Educational program annotation 38.03.02 08 Marketing

Field of study: 38.03.02 Management **Bachelor program:** 38.03.02_08 Marketing

Level of education: Bachelor

1. List of structural units in the program

The bachelor's program in the direction 38.03.02 Management is implemented at the Institute of Industrial Management of Economics and Trade.

Highly qualified teaching staff (candidates and doctors of sciences), representatives of the professional community (employers, practitioners), who teach general education and specialized disciplines of the curriculum and supervise the project and research work of students, participate in the implementation of the bachelor's training program.

Graduate School of Business and Management, Graduate School of Service and Trade, Graduate School of Engineering and Economics, Graduate School of Engineering Pedagogy, Psychology and Applied Linguistics, Graduate School of Law and Forensic Science, Graduate School of Sports Pedagogy, Graduate School media communications and public relations, as well as the Department of Fundamentals of Economics and Management, the Department of Social Sciences, which teach curriculum disciplines.

2. Mission and goals of the educational program

The mission of the main educational program of the bachelor's degree is to provide a comprehensive, high-quality, internationally competitive education, based on a combination of modern educational technologies, educational methods aimed at forming the graduate's professional qualities and developing creative potential.

The mission of the program corresponds to the tasks facing domestic enterprises of any sphere, which consists in training specialists who are able to apply the latest technologies and tools in their professional activities: to work successfully in their chosen field of activity and be successful in the labor market, to master the principles and methods of management, entrepreneurship and business. activity, ability to make effective decisions based on high professional competence.

The purpose of specialized training of bachelors in the "Marketing" profile is the formation of the following competencies: development of students' market approach to enterprise management based on the study of consumers and competitors, the use of entrepreneurial approaches in the activities of the enterprise, methods of interactive interaction with consumers, creating sustainable competitive advantages.

The uniqueness of the bachelor's program "Marketing" lies in its practical orientation not only to the traditional laws of marketing, but also to the processes of global change in modern marketing trends.

1. The program prepares specialists in the following demanded professions: marketer, marketing analyst, market research specialist,

customer relations manager, advertising and PR manager, internet marketer. The training program is aimed at developing students' skills that correspond to trends in the labor market - a complex of soft skills (intuition, the ability to work in a team and be aware of their role, reasonably express their opinions and persuasion skills, the ability to solve problems and think critically, analytical skills, skills self-education, the ability to quickly adapt, multitasking skills, the ability to think creatively) and hard skills (the ability to organize a process, the ability to delegate, communication skills and self-presentation skills, understanding the principles of content distribution, familiarity with content management systems, understanding the principles of SEO promotion, skill work with analytics tools, understanding the principles of product management and product design, copywriting and editing skills).

- 2. Привлечение к процессу обучения ведущих специалистовпрактиков из различных сфер и отраслей экономики, с целью передачи практического опыта организации маркетинговой деятельности компании с целью интеграции теории и практики обучения, программу более привлекательной что делает выпускнику-бакалавру абитуриентов позволяет быть более конкурентоспособным и востребованным на рынке труда.
- 3. Integration into the curriculum of disciplines as a basic module, focused on deepening knowledge in the field of management, and a profile focus, focused on solving real cases and analytical tasks on the examples of existing organizations that implement and use digital marketing technologies.
- 4. A unique combination of specialized disciplines allows bachelors to form a system of "hard" professional skills that allow them to collect, process and analyze data using modern software products and statistical research methods, including the ability to systematize information, create a unique product or service, analyze traffic and user behavior and develop management decisions based on the results obtained.
- 5. Using in the course of training modern software products Microsoft Project a software product for managing complex, multi-stage projects; Excel software that allows you to apply statistical research methods in the analysis of big data.
- 6. Combination of both classical approaches and teaching methods (lectures and practical classes) and new, active methods, case sessions, participation in scientific and practical conferences in order to get the opportunity to get acquainted and exchange experience with representatives of other Universities, including, foreign, and practitioners from the real sector of the economy.

3. Requirements

Persons who have a document on secondary general education or a document on secondary vocational education and qualifications, or a document on higher education and qualifications are allowed to master the educational program. Admission to training is carried out for the first year. The procedure and conditions for admission are regulated by the Rules for admission to undergraduate programs, specialist programs, master's

programs at Peter the Great St. Petersburg Polytechnic University, which are approved for each year of admission.

4. Areas of professional activity and (or) areas of professional activity in which graduates who have mastered the educational program can carry out professional activities:

01 Education and science (in the areas of professional and additional professional education; scientific research).

06 Communications, information and communication technologies (in the field of promotion and distribution of media products, in the creation and management of information resources on the Internet, in the sale of information and communication systems).

Graduates can carry out professional activities in other areas and (or) spheres of professional activity, provided that their level of education and acquired competencies correspond to the requirements for employee qualifications.

5. Type (types) of tasks of professional activity, for the solution of which the graduate should be ready:

- organizational and managerial;
- information and analytical;
- entrepreneurial.

6. Professional standards in accordance with which the educational program is developed:

No	Associated professional standard or other grounds for the inclusion of professional competencies in the educational program (name and details of documents)	Selected generalized labor function	Labor function, the preparation of the implementation of which is directed by professional competence
1.		B. Sale of standard solutions for infocommunication systems and / or their components	B / 01.6 Search for potential customers for the purchase of infocommunication systems and / or their components B / 02.6 Preparation of commercial offers, documentation for the sale of infocommunication systems and / or their components, including for tenders

	06.029 Professional standard "Sales manager of information and communication		held in a different form, requests for proposals from clients
	systems" approved by order of the Ministry of Labor and Social Protection of the Russian Federation dated October 05, 2015 No. 687n (registered by the Ministry of Justice of the Russian Federation on October 30, 2015, registration No. 39566)		B / 03.6 Establishing and maintaining contacts with existing customers to discuss their needs for infocommunication systems and / or their components
2.	06.029 Professional standard "Sales manager of information and communication systems" approved by order of the Ministry of Labor and Social Protection of the Russian Federation dated October 05, 2015 No. 687n (registered by the Ministry of Justice of the Russian Federation on October 30, 2015, registration No. 39566)	C. Sale of atypical and complex solutions for infocommunication systems and / or their components	C / 02.6 Controlling the entire sales cycle of infocommunication systems and / or their components C / 03.6 Management of complex projects for the sale of infocommunication systems and / or their components

7. The structure and content of the educational program

The educational program is implemented through a system of disciplinary modules and a module of state final certification.

The undergraduate program consists of the following types of modules: General educational module, within the framework of which the development of universal, general professional, as well as mandatory professional competencies takes place.

The "Physical culture" module, in which the mastering of universal competence takes place.

A foreign language learning module, in which the development of universal competencies takes place.

A fundamental module in which the development of universal competencies takes place.

Basic study module of the field includes a set of disciplines (modules) that form knowledge, skills and abilities in the direction of training.

A module of a specialized orientation, which determines the profile of training, within which the development of professional competencies takes place.

Mobility module is an educational cycle within the framework of an educational program, which represents an additional educational trajectory for students in addition to training in the main educational direction.

The module of project activity is an independent activity of students, focused on solving a certain practically or theoretically significant problem, implemented within the framework of disciplines, practices, research work.

The module "State final examination" includes: the defense of the final qualifying work and the state exam (s) (if any).

Optional disciplines aimed at the socio-cultural development of students.

The learning outcomes by disciplines (modules) are correlated with indicators of achievement of competencies and ensure the gradual formation of the graduate's competencies.

Structure and scope of the educational program

Structure	Scope (credits)
BLOCK 1 "Disciplines (modules)"	209
BLOCK 2 "Practice"	25
BLOCK 3 "State final examination"	6
Total	240
BLOCK 4 "Electives"	6

7.1. Competence-based curriculum and calendar study schedule

The competence-based curriculum includes two interrelated components: Competence-formative and disciplinary-modular. The competence-forming part of the curriculum connects all the mandatory competencies of the graduate with the sequence of studying all academic disciplines, practices, etc. The disciplinary-modular part of the curriculum reflects the logical sequence of mastering the elements of the educational program that ensure the formation of competencies.

The curriculum defines the list, labor intensity (in credit units and academic hours), sequence and semester distribution of disciplines (modules), practices, forms of intermediate certification of students, state final certification, the volume of contact work of students with a teacher (by type of training) is highlighted and independent work of students.

The educational calendar indicates the periods of the types of educational activities and the periods of vacations.

7.2. Work programs of disciplines (modules), practice programs

The work program of the discipline (module) is developed in accordance with its own established educational standards, curriculum,

competency matrix, which reflects the competencies of all levels, indicators for them, as well as descriptors that ensure their achievement.

7.3. Practice programs

Practices are a compulsory section of the educational program and are a type of training sessions directly focused on the professional and practical training of students. Practitioners consolidate the knowledge and skills acquired by students as a result of mastering theoretical courses in special disciplines, develop practical skills and contribute to the integrated formation of general cultural and professional competencies of students.

The educational program "Marketing" established the following types and types of practices:

Educational practice:

- practice to acquire primary professional skills;
- organizational and managerial.

Internship:

- practice to acquire professional skills and professional experience;
- undergraduate practice.

7.4. Funds of assessment tools for the current and intermediate attestation of students in the discipline (module), practice

The fund of assessment tools for conducting the current and intermediate attestation of students in the discipline (module), practice are included in the work program of the discipline (module) and the practice program, respectively, and is drawn up in the form of attachments to the programs.

7.5. Organization of research work of students

Research work is carried out by a bachelor under the guidance of a teacher. The purpose of the bachelor's research work is to realize the creative and intellectual abilities of students, the formation and improvement of the forms of their involvement in scientific activities, ensuring the unity of educational and scientific-practical processes to improve the professional level of training of specialists with higher education.

The research work of students involves the solution of the following tasks:

- teaching students the methodology of scientific research;
- creating conditions for students to use in practice
- theoretical knowledge;
- creating conditions for the disclosure and implementation of creative and intellectual abilities of students;
- formation of skills in scientific and practical, creative and research activities.

The research work of a bachelor is divided into three types:

- Research work built into the educational process, as well as within educational and industrial practices.
- Research work that complements the educational process. This type of SRWS organization involves the individualization of training, in-depth study of the materials of the passed disciplines, the creation of prerequisites for training in master's and postgraduate studies.

 Research work parallel to the educational process, when the organization of research work involves the scientific professionalization of students, including specialization and preparation for a specific area of scientific activity.

7.6. Fund of assessment tools for state final examination

The fund of assessment means for the state final certification is developed for the implementation and protection of the final qualifying work. In the course of the state final certification, the degree of compliance of the formed competencies of graduates with the requirements of this educational standard and the educational program being implemented is assessed.

The fund of assessment means includes: the program of state final certification, including requirements for final qualifying works and the procedure for their implementation, criteria for assessing the results of defense of final qualifying works.

