

# Student Handbook 2025-2026

# MSc in Energy Law, Business, Regulation and Policy





The Study Programme is Certified by the Hellenic Authority for Higher Education (HAHE)

University Center for International Programmes of Studies

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#### THE INTERNATIONAL HELLENIC UNIVERSITY

# Introduction

The International Hellenic University (IHU) was initially established by Law (No 3391/2005) and was based in Thessaloniki, Greece. The IHU was Greece's first public university where programmes were taught exclusively in English comprised three (3) Schools which offered twenty-four (24) master programmes.

The International Hellenic University was re-established by Law (No 4610/2019) and is subject to the internal regulation of IHU ( $\Delta\Phi$ 2.1/9000 dated 22 July 2025, is based in Thessaloniki, comprises nine (9) Schools and thirty-three (33) Departments and is located in Thessaloniki, Kavala, Serres, Drama, Katerini, Kilkis, Didymoteicho. The two Schools (**School of Humanities, Social Sciences and Economics** and the School of Science and Technology) of the IHU belong to the **University Center of International Programmes of Studies (UCIPS)** of the International Hellenic University offering programmes that are taught exclusively in English.

The UCIPS, developed to facilitate modern learning methods, is situated on a 16,000m<sup>2</sup> campus outside Thessaloniki, the second largest city in Greece with an uninterrupted history of 2,300 years. Our state-of- theart facilities, such as virtual classrooms, electronic library, IT labs, Digital Manufacturing and Materials Characterization Laboratory and Molecular Ecology/Molecular Biology Lab create an environment conducive for higher learning and research for our students.

#### **Our Mission**

Our strategic mission is threefold:

- Provide research and education that meets the needs of the international community
- Enhance understanding of the economic, socio-political and technological issues facing the societies we serve, through teaching and research of the highest academic standard
- Create a truly international and diverse student and faculty community to foster greater understanding between cultures and nations.

# Academic Management

The IHU Governing Board is the overall body governing the operation of the University in accordance with respective legislation and its own internal regulations. Together with the responsibility for overall educational and research policy and the University's development strategy, the Governing Board is also ultimately responsible for all administrative or organisational matters of the University. Upon approval by the Governing Board, all proposals for postgraduate study programmes are submitted by the same to the Ministry of Education & Religious Affairs.

The General Assembly of the School of Humanities, Social Sciences and Economics is responsible for all academic and administrative matters. It is responsible for drafting and submitting proposals for postgraduate study programmes, appointing advisory committees, examination committees, the award of postgraduate degrees, selection or examination of prospective postgraduate students and for any other matter foreseen in the respective legislation. In the case of interdepartmental Postgraduate Study Programmes, the Special Interdepartmental Committee (S.I.C.) has the same powers as the General Assembly and is comprised of members of the corresponding General Assemblies.

A Programme Coordinating Committee is responsible for monitoring and coordinating the operation of each respective postgraduate programme. It reports to the General Assembly of the School.

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The Programme Director, assisted and deputized by the Assistant Director, is responsible for promoting the effective implementation of the postgraduate study programme. The Programme Director reports to the General Assembly of the School on all issues regarding the effective operation of the programme.

The Student-Staff Liaison Committee is part of the School's quality control mechanism. Its purpose is to ensure good communication with the students on your programme of study and to identify areas where improvements could be made. The students will elect three members as class representatives. The student reps will meet at least once per term with the Programme Director and members of the faculty. The meetings are informal in style but all issues raised are taken seriously and responded to. The course office produces minutes of each meeting which are then sent to all members of the class. Students will be informed of actions taken by the School to resolve any issues raised at SSLC meetings. The student representatives have the chance, upon request, to meet with the President of the Governing Board of the University Center of International Programmes of Studies.

Please note that in addition, all students participate in the evaluation of their courses and programme by completing and submitting the respective Course Evaluation Forms and the IHU Exit Questionnaire.

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# PART I: MSc in Energy Law, Business, Regulation and Policy

# Aims and Objectives

The Master of Science in Energy Law, Business, Regulation and Policy is designed to provide education, specialization and experience in the fields of Law, Economics and Energy Business, Energy Policy, Geostrategy at post-graduate-level, as well as insight regarding regulatory intervention in the energy sector as a whole. Emphasis will be given to the current legal, economic, geopolitical, business and environmental concerns and the politically- legislatively- and jurisprudentially-driven solutions within the sector in the major European, as well as the World Energy Area, with respect to energy sources; energy infrastructure; international energy transactions; energy transportation and storage; all relevant legal, commercial and business-plans; regulatory, geopolitical, economic and financial issues; dispute-resolution mechanisms in the energy sector, aimed at an all-round multidisciplinary approach to energy affairs.

The primary objectives of this Postgraduate Program are:

- Acquiring specialized knowledge in order to pursue a successful career in national and international organizations, businesses and corporations, law offices and firms, Regulatory Agencies as well as public-sector agencies and organizations engaged across the spectrum of energy-related affairs.
- Comprehending and understanding the issues that arise with respect to a modern globalized energy market, to energy transactions, and to their geostrategic and environmental implications as well as to the rapid and effective resolution of emerging disputes.
- An in-depth study of the issues related to the formulation, planning, crystallization and deployment of energy policy at a national, European and international level and to their respective features and framework.
- A thorough understanding of transnational, European and comparative aspects of the law related to energy and trade issues; companies, international transactions, economic affairs, financial affairs and to alternative dispute resolution mechanisms.

The IHU MSc in Energy Law, Business, Regulation and Policy, with an awareness of the fact the University operates in an ever-changing environment, promotes learning and teaching by means of diversity of resources as well as of highly distinguished teaching styles and techniques. Teaching and learning methods International Hellenic University - School of Humanities, Social Sciences and Economics

should assist the development of these skills by encouraging not merely the capacity for abstract reasoning but also the students' capacities for independent and self-motivated learning, problem-solving skills, and some of the knowledge and skills which are common to employment in many fields.

The traditional lecture supported by PowerPoint and lecture notes continues to be the principal method of delivery. However, classes will be supported by comprehensive e-learning material. Classes will take place on weekends.

Lecturing emphasizes interactive activities, making full use of the University facilities. The methods chosen reflect the needs of the students, the aims and target learning outcomes of the programme or the individual course and the resources available. Learning, teaching and assessment methods are regularly reviewed in an effort to maximize efforts and results. Theory, understanding and information are imparted through problem solving and class discussions. Students also learn through reading relevant literature. Coursework and assignments (individual and in small groups) develop the ability of students to solve problems. Projects allow the students to study a subject in depth, working more independently where possible. Group projects are also used, which help develop team-working skills. Teaching and learning methods provide the opportunity for students to apply their knowledge and expertise to problems beyond those generally encountered. Higher level skills are fostered and encouraged. Students are expected to spend a substantial amount of time working on their own, going through their notes and studying suggested textbooks and specialist readings as well as making use of the support provided through e-learning materials.

# **Programme Structure**

The MSc in Energy Law, Business, Regulation and Policy (full-time mode) is a postgraduate programme taught over three semesters (16 months) comprised of four (4) parts/terms. During the first term, all students are required to follow five (5) mandatory core courses. During the second term, all students follow further four (4) core courses. During the third term, all students are required to follow two (2) elective courses. Finally, the fourth term is taken up with work on the Dissertation.

Lectures take place mainly during weekends over three teaching periods/terms.

It is also available in part-time mode over 26 months for those who cannot commit to a full-time programme.

Description		Hours	Credits
9 Core Courses	(30Hours each)	270	54
2 Elective Courses	(16 Hours each)	32	6
Dissertation			30
Total Taught Hours		302	90

#### The Core Curriculum and Electives

The IHU "Master of Science in Energy Law, Business, Regulation and Policy" has as its objective the provision of postgraduate level studies, specialization and experience in Energy Law, Business, Energy Policy, and Geostrategy, as well as the general regulatory intervention in the area of the energy sector as a whole.

Term	Core Courses	Hours	Credits
1	Energy Law I: General Aspects - Legal framework of Electricity, Natural Gas, Renewable Energy Sources & Hydrocarbons - Law and Regulation - Licensing - Competition - Consumer Protection - Climate Change and its effects on the security of energy supply	30	6
1	Foundations of Finance in the Energy Sector: Energy Project Finance - Raising Capital - Techniques of Financial Analysis - Capital Budgeting and Expenditure - Investment and Business - Decision Rules - Principles of Financial and Management Accounting - Corporate Governance and Corporate Social Responsibility	30	6
1	Alternative Dispute Resolution in the Energy Sector:  Energy disputes settlement - ADR vs Traditional Litigation - Procedural Framework - Recent Legislation - Dispute Resolution under the Energy Charter Treaty-Climate Crisis Dispute Resolution	30	6
1	Energy Economics: Economics of Energy and Environment Protection - Energy Pricing and Taxation - Environmental and Resource Economics - Economics of Climate Change - Energy Demand and Supply	30	6
1	Energy Transport & Storage: Energy & Traffic Legislation - Shipping & Energy Transport - LNG and CNG Transportation - Energy Hubs -Energy Storage- Pipelines - Batteries -Hydrogen - Technology of Energy Transport - Storage Facilities	30	6
2	Energy Law II: EU Competition Law in the Energy Sector - Dispute Resolution in the Energy Sector (Negotiations, Energy Arbitration) - State Aid in the Energy Sector - Target Model and Electricity Market Design - Energy Exchange	30	6
2	Cross-border Energy Trade: Energy Agreements (Production Sharing Agreements, Joint Operating Agreements- Midstream & Downstream Agreements) - Energy Contracts, International Energy Transactions - Investment Protection Under Contracts and Energy Charter Treaty	30	6
2	Energy Politics & Security: Energy Players and Strategies - Energy Diplomacy - Energy Conflicts & Security - Geopolitics and International Relations - Tools of Producing Geopolitical Analysis - Climate Crisis and its Geopolitical Impact	30	6
2	Energy and Environmental Policy: Energy Policy - Energy & Environment - Environmental legislation and regulation - Transition - Climate Change, Nature Conservation - Renewable Energy Sources in the European Energy Mix - The Energy Road Map 2050 - Water Law Intro- Hydrogen issues	30	6
Term	Elective Courses*	Hours	Credits
3	Management and Design of Renewable Energy and Sustainability Systems	16	3

3	Mergers and Acquisitions in the Energy Industry	16	3
3	Quantitative Methods for Energy and Environmental Economists	16	3
3	Water Law & Policy	16	3
3	International & European Environmental Law & Policy	16	3
3	Derivatives for Energy	16	3
3	Recent Developments in Energy Law & Business	16	3
3	Recent Developments in the Electricity Sector	16	3

<sup>\*</sup> Electives may vary from year to year depending on current interest and student demand.

# **Part Time**

The program is also possible to run in a part-time mode over 2 years. The first year includes three teaching periods during which five core courses and one elective course are offered. The second year students are taught over three teaching periods the remaining four core courses and one more elective course. During the second year there is a fourth period in which the Dissertation should be completed.

YEAR 1
CORE COURSES

Term	Core Courses	Hours	Credits
1	Energy Law I	30	6
1	Alternative Dispute Resolution in the Energy Sector	30	6
1	Energy Transport & Storage	30	6
2	Cross- border Energy Trade	30	6
2	Energy and Environmental Policy		

#### **ELECTIVE COURSES**

Term	Elective Courses*	Hours	Credits
3	Management and Design of Renewable Energy and Sustainability Systems	16	3
3	Mergers and Acquisitions in the Energy Industry	16	3
3	Quantitative Methods for Energy and Environmental Economists	16	3
3	Water Law & Policy	16	3
3	International & European Environmental Law & Policy	16	3
3	Derivatives for Energy	16	3
3	Recent Developments in Energy Law & Business	16	3
3	Recent Developments in the Electricity Sector	16	3

<sup>\*</sup> Electives may vary from year to year depending on current interest and student demand.

YEAR 2
CORE COURSES

Term	Core Courses	Hours	Credits
1	Foundations of Finance in the Energy Sector	30	6
1	Energy Economics	30	6
2	Energy Law II	30	6
2	Energy Politics & Security	30	6

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#### **ELECTIVE COURSES**

Term	Elective Courses*	Hours	Credits
3	Management and Design of Renewable Energy and Sustainability Systems	16	3
3	Mergers and Acquisitions in the Energy Industry	16	3
3	Quantitative Methods for Energy and Environmental Economists	16	3
3	Water Law & Policy	16	3
3	International & European Environmental Law & Policy	16	3
3	Derivatives for Energy	16	3
3	Recent Developments in Energy Law & Business	16	3
3	Recent Developments in the Electricity Sector	16	3

<sup>\*</sup> Electives may vary from year to year depending on current interest and student demand.

# The Dissertation Proposal

The Dissertation Proposal should present an overview of a research investigation proposition that can be completed and submitted by the stipulated submission deadline. It is a checklist of fundamental elements of the dissertation that students need to consider and include in their finished thesis. The Dissertation Proposal should be around 1,000 words in length. The proposal should include the following: draft title; motivation/background information on the topic; objectives/research questions; initial review of the literature and main arguments; expected outcomes & main contribution of the dissertation thesis.

#### The Dissertation

By the end of the series of taught courses, students choose a dissertation topic relevant to the courses of the MSc programme and related to their academic interests and career aspirations and work on a 6-month thesis. The topic is chosen by the student with input and advice by a member of the academic faculty, who acts as the supervisor, working closely with the student. The dissertation is an individual paper of original scientific work, which upon completion is submitted for examination and approval by a three-member committee chaired by the student's supervisor. The Dissertation tests the ability to develop and present a cogent argument. The length of the dissertation should not exceed 12,000 words exclusive of footnotes, appendices and bibliography.

# **CORE COURSE DETAILS**

# Energy Law I

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

#### **Aims**

The aim of this course is to familiarize and provide students with a solid foundation in the legal concepts of Energy Law and the regulation of the relevant markets, so that they may put all challenges in perspective and appraise the energy sector's issues and policies. Energy Law will be examined as an entire modern legal system. The course is geared towards examining central and particular themes and debates in energy regulation and their impact on legal developments and policy reform. Moreover, it shall take a comprehensive approach to energy issues in Europe by showcasing that the current regime is an accumulation of decades of policy choices. In that regard, the administrative models under the legal framework of the EU Third Liberalization Package and the organization and operation of specific energy markets and sectors such as gas, electricity, renewable energy sources and hydrocarbons will be examined in detail in an effort to provide students with a substantial understanding of market functions across Europe, main issues and constraints of the energy regulation procedure as well as the interrelation between EU Energy Law and other EU law areas, as Third Party Access, Competition and Consumer Protection. In addition, the Energy Transition and the operation of the Wholesale Electricity Markets are taught. Finally, a key component of the course is to help students explore the administrative framework with regard to licenses each time it is necessary for the undertaken activity with a particular emphasis on the relevant terms and conditions such as Technical Conditions, Financial Requirements, Right and Obligations of Licensees, Environmental Standards and Dispute Procedures.

# Learning outcomes

On completing the course the participants will be able to:

- understand the fundamental legal principles applying to modern-day energy policy and energy law developments and the way that the energy regulation works;
- understand the function of energy sectors/markets;
- gain an understanding of the legal Framework applying to every stage of the energy supply chain including grid operation, unbundling requirements and the authorization procedure;
- be aware of traditional issues as well as contemporary issues faced by the energy sector such as competition versus state control and consumer protection;
- critically evaluate the importance of regulation against abuses of market power that may possibly emerge;
- analyze and distinguish between economically useful and economically harmful forms of law and regulation;
- develop a critical awareness of the social and political influence on the operation of the energy market with regard to consumer welfare;
- acquire knowledge of energy regulation issues through parallel references to relevant case law of EU Courts;
- · Understand the fundamental principles and issues of hydrocarbons law.

#### **Content**

General Aspects of Energy Law;

- Legal framework of Electricity, Natural Gas, Renewable Energy Sources & Hydrocarbons;
- Law and Regulation;
- · Licensing;
- Consumer Protection;

#### Reading

#### **Books**

- Roggenkamp/Ronne/Redgwell/Del Guayo, [2001], Energy Law in Europe, Oxford University Press, UK;
- Cameron, P. [2005], Legal Aspects of EU Energy Regulation, Oxford University Press, UK;
- Jones, C. [2010], EU Energy Law, Claeys and Casteels Ed, the Netherlands;
- Cameron, P. [2007], Competition in Energy Market, Oxford University Press, UK;
- Delveaux/Hunt/Talus [2007], EU Energy Law and Policy Issues, Euroconfidentiel Ed;
- Gkountis/Ziogos/Ioannou [2021]- Scientific Director Panagos, Wholesale Electricity Markets/Regulatory Framework and Operation;
- Galanis P. [2023], Climate change law: (EU national), Nomiki Vivliothiki Ed;
- Iliadou Aik., Energy law: contemporary challenges and the role of the state, Nomiki Vivliothiki Ed(2021);
- Panagos, T. [2012], The Legal Framework of the Energy Sector, Sakkoulas Ed, Greece;
- Panagos, T. [2011], The unbundling of the Companies in Energy Sector, Sakkoulas Ed;
- Panagos, T. [2014], Hydrocarbons Exploration and Exploitation. The Regulatory framework in Greece, Sakkoulas Ed;
- Panagos, T. [2018], The Handbook of Energy Law;
- Panagos T./Komnios K. [2022], Climate Crisis-Sectoral Impacts, Sakkoulas Ed;
- Panagos T. [2023], Energy & Society: the Social Dimension of Energy, Sakkoulas Ed;
- Panagos T./ Vagiona D. [2024], Eisagogi stin xorothetisi ton ananeosimon pigon energeias (greek), Sakkoulas
- Pliakos A. [2022], European energy law: policy, regulation and competition in energy markets, Nomiki Vivliothiki Ed;
- Heffron, R. J. [2015], Energy Law: An Introduction, Springer Ed: Heidelberg, Germany;
- Arif, M. [2010], Energy Charter Treaty: Implications on Cross Border Energy Trade in Asia, LAP LAMBERT Academic Publishing;
- Coop, G. / Ribeiro, C. [2008], Investment Protection and the Energy Charter Treaty, JurisNet LLC, USA;
- Khatidze, G. [2010], Investment under the Energy Charter Treaty: Protecting the Foreign Energy Investment by Means of the Energy Charter Treaty Provisions, VDM Verlag;
- Roe, T. / Happold, M. [2011], Settlement of Investment Disputes under the Energy Charter Treaty,
   Cambridge University Press, UK;
- Waelde, T. W. [1996], The Energy Charter Treaty: An East-West Gateway for Investment and Trade, Kluwer Law International, the Netherlands;
- Schill, S.W. [2009], The multilateralization of international investment law, Cambridge University Press, UK;
- Selivanova, Y. [Ed.] [2012], Regulation of energy in international trade law: WTO, NAFTA and energy charter, Kluwer Law International, the Netherlands;
- Talus, K. [2013], EU Energy Law and Policy, A critical account, Oxford University Press, UK;
- Johnston, A., / Block, G. [2012], EU Energy Law, Oxford University Press, UK;
- Roggenkamp, M. / Hernandez, L.B./Zillman, D.N./ Guayo, I. [2012], Energy Networks and the Law, Oxford University Press, UK;

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- Cameron, P. [2005], Legal Aspects of EU Energy Regulation, Implementing the New Directives on Electricity and Gas Across Europe, Oxford University Press, UK;
- Cameron, P. [2002], Competition in Energy Markets, Law and Regulation in the European Union, Oxford University Press, UK;
- Metaxas, A. [2010], EU Energy Policy in: G. F. Kalavros and Th. G. Georgopoulos, European Union Law, Volume II, Nomiki Vivliothiki, Greece;

- Metaxas, A./ Nicolaides, P., Asymmetric Tax Measures and EU State Aid Law, The "Special Solidarity Levy" on Greek Producers of Electricity from Renewable Energy Sources, to be published by European State Aid Law Qualterly;
- Evanthie, M. / Hills, M. J. [ed.][2013], Renewable Energy Governance, Lecture Notes, Springe Editions;
- Metaxas, A. /Tsinisizelis, M. [2013], The Development of Renewable Energy Governance in Greece;
- Examples of a Failed [?] Policy, Published in Renewable Energy Governance, Lecture Notes in Energy, Volume 57, pp 155-168;
- Bunter, M. [2002], The promotion and licensing of Petroleum Prospective Acreage, Kluwer Law International, the Netherlands;
- Duval, C. /Le Leuch, H., / Pertuzzio, A., /Weaver, J. [2009], International Petroleum Exploration and Exploitation Agreements: Legal, Economics and Policy Aspects, Barrows Company, USA;
- Fagan, A. J. [1991], An introduction to the petroleum industry, Government of Newfoundland and Labrador, Dept. of Mines and Energy.

