MINISTRY OF SCIENCE AND HIGHER EDUCATION OF THE RUSSIAN FEDERATION

Federal State Budgetary Educational Institution of Higher Education

«SAINT-PETERSBURG STATE UNIVERSITY OF ECONOMICS» (UNECON)

|  |  |
| --- | --- |
|  | APPROVED  Vice-rector for educational activities  \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Veronika.G. Shubaeva  «\_\_\_\_» \_\_\_\_\_\_\_\_\_\_\_\_\_\_ 20\_\_\_\_. |

***Методы принятия управленческих решений / Management decisions***

**Syllabus of the course**

|  |  |
| --- | --- |
| Specialty | *38.03.02 Management* |
| Specialization | *Business management and digital innovations* |
| Level of higher education | *Bachelor* |
| Form of training | *Full-time* |
| Year of enrolment | *2025* |

Authored by:

|  |
| --- |
| PhD, Zarembo Vladlena Evgenievna |

|  |  |  |  |
| --- | --- | --- | --- |
| Total number of hours | 144 | **Form of final attestation:**   |  | | --- | | Graded test: semester 4  Course paper: semester 4 | |
| incl: |  |
| contact work | 64 |
| self-study | 80 |
| practical training | 0 |
| control hours | 0 |

**Hours distribution:**

|  |  |
| --- | --- |
| Semester: | 4 |
| Type of classes | Hours |
| Contact hours | 22 |
| Practical training | 42 |
| Laboratory work | 0 |
| **Total contact hours** | **64** |
| Self-study | 80 |
| Control hours | 0 |
| **Total academic hours** | **144** |
| **Total credits** | **4** |

Saint-Petersburg

2025

**CONTENTS**

[**1. LEARNING OBJECTIVES** 3](#_Toc150239964)

[**2. COURSE PLACE IN THE PROGRAMME STRUCTURE** 3](#_Toc150239965)

[**3. EXPECTED LEARNING OUTCOMES** 3](#_Toc150239966)

[**4. COURSE STRUCTURE AND CONTENT** 4](#_Toc150239967)

[**5. TEACHING AND LEARNING TOOLS OF THE COURSE** 5](#_Toc150239968)

[**5.1 Recommended literature** 5](#_Toc150239969)

[**5.2 List of software (including national production)** 6](#_Toc150239970)

[**5.3 List of reference systems and modern professional databases** 6](#_Toc150239971)

[**6. TECHNICAL FACILITIES** 6](#_Toc150239972)

[**7. METHODOLOGICAL GUIDELINES FOR STUDENTS** 8](#_Toc150239973)

[**8. SPECIFICATIONS FOR TEACHING DISABLED PERSONS** 8](#_Toc150239974)

[**ASSESSMENT RESOURSES** 10](#_Toc150239975)

[**1.1 Control tasks and assignments for interim attestation** 10](#_Toc150239976)

[**1.2 Topics for written task** 10](#_Toc150239977)

[**1.3** **Interim checkpoints** 12](#_Toc150239978)

[**1.4 Other assessment objects** 12](#_Toc150239979)

[**1.5 Self-study** 12](#_Toc150239980)

[**1.6 Grading scale** 12](#_Toc150239981)

# **1. LEARNING OBJECTIVES**

|  |  |
| --- | --- |
| **Objective:** | The study of methodological foundations, concepts, principles, models and algorithms for making managerial decisions under risk, uncertainty in the information technology environment. The task of the discipline is to study the technologies of innovative business education and the training of innovatively active personnel who are able to make effective management decisions. |

# **2. COURSE PLACE IN THE PROGRAMME STRUCTURE**

Discipline B1.O Management decisions refers to the mandatory part of Block 1.

