

**Syllabus** Course Program

# **Project Management**



Specialty 071 – Accounting and taxation

Educational program Accounting, auditing and taxation

Level of education Master's level

Semester

2

#### Institute

Institute of Education and Science in Economics, Management and International Business

Department Management (204)

Course type Elective disciplines of the profile training

Language of instruction English,

## Lecturers and course developers



#### Anastasiia Mytrofanova

Anastasiia.Mytrofanova@khpi.edu.ua

PhD (Economics), Associate Professor of Management Department, Associate Professor

Authored and co-authored over 60 scientific publications. Courses: Project Management

# **General information**

#### **Summary**

The course is devoted to the understanding and using the key concepts to project management via team work in selected by students' field and/or initiated by students projects to implement the project management frames and software, and develop the creative thinking for business and social purposes.

#### **Course objectives and goals**

The course is based on mastering approaches to students understanding of the terms, concepts in project management; to organize and motivate people to move to a common purpose, to work in a team; to identify and solve problems, generate new ideas; to manage the organization, its changes; to develop projects and manage them, to detect initiative and entrepreneurship.

#### **Format of classes**

Lectures - 32 h., Workshops - 16 h., self-study - 72 h. Final control in the form of a test.

#### Competencies

GC01. The ability to identify, formulate and solve problems.GC05. The ability to generate new ideas (creativity).GC06. The ability to search, process and analyze information from various sources.GC11. The ability to evaluate and ensure the quality of work performed.

SC05. The ability to apply methods and techniques of analytical support of modern management systems, taking into account enterprise development strategy in conditions of uncertainty, risk and / or asymmetry of information.

SC08. The ability to perform administrative and managerial functions in the field of activity of business entities, public sector bodies.

#### Learning outcomes

LO 01. To be able to develop and improve cultural and professional level, independently master new methods of work and knowledge regarding a comprehensive vision of modern economics and management.

LO 16. To carry out public business and scientific communications in order to solve communication problems in the native and foreign languages.

LO 18. To adhere to the norms of professional and academic ethics, maintain balanced relationships with team members.

#### Student workload

The total volume of the course is 120 hours (4 ECTS credits): lectures - 32 hours, Workshops - 16 hours, self-study - 72 hours.

#### **Course prerequisites**

To successfully complete the course, it is necessary to have knowledge and practical skills from the following courses: "Fundamentals of Entrepreneurship", "Fundamentals of Management", "Economics of Enterprise", "Marketing".

#### Features of the course, teaching and learning methods, and technologies

Teaching methods include interactive lectures with presentations and discussions. To conduct seminars different tools and techniques will be used: analysis of problematic issues, solving tests and their discussion, doing the economic exercises, the project work using handouts; presentation and discussion of reports. Also, case studies, problem-based learning, peer-to-peer, teamwork are usually implemented.

# **Program of the course**

#### **Topics of the lectures**

#### Topic 1. Project as a Main Concept in Project Management.

1. Concept and main characteristics of the project.

- 2. Classifications of projects.
- 3. The concept of project life cycle and its stages.

4. Project environment and its stakeholders.

#### Topic 2. General Principles of Modern Project Management.

- 1. The concept and genesis of project management as a modern synthetic field of knowledge.
- 2. Project management processes.
- 3. Functions and subsystems of project management. PMBOK.
- Topic 3. Project Initiation and Planning.
- 1. Initiation of a project and its phases.
- 2. Components of a project planning system.
- 3. Stages of project planning and making changes to the plan.

#### Topic 4. Project Structuring.

- 1. General characteristics and significance of project structuring.
- 2. Work Breakdown Structure (WBS) and its features.
- 3. Methodological foundations of project structuring.

#### Topic 5. Time Planning and Scheduling in Project Management.

- 1. Scheduling project work.
- 2. Introduction to Gantt charts.
- 3. Network diagrams.



4. Critical Path Method (CPM) and Method of Program Evaluation and Review Technique (PERT). Topic 6. Project Resource Management.

- 1. Project resources and their types.
- 2. Resource planning. Types of Resource Constraints.
- 3. Costs and budgeting.
- Topic 7. Project Financing.
- 1. Sources of funding. Crowdfunding.
- 2. Assessment of investment attractiveness.
- 3. Key performance indicators.
- Topic 8. Risk Management.
- 1. Concept of Risk. Risks Assessment.
- 2. Risk strategies. Scenario Planning.
- Topic 9. Managing the Project Team.
- 1. Team Building Process.
- 2. Team Roles and responsibilities.
- Topic 10. Project Manager as a Team Leader.
- 1. Understanding of leadership qualities.
- 2. Motivation. Reward systems in the project. Conflict resolution.
- Topic 11. Communication Management in the Project.
- 1. Communication management in project management.
- 2. Means of information exchange in the team.
- Topic 12. Project Monitoring and Control.
- 1. Monitoring the project. Project Dynamics.
- 2. Controlling the project.
- Topic 13. Evolution and Prospects of Modern Project Management.
- 1. Project Management: Traditional Approach and Waterfall.
- 2. Agile Manifesto.
- 3. SCRUM: roles, product and sprint backlogs, meetings.
- Topic 14. Design Thinking.
- 1. Design Thinking.
- 2. Design Thinking Process: IDEO.