#### **Articles**

- Belz, M. [2008], Provisional Application of the Energy Charter Treaty: Kardassopoulos v. Georgia and Improving Provisional Application in Multilateral Treaties, Emory International Law Review, vol. 22, p. 727 ff;
- Konoplyanik, A. / Waelde, T. [2006], Energy Charter Treaty and its Role in International Energy, Journal of Energy & Natural Resources Law, vol. 24[4], p. 523 ff;
- Reed, L. / L. Martinez [2008], The Energy Charter Treaty: An Overview, ILSA Journal of International and Comparative Law, vol. 14, p. 405 ff;
- Sussman, E. [2008], The Energy Charter Treaty's Investor Protection Provisions: Potential to Foster Solutions to Global Warming and Promote Sustainable Development, ILSA Journal of International and Comparative Law, vol. 14, p. 391 ff;
- Waelde, T. W. / Wouters, P. K. [1997], State Responsibility and the Energy Charter Treaty: The Rules Regarding State Enterprises, Entities, and Subnational Authorities, Hofstra Law and Policy Symposium, vol. 2, p. 117 ff.;
- Malkiel, Y., Hindsight Regulation of Hydrocarbon Exploration: Lessons from Israel's Gas Bonanzas, Energy Law Journal, vol. 33, 2012, pp. 405 et seq.;
- Martin, Lex Petrolea in International Law, vol. Dispute Resolution in the Energy Sector, 2012, pp. 95 et seq.;
- Stamataki, S.,[2012], The framework for the hydrocarbons exploration and exploitation, vol. "Greek Hydrocarbons: From exploration to exploitation", Athens Academy;
- Georgakopoulos, A., [2012], The development of the greek hydrocarbons: A longterm, high risk and expensive procedure, vol. "Greek Hydrocarbons: From exploration to exploitation", Athens Academy;
- Brown, L.F., [1974], Critical role for geologists in resource and environmental management, Bulletin American Association of Petroleum Geologists, vol. 58.

# Foundations of Finance in the Energy Sector

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

#### **Aims**

The purpose of this course is to introduce students to the fundamental principles of modern finance theory. The course covers the general principles of financial management and highlights the dimensions of organizational culture which are associated with financial knowledge and processes. Students who complete this course will have acquired the tools for financial decision making in the energy sector and for efficient financial management of energy sector enterprises. The course blends theory and practice with particular focus shed on day-to-day practical problems faced by firms' executives.

# Learning outcomes

On completing the course, participants are expected to:

- Understand the basic principles of modern finance theory with a focus on the energy sector,
- Appreciate the mechanics, operations and behaviour of capital markets,
- Understand basic techniques of financial analysis and the peculiarities of the energy sector,
- Be able to implement theoretical knowledge and formulas in everyday managerial problems,
- Apply acquired knowledge in setting out capital budgeting problems in energy sector investments,
- Assist decision making with regard to energy investment and capital expenditure analysis,
- · Comprehend the implications of risk in the energy markets,
- Identify the tools for raising capital,
- Understand the implications of mergers & acquisitions in the energy sector.

#### Content

- Introduction into the Basic Principles of modern finance theory
- The financial system, financial markets and financial institutions
- Identifying the energy sector within the financial system
- Agency Problems, Corporate Governance and Corporate Social Responsibility
- · The key principles of financial and management accounting
- Analysis and interpretation of financial statements
- Time value of money
- Energy stock and bond markets
- Investment Decision Rules for energy sector companies
- Making Investment Decisions with the Net Present Value Rule
- Capital structure and the cost of capital
- New issues of Stock for energy companies
- Corporate Restructurings in the energy sector
- · Mergers and Acquisitions in the energy sector.

# Reading

#### **Books**

- Brealey, R., Myers, S., Allen, F., Mohanty, P. (2018). Principles of Corporate Finance, 12th edition, McGraw Hill.
- Brigham, E., and Ehrhardt, M. (2019). Financial Management: Theory and Practice, 16th edition, Cengage Learning.
- Elliott, B. and Elliott, J., (2015). Financial Accounting and Reporting, FT Prentice Hall, 17th Edition.
- Gatti, S. (2018). Project Finance in Theory and Practice: Designing, Structuring, and Financing Private and Public Projects, Academic Press.
- Kramer, Andrea, and Peter Fusaro, eds. (2010). Energy and Environmental Project Finance Law and Taxation: New Investment Techniques.
- Maynard, J. (2017). Financial Accounting, Reporting and Analysis, Oxford University Press.
- Raiker, S. and Adamson, S. (2019). Renewable Energy Finance: Theory and Practice, Academic Press.
- Simkins, B., and Simkins, R. (2013). Energy finance and economics: Analysis and valuation, risk management and the future of energy, John Wiley & Sons.

#### **Articles**

- Cucchiella, F., D'Adamo, I., and Gastaldi, M. (2015). Financial analysis for investment and policy decisions in the renewable energy sector. Clean Technologies and Environmental Policy, 17(4), 887-904.
- Egli, F., Steffen, B., & Schmidt, T. S. (2018). A dynamic analysis of financing conditions for renewable energy technologies. Nature Energy, 3(12), 1084-1092.
- Gallagher, K. P., Kamal, R., Jin, J., Chen, Y., & Ma, X. (2018). Energizing development finance? The benefits and risks of China's development finance in the global energy sector. Energy policy, 122, 313-321.
- Masini, A., and Menichetti, E. (2013). Investment decisions in the renewable energy sector: An analysis of non-financial drivers. Technological Forecasting and Social Change, 80(3), 510-524.
- Nemet, G. F., and Kammen, D. M. (2007). US energy research and development: Declining investment, increasing need, and the feasibility of expansion. Energy Policy, 35(1), 746-755.
- Petkova, A. P., Wadhwa, A., Yao, X., and Jain, S. (2014). Reputation and decision making under ambiguity: a study of US venture capital firms' investments in the emerging clean energy sector. Academy of Management Journal, 57(2), 422-448.
- Roncoroni, A. (2016). Energy Finance and Economics: Analysis and Valuation, Risk Management, and the Future of Energy. The Energy Journal, 37(3), 364-366.
- Steffen, B. (2018). The importance of project finance for renewable energy projects. Energy Economics, 69, 280-294.
- Wüstenhagen, R., and Menichetti, E. (2012). Strategic choices for renewable energy investment: Conceptual framework and opportunities for further research. Energy Policy, 40, 1-10.

#### Alternative Dispute Resolution in the Energy Sector

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

#### **Aims**

The aim of this course is to familiarise students with the general principles underpinning modern systems of ADR. Students will be introduced to the most important methods of alternative dispute resolution in theory and in practice in order to be able to elaborate on their strengths and weaknesses within the law. Basic concepts, as well as more detailed aspects of the arbitration and mediation procedure of energy disputes, will be examined. The course also covers dispute resolution under the Energy Charter Treaty and focuses on important energy disputes (e.g. Saudi Arabia v Arabian American Oil Co (ARAMCO), various Yukos cases etc.).

# Learning outcomes

On completing the course, participants will be able to:

- Understand the possibility of resolving energy disputes outside a national court system;
- Understand the fundamental principles of Alternative Dispute Resolution (ADR)
- Analyse, interpret and apply recent legislation dealing with ADR in the energy sector;
- Understand the procedural framework for the settlement of energy disputes;
- Critically study the foundations, rules and doctrines of arbitration, mediation & ADR in general;
- Elaborate on the distinct advantages of ADR over traditional litigation and select an appropriate ADR approach;
- Prepare effective agreements to use ADR;
- Understand the role of ad hoc and institutional arbitration as a means to solve disputes in the energy sector;
- Specifically focus on investment arbitration under ICSID and under the Energy Charter Treaty.

#### **Content**

- Fundamental principles of Alternative Dispute Resolution
- Legal nature of Energy Disputes
- Foundations, rules and doctrines of Arbitration, Mediation & ADR in general
- Commercial/Investment Arbitration
- · Ad hoc and institutional arbitration as a means to solve energy disputes
- Energy Arbitration
- Procedural issues of Energy Arbitration
- Energy Charter Treaty
- Relevant case law
- Mediation in the Energy Sector

# Reading

#### Books

- Allen, T. (2013), Mediation Law and Civil practice, Tottel Publishing, UK;
- Association for International Arbitration (2009), Alternative Dispute Resolution in the Energy Sector, Maklu Publishers, The Netherlands;
- Blackaby, N. / Partasides, C. (2015), Redfern and Hunter on International Arbitration, Oxford University Press, UK;

International Hellenic University - School of Humanities, Social Sciences and Economics

- Blake, S./ Browne, J./Sime, S. (2013), The Jackson ADR Handbook, Oxford University Press, UK;
- Born G. (2015), International Arbitration: Law and Practice, 2nd edition, Kluwer Law International, The Netherlands;
- Coop G. (2011), Energy Dispute Resolution: Investment Protection, Transit and the Energy Charter Treaty, Juris Publishing, USA;
- Cornel M. (2020), The State's Power to Tax in the Investment Arbitration of Energy Disputes: Outer Limits and the Energy Charter Treaty, Kluwer Law International, The Netherlands;
- De Palo, G. /Trevor, M. (2012), EU Mediation Law and Practice, Oxford University Press, UK;
- Ferrario, P., (2017), The Adaptation of Long-Term Gas Sale Agreements by Arbitrators, Kluwer Law International, The Netherlands;
- Gaitis J. (2015), Leading Practitioners Guide to International Oil & Gas Arbitration, Juris Publishing, USA;
- King, R. (2012), Dispute Resolution in the Energy Sector A practitioner's Handbook, Globe Law and Business:
- Moses, M. L., (2012), The Principles and Practice of International Commercial Arbitration, Cambridge UK;
- Pereira, E./Timonen, T./Aleynikova, E. (2022), Governing Law and Dispute Resolution in the Oil and Gas Industry, Elgar Publishing, UK;
- Roe, Th./Happold, M. (2011), Settlement of Investment Disputes under the Energy Charter Treaty,
   Cambridge University Press, UK;
- Rowley, J.W./ Bishop, D./ Kaiser, G. (eds), (2019), The Guide to Energy Arbitrations, 3d edn, Global Arbitration Review:
- Rule, T.A. (2014), Solar, Wind and Land: Conflicts in Renewable Energy Development, Routledge, UK;
- Scherer, M. (ed.), (2018), International Arbitration in the Energy Sector, Oxford University Press, UK;
- Stanič, A./ Baltag C., (2020), The Future of Investment Treaty Arbitration in the EU: Intra-EU BITs, the Energy Charter Treaty, and the Multilateral Investment Court, Kluwer Law International, The Netherlands.
- Tuna, M. P. (2022), Alternative Dispute Resolution in Energy Industries, Routledge, UK.

#### **Articles**

- Barysheva, N., Force Majeure in Energy Arbitration: Predicting the Unpredictable, International Commercial Arbitration Review 2018, pp. 67 85;
- Beebeejaun, Z. and Faccia, A., Electronic Alternative Dispute Resolution, smart contracts and equity in the energy sector, Journal of World Energy Law & Business 2022, pp. 97-113;
- Blanke, G., Trends in International Energy Arbitration: Can ECT Claims be Arbitrated? Some Initial Considerations in the Light of the CJEU's Ruling in Achmea, ASA Bulletin, 2019, pp. 40 47;
- Blyschak, P.M., Arbitrating Overseas Oil and Gas Disputes: Breaches of Contract Versus Breaches of Treaty, Journal of International Arbitration, Kluwer Law International 2010, Volume 27 Issue 6, pp. 579 - 629;
- Brunet, A./Lentini J.A., Arbitration of International Oil, Gas, and Energy Disputes in Latin America, Nw.J.Intl.L. & Bus. 2012, pp. 591-630;
- Dias Simoes, F., Powered by expertise: selecting arbitrators in energy disputes, Journal of World Energy Law & Business 2015, pp. 501-520;
- Hober, K., Investment Arbitration and the Energy Charter Treaty, Journal of International Dispute Settlement, 2010, Vol. 1, No. 1, pp. 153-190

International Hellenic University - School of Humanities, Social Sciences and Economics

- Konoplyanik, A. and Waelde, T., Energy Charter Treaty and its Role in International Energy, Journal of Energy & Natural Resources Law, 2006, Vol. 24(4), pp. 523-558;
- Le Bars, B., Recent Developments in International Energy Dispute Arbitration, Journal of International Arbitration, 2015, Volume 32 Issue 5, pp. 543 550;

- López-Rodríguez, A.M., The Sun Behind the Clouds? Enforcement of Renewable Energy Awards in the EU, Transnational Environmental Law, 8:2 (2019), pp. 279–302;
- Martin, T., Dispute resolution in the international energy sector: an overview, Journal of World Energy Law and Business, 2011, Vol. 4, No. 4 pp. 332-368;
- Quintavalla, A., The dispute settlement procedure in the Energy Community, European Energy Journal, 2015, 5(1), pp. 28-37;
- Reed, L./Martinez, L., The Energy Charter Treaty: An Overview, ILSA Journal of International and Comparative Law, 2008, Vol. 14, pp. 405-439;
- Solimene, F., Dispute resolution in energy-related agreements: how to choose the right means and draft a proper clause, International Energy Law Review, 2015, pp. 108-122;
- Sussman, E., The Energy Charter Treaty's Investor Protection Provisions: Potential to Foster Solutions to Global Warming and Promote Sustainable Development, ILSA Journal of International and Comparative Law, 2008, Vol. 14, pp. 391-404;
- von Kumberg, W. and Crow, J., The Development of Investor-State Mediation and Its Future in Supporting Energy Transition, The International Journal of Arbitration, Mediation and Dispute Management 2022, pp. 426 - 436;
- Walde, T., Energy Charter Treaty-Based Investment Arbitration: Controversial Issues, Journal of World Investment & Trade, Vol. 5, Issue 3 (June 2004), pp. 373-412.

# **Energy Economics**

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

#### Aims & Content

The course examines the economics of markets for various energy sources, their interactions with each other and with the rest of the economy. The aim of the course is to provide an understanding of energy demand, supply, markets and prices and regulations. This course introduces students to the fundamental concepts, methods, and applications of energy economics. It examines the functioning of energy markets, the role of energy in production and consumption, and the implications of energy use for the environment and policy. The course combines theoretical foundations with empirical applications and equips students with analytical tools to study demand, supply, and production in energy systems.

# Main objectives:

- Understand the role of energy in the economy and the challenges of current energy systems.
- Study demand and supply analysis and identify sources of market failures.
- Analyze behavioral anomalies in energy markets and their implications for policy.
- Learn the foundations of consumer and production theory and apply them to energy economics.
- Acquire basic econometric skills for estimating demand and production functions.
- Apply theoretical and empirical tools in structured exercises and projects.

#### Learning outcomes

On completing the course, participants will be able to:

1. Explain the key principles of energy economics and their application to real-world energy issues.

- 2. Analyze energy demand and supply using theoretical and empirical approaches.
- 3. Identify and critically evaluate market failures and behavioral anomalies in energy markets.
- 4. Apply consumer and production theory to energy-related decision-making.
- 5. Estimate and interpret regression models of energy demand and production.
- 6. Use empirical evidence to assess energy policy questions.

#### Content

- Define energy economics, at the micro and macro levels;
- Overview of the energy sector, historical review, data;
- Overview of Global Energy Challenges, Energy Security Issues and Environmental Issues;
- Economic terminology and tools;
- Energy-Environment Interactions: Global Level Problems: Climate Change, Environmental Kuznets Curve, Economics of the Environment Protection, Options to Address Energy-Related Environmental Problems, Valuation of Externalities, Government Failure;
- The Economics of Climate Change: Climate Change Background, The Economics of Climate Change, Economic Approach to Control the Greenhouse Effect (National Policy Options, Emissions Trading System (ETS) of the EU, International Policy Options), Climate Change Agreements, The Clean Development Mechanism;
- Energy Demand Analysis, Forecasting and Management;
- Energy Supply;
- Economics of Electricity, Fossil Fuel, Renewable and non-Renewable Energy Supply;
- Energy Markets and Principles of Energy Pricing;
- Energy Pricing and Taxation.

#### **Detailed Outline**

- 1 Energy Economics & Current Energy Systems
  - Introduction to energy economics; role of energy in the economy.
  - Overview of current global energy systems; energy intensity and emissions.
  - Environmental and economic impacts of energy use.
  - The energy transition: concepts, trends, and policy context.
- 2 Demand & Supply, Market Failures & Behavioral Anomalies
  - Demand and supply analysis; determinants; competitive equilibrium.
  - Market failures: externalities, public goods, common resources.
  - Information problems and market power in energy markets.
  - Behavioral anomalies: bounded rationality, bounded willpower, bounded self-interest.
  - Energy poverty and policy implications.
- 3 Consumer & Production Economics, Regression, Energy Demand
  - Consumer theory: preferences, budget constraint, equilibrium.
  - Production economics: production functions, productivity, returns to scale.
  - Introduction to econometrics and regression analysis (OLS, inference, R2, F-test).
  - Energy demand theory: household production theory; price/income elasticities.
  - Empirical analysis of residential and industrial energy demand; developing-country aspects.
- 4 Energy Project 1 & Energy Project 2
  - Project 1: Estimating a household energy demand function (elasticities, model fit, policy interpretation).
  - Project 2: Estimating a production function for power plants(input elasticities, returnsto scale, policy relevance).
  - Synthesis and discussion.

# Reading

#### **REQUIRED READINGS:**

Massimo Filippini & Suchita Srinivasan (2024). An Introduction to Energy Economics and Policy. Cambridge University Press (DOI: 10.1017/9781009471831)

Subhes C. Bhattacharyya, *Energy Economics: Concepts, Issues, Markets and Governance*. Springer-Verlag London Limited 2011 (ISBN 978-0-85729-267-4).

Additional required readings will be made available through the Web e-learning platform.

#### Additional bibliography:

Viscusi, W. Kip, Joseph E. Harrington and John M. Vernon. 2005. Economics of Regulationand Antitrust, 4th Edition. Cambridge: MIT Press.

William Spangar Peirce, Economics of the Energy Industries. 2nd. ed. Westport, Connecticut: Praeger, 1996.

Pindyck, R., and D. Rubinfeld. Microeconomics. 6th ed. Upper Saddle River, NJ: Prentice Hall, 2005. ISBN: 0130084611.

Robert W. Crandall, "Policy Watch: Corporate Average Fuel Economy Standards." Journal of Economic Perspectives, 6, No. 2 (Spring 1992), 171-180.

Paul Joskow, "California's Electricity Crisis." MIT Working Paper, November 2001.

#### Relevant Journals and regular reports

Energy Economics
The Energy Law Journal
Journal of Energy & Natural Resources Law
European Energy and Environmental Law Review
The Journal of World Energy Law & Business
Energy Law Journal
Energy Policy
Environmental and Resource Economics
Journal of Environmental Economics and Management

# Regular reports from U.S. and International agencies:

International Energy Outlook Annual Energy Review U.S. Energy Information Administration's Annual Energy Outlook International Energy Agency's World Energy Outlook

# **Energy Transport & Storage**

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

#### **Aims**

The Course targets on Technology and Economics of Energy Transport. Both pillars will be studied, explored, and developed by the participants of the course based on the understanding of the chain of cost necessary to pass from a given energy "source" to the "energy consumer". Accordingly, the fundamental differences between Energy Transfer and Energy Transport are examined.

The course gives a comprehensive knowledge of the industry methods for the transportation of primary sources such as hydrocarbons, coal, nuclear minerals, as well as of renewable energy sources, air, sun, water, and derivatives such as electricity. The planet uses today terrestrial, cable aerial, offshore maritime and bottom sea environments for "carriage" of these sources and the participants should have a thoughtful understanding of what is primary source and what is derivative source of energy that the consumer is using.

The particularities of natural gas and oil transportation will be examined from the point of view of the of the demographics of the producing countries and of the consuming countries, a future terrain of intense negotiations.

Storage technologies and storage facilities, comprising not only batteries for electricity storage, but also gas underground storage, and ground water pumping, will be shown with their limitations and potentials for a sustainable management of access to cheap energy for the consumer. The electric cable grid role and the geographical spread of the solar and wind installations will be viewed under the eye of a viable electricity transmission.

The rising importance in the transportation sector of compressed natural gas (CNG) or liquefied natural gas (LNG), will be examined, not as an economic alternative to gasoline and other transportation fuels, but in terms of the economic viability, in the horizon of 2050 and the net zero objectives of the developed countries.

LNG/FSRU compared to pipe projects will be analyzed throughout case studies based on cost and demand. Carbon dioxide and hydrogen transportation by pipe or vessel will be checked based on the today practical achievements of the technology.

A special thought will be given to biofuels as being one of the top targets of the refining industry and the automobile for the next decades.

# **Learning Outcomes**

On completing the course students will be able to:

- Understand the fundamental principles of energy sources, their transport and purpose.
- Understand the particularities each energy source offers in the energy mix.
- Distinguish between the methods and cost constrains of the transportation of oil and gas.
- Understand the potential of energy storage industry and the benefits of energy storage.

