module title German	Kapitalmarkttheorie
Module number	82-021-AC04-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Finance and Banking
Module Coordinator	Prof. Dr. Thomas Mählmann
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *In this module, students learn basic techniques for the valuation of cash flows against the background of modern financial market research.*
- *Students will become familiar with common derivative financial instruments as well as the essential statements of portfolio theory.*
- *Students are also enabled to recognise and critically evaluate the effects of information asymmetries and taxes in investment and financing decisions.*
- *The accompanying exercise will contribute significantly to the development of these competences.*

Contents/Topics:

1. *Introduction: the relationship between corporate finance and financial markets*
- 2 *Preference-free valuation under security*
 - 2.1 *Basics of preference-free valuation under security*
 - 2.2 *Yield-to-maturity, spot rates, forward rates*
 - 2.3 *Interest rate structure theories*
- 3 *Preference-free valuation under uncertainty*
 - 3.1 *Fundamentals*
 - 3.2 *Forwards and futures*
 - 3.3 *Swaps*
 - 3.4. *Options*

3.5 Linear Factor Model

4. Portfolio optimisation and CAPM

5. Corporate finance

5.1 Corporate Finance and Risk Allocation in Perfect Markets

5.2 Financing decisions under market imperfections

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE)(2 SWS)*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient": for the exam (90 Minutes).*

Workload / Distribution of ECTS credits:

- *30 h = Time of attendance lecture*
- *15 h = Preparation and postprocessing lecture*
- *15 h = Preparation and postprocessing tutorial*
- *60 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam(100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Case Studies in Sustainability management - A values-based perspective

Module title	Case Studies in Sustainability management - A values-based perspective
Module title German	Fallstudien des Nachhaltigkeitsmanagements - Eine werte-orientierte Perspektive
Module number	82-021-SUSWP01-H-0622
Level	Bachelor
Course rotation	Winter term
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Christian Social Ethics and Social Policy
Module Coordinator	Prof. Dr. Andre Habisch
Credit Points (ECTS)	5 ECTS-Points

Learning Outcomes:

- *The students learn the methods of creating a scientific case study.*
- *They develop intercultural competence to analyse value-oriented entrepreneurial action in different economic, cultural and social contexts.*
- *They develop the competence to focus collected facts on specific contexts and narratives and to make them clear for the audience.*
- *They strengthen social competence for goal-oriented work in heterogeneous groups over a longer period of time.*
- *They learn to communicate their learning progress regularly via social media.*

Contents/Topics:

- *Introduction and overview*
- *Introduction to qualitative and quantitative methods of case study preparation*

- *Networking with corporate partners worldwide: cooperation with the Federation of Catholic Entrepreneurs (BKU) Cologne, and the Union of Christian Entrepreneurial Associations (UNIAPAC) Paris*
- *Constitution of working groups (together with MA students) and regular group meetings*
- *Presentations to internal and external partners*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Basic knowledge of working with and on texts*
- *Knowledge of methods*
- *Communicative skills and language skills*
- *Basic Intercultural competencies and interest in foreign cultures*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture (VL) 2 SWS*
- *Tutorial (UE) 2 SWS*

ECTS awarding criteria:

- *performance record assessed with at least "sufficient": Preparation of an essay/case study in group work (50 - 100 %) or Presentations (0 - 50 %) or Learning report/ social media communications (0 - 50 %)*
- *The concrete examination modalities will be bindingly determined at the beginning of each semester.*

Workload / Distribution of ECTS credits:

- 56 h = attendance time at lectures and supervised group work
- 28 h = independent research outside the lectures
- 19 h = preparation, coordination and writing of social media communication
- 19 h = Communication with mentors, contact persons of the companies outside of the courses
- 26 h = Writing and continuous revision of the case study
- 150 h = Total workload

Module grade:

- Portfolio (100%)

Polyvalence with other degree programs/accessibility notes:

- Betriebswirtschaftslehre International B.Sc.
- Business Administration B.Sc.

Remarks:

Literatur:

- Chatterjee, I., Cornelissen, J. & Joakim, W. (2021.) *Social entrepreneurship and values work: The role of practices in shaping values and negotiating change* (Vol. 36). *Journal of Business Venturing*.
- Müller, N. & Jäger, C. (2015): *Werteorientierte Führung von Familienunternehmen* (1. Aufl.). Springer Gabler, Wiesbaden.
- Brusoni, S. & Vaccaro, A. (2017). *Ethics, Technology and Organizational*
- Globocnik, D., Rauter, R. & Baumgartner, R.J. (2020). *Synergy or Conflict? The Relationships Among Organisational Culture, Sustainability-Related Innovation Performance, And Economic Innovation Performance* (Vol. 24). *International Journal of Innovation Management*.
- Nicholson, J. & Kurucz, E. (2019). *Relational Leadership for Sustainability: Building an Ethical Framework from the Moral Theory of 'Ethics of Care'* (Vol. 156). *Journal of Business Ethics*
- DeTienne, K.B., Ellertson, C.F., Ingerson, M.C. & Dudley, W.R. (2021): *Moral Development in Business Ethics: An Examination and Critique* (Vol. 170). *Journal of Business Ethics. Case Study Methodology*

- Dul J., & Hak, T. (2008). *Case Study Methodology in Business Research* (1. Ausg.). Elsevier.
- Perren, L., & Ram, R. (2004). *Case-Study Method in Small Business and Entrepreneurial Research: Mapping Boundaries and Perspectives* (Vol. 22). Thousand Oaks, CA: Sage Publ.

Company Taxation in the EU: Towards more Fairness and Sustainability

Module title	Company Taxation in the EU: Towards more Fairness and Sustainability
Module title German	Company Taxation in the EU: Towards more Fairness and Sustainability
Module number	82-021-TA15-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration, B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration and Business Taxation
Module Coordinator	Prof. Dr. Reinald Koch
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students of the module learn the fundamental provisions of European tax law. They obtain the ability to recognize tax consequences of several cross-border economic activities.*
- *Students gain the ability to solve complex tax related business cases including the application of their knowledge to new cases. Furthermore, they learn how to handle the relevant international legal texts.*
- *After attending the module students will have gained a comprehensive overview of the business tax systems in the European Union and the relevant European law.*

Contents/Topics:

- *Basics of European legal forms*
- *Concepts of taxation in EU member states*
- *Basic terms and concepts of foreign income Einkünften*
- *Impact of EU tax law on tax planning opportunities*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *performance record assessed with at least "sufficient": Exam (90 Minutes)*

Workload / Distribution of ECTS credits:

- *42 h = Time of attendance lecture*
- *70 h = Preparation and postprocessing lecture*
- *38 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100 %)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration International B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Consolidated Accounting

Module title	Consolidated Accounting
Module title German	Konzernrechnungslegung
Module number	82-021-AC12-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Financial Management B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration, Auditing and Management Accounting
Module Coordinator	Prof. Dr. Max Götttsche
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students develop a broad and integrated knowledge and understanding of the fundamentals of consolidated accounting.*
- *Students identify and assign complex problems of consolidated accounting and learn to solve application-oriented problems.*
- *Students develop a critical understanding of special topics in consolidated accounting.*

Contents/Topics:

- *Legal and economic basics*
- *Obligation of drawing up and basics of consolidation*
- *Basic principles of consolidated accounting*
- *Capital consolidation*
- *Consolidation of debt*
- *Consolidation of success*
- *Deferred taxes*
- *Proportional and equity consolidation*

- *Currency transformation*
- *Cash flow statement*
- *Segment information*
- *Equity shift calculation*
- *Dependency report*
- *Special topics e.g acquisition of accessory interests, group affiliation of special purpose entities, IFRS-topics, etc.*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Accounting knowledge*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Interactive lecture, Work on case-studies in the exercise*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient" (90 Minutes)*

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance lecture*
- *73 h = Preparation and postprocessing lecture*
- *38 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration International B.Sc.*
- *Business Administration M.Sc.*
- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*
- *Taxation M.Sc.*

Remarks: -

Corporate Governance

Module title	Corporate Governance
Module title German	Corporate Governance
Module number	82-021-BE03-H-0318
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Ethics and Corporate Governance
Module Coordinator	Prof. Dr. Kai Sandner
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Understanding of corporate governance and knowledge of relevant theories*
- *Awareness of the significance of the different paradigms in stakeholder and shareholder theories for corporate governance*
- *Overview of rules and regulations in corporate governance*
- *Relation of corporate governance and management control*
- *Knowledge on different actors' opportunities to get involved and exert influence*
- *Ability to relate issues/topics in corporate governance to contents of adjacent areas such as management, management accounting, and business ethics*
- *Be aware of system alternatives in corporate governance with their effects*
- *Goal: Overview of the subject and the skill to relate knowledge on corporate governance to the adjacent disciplines of management control and business ethics.*

Contents/Topics:

- *Fundamentals*
 - *Introduction and theories*
 - *Rules and regulations*

- *Introducing stakeholders and shareholders*
- *Boards of Directors: Leading and supervising companies*
 - *Board structures*
 - *Directors' pay and fairness*
 - *Performance measures*
- *Shareholders and their activism*
 - *Shareholder power and institutional investors*
 - *CSR and socially responsible investment*
 - *Family firms*
- *Corporate Governance in selected countries*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture*
- *Examples*
- *Exercise*
- *Control questions and discussions*

ECTS awarding criteria:

- *Performance record assessed with at least “sufficient”: for the exam.*

Workload / Distribution of ECTS credits:

- 44 h = *Time of attendance lecture and tutorial*
- 66 h = *Preparation and post-processing lecture and tutorial*
- 40 h = *Exam preparation*
- 150 h = *Total workload*

Module grade:

- *Klausur (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Data Science in Finance with Python

Module title	Data Science in Finance with Python
Module title German	Data Science in Finance mit Python
Module number	82-021-FM05-H-0720
Level	Bachelor module
Course rotation	Winter term
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Finance and Banking
Module Coordinator	Prof. Dr. Thomas Mählmann
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The student gets to know realistic problems of portfolio management, in particular the development and implementation of rule-based (systematic) trading strategies (smart beta, alternative alpha), and deals with practice-relevant approaches. The focus is on the implementation of data analytical concepts in Python, with which the student is able to consider various problems in the entire investment process after successful completion of this module. Students acquire digital skills in this module as they learn to analyze and evaluate financial data using Python, imparting essential abilities for working with modern digital tools and technologies.*

Contents/Topics:

The module includes the following topics, among others:

- *Basics of data analysis in Python with Pandas*
- *Risk and return*
- *Mean-Variance Portfolio Optimisation*
- *Quantitative trading and portfolio strategies*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *Performance record assessed with at least “sufficient”: Portfolio*