8. Places of practice and employment

Students can undergo industrial practice at enterprises of various fields of activity, in advertising and marketing agencies, Internet marketing agencies. There are a number of long-term agreements on internships between SPbPU and the Russian-German Center for Innovation and Entrepreneurship "Polytech Strascheg", GC "Obukhovsky", LLC "Goreltech", Internet agency "Evil Marketing" (IE Bakharev A.A.), advertising agency "Grand Media Service", research center "GORTIS", intellectual Internet marketing agency "RE: SPOND", LLC "Agency for Marketing Initiatives".

Applications for graduates are received from enterprises of the city and the region: the Internet agency "Evil Marketing", LLC "Igora Drive", LLC "Red Elephant", LLC "Lizoform-SPB", LLC "Leader Group", GC "Obukhovsky".

Material and technical base for educational and scientific activities

To implement the training of bachelors in the direction of Management, IMET has laboratories equipped with the necessary equipment:

Research Laboratory "Digital Technologies in Business and Education". The research laboratory was created in order to widely attract the teaching staff, graduate students, undergraduates and students. The use of the Laboratory is a necessary element of the implementation of the research and educational process. The laboratory was organized to carry out research projects funded from competitions for grants from the Russian Humanitarian Science Foundation, RFBR and other sources. Research carried out in the Laboratory is included in research plans.

The book value of the equipment is 902,968.20 rubles.

Educational laboratory "Modern technologies of management". The educational laboratory was created to provide the educational process with information and technical means and programs, as well as for the use and implementation of information technologies in scientific and innovative activities.

The book value of the equipment is RUB 1,692,480.00.

The material and technical base of the educational program of the bachelor's degree ensures the conduct of all types of classes, disciplinary and interdisciplinary training, laboratory, practical and research work of students, provided for by the curriculum and corresponding to the current sanitary and fire safety rules and regulations.

Today, student education and research is carried out using databases on various indicators of the functioning of organizations.

Equipping the laboratory allows you to solve the most modern tasks in the field of strategic planning of the company's activities, collecting, processing and analyzing information about the factors of the external and internal environment of the organization for making management decisions.

10. Competitive advantages of graduates and possible places of employment

The preparation of bachelors is carried out on the basis of IMET, laboratories, computer classes, using modern interactive teaching methods. A new format of interaction with students is the conduct of open lectures and master classes by leading practitioners from various enterprises: the Grand Media Service advertising agency, the GORTIS research center, and Evil Marketing (IP Bakharev AA).

Graduates of this program will be able not only to gain practical knowledge, but also to determine their future place of work. Part-time employment is possible already during the training period in the companies Goreltech LLC, Vympel-Communications PJSC, Chocolate Fiesta (IP Kovalevsky MM), Real Estate Agency Public Real Estate (IP Shestakov MA), GC "Obukhovsky".

11. International cooperation

The main international partners are leading foreign universities, European business schools and universities of applied sciences, including those implementing similar educational programs.

Close integration is also carried out with foreign consortia of partners, jointly implementing international research projects within the framework of, for example, cross-border cooperation programs, "Interreg Baltic Sea Region", "Erasmus +".

Cooperation and networking with international partners makes it possible to improve the quality of training of specialists through the development of academic mobility programs and inclusive education, the use of advanced foreign experience, the attraction of foreign professors from leading universities and research centers, and the attraction of students for the implementation of research projects.

12. Main scientific directions and schools

The teachers involved in the implementation of the educational program are engaged in research activities in the framework of scientific areas on the following topics: development of marketing tools in the context of digital transformation of business and innovation; modern technologies of digital marketing and management of electronic enterprises.

13. Most significant results and achievements

The main scientific and practical results of joint research of teachers and students within the framework of this educational program are presented in the reporting documentation for the following grants:

RFBR Grant No. 18-010-01119 "Management of digital transformation of an innovative industrial cluster as a backbone element of an industry digital platform: methodology, tools, practice."

RFBR grant No. 16-32-00040 "Theoretical and scientific-methodological foundations of industrial development management in the Far North".

Annotations of educational program elements 38.03.02_08 Marketing (subjects, practice and State Final Examination)

	(casjects, p. a	Life safety	-Xa		
Objectives:	The purpose of studying the discipline: the formation of a professional safety culture, which presupposes the readiness and ability of a graduate to use the acquired body of knowledge, skills and abilities to ensure safety in the field of his activity.				
Content:	1. Basics of life safety 1.1. Theoretical foundations of life safety 1.2. Biomedical fundamentals of life safety 2. Sanitation and hygiene of industrial and household activities 2.1. Microclimatic parameters and light environment 2.2. Vibroacoustic safety 2.3. Electromagnetic and radiation safety 3. Safety precautions 3.1. electrical safety 3.2. Fire safety 4. Civil protection 4.1. Peacetime and wartime emergencies 4.2. Organization of civil defense and protection of the population and territories from emergencies				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	4+16El	8+8EI	27	9	
ECTS Credits:			ECTS		
Assessment:		Pass/Fail	assessment		
		History			
Objectives:	The purpose of studying the discipline: to form students' comprehensive understanding of the cultural and historical originality of Russia, its place in world and European civilization; to give systematized knowledge about the basic laws and features of the world-historical process, with an emphasis on the study of the history of Russia; to introduce into the circle of historical problems related to the field of future professional activity, to develop skills for obtaining, analyzing and generalizing historical information.				
Content:	1. History as a science, theoretical foundations of the discipline (methodology, historiography, sources) 1.1. History in the system of social sciences and humanities. The basics methodology of historical science 1.2. Researcher and Historical Source 2. History of Russia and the world before the beginning of modern times 2.1. Features of the formation of statehood in Russia and the world 2.2. Russian lands in the XIII-XV centuries. and the European Middle Ages				

Teaching and learning methods: ECTS Credits:	2.3. Russia in the XVI-XVII ce 2.4. Russia and the World in t 3. Recent and contemporary t 3.1. Russia and the world in t 3.2. Russia and the world in t Lecture 4+8EI.	the 18th-19th Centuries: Anistory he 20th century he XXI century Practical training 8+16EI.	•		
Assessment:			assessment		
7.00000		Philosophy			
Objectives:	The purpose of studying the discipline: the formation of an idea about the specifics of philosophy as a method of cognition and spiritual development of the world, the main sections of modern philosophical knowledge, philosophical problems and methods of their research; development of skills of critical perception and assessment of sources of information, the ability to logically formulate, state and reasonably defend their own vision of problems and ways to resolve them; mastering the techniques of discussion, polemics, dialogue.				
Content:	1. Philosophy, its subject mat 1.1. Introductory lecture. The 2. Historical types of philosop 2.1. The emergence of philosop 2.2. Philosophy of the Middle 2.3. Philosophy of modern tim 2.4. German classical idealism 2.5. Non-classical philosophy 2.6. The main directions and 2.7. Russian philosophy of the 3. Problems of philosophy 3.1. The problem of being in p 3.2. Development philosophy 3.3. Philosophy of Consciousn 3.4. Epistemological problems 3.5. Philosophy of Science 3.6. Positivist and post-positiv 3.7. Social philosophy 3.8. Dynamics and typology of 3.9. Philosophical anthropological philosophy of Ianguage	subject of philosophy, the hy. Philosophical traditions ophy. Philosophy of the and Ages and Renaissance nes not tendencies of philosophy ire XIX-XX centuries philosophy ness of philosophy vist concepts in the method of historical development	s and modernity cient world In the XX century		

	4. Forms of control					
	4.1. Intermediate testing					
To a deim as a sed to a series as	4.2. Final exam					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	4+18El	8+18El	24	36		
ECTS Credits:		3 1	ECTS			
Assessment:		Exam	nination			
		Jurisprudence				
Objectives:		zation of students with the	of legal culture as a necessary c e basics of law and the formation			
Content:	 Foundations of the theory of state and law. Fundamentals of constitutional and municipal law. Basics of civil, family and inheritance law. Fundamentals of administrative and criminal law. Judicial system and law enforcement agencies. Fundamentals of labor relations. State regulation of professional activities. Legal basis for the protection of state interests, information, ecology. 					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	16	16	31	9		
ECTS Credits:		2 /	ECTS			
Assessment:		Pass/Fail	assessment			
	So	ciology and Psychology				
Objectives:	The purpose of studying the discipline: providing students with the necessary theoretical knowledge about society, its structure and elements, the social laws of its development, the social essence of the individual and social communities; getting an idea of the principles and requirements for the preparation of methods and the technique of conducting sociological research; gaining knowledge of the theoretical foundations of psychology, skills to reasonably and effectively apply existing and master new methods and models in solving problems of the professional field in the field of forecasting and understanding human behavior.					
Content:	 Sociology as a scientific dis Prehistory and socio-philos Russian sociological though 	ophical preconditions of so	categories ciology as a science. Classical so	ociological theories.		

	4. Contemporary sociological theories 5. Personality and society 6. Social groups and communities 7. Social inequality and stratification 8. Methods of sociological research 9. The history of the development of psychological knowledge. Psychology: subject, object and research me 10. The main directions in psychology 11. The mental warehouse of the personality. The main functions of the psyche. Development of the psyche in the process of ontogenesis and phylogenesis 12. Principles of organization and management in mental activity 13. Cognitive processes. Thinking and intelligence. Creation 14. Feeling. Perception. Representation. Imagination. Attention. Mnemic processes 15. Emotions and feelings. Communication and speech 16. Interpersonal relationships. Intergroup relationships and				
Teaching and learning methods:	interactions Lecture	Practical training	Independent study	Exam	
	16	32	60	36	
ECTS Credits:		4 /	ECTS		
Assessment:		Exam	nination		
		Physical Culture			
Objectives:	The purpose of studying the discipline: the formation of a personality with an active life position, independence in decision-making, a sense of responsibility, moral qualities, the ability to successfully socialize and the ability to apply various forms of physical culture and sports to maintain and strengthen health, improve the quality of life and the effectiveness of professional activity; ensuring an understanding of the social role of physical culture in the development of a personality and preparing it for professional activity; the formation of a motivational-value attitude to physical culture, the need for regular physical exercises, an attitude towards a healthy lifestyle; getting ideas about the mechanisms of adaptation of the body, about the impact of mental and physical stress on the human body; getting ideas about the mechanisms of adaptation of the body, about the impact of mental and physical stress on the human body; mastering a system of special knowledge, practical skills and abilities that ensure the preservation and strengthening of health, the formation of compensatory processes for the prevention of occupational diseases, the correction of existing deviations in the state of health, the development and improvement of psychophysical abilities, the formation of professionally significant qualities and personality traits; mastering the methodology for the formation and implementation of a complex of health-improving exercises for self-study, methods of self-control when performing physical activity, the rules of personal hygiene, a rational regime of work and rest; mastering the means and methods of counteracting unfavorable factors and working conditions, reducing fatigue in the process of professional activity and improving the quality of results; Obtaining				