#### Content

- EU Technology and economics of Energy Transport and Energy Transfer.
- The chain of cost of energy from the "source" to the "consumer".
- Transportation of primary energy sources, renewable energy sources and derivatives.
- Electricity transmission, grid, geographical spread of the renewables' connections.
- The rising importance of compressed natural gas (CNG) and liquefied natural gas (LNG) in the horizon of 2050 net zero target.
- LNG/FSRU compared to gas pipeline.
- · Storage technologies and facilities.
- · Energy hubs, carbon dioxide and hydrogen.

# Reading

#### **Books**

- Oliver Inderwildi, Sir David King (ed.), Energy, Transport & the Environment: Addressing the Sustainable Mobility Paradigm, 2012;
- Bent Sorensen, Renewable Energy Conversion, Transmission and Storage, AP, 2007;
- Global Energy Assessment: Toward a Sustainable Future, International Institute for applied Systems Analysis, Cambridge University Press, 2012;
- Saeid Mokhatab, William A. Poe, John Y. Mak, Handbook of Natural Gas Transmission and Processing: Principles and Practices, Elsevier, 2015;
- Arthur J. Kidnay, William R. Parrish, Daniel G. McCartney, Fundamentals of Natural Gas Processing, second edition, CRC Press, 2011;
- Jonathan Stern & HowardV Rogers, The dynamics of a liberalised European Gas Market: The determinants of hub prices, and roles and risks of major players, OIES papers, NG94. 2014;
- J.E.Sinor, Comparison of CNG and LNG Technologies for transportation applications.

#### **Articles**

- Harvard Univ. Belfer Center: The future of Long Term LNG Contracts, 2013;
- Jacottet, Alex, Cross-Border electricity interconnection for a well-functioning EU Internal Electricity Market, The Oxford Institute for Energy Studies, 2012;
- Medlock, Kenneth B., Jaffe, Amy Myers, O' Sullivan, Meghan, The global gas market, LNG exports and the shifting US geopolitical presence, Energy Strategy Reviews, volume 5, December 2014, pp. 14-25;
- Beatrice, Petrovic, European Gas Hubs Price Correlation:barriers to convergence? 2014, The Oxford Institute for Energy Studies;
- Natural Gas Pipeline Technology Overview, Environmental Science Division, available at at <a href="http://corridoreis.anl.gov/documents/docs/technical/apt\_61034\_evs\_tm\_08\_5.pdf">http://corridoreis.anl.gov/documents/docs/technical/apt\_61034\_evs\_tm\_08\_5.pdf</a>;
- Rzayeva, Gulmira, Natural Gas in the Turkish Domestic Energy Market, Policies and Challenges, February 2014, The Oxford Institute for Energy Studies, available at http://www.oxfordenergy.org/wpcms/wp-content/uploads/2014/02/NG-82.pdf;
- Marte Ulvestad et al. Natural Gas and CO<sub>2</sub>price variation: impact on relative cost-efficiency of LNG and pipelines;
- Anne Fruhauf, Mozambique's LNG revolution, The Oxford Institute for Energy Studies, 2014

# **Energy Law II**

Teaching hours and credit allocation: 30 hours, 6 credits Course assessment: coursework (30%) + exam (70%)

#### **Aims**

The aim of this course is to further explore Energy Law by appraising and comparing EU legal instruments and theories. The course builds on the knowledge and skills that studentshave acquired through the study of the Energy Law I course.

Students will be able to obtain a substantial understanding of the main issues and constraints of the energy regulation procedure as well as the interrelation between EU Energy Law and other areas of EU Law such us EU Competition Law. Students' attention will be particularly drawn to breaches of EU Competition Law by energy market players and the necessity to implement effective competition in the single EU energy market.

The lecture will be based on a thorough analysis of the basic EU Competition Law normative provisions with an emphasis on their application in the specific field of energy related constellations. Furthermore, the aims, the goals and the development of the European Energy Market and the creation of internal Energy Market would be presented with emphasis on the environmental goals that EU should also sustain in the design of the Energy Union.

Additionally, students will have the opportunity to thoroughly analyse the State support mechanisms provided for the deployment of renewable energy projects as well as distortions of the electricity market that often adversely affect the financing mechanisms for renewables. The course is also aimed at providing students with the essential theoretical background for analysing contextual topics regarding, among others, the general framework and the normative provisions of EU Energy and State Aid Law pertaining to capacity remuneration mechanisms, pricing policies of state-owned electricity suppliers, possible EU State aid law violations etc. In addition, it will be presented the new dimension of EU Energy Policy the "European Green Deal & Fit for 55" with the insights on the revision of the Renewable Energy Directive and Energy Efficiency Directive and the principles of Guidelines on State aid for climate, environmental protection and energy (CEEAG).

One of the core problems of energy regulation, the legal evaluation of State financial interventions in the energy market, will be thoroughly examined taking as example the case study of State financing of SGEI's (PSO's) in the energy sector. Finally it would be presented a substantive analysis of the functioning of the Greek Energy Power Exchange Mechanism and the new regulatory Framework in the Greek Wholesale Electricity Market.

# Learning outcomes

On completion of the course students will be able to:

- understand the fundamental principles of energy regulation
- understand the aims and the development of the European Energy Market
- understand the interaction of EU Competition and State Aid Law with energy regulation
- comprehend the legal framework of EU regulation of the Energy Sector
- analyse the state support mechanisms provided for the deployment of renewable energy projects and critically evaluate the State intervention in existing remuneration schemes for RES

#### **Content**

- EU Competition Law in the Energy Sector;
- EU State Aid Law;
- EU Directives;

- Dispute Resolution in the Energy Sector;
- Energy Power Exchange Mechanism;
- State support mechanisms provided for renewable energy projects;
- Capacity remuneration mechanisms
- European Green Deal & Fit for 55.

# Reading

#### **Books**

- Arcas, Rafael Leal, «Commentary on the Energy Charter Treaty», 2018
- Arcas -Rafael Leal/ Wouters Jan u.a , «Research Handbook on EU Energy Law and Policy», Edward Elgar Publishing, 2017
- Cameron, P. and Heffron R. «Legal Aspects of EU Energy Regulation», Oxford, 2016.
- Craig, P. / de Búrca, G., EU Law: Text, Cases, and Materials, Oxford University Press, 2011;
- Fershee, P. Joshua, Energy Law: A Context and Practice, Carolina Academic Press, 2014 Casebook;
- Jones, Christopher: EU Energy Law Volume II Competition Law and Energy Markets 5th edition 2019, Edward Elgar Publishing
- Jones, Christopher, EU Energy Law Volume XII: Electricity Market Design in the European Union, 1st edition, 2020, Edward Elgar Publishing
- Jones, Christopher (Editor), / Kettlewell William-James, EU Energy Law Volume I: The Internal Energy Market, 5th Edition 2020, Edward Elgar Publishing
- Hunter Tina et. al. «Routledge Handbook of Energy Law», , Routledge, 2020
- Leigh Hancher, / Adrien De Hauteclocque, / Francesco Maria Salerno Bloomsbury, «State Aid and the Energy Sector» Publishing Plc, 2020
- Leigh Hancher (Ed.) /,Adrien de Hauteclocque (Ed.), HUHTA Kaisa Iida Amanda (Editor),SADOWSKA Malgorzata (Editor) «Capacity mechanisms in the EU energy markets: law, policy, and economics», Oxford University Press 2nd Edition 2022
- Farantouris, N.E. (ed.), Energy Networks and Infrastructure, Jean Monnet Chair in Law & Policies, NB, 2014,
- Farantouris, N.E. (ed.), Energy Law, Policy & Economics, Jean Monnet Chair in Law & Policies, NB, Athens 2012,
- Farantouris, N./Fortsakis T. «Energy Law», Nomiki Vivliothiki, Athens 2016
- Iliadou, A «Energy Law » Nomiki Vivliothiki, Athens 2021
- Kalavros, G. F. /Georgopoulos, Th. G. (eds.), European Union Law, Vol. II, Nomiki Vivliothiki, 2010;
- Lorenz, M., An Introduction to EU Competition Law, Cambridge University, 2013;
- Metaxas, A., Legal Commentary of Art. 101-109 TFEU, in: Christianos, V. (ed.), TEU and TFEU -Commentary, Nomiki Vivliothiki, 2012;
- Panagos, T., The Legal Framework of the Energy Sector, Sakkoulas Ed, Greece, 2012;
- Panagos, T. (Ed.) The Wholesale electricity Markets: Regulatory Framework and Function, Sakkoulas Thessaloniki, 2021
- Park, P., International Law for Energy and the Environment, second edition, CRC Press, 2013;
- Pliakos Asterios, EU Energy Law, Nomiki Vivliothiki Athens 2022.
- Roe, T. /Happold, M., Settlement of Investment Disputes under the Energy Charter Treaty, Cambridge University Press, 2011;
- Rule, Troy, «Renewable Energy: Law, Policy and Practice» 2nd Edition West Academic Publishing 2021,
- Säcker Franz Jürgen (Editor), Montag Frank (Editor) European State Aid Law: A Commentary Beck/Hart 2016

- Taulus Kime, Introduction to EU Energy Law Oxford 2016
- Taulus, K., EU Energy Law and Policy: A Critical Account, Oxford University Press, 2013.

#### Articles

- Almeida L. Long-term Upstream Supply Contracts and EU Energy Law: Regulating Contracts in Times of Security of Supply Crisis in 'European Private Regulatory Law: Autonomy, Competition and Regulation in European Private Law' edited by Hans-W. Micklitz, Yane Svetiev Yane, and Guido Comparato, EUI Working Paper 2016/06, 2017
- Ciscar, J. C., Dowling, P., Integrated assessment of climate impacts and adaptation in the energy sector, Energy Economics, November 2014, Vol. 46, pp. 531-538;
- Hancher L. "Long-term Contracts and State Aid A new application of the EU State Aid Regime or a Special Case", (2010) European State Aid Law Review (EStAL), 2
- *Klotz , R*. Energy and anticompetitive practices: An overview of EU and national case law, e-Competitions Antitrust Case Laws e-Bulletin, 2020
- Konoplyanik, A. and Waelde, T., Energy Charter Treaty and its Role in International Energy, Journal of Energy & Natural Resources Law, 2006, Vol. 24(4), pp.523-558;
- Lindh, F. R. / Bone Jr, T. W., State Jurisdiction over Distributed Generators, Energy Law Journal, 2013, Vol. 34(2), pp. 499-539;
- Metaxas A., Urgent need for a substantial reorientation of the Greek Energy Policy, Greek Energy 2015,
   Special edition, 2015;
- Metaxas A., Greek Energy Market and Rule of Law: An impossible co-existence?, Greek Energy, 2014, pp. 34-35;
- Metaxas A./Nicolaides Ph., Asymmetric Tax Measures and EU State Aid Law: The "Special Solidarity Levy" on Greek Producers of Electricity from Renewable Energy Sources, EStAl, 2014, Vol.1, pp. 51-60;
- Metaxas, A./Tsinisizelis M., The development of renewable energy governance in Greece: examples of a failed (?) policy, Renewable Energy Governance, Lecture Notes in Energy, Springer Publications, 2013, Vol. 57, pp. 155-168;
- Metaxas, A., Legal prerequisites for the compensation of CO2 rights pass through costs to industrial customers, 2013;
- Metaxas, A., Recovery Obligation and the limits of National Procedural Autonomy, European State Aid Law Quarterly (EStAL), 2007, Vol. 6, No.2, pp. 407-415;
- Reed L./Martinez L., The Energy Charter Treaty: An Overview, ILSA Journal of International and Comparative Law, 2008, Vol. 14, pp. 405-439;
- Pitsos, N. Long term Energy Contracts and Market Foreclosure in EU Competition Law. "Take or pay"
   Contracts in Natural Gas Sector [2011] Energy and Law 2/2011, p.28-40 (Greek).
- Pitsos, N. Services of General Economic Interest in Energy Law after the Liberalization: Financing instruments and Challenges (2019) Energy and Law 2/2019 p.65-77,
- Pitsos, N., Competition Law issues in Wholesale Electricity Markets in: Panagos, T. (Ed.) The Wholesale electricity Markets: Regulatory Framework and Function, Sakkoulas Thessaloniki, 2021, p. 207-237.
- Scholz U./ Purps,S. The Application of EC Competition Law in the Energy Sector Journal of European Competition Law & Practice, 2010, Vol. 1, No. 1

- Sussman, E., The Energy Charter Treaty's Investor Protection Provisions: Potential to Foster Solutions to Global Warming and Promote Sustainable Development, ILSA Journal of International and Comparative Law, 2008, Vol. 14, pp. 391-404;
- Waelde, T. W. / Wouters, P. K., State Responsibility and the Energy Charter Treaty: The Rules Regarding State Enterprises, Entities, and Subnational Authorities, Hofstra Law and Policy Symposium, 1997, Vol. 2, pp. 117-134.

# **Energy and Environmental Policy**

Teaching hours and credit allocation: 30 hours, 6 credits Course assessment: coursework (30%) + exam (70%)

#### **Aims**

The course provides a general introduction to the issues of environmental and energy regulation and policy. The issues are approached from a legal, economic and policy perspective. Following a brief introduction on the physical impacts of economic activity on the natural environment and the relationship between energy and environment we discuss Sustainable Development.

More specifically, we discuss the Sustainable Development Goals with emphasis on those that deal with environment and energy. Social and human right issues are also raised within the framework of the environment-society-energy nexus.

In discussing energy policies, we first introduce the principles that guide energy regulation and an in depth analysis of each principle follows. Then, principles of environmental law are being discussed with examples drown from the international community. A special emphasis is given on the EU policies and the models that prevail.

The course is based on discussion and exchange of ideas and perspectives between the instructor and the students. Examples from the global community will be a helpful tool in order to understand the energy and environment relationship, policies applied, their efficiency and the next steps needed to be taken.

The objective of the course is to introduce students to the main natural resource management issues, and provide them with the necessary information to improve their management.

# Learning outcomes

On completion of the course students will be able to:

- understand the concept of sustainable development and the interconnections between its three pillars
- · understand energy and environmental principles
- develop critical thinking skills and apply them to the evaluation of environmental and energy policies
- develop an understanding of the role and application of regional, global and national institutions in designing energy and environmental policies
- develop an understanding of the diversity of perspectives towards resources, environmental protection and energy.

#### Content

- IPAT and Kaya identity
- Energy Policy
- Elements of environmental law
- Energy and Environment
- Transition
- Climate Neutralization
- Intro to Water Law
- · Climate Change and crisis environmental issues.

# Reading

#### Books

- Aligizaki A. 2018, EU energy policy and law: (the impact on European energy security), Sakkoulas Ed;
- Perman R. at al. 2011, Natural Resources and Environmental Economics, 4th edition, Pearson;
- Hackett S. C. 2011, Environmental and Natural Resources Economics, M.E. Sharpe;
- Berck P., Helfand G. 2011, The Economics of the Environment, Pearson;
- IEA 2015, World Energy Outlook 2015, OECD/IEA Paris;
- Mathews J. A. 2015, Greening of Capitalism, Stanford University Press;
- Beder S. 2010, Environmental Principles and Policies, Earthscan;
- Carbon Tracker 2017, Expect the Unexpected. The Disruptive Power of Low-carbon Technology,
   Carbon Tracker-Gramtham Institute;
- Climate analytics 2017, A Stress Test For Coal in Europe under the Paris Agreement
- Common M. and Stagl C. 2005, Ecological Economics, Cambridge University Press;
- IEA 2016, Energy, Climate Change and the Environment, IEA/OECD;
- IEA 2016, Energy and air pollution, IEA/OECD;
- IEA 2014, Energy policy of IEA countries. European Union Review, OECD/IEA Paris;
- IEA 2015, WEO 2015 Special report on energy and climate change, OECD/IEA Paris;
- IEA 2014, Capturing the Multiple Benefits of Energy Efficiency, OECD/IEA Paris;
- European Commission 2011, Energy Roadmap 2015, Brussels;
- Galanis P. [2023], Climate change law: (EU national), Nomiki Vivliothiki Ed;
- Panagos T./Komnios K. [2022], Climate Crisis-Sectoral Impacts, Sakkoulas Ed;
- World Bank-Ecofys 2017, Carbon pricing watch 2017, The World Bank, Washington D.C.;
- World Bank-Ecofys 2016, State and trends of carbon pricing, The World Bank, Washington D.C.;
- World Bank 2011, World development indicators, The World Bank, Washington D.C.;
- UNDP 2011, World development report 2011. Sustainability and equity: a better future for all, UNDP, New York;
- OECD 2009, The economics of climate change mitigation, OECD;
- Jackson Tim 2009, Prosperity without Growth, Earthscan, Washington D.C.;
- Sen A. 1999, Development as freedom, Alfred A. Knopf Inc., New York;
- Stern Review 2006, The economics of climate change, UK HM Treasury, Cabinet Office, London;
- McKinsey & Company 2009, Pathways to a Low-Carbon Economy, McKinsey & Company;
- IPCC 2014, Fifth assessment report. Synthesis Report, IPCC;
- Giddens A. 2009, The Politics of Climate Change, Polity Press.

#### **Articles**

- Barrett S., Carraro C., De Melo J. (2015), Towards a Workable and Effective Climate Regime, CEPR Press, London (e-book);
- Bithas K. and Kalimeris P. 2013, Re-estimating the decoupling effect: Is there an actual transition towards a less energy-intensive economy?, Energy 51 (2013) 78-84;
- Bodansky D. 2015, Legally binding versus non-legally binding instruments, in Barrett S., Carraro C., De Melo J. (2015), pp. 155-165;
- Boyd et al. 2015, Tracking intended nationally determined contributions: what are the implications for greenhouse gas emissions in 2030?, Policy Paper, ESRC and GRICCE;
- Boyd R. et al. 2015, Tracking intended nationally determined contributions: what are the implications for greenhouse gas emissions in 2030?, Policy Paper, ESRC e GRICCE.

- Carraro C. 2015, On the recent US-China agreement on climate change, voxeu.org;
- Cook et al. 2013, Quantifying the consensus on anthropogenic global warming in the scientific literature, Environ. Res. Lett. 8 (2013) 7 pp;

- Cook J. et al. 2013, Quantifying the consensus on anthropogenic global warming in the scientific literature, in «Environmental Research Letters», vol. 8, n. 2;
- Das Gupta M et al. 2009, Population, poverty and sustainable development. A review of the evidence, Policy Research Working Paper 5719, The World Bank.
- De Paoli L. 2016, The EU Emission Trading System: for an effective and viable reform, Economics and policy of energy and the environment (ISSN 2280-7659, ISSNe 2280-7667), 2016, 1
- Grasso M. and Roberts T. 2014, A compromise to break the climate impasse, Nature Climate Change, Vol. 4/2014;
- Hansen J. et al. 2016, Ice melt, sea level rise and superstorms: evidence from paleoclimate data, climate modeling, and modern observations that 2 C global warming could be dangerous, Atmos.Chem. Phys., 16, 3761-3812, 2016;
- Heede R. 2014, Tracing anthropogenic carbon dioxide and methane emissions, to fossil fuel and cement producers, 1854–2010, Climatic Change (2014) 122:229–241;
- Majocchi A. 2013, Carbon energy tax and emission permits to fight climate change, Economics and policy of energy and the environment, 2/2013, pp. 113-127;
- Nordhaus W. 2007, A Review of the Stern Review on the Economics of Climate Change, Journal of Economic Literature, vol. XLV, 2007, pp. 686-702.
- Pezzey J.C. V. and Thoman 2002, The Economics of Sustainability: A Review of Journal Articles, Discussion Paper 02-03, Resources for the Future, Washington D.C.;
- Robinson D. 2017, The Significance of the US Withdrawal from the Paris Agreement on Climate Change, OIES, Oxford.
- RU X. et al. 2012, An Empirical Study on Relationship between Economic Growth and Carbon Emissions Based on Decoupling Theory, in «Journal of Sustainable Development», vol. 5, n. 8, pp. 43-51:
- Sala-I-Martin X 2006, The World Distribution of Income: Falling Poverty and... Convergence, Period, in «The Quarterly Journal of Economics», vol. 121, n. 2, pp. 351-397.
- Sunstein C. R. and Weisbach D. A., Climate Change and Discounting the Future: A Guide for the Perplexed, Harvard Law School Program on Risk Regulation, Reseranch Paper n. 08-12
- Tol R. (2015), Economic impacts of climate change: New evidence, voxeu.org;
- UNFCCC 2015a, Synthesis report on the aggregate effect of the intended nationally determined contributions, FCCC /CP /2015/7, October;
- UNFCCC 2015b, Adoption of the Paris Agreement. Proposal by the President, Draft Decision /CP.21, FCCC /CP /2015/L.9/Rev.1, December;
- Weitzman M., 2007, A Review of the Stern Review of the Economics of Climate Change, Journal of Economic Literature, vol. XLV, 2007, pp. 703-724;
- Weitzman M. 2009, On Modelling and Interpreting the Economics of Catastrophic Climate Change, The Review of Economics and Statistics, vol. 91, n. 1, 2009, pp. 1-19;
- Yuan J. et al. 2014, Peak energy consumption and CO2 emissions in China, in «Energy Policy», vol. 68, May, pp. 508-523;

# **Energy Politics & Security**

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

# Aims

Geopolitics of energy covers topics related to interactions of geographical, political, military and economic aspects as a way to comprehend events affecting the energy system. First we will introduce some theoretical definitions of what geopolitics is and how it has been developed throughout the years. Further, we will focus on some case studies that can better describe the great number of variables that determine the geopolitical situation of some world areas where the geopolitical pillar of economy and in particular, the compound geopolitical indicator of energy hasa crucial role. The methodology used is the Systemic Geopolitical Analysis and in this context, energy is a matter of utmost concern.