# **3. EXPECTED LEARNING OUTCOMES**

| **Code and name of graduate competence** | **Code and name of the competence achievement indicator** | **Expected learning outcomes** |
| --- | --- | --- |
| GPC-4 – Able to identify and evaluate new market opportunities, develop business plans for the creation and development of new activities and organizations | GPC-4.3 – Assesses the economic efficiency of managerial decisions based on knowledge of the methods of financial and investment analysis | To know: methods for identifying new market opportunities and developing business plans, methods of financial and investment analysis  To be able to: develop business plans for the creation and development of new activities and start-ups, evaluate the economic efficiency of management decisions.  To master: the skills of developing business plans, methods of financial and investment analysis. |
| GPC-5 – Able to use modern information technologies and software in solving professional problems, including the management of large data arrays and their intellectual analysis | GPC-5.2 – Assesses the possibilities and feasibility of using digital technologies in the activities of the organization, uses modern digital technologies and software products to solve professional problems | To know: modern information technologies and software, including big data, methods for assessing the possibility and expediency of using digital technologies  To be able to: evaluate the possibilities and feasibility of using digital technologies in the activities of the organization, use modern digital technologies and software products to solve professional problems.  To master: the skills of using modern information technologies and software, assessing the possibility and expediency of using digital technologies in the activities of the organization. |
| UC-1 – Able to search, critical analysis and synthesis of information, apply a systematic approach to solve tasks | UC-1.3 – Chooses the best option for solving the problem, arguing his choice | To know: methods of searching, critical analysis and synthesis of information, selection of the optimal solution  To be able to: choose the best solution to the problem, arguing your choice.  To master: skills of well-founded adoption of effective management decisions. |

# **4.** **COURSE STRUCTURE AND CONTENT**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Code and name of the topics** | **Course content** | | **Academic hours** | | | | |
| **Contact work** | | | | **Self-study** |
| **Lectures** | | **Practices** | **Workshops** |
| Topic 1. Management decisions in the management system | Management decision (SD) as a process and phenomenon. The structure of the SD cycle. General concepts of goals in the development of SD. Typology of management decisions. Basic approaches to the classification of SD. Variants of SD classification. Requirements for UR. Conditions for fulfilling the requirements. Features of SD in the context of the introduction of modern information technologies and artificial intelligence systems. | | 2 | | 6 |  | 10 |
| Topic 2. Methodological foundations for the preparation and implementation of management decisions | Goals as the basis of PRSD technologies. Building a tree of goals. Initiative-target technology. Program-target technology. regulatory technology. Conditions for the use of targeted technologies in organizations in the PRSD. Processor technologies PRUR. Organization as a social system for the preparation of decisions. Systems of information and intellectual support for SD. | | 2 | | 6 |  | 10 |
| Topic 3. Organizational and socio-psychological foundations for the development of management decisions | Content and stages (stages) of the PRDP process. Technology of preparation of managerial decisions. Models, methodology and organization of the process of preparation of managerial decisions. Technology of the process of preparation and implementation of solutions. | | 2 | | 6 |  | 10 |
| Topic 4. Features of the development of management decisions under risk and uncertainty | Relations between uncertainties and risks. Sources of objective and subjective uncertainties. Objects of insurance. Features of intangible assets as objects of insurance. Branches of insurance of a legal entity. Generalized scheme of branches of insurance of a legal entity. Insurance of managerial risks. Generalized insurance objects of the organization management system. Management decision as an object of insurance. | | 4 | | 6 |  | 10 |
| Topic 5. Analysis of alternative management decisions | The main purpose of models and methods in the preparation of SD. Classification of economic and mathematical models and methods for preparing SD. Individual and group methods. | | 6 | | 6 |  | 10 |
| Topic 6. Methods for monitoring the implementation of management decisions | Methodology and organizational aspects of management decisions control; control systems; types of control. Features of choosing the type of control for the development, adoption and implementation of management decisions. | | 2 | | 4 |  | 10 |
| Topic 7. Responsibility in the system of making and implementing management decisions | Types of responsibility. The essence of professional responsibility. Interaction of social and legal responsibility. | | 2 | | 2 |  | 10 |
| Topic 8. Quality and efficiency of management decisions | The quality of the SD preparation and implementation process. Efficiency of management decisions and its components. Organizational effectiveness of SD. Social efficiency of SD. Economic efficiency of SD. Comparative economic analysis and guidelines for evaluating the effectiveness of management decisions. Methods for calculating the economic efficiency of the preparation and implementation of SD: an indirect method of comparing various options, an assessment method based on final results, an assessment method based on direct results of activities. | | 2 | | 6 |  | 10 |
| **Control hours:** | | | | | | | **0** |
| **Total hours:** | | **22** | | **42** | | **0** | **80** |

