COURSE DESCRIPTION CARD - SYLLABUS

Course name
KNOWLEDGE TRANSFER AND COMMERCIALIZATION OF RESEARCH RESULTS

Course

Proposed by Discipline
-

Year/Semester
I/2

Type of studies
Doctoral School

Course offered in
English

Form of study
full-time

Requirements
compulsory

Number of hours

Lecture
4

Tutorials

Projects/seminars

Number of credit points

1

Lecturers

Responsible for the course/lecturer:
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Responsible for the course/lecturer:

Prerequisites

Knowledge: lean canvas and business model canvas methodology, ways of intellectual property rights protection,

Skills: pointing potential areas of exploitation for research results.

Social competences: cooperation with members of other research teams or companies.

Course objective

Learning basic rules and good practices in transfer of knowledge to the economic and social spheres. Gaining skills in commercialization of research results and know-how related to these results. Training in thinking and acting in the business-like way.

Course-related learning outcomes

Knowledge

A PhD student who graduated from doctoral school knows and understands:

1. principles of publication of research work results, including regulations of the open access mode, [P8S_WG/SzD_W04]
2. economic, legal, ethical and other important conditions of research work, [P8S_WK/SzD_W06]
3. fundamental rules and regulations concerning the transfer of knowledge to the economic and social spheres, commercialization of research results and know-how related to these results. [P8S_WK/SzD_W07]

Skills

A PhD student who graduated from doctoral school can:

1. critically analyze and evaluate of research work results, expert opinions and other works of creative character, and evaluate their contribution to the development of knowledge, [P8S_UW/SzD_U02]
2. transfer results of research work to the economic and social spheres, [P8S_UW/SzD_U03]
3. plan and pursue scientific self-development and to be able to inspire and organize the development of others, [P8S_UU/SzD_U10]

Social competences

A PhD student who graduated from doctoral school is ready to:

1. fulfilling the social obligations of researchers and creators, [P8S_KO/SzD_K04]
2. think and act in the business-like way, [P8S_KO/SzD_K06]
3. maintain and develop the ethos of research and creative communities, including:
   - conducting independent scientific activity,
   - respecting the principle of public ownership of the results of scientific
   - activities, including the principles of intellectual property protection. [P8S_KR/SzD_K07]

Methods for verifying learning outcomes and assessment criteria

Learning outcomes presented above are verified as follows:

PQF code	Methods for verification of learning outcomes	Assessment criteria
W04, W06, W07	Preparing a business model or pitch deck regarding market implementation of technology by a spin-off. Project will be done individually. Time given for the project will be at least 2 weeks	Consistency between different elements of the concept (offer, client, problem solved), understanding of client needs
U02, U03, U10	Preparing a business model or pitch deck regarding market implementation of technology by a spin-off. Project will be done individually. Time given for the project will be at least 2 weeks	Consistency between different elements of the concept (offer, client, problem solved), understanding of client needs

K04, K06, K07	Preparing a business model or pitch deck regarding market implementation of technology by a spin-off. Project will be done individually. Time given for the project will be at least 2 weeks	Consistency between different elements of the concept (offer, client, problem solved), understanding of client needs

Programme content

1. Intellectual property rights (IPR)
2. Commercialization of IPR
3. Innovative business models (Business Model Canvas, Value Proposition Canvas)
4. Business presentation (Pitch Deck, pitching methods)

Course topics

1. Commercialization of technology (What commercialization methods are possible? How to plan a commercialisation process? How does the commercialisation process proceed?).
2. Intellectual property in business (The importance of intellectual property for business organizations, When to use: secret know-how, patent, utility model, trademark?).
3. Development of innovative business (What are the stages of business development? How to build a culture of innovation in a company? What are the key team roles in a tech company? What forms of running a business are possible?).
4. Designing a business based on technology (How to formulate a business model according to the Business Model Canvas?, How to formulate a value proposition according to the Value Proposition Canvas?).
5. Developing a business with the participation of an investor (What are investors looking for and who are they investing in? How to present business to an investor? Pitch deck - what should a presentation contain? How to effectively attract an investor?).

Teaching methods

Lecture: multimedia presentation including illustrations and examples.
Workshop: working in teams / preparation of a business model / discussion.

Bibliography

Basic

1. https://platform.strategyzer.com/training/crash-courses/business-model-basics
   Access is free, requires registration.

Additional

1. Business Model Generation: A Handbook for Visionaries, Game Changers, and Challengers Paperback – July 13, 2010, by Alexander Osterwalder (Author), Yves Pigneur (Author).

Breakdown of average student's workload

	Hours	ECTS
Total workload	25	1,0
Classes requiring direct contact with the teacher	4	0,0
Doctoral student's own work (literature studies, preparation for lectures, task development, consultations with the teacher) [1]	21	1,0

[1] delete or add other activities as appropriate