#### This course aims:

- to introduce the students to theories of Geopolitics and International Relations (IR) as analytical tools in their research and analysis.; to underline how IR addresses, researches and delves into the issues of power, energy politics and energy security;
- to understand the main IR theories as well as their importance to explain political phenomena. This
  course intends to showcase how, why and under what circumstances the paradigms of IR are
  relevant, applicable and efficient to interpret the importance both of energy politics and security
  in today's world;
- to enable the student not only to develop comparative skills of analysis of differing energy and security
  policies but also to actively engage in explaining past and current political phenomena. The latter
  is expected to be achieved by promoting dialogue and critical engagement during the lectures that
  will enhance students' capabilities to present and defend complex arguments.
- to provide the necessary context of reference for understanding past and current interstate relations.
- to familiarize the students with the methodology of Geopolitical Analysis and bring them in contact with examples of such analysis.
- to give students the opportunity to employ such methodological tools and produce short geopolitical analyses in class.

#### Learning Outcomes

On completing the course students will be able to:

- Understand the fundamentals of Geopolitics according to the prominent literature. The essential terminology: understanding the difference between Geopolitics and Geo-strategy.
- Acquire critical understanding of the issues involved in energy, politics and energy security, IR theory and security.
- Understand the interactions between Politics and international relations, and how these variables affect and are affected by the energy sector.
- Understand the energy policy and trends affecting strategies.
- Analyze some case studies that allow to better understand Geopolitics as an instrument of analysis.
- Demonstrate great analytical skills having obtained critical understanding of the issues involved in energy, politics and energy security.

#### **Content**

The Geopolitics is a body of theories subsisting on history and a set of methodologies produced over the 19th and 20th centuries that cover a broad range of issues, from historical state interactions to measuring and comparing power and its projection over space and time (geopolitical potential) of one or more states or other actors. Geopolitics relies solely on historical observations and measurements via the methodologies and tools that have been produced over the decades. Its main function is to help the observer understand a concrete situation from as neutral as possible a viewpoint. In other words, it is an analytical and descriptive tool and, as such, it is useful for the student of current inter-state relations and can be extremely helpful in pinpointing causes of conflict and current and future risk factors, above all connecting a local place or region, with global developments. The course aims at familiarizing the student with a series of theories and methodologies, focusing on case studies pertaining to energy policies.

- · International Relations: on Theory and Power
- Energy Security, Power Politics and Strategies: The European Union's energy policies
- Elemental Concepts: Sea Power and Land Power
- The Principal Conditions of Sea Power From British Thalassocracy to US Control of Maritime Transports.
- The Spatial Growth of States and the Politics of Overland Access: From Railroads to Pipelines.
- Global Competition: Sir Halford Mackinder and N. J. Spykman. Eurasian Energy & Commercial Integration: Russian "Catholicity" and the Chinese New "Silk Roads".
- The Geopolitics of Medium-sized States: The Turkish Case.
- Swimming with the sharks: Greece and Eurasian Geopolitics.

**PART I** An introduction to International Relations: on Theory, Power and Security

- A. IR Theories. What is the subject of IR? How it evolved and why it matters? How Theory allows us to understand the world via different theoretical perspectives? This unit presents the traditional and critical paradigms of IR. Each of them has variants. By comprehending their analytical tools and variables the student not only can debate on international politics and power relations between states but also can contemplate on questions on war and peace, security and insecurity, cooperation and conflict.
- B. On POWER. Power is prominent in discussions of international interaction from Thucydides to the present day. All politics involve power. Traditionally, the study of international politics assumed the existence of national states with conflicting policies, placing a high value on maintaining their independence, and relying primarily on military force. This unit aims at underling the role of power in international politics and to address issues as what is National Power; what are the components of power; methods of exercising national power, etc. Since, National Power is often analyzed and evaluated in terms of the capabilities of a nation, meaning components of power as geography, population, resources, industrial capacity, diplomacy, military preparedness, quality of Leadership and more, the analysis of all these factors will, on the on hand, enrich students' knowledge in conjunction with Unit A, and, on the other, will provide the skills to evaluate the national power of a nation.
- C. On Security: Security is a core value of human life. From human security, meaning the desire for a defensive and self-protecting response to threats of harm from others to states' security, this Unit aims twofold: to present the field of security studies and connect energy politics with security. The former will be accomplished by presenting the concept of security of the state and the person: how a state secures security? What actions needs to undertake? Key assumptions underlying the terms of national security, international security and human security will be scrutinized. Finally, the predicament of energy security. Energy security has become an increasingly pressing issue in the EU and the Western World in general. Increased imports, dependence and competition over naturalgas

as	well	as	the	desire	to	achieve	energy	security	perfectly	illustrate	the	connection	between

security and power politics. The presentation of the case of the EU's stated approach to achieve energy security in conjunction with the analytical tools of IR.

**PART II** Energy Security, Power Politics and Strategies: The Eastern Mediterranean and the Gulf This part examines the cases of the Eastern Mediterranean and the Gulf. In these two adjacent regional systems, powerful and less powerful states face challenges of conflict and cooperation. The resourceful region of the Gulf has faced two major wars (1991, 2003) that indicate the importance of resources in conjunction with energy politics and security. The promising Eastern Mediterranean for more than a decade attempts to become an energy hub for the European continent and a reliable partner by promoting shared interests and collaborations not only aiming at the littoralstates but also at the Western powers, mostly the US and the European Union member-states. Having said that, PART II will pay special attention to the Gulf Wars and the Cyprus' energy politics and its repercussions. On the one hand, Iran that was designated as a part of the Axis of evil since the GW Bush administration, today is an imminent threat not only for regional stability but also for its nuclear aspirations. On the other hand, Turkish revisionism and its neoOttoman aspirations are also an important paradigm for the interlinked issues of energy and politics. Thus, the student, having in his arsenal the analytical tools from PART1, will be able to participate in an insightful analysis in these two sub-regional systems. The whole regional and international environment will be scrutinized in order to comprehend the complexities of these regional systems, the interrelation between the Gulf and the Middle East as well as today's transformative period. Given that the Iranian and Turkish revisionism have resulted in warm relations between Israel and the Gulf and in an arc of partnerships from Greece to India that include the promotion of economic ties, common interests and security, students are called upon to identify and present the main actors eg. Saudi Arabia, Qatar, Lebanon, Egypt, UAE, Iran, Syria, Israel, Greece, Turkey's main interests and role in the region.

# Reading

### **Books**

- Aligizaki A., EU energy policy and law: (the impact on European energy security), Sakkoulas Ed, 2018:
- Baldwin, Natylie, and Kermit E Heartsong. Ukraine: Zbig's Grand Chessboard & How the West Was Checkmated. Kindle Edition. San Francisco-Montreal, 2015.
- Bassin, Mark, Sergey Glebov, and Marlene Laruelle, eds. Between Europe and Asia: The Origins, Theories, and Legacies of Russian Eurasianism. 1st edition. Pittsburgh, Pennsylvania: University of Pittsburgh Press, 2015.
- Brzezinski, Z. The Grand Chessboard: American Primacy and Its Geostrategic Imperatives. basic books, 1998.
- Davutoğlu, A. Stratejik Derinlik. Türkiye'nin Uluşlararası Konumu. İstanbul, 2001.
- Devonshire-Ellis, Chris. China's New Economic Silk Road: The Great Eurasian Game & The String of Pearls. Hongkong: Asia Briefing Ltd, 2015.
- Glebov, Sergey. From Empire to Eurasia: Politics, Scholarship, and Ideology in Russian Eurasianism, 1920s-1930s. 1 edition. DeKalb, IL: Northern Illinois University Press, 2017.
- Halford John Mackinder. Democratic Ideals and Reality a Study in the Politics of

- Reconstruction. S.l.: Forgotten Books, 2012.
- Huntington, Samuel P. The Clash of Civilizations and the Remaking of World Order. A edition. New York: Simon & Schuster, 2011.
- Kaplan, R. The Revenge of Geography. New York: Random House Trade Paperbacks, 2013.
- Karlis, Thanasis, and Dionysios Polemis. "The Belt and Road Initiative. A Geopolitical Analysis," 1-21. Athens, 2019. <a href="https://doi.org/10.13140/RG.2.2.12968.21764">https://doi.org/10.13140/RG.2.2.12968.21764</a>.
- Kearns, G. Geopolitics and Empire: The Legacy of Halford Mackinder. Oxford Geographical and Environmental Studies Series. Oxford; New York: Oxford University Press, 2009.
- Kleveman, Lutz. The New Great Game: Blood and Oil in Central Asia. New York: Grove Press, 2004.
- Kordosis, Stefanos, "The Black Sea & Eastern Mediterranean region and OBOR:
   Macrohistorical tendencies and geopolitical models of analysis", in The Geography of
   Greece: Managing Crises and Building Resilience (World Regional Geography Book Series)
   (1st ed. 2024) pp.
- Kenneth Waltz, Theory of International Politics (Boston: McGraw-Hill, 1979).
- Kordosis, Stefanos, "A View of the Refugee Crisis in the Eastern Mediterranean through Classical European Geopolitics," The Cyprus Journal of Sciences 14 (2016): 29-50.
- Kordosis, Stefanos, "How the Bear Copes with the Wolf, Russia and Turkey in Syria," ELIAMEP Briefing Notes, October 2015.
- Kordosis, Stefanos, "'Pan-Turkism and Islam: Compatible in Practice', Middle East Mediterranean," Middle East Mediterranean, An ELIAMEP Report, no. ½ (April 2012): 1415.
- Kordosis, Stefanos, "The Future of Turkey-Israel Relations. Could an Apology Make a Difference?," Middle East Mediterranean, An ELIAMEP Report, no. ½ (February 2013).
- Kordosis, Stefanos, "Underlying Historical Assumptions in the Current Geopolitical Narration of the Chinese One Belt One Road: A Critical Assessment" (11th International Conference of the Hellenic Geographical Society (ICHGS - April 12 - 15, 2018), Athens: Hellenic Geographical Society, 2018).
- Mackinder, H. J. "The Geographical Pivot of History (1904)." The Geographical Journal 170, no. 4 (2004): 298-321.
- Mahan, Alfred Thayer Rear Adm. Mahan on Naval Strategy: Selections from the Writings of Rear Admiral Alfred Thayer Mahan. Edited by John B. Hattendorf. Annapolis: Naval Institute Press, 2015.
- Markey, Daniel. China's Western Horizon: Beijing and the New Geopolitics of Eurasia.
   Oxford University Press, 2020.
- Parker, Geoffrey. Geopolitics: Past, Present and Future. London; Washington: Pinter Pub Ltd, 1997.
- Schmitt, Carl. Land and Sea: A World-Historical Meditation. Edited by Samuel Garrett Zeitlin and Russell A. Berman. Candor, NY: Telos Press Publishing, 2015.
- Spykman, Nicholas John. The Geography of the Peace. Edited by Helen R Nicholl. Hamden: Archon Books, 1969.
- Stavridis, James. Sea Power: The History and Geopolitics of the World's Oceans. Penguin Press, 2017.
- Samuel, P. Huntington, The clash of Civilizations and the remaking of world order, The Free Press, 2002
- Kissinger, Henry., World Order: Reflections on the Character of Nations and the Course of International Hellenic University School of Humanities, Social Sciences and Economics

- History, Penguin books, 2014
- Brzezinsky, Zbigniew., The Grand Chessboard: American Primacy and Its Geostrategic Imperatives, Basic books, 1997
- Kaplan, Robert D., The revenge of Geography, Random House, 2013;
- Kaplan, Robert D., Asia's Cauldron, Random House, 2014;
- Maugeri, Leonardo., Oil: The Next Revolution, 2012.
- US Government, US Army Strategic Studies Institute, Russia and Vladimir Putin: Studies and Reports,
   2013;
- Flieshart, Jana., Why did the Iranian revolution result in the foundation of the Islamic Republic? GRIN Verlag GmbH, 2013;
- Marie, Lall (ed.), Geopolitics of Energy in South Asia, ISEAS, 2009;
- Walter Carlsnaes, Thomas Risse, and Beth A. Simmons, eds. Handbook of international relations.
   Sage, 2013.

### **Articles**

- Güllner, Lutz., Threat or Risk? The Debate About Energy Security and Russia: Five Steps for a Scientific Research Programme, JCER Volume 4, Issue 2;
- John J Mearsheimer, "Structural realism." International relations theories: Discipline and diversity 83 (2007): 77-94., available at: <a href="https://www.commackschools.org/Downloads/8\_mearsheimer-\_structural\_realism.pdfm">https://www.commackschools.org/Downloads/8\_mearsheimer-\_structural\_realism.pdfm</a>
- Johnston, Robert., (et al.), The Russian Gas Sector: A Political Risk case Study, Harvard Univ. Belfer Center, 2014;
- Koyama, Ken., The Changing LNG Situation in Japan after March 11, Harvard Univ. Belfer Center, 2013
- Ripple, Ronald., The Geopolitics of Australian natural gas Development, Harvard Univ. Belfer Center, 2014;
- O'Sullivan, Meghan., The energy implications of a nuclear deal between P5+1 and Iran, Harvard Univ. Belfer Center, 2015;
- Mazis, I. Th., Geopolitical analysis of the Greater Middle East System in the present Juncture. Available at: https://goo.gl/pVuzXn
- Mazis, I. Th., Geographical Distribution of Methane Hydrates and International Geopolitics of Energy: Resources in the Eastern Mediterranean. Available at: https://goo.gl/J9DC6c
- Mazis, I. Th., The Geopolitical Impact of the Syrian Crisis on Lebanon. Available at: https://goo.gl/AMrjg6
- Mazis, I. Th., The Afgan-Pakistani islamist movement as a cause of instability in the Wider Middle East. Available at: https://goo.gl/rxqNY6
- Mazis, I. Th., Geopolitics of hydrocarbons in the South-Eastern Mediterranean: Greek-Israeli-Cypriot relations and the importance of the EEZ of Kastelorizo. Available at: file://home/mazis/Downloads/47-1-197-1-10-20130728%20(1).pdf
- Mazis, I. Th., The geostrategic axis between Israel, Cyprus and Greece: Turkey's planning in the region. Available at: file:///home/mazis/Downloads/48-1-201-1-10-20130728.pdf
- Mazis, I. Th., The psychological and symbolic factor of Great Britain's geostrategy in the Cyprus-Suez issue. Available at:https://goo.gl/Bw3QFB
- Mazis, I. Th., The role of energy as a geopolitical factor for the consolidation of Greek-Israeli relations. Available at: https://goo.gl/3Nc4Kv
- Mazis, I. Th., Geopolitics of energy in the Kastelorizo-Cyprus-Middle East complex, based on existing geophysical and geological indications of hydrocarbon deposits. Available at: https://cg.turkmas.uoa.gr/index.php/cg/article/view/49
- Mazis, I. Th., The Greek EEZ: principles of a geopolitical analysis. Available at: https://goo.gl/aGQDTq
- Mazis et al., Cable and pipeline corridors under the legal framework of UNCLOS and the energy treaty. Geopolitical considerations at the Eastern Mediterranean Sea. Available at: https://ideas.repec.org/a/hrs/journl/vixy2017i1p63-83.html
- Mazis et al., Geopolitical realities in the Greece-Cyprus dipole. Solutions and alibis. Available at:https://cg.turkmas.uoa.gr/index.php/cg/article/view/71
- Mazis et al., A geopolitical analysis of the activation of the Shiite geopolitical factor within the Syrian Conflict geosystem. Available at: <a href="https://goo.gl/1qKMbP">https://goo.gl/1qKMbP</a>
- Mazis, I. Th., The Mediterranean geopolitical structure and the matter of Cyprus problem in accordance to the Annan Plan. Available at: <a href="https://goo.gl/NoJg1Y">https://goo.gl/NoJg1Y</a>
- McGlinchey, Stephen. International relations theory. E-International Relations, 2017., available at: <a href="https://www.e-ir.info/publication/international-relations-theory/">https://www.e-ir.info/publication/international-relations-theory/</a>
- Robert Gilpin, War and Change in World Politics (New York: Cambridge University Press, 1981)
- Stephen M Walt, "International relations: one world, many theories." Foreign policy (1998): 29-46.

- Mazis, I. Th., Writing Methodology of a geopolitical analysis. Structure, concepts and terms, Available at: https://goo.gl/WYDuCp
- Mazis, I. Th., L' analyse geopolitique systemique: propositions terminologiques et definitions metatheoriques selon l' exigence metatheorique lakatienne. Available at: https://goo.gl/vqa54P
- Mazis, I. Th., Greece's new Defense Doctrine: a framework proposal. Available at: https://goo.gl/7JHuA2
- Mazis, I. Th, Theoretical perception of geopolitics in Davutoglu's work: a critical presentation. Available at: https://goo.gl/eEPct3
- Kotoulas, I., Geopolitical axes in Ioannis Mazis's scientific research program. Available at: https://goo.gl/4BHkHx

# Essential Reading on Energy Security, Power Politics and Strategies:

- Azzuni, Abdelrahman, and Christian Breyer. "Definitions and dimensions of energy security: a literature review." Wiley Interdisciplinary Reviews: Energy and Environment 7.1 (2018): e268.
- Hughes, Llewelyn, and Phillip Y. Lipscy. "The politics of energy." Annual Review of Political Science 16 (2013): 449-469.
- Giedrius Česnakas, "Energy resources in foreign policy: A theoretical approach." Baltic journal of law & politics [elektroninis išteklius]. Warsaw: Versita, 2010, Vol. 3, no. 1 (2010)., available at: https://www.vdu.lt/cris/bitstream/20.500.12259/35897/1/ISSN2029-0454\_2010\_V\_3\_1.PG\_30-52.pdf
- Kilinç-Pala, Pinar Buket. "Approaches in Energy Exclusive Security: Theories of Energy Security and the Dominance of Realism." Politics & Policy 49.3 (2021): 771-794.
- Brown, M. A., Wang, Y., Sovacool, B. K., & D'Agostino, A. L. (2014). Forty years of energy security trends: A comparative assessment of 22 industrialized countries. Energy Research & Social Science, 4, 64-77.
- Walker, M. (2007). Russia v. Europe: The energy wars. World Policy Journal, 24(1), 1-8.
- Stang, Gerald. The bear and the beaver: Russia and European energy security. European Union Institute for Security Studies (EUISS), 2015.
- Nowak, Zuzanna. "Russia's energy policy: The EU case." Global energy debates and the Eastern Mediterranean. PRIO Cyprus Centre-Friedrich Ebert Stiftung-Atlantic Council, Nicosia (2016): 23-28.
- NATO Defense College. Report Part Title: Russia's energy policy as a foreign policy instrument (2020).
- NATO Defense College. Report Part Title: Natural gas and trade dynamics with Russia (2020).
- Deese, D. A. (1979). Energy: economics, politics, and security. International Security, 4(3), 140-153.
- Milina, Velichka. "Energy security and geopolitics." Connections 6.4 (2007): 25-44.
- Belkin, Paul. "The European Union's energy security challenges." Connections 7.1 (2008): 76-102.
- Stefanova, Boyka. "European strategies for energy security in the natural gas market." Journal of Strategic Security 5.3 (2012): 51-68.
- Boute, Anatole. "Energy efficiency as a new paradigm of the European external energy policy: The case
   International Hellenic University School of Humanities, Social Sciences and Economics

- of the EU-Russian energy dialogue." Europe-Asia Studies 65.6 (2013): 1021-1054.
- Bradshaw, Michael J. "Global energy dilemmas: a geographical perspective." Geographical Journal 176.4 (2010): 275-290.
- Paravantis, J. A., et al. "A geopolitical review of definitions, dimensions and indicators of energy security." 2018 9th International Conference on Information, Intelligence, Systems and Applications (IISA). IEEE, 2018.
- Lyulyov, Oleksii, et al. "The impact of the government policy on the energy efficient gap: The evidence from Ukraine." Energies 14.2 (2021): 373.
- Zachmann, Georg. The European Union-Russia-China energy triangle. Vol. 16. Bruegel, 2019.
- RUSSIA, CHINA, AND THE NEW GEOPOLITICS OF ENERGY TO THE TOP Report Subtitle: The Case for a New U.S. International Energy Policy Report Author(s): Sarah Ladislaw and Nikos Tsafos Published by: CSIS.(2020)
- Christian Winzer, "Conceptualizing energy security." Energy policy 46 (2012): 36-48.
- Bengt Johansson, "A broadened typology on energy and security." Energy 53 (2013): 199-205.
- EUROSTAT:https://ec.europa.eu/eurostat/statisticsexplained/index.php?title=File:Energy\_dependency\_by\_fuel,\_EU-27,\_in\_selected\_years,\_1990-2018\_(million\_tonnes\_of\_oil\_equivalent).png
- EUROSTAT, "energy statistics", available at https://ec.europa.eu/eurostat/cache/infographs/energy/bloc-2c.html.