Workload / Distribution of ECTS credits:

- *30 h = Time of Attendance Lecture*
- *15 h = Preparation and postprocessing Lecture*
- *30 h = Time of Attendance Lecture*
- *15 h = Preparation and postprocessing Tutorial*
- *60 h = Exam Preparation*
- *150 h = Total Workload*

Module grade:

- *Portfolio: The examination takes the form of four Python programming tasks (cases). The overall grade of the module is the sum of the respective grade of the four Python programming tasks weighted with the factor 0.25.*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration International B.Sc.*
- *Business Administration M.Sc.*

- *Digital and Data Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*
- *Data Science B.Sc.*

Remarks: *Literature will be announced in class.*

Decision Theory

Module title	Decision Theory
Module title German	Decision Theory
Module number	82-021-BE01-H-0218
Level	Bachelor module
Course rotation	SoSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Public Finance
Module Coordinator	Prof. Dr. Dominika Langenmayr
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students understand how decisions are actually made and how they should be made to achieve better outcomes with respect to the decision maker's goals.*
- *Students understand common (and their own) flaws in decision-making. This helps them to develop a responsible attitude towards their decisions.*
- *Students are familiar with the formal-mathematical methods to analyze decision-making.*
- *Students understand strategic interactions in decision-making.*
- *Students can apply the acquired knowledge to typical decision problems in the commercial sphere and in general socioeconomic interactions.*

Contents/Topics:

- *Decision Theory under Certainty*
 - *Rational Choice under Certainty*
 - *Decision-Making under Certainty*
- *Probability Assessment*
 - *Rational Probability Assessment under Risk and Uncertainty*
 - *Judgement under Risk and Uncertainty*

- *Decision Theory under Risk and Uncertainty*
 - *Rational Choice under Risk and Uncertainty*
 - *Decision-Making under Risk and Uncertainty*
- *Game Theory*
 - *Static Games*
 - *Dynamic Games*
 - *Repeated Games*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics, Descriptive statistics, Microeconomics*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lectures*
- *Tutorials*

ECTS awarding criteria:

- *Written exam at the end of the term (90 Minutes)*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *28 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*
- *28 h = Preparation and postprocessing tutorial*

- 38 h = *Exam preparation*
- 150 h = *Total workload*

Module grade:

- *Final exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Erik Angner: A course in behavioural economics, Palgrave MacMillan, 2nd edition, 2016.*
- *Hal R. Varian: Intermediate Microeconomics: A Modern Approach, 8th edition, 2010.*
- *Drew Fudenberg and Jean Tirole: Game Theory, 7th edition, 2005.*
- *Daniel Kahneman: Thinking, Fast and Slow, 2011*

Descriptive Statistics and Probability Theory

Module title	Descriptive Statistics and Probability Theory
Module title German	Descriptive Statistics and Probability Theory
Module number	82-021-QM03-H-507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Statistics and Quantitative Methods
Module Coordinator	Prof. Dr. Ulrich Küsters
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students in the field of business administration acquire the basic statistical methods and notions.*
- *The methodical skills are acquired within the scope of the lecture. Firstly, the statistical theory is taught in order to provide a solid methodical basis.*
- *Students apply techniques in probability theory and descriptive statistics on practical issues within the scope of the exercises.*
- *The self-contained working technique enables students to obtain a personal competence, self-dependent handling of statistical methods as well as efficient practical application of those methods.*

Contents/Topics:

- *Introduction*
- *Descriptive statistics (incl. indices and measures of concentration and inequality)*
- *Probability theory:*
 - *Introduction (incl. axiom system, conditional probability and Bayes's theorem)*
 - *Discrete univariate distributions*
 - *Continuous univariate distributions*
 - *Discrete multivariate distributions*

- *Continuous multivariate distributions*
- *Limit theorems (incl. Chebyshev's Inequality and Laws of Large Numbers)*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics for Students of Economics*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*
- *Tutorial*

ECTS awarding criteria:

- *Written exam at the end of the term (90 Minutes)*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *28 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*
- *28 h = Preparation and postprocessing tutorial*
- *38 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *International Business Administration B.Sc.*
- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Küsters, Ulrich (2015): Foliensatz Statistik, KUE/WFI, Ingolstadt.*
- *Schira, Josef (2012): Statistische Methoden der VWL und BWL. 4. Auflage, Pearson Studium, München.*
- *Fahrmeir, L., Künstler, R., Pigeot, I. and Tutz, G. (2010): Statistik - Der Weg zur Datenanalyse. 7. Auflage, Springer-Verlag, Berlin.*
- *Mosler, K., Schmid, F. (2009): Beschreibende Statistik und Wirtschaftsstatistik. 4. Auflage, Springer-Verlag, Heidelberg.*

Digital and Sustainable Business Models

Module title	Digital and Sustainable Business Models
Module title German	Digital and Sustainable Business Models
Module number	82-021-D3B01-H-0621
Level	Bachelormodul
Course rotation	WiSe
Degree program hosting the module	Digital and Data-Driven Business B.Sc.
Institutional anchoring	Wirtschaftswissenschaftliche Fakultät Ingolstadt
Subjects involved	BWL, insb. Internationales Management BWL, insb. Dienstleistungsmanagement
Module Coordinator	Prof. Dr. Katja Gelbrich
Credit Points (ECTS)	5 ECTS-Punkte

Learning Outcomes:

- *Studierende des Kurses lernen, die Grundlagen und Struktur von Geschäftsmodellen zu verstehen und dieses Wissen auf das Digitale Business und nachhaltige Geschäftsmodelle anzuwenden. Sie erlangen ein grundlegendes Verständnis verschiedener digitaler und nachhaltiger Geschäftsmodelle im Konsumgüter- (B2C) und Investitionsgüterbereich (B2B). Sie lernen, wie diese Geschäftsmodelle entwickelt, organisiert und vermarktet werden. Sie lernen die Erfolgsfaktoren digitaler Geschäftsmodelle kennen, insbesondere mit Blick auf die Infrastruktur (z.B. Kernaktivitäten, Geschäftspartner), das Angebot (z.B. das Nutzenversprechen), die Kunden (z.B. Kundensegmente und Kundenbeziehungen) und die Finanzstruktur (z.B. Kostenstruktur und Umsatzgenerierung).*
- *Die begleitende Übung trägt zur Erarbeitung dieser Lernziele/Kompetenzen bei. Die Studierenden wissen, sich kritisch mit ausgewählten Aspekten der Vorlesung sowie mit neuen Themengebieten vertieft auseinander zu setzen. Sie lernen, ihr Wissen auf konkrete Firmen anzuwenden (sowohl multinationale Firmen als auch Start-ups), und zwar anhand von Beispielen und kleinen Fallstudien aus dem realen Geschäftsleben. Dadurch sind sie in der Lage, sich eigenes Fachwissen anzueignen. Weiterhin erlangen sie die Fähigkeit, theoretische Konzepte aus der Vorlesung auf Management-Probleme anzuwenden, indem sie Fallstudien diskutieren.*

Contents/Topics:

Teil I: Digitale Geschäftsmodelle

- *Geschäftsmodelle und Geschäftsmodell-Canvas*

- *Überblick und Beschreibung digitaler Geschäftsmodelle*
- *Erfolgsfaktoren digitaler Geschäftsmodelle*

Teil II: Nachhaltige Geschäftsmodelle

- *Grundlagen des Service Design*
- *Co-Creation von innovativen Geschäftsmodellen*
- *Nachhaltige und transformative Geschäftsmodelle / Transformative Service Research*

Formal requirements for participation:

- *Keine*

Recommended requirements for participation::

- *Keine*

Teaching and Examination language:

- *Englisch*

Teaching methods/Course types:

- *Vorlesung (VL) (2 SWS)*
- *Übung (UE) (2 SWS)*

ECTS awarding criteria:

- *Mit mindestens „ausreichend“ bewerteter Leistungsnachweis: Klausur (90 Minuten)*

Workload / Distribution of ECTS credits:

- *30 h = Präsenzzeit Vorlesung oder Selbststudium*
- *24 h = Vor- und Nachbereitung Vorlesung*
- *30 h = Präsenzzeit Übung oder Selbststudium*
- *12 h = Vor- und Nachbereitung Übung*

- 54 h = Prüfungsvorbereitung
- 150 h = Arbeitsaufwand gesamt

Module grade:

- Abschlussklausur zum Vorlesungsstoff (60%) und zum Übungsstoff (40%)

Polyvalence with other degree programs/accessibility notes:

- Sustainability in Business & Economics B.Sc.
- Data Science B.Sc.

Remarks: -

Digital Business Strategies, Organization and Innovation

Module title	Digital Business Strategies, Organization and Innovation
Module title German	Digital Business Strategies, Organization and Innovation
Module number	82-021-D3B04-H-0721
Level	Bachelor module
Course rotation	Summer term
Degree program hosting the module	Sustainability in Business and Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	ABWL, Organization & Human Resources Management
Module Coordinator	Prof. Dr. Max Ringlstetter
Credit Points (ECTS)	5 ECTS

Learning Outcomes:

- *Students develop a generic understanding of the concept of (corporate) management. They acquire basic knowledge of the nature and structure of a company or organisation, as well as (digital) business models.*
- *Students can reproduce concepts of innovation. The same holds true for the concepts of digital business models.*
- *Students learn the basics of strategic management in the field of digital business models. This applies for example to agile management methods and digital innovations.*
- *Students can apply the perspectives and methods learned to sample companies.*

Contents/Topics:

- *Part I: Leadership & Organization*
- *Part II: Innovation & Digital Business Models*
- *Part III: Strategic management for digital business areas*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*
- *Tutorial*
- *Guest lectures*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient": Final exam (90 minutes)*

Workload / Distribution of ECTS credits:

- *22,5 h = Time of attendance lecture*
- *25 h = Preparation and postprocessing lecture*
- *22,5 h = Time of attendance tutorial*
- *25 h = Preparation and postprocessing tutorial*
- *50 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*

Remarks:

- Lu, Y., & K. (Ram) Ramamurthy. (2011). *Understanding the Link Between Information Technology Capability and Organizational Agility: An Empirical Examination*. *MIS Quarterly*, 35(4), 931-954. doi:10.2307/41409967
- Ringlstetter, M., Kaiser, S. (2008), *Humanressourcen-Management*, München.
- Ringlstetter, M., (1997), *Organisation von Unternehmen und Unternehmensverbindungen*, München, S. 57-162 sowie S. 246-266.
- Teece, D., Peteraf, M., & Leih, S. (2016). *Dynamic Capabilities and Organizational Agility: Risk, Uncertainty, and Strategy in the Innovation Economy*. *California Management Review*, 58(4), 13–35. <https://doi.org/10.1525/cmr.2016.58.4.13>

Digital Systems and Operations Management

Module title	Digital Systems and Operations Management
Module title German	Digital Systems and Operations Management
Module number	82-021-BWL12-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration and Business Informatics Business Administration, Supply Chain Management & Operations
Module Coordinator	Prof. Dr. Thomas Setzer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Digital Systems (Information Management):*
 - The students will obtain a basic understanding of information management and information economy as well as the design and architecture of IT-systems in business environments.
 - They will understand the foundations of process and data modeling, communication, computer networks as well as data- and Internet-based business models and
 - Upon completion of the course, students will have a basic knowledge of the field of business information systems and will be able to transfer skills in this area.
- *Operationsmanagement:*
 - The students will obtain a basic knowledge of modern approaches for production and logistics management.
 - They will understand the critical role of decision making in production and logistics, and achieve some abilities in applying their knowledge to production and logistics decisions in business practice.
 - They learn about the special importance of sustainable production and logistics concepts.