# **5. TEACHING AND LEARNING TOOLS OF THE COURSE**

## **5.1 Recommended literature**

|  |  |
| --- | --- |
| **Bibliographic description of the publication (author, title, type, place and year of publication, number of pages)** | **Digital resources** |
| Trofimova, Lyudmila Afanasyevna Managerial decisions (methods of adoption and implementation) : [studies. manual] / L.A.Trofimova, V.V.Trofimov ; Ministry of Education and Science of the Russian Federation. Federation, St. Petersburg State University of Economics and Finance Electron. text data.(2,678 Kb)St. Petersburg : Publishing House of SPbGUEF, 2011 | <https://opac.unecon.ru/elibrary/elib/382130210.pdf> |
| Trofimova, Lyudmila Afanasyevna Workshop on the discipline "Management decisions": for students day and evening. forms of training in the specialty "Organizational Management" / L.A.Trofimova, V.I.Pilipenko ; Ministry of Education and Science of the Russian Federation. Federation, St. Petersburg State University of Economics and Finance Electron. text data.(1,804 KB)St. Petersburg : Publishing House of SPbGUEF, 2011 | <https://opac.unecon.ru/elibrary/elib/355424272.pdf> |
| Zub, Anatoly Timofeevich Managerial decision-making : textbook and workshop for academic bachelor's degree / A. T. Zub. 2nd ed., ispr. and Additional electronic data.Moscow : Yurayt, 2018 332 p. | [https://urait.ru/viewer/prinya ... cheskih-resheniy-410901#page/1](https://urait.ru/viewer/prinyatie-upravlencheskih-resheniy-410901#page/1) |
| Ivanov, Pavel Vadimovich Methods of managerial decision-making : a textbook for universities / P. V. Ivanov [et al.] ; edited by P. V. Ivanov.2nd ed., ispr. and dopElektron. dan.Moscow : Yurayt, 2019276 p. | [https://urait.ru/viewer/metody ... cheskih-resheniy-431696#page/1](https://urait.ru/viewer/metody-prinyatiya-upravlencheskih-resheniy-431696#page/1) |

## **5.2 List of software (including national production)**

|  |
| --- |
| - 7-Zip |
| - LibreOffice |
| - ОС Альт образование 10 |

## **5.3 List of reference systems and modern professional databases**

|  |  |
| --- | --- |
| **№** | **Name of reference systems and professional databases** |
| 1. | Digital library Grebennikon.ru – [www.grebennikon.ru](http://www.grebennikon.ru) |
| 2. | Science Digital Library eLIBRARRY – [www.elibrary.ru](https://elibrary.ru/defaultx.asp?) |
| 3. | Science Digital Library КиберЛеника – [www.cyberleninka.ru](https://cyberleninka.ru/) |
| 4. | Database ПОЛПРЕД Справочники – [www.polpred.com](http://www.polpred.com) |
| 5. | Database OECD Books, Papers & Statistics on the platform OECD iLibrary  [www.oecd-ilibrary.org](http://www.oecd-ilibrary.org) |
| 6. | Legal reference system КонсультантПлюс (installed resource UNECON or [www.consultant.ru](https://www.consultant.ru/)) |
| 7. | Legal reference system «ГАРАНТ» (installed resource UNECON or [www.garant.ru](https://www.garant.ru/)) |
| 8. | Information and referral system «Кодекс» (installed resource UNECON or [www.kodeks.ru](https://kodeks.ru/)) |
| 9. | Digital library system BOOK.ru - [www.book.ru](https://book.ru/) |
| 10. | Digital library system ЭБС ЮРАЙТ – [www.urait.ru](https://urait.ru/viewer/kompleksnyy-analiz-hozyaystvennoy-deyatelnosti-468686) |
| 11. | Digital library system ЗНАНИУМ (ZNANIUM) – [www.znanium.com](http://www.znanium.com) |
| 12. | Digital library UNECON – [opac.unecon.ru](https://opac.unecon.ru/) |

# **6. TECHNICAL FACILITIES**

There are special rooms for lectures, seminars, coursework, group and individual consultations, current and interim assessments, as well as rooms for self-study.