	knowledge about the role and		nd sports in the development	of society as a whole: in the	
	world, country and region of residence.				
Content:	1. Theoretical section				
	1.1. Introductory lecture				
	1.2. The general concept of the		of physical culture		
	1.3. Socio-biological foundation				
	diagnostics and healthy lifesty				
	1.4. Independent motor activ				
	1.5. Means, forms and metho	ds of physical culture in			
	professional human activity				
	1.6. Sport is an integrative fa				
Teaching and learning	Lecture	Practical training	Independent study	Exam	
methods:					
	4+18El		41	9	
ECTS Credits:		2 <i>E</i>	ECTS		
Assessment:		Pass/Fail	assessment		
	Elective	e physical culture and sp	orts		
Objectives:	The purpose of studying the discipline: achievement and maintenance of the optimal level of physical fitness necessary for maintaining and strengthening health, stable performance and intensive work of students throughout the entire period of study, the formation of professionally significant qualities and personality traits; acquisition of personal experience of increasing motor and functional capabilities, providing general and professionally applied physical fitness; - improving the sportsmanship of students - athletes, the acquisition by students of the necessary knowledge on the basics of organizing sports training, preparation for work as public instructors, coaches and judges; understanding the social significance of physical culture and its role in personality development and preparation for professional activity; creation of a basis for creative and methodologically grounded use of physical culture and sports activities for the purpose of subsequent life and professional achievements; knowledge of the scientific - biological, pedagogical and practical foundations of physical culture and a healthy lifestyle; the formation of a motivational-value attitude to physical culture, an attitude towards a healthy lifestyle, physical improvement and self-education of the habits of regular exercise and sports; mastering a system of special knowledge, practical skills and abilities that ensure the preservation and strengthening of health, the formation of compensatory processes for the prevention of occupational diseases, the correction of existing deviations in health, the development and improvement of psychophysical abilities.				
Content:	1. Practical section				
Touching and learning	2. Independent work of stude		Indopondent study	Evam	
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	

		240	72	16		
ECTS Credits:			8 h.			
Assessment:		Pass/Fail a	assessment			
	Forei	ign language: basic cour	se			
Objectives:	everyday communication; co	The purpose of studying the discipline: practical knowledge of colloquial everyday speech for active use in everyday communication; confident use of the most common and relatively simple language means in the main types of speech activity: speaking, listening (listening), reading and writing; increasing the level of				
Content:	1. Personality, personal interests: travel, work and languages 1.1. Personality (personality traits, personality characteristics) 1.2. Travel and tourism (history, famous people) 1.3. Job (job description) 1.4. Learning foreign languages (ancient and modern languages) 2. Business life and education 2.1. Advertising (advertising history and modern advertising) 2.2. Business (modern business, famous business people) 2.3. Design (design history, modern design) 2.4. Education (educational systems of different countries) 3. Social life (experience of different countries) 3.1. Engineering (current trends) 3.2. Trends (history and current trends) 3.3. Art and the media (contemporary art, the role of the media in society).					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
		90+96EI	102	36		
ECTS Credits:			ECTS			
Assessment:	Pass/	Fail assessment / Pass/Fail	assessment / Graded assessr	ment		
	Foreign lang	juage: Vocational-oriento	ed course			
Objectives:	The purpose of studying the discipline: the use of a foreign language in everyday professional communication; translation and business correspondence in compliance with all norms of language equivalence; work with professional literature in order to obtain professional information.					
Content:	1. Career in the business wo 1.1. Building a career (education information) 1.2. Information (information) 1.3. Quality (concept of qua	ation and career) on systems and communication	ations)			

1.4 Feedback						
	•					
	Practical training	Indopondent study	Exam			
Lecture	Practical training	independent study	Lxaiii			
-	112	59	45			
	6 1	ECTS				
	Pass/Fail assessn	nent / Examination				
Manag	ement Seminar (in Engl	ish)				
The number of studying t	be dissiplined the form	ation of studental basis idea	a about approaches to			
the original language.	ramous personalities. Tra	ainees learn information in Eng	iish and study sources in			
1. Evolution of theory, tools	, methods and practices o	of management				
2. Changing the structure of	planning, organization, r	management and control				
3. Creation and presentation	of customer value	_				
4. Economic and financial an	alysis					
5. Human resources	•					
• •	,					
Lecture	Practical training	Independent study	Exam			
	J	, ,				
	1.0	0.3				
-			9			
Pass/Fail assessment						
	Maths					
The purpose of the disciplin	e: mastering by students	s the necessary mathematical	apparatus that helps to			
analyze, model and solve applied engineering and economic problems using, if necessary, computer						
technology; development of students' logical and algorithmic thinking; teaching techniques and solutions to						
mathematically formalized problems.						
	2.1. Increase in sales 2.2. Starting a new business 2.3. Financial control 2.4. Ethical trade Lecture Manag The purpose of studying to management used by world-the original language. 1. Evolution of theory, tools, 2. Changing the structure of 3. Creation and presentation 4. Economic and financial and 5. Human resources 6. Managerial roles and effect 7. Quantitative methods and 8. Operations and technology 9. New trends in theory, too management Lecture The purpose of the discipling analyze, model and solve technology; development of	2. Business and business problems 2.1. Increase in sales 2.2. Starting a new business 2.3. Financial control 2.4. Ethical trade Lecture Practical training - 112 Management Seminar (in Engle The purpose of studying the discipline: the form management used by world-famous personalities. Trathe original language. 1. Evolution of theory, tools, methods and practices of the original discipline and presentation of customer value and presentation of customer value are Economic and financial analysis and effectiveness and effectiveness and effectiveness and effectiveness and effectiveness and technology management and presentation of customer value are presented in theory, tools, methods and practice management and technology management and technology management analysis and technology; development of students' logical and algorithms.	2. Business and business problems 2.1. Increase in sales 2.2. Starting a new business 2.3. Financial control 2.4. Ethical trade Lecture			

Content:	 Linear algebra. Individual homework Vector algebra and analytic geometry. Verification work. Introduction to mathematical analysis. Verification work Differential calculus of a function of one variable. Test. Indefinite integral. Verification work. A definite integral. Individual homework. Differential calculus of functions of several variables. Test. Ordinary differential equations. Individual homework. 					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	74	74	140	72		
ECTS Credits:			ECTS			
Assessment:		Examination	/ Examination			
		Probability theory				
Objectives:	The purpose of the discipline knowledge, skills and abili characteristics and depende	ties to build and analyz	ze mathematical models th	nat reflect the properties,		
Content:	1. Random events 1.1. Algebra of events 1.2. The probability of the event. Combinatorial elements 1.3. Algebra of probabilities 2. Random variables 2.1. Discrete one-dimensional random variable 2.2. Continuous one-dimensional random variable 2.3. Two-dimensional random variables 2.4. Limit theorems of probability theory 3. Elements of mathematical statistics					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	30	30	48	36		
ECTS Credits:		4 /	ECTS			
Assessment:		Exam	ination			
		Ecology				
Objectives:	The purpose of studying the	disciplings the formation	of graduates of environme	antal thinking, which allows		

	them to reasonably and effectively apply environmental knowledge in solving both professional problems and in everyday life, to master new modern methods of environmental protection and ensuring environmental safety.				
Content:	1. Basics of general ecology 1.1. Introductory lecture 1.2. The subject and tasks of ecology. Biosphere, its structure and stages of development 1.3. Ecosystems and their structure. Ecosystem productivity 1.4. Environmental factors and their classification. Liebig's and Shelford's laws. Ecological niche concept 1.5. Regularities of ecosystem functioning 2. Fundamentals of Applied Ecology 2.1. The main environmental problems of our time and their causes 2.2. Basic approaches to environmental protection. Sanitary-hygienic and environmental regulation 2.3. Ecological foundations of rational nature management. Ecological economics. Environmental monitoring 2.4. Society and nature: interaction strategies				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	2+36EI	8	17	9	
ECTS Credits:			ECTS		
Assessment:		Pass/Fail a	assessment		
	Concep	ots of modern natural sci	ence		
Objectives:	The purpose of studying t specialists, forming in them phenomena at different hieranatural science picture of the thinking of future specialismodern technologies; enrich activities of future specialist	the foundations of a scie archical levels of organizate world; creation of prereq ets, familiarization with the ament and improvement of	ntific worldview, a holistic minor of matter, acquaintance uisites for the formation of in the natural science base of the methodology of scientification.	naterialistic view of natural with the generally accepted novative and technological modernization processes,	
Content:	1. Introduction. Subject and methodology of studying the discipline 2. Natural science in the context of human culture. Scientific method 3. The main stages of the development of natural science 4. The concept of determinism in classical natural science 5. Corpuscular and continual concepts of describing nature 6. Space and time in natural science 7. Statistical patterns in nature. Energy conservation law in macroscopic processes. The principle of increasing entropy. 8. Quantum representations in the description of the microworld				

	9. Structure of matter 10. What the World is Made of: Towards a Fundamental Theory of Matter 11. Evolutionary processes in the megaworld: the science of the universe 12. Evolution of the stars 13. Science of the earth 14. Fundamental properties of living matter			
	15. The biosocial nature of 1 16. Natural science and scie 17. Self-organization in anim	entific and technological pr		
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	2+30El.	16	15	9
ECTS Credits:			ECTS	
Assessment:		Pass/Fail a	assessment	
		Informatics		
Objectives:	objectives of the discipline for solving typical general susing the capabilities of university provide the basis for the trunderstand the importance mastering of subsequent spetthe development of students	are theoretical and practic scientific problems in theil versal packages of applied raining of future specialist of information security, a ecial disciplines of the curr s' creative abilities, the ab	tion technology for informatio cal development of informatio r professional activities by int computer programs; the discips in the field of modern informs well as create the necessary riculum; the study of the discipility to formulate and solve the dently improve their knowledg	n technologies and tools troducing and effectively bline "Informatics" should mation technologies who basis for the successful bline should contribute to e problems of the studied
Content:	1. Information and presenta 2. Hardware and software for 2.1. Hardware for the imple 2.2. Software tools for the i 3. Basics of algorithms and 4. Technologies for preparin 4.1. Reporting documentation 4.2. Technologies for preparin 5. Technologies for processi 6. Models for solving function 7. Basics of network techno	or the implementation of in- ementation of information per implementation of informal programming ng reporting documentation on preparation technologies ring presentation materials ing tabular information by onal and computational programs	processes tion processes n and presentation materials es s means oblems	