# Cross-border Energy Trade

Teaching hours and credit allocation: 30 hours, 6 credits

Course assessment: exam

### **Aims**

The overall aim of the course is to provide students with a basic understanding of the legal regime related to energy investments and trade with particular reference to established energy agreements.

The focus is particularly on energy agreements, especially Production Sharing Agreements (PSAs), signed between a government of a country with oil and gas reserves and international oil companies and Joint Operating Agreements (JOAs). In a PSA the country's government awards to a foreign oil company which provides the technical and financial services required for the execution of the undertaken activity (through the grant of a production sharing contract), the rights for exploration and production. Moreover the oil company bears the financial risk of the initiative but acquires an entitlement to a stipulated share of the oil produced as a reward for the risk taken and for the services rendered. The state remains the owner of the petroleum produced, subject only to the contractor's entitlement to its share of production.

Another theme that is examined in the course is the Joint Operating Agreement. The oil and gas industry is facing increasing challenges with regard to project finance, procurement and overall supply, requiring the use of a larger number of independent oil and gas servicing companies. The parties enter a JOA in order to conduct joint-operations, thereby establishing a common contractual framework. Furthermore, the regulated gas agreements will be examined.

Thirdly, the course examines the protection of energy Investments. The focus will be on the main principles of the Energy Charter Treaty (ECT). The purpose of this treaty is to create a stable international legal framework to facilitate and protect foreign investments by guaranteeing substantive standards of treatment that are to be accorded to an investor by a host state, such as fair and equitable treatment, full protection and security, national treatment, most-favoured nation treatment, and protection against expropriation.

# Learning outcomes

On completing the course the participants will be able to:

- distinguish between the Energy Industry Segments (Upstream, Midstream, Downstream);
- approach the study of transactions in the energy markets from an economic perspective
- familiarize themselves with the most frequent and significant energy agreements such as Mineral Deed, Assignment, Conveyance, Oil, Gas and Mineral Lease, Participation Agreement, Operating Agreement, Farmout Agreement, Purchase and Sale Agreement, Gas Sales Agreement etc;
- recognize a series of fundamental questions related to the legal treatment of contracts such as governing law, rights and obligations of the parties arising out of each agreement etc.;
- acquire in depth knowledge in Production Sharing Agreements, Joint Operating Agreements.
- approach the study of relevant legislation, cases and international agreements in an analytical and systematic way;
- demonstrate a thorough and comprehensive grasp of the principles and applications of international law protection;
- familiarize themselves with the most important Treaties regarding international energy investment protection and the case law thereof.

### **Course Content**

- Overview: the energy industry, energy security and energy markets;
- Principles of Energy Contracts;
- Energy Agreements;
- Upstream: Production Sharing Agreements, Joint Operating Agreements, Farm-ins and farm-outs;
- Midstream: Gas Sales Agreement;
- Downstream; Regulated Gas Agreements, Terminal Use Agreements, LNG Agreements;
- Investment Protection under the International Law Energy Charter Treaty;
- Investment Protection under contracts Stabilisation clauses;
- Case Law on the ECT's investment protection issues.

# Reading

### Books

- Iliadou Aik., Energy law: contemporary challenges and the role of the state, Nomiki Vivliothiki Ed(2021);
- Kitsakis Stavros, Contract law and organized market: multilateral liability relationships in the wholesale electricity market, Nomiki Vivliothiki Ed. (2018);
- Th. Panagos, The Handbook of Energy Law (2018);
- Bernard Taverne, Petroleum, industry and governments: a study of the Involvement of Industry and Governments in Exploring for and Producing Petroleum (2013);
- Daniel Johnston International Petroleum Fiscal Systems and Production Sharing Contracts (1994)
- Energy Charter Secretariat, Making Investments in energy Charter Member Countries http://www.energycharter.org/what-we-do/investment/the-blue-book/

### **Articles**

- Chukwuma Samuel Okoli [2012] Production Sharing Agreements and Licences: A Distinction without a Difference?, International Energy Law Review 282;
- Diana Bayzakova [2011] Current challenges, future prospects: legal governance of the petroleum industry in Uzbekistan, I.E.L.R., 6, 238-243 [International Energy Law Review];
- AFM Maniruzzaman, The pursuit of stability in international energy investment contracts: A critical appraisal of the emerging trends, Journal of World Energy Law and Business, 2008, Vol. 1, No. 2, 121-157;
- Peter Cameron and Abba Kolo, What is Energy Investment Law and Why Does it Matter? (2012) <a href="http://www.eisourcebook.org/cms/March\_2013/Peter%20&%20Abba%20-%20Energy%20Investment%20Law.pdf">http://www.eisourcebook.org/cms/March\_2013/Peter%20&%20Abba%20-%20Energy%20Investment%20Law.pdf</a>;
- Graham Coop, 20 Years of the Energy Charter Treaty(2014) 29 (3) ICSID Review 515-524;
- Christopher Clement-Davies, [2014] Contractual stability in the energy sector: reconciling the needs of states and investors, I.E.L.R., 2, 47-48 [International Energy Law Review];
- Miguel SoaresBranco [2012] Product sharing agreements legal blessing or curse for developing countries?, I.E.L.R., 4, 147-150 [International Energy Law Review];
- Daniel Johnston [1993] The production-sharing concept: variations on a theme, O.G.L.T.R., 11(6), 201-204 [Oil & Gas Law & Taxation Review];
- Peter Olaoye Olalere [2015] Searching for contractual equilibrium: is a production-sharing agreement in the oil and gas industry a fair balance between the interests of the host state, national oil company and foreign investor?, I.E.L.R., 1, 30-38 [International Energy Law Review];

- Fabio Solimene, [2014] Production-sharing contracts, joint ventures and service contracts: analysis and drafting considerations, I.E.L.R., 5, 173-179 [International Energy Law Review];
- Samuel C. Dike [2014] Appraising the legal relationship between the operator, the non-operator and the operating committee in a joint venture the UK example, I.E.L.R., 4, 142-149 [International Energy Law Review];
- Renad Younes and Nicholas Ross-McCall [2013] Energy briefing: synthetic ownership structures in the energy sector, I.E.L.R. 2013, 1, 36-42 [International Energy Law Review].

# **ELECTIVE COURSE DETAILS**

# Mergers and Acquisitions in the Energy Industry

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

### **Aims**

In the 1990s, when most of the European energy markets were still monopolized, the European Union started to impose liberalizing directives on the Member States. Thus, by opening up markets for competition and by pushing forward for emissions decrease as well as for renewable energy investments, a wave of mergers and acquisitions [M&A] among energy companies has swept across Europe duringthe past few years. This changing scene has now become an increasingly important area for energy companies. Within this context, this course shall examine the strategic and practical advantages and disadvantages of M&A, the statutory requirements and procedures, the documentation required and the relevant case law while emphasizing the practical aspects of the business lawyer's role in structuring the transaction, in identifying, explaining and negotiating the business/legal terms and in negotiating the acquisition agreements.

# Learning outcomes

On completing the course students will be able to:

- understand the necessity of having an effective corporate structure
- understand how corporate structure impacts and affects market structure
- · understand the deal-making priorities of every segment of the energy industry
- assess organic growth, cost escalation and its containment, profitability pressures, rationalization of resource portfolios and tax treatment as motives dictating merger activity
- understand the managerial actions that distinguish successful from failing combinations through reality testing such as having a premerger planning, resolving communication issues, developing staffing plans, indicating a governance model with clear roles and responsibilities
- assess the interaction M&A in the energy sector and competition law

### **Content**

- Valuation Methods and Financial Analysis
- Strategic Rationale for Acquisitions
- Strategies for Successful Due Diligence and Post-Acquisition Integration
- · Effective Negotiation
- Mergers: operation, statistics, significance
- Acquisition documents
- Potential structures of a merger and acquisition transaction
- Successorship to assets and liabilities: the effect of an acquisition on outstanding patent licenses, leases, collective bargaining agreements, pensions and contingent product, environmental and civil rights claims
- Anti-takeover defences
- Protecting consumer interests in mergers and acquisitions
- Protecting minority shareholders in M&A transactions
- Sources of EU law that govern merger and acquisition transactions
- Accounting and tax issues in mergers and acquisitions.

# Reading

### Books

- Patrick A. Gaughan, [2010], Mergers, Acquisitions, and Corporate Restructurings, John Wiley & Sons;
- B Rajesh Kumar, [2012], Mega Mergers and Acquisitions: Case Studies from Key Industries, Palgrave Macmillan;
- Kathrin Bösecke, [2009], Value Creation in Mergers, Acquisitions, and Alliances, Springer Science & Business Media;
- Ravindhar Vadapalli, [2007], Mergers, Acquisitions and Business Valuation, Excel Books India;
- William K. Sjostrom, Jr. [2014], Mergers and Acquisitions Law, Carolina Academic Press;
- Donald DePamphilis, [2013], Mergers, Acquisitions, and Other Restructuring Activities: An Integrated Approach to Process, Tools, Cases, and Solutions, Academic Press;
- Thomas A. Petrie, [2013], Following Oil: Four Decades of Cycle-Testing Experiences and What They Foretell about U.S. Energy Independence, University of Oklahoma Press.

### Articles

- Iraida Zogaite and Darius Miniotas, [2014], Lithuania: decision of the Competition Council regarding OAO Gazprom failure to comply with merger conditions, G.C.L.R. 2014, 74, R51 [Global Competition Litigation Review];
- Oliver Bretz, Daniel Gore and Katrin Schallenberg, [2014], A new approach to the failing firm defence? The Nynas/Shell Harburg merger, E.C.L.R. 2014, 3510, 480-486 [European Competition Law Review];
- Tomas Fiala, [2014], Czech Republic: mergers Competition Office, E.C.L.R, 357, N57 [European Competition Law Review];
- Katri Paas-Mohando, [2013], Choice of merger notification system for small economies, E.C.L.R, 3410, 548-553 [European Competition Law Review];
- Non-opposition to a notified concentration Case COMP/M.6801 Rosneft/TNK-BP Text with EEA relevance, OJ C 107, 13.4.2013;
- Nicole Kar and Ronan Flanagan, [2013], The Electrabel case, Comp. L.I., 121, 3-4 [Competition Law Insight] see also: Electrabel v European Commission T-332/09 Unreported December 12, 2012 GC
- Commission Decision, [2006], Energy sector merger approved subject to conditions, EU Focus, 199, 6-7, Case: Gaz de France / Suez M.4180 Unreported, November 14, 2006 CEC;
- Francesco Maria Salerno, [2007], Current issues of EU merger control in the energy sector: a proposed framework to foster the dialogue, E.C.L.R., 281, 65-70 [European Competition Law Review];
- Commission Decision, [1998] Concentration in Finnish energy sector gains Commission approval, EU Focus, 12, 6-7 / Case: Imatran Voima Oy / Neste Oy Unreported, 1998 CEC;
- Wassim Benhassine, [2009], Restructuring the European Energy Market Through M&As An Application of the Model of Economic Dominance, Frontiers in Finance and Economics, Vol. 6, No. 2, pp. 140-180;
- Ning Wu,[2006], The Role of Cross-Border Mergers and Acquisitions in Energy Security, Total E&P USA;
- John J. Garcia and Francesc Trillas, [2013], European Energy Industry Shocks, Corporate Control and Firms' Value, Documentos de trabajo Economía y Finanzas No 13-29.

Management and Design of Renewable Energy & Sustainability Systems

Course assessment: exam

### **Aims**

The aim of this course is to introduce students to sustainable energy systems and their full design, implementation and operation cycle. The course provides an introduction to energy systems, renewable energy resources and energy efficiency with an emphasis on the respective technologies and applications. An overview analysis of the benefits of solar, wind, biomass and hydrogen/fuel cells, as well as energy efficiency is presented. A discussion of sustainable energy applications in the built environment also takes place. Energy Transition and relation to the Paris Agreement is presented. The course highlights how the set national energy and sustainability targets are translated into policies, regulatory and institutional framework, which in turn prescribe the implementation and operation of sustainable energy systems. The theory and practice of Project Management is applied to renewable energy and energy efficiency projects. Finally, the course further enables students to explore financial considerations for sustainable energy projects, as well as a variety of funding mechanisms.

# Learning outcomes

On completing the course, students are expected to be able to:

- Understand the interrelations between energy and sustainable development
- Understand what Energy Transition is
- Understand renewable energy and energy efficiency
- Understand the main components of renewable energy and energy efficiency systems
- Understand the national and regional planning of sustainable energy systems
- Understand the full implementation cycle of a renewable energy project

### Content

- Introduction to sustainable development and the Sustainable Development Goals of the United Nations.
- Renewable Energy Sources and Energy Efficiency.
- Renewable energy and energy efficiency systems components.

# Reading

### **Books**

- Jefferson W. Tester, Elisabeth M. Drake, Michael J. Driscoll, Michael W. Golay and William A. Peters, Sustainable Energy, Choosing Among Options, Second Edition, MIT Press, 2012, ISBN: 9780262306478
- Scerri, Andy; James, Paul (2010), "Accounting for sustainability: Combining qualitative and quantitative research in developing 'indicators' of sustainability". International Journal of Social Research Methodology 13 (1): 41–53;
- COM (97) 599, White Paper 'Energy for the Future: Renewable Sources of Energy'26/11/1997;

- Polatidis, H., Haralambopoulos, D., Munda, G., Vreeker, R., 'Selecting an appropriate Multi-Criteria Decision Aid Technique for renewable energy planning', Energy Sources, Part B, 1 (2006) 181-193;
- Sustainable Design of Energy Systems The Case of Geothermal Energy Paper presented at the 46th conference of the European Regional Science AssociationERSA 2006, Volos, Greece, August 30th September 3rd 2006.

### **Articles**

- David Le Blanc, Towards Integration at Last? The Sustainable Development Goals as a Network of Targets, Sustainable Development, 23, 176-187 (2015), DOI:10.1002/sd.1582;
- Eloise M. Biggs, Eleanor Bruce, Bryan Boruff, John M.A. Duncan, Julia Horsley, Natasha Pauli, Kellie McNeill, Andreas Neef, Floris Van Ogtrop, Jayne Curnow, Billy Haworth, Stephanie Duce, Yukihiro Imanari, Sustainable development and the water-energy-food nexus: A perspective on livelihoods, Environmental Science & Policy 54 (2015) 389-397, DOI:10.1016/j.envsci.2015.08.002;
- Scerri, Andy; James, Paul (2010), "Accounting for sustainability: Combining qualitative and quantitative research in developing 'indicators' of sustainability". International Journal of Social Research Methodology 13 (1): 41–53; DOI:10.1080/13645570902864145;
- Firas Obeidat, A comprehensive review of future photovoltaic systems, Solar Energy 163 (2018) 545-551, DOI:10.1016/j.solener.2018.01.050;
- XingLuo, Jihong Wang, Mark Dooner, Jonathan Clarke, Overview of current development in electrical energy storage technologies and the application potential in power system operation, Applied Energy, Volume 137, 1 January 2015, Pages 511-536, https://doi.org/10.1016/j.apenergy.2014.09.081;
- Raymond J. Cole, Laura Fedoruk, Shifting from net-zero to net-positive energy buildings, Building Research & Information, 2015, Vol. 43, No. 1, 111–120, DOI: 10.1080/09613218.2014.950452;
- G. Kyriakarakos, G. Papadakis, Polygeneration Microgrids for Residential Applications, Handbook of Clean Energy Systems, Wiley, 2016, DOI: 10.1002/9781118991978.hces111;
- Angeliki Kylili, Paris A. Fokaides, European Smart Cities: The Role of Zero Energy Buildings, Sustainable Cities and Society, Volume 15, July 2015, Pages 86-95, DOI:10.1016/j.scs.2014.12.003;
- G. Kyriakarakos, K. Patlitzianas, M. Damasiotis, D. Papastefanakis. A fuzzy cognitive maps decision support system for renewables local planning. Renewable and Sustainable Energy Reviews. 39 (2014) 209-22, DOI: 10.1016/j.rser.2014.07.009;
- Banos R., F. Manzano- Agugliaro, F. G. Montoya, C. Gil, A. Alcaude, J. Gomez, Optimization methods applied to renewable and sustainable energy: A review, Renewable and Sustainable Energy reviews, Volume 15, Issue 4, May 2011, pp. 1753-1766; DOI:10.1016/j.rser.2010.12.008;
- H.H. Goh, S.W.Lee, Q.S.Chua, K.C.Goh, B.C.Kok, K.T.K.Teo, Renewable energy project: Project management, challenges and risk, Renewable and Sustainable Energy Reviews 38 (2014) 917-932, DOI:10.1016/j.rser.2014.07.078;
- Mariana Mazzucato, Gregor Semieniuk, Financing renewable energy: Who is financing what and why
  it matters, Technological Forecasting and Social Change, Volume 127, February 2018, Pages 8-22,
  DOI:10.1016/j.techfore.2017.05.021.

# Quantitative Methods for Energy and Environmental Economists

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

# **Aims**

This course will introduce students to the economic assessment of energy and environmental policy andQuantitative methods used to analyze problems in energy and environmental economics. Economic modeling and approaches as well as their application on energy and environmental issues will be discussed. Students will develop expertise in working with data and in applying numerical simulation models as well as econometric techniques using computer software. Another objective of the course is to enable students to comprehend the role of economic analysis in designing policies which address issues of energy security, climate change and related environmental externalities.

# **Learning Outcomes**

On completing the course, students are expected to be able to:

- understand environmental implications of energy use
- assess the role of economic analysis in designing policies to address environmental externalities
- elaborate economic modeling and econometric approaches
- reinforce concepts, rationales, and instruments for policy intervention in energy markets
- analyze the economic and econometric models (such as optimization models, models in mixed complementarily format, partial equilibrium models of electricity and energy markets, regression models to estimate demand functions, econometric techniques for policy evaluations, panel data methods)

### Content

- Introduction to economic assessment of energy and environmental policy
- Measurement of Environmental and Resource Values
- Energy economic modeling and approaches
- Energy economic and econometric models
- Economics of the Environment

# Reading

### **Books**

- A. Myrick Freeman III, Joseph A. Herriges, Catharine L. King, The Measurement of Environmental and Resource Values: Theory and Methods, RFF Press, 2014;
- Adrew Gelman, and Jennifer Hill, Data analysis using regression and multilevel/hierarchical models,
   Cambridge University Press, 2007;
- Seymour Karplan, Energy Economics: Quantitative Methods for Energy and Environmental DecisionsHardcover- March, 1983;
- Sieber, Horst, Economics of the Environment, Theory and Policy, Springer, seventh edition 2008;
- Eden, Richard/ Posner Michael/ Bending Richard/ Crouch Edmund/ Stanislaw Joe, Energy Economica: Growth, Resources, and Policies, Cambridge University Press, 1982.

### **Articles**

- Christoph Boehringer, Tim Homann, Casiano Manrique-de-Lara-Penaate (2006), The efficiency costs of separating carbon markets under the EU emissions trading scheme: A quantitative assessment for Germany. Energy Economics, 28, 4461<a href="http://dx.doi.org/10.1016/j.eneco.2005.09.001">http://dx.doi.org/10.1016/j.eneco.2005.09.001</a>
- L. Goulder and I. Parry (2008), Instrument Choice in Environmental Policy, Review of Environmental Economics and Policy, 2, 2, 152174. doi:10.1093/reep/ren005;
- Jeroen C.M.J. van den Bergh, Optimal climate policy is a utopia: from quantitative to qualitative cost-

- benefit analysis, Ecological Economics, Volume 48, Issue 4, April 2004, pp. 385-393;
- Sciubba, Enrico/ Ulgiati, Sergio, Emergy and exergy analyses: Complementary methods or irreducible ideological options? Energy, Volume 30, Issue 10, July 2005, pp. 1953-1988;
- Spence, David B. and Murray, Paula, The Law, Economics, and Politics of Federal Preemption Jurisprudence: A Quantitative Analysis, California Law Review Volume 87, No. 5, October 1999, pp. 1125-1206.