Contents/Topics:

- *Digital Systems (Information Management):*
 - *Basics of information and communication systems*
 - *Unternehmenssoftware*
 - *Business application systems*
 - *Database management systems*
 - *Operational and analytical processes*
 - *Internet and IT-Security*
 - *Internet-based business models and systems*
 - *Search engines, platform models, recommender systems*
- *Operations Management:*
 - *Models and Model-based Planning*
 - *Concepts of sustainable production and logistics*
 - *Linear Programming*
 - *Project Scheduling*
 - *Design of Manufacturing Systems*
 - *Economic Order Quantity*
 - *Transportation Planning and Vehicle Routing*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *2 x Lecture/Tutorial (VLUE) (je 2 SWS)*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient": Final exam (90 minutes)*
- *A written exam is held at the end of the course, consisting of 50% Operations Management and 50% Digital Systems.*

Workload / Distribution of ECTS credits:

- *Digital Systems (Information Management):*
 - *16 h = Time of attendance lecture*
 - *34 h = Preparation and postprocessing lecture*
 - *5 h = Time of attendance tutorial*
 - *10 h = Preparation and postprocessing tutorial*
 - *10 h = Exam preparation*
 - *75 h = Total workload*
- *Operationsmanagement:*
 - *20 h = Time of attendance lecture*
 - *20 h = Preparation and postprocessing lecture*
 - *15 h = Time of attendance tutorial*
 - *10 h = Preparation and postprocessing tutorial*
 - *10 h = Exam preparation*
 - *75 h = Total workload*

Module grade:

- *Leistungsnachweis*

Polyvalence with other degree programs/accessibility notes:

- *Bachelor's program in Digital and Data Driven Business*
- *Bachelor's program in International Business Administration*
- *Bachelor's program in European Studies*
- *Bachelor's program in Journalism*
- *Bachelor's program in Romance Studies – Economics - Geography*

- *Bachelor's program in Sustainability in Business & Economics B.Sc.*

Remarks: -

Entrepreneurship

Module title	Entrepreneurship
Module title German	Entrepreneurship
Module number	82-021-MD10-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Tourism/ Center for Entrepreneurship
Module Coordinator	Prof. Dr. Harald Pechlaner
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students will be introduced to the idea of entrepreneurship and can practically deal with the fundamental issues of entrepreneurship.*
- *Knowledge about theories and concepts of entrepreneurship*
- *Characterization of the entrepreneur*
- *Learning Methods of Empirical Research*
- *Application of the methods introduced*
- *Organization in a team for joint outcomes*
- *After completion of the module students will have an overview of the characteristics of entrepreneurship and got to know the basis of a practical problem which address key challenges of entrepreneurship in dialogue with the practice.*

Contents/Topics:

- *Participants will receive an introduction to the basic theoretical analysis of the concept of entrepreneurship.*
- *During the module, participants will be introduced to various aspects of entrepreneurship.*

- *In the seminar, students will be provided a practice-relevant topic for discussion. Joint developed of a common question is a central task.*
- *Students are taught and and will have to use appropriate methods of investigation.*
- *The seminar leads to a common final presentation, which should answer the key points of the question.*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Content delivered by the lecturer*
- *Development and discussion of relevant issues in practice by theoretical analysis and practical empirical work*
- *Team presentations by students in the seminar*

ECTS awarding criteria: *Performance record assessed with at least "sufficient": Final exam (120 minutes)*

Workload / Distribution of ECTS credits:

- *60 h = Lecture*
- *30 h = E-Learning*
- *60 h = Written exam*
- *150 h = Average workload*

Module grade:

- *Written exam at the end of the semester (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: *Choice:*

- *Fueglistaller/Müller/Volery/Müller (2008): Entrepreneurship, Modelle, Umsetzung, Perspektiven, Gabler.*
- *Timmons/Spinelli (2007): New Venture Creation. Mc Graw Hill.*
- *Sascha Kraus/Katherine Gundolf (2008): Stand und Perspektiven der deutschsprachigen Entrepreneurship- und KMU-Forschung*

Environmental Economics & Environmental Policy

Module title	Environmental Economics & Environmental Policy
Module title German	Umweltökonomik & Umweltpolitik
Module number	
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Professor for Economics
Module Coordinator	Prof. Dr. Reinhard Weber
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes: *Students acquire skills in the following fields*

- *They know the basics of the economic theories of environmental policy.*
- *They have knowledge of the fundamental issues of environmental economics.*
- *They have a profound knowledge of the economic interpretation of environmental problems.*
- *They know environmental policy instruments and can assess the actual application of those instruments*
- *They can analyse current environment problems and find possible solutions of key issues in environmental economics*

Contents/Topics:

- *The principles of sustainability issues*
- *A theoretical and empirical analysis of environmental policy instruments*
- *Resource economics*
- *Central topics of environmental economics: Energy, climate change and “green transition”*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Microeconomics, Public Finance*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (3 SWS)*

ECTS awarding criteria:

- *Written exam of 90 minutes*
- *The written exam comprises of the contents of the lecture (75%) and self-directed learning (25%)*

Workload / Distribution of ECTS credits:

- *40 h = Time of attendance lecture*
- *40 h = Preparation and postprocessing lecture*
- *70 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration B.Sc.*

Remarks: -

Foundations of Economics: State, Economy, and Society

Module title	Foundations of Economics: State, Economy, and Society
Module title German	Foundations of Economics: State, Economy, and Society
Module number	
Level	Bachelormodul
Course rotation	SoSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Macroeconomics
Module Coordinator	Prof. Dr. Simon Wiederhold
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The lecture offers an introduction into economics. It makes students familiar with the basic terms and methods in both micro- and macroeconomics.*
- *Students will gain an understanding of the main economic principles, such as scarcity, division of labor, opportunity costs, and incentives.*
- *They will get an overview of different types of markets and how supply and demand interact on these markets.*
- *They will understand the basics of welfare measurement. They will be able to assess the possibilities and limitations of the gross domestic product (GDP) as a welfare indicator and learn about alternative concepts of welfare measurement.*
- *They will understand the basics of labor markets.*
- *They will understand the basics of open economies and the virtues and problems of free trade.*
- *They will understand the sources and implications of the financial crisis of 2008.*
- *They will gain insights into the foundations of game theory.*
- *They will develop a basic understanding of aims, methods, and problems of empirical research in economics.*

- *Students will be equipped with the necessary tools and knowledge to structure, analyze, and potentially solve economic problems (e.g., minimum wages, rent control).*
- *In general, students will get to know numerous practical examples from economic life and will develop skills to judge the relevance of micro- and macroeconomic concepts for real-life situations.*

Contents/Topics:

- *Thinking like an economist*
- *Supply and demand*
- *Comparative advantage*
- *National accounting*
- *Goods market*
- *Financial market*
- *Economic growth*
- *Unemployment*
- *Financial crisis of 2008*
- *Foundations of game theory*
- *Foundations of empirical research in economics*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Attending the mathematics lecture in parallel is recommended*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS) / tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *Written exam at the end of the term with at least sufficient.*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *30 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*
- *30 h = Preparation and postprocessing tutorial*
- *34 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written exam at the end of the term. Final exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *N. Gregory Mankiw, Mark P. Taylor, Grundzüge der Volkswirtschaftslehre, 5. Aufl., Schäffer-Poeschel, 2012.*
- *N. Gregory Mankiw, Principles of Economics, 7th ed., Cengage Learning, 2014.*
- *Olivier Blanchard, Gerhard Illing, Makroökonomie, 6. Aufl., Pearson Studium, 2014.*
- *Olivier Blanchard, Macroeconomics, 6th ed., Prentice Hall, 2012.*

Innovating for Sustainability: Frameworks and Practices from Global and Local Organizations

Module title	Innovating for Sustainability: Frameworks and Practices from Global and Local Organizations
Module title German	Innovating for Sustainability: Frameworks and Practices from Global and Local Organizations
Module number	82 021 BU01 H 0123
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Innovation and Creativity
Module Coordinator	Prof. Dr. Shashi Matta
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This course on Innovating for Sustainability is designed to teach students frameworks and processes that are aimed at establishing and fostering sustainability-oriented innovation in global and local organizations. Through a focus on sustainable innovation, companies can build more sustainable products, processes and practices that benefit the firm and society.

The main objectives of this course are for students to:

- Understand the concept of sustainability-oriented innovation and how it differs from conventional innovation in organizations*
- Identify and examine key stakeholders in sustainability-oriented innovation, including traditional stakeholders such as employees and consumers, as well as social, governmental, and environmental stakeholders*
- Understand the frameworks and processes designed for sustainability-oriented innovation*
- Learn the different types of sustainability-oriented innovation activities under each of the stages of - optimization, transformation, and systems building*
- Acquire knowledge on how to measure sustainability-oriented innovation in organizations, and promote an appreciation of the managerial and societal implications of innovating for sustainability*

Students will also be exposed to multiple business managers and executives from global and local organizations who are responsible for innovating for sustainability, during the course. Besides knowledge on the core concepts of innovating for sustainability, students will gain soft skills such as teamwork and communication during the exercises in the tutorials. As lectures and tutorials are held in English, students will have the opportunity to enhance their language skills in a professional setting.