The premises are equipped with equipment and teaching aids.

The rooms for students' independent work are equipped with computers with Internet connection and access to the university's electronic learning environment.

|  |  |
| --- | --- |
| **Name of classroom** | **Сlassroom location** |
| Classroom 2009 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Special furniture and equipment: Educational furniture for 122 seats (study table 61 pcs., chairs 122 pcs.), the teacher's workplace, desk m/m, drawer 1 pc, chalk board 1 pc (3 sections), chair 1 pc, drawer 1 pc, chair 1 pc, Chair 2 pcs., Intel i3-2100 2.4 Ghz /4Gb/500Gb/Acer V193 19" - 1 pc, Sound projector Yamaha YSP-3000 - 1 pc, Projector stand with camera decks - 1 pc, Projection screen draper - 1 pc, Multimedia projector Type 2 Panasonic PT-VX610E - 1 pc, Screen Media D1 ceiling bracket - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2011 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 118 seats, teacher's workplace, desk - 1 pc, chalk board (3 sections) - 1 pc, marker board - 1 pc, desk - 1 pc, desk - 1 pc, drawer - 1 pc, chair - 3 pcs., Computer Intel i3-2100 2.4 Ghz /4Gb/500Gb/Acer V193 19" - 1 pc, ScreenMedia Champion 244x183cm SCM-4304 - 1 pc, Panasonic PT-VX610E multimedia projector - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2028 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 44 seats, teacher's workplace, chalk board (one section) - 1 pc, chair - 1 pc, table - 1 pc, chair - 3 pcs. Portable multimedia set: HP 250 G6 1WY58EA laptop, LG PF1500G multimedia projector. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2045 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 78 seats, teacher's workplace, chalk board (3 sections) - 1 pc, chair - 1 pc, chairs - 2 pcs. Portable multimedia set: HP 250 G6 1WY58EA laptop, LG PF1500G multimedia projector. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2052 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 88 seats, teacher's workplace, chalk board (3 sections) - 1 pc, desk - 1 pc, table - 2 pcs, chair - 2 pcs, Computer Intel i3-2100 2.4 Ghz/500/4/Acer V193 19" - 1 pc, Multimedia projector Type 2 Panasonic PT-VX610E - 1 pc, ScreenMedia Champion 244x183cm SCM-4304 motorized screen - 1 pc, MW Cinerollo 200\*200cm manual spring loaded screen - 1 pc, Multimedia projector Type 2 Panasonic PT-VX610E - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2060 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 82 seats, a teacher's workplace, chalk board (3 sections) - 1 pc., chair - 1 pc., table - 1 pc., chair - 2 pcs., Computer Intel i3-2100 2.4 Ghz/500/4/Acer V193 19" - 1 pc., Multimedia projector Panasonic PT-VX610E - 1 pc., Screen with electric drive ScreenMedia Champion 203x153cm (SCM-4303) - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2061 Training classroom (for lecture- and seminar-type classes, coursework, group and individual consultations, current control and intermediate attestation), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 80 seats, teacher's workplace, table - 1 pc, chalk board (3 sections) - 1 pc, pulpit - 1 pc, chairs - 2 pcs. Portable multimedia set: HP 250 G6 1WY58EA laptop, LG PF1500G multimedia projector. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2023 Computer room (for practical classes, course design (coursework) using computer technology), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 48 seats, teacher's workplace (computer desk - 1 pc.), wheeled marker board - 1 pc, 3 sectional marker board - 1 pc, desk - 1 pc, iso chair - 7 pcs, chair -1 pc, blinds - 3 pcs., Computer i5-8400/8GB/500GB\_SSD/Viewsonic VA2410-mh -34 pcs, Switchboard Cisco Catalyst 2960-48PST-L (including SmartNet Service Contract CON-SNT-2964STL) - 1 pc, Wi-Fi Access Point Type1 UBIQUITI UAP-AC-PRO - 1 pc, NEC M350 X projector - 1 pc, Local Area Network Switch (48 ports) Cisco WS-C2960+48PST-L - 1 pc, ProCurve Switch 2626 - 1 pc, Intel pentium x2 g3250 computer /500gb / philips 21.5' monitor - 1 pc, Ubiquiti IP video camera - 1 pc, Wireless access point/UNI FI AP PRO/Ubiquiti - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |
| Classroom 2034 Computer room (for practical classes, course design (coursework) using computer technology), equipped with a multimedia system. Specialized furniture and equipment: Educational furniture for 25 seats, teacher's workplace (table 1pc., chair 1pc.), marker board 1pc, Rack hanger 2pcs, chairs 3pcs.Computer I5-7400/8Gb/1Tb/DELL S2218H - 21pcs, Network switch Cisco WS-C2960-48TT-L (Catalyst2960) 48-ports 10/100Mbps+2p - 1 pc, Switchboard Cisco Catalyst 2960 24 WS-C2960-24PC-L - 1 pc. Sets of display equipment and visual aids: multimedia applications for lecture courses and practical sessions, interactive teaching and visual aids. | 191023, St. Petersburg, Griboedova canal, 30-32, lit. A, Б, P |