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	8	32+16El	43	45	
ECTS Credits:		4 1	ECTS		
Assessment:	Examination				
	Intro	oduction to the profession	on		
Objectives:	The purpose of studying the discipline: the formation of theoretical ideas and knowledge of students about the specific features of the professional activity of a specialist in the field of management; a comprehensive understanding of the specifics of the manager's work; mastering primary knowledge about the general foundations of management of social organizations, about management and the profession of a manager; formation and development of interest in the profession of a manager; mastering primary knowledge about the history of the formation and development of management science.				
Content:	1. Management as a special kind of activity 1.1. General characteristics of the profession of a manager and the direction "Management" 1.2. Manager and organization 2. Brief description of management development. Specific features of Russian and foreign management 3. Consideration of the professional and personal qualities of the manager of the organization 4. Organization management system 5. Making management decisions 6. Organizational culture 7. Features of the implemented profiles in the direction of training "Management" (bachelor level)				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	12	4	47	9	
ECTS Credits:		2 /	ECTS		
Assessment:		Pass/Fail	assessment		
		Microeconomics			
Objectives:	The purpose of studying the discipline: training specialists who are able to analyze and assess the state of economic processes, identify economic problems and find their effective solution at the level of individual economic entities, using a set of methods and tools of microeconomic analysis.				
Content:	1. Introduction to Microecon 1.1. Basic concepts, categor 1.2. Analysis of supply and 2. Theory of consumer beha 2.1. Consumer choice and d	omic Analysis ries and problems demand. Market equilibriu vior and market demand			

	2.3. Test work 1				
	3. Foundations of the theory	of production and costs			
	3.1. Theory of production and producer equilibrium 3.2. Manufacturer costs and profits				
	4. Competition and monopo	ly on commodity markets	for goods and services		
	4.1. Market supply in perfec	t competition			
	4.2. Market supply under m	onopoly conditions			
	4.3. Market supply in condit	ions of imperfect competi	ition: oligopoly and monopolist	cic competition	
	4.4. Test work 2				
	5. General economic equilib				
	5.1. General equilibrium the				
	5.2. Pareto efficiency and so				
Teaching and learning	Lecture	Practical training	Independent study	Exam	
methods:					
	32	32+16El	46	18	
ECTS Credits:			ECTS		
Assessment:		Graded a	assessment		
		Macroeconomics			
Objectives:	The purpose of studying the discipline: training specialists capable of analyzing and assessing the state of				
			vel; identify economic problem		
	solution, taking into account possible socio-economic consequences, using the apparatus of macroeconomic				
	theory.				
Content:	1. National economy as a sy	stem of macroeconomic t	ties		
	1.1. Introduction to Macroed				
	1.2. Key macroeconomic inc				
	2. Basic models of macroeco				
	2.1. Aggregate demand and aggregate supply. Model AD-AS				
	2.2. Equilibrium in the mark				
	2.3. Monetary system. Equil		ket. Model LM.		
	3. Test work 1				
	4. Macroeconomic instability and government regulation of the economy				
	4.1. Types and characteristics of macroeconomic cycles				
	4.2. Inflation: types, causes				
	economic consequences. Un				
	measurements, socio-econo				
	4.3. The economic growth	•			

	4.4. The main goals, tools and types of state regulation of the market for goods and the market for money5. Balance of payments and exchange rate6. Test work 2					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	32	32+16El	19	45		
ECTS Credits:		4 <i>E</i>	ECTS			
Assessment:		Exam	ination			
		Enterprise economy				
Content:	field of theory and practice of economic activity of the organization; to study the object and subject of enterprise management, factors of the external and internal environment of the enterprise, types of organizational and production structures, their characteristics; analyze the functional areas of activity and types of resources of the enterprise, the sequence of the economic analysis of the enterprise; to form an idea of the economic processes taking place at the enterprise and the economic tools for substantiating decisions in the field of organization management; to form the skills of economic analysis and calculation of indicators of production and economic activities of the enterprise. 1. Introduction to the economics of the enterprise.					
	1.1. Introductory lecture 1.2. The structure of the nat 1.3. Enterprise as a subject 1.4. Organizational-legal and 1.5. Production process, org 1.6. Principles, types and fo 1.7. Production program and 1.8. Knowledge control for s 2. Enterprise resources 2.1. Fixed assets. Fixed asse 2.2. Working capital of the e 2.3. Labor resources of the e 2.4. Enterprise costs 2.5. Knowledge control unde 3. Income, profit and profita 3.1. Revenue, profit, profita 3.2. Pricing policy of the ent 4. Fundamentals of enterprise	tional economy. Enterprise of entrepreneurial activity of organizational-economic anizational and productions of organization of production capacity of the ection 1 ets of the enterprise enterprise enterprise enterprise enterprise enterprise bility of the enterprise bility erprise	y c forms of entrepreneurial ac n structure of the enterprise oduction	ctivity		

Tooking and leaving	4.1. Fundamentals of Enterprise Management 4.2. Effect and efficiency. Methods for assessing economic efficiency. 4.3. Knowledge control according to section 3 and section 4.					
Teaching and learning methods: FCTS Credits:	Lecture	Practical training	Independent study	Exam		
	32+16El	32+16El	12	36		
ECTS Credits:		4 /	ECTS			
Assessment:		Examination / Settlemen	t and graphic work (SGW)			
		Management				
Objectives: Content:	The purpose of the discipline: the formation of a basic system of knowledge among students in the field of general theory of organization management; mastering modern methods and tools for building a management system of an organization and leadership of a labor collective, obtaining skills for their systematic use in the field of managing organizations.					
	2.2. Organizational relations 2.3. Types of organizational	ipline nization and organization nagement development, section management theo and its role in managing a nvironment of the organization of management of the management of the management of the organization	management chools of management ry in organization ration and tactics for achieving goals and functions of the head, of uncertainty and risk	the control function in		

	4.3. Conflict management in the organization 4.4. Leadership and leadership in management 4.5. Manager efficiency 4.6. Knowledge control under section 4					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	32+16El	32+16El	39	45		
ECTS Credits:		5 /	ECTS			
Assessment:		Exam	nination			
	Histo	ry of management thou	ght			
Objectives:	The purpose of studying the discipline: the formation of students' knowledge about the main stages and patterns of development of management thought, skills and abilities of critical analysis, selection and use of methods and means of various schools, and national management models for making organizational and managerial decisions					
Content:	1. The origin of management thought 1.1. Management thought of the Ancient World, the Middle Ages and the New Time 2. Genesis and main stages of development of management abroad 2.1. Sources of management thought of the 18th-19th centuries 2.2. The origin and formation of theories and schools of management (first half of the XX century.) 3. Domestic history of management thought 3.1. Formation and development of management in Russia 4. Modern management concepts 4.1. Features of national management models					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	16	16	31	9		
ECTS Credits:		I.	ECTS			
Assessment:		Pass/Fail	assessment			
		Marketing				
Objectives:	The purpose of studying the discipline: preparing students for the development of sound organizational and managerial decisions, taking into account their social significance, promoting their implementation in a complex and dynamic environment and assessing their consequences.					
Content:	1. Marketing environment. 1.1. Introduction to Marketin 1.2. Competition					

	2. Consumer behavior.				
	2.1. Consumer behavior of o	consumer goods			
	2.2. Consumer behavior in o	organizational (business)	markets		
	3. Marketing research	,			
	3.1. Quality marketing research				
	3.2. Quantitative marketing				
	4. Marketing complex.				
	4.1. Assortment and nomen	clature of goods and serv	ices of the enterprise		
	4.2. Product development	5	•		
	4.3. Brand, branding				
	4.4. Distribution				
	4.5. Pricing				
	4.6. Complex of marketing of	communications and adve	rtising		
	4.7. Personal sales manager	nent	_		
	4.8. Promotion of sales and	public relations			
	5. Marketing management				
Teaching and learning	Lecture	Practical training	Independent study	Exam	
methods:					
	32+16El	16+16El	64	36	
ECTS Credits:	3211011		ECTS	30	
Assessment:			ination		
		Accounting			
Objectives:	The purpose of studying the	e discipline: to form a bas	sic system of knowledge abou	ut accounting in students.	
			ell as skills and practical skil		
			egating and summarizing		
	statements, taking into acco	ount the world realities of	integration. and of a technol	ogical nature.	
Content:	1. Theoretical foundations o	f accounting			
	1.1. Organization of the acc	ounting process. Accounti	ng Regulations		
	1.2. Elements of the accoun				
	2. Accounting for enterprise	resources			
	2.1. Accounting for cash and	d cash documents. Accour	nting for financial investments	s	
			ets, intangible assets, R&D ex		
	2.3. Accounting for inventor				
			for compulsory pension, soc	cial and health insurance	
	settlements	3	. , , ,		
	3. Accounting for the costs of	of production and release	of finished products		
		•	the cost of products, works, s	services	

	3.2. Accounting for finished products 4. Accounting for settlement transactions 4.1. Accounting for settlements with buyers and customers. Accounting for settlements with suppliers contractors 4.2. Accounting for settlements with different debtors and creditors 4.3. Accounting for settlements on loans and borrowings. Accounting for earmarked funding 5. Accounting for the financial results of organizations. Capital accounting 5.1. Accounting for financial results from sales of products, works, services. Accounting for financial res from other income and expenses of the organization 5.2. Profit and loss accounting. Accounting for income tax calculations. Accounting for retained earnings reserve fund 5.3. Accounting for authorized capital. Additional capital accounting 6. Accounting financial statements 6.1. General principles for the preparation of accounting financial				
	Reporting 6.2. Characteristics of the fo				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16+16El	32+16El	55	45	
ECTS Credits:		5 <i>L</i>	ECTS		
Assessment:		Examination / Settlemen	t and graphic work (SGW)		
		Statistics			
Objectives:	The purpose of the disciplir statistical methods for obta choose the directions and m	ining and analyzing informethods of data analysis fo	mation, who are able to independent decisions.	ependently and reasonably sions.	
Content:	 Subject and methodology Methods for the analysis Selective observation Statistical methods for st Methods of time series ar Index method of analysis Macroeconomic indicators Statistics of national wea Statistics of money circul Labor statistics Population statistics 	of empirical distributions udying relationships nalysis s in the system of nationa Ith	I accounts	ators	

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	16+16El	32+16El	28	36		
ECTS Credits:		4 <i>E</i>	ECTS			
Assessment:		Examination				
		Finance and credit				
Objectives:	The purpose of studying the discipline: professional preparation of a graduate to solve computational, analytical, research; organizational and managerial, production, entrepreneurial tasks in the field of finance, money circulation and credit					
Content:	 Money and its role in financial relations Foundations of the general theory of finance Finances of economic entities in various fields of activity World financial system Credit and its role in the economy Credit intermediation. Banks Lending instruments 					
Teaching and learning methods:	Lecture 32	Practical training 16+16EI	Independent study 53	Exam 27		
ECTS Credits:	32	I.		27		
Assessment:			ination			
	ı	inancial management				
Objectives:	and master new methods o activities; who are able to e models and justify the need	The purpose of studying the discipline: to form specialists who can reasonably and effectively apply existing and master new methods of financial management of a company in accordance with the specifics of their activities; who are able to economically competently explain the essence of the used financial methods and				
Content:	1. Introduction. Fundamental principles of financial management 2. The theory of cash flow and the time value of money 3. Risk and return 4. Price, capital structure 5. The concept of leverage in enterprise capital management 6. Business valuation 7. Profit distribution policy					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		