Contents/Topics:

Part I: Traditional Innovation and Sustainability-Oriented Innovation

- *Fundamentals of Innovation for Products, Processes and Systems*
- *Sustainability-Oriented Innovation: Contrasted with Traditional Innovation*

Part II: Stakeholder Identification and Integration into the Innovation Strategy for Sustainability

- *An Expanded Set of Stakeholders in Sustainability-Oriented Innovation and the Challenges of Managing Conflicting Goals*
- *Building Networks and Collaborating with Stakeholders to Innovate for Sustainability*

Part III: Frameworks and Models for Sustainability-Oriented Innovation

Pathways to Zero Model in Innovating for Sustainability The Three Stages Model of Optimization, Transformation and Systems Building for Sustainability-Oriented Innovation

Part IV: Activities that Underlie the Stages of Sustainability-Oriented Innovation

- *Product Innovation and Process Innovation with Added Constraints*
- *Dematerialization, Shared-Use Concept, Innovation with Low-Impact Materials, Reduction of Impact In-Use by Consumers, Optimization of End-of-Life System (Reuse, Refurbish, Recycle in Innovation)*

Part V: Measuring the Effectiveness of Sustainability-Oriented Innovation

- *Different Approaches to Measuring the Effectiveness of Sustainability-Oriented Innovation in Organizations, and Best Practices*
- *Combining Innovation Indices and Sustainability Scores of Organizations*

Part VI: Managerial and Societal Implications of Innovating for Sustainability

- *The Multifaceted Impact of Sustainability-Oriented Innovation*
- *Case Studies of Sustainability-Oriented Innovation from For-Profit and Non-Profit Organizations Globally and Locally*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture (VL) 2 SWS*
- *Tutorial (UE) 2 SWS*

ECTS awarding criteria:

- *Performance record assessed with at least sufficient: Portfolio*
- *Sustainable Innovation Project and Presentation (50%): Student will work on a sustainability related innovation project given by an organization. Student teams will work on this semester long, “applied” project by applying all course learnings to this project. Student teams will make their final presentations during the last tutorial session.*
- *Mini Essays related to the Sustainable Innovation Project (50%): Students create several mini essays related to the sustainable innovation project.*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *28 h = Time of attendance tutorial*
- *28 h = Preparation and postprocessing lecture*
- *28 h = reparation and postprocessing tutorial*
- *38 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Sustainable Innovation Project and Presentation (50%)*
- *Mini Essays (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration B.Sc.*
- *Bachelor Program Additional Studies "Sustainable Development"*

Remarks:

- *Specific reading assignments (from select book chapters and articles), in preparation for each class, will be announced in the course syllabus prior to the start of the course.*

Introduction to Economic and Business Ethics

Module title	Introduction to Economic and Business Ethics
Module title German	Einführung in die Wirtschafts- und Unternehmensethik
Module number	82-021-Intdis01-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Ethics and Social Policy
Module Coordinator	Prof. Dr. Jörg Althammer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *In this lecture students get a general idea of the theories and methods of business and social ethics. It will cover the basics of the philosophy of science and the central theories of social ethics. Additional matters of contemporary discussion concerning CSR will be taken up and dealt with.*
- *The module shall enable students to perceive ethical problems at social and entrepreneurial level, to analyze them appropriately and to develop solutions.*

Contents/Topics:

- *Basics of the philosophy of science*
- *The normative problem in social sciences*
- *Social final goals: freedom, justice, economic efficiency*
- *Theories of social justice*
- *Aspects of responsible management (Corporate Social Responsibility)*
- *Stakeholderanalysis and -management*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture and discussion*
- *Video recording of the theory*
- *E-learning*

ECTS awarding criteria: *Performance record assessed with at least "sufficient": Final exam (90 minutes)*

Workload / Distribution of ECTS credits:

- *60 h = Lecture*
- *30 h = E-Learning*
- *60 h = Written exam*
- *150 h = Average workload*

Module grade:

- *Written exam at the end of the semester (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Introduction to International Relations

Module title	Introduction to International Relations
Module title German	Introduction to International Relations
Module number	82-500-1.6-H-0918
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Politik & Gesellschaft B.Sc.
Institutional anchoring	Geschichts- und Gesellschaftswissenschaftliche Fakultät
Subjects involved	Chair for International Relations
Module Coordinator	Prof. Dr. Klaus Brummer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Problem-driven imparting knowledge of basic knowledge about the political science sub-discipline of international politics. This includes the presentation of theoretical approaches to international politics as well as some important issue areas and challenges of the same. Training in the ability to analyze international political constellations in a theory-driven manner and engage in discussions in political science.*

Contents/Topics:

- *Overview of the development of relevant theories and actors in international politics.*
- *Presentation of the history and present state of important international organizations such as the European Union and the United Nations.*
- *Reference to current challenges of peacekeeping and development policy.*
- *Discussion of key issues in international environmental policy and international law.*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *(1) Lecture (2 SWS)*
- *(2) Tutorial (2 SWS)*

ECTS awarding criteria:

- *Written exam and oral presentation*
- *The written exam must be evaluated with at least "sufficient".*
- *According to the PO for the German-French integrated Bachelor's degree program in Political Science with effect from 01 October 2014: Written exam or oral exam or term paper.*

Workload / Distribution of ECTS credits:

- *5 ECTS = 150 hours*
- *Contact/self-study: 2 ECTS*
- *Presentation: 1 ECTS*
- *Written exam, based on the independent academic deepening of the imparted knowledge: 2 ECTS*

Module grade:

- *Exam*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Investment, Finance and Tax

Module title	Investment, Finance and Tax
Module title German	Investition, Finanzierung und Steuern
Module number	
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Digital & Data-Driven Business, B. Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Finance and Banking // Business Administration and Business Taxation
Module Coordinator	Prof. Dr. Thomas Mählmann
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *In this lecture students get a general idea of the basic theories and quantitative methods of finance and capital markets. They also obtain an overview over income taxes and how they affect investment and financing decisions.*
- *Students learn techniques to solve income tax cases and to independently apply these skills to new cases. They also learn the use of the relevant legal materials.*
- *These skills are essential and are needed in different areas of Business Administration, e.g. in the valuation of investment projects.*

Contents/Topics:

A: Object and purpose of the financial sector

- *1. Financial Sphere and Sales Area*
- *2. Sphere of Activities of Finance*

B: Investment Decisions

- *1. Relationship between Investing and Financing*
- *2. Investment Decisions using a given rate of return*
 - *2.1 Net Present Value, Future Value and Equivalent Annuity as decision criteria*

- *2.2 Using the Internal Rate of Return for Investment Decisions*

C: Financing Decisions

- *1. Methods of Financing*
- *2. Debt Securities and Markets*
- *3. Different approaches of financing relationships*
- *4. Equity Financing*
- *5. Debt Funding*

D: Income taxation

- *1. Basics*
- *2. Taxation of individuals*
- *3. Taxation of corporations*

E: Investment and financing decisions under consideration of taxes

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *Performance record assessed with at least “sufficient”: Exam (100*

Workload / Distribution of ECTS credits:

- 42 h = *Time of Attendance Lecture*
- 80 h = *Preparation and postprocessing Lecture*
- 28 h = *Exam Preparation*
- 150 h = *Total Workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Lecture Series Sustainable Economy

Module title	Lecture Series Sustainable Economy
Module title German	Ringvorlesung Nachhaltige Wirtschaft
Module number	
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Public Finance
Module Coordinator	Prof. Dr. Dominika Langenmayr
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students acquire a broad and integrated knowledge of a sustainable economy and sustainable management. They understand the scientific foundations and their applications in this area.*
- *Students can reflect on challenges regarding economic sustainability and understand the trade-offs between economic performance, ecological responsibility and social justice. They can understand and take into account different perspectives and the interests of other stakeholders.*
- *Students have the ability to reflect critically their future professional actions with regard to sustainability aspects.*

Contents/Topics:

- *Sustainability as a trade-off between economic performance, ecological responsibility and social justice.*
- *Significance of sustainability in the various economic and management fields (business administration, e.g. financing, logistics, controlling; economics, e.g. environmental economics, development economics; business ethics).*
- *Interdisciplinary view of sustainable economy (e.g. geography, philosophy, theology, environmental sciences)*
- *Sustainable economy from practitioners' perspectives.*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Self-study*

ECTS awarding criteria:

- *Multiple-choice exam at the end of the semester (first and second examination period).*

Workload / Distribution of ECTS credits:

- *30 h = Attendance time lecture*
- *60 h = Preparation and wrap-up lecture*
- *60 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Stadium.Pro (in clarification)*

Remarks:**Readings:**

- *Will be announced in the course*

Macroeconomics

Module title	Macroeconomics
Module title German	Macroeconomics
Module number	82-021-VWL07-H-0218
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Department of Business Studies
Module Coordinator	Prof. Dr. Reinhard Weber
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students learn an appropriate and critical approach to the fundamental concepts of macroeconomics.*
- *They acquire techniques for the analysis of demand induced short term effects on money and goods markets und develop an understanding of the relationships between those markets.*
- *They develop the ability to understand the processes of wage and employment adjustment resulting from the interactions of unions, government, and firms.*
- *Students become acquainted with the meaning of expectations in macroeconomic developments.*
- *Students learn the importance of medium term horizon in macroeconomics.*
- *They acquire the ability to see the implications of open goods and financial markets*

Contents/Topics:

- *1. Short term macroeconomics*
 - *IS-LM-model*
 - *Short term macroeconomic policy*
- *2. Medium term macroeconomics*
 - *The labour market*

- *AS-AD-model*
- *Medium term macroeconomic policy*
- *The Phillips curve*
- 3. *Expectations*
 - *Expectations and financial markets*
 - *Expectations and consumer demand*
 - *Expectations and economic policy*
 - *The importance of expectations in financial crises*
- 4. *Open macroeconomics*
 - *Interest rates and exchange rate*
 - *Different exchange rate regimes*
 - *Real exchange rate and medium term analysis*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture w/ tutorial*

ECTS awarding criteria:

- *Written exam of 90 minutes.*

Workload / Distribution of ECTS credits:

- *50 h = Time of attendance lecture*

- 50 h = *Preparation and postprocessing lecture*
- 50 h = *Exam preparation*
- 150 h = *Total workload*

Module grade:

- *Written exam (90 minutes) 100%*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Management Accounting

Module title	Management Accounting
Module title German	Management Accounting
Module number	82-021-BWL13-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration, Auditing and Management Accounting
Module Coordinator	Prof. Dr. Max Götttsche
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students will get fundamental skills in Accountancy and Cost Accounting.*
- *At the end of the course the students are expected to recognize the connections between accountancy and cost accounting so that the basic skill for resuming economical training is given.*
- *The tutorial will be essential part in providing these competences.*

Contents/Topics:

- *Part I Accountancy: Bases of accountant technique; Merchandise movements; Industrial accounting; Payment transactions; Personnel expenditure; Closing entries*
- *Part II Cost Accounting: Controlling Measures; Cost type accounting; cost center accounting; cost unit accounting; Analysing Costs*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*
- *Tutorial*