# Water Law & Policy

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

### Aims

The course introduces students to the legal principles and concepts that control the management and protection of the most crucial natural resource, fresh water. Emphasis will be given on current legal and policy debates on an international and european level; human rights law and sustainable development goals will be on the forefront of the course. The course will also focus on environmental issues, climate change adaptation, water trade and investment projects on water supply companies. Moreover, the difficulties and policy dilemmas involved in creating integrated water management institutions will be discussed, along with institutional development, norms and guiding principles, implementation strategies, and public participation mechanisms at the local, European Union level and globally.

# Learning outcomes

On completing the course, students are expected to be able to:

- critically analyze international and regional water law and policies
- assess transboundary water cooperation
- understand the appropriate role for the market and private companies in meeting society's water needs
- understand the need for protection of threatened groundwater resources
- analyze the results of deficient management policies for the management of water resources
- understand the insights national and transnational water management
- critically examine the social policies that govern water management
- analyze the most significant global instruments

# **Content**

- Introduction to water law and policy
- International water law
- EU water Directive
- Water and Trade
- Water and Investment
- Human Rights and water
- Environmental Protection of water resources
- Institutional Perspectives on water policy

# Reading

### **Books**

- G. Olsson, Water Interactions A Systemic View, IWA Publishing 2022.
- J. Dellapenna & J. Gupta, Water Law, Edward Elgar Publishing 2021.
- S. McCaffrey, C. Leb & R. Denoon, Research Handbook on International Water Law,
- Edward Elgar Publishing, 2019.
- V. Tzatzaki, Water in Public International Law, Nomiki Vivliothiki 2012.

### **Articles**

- Tzatzaki, Restrictive measures when trading water: May GATT protect us from water scarcity. Yearbook of International Environmental Law 2021, 1-20.
- V. Tzatzaki & A. Dan Tarlock. 2015. International Water Law and Climate Disruption Adaptation, in A. Tanzi, O. McIntyre, A. Kolliopoulos, A. Rieu-Clarke & R. Kinna (eds.), The UNECE Convention on the Protection and Use on Transboundary Watercourses and International Lakes, BRILL, 379-393.
- D. Abebe, Egypt, Ethiopia, and the Nile: The Economics of International Water Law 15 Chicago Journal of International Law 2014, 29-46.
- S. Murthy, The Human Right(s) to Water and Sanitation: History, Meaning and the Controversy over Privatization, 31 Berkley Journal of International Law 2013, 89-149.
- G. Eckstein, Water Scarcity, Conflict, and Security in a Climate Change World: Challenges and Opportunities for International and Law Policy, 27 Wisconsin International law Journal 2007, 410.

# International & European Environmental Law & Policy

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

### **Aims**

This course aims to offer an intense, practical and detailed-based study of environmental law in depth, within its policy context. It explores and compares the evolution and developments of environmental law both on a European level as well as on the international one. At the same time, it underlines the major differences of each of the two legal regimes, bearing in mind that the EU legal order is vested with powers which do not exist at the international plane. The overall purpose of the course is to appreciate the significance of European Union law as a system of regional international law seeking to harmonize the national laws of the Member States according to common principles of environmental regulation. For this reason, it goes in depth on the European directives which tackle environmental issues directly, or those with a green perspective. The course equips students with a broad expertise which will be of outmost value in careers in government departments and agencies, international organisations, nongovernmental organisations, private practice, policymaking by offering them a complete and updated set of related legal documentation (legal texts and proposals, Commission communications and Green papers, Court cases, written contributions of speakers). Hence, it also deals with particular methods of negotiation, applicable in environmental procedures.

# Learning outcomes

On completing the course students will be able to:

- acquire substantive knowledge and understanding of a series of important policy and social issues in energy, and of the contending viewpoints and claims on these issues
- identify and characterize key approaches from social science disciplines and from interdisciplinary fields like science and technology studies to understanding and evaluating energy issues, and identify advantages, problems and implications of these approaches
- critically evaluate contributions to the academic and public debates on energy issues, and decisionmaking regarding them
- identify, deploy and evaluate a selection of techniques and procedures used in energy policy analysis, decision-making and assessment
- apply these understandings and skills, and deploy some of these approaches, concepts techniques, in analyzing a new problem in energy policy, and in devising, evaluating and justifying options for intervention
- develop their skills in finding and using arguments and information and in critically evaluating such material
- explore strategies and synergies of policy and decision-making regarding environmental issues.
   Examine the notion of corporate accountability on environmental issues and employ this knowledge to direct meetings, plan teamwork, and assist clients to choose the optimum policy options which strengthen their corporate interest whilst protecting the environment.
- apply research and critical analysis. Students learn to work with statutes and treaties, analyze
  executive and legislative authority, compare domestic with international law, and integrate legal with
  scientific or economic analysis
- cultivate communication skills. Students hone their visual and narrative presentation skills.

### Content

- general aspects of international and European environmental law
- problems related to climate change, nature conservation, water management etc.
- the interplay between the various legal orders and different regimes
- objectives, principles, actors, instruments and decision-making procedures in International environmental law and policy
- issues linked to international trade: WTO and environment protection
- the evolution of European Union environmental competence
- fundamental environmental objectives of the European Union
- the basis for substantive environmental legislation
- environmental liability
- the implementation and enforcement of environmental legislation
- alternative strategies in environmental multilayered jurisdictions. The WTO appellate body, the ECJ, the ITLOS, and the ICJ.

# Readings

### **Books**

- Galanis Panagiotis [2022], Environmental assessment and permitting: a changing geometry, Nomiki Vivliothiki Ed;
- Stefanos Tsiaras [2022], Environment and Sustainable Development, Association of Greek Academic Libraries;
- Preben Hempel Lindøe, Michael Baram & Ortwin Renn, [2015], Risk Governance of Offshore Oil and Gas Operations, Cambridge University Press;
- James R. May and Erin Daly, [2015], Global Environmental Constitutionalism, Cambridge University Press.
- Keith H. Hirokawa, [2014] Environmental Law and Contrasting Ideas of Nature A Constructivist Approach, Cambridge University Press;

- Simone Schiele, [2014], Evolution of International Environmental Regimes, The Case of Climate Change, [Part of Cambridge Studies in International and Comparative Law], Cambridge University Press;
- Christina Voigt, [2013], Rule of Law for Nature New Dimensions and Ideas in Environmental Law, Cambridge University Press;
- Pierre-Marie Dupuy and Jorge E. Viñuales, [2013], Harnessing Foreign Investment to Promote Environmental Protection Incentives and Safeguards, Cambridge University Press;
- Elisa Morgera, [2012], The External Environmental Policy of the European Union EU and International Law Perspectives, Cambridge University Press;
- Elizabeth Fisher, Bettina Lange, and Eloise Scotford, [2013], Environmental Law Text, Cases, and Materials, Oxford University Press.
- Philippe Sands, Principles of International Environmental Law, Cambridge University Press [2014].
- Philippe Sands, Jacqueline Powl & Ruth Mackenzie, Principles of International Environmental Law, Cambridge University Press [2012].
- Alexandre Charles Kiss & Dinah Shelton, A Guide to International Environmental Law, Martinus Nijhoff Publishers [2007].
- Daniel Bodansky, The art and craft of International Environmental Law, Harvard University Press [2010].

### **Articles**

- John Pearson, [2015], Hydrocarbon hysteria: differentiating approaches to consumption and contamination in regulatory frameworks governing unconventional hydrocarbon extraction, J.P.L. 2015, 1, 3-15 [Journal of Planning & Environment Law];
- Catherine Howard, [2014], *Fit to frack?* J.P.L. 2014, 13 Supp [Power to the People?], OP43-OP77, [Journal of Planning & Environment Law];
- Ludwig Kramer, [2014], Impact assessment and environmental costs in EU legislation, J.E.E.P.L., 11[3], 201-231, [Journal for European Environmental & Planning Law];
- Gisele M. Arruda, [2014], Global governance, health systems and oil and gas exploration, Int. J.L.M., 56[6], 495-508, [International Journal of Law and Management];
- Communication from the Commission Guidelines on State aid for environmental protection and energy 2014-2020, OJ C 200, 28.6.2014, p. 1–55;
- Marta Villar Ezcurra, [2014], EU state aid and energy policies as an instrument of environmental protection: current stage and new trends, E. St. A.L., 13[4], 665-676 [European State Aid Law Quarterly].
- Eric Engle, General Principles of European Environmental Law, PennState.Env.L.R., 17(2), 215-224. [Penn State Environmental Law Review]
- James A.R. Nafziger, Basic Functions and Principles of International Environmental Law in the Context of Managing Water Resources, Denv.J.Int'l.L.&Pol'y., 39(3), 381-396, [Denver Journal of International Law and Policy]
- Alexander Zagar, Mediated versus Cumulative Environmental Damage and the international Law Association's Legal Principles on Climate Change, Climate.L., 4(3-4), 217-233, [Climate Law].

# Derivatives for energy

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

# **Aims**

The aim of this course is to provide the students with concrete knowledge of the financial markets for energy trading which are nowadays growing at a fast pace all around the world. Financial derivatives can now rapidly influence the mechanism of energy price formation for oil, gas and electricity, sometimes even driving prices up at a very volatile manner. As with most derivatives contracts however, energy derivatives can also be used for both speculation and hedging purposes. Companies can either buy or sell energy derivatives to

hedge against fluctuations in the movement of underlying energy prices or to diversify their portfolio whereas speculators can use derivatives to profit from the changes in the underlying price and amplify those profits through the use of leverage. This course shall therefore shed light on these issues combining a rigorous development of mathematical modelling with a compact institutional presentation of the arcane characteristics of commodities that makes the complex analysis of commodities derivative securities.

# Learning outcomes

On completing the course students will be able to:

- familiarize themselves with an advanced study of securities regulation and capital markets
- become familiar with energy commodities markets and established practices
- understand the core concepts of securities law doctrine and their practical application in the context of real-world transactions
- understand and sort objectives pursued when entering a derivatives contract
- describe the process used by corporations to reduce their risk exposure to the movement of fuel prices in the context of a fuel price risk management
- assess the importance and the impact of each relevant factor when undertaking a fuel price risk analysis by referring to a variety of perspectives and rations on securities regulation
- become familiar with all the common standard form contracts used within the industry

### Content

- Overview of Energy Physical and Financial Markets
- Spot Prices and Forward Curves in Energy Markets
- Using Energy Futures, Forwards, Swaps
- Using Energy Options: Hedging and Speculation
- Hedging Strategy and Risk Metrics
- · Option Strategies and Structured Products
- Basis Risk Management and Derivatives on Multiple Assets
- Introduction to Derivatives Valuation and Disclosures

# Reading

### **Books**

- Peter C. Fusaro, Jeremy Wilcox, [2000], Energy Derivatives: Trading Emerging Markets, Energy Publishing Enterprises dba;
- Helyette Geman, [2009], Commodities and Commodity Derivatives: Modeling and Pricing for Agriculturals, Metals and Energy, John Wiley & Sons;
- Dragana Pilipovic, [2007], Energy Risk: Valuing and Managing Energy Derivatives: Valuing and Managing Energy Derivatives, McGraw Hill Professional;
- Robert Kolb, James A. Overdahl, [2010], Financial Derivatives: Pricing and Risk Management, John Wiley & Sons;
- Lester C. Hunt, Joanne Evans, [2011], International Handbook on the Economics of Energy, Edward Elgar Publishing;
- Andrea Roncoroni, Gianluca Fusai, Mark Cummins, [2015], Handbook of Multi-Commodity Markets and Products: Structuring, Trading and Risk Management, John Wiley & Sons;
- Iris Marie Mack, [2014], Energy Trading and Risk Management: A Practical Approach to Hedging, Trading and Portfolio Diversification, John Wiley & Sons.

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### **Articles**

- Andrew Parry, [2007], ISDA/FpML for financial derivatives, J.I.B.L.R., 22[9], 495-499 [Journal of International Banking Law and Regulation];
- Hannah Meakin, [2010], OTC derivatives and clearing, C.O.B. 77[Jun], 1-29 [Compliance Officer Bulletin];
- Tony Ciro, [2005], Game theory in financial markets litigation J.I.B.L.R. 207, 315-324 [Journal of International Banking Law and Regulation];
- John Ratliff, [2015], Major events and policy issues in EU competition law, 2013-2014: Part 2. I.C.C.L.R. 2015, 26[4], 115-138 [International Company and Commercial Law Review];
- Martin Sandler, Michael Brown, Peter Willis and Elizabeth Clay, [2014], Market abuse, C.O.B. 2014, 118[Aug], 1-37 [Compliance Officer Bulletin];
- David B. Spence and Robert A. Prentice, [2011], The Transformation of American Energy Markets and the Problem of Market Power, University of Texas Law, Law and Economics Research Paper No. 202, McCombs Research Paper Series No. BGS-01-11;
- Louis H. Ederington, Chitru S. Fernando, Thomas K. Lee, Scott C. Linn and Anthony D. May, [2011], The Role of Financial Markets in Determining Physical Oil Prices: A Survey of the Literature, available at SSRN [last accessed: March 13, 2015];
- Ivan Diaz-Rainey, Mathias M. Siems and John K. Ashton, [2011], The Financial Regulation of European Wholesale Energy and Environmental Markets, USAEE Working Paper No. 11-070;
- Jacqueline Lang Weaver, [2004], Can Energy Markets be Trusted? The Effect of the Rise and Fall of Enron on Energy Markets, Houston Business and Tax Law Journal, Vol. 4
- Rodrigo Zepeda [2014] Hedge funds, high risks, and headaches negotiating and documenting hedge fund derivatives: Part 1, J.I.B.L.R., 29(6), 349-359, [Journal of International Banking Law and Regulation] and Part 2, [2014], The Chartered Institute for Securities & Investment, Journal of International Banking Law and Regulation, Volume 29, Issue 7.

# Recent Developments in Energy Law & Business

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

### Aims

The course focuses on the entrepreneurial process related with sustainable energy. It provides students with insights and advanced skills in all aspects of sustainable energy including upstream/exploration, energy markets, generation/distribution, waste management, energy efficiency and monitoring. After being introduced to the reality of the entrepreneur and the central issues related to the preparation of an entrepreneurial project, the students have the opportunity to specialize in the energy sector. The students work on the financial, marketing and managerial aspects of developing a business plan within the energy sector with the help of market experts that bring their experience to the course. By the end of the course, students gain useful and technical knowledge in the areas of sustainable energy and business; they prepare their own business plan and are adept at communicating and presenting it to an audience.

# Learning outcomes

At the end of the course the participants will be in a position to:

- Develop an understanding of the main characteristics of the global energy markets
- Understand Commodity Trade

- Comprehend the WTI-Brent decoupling and the latest developments in the oil & gas markets
- Understand and assess the latest trends in the electricity sector in the EU, the Emission Trading Scheme.

### Content

- Introduction to Energy Markets
- Shipping & Energy Latest LNG developments
- The future of Electricity & Gas markets in Europe: the new dilemmas and Greek energy marketdevelopments
- · Energy efficiency and monitoring ETS
- Energy Policy Developments

# Recent Developments in the Electricity Sector

Teaching hours and credit allocation: 16 hours, 3 credits

Course assessment: exam

### **Aims**

The course focuses on basic and advanced topics of electricity. It provides students with insights and advanced skills in all aspects of the electricity industry. After being introduced to the reality and the central issues related to the operation of the electricity market, students have the opportunity to gain useful theoretical and technical knowledge relating to pioneering issues and most recent developments of the liberalized electricity market. By the end of the course, students become expertized in the area of electricity so as to be able to meet the challenges of a rapidly changing market.

# Learning outcomes

At the end of the course the participants will be in a position to:

- Develop an understanding of the main characteristics of the global electricity markets.
- Understand all issues relating to retail and wholesale components of electricity marketsand their operation scheme.
- Be aware of and assess all recent issues and developments with regard to electricity service relying on the complex system of infrastructure that falls into two general categories: generation and the delivery services of transmission and distribution.
- Understand and assess the latest trends in the electricity sector in the EU.

# Content

- Introduction to Electricity Markets
- Latest developments related to the electricity industry
- The future of Electricity in Greece & in Europe: the new dilemmas and Greek energy(electricity) market developments

# The Master's Dissertation

Credit Allocation: 30 Credits

Course Assessment: Written thesis of maximum 12,000 words

The Master's Dissertation is supervised by an academic member of staff. Students are encouraged to have regular meetings with their supervisor. Supervisors assist students in their research work by acting as consultants and counselors in matters of research procedure and practice. Students are expected, however, to become the experts in the topic they select for research and take responsibility for their work. The length of the dissertation should not exceed 12,000 words exclusive of footnotes, appendices and bibliography. The Dissertation is assessed by a three-member academic committee. If there is a difference of more than 3 points (on a scale of 1-10) in the evaluations of the three examiners, then a fourth evaluation is called for. The final grade awarded on the Dissertation will be the average of the mark given by the fourth examiner and the closest two marks to it of the other three marks.

### Submission and Evaluation

The length of the Master Dissertation should not exceed 12,000 words (exclusive of footnotes, appendices and bibliography). The essay should be supplemented by an abstract of 200-400 words, Contents and Bibliography.

The Master Dissertation should be submitted on the IHU eLearning platform.

The Dissertation must be submitted in the approved format. The Dissertation is due to be submitted by 31 January 2026 (for full time students) and by 31 January 2027 (for part time students). Extension beyond this deadline will only be given in special circumstances with the agreement of the student's supervisor. The extension must be agreed in writing between the student's supervisor and the student, informing also by email the School's course office (co-seba@ihu.edu.gr). Any application for extension must be made three weeks before the due date of submission. The maximum period of the extension that will be granted to the student is two (2) months from the date of the submission of the Dissertation. If the extension granted is set after February 28 of the year (or after February 29 for leap years), the student will graduate the next calendar year. In this case the student must be aware that his/her graduation will take place during the next calendar year, as graduations take place once per year usually spring. Students' extenuating circumstances (such as illnesses, suspension/postponement of studies) that exceed the limit of February 28 (or February 29 for leap years), will be examined by the School assembly on a case-by-case basis and in any case cannot exceed 15 March. To qualify for a Master's degree, a student must achieve a minimum grade of 5.00 in the Dissertation.

If the Dissertation is submitted late without permission, it will be immediately penalised by 7% for late submission plus 1% daily, including weekends. The maximum period for late submission is 2 weeks. Any dissertation submitted later than two weeks after the proper date shall not be accepted and shall therefore be graded with a mark of 0.00.

Students who fail the dissertation will be required to re-submit their dissertation on the same or a similar topic. Students are allowed to re-submit their dissertation only once, assuming a valid submission was made in the first instance. The deadline for re-submission is 6 weeks after the publication of the mark of the first submission.

# **PART II: REGULATIONS & POLICIES**

### 1. Tuition Fees

- 1.1. IHU full-time and part-time postgraduate students pay for their participation on the Master of Science in Energy Law, Business, Regulation and Policy programme, total fees amounting to 3,000 €.
- 1.2. Deposits: Upon acceptance on a postgraduate programme of study at the IHU, you will be asked to pay a non-refundable deposit of 500€ to secure your place. This amount will count towards the first instalment of your tuition fees. The deposit can be paid by bank transfer or bank draft.
- 1.3. Tuition fees are paid in two instalments for full-time students and in four instalments for part-time students. The first day of each academic semester is set as the final date for payment. Proof of payment of the first fee instalment must be submitted by or upon registration of the student on Induction Day.
- 1.4. No extension is provided for tuition fee payment and no different arrangement is permitted for payment of the first fee instalment. Exceptionally, a special arrangement for subsequent fee payments may be foreseen by the Scientific Director of the Programme following the respective request by the student, provided there are exceptional reasons.
- 1.5. Examination and coursework marks for students in arrears regarding the payment of fees will not be disclosed by the School. These students will not be permitted to proceed to the next semester of studies if payment has not been made according to the payment schedule, unless there are exceptional circumstances that have been communicated to and approved by the General Assembly of the School.
- 1.6. In the final instance, students who have not paid the full tuition fees by the end of the programme will not be allowed to receive their degree until they have fulfilled this obligation within a deadline to be set by the General Assembly of the School.
- 1.7. <u>Additional elective courses:</u> A student opting to take additional elective courses beyond those required shall be required to pay additional fees, to be determined by decision of the General Assembly of the School.

# 2. Student identity

- 2.1 Registration on an IHU postgraduate programme confers the identity of student on the candidate. This identity expires upon receiving one's degree or upon expulsion from the university.
- 2.2 Students may use IHU facilities and services in the pursuit of their educational work, according to the stipulations of respective Governing Board decisions.