	16+16El.	30+2CW+ 16El.	60	40		
ECTS Credits:	5 ECTS					
Assessment:		Examination / C	Course paper			
	N	lanagement Accounting				
Objectives:	methodology and organizat from management accounti	The purpose of studying the discipline: to form in future specialists a system of knowledge on the methodology and organization of management accounting, as well as practical skills in using information from management accounting to make informed management decisions.				
Content:	1. Introduction to managem 1.1. Goals, objectives, mai management system. Comp 1.2. Costs are the main obj 1.3. Cost structure by frequ 1.4. Classification of costs in 1.5. Classification of costs in 1.6. Classification of costs in 1.7. Cost structure by man options 1.8. Test work for section 1.2. Classification of management costs 2.1. Organizational aspects classification of management by responsibility centers. The 2.2. Management accounting (absorption / fullcosting) 2.3. Activity-based costing 2.4. Limited cost control sy 2.5. Test work for section 2.3. Classification of management accounting and costing 3.2. Custom-made method accounting and the scope of Percentage method of cost 3.3. The essence of the region accounting, planning and	nent accounting. Costs as the sections of the course. May carative characteristics of finect of management accounting ency of occurrence and econory cost items by the way they are assigned in relation to the volume of pagement functions, regulated ment accounting systems: of management accounting the concept and types of resping systems by the method system as an enterprise market (directcosting / margin ement accounting systems by the methods of cost accounting and the fits use. accounting and the scope of ulatory accounting system. For a cost control.	e main object of manage anagement accounting a ancial and management ng. Essence and classification of elements of to a cost object oroducts and unregulated cost classification of systems of grouping costs management tool. alcosting) by cost accounting methods use Regulatory accounting an accounting and accounting accounting and accounting and accounting accounting accounting and accounting ac	nd its role in the enterprise accounting		

	4.1. Basics of planning and 4.2. Development of the ma and types of products (proje 4.3. The process of makin	budgeting ain budget. Development c ects)	ne management decision making of budgets by centers of respore. Providing relevant informations.	nsibility, functional areas	
	management decisions. 4.4. Procedure and criteria to 4.5. Procedure and criteria to 4.6. Management accountin	for making long-term mar			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	32+16El	16+16El	28	36	
ECTS Credits:		4 1	-CTS		
Assessment:		Exam	ination		
	:	Strategic management			
	of its development, schools of strategic management; to form an understanding of the main state process of developing and making strategic decisions; study various aspects of business integ diversification in modern market conditions, as well as the main components of the organization's strategy aimed at creating sustainable competitive advantages, taking into account the dynamics factors; master the methods and tools for the formation and implementation of enterprise strategic position of an enterprise in the market, ide competitive advantages				
Content:	1. Theoretical and methodol 1.1. Introduction to the disc 1.2. The history of the formanagement Schools 1.3. Strategic management 2. Strategic analysis 2.1. Strategic analysis of th 2.2. Strategic analysis of th 2.3. Organization goals sett 3. Development of the organ 3.1. Classification of strategic 3.2. Corporate and collectiv 3.3. Business-level strategic	cipline ormation and development cycle e organization's external of e internal environment of ing nization's strategy gies and their relationship e strategies	nt of strategic management of strategic management of strategic management of strategic management of strategic	and planning. Strategic	

Teaching and learning methods: ECTS Credits:	4. Methods for the formation and implementation of the strategy 4.1. Methods for Developing Strategic Alternatives 4.2. Risks and strategic choices 4.3. Strategy implementation process Lecture Practical training Independent study Exam 32 32 44 36 4 ECTS						
Assessment:		Exam	ination				
	Pı	roduction management					
Objectives:	The purpose of the discipline: the formation of a basic system of knowledge among students in the field of management of an industrial organization (enterprise, firm, corporation), mastering modern methods and tools for the effective integrated use of all resources of an industrial organization and increasing production efficiency through the rational organization of production processes in time and space, strengthening human resources, widespread use of digital technologies; mastering the practice of their use by foreign and domestic industrial enterprises in modern economic conditions.						
Content:	efficiency through the rational organization of production processes in time and space, strengthening human						

	4.2. Linking corporate and operational business strategies of an enterprise 4.3. Operational production planning systems 4.4. The concept of creating an integrated automated production control system				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16+16El	16+32El	28	36	
ECTS Credits:		4	ECTS		
Assessment:		Exan	nination		
	Adva	nced manufacturing techn	ology		
Objectives:	The purpose of studying the discipline: the acquisition by students of knowledge about the current level and prospects for the development of advanced production technologies in Russia and the world, as well as the effectiveness of their use in solving technological problems of production development.				
Content:	effectiveness of their use in solving technological problems of production development. 1. The concept of advanced manufacturing technologies. Prospects for the development of advanced production technologies in Russia and the world. 2. Computer Engineering, High Performance Computing. Optimal design. Bionic design. 3. Traditional and modern construction materials. Production of modern construction materials. 4. Technologies of modern production (subtractive technologies (metal cutting, electrical erosion), Additive technologies, Casting technologies, Reverse engineering). 5. Modern robotic systems and complexes, prospects for smart automation of production (Sensorics, Human-machine interface) 6. Organization of production of the future. Digital factories, smart factories, virtual factories 7. Modern media technologies. MediaNet as one of the high-tech markets under the National Technology Initiative. 8. Aerospace engineering and technology. Development of the aviation and rocket and space industries. AeroNet as one of the high-tech markets under the National Technology Initiative. 9. Modern technological trends in the automotive industry. AutoNet as one of the high-tech markets under the National Technology Initiative. 10. Features and global trends in world shipbuilding. MaryNet as one of the high-tech markets under the National Technology Initiative 11. Modern technologies for the production of micro and nano electronics (production of electronic component base, MEMS) 12. Current trends in the energy industry (reducing the energy intensity of production, alternative energy sources in production, transmission and storage of energy). EnergyNet as one of the high-tech markets under the National Technology Initiative. 13. Application of modern information and digital technologies, as well as robotic systems in medicine. HealthNet, as one of the high-tech markets within				

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16	16	31	9
ECTS Credits:		2 <i>E</i>	ECTS	
Assessment:		Pass/Fail	assessment	
	Digi	tal Industry Technologie	es	
Objectives:	The purpose of studying the discipline: to acquaint students with modern technologies of the digital industry and models of their optimal application in the framework of professional activities; to provide listeners with information about modern research trends in various fields of knowledge that form modern digital technologies of the industry; help students to form a general understanding of the contribution of SPbPU Institutes, as well as the University as a whole, to scientific and technological development both within the Russian Federation and abroad; assistance in career guidance, allowing future specialists to determine the area of professional interests and research activities			
Content:	area of professional interests and research activities. 1. Introductory (installation) lecture 2. World trends in the development of the digital industry. National Technology Initiative. NTI Markets 3. Direction "Technet" (advanced production technologies) of the National Technology Initiative. Megaproject "Factories of the Future". Digital industry. 4. Roadmap for the development of "end-to-end" digital technology "New production technologies" (within the framework of the federal project "Digital Technologies" of the national program "Digital Economy of the Russian Federation"). 5. Digital design and modeling (Smart Design). Digital twins and digital shadows 6. High performance computing. HPC. 7. Robotics and sensorics. Industrial Internet. 8. Technologies of wireless communication. 9. Quantum technologies. 10. Distributed ledger systems. 11. Big data. Machine learning. Artificial Intelligence. Neurotechnology 12. Technologies of virtual and augmented reality. 13. Laser technologies. Photonics. 14. Renewable energy sources. New energy. Implementation of end-to-end digital technologies using the example of the spheres - construction (BIM)			
Teaching and learning methods:	technologies) and medicine Lecture	Practical training	Independent study	Exam
	2+14El	16El	36	4
ECTS Credits:	27141		ECTS	
LCID CIEUICS.	Pass/Fail assessment			

	Informa	tion systems and techno	logies	
Objectives:	The purpose of studying the discipline: to acquaint students with the role, purpose, capabilities and functionality of modern information systems and technologies; to acquaint with the basic information technologies used in modern corporate information systems; teach to understand and be able to apply the basics of enterprise architecture modeling.			
Content:	 The role and place of information systems and technologies in the management of the organization. Economic information systems. Information technology. 			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16	32	24	36
ECTS Credits:			ECTS	
Assessment:		Exam	ination	
	Mai	nagement documentation	n	
Content:	functioning of a modern enterprise; formation of a system of theoretical information and practical knowledge on the preparation, editing and subsequent processing of documents, taking into account the requirements of the current Russian legislation. 1. Documentation			
	1.1. The concept of docume 1.2. Requisites of organizati 1.3. Requirements for the d information documents 1.4. Business letters: classif 1.5. Requirements for regist 2. Document flow 2.1. Organization of docume municipal structures 2.2. The procedure for proce 2.3. Electronic document ma 2.4. Confidential proceeding 3. Archiving 3.1. Basic concepts of arch October 4, 2014). Standard	ional and administrative design of administrative and fication, design, work with tration of personnel docurrent flow in state and essing incoming, outgoing anagement gs niving. Law 125-FZ of Ocand departmental lists of	n text nents and internal documents tober 27, 2004 "On archival a	affairs" (as amended on

	3.3. Preparing for archival storage. Storage and destruction of documents				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	8	16+8El	31	9	
ECTS Credits:		2	ECTS		
Assessment:		Pass/Fail	assessment		
	Mathematical mo	ethods in economics and	d management		
Objectives:	The purpose of the discipline: to study the foundations of mathematical methods in economics, necessary for the organization and successful conduct of research, production, economic, commercial and financial activities of an enterprise (organization); training in the effective application and justification of the use of existing methods for solving management problems; development of students' rational-logical style of thinking in assessing and forecasting economic processes.				
Content:	Theory of linear optimization Multi-criteria optimization Non-linear optimization				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16+16El.	32	80	36	
ECTS Credits:	5 ECTS				
Assessment:	Examination / Settlement and graphic work (SGW)				

Operations research

Objectives:	The purpose of the discipline: to study the foundations of mathematical methods in economics, necessary for the organization and successful conduct of research, production, economic, commercial and financial activities of an enterprise (organization); training in the effective application and justification of the use of existing methods for solving management problems; development of students' rational-logical style of thinking in assessing and forecasting economic processes.			
Content:	 Theory of linear optimization Multi-criteria optimization 			
	3. Non-linear optimization	<u> </u>		
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16+16El.	32	80	36
ECTS Credits:	5 ECTS			
Assessment:	Examination / Settlement and graphic work (SGW)			

	Hum	an Resource Manageme	nt	
Objectives:	The purpose of studying the discipline: the formation of a basic system of knowledge and certain practical skills in the field of theory and practice of human resource management in students, allowing future managers to form the ability to make effective personnel decisions at enterprises or organizations.			
Content:	1.Theoretical foundations of human resource management 2. The concept and systems of human resource management. 3. The concept and typology of the organization's personnel policy. 4. Legal framework for human management 5. Recruitment strategy 6. Onboarding new employees in the organization 7. Personnel appraisal system 8. Professional training and personnel development 9. The system of motivation and incentives for personnel. 10. Evaluation of the effectiveness of the use of human resources. 11. Socio-economic assessment of the effectiveness of personnel activities in the organization.			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16+16 El	16+16 El	53	27
ECTS Credits:			ECTS nination	
Assessment:	Hum		nt in International Compa	nies
Objectives:	The purpose of studying the discipline: the formation of a basic system of knowledge and certain practical skills in the field of theory and practice of human resource management in students, allowing future managers to form the ability to make effective personnel decisions at enterprises or organizations.			
Content:	1.Theoretical foundations of 2. The concept and systems 3. The concept and typology 4. Legal framework for hum 5. Recruitment strategy 6. Onboarding new employe 7. Personnel appraisal syste 8. Professional training and 9. The system of motivation 10. Evaluation of the effecti	of human resource mana of the organization's per an management es in the organization m personnel development and incentives for person	ngement. rsonnel policy. nnel.	