ECTS awarding criteria:

- *performance record assessed with at least "sufficient": Final Exam 100 %*

Workload / Distribution of ECTS credits:

- *52 h = Time of attendance lecture*
- *38 h = Preparation and postprocessing lecture*
- *26 h = Time of attendance tutorial*
- *14 h = Preparation an postprocessing lecture*
- *20 h = Preparation Exam*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *International Business Administration B.Sc.*
- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Managerial Accounting

Module title	Managerial Accounting
Module title German	Managerial Accounting
Module number	82-021-FM03-H-0507
Level	Bachelormodul
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Ethics and Corporate Governance
Module Coordinator	Prof. Dr. Kai Sandner
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Transfer of knowledge at the intersection of cost accounting and management accounting*
- *Understanding of usefulness and use of cost accounting information in various decision situations*
- *Know the importance of the intended use of cost accounting information for the design of cost accounting, e.g., in terms of different cost accounting systems*
- *Skill to independently make decisions concerning the development and the implementation of cost accounting systems in practical applications*
- *Understanding of the interrelations between decision situations, decision usefulness of information, and the need or opportunity to influence the decision-making of employees*
- *Thus, consideration of relationships with management accounting/management control systems and*
- *In particular knowledge in respect of instruments at the heart of management accounting such as budgeting, transfer pricing, and performance measurement and goal systems*

Contents/Topics:

- *Management accounting as executive function*
- *Basic concepts (cost definitions and systems of corporate accounting)*

- *Systems of corporate accounting*
- *Cost functions*
- *Marginal costing*
- *Activity-based costing*
- *Target Costing*
- *Standard costing and deviation analysis*
- *Budgeting*
- *Transfer pricing*
- *Performance measurement and goal systems*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Fundamentals of cost accounting, especially of cost-type accounting, cost-center accounting, and cost unit accounting as well as profitability analysis like, by way of example, delivered in the module „Management Accounting“.*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture incl. examples*
- *Tutorial incl. exercises and repetitions*

ECTS awarding criteria:

- *Performance record assessed with at least "sufficient": Final exam (90 minutes)*

Workload / Distribution of ECTS credits:

- 21 h = *Time of attendance in class*
- 21 h = *Time of attendance in tutorial*
- 21 h = *Preparation and postprocessing of the lecture*
- 21 h = *Preparation and postprocessing of the tutorial*
- 66 h = *Exam preparation*
- 150 h = *Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *International Management B.Sc.*

Remarks:

- *Friedl, G., Hofmann, Ch., Pedell, B. (2017): Kostenrechnung – Eine entscheidungsorientierte Einführung, 3rd ed., Vahlen, München*

Mathematics for students of economics

Module title	Mathematics for students of economics
Module title German	Mathematics for students of economics
Module number	82-021-QM05-H-0507
Level	Bachelormodul
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Faculty of Mathematics and Geography
Subjects involved	Applied Mathematics
Module Coordinator	Apl. Prof. Dr. Günther Wirsching
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students in the field of business administration acquire basic mathematical knowledge and the fundamental mathematical nomenclature when attending the lectures.*
- *Students gain the methodological expertise in the field of mathematical modeling.*
- *Students develop mathematical skills in the area of abstract thinking when solving issues in a problem-oriented and formal way.*
- *Students acquire mathematical and logical capacity within the scope of the exercises by solving elementary mathematical problems in a self-dependent way.*
- *Students learn deductive reasoning and acquire the necessary skills for a structured way of working by attending the tutorials.*

Contents/Topics:

- *Multi-dimensional differentiation and integration*
- *Basic linear algebra*
- *Gauß algorithm*
- *Differential equations*

Formal requirements for participation:

- *None*

Recommended requirements for participation:: -

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Classroom lecture*
- *Tutorial*
- *solving weekly problems*

ECTS awarding criteria: *To pass the course students have to reach a minimum of 45 %.*

Workload / Distribution of ECTS credits:

- *25 h = Time of attendance lecture*
- *45 h = Preparation and postprocessing lecture*
- *25 h = Time of attendance tutorial*
- *45 h = Preparation and postprocessing tutorial*
- *10 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *90 minutes written exam at the end of term (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Sydsaedter: Essential Mathematics for Economic Analysis*

- *Auer/Seitz: Grundkurs Wirtschaftsmathematik*
- *Opitz/Klein: Mathematik – Lehrbuch und Übungsbuch*

Microeconomics

Module title	Microeconomics
Module title German	Microeconomics
Module number	82-021-VWL06-H-0218
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Microeconomics, WFI
Module Coordinator	Prof. Dr. Alexander M. Danzer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students of the course learn a critical approach to the basic concepts of consumer and (partially strategic) producer behaviour, their interaction in markets, as well as the effects of economic policy regulation.*
- *Students acquire techniques for the market analysis in partial and general equilibrium, with and without state intervention. They will be able to analyse and scrutinise real economic policy interventions critically. Students acquire the methodological basis for welfare analysis.*
- *Students develop the ability to distinguish several types of markets (competitive, monopolistic, oligopolistic) and to assess their welfare implications. Students acquire skills in the application of basic game-theoretic concepts.*
- *Students become acquainted with numerous practical examples from the business world and are able to assess theoretical microeconomic concepts and their relevance for real economic life.*
- *Upon completion of the course students command knowledge of basic microeconomic concepts, in particular of the behaviour of economic agents (consumers and firms), their interaction in various types of markets, as well as their reactions to government intervention.*

Contents/Topics:

- *Consumers*
 - *Preferences and budget constraint*

- *Consumer behaviour and aggregate demand*
- *Consumer surplus*
- *Behavior under uncertainty*
- *Firms*
 - *Production and cost functions*
 - *Profit maximization in competitive markets*
 - *Producer surplus*
- *Non-competitive markets and market power*
 - *Monopoly*
 - *Oligopoly (Cournot)*
- *Analysis of competitive and non-competitive markets*
 - *Welfare*
 - *Government regulation*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics, Foundations of Economics*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lectures*
- *Tutorials*

ECTS awarding criteria:

- *Written exam at the end of the term*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *22 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*
- *22 h = Preparation and postprocessing tutorial*
- *50 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Final exam (90 mins) 100%*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *Digital and Data-Driven Business B.Sc.*

Remarks: -

Monetary Policy

Module title	Monetary Policy
Module title German	Geldpolitik
Module number	82-021-FBK08-S-VL-0507.20161.001
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Professur für VWL
Module Coordinator	Prof. Dr. Reinhard Weber
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students perceive the fundamental impact of monetary policy for the economy as a whole from a theoretical and an empirical view.*
- *They detect the short run and the long run consequences of monetary strategies.*
- *Students apply the theoretical insights of monetary policy effects on current issues.*
- *They understand the institutional organization of the European Central Bank and its instruments.*
- *Students are able to judge the consequences of monetary policy instruments and are capable of a critical assessment of central banks monetary policy.*
- *They understand the effects of a national monetary strategy on international financial markets*
- *They understand the effects of a national monetary strategy on international financial markets*

Contents/Topics:

- *Money Supply and Demand*
- *The Transmission Mechanism of Money Policy*
- *Monetary Policy Strategies*

- *The financial crisis: Monetary Policy Options*
- *Money Policy: Fixed and Flexible Exchange Rates*
- *The European Central Bank*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Macroeconomics*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*

ECTS awarding criteria:

- *Written exam of 90 minutes*

Workload / Distribution of ECTS credits:

- *50 h = Time of attendance lecture*
- *50 h = Preparation and postprocessing lecture*
- *50 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Lehramt GY mit Schwerpunkt Wirtschaft*
- *Sustainability in Business & Economics B.Sc.*
- *Deutsch-Französischer integrierter Studiengang Politikwissenschaft (DFS) B.Sc.*

Remarks: -

Operations Analytics

Module title	Operations Analytics
Module title German	Operations Analytics
Module number	82-021-SCM21-H-0218
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	ABWL, Supply Chain Management & Operations within WFI
Module Coordinator	Prof. Dr. Heinrich Kuhn
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The students will obtain a basic knowledge of modern approaches in operations management and its relevance in supply chain management.*
- *The students will understand the critical role of decision making in operations with respect to an enterprise-wide view and assess the associated impacts on people, nature, and the environment.*
- *The students will achieve the ability to apply their knowledge to production and services decisions in business practice.*
- *Students learn the relevance of sustainable operations management and how to implement it adequately.*

Contents/Topics:

- *Basic Concepts, Sustainable operations management issues*
- *Facility/Warehouse Location: Evaluation and selection of location options, multiple discrete facility location problems, Steiner-Weber Problem*
- *Design of Production and Services Systems: Layout planning, Production cell design, Group technology*
- *Forecasting: Selection and application of forecasting models, Forecasting stationary demand, Forecasting demand with trend and seasonal patterns*

- *Aggregate Planning: Production smoothing, Master production schedule*
- *Lot Sizing in Industry and Retail: Dynamic lot sizing problem, Economic lot sizing and sequencing problem (ELSP)*
- *Operations Scheduling: Assignment of resources, sequencing, Order release*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *„Digital Systems & Operationsmanagement“*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) 2 SWS*
- *Tutorial (UE) 2 SWS*

ECTS awarding criteria:

- *performance record assessed with at least “sufficient”: Final Exam (90 Minuten)*

Workload / Distribution of ECTS credits:

- *32 h = Time of attendance lecture*
- *32 h = Preparation and postprocessing lecture*
- *32 h = Time of attendance tutorial*
- *32 h = Preparation and postprocessing tutorial*
- *22 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital & Data-Driven Business B.Sc.*
- *Interdisciplinary Master's Program M.Sc.*
- *Mathematic M.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:*Basic readings:*

- *Günther, H.-O. und H. Tempelmeier, Supply Chain Analytics, 13. Aufl., Norderstedt, (Books on Demand) 2020*
- *Günther, H.-O. und H. Tempelmeier, Übungsbuch Produktion und Logistik, 9. Auflage, Books on Demand (Norderstedt) 2017.*
- *Wensing T. und Kuhn, H., Nachhaltige Entwicklung mit Operations Research, in: Burger, A, Kuhn H. und O. Kohmann (Hrsg.), Gewinn oder Ethik – Ethische Perspektiven in den Wirtschaftswissenschaften, Ingolstadt (WFI) 2010, S. 255-281.*