# **7. METHODOLOGICAL GUIDELINES FOR STUDENTS**

The following documents should be made available to the trainee before the start of the course:

* training and methodological documentation;
* local normative acts regulating the main issues of the organisation and implementation of educational activities, including those regulating the procedure for current monitoring and interim assessment of students;
* the schedule of consultations of the teaching staff.

The level and depth of mastering the discipline is determined by the active and systematic work of students in lectures, seminars, independent work, including in terms of identifying the most significant and relevant problems for further study. A special condition for qualitative mastering of the discipline is an effective organisation of work, which allows distributing the academic workload evenly in accordance with the schedule of the educational process.

When preparing for classes, students have the opportunity to attend consultations with the staff of UNECON according to the timetable set out in the schedule of consultations.

The students' in- and out-of-classroom work should aim to form:

* the fundamentals of the learner's world view and scientific understanding;
* basic knowledge relevant to the training area and the declared professional field, forming the target and professional basis for training;
* professional competences oriented towards the needs of the labour market;
* an individual trajectory by mastering a unique set of professional competences that complement the learner's competence model, through a focus on specific professional specialised areas of knowledge defined by labour market representatives;
* metha-skills for learners, such as teamwork and leadership, data analysis, digital skills, project design and implementation, intercultural interaction.

# **8. SPECIFICATIONS FOR TEACHING DISABLED PERSONS**

Students with disabilities, if necessary, are taught on the basis of an adapted work programme using special teaching methods and didactic materials that take into account the particularities of their psychophysical development, individual capacities and health status.

In order for disabled persons and persons with disabilities to master the curriculum, the University shall ensure that:

* for the visually impaired and visually impaired: availability of information on the timetable in accessible places and adapted forms for learners who are blind or visually impaired; presence of an assistant to assist the learner as needed; production of alternative formats of teaching materials (large print or audio files);
* for the hearing-impaired and hearing-impaired: adequate sound reproduction of information;
* for persons with disabilities and persons with mobility impairments: the possibility of unimpeded access for students to classrooms, restrooms and other areas of the department, as well as their stay in these areas.

Learners with disabilities and persons with disabilities are provided with printed and/or electronic educational resources in forms adapted to their disabilities. The education of students with disabilities may be organised with other students or in separate groups or organisations.

# **ASSESSMENT RESOURSES**

# **1.1 Control tasks and assignments for interim attestation**

Is not provided by the work programme of the discipline.