11. Socio-economic assessment of the effectiveness of personnel activities in the organ				
Lecture	Practical training	Independent study	Exam	
16+16 El	16+16 El	53	27	
	4 .	ECTS		
	Exam	nination		
	International Business			
The purpose of the discipline: the formation of students' practical skills and abilities that allow them to make decisions in a specific environment of international business; formation of a set of theoretical knowledge in the field of organizing international business processes; assimilation of modern theories of international trade and foreign direct investment, their most important mechanisms and methods.				
World Markets International business environment International Business Management				
Lecture	Practical training	Independent study	Exam	
32	48	37	27	
4 ECTS				
Examination				
Busine	ess in the context of global	ization		
The purpose of the discipline: the formation of students' practical skills and abilities that allow them to make decisions in a specific environment of international business; formation of a set of theoretical knowledge in the field of organizing international business processes; assimilation of modern theories of international trade and foreign direct investment, their most important mechanisms and methods.				
1. World Markets				
2. International business environment				
3. International Business Management				
	The purpose of the discip decisions in a specific en the field of organizing inte and foreign direct investromational business 3. International business 4. Management functions Lecture 32 Busine The purpose of the discipling decisions in a specific environment of the discipling decisions and decisions in a specific environment of the discipling decisions and decisions are decisi	Lecture Practical training 16+16 El 16+16 El 4 Exam International Business The purpose of the discipline: the formation of studer decisions in a specific environment of international business processe and foreign direct investment, their most important of 1. World Markets 2. International business environment 3. International Business Management 4. Management functions in international business Lecture Practical training Business in the context of global The purpose of the discipline: the formation of students decisions in a specific environment of international business field of organizing international business processes; assis foreign direct investment, their most important mechanical formational business environment 1. World Markets 2. International business environment	Lecture Practical training Independent study 16+16 El 16+16 El 53 4 ECTS Examination International Business The purpose of the discipline: the formation of students' practical skills and abilities decisions in a specific environment of international business; formation of a set of the field of organizing international business processes; assimilation of modern theor and foreign direct investment, their most important mechanisms and methods. 1. World Markets 2. International business environment 3. International Business Management 4. Management functions in international business Lecture Practical training Independent study 32 48 37 4 ECTS Examination Business in the context of globalization The purpose of the discipline: the formation of students' practical skills and abilities that decisions in a specific environment of international business; formation of a set of theore field of organizing international business processes; assimilation of modern theories of in foreign direct investment, their most important mechanisms and methods. 1. World Markets 2. International business environment	

	4. Management functions	s in international business				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	32	48	37	27		
ECTS Credits:		4	ECTS			
		Quality management				
Objectives:	professional skills of m	The purpose of the discipline: training a bachelor in the direction 38.03.02 "Management" practical professional skills of managing an organization (enterprise) in accordance with the requirements of the educational standard and the formation of knowledge and skills in the field of quality management of				
Content:	 Quality management: basic concepts and categories of management Legal and regulatory framework for quality management State regulation in the field of quality Confirmation of the conformity of products, works, services and management systems to the established requirements Modern methods and tools of quality management Models for assessing the performance of organizations in the field of quality Quality and competitiveness Historical overview of the role of quality 					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	16	32	60	36		
ECTS Credits:			ECTS			
Assessment:		Exan	nination			
	Interna	tional quality management	standards			
Objectives:	The purpose of the discipline: training a bachelor in the direction 38.03.02 "Management" practical professional skills of managing an organization (enterprise) in accordance with the requirements of the educational standard and the formation of knowledge and skills in the field of quality management of enterprises.					
Content:		: basic concepts and categori framework for quality manag ne field of quality				

	requirements 5. Modern methods and	tools of quality management the performance of organizativeness		stems to the established
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16	32	60	36
ECTS Credits:		4	ECTS	
Assessment:		Exar	nination	
		Entrepreneurship		
Objectives:	The purpose of studying the discipline: to form specialists who understand the characteristics of legal entities of various organizational and legal forms, the procedure for their establishment and registration, reorganization and liquidation, the basics of their activities, as well as organizational issues of privatization of state and municipal enterprises, bankruptery of legal entities, and individual enterprises.			
Content:	of state and municipal enterprises, bankruptcy of legal entities and individual entrepreneurs. 1. Business relationship 1.1. The essence of entrepreneurship and its types 1.2. Commercial organizational and legal forms of legal entities 1.3. Non-commercial organizational and legal forms of legal entities. Forms of association of legal entities 2. Organization of entrepreneurship 2.1. Establishment, registration and fundamentals of activities of legal entities 2.2. Insolvency (bankruptcy) 3. The concept and content of entrepreneurship 3.1. Introduction to entrepreneurship 3.2. The essence of entrepreneurship and its types 4. Basics of Law of Obligations 4.1. Obligations. Transactions 4.2. General provisions on the contract. Calculations 5. Business contracts 5.1. Contract of sale. Lease contract 5.2. Work agreement. Shipping. Loan 5.3. Mediation and other contracts			

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16	32+10CW	64	22	
ECTS Credits:		4 1	ECTS		
Assessment:		Graded assessme	ent / Course paper		
	Ма	rketing communications	;		
Objectives:	The purpose of the discipline: getting students of theoretical knowledge and practical skills in the field of planning a complex of integrated marketing communications, consisting of advertising, sales promotion, public relations, personal sales; development of advertising messages and organization of production of advertising products; choice of means of communication and media planning; definition and distribution in various areas of the budget for marketing communications; evaluating the effectiveness of marketing communications				
Content:	1. Complex of marketing communications 1.1. Characteristics of the marketing communications complex 1.2. Participants in the marketing communications process 2. Development and production of promotional products 2.1. Development of communication messages 2.2. Advertising production 3. The choice of means of communication and the basics of media planning 3.1. Characteristics of the means of communication 3.2. Basics of media planning 4. Marketing communications management 4.1. Determining the budget and monitoring the effectiveness of marketing communications 4.2. Planning a complex of integrated marketing communications 4.3. Promotion of sales and public relations in a complex of integrated marketing communications				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	32	32+16CW	24	40	
ECTS Credits:	4 ECTS				
Assessment:	Examination / Course paper				
		Basics of logistics			
Objectives:	The purpose of studying the to master new tools, method are able to correctly explain effectiveness of their use.	ls and models of transport	t, production, warehouse and	d distribution logistics; who	

Content:	1. Organization of the logist	ics system at the enterpr	ise		
	2. Production logistics				
	3. Transport and warehouse	logistics			
	4. Purchasing logistics	_			
	5. Planning in logistics				
	6. Ensuring the logistics pro	cess			
Teaching and learning	Lecture	Practical training	Independent study	Exam	
methods:					
	32	32	35	45	
ECTS Credits:	32		ECTS	13	
Assessment:			nination		
	Analysis a	and costs planning in ma	arketing		
Objectives:			ialists with competencies in a		
			results of its activities. Stu		
			nalysis and control of market		
		assessing marketing costs, predicting the economic results of marketing activities, calculating the financial			
	efficiency of an enterprise's				
Content:	1. The concept of costs in m				
	1.1. Classification and types				
	1.2. Methods for determining	g marketing costs			
	2. Marketing planning.				
	2.1. Strategic analysis and planning				
	2.2. Development of an operational marketing plan				
	3. Marketing budgeting.				
	3.1. Marketing budgeting				
	3.2. Control and analysis of the marketing activities of the enterprise.				
	4. Evaluation of the effectiveness of marketing.				
	4.1. The concept and types	of performance assessme	ent in marketing		
	4.2. Cost-benefit analysis of marketing activities.				
Teaching and learning	Lecture Practical training Independent study Exam				
methods:					
	2	78	46	18	
ECTS Credits:	4 ECTS				
Assessment:	Graded assessment / Settlement and graphic work (SGW)				
		<u>.</u>	<u> </u>		
	Information	n support for business p	processes		

Objectives:	The purpose of the discipline: mastering the methods of organizing information services for an enterprise and assessing information needs, studying modern information technologies and information, software and tools that support these methods; empowering students with knowledge about the information systems used at enterprises that support the most important business functions of the enterprise, their capabilities and implementation problems as part of the implementation of an enterprise architecture project, as well as the organization of their effective operation to achieve the set business goals; mastering the methods and techniques for assessing the economic efficiency of IT projects and approaches to using these techniques in practical calculations.				
Content:	 Management of information resources at the enterprise. Economic information and information needs Information service and information management in the company. Information infrastructure of the enterprise. Types and classification of information systems, their composition and structure. The emergence and development of concepts and standards of information systems for enterprise management enterprise management. Basic principles and structure of MRP / ERP systems. Types and classes of integrated (corporate) systems (CIS). Characteristics, types and purpose of systems of class MRPII Information systems that support pre-production processes. Supplier relationship management information systems. Information systems for the management of supply chains of material resources. Information systems for planning and production management Information systems for managing relationships with customers (buyers) Information systems for managing costs and budgets. Analytical information systems 				
Teaching and learning methods:	17. Methods and approaches Lecture	Practical training	Independent study	Exam	
methods.	16	48	44	36	
ECTS Credits:	48 44 36 4 ECTS				
Assessment:	Examination				
		Marketing research			
Objectives:	their place in marketing acti used in MR; about the main	vities, the main methods causes of errors in the	ut the goals and objectives of of obtaining marketing informates research results; about typicates task on the basis of a mana	nation, the main methods II MR tasks, MR hardware	