# 3. Mentor scheme

Academic mentoring has been established by the University in order to provide students with advice on a range of academic matters, such as assessing the current level of knowledge provided and identifying any impediments to the learning process that may be present, with the overall objective of enhancing open, continuous and direct communication between students and the faculty.

# 4. Programme Duration

- 4.1 The programme will commence in October or November each year, the exact dates are announced by the Course Office.
- 4.2 The duration of studies in order to acquire a postgraduate degree is postgraduate degree is three (3) academic semesters full-time (comprising taught courses during the 1st and 2nd semesters, while the 3rd semester is dedicated to the Dissertation). On a part-time basis the duration of the MSc is doubled.
- 4.3 Examinations and assessed work will take place throughout the course.
- 4.4 The maximum period for completion of the study programme is five (5) semesters for full-time students and eight (8) semesters for part-time students. Extension of the above deadlines is generally not permitted. In certain exceptional cases, a short extension may be given, following approval by the General Assembly of the School.

### 5. Assessment

- 5.1 The programme is taught and assessed in English. Student assessment on each course is supervised by the course instructor(s).
- 5.2 Performance is assessed on a 1-10 scale.
- 5.3 To complete the programme successfully, students must pass all courses, achieving an average grade on each course and its assessment components (coursework and examination) of at least 5.00.
- 5.4 In special circumstances, such as when a student is unable to participate in the examinations or to submit a paper due to professional or health reasons, a special examination date may be set for the student or a new deadline for the submission of the respective coursework, following a decision by a competent committee appointed by the General Assembly of the School.
- 5.5 Coursework/exam results are published within 45 days from the date of submission/the examination.
- 5.6 A student is entitled to ask for feedback either for an exam or piece of coursework for a specific course within 15 days after the grade has been announced.

# 6. Assessment Regulations

The rules governing the calculation of course and overall degree marks are as follows:

- 6.1. To qualify for the Master of Science in Energy Law, Business, Regulation and Policy degree, a student must acquire a total of 90 credits.
- 6.2. All courses must be passed individually.
- 6.3. Credits and marks are awarded for all courses successfully completed and passed.
- 6.4. It is compulsory to complete all coursework and exam components and no course mark can be awarded until these are completed.
- 6.5. When courses are assessed by both coursework and exam, results are weighted 30% and 70% respectively to calculate the overall course mark. Course assessment weightings may vary but exams cannot be weighted less than 50% in any case. A minimum mark of 5.00 must be achieved on each component (exam and coursework).
- 6.6. Students will be required to retake any failed assessment component in the next assessment period.
- 6.7. A student failing at the second attempt will normally be asked to withdraw immediately from the programme, following the decision in this respect of the General Assembly.

- 6.8. Calculating the overall mark of a course in the case of a re-sit: in those cases where a student has passed a course component after a re-sit, the overall mark of the course will be calculated by combining the original grades awarded for other component(s) passed at the first attempt and the resit mark for the component passed at the re-sit, in line with relative credit values of courses, as set out in the table below.
- 6.9. A student is entitled to appeal against the grade received for an exam or piece of coursework for a specific course within 15 days after the grades have been announced. Students must provide full details of the grounds of their appeal in writing. Such appeals are assessed by an academic appointed by the Director of the Programme, within thirty (30) days of receipt of the appeal. As a result of an appeal, grades may stay the same, go up or down. In the case of group work, the decision to appeal should be taken unanimously by the students of the group.
- 6.10. A course mark is calculated by aggregating the marks for all assessment components.
- 6.11. To calculate the overall degree mark, course marks are combined using weightings in line with the relative credit values of courses, set out in the table below.

# Assessment matrix of courses, hours, credits and weightings

Course title	Taught Credits Hours		Asses weighting calculat ma	Course weights to calculate degree marks	
Core Courses			C/W	Exam	
Energy Law I	30	6	-	100%	6,66%
Energy Economics	30	6	•	100%	6,66%
Energy Transport & Storage	30	6	-	100%	6,66%
Foundations of Finance in the Energy Sector	30	6	•	100%	6,66%
Alternative Dispute Resolution in the Energy Sector	30	6	-	100%	6,66%
Energy Law II	30	6	30%	70%	6,66%
Energy and Environmental Policy	30	6	30%	70%	6,66%
Energy Politics & Security	30	6	-	100%	6,66%
Cross-border Energy Trade	30	6	-	100%	6,66%
Core Total		54			
Elective Courses					
Elective 1	16	3	-	100%	3,33%
Elective 2	16	3	-	100%	3,33%
Electives Total		6			
Dissertation					
Dissertation thesis		30			33,33%
Total					100%
Degree Total		90			

<sup>\*</sup>Coursework may consist of a short exam, an invigilated test, a group or individual assignment.

# 7. Re-examination of Failed Courses

- 7.1 Students who fail a course will be required to retake any assessment component for which their mark falls below 5.00.
- 7.2 Resit provisions will apply to all failed courses under the following provisions:
  - The resit method and date shall be prescribed by the Course Office in accordance with the course regulations. The content of the re-assessed component will be decided by the Course instructor(s);
  - A course may be re-sat only once.
- 7.3 A student who successfully completes a re-sit shall be awarded the credits for the course. The grade awarded for other components will be the original grade. The course grade will be calculated using the weightings detailed in the matrix on the previous page. This grade will be used in calculating the overall degree grade.
- 7.4 A student who does not pass his or her re-sit by the date specified shall not progress on the Programme and the Programme Director shall make a recommendation to the General Assembly of the School that the student withdraw.

### 8. Coursework Submission

- 8.1 Coursework must be submitted via online submission to the E-learning platform at <a href="https://elearn-ucips.ihu.gr/">https://elearn-ucips.ihu.gr/</a> (this constitutes your receipt of submission).
- 8.2 The deadline for all coursework is 17:00 (5pm) on the submission date, unless otherwise indicated by the School. Students are required to retain a copy of all coursework submitted.
- 8.3 Online coursework submission allows the course officer to check the timeliness of submissions.
- 8.4 Late submission of coursework is unacceptable other than in the most extreme circumstances. In such circumstances, a student must submit a written request for an extension in advance of the deadline to, and gain permission from, the relevant course office, NOT the lecturer. The student will need to produce supporting evidence as to why he/she is unable to meet the deadline. If permission is granted, a new submission date will be given without penalties to the grade. If students submit their coursework late without permission, a system of penalties will apply, as follows: Work submitted late without permission is immediately penalised by 7% for late submission plus 1% daily, including weekends. The maximum period for late submission is 2 weeks. Work submitted later than two weeks after the proper date shall not be accepted and shall therefore be graded with a mark of 0.00.
- 8.5 The mark presented to the Assessment Board will be the final one after deductions have been implemented.

# 9. Class Attendance and Timely Arrivals

- 9.1 Students are expected to attend all lectures and all other scheduled activities.
- 9.2 Students are obliged to have the cameras on during lectures via Zoom. Professors are responsible for keeping track of students' presence/absence. Students who have the cameras off during lectures via Zoom will be considered as absent.
- 9.3 In the case of unavoidable absences, **from 20% to 50%** of the total taught hours of the course, written proof of medical or other serious personal or professional reason **justifying the**

absence must be submitted.

- 9.4 In case of **unjustified absence** (without written proof) for **more than 20**% of the total taught hours of a taught course a **grade penalty** will incur, namely the course grade will be capped at the minimum pass mark (5.00).
- 9.5 Please note that extensive absence from a taught course, i.e., over 50% of the total taught hours of the course, albeit justified, will incur a grade penalty, namely, the grade of the course will be capped at the minimum pass mark (5.00). If a student is absent for the 100% of the total taught hours of the course, this course must be taken if available the following year. If a student does not attend two courses or in case of extensive absenteeism, the General Assembly of the School is responsible for deciding whether this may lead to a suspension of studies or withdrawal from the programme.
- 9.6 Late arrival to a lecture or class is unacceptable and the lecturer has the right to refuse admission. In any case, every effort should be made to ensure that entrance does not interrupt the lecturer or distract the class.
- 9.7 Lectures normally include breaks. Lectures are carefully prepared and timed and any delay in restarting may cause it to over-run. The lecturer has the right to refuse readmission to anyone returning late.

### 10. Good Conduct

- 10.1 Students must use university facilities and equipment properly and with due care, to prevent damage or malfunction, and otherwise shall bear the responsibility for replacing damaged items.
- 10.2 Students shall behave with respect towards the teaching staff and administrative personnel of the University, as well as towards their fellow students, and shall not cause problems with disorderly behaviour.
- 10.3 Mobile phones should be turned off during lectures. Phones ringing during a lecture are not only intrusive but also extremely offensive.
- 10.4 Students wishing to make audio-recordings during course tuition must obtain the lecturer's written permission.

# 11. Students' Complaints Procedure

- 11.1.1 Students who wish to make a complaint concerning the quality of an academic programme, any related service or member of the academic or administrative staff should first do so at the local level, by raising the issue with the individual, department or service provider directly involved. Issues of concern may often be resolved more quickly and effectively at this stage.
- 11.1.2 If a student decides to make a complaint, this will be taken seriously and confidentiality will be respected. Investigations will be carried out thoroughly and the issue determined fairly by someone who is not directly involved in the complaint. It should be noted, however, that complaint resolution may not be possible without revealing the identity of the complainant to the subject of the complaint and anonymous complaints will not be investigated. Allegations which are found to be unsubstantiated or malicious will be dismissed.

# 12. Appeal Committee

12.1 Students are entitled to submit an appeal to an Appeal Committee, appointed by the Governing Board, with respect to any decision concerning their status at the University. A student submitting an appeal is invited to exercise his/her right to be heard, according to Article 6 of the Greek Administrative Procedure Code.

12.2 The Appeal Committee examines any appeals against decisions of the Governing Board and/or the General Assembly of the School according to Article 24 of the Greek Administrative Code of Procedure.

# 13. Postponement of studies

Postgraduate students may postpone their studies for a period no longer than one academic year or two successive academic semesters, following a respective application submitted to the General Assembly of the School - and approval thereof - for reasons related to the student's family and personal circumstances, which must be documented accordingly.

# 14. Bibliographies and References Format

Bibliographies and references are to be arranged in a single list at the end of the area of work and presented in alphabetical order according to the surname of the first author. In the case of identical family names, alphabetise next by the forename or first initial of the author. In the case of two or more references by the same author, the name is given for the first entry, and an eight-space line (the underscore key struck eight times) takes its place in subsequent entries. The entries are then arranged chronologically with most recent submissions first. Please note that you are solely responsible for ensuring accuracy and format consistency in the bibliography and references section of any papers you write.

Some examples:

### **Book Citation:**

Dunning, J. H. (1993) *Multinational Enterprises and the Global Economy*. Addison-Wesley, Reading, United Kingdom.

Caves, R. E. (1982) Multinational Enterprise and Economic Analysis. Cambridge University Press, New York, NY, USA.

<u>Tip</u>: Don't forget to give the name of the publisher in full, along with their location (city, state [for USA you show the abbreviation of the state], and country).

### **Edited Book Citation:**

Kindleberger, C. P. (ed.) (1970) The International Corporation. MIT Press, Cambridge, MA, USA.

Szegedi, Z., Marer, P., and Waisvisz, P. (eds.) (1999) Vállalati Esettanulmányok, 2. Kötet. AULA Publishing Co., Budapest, Hungary

### Chapter in a Book Citation:

Aliber, R. Z. (1970) A Theory of Foreign Direct Investment. In *The International Corporation*, Kindleberger, C. P. (editor), MIT Press, Cambridge, MA, USA.

### Journal Article Citation:

Anderson, E. and Gatignon, H. (1986) Modes of Foreign Entry: A Transaction Cost Analysis and Propositions. *Journal of International Business Studies*, Fall, pp. 1-26.

<u>Tip</u>: Don't forget to include the page numbers on which the article appears. Also, remember that you italicize the title of the journal but not the title of the article.

# **Working Paper Citation:**

Bellas, C. J., Bochniarz, Z., Jermakowicz, W. W., Meller, M., and Toft, D. (1994) *Foreign Privatization in Poland*. Center for Social & Economic Research (CASE), Warsaw, Poland, Working Paper, October.

Rojec, M., Jermakowicz, W. W., Illes, M., and Zemplinerova, A. (1995) *Foreign Acquisition Strategies in the Central European Privatization Process.* Center for International Cooperation and Development (CICD), Ljubljana, Slovenia, Working Paper.

<u>Tip</u>: Don't forget to include the name of the institution / organization and list the city and country where it is based (located) as noted in the publication.

### Two or More Authors Citation:

Anderson, E., and Gatignon, H. (1986) Modes of Foreign Entry: A Transaction Cost Analysis and Propositions. *Journal of International Business Studies*, Fall, pp. 1-26.

Rojec, M., Jermakowicz, W. W., Illes, M., and Zemplinerova, A. (1995) Foreign Acquisition Strategies in the Central European Privatization Process. Center for International Cooperation and Development (CICD), Ljubljana, Slovenia, Working Paper.

### Works by the Same Author Citation (that appear after one another):

Vernon, R. (1983) Organizing and Institutional Responses to International Risk. In Herring, R. (ed.), *Managing International Risk*, Cambridge University Press, New York, NY, USA, pp. 191-216.

\_\_\_\_\_(1966) International Investment and International Trade in the Product Cycle. *Quarterly Journal of Economics*, No 80, pp. 190-207.

### Works by the Same Author & Same Year Citation (that appear after one another):

Guyon, J. (1996a) Lindahl to Succeed Barnevik as Chief Executive of ABB. The Wall Street Journal Europe (WSJE), 11-12 October.

Guyon, J. (1996b) At ABB, Globalization Isn't Just a Buzzword: It's a Corporate Culture. The Wall Street Journal Europe (WSJE), 1 October.

<u>Tip</u>: Remember that you place the letter after the year in respect of the order in which these appear in your text. Hence, 'a' comes before 'b' and so forth.

# Newspaper / Magazine Article Citation:

Rapoport, C. (1992) How Barnevik Makes ABB Work. Fortune, 29 June, pp. 24-27.

Roth, T. (1995) Europe's Labors: Integrating the East, Reinventing the West Are One and the Same. The Wall Street Journal Europe (WSJE), 30 June/1 July.

EIU (1999) Business Eastern Europe, Economist Intelligence Unit (EIU), 22 February.

<u>Tip</u>: Almost all newspaper/magazine articles have an author, so make sure that you properly site him/her. Also, the title of the article is not italicised while the source publication is italicised.

### Internet Citation:

Czech Invest (1998) http://www.czechinvest.org/.

Renault (2001) http://www.renault.com.

<u>Tip</u>: You only need to show the primary source (main site) of any Internet site and the year in which you accessed the web site.

# Company Annual Report Citation:

Renault (1999) 1998 Renault Financial Report. Boulogne-Billancourt Cedex, France.

Generali Budapest Biztosító Rt. (1993-97) *Company Annual Reports 1992-96* (Hungarian/German language editions). Budapest, Hungary.

<u>Tip</u>: For Annual Reports the year of publication is almost always the year after the reported year. For example, a 1998 Financial Report is published in 1999.

### Example of a Bibliography (listed in alphabetical and chronological order):

Bibliography:

Aliber, R. Z. (1970) A Theory of Foreign Direct Investment. In *The International Corporation*, Kindleberger, C. P. (editor), MIT Press, Cambridge, MA, USA.

Anderson, E. and Gatignon, H. (1986) Modes of Foreign Entry: A Transaction Cost Analysis and Propositions. *Journal of International Business Studies*, Fall, pp. 1-26.

Bellas, C. J., Bochniarz, Z., Jermakowicz, W. W., Meller, M., and Toft, D. (1994) *Foreign Privatization in Poland*. Center for Social & Economic Research (CASE), Warsaw, Poland, Working Paper, October.

Caves, R. E. (1982) Multinational Enterprise and Economic Analysis. Cambridge University Press, New York, NY, USA.

Czech Invest (1998) http://www.czechinvest.org/.

Dunning, J. H. (1993) *Multinational Enterprises and the Global Economy*. Addison-Wesley, Reading, United Kingdom.

EIU (1999) Business Eastern Europe, Economist Intelligence Unit (EIU), 22 February.

Kindleberger, C. P. (ed.)(1970) The International Corporation. MIT Press, Cambridge, MA, USA.

Rapoport, C. (1992) How Barnevik Makes ABB Work. Fortune, 29 June, pp. 24-27.

Renault (1999) 1998 Renault Financial Report. Boulogne-Billancourt Cedex, France.

Roth, T. (1995) Europe's Labors: Integrating the East, Reinventing the West Are One and the Same. The Wall Street Journal Europe (WSJE), 30 June/1 July.

Vernon, R. (1983) Organizing and Institutional Responses to International Risk. In Herring, R. (ed.), *Managing International Risk*, Cambridge University Press, New York, NY, USA, pp. 191-216.

(1966) International Investment and International Trade in the Product Cycle. *Quarterly Journal of Economics*, No 80, pp. 190-207.

**Tip:** Pay attention to detail and get your sources (facts) right!!!

# 15. Plagiarism - Fraudulent Coursework - Malpractice

- 15.1 Plagiarism is the passing off of the ideas or words of someone else as though they were your own. It applies equally to the work of other students as to published sources. In addition, auto-plagiarism takes place when a student presents any prior writing of his or her own work, from another course or school, as entirely fresh work for course credit. This is also considered plagiarism.
- 15.2 Fraudulent or fabricated coursework is defined as work such as reports of laboratory or practical work that are untrue and/or fabricated, submitted to satisfy the requirements of a University Assessment in whole or in part.
- 15.3 Malpractice in University Assessments occurs when a candidate attempts to mislead or deceive the examiners concerning the work submitted for assessment. This includes colluding with others (including other students) in the preparation, editing or submission of work.

### 15.4 PENALTIES

The University takes a serious view of plagiarism, fraudulent, fabrication and malpractice and will act to ensure that students found breaching its guidelines are dealt with severely. This action may lead to expulsion from the University. All work is marked on the assumption that it is the work of the student: the words, diagrammes, computer programmes, ideas and arguments should be their

own. However, much coursework will be based on what students have read and heard and it is important that you show where, and how, your work is indebted to those other sources.

# Range of Penalties:

When determining the penalty for a plagiarized, fraudulent, fabricated piece of work or other malpractice the following points should be taken into consideration that affects the severity of the penalty imposed:

- Severity of the offence (percentage of plagiarised work)
- The student's explanation and response to the allegation
- Maintenance of the principles of equal treatment and proportionality

### 15.5 Range of Penalties at School Level:

The penalties which can be imposed at School level, by the General Assembly of the School regard components of up to 50% of the course evaluation. The penalties range from a rewriting of a coursework to a capped mark for the whole course. In all cases a reprimand letter will be sent to the student from the School.

- i) Re-writing of coursework by removal/correction of plagiarised parts: Work that is identified as plagiarised in part must be expunged and re-written before the mark for the assessment and for the course can be released. There will be a minimum 10% reduction in the mark of the rewritten component. The mark will be aggregated with the marks for the remaining components of the course. Normal resit opportunities will be retained.
- ii) Submit a new piece of work: On the same/similar topic or a different one (based on instructors' advice) the student will be required to submit a completely new assignment for the particular piece of coursework. There will be a minimum 10% reduction in the mark of the rewritten component. The mark will be aggregated with the marks for the remaining components of the course. Normal resit opportunities will be retained in the case of a failed mark.
- ii) Submit a new piece of work component mark capped: On the same/similar topic or a different one (based on instructors' advice) the student will be required to submit a completelynew assignment for the particular piece of coursework. The mark will be capped at 5 and will be aggregated with the marks for the remaining components of the course. Normal resit opportunities will be retained in the case of a failed mark.
- iii) Submit a new piece of work course mark capped: On the same/similar topic or a different one (based on instructors' advice) the student will be required to submit a completely new assignment for the particular piece of coursework. The mark is capped at 5 for the whole course and not only for the specific course component. Normal resit opportunities will be retained in the case of a failed mark for all course components.

### 15.6 Range of Penalties at Governing Board Level:

The penalties of course repetition and permanent exclusion from studies can only be appliedby the Governing Board. Such penalties may be proposed by the General Assembly of the School to the Governing Board which is competent to take the final decision on the matter. Such penalties are recommended in cases of high severity of the offence (*i.e.*, very high percentage of plagiarised work in dissertation thesis). The Governing Board has the discretion to also impose any of the aforementioned penalties, taking into account the severity of the offence.

i) Course mark capped - Repeat the course: The student will be required to repeat the respective course in which plagiarism has occurred in its entirety by attending the whole course again when this is next available. The mark for all course components is capped at the pass mark. The marks for other courses are retained. If the plagiarised offence occurred on courses such as the dissertation thesis, consulting project or similar, the student will need to wait for up to a year until a new allocation of projects and dissertations are in place.