## **1.2 Topics for written task**

1. The main elements of the process of making managerial decisions.
2. The management process and the development of a management decision.
3. Main factors affecting the quality of the solution
4. Stages and operations of development of management decisions
5. Modeling the process of developing a management decision
6. Target orientation of management decisions
7. Alternatives to achieve the goal and choice of management decisions
8. Features of the development of strategic and tactical management decisions
9. Analysis of action alternatives
10. Identification of manageable factors and identification of alternatives for their change
11. Modeling and analysis of the results of the implementation of alternative solutions
12. Comparison of alternatives based on the conformity of the results of their implementation with the objectives of the activity
13. Management decision-making environment and its impact on the implementation of alternatives
14. External and internal environment in management processes.
15. Methods for making decisions under risk
16. Effectiveness of management decisions: concept and evaluation
17. Decisions as an act of change
18. Opportunity and need to evaluate the effectiveness of a management decision
19. Methods for evaluating the effectiveness of a management decision
20. Monitoring the implementation of management decisions
21. Techniques of control and digitalization in the implementation of management decisions
22. Necessity, forms, measure and types of responsibility
23. Differentiation of responsibility for making managerial decisions
24. Analysis and improvement of the relationship between science and art in the RRM process
25. Analysis of the influence of traditions, the specifics of the enterprise on the RRM process
26. Development of a system of priorities for human needs and interests in the implementation of SD
27. Analysis of SD modeling methods
28. Modern software tools for automating routine operations in the RRM process
29. The influence of the personal qualities of a manager in the RRM process
30. Features of the development of SD in small enterprises
31. The impact of panic on the preparation and implementation of managerial decisions
32. Modern methods for calculating the effectiveness of RDP
33. Methods for improving the efficiency of developed SD
34. Analysis and improvement of the RDP methodology in the technical system
35. Analysis and improvement of the PRSD methodology in a biological system
36. Analysis and improvement of the PRSD methodology in the social system
37. Features of the development of SD for digital twins
38. Development of methods for increasing the determinism of SD
39. Development of a system of priorities for human needs and interests in the implementation of SD
40. Development of a system of priorities for the needs and interests of society in the implementation of SD
41. Analysis of current trends in the use of information technology in the process of SD preparation
42. Analysis of the capabilities of computers of the “virtual reality” system in PRSD
43. Analysis of the requirements for the RDP process and development of a set of standards for SD
44. Diagnosing and identifying problems (building a problem tree)
45. Economic-mathematical methods and decision-making models
46. Methods for reducing the level of complexity of the decision-making process: the need, main forms and problems
47. Responsibility in the system of development, adoption and implementation of management decisions
48. Methods for calculating the economic efficiency of the preparation and implementation of management decisions
49. Scientific approaches in organizing the development and implementation of management decisions
50. Languages for describing the choice of alternatives

## **1.3** **Interim checkpoints**

|  |  |  |  |
| --- | --- | --- | --- |
| **Number** | **Type** | **Method of conduct** | **Topic number** |
| 1 | Design and analytical work | with the help of technical means and information systems | 1-4 |
| 2 | Calculation and practical work | with the help of technical means and information systems | 1-9 |
| 3 | Monitoring | with the help of technical means and information systems | 1-9 |

# **1.4 Other assessment objects**

Is not provided by the work programme of the discipline.

# **1.5 Self-study**

|  |  |
| --- | --- |
| **Name of self-study** | **Topic number** |
| Development of individual / group projects | 1-2,5,6 |
| Course design | 1-8 |
| Solving professional problems | 3-4 |
| Performance of calculation, analytical, settlement-graphic and other tasks | 7 |

## **1.6 Grading scale**

Scales of assessment and procedures for assessing learning outcomes of the discipline are regulated by the Regulations on the current control of progress and interim attestation of students in higher education programmes and the Regulations on the scoring and rating system.

**A grading and rating system** is used to assess the learning outcomes of the discipline:

The final control of the discipline is an examination (or a differentiated test), the final grade being formed in accordance with the scale given in the table below:

|  |  |
| --- | --- |
| Points | Grade |
| <=54 | fail |
| 55-69 | satisfactory |
| 70-84 | good |
| >=85 | excellent |

**Grading scale**

|  |  |
| --- | --- |
| 2 (points to 54) | Demonstrates a lack of understanding of the problem. Many of the requirements of the assignment are not met.  An initial perception of the material is demonstrated. The work is incomplete and/or plagiarised. |
| 3 (points 55-69) | Demonstrates a partial understanding of the problem. Most of the requirements of the task have been met.  Mastery of the elements of the assigned material. The material is mostly clear and coherent. |
| 4 (points 70-84) | Demonstrates considerable understanding of the issue by the discipline. All requirements of the assignment are fulfilled.  The content of the completed tasks is disclosed and examined from different perspectives. |
| 5 (points 85-100) | Demonstrates full understanding of the problem. All requirements of the assignment are fulfilled.  Demonstrates proficiency in the discipline. The completed assignments are holistic, complete, structured, present different points of view and demonstrate creativity. |