Content:	information processing in th get an idea of the trends in t between the MR and relate	e MR; evaluate the magn he development of MR med sciences: psychology, sonnaires of various kinds rketing information on the of MR rch problem	arch methods in practice, use the litude of the MR errors and option of the MR errors and option of the present seconology, statistics, economics; conducting surveys using qual on the literate.	mize their magnitude; to stage; on the relationship s, management; get the
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	16	32	24	36
ECTS Credits:		3 .	ECTS	
Assessment:	Examination			
	Forec	asting methods and mod	dels	
Objectives:		asting methods and practi	ire specialists knowledge and ui ical skills in building models and	
Content:	1.1. Basic concepts, categor data and the choice of forec 2. Naive forecasting method	ries, classifications. Study asting method ls, moving averages, expethods, moving average ethods, moving average es-sectional data models ection and quality assessence intervals election of factors, quality et confidence intervals ed on time series casting	onential smoothing methods es, simple exponential smoot ment of models,	

	Forecasting process manage	ement			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16	16	32	8	
ECTS Credits:		2 /	ECTS		
Assessment:		Pass/Fail	assessment		
	Distrib	bution channel managen	nent		
Objectives:	The purpose of studying the discipline: to form specialists who understand the existing and are ready to master new principles and approaches to building and improving distribution channels both in the Russian Federation and abroad, as well as those who have the ability to use the basic tools, methods and models for assessing distribution channels used by industrial enterprises and justify the effectiveness of their use.				
Content:	 Basic concepts of distribution Concept, goals, objectives and distribution functions Organization of distribution channels Outsourcing operations in distribution The choice of intermediaries and their main characteristics Mediators. Outsourcing Management and organization of the distribution of products of the enterprise Commodity management Order management Entering new sales markets. Working with distributors Stocks and supplies 				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	2	46	33	27	
ECTS Credits:			ECTS		
Assessment:	Examination				
		Interactive Marketing			
Objectives:	The purpose of studying the discipline: to form knowledge and skills about methods of product promotion using interactive marketing methods; use various communication methods when promoting a product.				
Content:	2. Online interactive market 2.1. Email marketing	 Concept and components of interactive marketing Online interactive marketing Email marketing Promotion in messengers 			

	3. Offline interactive marketing 3.1. Event marketing 3.2. Interactive sales promotion 3.3. Experience Marketing				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	32	32	17	27	
ECTS Credits:		3 <i>L</i>	ECTS		
Assessment:		Exam	ination		
	Internat	ional Marketing Manage	ement		
Objectives:	The purpose of the discipline: to form specialists in the field of international marketing who are able to choose and use tools and methods for managing marketing in foreign markets. In particular, the discipline allows students to acquire theoretical knowledge and practical skills in the study and analysis of the socio-cultural environment, the specifics of marketing research in foreign markets, marketing management in multinational companies, strategic marketing in foreign markets and the entry of organizations into foreign markets.				
Tooching and looming	1. The essence of international marketing management 1.1. Globalization of the world economy as a prerequisite for the development of international marketing 1.2. International Marketing Management Environment 2. Information support of decision making in international marketing 2.1. International marketing research 2.2. Features of segmentation, selection of foreign markets and positioning 3. Opportunities for entering foreign markets 3.1. Ways to enter and consolidate in foreign markets 3.2. Foreign direct investment and activities of transnational corporations 4. International Marketing Management 4.1. Commodity and pricing policy in foreign markets 4.2. Marketing communications and distribution of goods in international markets 4.3. Essence of International Marketing and International Product Management				
Teaching and learning Lecture Practical training Independent study Examples of the study and learning Lecture Practical training Lecture Examples of the study Lecture Practical training Independent study Lecture Examples of the study Lecture Practical training Independent study Lecture Examples of the study Lecture Practical training Independent study Lecture Lecture Practical training Independent study Lecture Lecture Practical training Independent study Lecture Le					
	2	34	9	27	
ECTS Credits:	2 ECTS				
Assessment:	Examination				
	•	Strategic Marketing			
Objectives:	The purpose of the discipl		ents basic theoretical kno	wledge about models and	

	approaches in strategic marketing, the marketing management system, the principles and methodology of the marketing management process in an industrial enterprise; the formation of strategic thinking. The discipline helps to form specialists who understand the existing ones and are ready to master new tools, methods and models of strategy development, planning and marketing management at enterprises of various directions and fields of activity.				
Content:	1. Basic concepts of marketing management 1.1. Strategic Marketing Management 1.2. Marketing management at the instrumental level 2. Functional connections of marketing in enterprises 2.1. Marketing Management Organizational Structures 2.2. Enterprise Marketing Functions 3. Strategic marketing planning in enterprises 3.1. Strategic Marketing Alternatives 3.2. Positional strategies 3.3. Marketing plan				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	22	33	17	36	
ECTS Credits:			ECTS		
Assessment:		Exam	nination		
		Educational foresight			
Objectives:	modern educational process	, the use of educational armodern methods of build	of an idea of the practice of unalytics to assess the progress ding an educational trajector ducational process.	s of one's own educational	
Content:	educational platforms. 2.1. Features of courses how 3. Independent study of an 3.1. Choosing a course for s	and educational resources of platforms e resources hosted on operated on various educations online resource. Mandato self-study. Its of an online resource to e course into the education online resource	e: definition and types pen educational platforms. A al platforms. ry study of a resource posted o demonstrate the progress of	on a foreign platform.	

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	6	-	327	27		
ECTS Credits:			ECTS			
Assessment:	Pass/Fail assessment / Pass/Fail assessment / Pass/Fail assessment					
		Career adaptability				
Objectives:	The purpose of studying the discipline: the formation of an idea of the practice of using online learning in the modern educational process, the use of educational analytics to assess the progress of one's own educational process, the disclosure of modern methods of building an educational trajectory to empower students. Exploring the specific uses of online courses in the educational process.					
Content:	 Basic concepts and definitions of e-learning and online learning 1.1. Electronic information and educational resources: definition and types 1.2. Overview of educational platforms 2. Acquaintance with online resources hosted on open educational platforms. Acquaintance with foreign educational platforms. 2.1. Features of courses hosted on various educational platforms. 3. Independent study of an online resource. Mandatory study of a resource posted on a foreign platform. 3.1. Choosing a course for self-study. 4. Passing intermediate tests of an online resource to demonstrate the progress of the study of the material 4.1. Integration of an online course into the educational process. 5. Work on the forum of an online resource 					
	5.1. Communication in the online space.					
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam		
	6	-	327	27		
ECTS Credits:	10 ECTS					
Assessment:	Pass/Fail assessment / Pass/Fail assessment					
	Practice for obtaining	ng primary professional s	skills and abilities			
Objectives:	The purpose of studying the knowledge, skills and abilit		rried out in order to form ar of theoretical training, as w			

knowledge, skills and abilities obtained as a result of theoretical training, as well as to study p experience, acquire organizational skills and form a system of key competencies; the purpose of the		experience, acquire organizational skills and form a system of key competencies; the purpose of educational practice is to deepen the knowledge gained in the process of theoretical training and the acquisition of the necessary professional skills and abilities in accordance with the chosen direction of training.					
Teaching and learning methods: Content:	Content:	1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report.					
### CTS Credits: Assessment: Practice for obtaining professional skills and professional experience The purpose of studying the discipline: practice is carried out in order to form and consolidate professional experience, acquire organizational skills and form a system of key competencies; the purpose of the practice is to gain practical experience, including independent activity at the enterprise (in the organizational skills and (or) spheres of professional activity. ### Content: 1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Exam							
Practice for obtaining professional skills and professional experience The purpose of studying the discipline: practice is carried out in order to form and consolidate professional experience, source organizational skills and form a system of key competencies; the purpose of the practice is to gain practical experience, including independent activity at the enterprise (in the organizational skills and form a system of key competencies; the purpose of the practice is to gain practical experience, including independent activity at the enterprise (in the organizational competencies in the fields and (or) spheres of professional activity. Content: 1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Exam		-	-	72	-		
Practice for obtaining professional skills and professional experience The purpose of studying the discipline: practice is carried out in order to form and consolidate professional experience, skills and abilities obtained as a result of theoretical training, as well as to study practice is to gain practical experience, including independent activity at the enterprise (in the organizational experience, including independent activity at the enterprise (in the organizational experience) in the fields and (or) spheres of professional activity. Content: 1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Exam	ECTS Credits:		2.1	ECTS			
The purpose of studying the discipline: practice is carried out in order to form and consolidate processing of the practice is carried out in order to form and consolidate processing of regulatory, industrial and technological information. Teaching and learning The purpose of studying the discipline: practice is carried out in order to form and consolidate processing of the practice is to gain practical experience, including independent activity at the enterprise (in the organ and competencies in the fields and (or) spheres of professional activity. 1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Examples and the practical training Independent study Examples are study and the practical training Independent study Examples are study and the practical training Independent study Examples are study and the practical training Independent study Examples are study and the practical training Independent study Examples are study and the purpose of the practical training Independent study Examples are study and the process of the practical training Independent study Examples are study and the process of the practical training Independent study Examples are study and the purpose of the practical training Independent study I	Assessment:		Pass/Fail	assessment			
knowledge, skills and abilities obtained as a result of theoretical training, as well as to study p experience, acquire organizational skills and form a system of key competencies; the purpose of the practice is to gain practical experience, including independent activity at the enterprise (in the orga and competencies in the fields and (or) spheres of professional activity. 1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Exam		Practice for obtaining pr	rofessional skills and pro	ofessional experience			
1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation). Teaching and learning Lecture Practical training Independent study Exam	Objectives:	The purpose of studying the discipline: practice is carried out in order to form and consolidate professional knowledge, skills and abilities obtained as a result of theoretical training, as well as to study production experience, acquire organizational skills and form a system of key competencies; the purpose of the industrial practice is to gain practical experience, including independent activity at the enterprise (in the organization)					
Teaching and learning Lecture Practical training Independent study Exam	Content:	 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 					
				Independent study	Exam		
252 -		_	_	252	_		