Further readings

- • *Belvedere, Valeria and Grando Alberto, Sustainable Operations and Supply Chain Management, Series in Operations Research and Management Science, New York (Wiley) 2017.*
- *Chopra, S. and P. Meindl, Supply Chain Management: Strategy, Planning, and Operation, 6th edition, Upper Saddle River (Prentice Hall) 2015.*
- *Fitzsimmons, J.A and M.J. Fitzsimmons, Service Management: Operations, Strategy, Information Technology, 8th edition, Boston (McGraw-Hill/Irwin) 2013.*
- *Lu, Meng and De Bock Joost (Eds.) Sustainable Logistics and Supply Chains - Innovations and Integral Approaches, Berlin (Springer) 2016.*
- *Nahmias, St., Production and Operations Analysis, 7th edition, Boston (McGraw Hill) 2015.*
- *Render, B.; R.M. Stair and M.E. Hanna, Quantitative Analysis for Management, 13th edition, Upper Saddle River (Prentice Hall), 2017.*

Political Institutions, the Economy, and Financial Markets

Module title	Political Institutions, the Economy, and Financial Markets
Module title German	Political Institutions, the Economy, and Financial Markets
Module number	82-021-VWLECO15-H-0822
Level	Bachelor module
Course rotation	Winter term
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Public Finance
Module Coordinator	Prof. Dr. Dominika Langenmayr
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students learn how political agents' individual and collective actions can be explained using economic concepts. Students can reproduce what they have learned in this regard.*
- *Students learn to reflect and evaluate problems of regulation and of collective decision processes (e.g. elections). They understand the effects of political events on financial markets.*
- *Students learn to reflect and evaluate problems of regulation and of collective decision processes (e.g. elections). They understand the effects of political events on financial markets.*
- *The students are able to apply economic methods to the political context.*
- *The students know how to apply economic reasoning (e.g. efficient market hypothesis) to different topics, including non-economic topics.*

Contents/Topics:

- *Politics from an Economic Perspective*
 - *Direct Democracy and Majority Voting*
 - * *Arrow's Impossibility Theorem*
 - * *Median Voter Theorem*

** Alternative Voting Systems*

- Partisan Politics*
- The Paradox of Voting*

- *Political Institutions and Regulation*

- How does Regulation Work?*
- Societal Cost-Benefit Analyses and the Political Formulation of Regulatory Goals*

- *Agents in the Political Process*

- Voters and Parties*
- Lobbies and Interest Groups*
- Bureaucracy*
- Rent-Seeking*

- *Political Agency*

- *Economic Theory of Federalism*

- Principle of Subsidiarity*
- Fiscal Competition and Fiscal Federalism*
- Fiscal Equalisation Schemes*

- *Political Events and Financial Markets*

- Fixed Income Markets*
- Stock Markets*

- *Political Risk*

- Influence on Stock Markets and Financial Valuation*
- Volatility*
- Exchange Rate Risks*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Microeconomics or Introduction to Economics is recommended*
- *Basic mathematical knowledge (Calculus I)*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*
- *Tutorial (UE) (2 SWS)*

ECTS awarding criteria:

- *Written exam (90 minutes) before Christmas (International Fall Term) and a second option*

Workload / Distribution of ECTS credits:

- *30 h = Time of attendance lecture*
- *30 h = Preparation and postprocessing lecture*
- *30 h = Time of attendance tutorial*
- *30 h = Preparation and postprocessing tutorial*
- *30 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *Data Science B.Sc.*

Remarks:

Readings:

- *Mueller, Dennis C., 2003, Public Choice III, Cambridge, New York and Melbourne: Cambridge University Press.*
- *Besley, Tim, 2007, Principled Agents?: The Political Economy of Good Government, Oxford, New York: Oxford University Press.*
- *Persson, Torsten; Tabellini, Guido, 2000, Political Economics: Explaining Economic Policy, Cambridge (MA): MIT Press.*
- *Further readings will be announced in the course.*

Public Finance and Sustainable Economic Policy

Module title	Public Finance and Sustainable Economic Policy
Module title German	Öffentliche Finanzen und Nachhaltige Wirtschaftspolitik
Module number	
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Public Finance
Module Coordinator	Prof. Dr. Dominika Langenmayr
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *After completing the course, the students are able to form well-informed opinions of tax policy, public debt and state interventions in the economy, including their potential contribution to a sustainable economy.*
- *The students understand the impact of a government's public finance decisions on all market participants.*
- *Students develop an understanding when governments should intervene in the economy and how they can promote a sustainable economy via suitable economic and tax policy.*
- *The students can apply methods of economic analysis to public finance problems. After completing the course, they understand the fundamental concepts and arguments of public finance.*

Contents/Topics:

- *Historical Aspects*
 - *History of thought in public finance*
 - *Development of public spending*
- *Allocation theory*
 - *Market efficiency*

- *Public goods*
- *Environmental damage and externalities*
- *Introduction to Social Security*
 - *Moral hazard*
 - *Adverse selection*
- *Tax Policy, Social Security and Regulation*
 - *Tax incidence and excess burden of taxation*
 - *Optimal taxation*
 - *Inequality and redistribution*
 - *Pensions*
 - *Environmental regulation*
- *Public Debt*
 - *The government budget*
 - *Long- and medium-run effects of public debt*

Formal requirements for participation:

- *Foundations of Economics*
- *Microeconomics*
- *Basic Mathematics*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) (2 SWS)*

- *Tutorial (UE)(2 SWS)*

ECTS awarding criteria:

- *Written exam at the end of the semester (1st and 2nd examination period) (90 Minutes)*

Workload / Distribution of ECTS credits:

- *30 h = Time of attendance lecture*
- *30 h = Preparation and postprocessing lecture*
- *30 h = Time of attendance tutorial*
- *30 h = Preparation and postprocessing tutorial*
- *30 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Teacher Training Program*

Remarks:

- *Wigger, B., 2006, Grundzüge der Finanzwissenschaft, 2nd edition, Springer.*
- *Wellisch, D. and U. Hange, 2014, Finanzwissenschaft I: Rechtfertigung der Staatstätigkeit, Vahlen.*
- *Wellisch, D. und E. Baumann, 2014, Finanzwissenschaft II: Theorie der Besteuerung, Vahlen.*
- *Wellisch, D., 2014, Finanzwissenschaft III: Staatsverschuldung, Vahlen.*
- *Blankart, C. B., 2017, Öffentliche Finanzen in der Demokratie, 9th edition, Vahlen.*
- *Brümmerhoff, D. und T. Büttner, 2018, Finanzwissenschaft, 12th edition.*
- *Homburg, S. 2015, Allgemeine Steuerlehre, 7th edition, Vahlen.*

Proseminar: Business Ethics and Corporate Governance

Module title	Proseminar: Business Ethics and Corporate Governance
Module title German	Proseminar: Unternehmensethik, insb. Corporate Governance
Module number	82-021-PS26-H-418
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business ethics, esp. Corporate Governance
Module Coordinator	Prof. Dr. Kai Sandner
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students are introduced to scientific work. By means of literature to be researched independently, students learn to acquire scientific knowledge and to apply it to selected questions.*
- *They will gain insight into scientific methods and how to apply them.*
- *Techniques for preparing scientific reports and then presenting the results will be taught.*
- *Participation in the seminar provides the first basics for the independent creation of scientific texts.*

Contents/Topics:

Topics from the areas:

- *Business Ethics*
- *Corporate Governance*
- *Controlling*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Previous knowledge from BA studies, especially in corporate governance/corporate ethics/controlling*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Seminar paper*
- *Presentation and discussion*

ECTS awarding criteria:

- *Term papers approximately 15 pages in length.*
- *Presentation of a duration of about 15 minutes.*

Workload / Distribution of ECTS credits:

- *40 h = Time of attendance lecture*
- *80 h = Preparation and follow-up of seminar papers*
- *30 h = Presentation*
- *150 h = Total workload*

Module grade:

- *Seminar paper (80%)*
- *Presentation (20%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration International B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Research project on sustainability

Module title	Research project on sustainability
Module title German	Research project on sustainability
Module number	
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics
Module Coordinator	Prof. Dr. Alexander M. Danzer
Credit Points (ECTS)	10 ECTS-Point

Learning Outcomes:

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Contents/Topics:

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- Q&A

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics, Foundations of Economy,*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

-
-
-

ECTS awarding criteria:

-

Workload / Distribution of ECTS credits:

- *90 h =*
- *90 h =*
- *120 h =*
- *300 h =*

Module grade:

- *Portfolio 100%*

Polyvalence with other degree programs/accessibility notes: -

Remarks: -

Service and Technology Marketing

Module title	Service and Technology Marketing
Module title German	Service and Technology Marketing
Module number	82-021-MD24-S-VLUE-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration and Service Management
Module Coordinator	Prof. Dr. Jens Hogleve
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students acquire knowledge of the particular challenges faced by (digital) service companies and how these can be mastered.*
- *In addition, students acquire knowledge of the specific service peculiarities and the need to integrate external factors in service creation, and their influence on marketing. Students will acquire skills on how to apply the concept of the 7P's of marketing as an extension of the traditional 4P approach and what are the specifics of marketing services. In addition, the course will discuss the impact of technological developments on the 7 P's of marketing, preparing students to manage technology-based service businesses.*
- *Students learn about the potential of new technologies for service companies and acquire knowledge about technology-based business models such as "apps", the "gig" economy, the sharing economy and the Internet of Things.*
- *In this course, students acquire knowledge about the implementation of quality standards and service strategies. Course participants learn about the framework for customer-oriented marketing and how customer satisfaction and customer loyalty can be improved through (digital) service strategies.*
- *Students learn how to use big data to inform decisions about customer-centric management activities and get an introduction to digital and social marketing communications activities.*
- *In addition to technical skills, students improve their analytical skills while discussing case studies, with a wide range of examples from the new economy such as AirBnB, Uber or OpenTable.*

Students learn how to analyze and critically evaluate practical case studies from different service industries. As the module takes place in English, there is additional support for the students' language skills.