[ii]Permanent exclusion from the University with no award: The student will be requested to withdraw from his/her studies and no award will be made.

### 16. Academic Misconduct

- 16.1 The University takes very seriously any form of cheating in examinations or other formsof assessment, including plagiarism (see above), impersonation, collusion and disruption.
- 16.2 Cases of suspected academic misconduct will be reported to the course office and academic staff and, where misconduct is established, a range of penalties may be recommended to the General Assembly, which will decide on the penalty to impose. Its decision will reflect the severity of the offence and intent and may also result, in extreme circumstances, in expulsion from the University.

# 17. Examination Regulations

- 17.1 Students must bring an ID document with them to all examinations. Admission to an examination without the ID document is prohibited.
- 17.2 Students must ensure that they arrive early enough to find the room in which they are sitting the examination. If they arrive up to half an hour late for their examination, they will normally be permitted to sit their exam. No extra time will be given and students must finish together with all others taking the same paper. Only in the case of exceptional circumstances delaying their attendance and beyond their control will the full allotted time be allowed for the paper.
- 17.3 Students will normally be permitted to enter the examination room approximately 10-15 minutes before the start of the examination and only after permission has been given by the invigilator.
- 17.4 Students are not permitted to take any coat or bag or personal belongings (other than those needed for an examination) to the examination desk. Before entering the room, an invigilator will announce where belongings should be placed. Possession of a mobile phone, walkman, pager, personal organiser or any electronic device (other than those specifically allowed for an examination) is strictly prohibited whilst sitting an examination. Mobile phones must be switched off and placed in the student's coat/bag. Failure to do so may result in disciplinary action. Belongings should be kept to a minimum. Possessions are left at students' own risk.
- 17.5 Upon entering the examination room, talking is strictly prohibited. During the examination, students must fully comply with the invigilator's instructions and requests. Failure to comply may result in expulsion from the exams and corresponding penalties imposed by the School General Assembly.
- 17.6 Once students have found their desk they must await the invigilator's instruction. They will be asked to fill in their details on the front of the answer booklets. At this time they must place their ID document, face up, on their desk in order for an invigilator to confirm their dentity. The invigilator will give permission to start reading the question paper. It is in students' own interest to read the instructions on the question paper carefully.
- 17.7 Students are required to supply their own pens, pencils, etc., at each examination. Where permission is given, students must supply their own hard-copy dictionary and calculator. Electronic dictionaries are not permitted. Students must comply with all instructions given by an invigilator before, during and after the examination.
- 17.8 If a student has a query, he/she should raise a hand and an invigilator will approach them. Students must not vacate the desk for the duration of the examination without the express

- permission of an invigilator. Failure to comply is an examination offence and may result in the examination script not being marked.
- 17.9 Students are not permitted to leave the examination room during the first half hour or the last 15 minutes of the examination. If they wish to leave the room at any other time during the exam, they should raise their hand and an invigilator will respond to their request. When allowed to leave, students should leave the room as quickly and quietly as possible with due consideration to their fellow students who may still be working. If students are given permission to temporarily leave the room, they will be accompanied by an invigilator. During this time they will not attempt to contact any other person or consult any material relating to the examination.
- 17.10 When the invigilator announces the end of the examination, all students must stop writing. The front of each answer booklet must be fully completed and the flap must be sealed securely. Students must not leave their desk until the script has been collected by an invigilator. A copy of the exam paper may only be taken if permission has been given to do so.
- 17.11 All examinations may be conducted remotely through Zoom. Students are required to ensure they have a stable internet connection, a functioning camera and microphone, and an appropriate environment that complies with the examination rules. The institution reserves the right to verify identity, supervise the examination process, and implement any additional measures necessary to uphold academic integrity.

# 18. Extenuating circumstances

- 18.1 Students unable to attend an examination or to submit a piece of coursework at a set time due to illness, bereavement, business travel abroad or any other personal circumstance must submit documentary evidence testifying the reason for their absence. Students need to fill in a special Extenuating Circumstances Form (available on the E-learning platform at <a href="https://elearn-ucips.ihu.gr/">https://elearn-ucips.ihu.gr/</a>) and submit it to the course office within 10 days after the examination/coursework submission deadline. This will be considered by a competent committee appointed by the General Assembly of the School, which will decide whether to accept the reason and allow the student to take the examination as a first attempt or allow the student to submit the coursework he did not submit on a new deadline (or allowable resit) or reject it and count the absence as a failure. In exceptional circumstances, and following approval by the General Assembly of the School, a special examination date may be set for the student ora new deadline given for submission of the paper.
- 18.2 Special Examination Arrangements Students with a physical or learning disability are given extra examination time or sit their examinations at an alternative venue along with any special provisions available. In order for students to apply for such special arrangements, they must provide the Course Office with current certification (from a responsible official state institution) detailing their condition well ahead of the exam period. The Course Office will decide on the special examination provisions to be made.

# 19. Dissertation Supervision and Submission

19.1 The Master's Dissertation is supervised by an academic member of staff. Students are encouraged to have regular meetings with their supervisor. Supervisors assist students in their research work by acting as consultants and counsellors in matters of research process and practice: students are expected to become the experts in the topic they selected for research and take responsibility for their work.

(	than 3 points (on a so evaluation is called for mark given by the four	. The final grade a	warded on the D	issertation will b	e the average of tl	tn he

- 19.3 To qualify for a Master's degree, a student must achieve a minimum grade of 5.00 in the Dissertation.
- 19.4 The Dissertation must be submitted in the approved format. The Dissertation is due to be submitted by 31 January 2026 (for full time students) and by 31 January 2027 (for part time students). Extension beyond this deadline will only be given in special circumstances with the agreement of the student's supervisor. The extension must be agreed in writing between the student's supervisor and the student, informing also by email the School's course office (co-seba@ihu.edu.gr). Any application for extension must be made three weeks before the due date of submission. The maximum period of the extension that will be granted to the student is two (2) months from the date of the submission of the Dissertation.
- 19.5 If the extension granted is set after February 28 of the year (or after February 29 for leap years), the student will graduate the next calendar year. In this case the student must be aware that his/her graduation will take place during the next calendar year. as graduations take place once per year usually during the spring.
- 19.6 Students' extenuating circumstances (such as illnesses, pregnancy, suspension/postponement of studies) that exceed the limit of February 28 (or February 29 for leap years), will be examined by the School assembly on a case-by-case basis and in any case cannot exceed 15 March..
- 19.7 If the Dissertation is submitted late without permission, it will be immediately penalised by 7% for late submission plus 1% daily, including weekends. The maximum period for late submission is 2 weeks. Any dissertation submitted later than two weeks after the proper date shall not be accepted and shall therefore be graded with a mark of 0.00.
- 19.8 The submission requirements for dissertations are:
  - Dissertations must be submitted via online submission to the E-learning platform at <a href="https://elearn-ucips.ihu.gr">https://elearn-ucips.ihu.gr</a> (this constitutes receipt of submission). The deadline is 17:00 (5pm) on the submission date.
- 19.9The International Hellenic University has adopted an **Open Access Policy** from 10/02/2015 (<a href="https://repository.ihu.edu.gr/xmlui/page/openaccess-policy-en">https://repository.ihu.edu.gr/xmlui/page/openaccess-policy-en</a>). In brief, Open Access (OA) literature is digital, online, free of charge, and free of most copyright and licensing restrictions.

Along with this policy, the IHU Library proceeded with the creation of an Institutional Repository (<a href="https://repository.ihu.edu.gr/xmlui/">https://repository.ihu.edu.gr/xmlui/</a> the online archive), where all scholarly material can be submitted, kept and managed.

Part of the collection consists of the Master's dissertations and PhD theses. Students are strongly encouraged to submit their dissertations and theses to the repository making them accessible to the wider academic community.

As the pdf file is the final version, content alterations are not possible.

This process is part of the dissertation/thesis submission workflow and is intended to ensure the content accuracy and quality of the dissertation/thesis submitted.

Students are strongly advised to carefully read the terms of submission before submitting their work https://repository.ihu.edu.gr/xmlui/page/terms-en.

# 20. Re-examination of Failed Dissertation

- 20.1 Students who fail the Dissertation Project will be required to re-submit their Dissertation on the same or a similar topic. Students are allowed to re-submit their Dissertation only once, assuming a valid submission was made in the first instance.
- 20.2 The deadline for re-submission is 6 weeks after the publication of the mark of the first submission.

# 21. Assessment Boards

21.1 The Assessment Board is responsible for considering and agreeing all assessment results and making decisions about whether students have met all the requirements of the programme. Any results given to students during the year are provisional prior to ratification by the Assessment Board. Any extenuating circumstances submitted by

- students, such as ill-health, are considered by a Panel, the recommendations from which are presented to the Assessment Board.
- 21.2 Assessment Boards are held three times over the academic year following each assessment period. Examination papers are marked initially by subject lecturers. All marks, coursework and examinations are reported to and verified by the Assessment Board. Examination results are made available to students no later than 12 working days after an Assessment Board meeting.

# 22. Degree Classification

22.1 The award of the degree shall be calculated on the basis of the overall aggregate of the course marks weighted according to their credit value. The classification shall be determined as follows:

Distinction will be awarded if:

The weighted average mark across all courses and the dissertation is 8.50 or above.

Merit will be awarded if:

The weighted average mark across all courses and the dissertation is between 6.50 - 8.49 inclusive.

Pass will be awarded if:

The weighted average mark across all courses and the dissertation is between 5.00 - 6.49 inclusive

Fail. A student fails to meet the requirements for the award of a degree if:

The average mark of any course or the dissertation is below 5.00 after one re-sit examination or assessment.

### Certificates of Excellence:

Graduates who acquire a mark of 8,5 and above for their Degree will receive a Certificate of Excellence. In case all graduates acquire Degree marks of less than 8,5, during an academic year the graduate who acquires the highest mark in class will receive a Certificate of Excellence.

# PART III: UNIVERSITY FACILITIES

# IHU Library & Information Centre

# Mission statement

The Library mission is to provide high quality services to all members of the IHU academic community (students, researchers, teaching staff, administration staff, etc.) and to support user access to specialised knowledge in their scientific fields. The Library collection consists of books, journals, reference material, subscriptions to online databases and electronic journals, both relating to the modules taught on the EMBA & Masters Courses and to the wider research and information needs of the Academic Community.

# Library collection

The Library cares for the enrichment and administration of its collection and other resources, in order to meet the educational, research and/or other cultural needs of the university community. The Library is also responsible for the administration of these collections according to its regulations of operation, including the process of selecting, ordering and acquiring material. The selection of the appropriate printed materials as well as other resources is assisted by the members of the academic community of the University.

Members of staff are responsible for ordering and taking receipt of the material. This process includes checking proper receipt of copies ordered and the invoice prices. The incorporation of the material into the collection is completed with the inventory and registration in the automated catalogue. The work is performed by librarians specialised in the digitised cataloguing of materials.

The following international standards are implemented in the processing of Library materials:

- For cataloguing: the Anglo-American Cataloguing Rules (AACR)
- For electronic cataloguing: the rules of Machine Readable Cataloguing (MARC21)
- · For classification: the Dewey Decimal Classification system
- For subject terms: the Library of Congress Subject Headings (LCSH)

The Library Collection comprises a wide range in terms of subject, of book titles and print journals relating to the courses offered at the University. Databases and electronic materials are also available to the user community, ensuring that their educational and research needs are covered.

# **Collection Management**

The books are located in the main Library area, classified according to the Dewey Decimal Classification System. Subject signs are displayed on the shelves to assist users in their search.

All books are available for loan according to the loan regulations, with the exception of reference material (dictionaries, encyclopaedias, art books and student theses), which are placed on distinct bookshelves.

The journals are clearly visible in alphabetical order on special display shelving. The journals are available only for use in the Library area and are not for loan.

Electronic databases and all other electronic materials are available on site in the Library. The databases can be accessed only by the internal users of the Library using passwords and personal codes.

The print material is catalogued on the automated Library system SIERRA using the MARC21 format, the Anglo-American Cataloguing Rules and the Library of Congress Subject Headings.

All print material is searchable through the Library online catalogue (http://opac.seab.gr/\*eng).

### **Donations**

All donations are welcome. Acceptance is on the basis of assessment and valuation. The criteria taken into account in the assessment are:

- The importance and/or rarity of the material contained in the donation (or other special reason)
- The donated material's relevance to the development objectives of the Library
- · The fitness of the gift
- · Respective gaps in the Library collection
- Any need to supplement the number of copies available within the collection due to frequent use.

### **Users**

Access to the Library and reading rooms is open to all the members of the academic community and, upon respective authorisation, to members of the public.

"Library User" is taken to mean anyone entering the Library and reading rooms for the purpose of using their materials and resources for educational and research purposes. In the case of high attendance, priority is given to the Members of the Library.

Members of the Library and reading rooms are members of the university community, including: a) students, b) graduate students, c) lecturers, d) invited lecturers, e) academic staff, f) administrative staff and g) invited researchers.

Other external users are permitted to visit the Library and use (study) the print material only within the area of the Library. External users are not allowed to borrow material or use the databases and electronic material.

Personal data of members is confidential. Only Library employees acting in their capacity as such and the administrator of the database of the automated Library system shall have access to this data, which shall not be disclosed to any third party.

An information and assistance service operates in the Library area.

# **User obligations**

Users are required to abide by the regulations, comply with the recommendations of staff and respect other users of the areas of the Library and reading rooms.

Users must use with respect all books, documents and any other material they use inside or outside the Library space. They must not write on or damage materials belonging to the Library.

Users are fully responsible and accountable for the loss or destruction, in whole or in part, of any document or equipment, or for damage or wear of materials beyond that resulting from their normal use; users are required to compensate the value of any such loss, damage or wear. The amount of compensation is determined by decision of the competent services of the Library subject to the approval of the relevant supervisory authority.

Smoking and the consumption of food or drink is prohibited on the premises of the Library and reading rooms. The use of mobile phones and any other device the use of which, at the discretion of staff, involves annoyance to other users is also prohibited.

Members of staff have the right, at their own discretion, to prohibit objects which can cause damage to the material or which may give cause for suspicion of intended theft.

Animals (other than guide dogs) are not allowed into the Library.

Users must not put the books or journals they have used back on the shelves, but should leave them on the desk designated for this purpose.

# **Borrowing**

### Terms of loans and renewals

All Library members have the right to borrow material.

The conditions under which a user may borrow material depends on the user category:

EMBA Students up to 5 books for 35 days

Full-time and part-time Masters up to 5 books for 5 or 15 days

Students

Academic Staff up to 5 books for 5, 15 or 35

days

Administration Staff up to 3 books for 5 or 15 days

Alumni up to 2 books for 5 or 15 days

The following signs on the book spine indicate:

O = 5 days loan

0 = not for loan

0 = reference material, not for loan

The material is inspected when borrowed and returned. In the case of damage or unjustified wear, a fine will be charged accordingly by the Library.

The loan period may be extended by users by contacting the Library staff.

Users can apply to reserve a book already out on loan. With the return of the book the interested user is notified by telephone or by email. The user who has the material on loan is required to return it within the time limits set by the automated Library programme and may not extend that period.

# Electronic information services

The electronic resources are available locally on the University campus (Library area, PC Labs) or remotely via VPN instalment and the use of codes and passwords.

The Library staff can change the codes and passwords during the academic year in order to ensure the security of the codes. Users are always informed of such changes.

All users are obliged to sign the copyright agreement confirming that they will use databases for their own private purposes and that the codes and passwords will not be disclosed to any third party. In addition, users must affirm that the data they collect will be used only for academic purposes.

The Library website (<a href="http://www.lib.ihu.edu.gr/">http://www.lib.ihu.edu.gr/</a>) provides information on all the services offered by the Library, such as electronic resources and a brief analysis of the same, bibliographic databases, electronic journals.

Information about how to contact staff, hours of operation and a form by which to submit quick questions (Ask a librarian) are also available.

The IHU Library provides users with an interlibrary loan service allowing them to access material in other libraries, as defined by the decision of the supervisory authority. The material becomes subject to Interlibrary Loan provisions of this Regulation and to any other regulations imposed by the lending Library. The due date and overdue fees of the material borrowed are set by the lending Library.

# Photocopying and digital reproduction

All Library users shall use the Library photocopy machine to cover only their needs as arising in the context of their studies.

If any item is not in good condition or there is a danger of suffering damage, it shall not be photocopied.

Users are obliged to respect the legislation on the protection of intellectual property and copyright (up to 10% of the total number of pages of a single authored book is allowed).

Users are obliged to respect and comply with any license terms that the University has signed with third parties regarding the reproduction by any means of books (photocopying, photographing, electronic reproduction), the use of software and databases, and access conditions and use of such data.

# User training

The acquisition of new sources, methods of information retrieval and the use of services provided require the proper training of Library Members so as to be in a position to fully benefit from Library resources and services. The Library operates and education service which is responsible for the organisation of appropriate training seminars.

# Library working hours

The IHU Library & Information Centre is open throughout the year except during University holidays.

Opening hours: Consult the library's website:

http://www.lib.ihu.edu.gr/index.php/the-library/working-hours

# **Library Contact Details**

T+30 2310 807560

library@ihu.edu.gr

### **ICT Services**

Computer laboratories are available for student use and for teaching purposes on the University campus. The facilities provided are primarily PC-based computing and internetworking, reflecting the mix of Information & Communication technologies (ICT) available in the business community. The main PC labs have PCs with Windows 10, connected to the University campus area network and to the Internet, which gives users access

to electronic mail, conferencing facilities, and library, academic and business information worldwide. There is also wireless (WiFi) access to the University network covering the entire campus, as well as universal access to/from other Universities through the global EduRoam network. An extensive range of software includes a variety of generic PC software such as word processing, spreadsheet and business graphics, as well as more specialized software such as statistical packages, software development frameworks, simulation packages, CAD software and business management software. The facilities, together with the Computer Support Service, are designed to provide full IT support for students, backed up with all the help and advice they may require.

### **Careers Office**

The Careers Office is one of the most active, dynamic and forward looking departments of the International Hellenic University. Its role is to actively engage students in exploring and pursuing their career aspirations by providing a wide range of career - related services.

# Mission of the Careers Office

The Careers Office is committed to providing professional guidance, resources and access to employment opportunities to a diverse body of students and alumni. The office has adopted a student-centred philosophy according to which each student receives individual support for every career concern.

# Webpages

- ➤ Visit the Careers Office website at <a href="https://ecs.ihu.edu.gr/">https://ecs.ihu.edu.gr/</a> and find out more about the services offered.
- ➤ Visit the Business Gateway portal at <a href="www.ihu.edu.gr/gateway">www.ihu.edu.gr/gateway</a> and have access to employment and internship opportunities from the global job market.

### Contact us

We welcome your questions regarding your career planning and your career opportunities. An IHU Careers Officer will respond to your inquiry as soon as possible. Please direct your inquiries to <a href="mailto:careers@ihu.edu.gr">careers@ihu.edu.gr</a> or give us a call.

Tel: +30 2310 807 507

Where to find us: The Careers Office is located in Building A, Ground floor.

### Alumni Network

As an alumnus of IHU, you are invited to be a part of an active network that helps you to stay in touch with each other and feel part of the School after your graduation. The network is designed to facilitate your connections and to enhance global communication for both social and business opportunities.

Staying in contact with the IHU has a number of benefits, including:

- Individual career advising
- Lifelong support on career issues
- National and International networking opportunities
- Continued learning and career advising
- Access to online services
- Access to library resources

 Participation in various events including career fairs, reunions, social gatherings, symposiums and conferences

You become a member of the Alumni Network automatically upon graduation and membership is free of charge. Upon your graduation, you are eligible to become a member of "International Hellenic University Alumni" group at LinkedIn.

Alumni who decide to follow a second postgraduate programme of study at the IHU after the successful completion of their first programme at the IHU are granted a 20% fee discount.

We envisage that many alumni will maintain close links with the School and will be welcomed back to act as advisors or mentors, to work with us on recruitment both in Greece and abroad, providing invaluable help at University Fairs, and offering current students job briefings, mock interviews and advice on business research projects.

# **Contact Information**

# **Address**

School of Humanities, Social Sciences and Economics

14th km Thessaloniki - N. Moudania

57001 Thermi

Greece

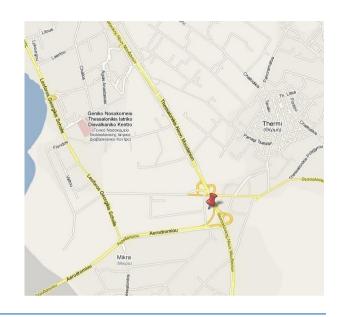
Homepage <u>www.ihu.gr/ucips</u>

e-mail <u>co-seba@ihu.edu.gr</u>

Telephone +30 2310 807523, 530, 521

# School Staff Directory (Legal)

Name



e-mail

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**Position** 

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