ECTS Credits:		7 E	ECTS	
Assessment:	Pass/Fail assessment/ Pass/Fail assessment			
	ι	Indergraduate practice		
Objectives:	The purpose of studying the discipline: practice is carried out in order to form and consolidate professional knowledge, skills and abilities obtained as a result of theoretical training, as well as to study production experience, acquire organizational skills and form a system of key competencies; the purpose of educational practice is to deepen the knowledge gained in the process of theoretical training and the acquisition of the necessary professional skills and abilities in accordance with the chosen direction of training.			
Content:	 Preparatory stage: Development of an individual task. Organizational meeting to clarify the goals, objectives, content and order of internship. Acquaintance with the place of the practice. The main stage: Collection and processing of regulatory, industrial and technological information. Implementation of an individual assignment. Final stage: Preparation and execution of the practice report. Report protection (intermediate attestation). 			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	-	-	288	-
ECTS Credits:		8 <i>E</i>	-CTS	
Assessment:	Graded assessment			
	Project work on i	nnovation and investmen	nt management	
Objectives:	The purpose of the discipline: the formation of students' ideas about the conceptual approaches and foundations of innovation and investment management at modern enterprises, ideas about the domestic and foreign experience of innovation and investment management; students gaining knowledge about the organization of innovation and investment activities and their assessment, taking into account the modern requirements of innovative development and the state of the investment climate; students gaining skills in the development and design of innovations, the application of methods and tools for managing innovations, as well as providing investment support for innovative projects for their successful commercialization at enterprises of various forms of ownership and types of activity; obtaining by students the skills of practical application of models of economic evaluation of investments. 1. Place and role of innovation management in the organization's management system.			
Content:	 Place and role of innovati Organization and forms o Planning and forecasting 	f innovation management		rstem.

i	4. Efficiency of activity in th	e innovation sphere						
I	5. Forms and features of investment in the form of capital investments							
I	6. Cash flow as a key element of investment analysis							
I	7. Assessment of the econor							
I	8. Methods for determining		siits					
I	9. Types and forms of invest							
I			cke					
I	10. Analysis and assessment of investment project risks 11. Software and information support for investment analysis							
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam				
I	32	32+32CW	121	35				
ECTS Credits:			ECTS	33				
Assessment:	Pass/Fail assessmer		ail Examination with evaluation	n + Course paper				
		Business design						
Objectives:	The purpose of studying the discipline: the formation of students' practical skills and abilities that allow them to make business decisions; the formation of theoretical knowledge and practical skills in the field of business planning; mastering investment design and evaluating the effectiveness of investment projects of modern companies in the sphere of material production and the sphere of services.							
Content:	Content of business planning and investment planning							
		2. Development of a business plan						
	3. Assessment of risks, financial viability of the business plan and the commercial effectiveness of the results							
	of its implementation							
		technologies in business	design	4. Use of modern computer technologies in business design				
Teaching and learning								
. Cacining and iculting	Lecture	Practical training	Independent study	Exam				
methods:	Lecture	Practical training	Independent study	Exam				
	Lecture 16	32+10CW	10	Exam 40				
		32+10CW	, ,					
methods:		32+10CW	10					
methods: ECTS Credits:	16	32+10CW	10 ECTS / Course paper					
methods: ECTS Credits:	Project work on The purpose of the discipli relationship between technic ensuring the scientific and determining the economic e	32+10CW Examination The technical and economic masteristics and economic feasibility of fficiency of the use of masteristics and economic feasibility of fficiency of the use of masteristics and economic feasibility of fficiency of the use of masteristics and economic feasibility of fficiency of the use of masteristics.	10 ECTS / Course paper	and skills to identify the mastering the methods of e; study of methods for ources; mastering control				

	2. Analysis of the production potential of the enterprise and its use3. Analysis of production costs4. Analysis of financial results				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16	16+16CP	36	24	
ECTS Credits:			ECTS		
Assessment:		Graded assessme	ent / Course project		
	Project work on the dev	elopment of IT-architec	ture of the enterprise		
Objectives:	The purpose of the discipline: acquaintance with the methodological foundations of IT architecture management, best practices in organizing the activities of an IT service, various concepts and models of IT management; mastering the methods, standards and means of organizing the process approach and managing the quality of the provision of IT services that meet the business needs of the enterprise.				
Content:	 IT architecture as an element of building an effective enterprise management system IS architecture as a basic element of IT architecture and enterprise architecture. Proprietary IP implementation methodologies. Project management of IS implementation. Maintenance of IS. 				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	22	22+10CW	32	22	
ECTS Credits:			ECTS		
Assessment:		Graded assessme	ent / Course paper		
	C	omplex course project			
Objectives:	The purpose of studying the discipline: development of abilities for independent work in solving the developed professional tasks, problems and issues; consolidation, deepening and generalization of the knowledge gained by students in theoretical and practical classes in the framework of previous periods of study, the application of knowledge, skills and abilities in solving complex professional problems.				
Content:	 Essence, goals, basic principles of research activities Conducting research on secondary sources of information Research methods. Conducting research with collection primary information Determination Determination of issues to be developed in a comprehensive course project. Formulation of the problem. Collection of information and analysis of the collected results. Preparation of the defense of a complex course project 				

Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	2	33+10CW	77	22	
ECTS Credits:		4 /	ECTS		
Assessment:		Graded assessme	ent / Course paper		
	Organiza	ntional and managerial p	ractice		
Objectives:	The purpose of studying the discipline: practice is carried out in order to form and consolidate professional knowledge, skills and abilities obtained as a result of theoretical training, as well as to study production experience, acquire organizational skills and form a system of key competencies; the purpose of the industrial practice is to gain practical experience, including independent activity at the enterprise (in the organization) and competencies in the fields and (or) spheres of professional activity.				
Content:	1. Preparatory stage: 1.1. Development of an individual task. 1.2. Organizational meeting to clarify the goals, objectives, content and order of internship. 1.3. Acquaintance with the place of the practice. 2. The main stage: 2.1. Collection and processing of regulatory, industrial and technological information. 2.2. Implementation of an individual assignment. 3. Final stage: 3.1. Preparation and execution of the practice report. 3.2. Report protection (intermediate attestation).				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	-	-	288	-	
ECTS Credits:			ECTS		
Assessment:		Pass/Fail	assessment		
	Ва	asics of project activities			
Objectives:	The purpose of studying the discipline: familiarizing students with the basics of project activities in order to further apply the acquired knowledge and skills to solve specific practical problems using the project method; developing students' consciousness of the importance of collective work for obtaining a result, the role of cooperation, joint activities in the process of performing creative tasks; development of the ability to communicate.				
Content:	Module 1. Initiation (design) 1. General understanding of project activities 2. Team building				

	3. Team communication 4. Generation of ideas, evaluation and selection of project ideas 5. Development of requirements for the result Module 2. Preparation and planning (development) 6. Project life cycle 7. Project planning Module 3. Implementation 8. Execution of the project 9. Control of project implementation				
	Module 4. Completion (present 10. Completion of the project				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	2+14El.	8+8EI.	67	9	
ECTS Credits:			ECTS		
Assessment:	Pa	ass/Fail assessment/ Settle	ment and graphic work (SGW)	
	Project management	by industry and type of	economic activity		
Objectives:	The purpose of studying the discipline: studying the basics of project management necessary for the organization and successful conduct of research, production, economic, commercial and financial activities of an enterprise (organization); training in the effective application and justification of the use of existing management technologies; familiarization with the tools and methods of project management at all stages of the project life cycle.				
Content:	1. Project Integration Management 2. Project Scope Management 3. Project time management 4. Project cost management 5. Project quality management 6. Project resource management 7. Project communications management 8. Risk management 9. Procurement management 10. Stakeholder management				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	24	16+10CP	7	51	
ECTS Credits:	3 ECTS				

Assessment:	Examination / Course Project				
Defense of the	final qualifying work, including	g preparation for the def	fense procedure and the de	efense procedure	
Objectives:	State final examination is carried out in order to establish the level of preparedness of a graduate of a higher educational institution to perform professional tasks and the compliance of his training with the requirements of independently established educational standards and the main educational program in the direction of training (specialty) of higher education.				
Content:	The final work should contain the following sections: Title page; The task; Abstract; Content; Introduction; Main part; Conclusion; List of sources used; Applications.				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	-	-	216	-	
ECTS Credits:		6 1	ECTS		
Assessment:					
		Creative semesters			
Objectives:	The purpose of studying the discipline: to provide students with the necessary theoretical knowledge, the methodology of creative analysis in the system of socio-cultural education by means of performing arts for the formation of a creative personality of a human figure, a competitive specialist of the "new generation"; the formation of a comprehensively and harmoniously developed personality, capable of creative and professional self-development in the professional sphere.				
Content:	1. Musical content: a composer's message or an agreement with the listener? 2. Music and words are sworn friends 3. Musical time. Temporary and temporary 4. From the style of the era - to the composer's style 5. Program in music: hint or blinkers 6. Tradition and Innovation in the Art of Music 7. Cultural transfer in the system of literary interactions 8. The creative individuality of the poet and writer as an object of Study 9. Communication strategies "I" -narrative				

	10. Genres and genre generalizations in the professional sphere				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	16	-	16	4	
ECTS Credits:	1 ECTS				
Assessment:		Pass/Fail	assessment		
	Information resource	es and information retri	eval technologies		
Objectives:	The purpose of studying the discipline: acquiring basic knowledge that allows you to effectively search for information resources from the library fund - printed publications, electronic resources and databases - for the successful development of various disciplines; the formation of universal competencies in the use of information resources, including taking into account the peculiarities of licensing restrictions for electronic resources on the Internet.				
Content:	1. Classification of information resources 2. The concept and main components of the information infrastructure of society 3. Goals and objectives of state policy in the field of information resources 4. Government and commercial reference information systems 5. Educational resource: traditional, modern 6. Definition, types and features of application in the educational process 7. Digital libraries: areas of work 8. Electronic textbook. Electronic tutorial 9. Objects of information retrieval 10. The structure of the tree-like thematic directory 11. Simple search. Advanced Search 12. Building a complex query. Semantic search				
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam	
	1+9El.	13El.	45	4	
ECTS Credits:	2 ECTS				
Assessment:		Pass/Fail	assessment		
	The basics of working in an e	lectronic information an	d educational environment		
Objectives:	The purpose of studying the discipline: studying the principles of teaching in the electronic information and educational environment of the university. As a result of studying the discipline, students must confidently master the skills of gaining access to electronic information and educational resources and personal services.				
Content:	1. E-learning at SPbPU. Electronic information and educational environment and its components. Personal services for students.				

	2. Online courses in the educational process. Resources of the information and library comple			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	2	4	21	9
ECTS Credits:		1 /	ECTS	
Assessment:		Pass/Fail	assessment	
	Professionally orient	ted course of the second	l foreign language	
Objectives:	The purpose of studying the discipline: the use of a foreign language in everyday professional communication; translation and business correspondence in compliance with all norms of language equivalence; work with professional literature in order to obtain professional information.			
Content:	1. A career in the business world. 1.1. Building a career (education and career) 1.2. Information (information systems and communications) 1.3. Quality (concept of quality, quality standards) 1.4. Feedback 2. Business and business problems 2.1. Increase in sales 2.2. Starting a new business 2.3. Financial control 2.4. Ethical trade			
Teaching and learning methods:	Lecture	Practical training	Independent study	Exam
	-	30	33	9
ECTS Credits:	2 ECTS			
Assessment:	Pass/Fail assessment			