Contents/Topics:

The content of the lecture is divided into the following areas, among others:

- *Introduction and relevance of services*
- *Technology & Service Management*
- *Acceptance & Marketing of technology-based services*
- *Big Data Management and Data Analytics as a Service*
- *(Digital) Service Design*
- *Design of the tangible (digital) environment*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Participation in the course “Fundamentals of Marketing Management”*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture and Tutorial*
- *Discussions*
- *Case Studies*

ECTS awarding criteria:

- *Performance record evaluated with at least “sufficient”: Written exam (90 minutes)*

Workload / Distribution of ECTS credits:

- 42 h = *Time of attendance lecture and tutorial*
- 50 h = *Preparation and postprocessing lecture and tutorial*
- 58 h = *Exam preparation*
- 150 h = *Total workload*

Module grade:

- *Written Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *French-German integrated Degree Program in Political Science (DFS) B.Sc.*

Remarks: -

Social Policy

Module title	Social Policy
Module title German	Social Policy
Module number	82-021-AC16-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economic and Business ethics
Module Coordinator	Prof. Dr. Jörg Althammer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students get an overview of the goals and the institutional structure of social policy in German and Europe*
- *They are enabled to analyse the impact of social political measures on allocation and distribution*

Contents/Topics:

Der Inhalt der Vorlesung untergliedert sich u.a. in folgende Bereiche:

- *The history of the German welfare state*
- *A theory of the Welfare State*
- *The institutional structure of the German welfare state*
- *The social security system*
- *Poverty and the benefit system*
- *Family policy*
- *Future problems*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Basic knowledge of micro- and macro economic theory*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*

ECTS awarding criteria:

- *Performance record evaluated with at least “sufficient”: Written exam (90 minutes)*

Workload / Distribution of ECTS credits:

- *60 h = Time of attendance lecture*
- *40 h = Preparation and postprocessing lecture*
- *50 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *Integrated degree program German and French Political Science M.Sc.*
- *LAG Gymnasium*

Remarks:

- *Althammer, J./Lampert, H. (2014): Lehrbuch der Sozialpolitik. 9. Aufl., Berlin [u.a.].*
- *Barr, N. (2004): The Economics of the Welfare State. 4. Aufl., Oxford.*
- *Ribhegge, H. (2004): Sozialpolitik. München.*
- *Zweifel, Peter/Breyer, Friedrich/Kifmann, Mathias (2009): Health Economics, 2nd edition, Berlin.*

Statistical Inference and Multivariate Statistics

Module title	Statistical Inference and Multivariate Statistics
Module title German	Statistical Inference and Multivariate Statistics
Module number	82-021-QM04-H-0507
Level	Bachelormodul
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Statistik und Quantitative Methoden
Module Coordinator	Prof. Dr. Ulrich Küsters
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students studying business administration acquire the common notions and techniques related to inductive and multivariate statistics within the scope of the module.*
- *Students develop the methodical expertise during lecture time. These competencies are also based on the preceding module descriptive statistics and probability theory. The initial lectures introduce the essential theoretical knowledge base in order to broaden the methodical expertise of the students.*
- *Within the scope of the exercises, students apply techniques in inductive and multivariate statistics on simple issues in the field of business sciences.*
- *The self-centered working method enables students to develop a self-competence as well as a self-reliant handling of statistical techniques and their efficient application in practice.*

Contents/Topics:

- *Statistical Inference*
 - *Sample functions*
 - *Point estimation*
 - *Confidence intervals*
 - *Testing statistical hypotheses*

- *Multivariate statistics*
 - *Correlation*
 - *Regression analysis*
 - *One-way analysis of variance*
 - *Partial correlation*
 - *Relationships between categorical data*
 - *Relationships between ordinal data*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics for Business*
- *Descriptive Statistics and Probability Theory*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture*
- *Exercise*

ECTS awarding criteria:

- *Performance record evaluated with at least “sufficient”: Written exam.*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *28 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*

- 28 h = Preparation and postprocessing tutorial
- 38 h = Exam preparation
- 150 h = Total workload

Module grade:

- Written exam at the end of semester (90 minutes) (100%)

Polyvalence with other degree programs/accessibility notes:

- International Business Administration B.Sc.
- Digital and Data-Driven Business B.Sc.
- Sustainability in Business & Economics B.Sc.

Remarks:

- Küsters, Ulrich (2015): *Foliensatz Statistik*, KUE/WFI, Ingolstadt.
- Schira, Josef (2012): *Statistische Methoden der VWL und BWL*. 4. Auflage, Pearson Studium, München.
- Fahrmeir, L., Künstler, R., Pigeot, I. and Tutz, G. (2010): *Statistik - Der Weg zur Datenanalyse*. 7. Auflage, Springer-Verlag, Berlin.
- Mosler, K., Schmid, F. (2009): *Beschreibende Statistik und Wirtschaftsstatistik*. 4. Auflage, Springer-Verlag, Heidelberg.
- Mosler, K., Schmid, F. (2011): *Wahrscheinlichkeitsrechnung und schließende Statistik*. 4. Auflage, Springer-Verlag, Heidelberg.

Supply Chain Analytics

Module title	Supply Chain Analytics
Module title German	Supply Chain Analytics
Module number	82-021-SCM01-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration, Supply Chain Management & Operations
Module Coordinator	Prof. Dr. Heinrich Kuhn
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The students will obtain a fundamental knowledge of modern approaches for logistics management*
- *The students understand the critical role of inventory and transportation management in global enterprises.*
- *The students will achieve the ability to apply their knowledge to production decisions in business practice and assess the associated impacts on people, nature, and the environment.*
- *Students learn the relevance of sustainable supply chain management concepts and how to implement it adequately.*

Contents/Topics:

- *Part A: Introduction*
 - *Terminological Issues of Logistics Management*
 - *Principles of Logistics Management*
 - *Sustainable Logistics and Supply Chain Management*
- *Part B: Inventory Management*
 - *Basics of Inventory Management*

- Lot Sizing
- Work-in-Process
- Safety Stock
- *Part C: Transportation Management*
 - Basic Methods for Transport Optimization
 - Transportation Planning
 - Packaging
 - Shortest Rout Problems
 - Traveling Salesman and Vehicle Routing

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Basic knowledge in operations management and statistics.*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture (VL) 2 SWS*
- *Tutorial (UE) 2 SWS*

ECTS awarding criteria:

- *Performance record assessed with at least “sufficient”: Final exam*

Workload / Distribution of ECTS credits:

- *32 h = Time of attendance lecture*
- *32 h = Preparation and postprocessing lecture*

- 32 h = Time of attendance tutorial
- 32 h = Preparation and postprocessing tutorial
- 22 h = Exam preparation
- 150 h = Total workload

Module grade:

- Written Exam (100%)

Polyvalence with other degree programs/accessibility notes:

- Digital and Data-Driven Business B.Sc.
- Sustainability in Business & Economics B.Sc.
- Mathematics M.Sc.
- Interdisciplinary Master's Program M.Sc.

Remarks:

Literatur

- Arnold D., Isermann H., Kuhn A., Tempelmeier H. (Hrsg): *Handbuch Logistik*, 3. Aufl., Berlin (Springer) 2008.
- Belvedere, Valeria and Grando Alberto, *Sustainable Operations and Supply Chain Management*, Series in Operations Research and Management Science, New York (Wiley) 2017.
- Chopra, S. and P. Meindl, *Supply Chain Management: Strategy, Planning, and Operation*, 6th edition, Upper Saddle River (Prentice Hall) 2015.
- Domschke, W. und A. Scholl, *Logistik: Rundreisen und Touren*, 5. Aufl., München (Oldenbourg) 2010
- Grünert, T. und Irnich, St., *Optimierung im Transport*, Band 1 und 2, Aachen (Shaker) 2005.
- Günther, H.-O. und H. Tempelmeier, *Supply Chain Analytics*, 13. Aufl., Norderstedt, (Books on Demand) 2020.
- Hußmann, St. und Lutz-Westphal, B. (Hrsg.), *Kombinatorische Optimierung erleben*, Wiesbaden (Vieweg), 2007

- *Lu, Meng and De Bock Joost (Eds.) Sustainable Logistics and Supply Chains - Innovations and Integral Approaches, Berlin (Springer) 2016.*
- *Pfohl, H.-Ch., Logistiksysteme, 9. Aufl., Berlin (Springer) 2018.*
- *Render, B.; R.M. Stair and M.E. Hanna, Quantitative Analysis for Management, 13th edition, Upper Saddle River (Prentice Hall), 2017.*
- *Tempelmeier, H., Analytics im Bestandsmanagement, 7. Aufl., Norderstedt (Books on Demand) 2020.*
- *Wensing T. und Kuhn, H., Nachhaltige Entwicklung mit Operations Research, in: Burger, A, Kuhn H. und O. Kohmann (Hrsg.), Gewinn oder Ethik – Ethische Perspektiven in den Wirtschaftswissenschaften, Ingolstadt (WFI) 2010, S. 255-281.*

Supply Chain Controlling

Module title	Supply Chain Controlling
Module title German	Supply Chain Controlling
Module number	82-021-SCM20-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration, Supply Chain Management & Operations
Module Coordinator	Prof. Dr. Heinrich Kuhn
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *The objective of the course is to acquaint the students with the interface of finance and supply chain management and to outline financial effects of supply chain management practices, as well as to understand the effects of a company's business model on its supply chain.*
- *Students learn to analyze and compare working capital and cost developments of several companies of a self chosen industry. By doing so the students reflect the impacts of external effects and the companies' business models on their supply chains.*
- *A side outcome is learning to cope with data that also occur in a professional context and to reflect as well as validate their correctness and usability. Additional students practice the ability to work in teams.*
- *Attendance of lecture as well as group presentations and discussions are compulsory.*

Contents/Topics:

- *Management accounting and cost accounting concepts in the supply chain: standard costing, intercompany pricing, activity-based costing, target costing*
- *Working capital management: link to value based management, performance indicators, and link to supply chain management concepts*
- *Performance management in supply chains*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Fundamentals of supply chain management and cost accounting*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lecture (VL) 2 SWS*
- *Tutorial (UE) 2 SWS*

ECTS awarding criteria: *Performance record assessed with at least “sufficient” of portfolio containing:*

- *Case study (30%)*
- *Group presentation (40%)*
- *Written exam (30%)*

Workload / Distribution of ECTS credits:

- *24 h = Time of attendance lectures and tutorials*
- *12 h = Preparation and postprocessing lecture and tutorials*
- *32 h = Field research*
- *32 h = Elaboration of the paper*
- *20 h = Preparation of the presentation*
- *30 h = Exam preparation*
- *150 h = Total workload*

Module grade:

Portfolio consisting of

- *Development of a written case study (30%)*
- *Group presentation (40%)*
- *Written Exam (30%)*

Polyvalence with other degree programs/accessibility notes:

- *Sustainability in Business & Economics B.Sc.*
- *Data Science B.Sc.*

Remarks: -

Sustainable Development

Module title	Sustainable Development
Module title German	Sustainable Development
Module number	82-021-SBE02-H-0823
Level	Bachelormodul
Course rotation	SoSe
Degree program hosting the module	Sustainability in Business & Economics B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Economics, esp. Microeconomics
Module Coordinator	Prof. Dr. Alexander M. Danzer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students of the course acquire substantial knowledge about sustainable development and the trade-offs in economic growth.*
- *They are able to apply simple theoretical and empirical analyses to the study of sustainable development and development policies.*
- *Students develop reflected views on fundamental determinants of sustainable growth, human development and structural imbalances, e.g., the quality and design of institutions or the importance of political leadership.*
- *Students acquire knowledge about the global development agenda (e.g., Sustainable Development Goals) and specific development policies.*
- *Students learn to assume different roles in simulation games to solve simulated real world challenges in smaller groups; they learn to search for suitable data to understand and present their assigned role (e.g., different agents, such as politicians, households, farmers, CEOs of international companies, NGOs) and express their policy preferences. They are able to analyse, interpret, critically assess, and present the data.*

Contents/Topics:

- *Introduction to basic methods and empirical strategies in sustainable development*
 - *Correlation vs. causality*

- *Experiments and Randomized Controlled Trials (RCTs)*
- *Observational data and quasi experiments*
- *Measurement of growth, poverty, inequality and social exclusion*
- *Fundamental determinants of economic development*
 - *History and institutions*
 - *Good and bad policies, good and bad politicians*
 - *Market vs. plan*
- *Human development*
 - *The demographic transition, fertility and population ageing*
 - *Education, knowledge and skills*
 - *Health and quality of life*
- *Structural imbalances*
 - *Risk and insurance*
 - *The urban-rural division and migration*
 - *Climate change*
- *Stakeholders and agents*
 - *Individuals*
 - *Households*
 - *Business*
 - *Lobby groups*
 - *Government*
 - *Supranational institutions*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Mathematics, Descriptive statistics, Microeconomics, Macroeconomics*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Lectures*
- *Tutorials*
- *Simulation Game*

ECTS awarding criteria:

- *Written exam at the end of the term (60 Minutes)*

Workload / Distribution of ECTS credits:

- *28 h = Time of attendance lecture*
- *22 h = Preparation and postprocessing lecture*
- *28 h = Time of attendance tutorial*
- *22 h = Preparation and postprocessing tutorial*
- *50 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Final exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *Business Administration B.Sc.*

Remarks: -

Systems Development

Module title	Systems Development
Module title German	Systems Development
Module number	82-021-IFM01-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Bachelor Business Administration
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Business Administration and Business Informatics
Module Coordinator	Prof. Dr. Thomas Setzer
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

- *Students acquire skills for autonomous planning & processing extensive professional problem sets.*
- *They develop an understanding for overall interrelations of methods and processes in the development and implementation of IT-applications.*
- *In the tutorial on ARIS Toolset, the students structure their own and externally given tasks and learning targets and draw conclusions for the work process in their team.*
- *They will possess profound knowledge and will be able to succeed in different task assignments .*

Contents/Topics:

Systems Development: Basics

- *Information management*
- *Basics in modelling of information systems*
- *Process models for system development*
- *Structured system development with ARIS, especially process and data modelling*
- *Object oriented system development with ARIS and UML*
- *Phase overlapping tasks in systems development*

Systems Development: ARIS Toolset

- *Overview of the methods for designing business processes and creating IT enterprise architectures*
- *Introduction to ARIS methodology*
- *Working with ARIS Toolset*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Basic knowledge of business informatics is expected.*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Lecture & Tutorial*

ECTS awarding criteria: *Written exam of 90 minutes. Exam language is German. Students may answer in English as well as in German.*

Workload / Distribution of ECTS credits:

- *20 h = Time of attendance lecture*
- *30 h = Preparation and postprocessing lecture*
- *20 h = Time of attendance tutorial*
- *50 h = Preparation and postprocessing tutorial*
- *20 h = Exam preparation*
- *140 h = Total workload*

Module grade:

- *Exam (100%)*

Polyvalence with other degree programs/accessibility notes:

- *International Business Administration B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Business German I

Module title	Business German I
Module title German	Business German I
Module number	82-021-WSprachen07-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for graph descriptions*
- *enhance overall communicative competence*
- *develop social skills and intercultural sensibility in group work with students from diverse cultural backgrounds*

Contents/Topics:

- *Various business topics ranging from marketing and banking to personnel and recruitment.*

Formal requirements for participation:

- *Skill level B2 (CEFR)*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria:

The final grade is based on

- *a professional presentation on a relevant business topic*
- *a written exam including vocabulary test and essay*

Due to skills orientation this module requires oral and written exam components.

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation/paper*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Participation limit 20*

Business German II

Module title	Business German II
Module title German	Business German II
Module number	82-021-WSprachen08-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary*
- *acquire basic professional presentation skills in German*
- *practice the necessary skills for graph descriptions*

Contents/Topics:

- *Various business topics ranging from marketing and banking to personnel and recruitment.*

Formal requirements for participation:

- *Business German I*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *German*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria: *The final grade is based on an oral discussion on a relevant business topic and a written exam including vocabulary test and essay. Due to skills orientation this module requires oral and written exam components*

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Participation limit 20*

Business English I

Module title	Business English I
Module title German	Business English I
Module number	82-021-WSprachen01-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for graph descriptions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial presentation feedback*
- *develop social skills during group work with fellow students*

Contents/Topics:

- *Management*
- *Company Structure*
- *Work and motivation*
- *Management and cultural diversity*
- *Recruitment*
- *Labor Relations*

- *Production*
- *Products*
- *Marketing*
- *Advertising*
- *Promotional Tools*

Formal requirements for participation:

- *Skill level B2 (CEFR)/test at beginning of semester*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria:

The final grade is based on

- *a professional presentation on a relevant business topic*
- *a written exam including vocabulary test and essay*

Due to skills orientation this module requires oral and written exam components.

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation/paper*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Participation limit 20*

Business English II

Module title	Business English II
Module title German	Business English II
Module number	82-021-WSprachen02-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes: *This module helps students to*

- *learn and practice a comprehensive set of business vocabulary at level B2+*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for professional discussions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial discussion feedback*

Contents/Topics:

- *Accounting*
- *Banking*
- *Stocks and shares*
- *Market structure*
- *Takeovers & mergers*
- *Efficiency and employment*
- *Business ethics*
- *The role of government*

- *Exchange rates*
- *The business cycle*
- *International trade*
- *Economics and ecology*

Formal requirements for participation:

- *Business English I*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *English*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria: *The final grade is based on an oral discussion on a relevant business topic and a written exam including vocabulary test and essay. Due to skills orientation this module requires oral and written exam components.*

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Nachhaltige Wirtschaft & gesellschaftliche Verantwortung B.Sc.*

Remarks:

- *Participation limit 20*

Business French I

Module title	Business French I
Module title German	Business French I
Module number	82-021-WSprachen03-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for graph descriptions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial presentation feedback*
- *develop social skills during group work with fellow students*

Contents/Topics:

- *Various subject areas related to business and economics, e.g. company structure, production, distribution.*
- *Lexis for professional presentations*

Formal requirements for participation:

- *None*

Recommended requirements for participation::

- *Skill level B2 (CEFR)/test at beginning of semester*

Teaching and Examination language:

- *French*

Teaching methods/Course types:

- *interactive*

ECTS awarding criteria:

The final grade is based on

- *a professional presentation on a relevant business topic*
- *a written exam including vocabulary test and essay*

Due to skills orientation this module requires oral and written exam components.

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation/paper*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Romanistik/Wirtschaft/Geographie B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks: -

Business French II

Module title	Business French II
Module title German	Business French II
Module number	82-021-WSprachen02-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2+*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for professional discussions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial discussion feedback*
- *develop social skills during group work with fellow students*

Contents/Topics:

- *Various subject areas related to business and economics, e.g. company structure, production, distribution.*
- *Lexis for professional presentations*

Formal requirements for participation:

- *Business French I*

Recommended requirements for participation::

- *Keine*

Teaching and Examination language:

- *French*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria: *The final grade is based on an oral discussion on a relevant business topic and a written exam including vocabulary test and essay. Due to skills orientation this module requires oral and written exam components.*

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Digital and Data-Driven Business B.Sc.*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Participation limit 15*

Business Spanish I

Module title	Business Spanish I
Module title German	Business Spanish I
Module number	82-021-WSprachen05-H-0507
Level	Bachelor module
Course rotation	WiSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for graph descriptions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial presentation feedback*
- *develop social skills during group work with fellow students*

Contents/Topics:

- *Various subject areas related to business and economics, e.g. company structure, production, distribution.*
- *Lexis for professional presentations in a business setting*

Formal requirements for participation:

- *Skill level B2 (CEFR)/test at beginning of semester*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *Spanish*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria:

The final grade is based on

- *a professional presentation on a relevant business topic*
- *a written exam including vocabulary test and essay*

Due to skills orientation this module requires oral and written exam components.

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation/paper*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Romanistik/Wirtschaft/Geographie*
- *Sustainability in Business & Economics B.Sc.*

Remarks:

- *Participation limit 20*

Business Spanish II

Module title	Business Spanish II
Module title German	Business English II
Module number	82-021-WSprachen06-H-0507
Level	Bachelor module
Course rotation	SuSe
Degree program hosting the module	Business Administration B.Sc.
Institutional anchoring	Ingolstadt School of Management
Subjects involved	Center for Business Languages
Module Coordinator	Lawrence Diederich
Credit Points (ECTS)	5 ECTS-Point

Learning Outcomes:

This module helps students to

- *learn and practice a comprehensive set of business vocabulary at level B2+*
- *acquire basic professional presentation skills in the target language*
- *practice the necessary skills for professional discussions*
- *enhance overall communicative competence*
- *improve self-reflection competence due to substantial discussion feedback*
- *develop social skills during group work with fellow students*

Contents/Topics:

- *Various subject areas related to business and economics, e.g. company structure, production, distribution.*
- *Lexis for professional presentations in a business setting*

Formal requirements for participation:

- *Business Spanish I*

Recommended requirements for participation::

- *None*

Teaching and Examination language:

- *Spanish*

Teaching methods/Course types:

- *Interactive*

ECTS awarding criteria: *The final grade is based on an oral discussion on a relevant business topic and a written exam including vocabulary test and essay. Due to skills orientation this module requires oral and written exam components.*

Workload / Distribution of ECTS credits:

- *39 h = Time of attendance exercise*
- *59 h = Preparation and postprocessing exercise*
- *52 h = Exam preparation*
- *150 h = Total workload*

Module grade:

- *Oral Exam (50%)*
- *Written Exam (50%)*

Polyvalence with other degree programs/accessibility notes:

- *Romanistik/Wirtschaft/Geographie*
- *Nachhaltige Wirtschaft & gesellschaftliche Verantwortung B.Sc.*

Remarks:

- *Participation limit 20*