#### **Topics of the workshops**

Topic 1: Introductory Class. Individual Assignment. Project as an Object in Project Management.

- Topic 2. General Principles of Modern Project Management. PMBOK.
- Topic 3: Project Initiation and Planning. Making Changes to the Plan.
- Topic 4. Project Structuring. WBS. Deliverables and Milestones.
- Topic 5. Time Planning and Scheduling in Project Management. Gantt Charts. Critical Path Method.
- Topic 6. Project Resource Management. Project budget.
- Topic 7. Project Financing. Crowdfunding.
- Topic 8: Risk Management: Risk Assessment, Scenarios.
- Topic 9. Managing the Project Team. Belbin's Roles. RACI Matrix.
- Topic 10. Project Manager as a Team Leader. Motivation of teamwork, conflict resolution.
- Topic 11. Communication Management in the Project. Information Exchange in the Team.
- Topic 12: Project Monitoring and Control. Project Dynamics.
- Topic 13. Evolution and Prospects of Modern Project Management. Agile. SCRUM.
- Topic 14. Design Thinking. Design Thinking Process: IDEO.

#### Topics of the laboratory classes

no laboratory classes.



### Self-study

PM course project is a creative, independent, completed, theoretical and practical work of the student team on the proposed topics, which is performed on the basis of the principles and methods of project management.

To perform PM course project the following steps should be done:

Choose any topic. Build the team (4-5 persons). Create Team Canvas.

Define and background methodology for PM.

Choose software/platform for team collaboration and progress management.

Manage the progress. Define project value for stakeholders, aim, tasks, scopes, resources, risks, and KPIs. Report the project (with screenshots about project dynamics).

# Course materials and recommended reading

1. Fundamentals of PM (Joseph Heagney, AManA 2012), URL :

https://www.nesacenter.org/uploaded/conferences/SEC/2014/handouts/Rick Detwiler/15 Detwiler R esources.pdf

2. PMBOK® Guide - Seventh Edition , URL: https://www.pmi.org/pmbok-guide-

standards/foundational/pmbok

3. Scrum: The Art of Doing Twice the Work in Half the Time Hardcover - September 30, 2014 by Jeff Sutherland

4. SCRUM Approach for Project Management: Introduction to Scrum (CollabNet), URL:

http://www.youtube.com/watch?v=D8vT7G0WATM&list=UURttfRo2GVp8pPFGqDKVwQ&index=1&feat ure=plcp

5. Divergent vs Convergent Thinking - RISE Beyond, URL: https://www.risebeyond.org/divergent-vs-convergent-thinking/

6. Design Kit: http://www.designkit.org/

7. David Kelley, Tom Kelley Creative Confidence: Unleashing the Creative Potential Within Us All: Crown Business; 1 edition, 2013. - 304 p.

8. Robert S. Kaplan and Anette Mikes Managing Risks: A New Framework , URL:

https://hbr.org/2012/06/managing-risks-a-new-framework

9. Internal Rate of Return (IRR), URL:

https://corporatefinanceinstitute.com/resources/valuation/internal-rate-return-irr/

10. Key Performance Indicator (KPI): Meaning, Types, Examples, URL:

https://www.investopedia.com/terms/k/kpi.asp

11. Project management: the managerial process / Erik W. Larson, Clifford F. Gray. —5th ed. p. cm. —(The McGraw-Hill/Irwin series, operations and decision sciences), 2011.

# Assessment and grading

#### **Grading scale** Criteria for assessment of student performance, and the final score structure **ECTS** Total National 100% Final assessment as a result of Final test (30%) points 90-100 Excellent А and Continuous assessment (70%). 30% Final test: written assignment 82-89 Good В 70% Continuous assessment: 75-81 Good С • 35% course project; 64-74 D Satisfactory • 35% term control (2 online tests). 60-63 E Satisfactory 35-59 Unsatisfactory FX (requires additional learning) F 1 - 34**Unsatisfactory** (requires repetition of the course)



# Norms of academic integrity and course policy

The student must adhere to the Code of Ethics of Academic Relations and Integrity of NTU "KhPI": to demonstrate discipline, good manners, kindness, honesty, and responsibility. Conflict situations should be openly discussed in academic groups with a lecturer, and if it is impossible to resolve the conflict, they should be brought to the attention of the Institute's management.

Regulatory and legal documents related to the implementation of the principles of academic integrity at NTU "KhPI" are available on the website: <u>http://blogs.kpi.kharkov.ua/v2/nv/akademichna-dobrochesnist/</u>

# Approval

Approved by

Date, signature

Date, signature

Head of the department Olena PROKHORENKO

Guarantor of the educational program Tetiana DAVYDIUK

