Документ подписан простой электронной подписью Информация о владельце: ФИО: Ястребов Олег Александрович Должность: Ректор Дата подписания: 23.05.2023 17:56:30 **PEOPLES FRIENDSHIP UNIVERSITY OF RUSSIA** Уникальный программный ключ: ca953a0120d891083f939673078ef1a989dae18a

# NAMED AFTER PATRICE LUMUMBA

#### Institute of Environmental Engineering

educational division (faculty/institute/academy) as higher education programme developer

# **COURSE SYLLABUS**

#### **Research Methods of Environmental Pedagogy and Psychology**

course title

# **Recommended by the Didactic Council for the Education Field of:**

44.04.02 Psychological and Pedagogical Education

field of studies / speciality code and title

The course instruction is implemented within the professional education programme of higher education:

# **Environmental Pedagogy**

higher education programme profile/specialisation title

**Moscow**, 2023

## 1. Course Aims and Objectives

**The aim of the course:** is the formation of theoretical and methodological competence and willingness to conduct pedagogical and psychological research, the ability to understand the relationship of science and practice in the field of Environmental Pedagogy.

#### **Objectives:**

- making students get theoretical knowledge, allowing to highlight the problems of modern pedagogy, psychology and educational practice, analyze and explain methodological problems of science;

- the formation of students' competences in the field of methodology of pedagogical and psychological research;

- mastering the methods of analyzing the results of scientific research and applying them when solving specific educational and research problems;

formation of readiness to independently carry out scientific research using modern methods of science;

- formation of the student's ability to independently master new research methods, to change the scientific profile of their professional activities;

- development of reflective abilities of students;

- evaluation of the relevance of scientific research;

- using the conceptual and terminological apparatus of the discipline under study and the language of science;

- using various scientific sources that develop methodological competence and research culture;

- making a conscious choice of logic and research methods in the field of Environmental Pedagogy.

#### 2. Course in the Higher Education Programme Structure

The course **«Research Methods of Environmental Pedagogy and Psychology»** refers to the compulsory disciplines module.

Table 1. Previous and subsequent courses aimed at building up competences

Nr.	Competence code and title	Previous courses	Subsequent courses
	General competences		-
1	GC-5 Able to develop	Environmental	Teaching Internship
	programs for monitoring	Education	
	the results of students'	Concept of	
	education, develop and	Environmental	
	implement programs to		
	overcome learning	Research Work	
	difficulties.		
Speciali	zed professional competences	1	
3	SPC-1 Able to carry out	Environmental	Teaching Internship
	research support and	Education	
		Concept of	
	methodological support		
	for the implementation of	Pedagogy	
	basic and additional,	Research Work	
	including professional		
	programs.		

#### **3.** Requirements to Learning Outcomes

The course is aimed at building up and enhancing the following competences:

**General competence** – **5.** Able to develop programs for monitoring the results of students' education, develop and implement programs to overcome learning difficulties.

**Specialized professional competence** -1. Able to carry out research support and educational and methodological support for the implementation of basic and additional, including professional programs.

On completion of the Course the student:

## Knows:

- theoretical-methodological, methodical and organizational aspects of implementation of research activities in the field of Environmental Pedagogy;

- methods of critical analysis and evaluation of modern scientific achievements as well as methods for generating new ideas when solving research problems in the field of Environmental Pedagogy.

#### Can:

- analyze alternative options for solving research problems in the field of Environmental Pedagogy and evaluate potential gains/losses of implementing these options;

- when solving research problems to generate new ideas that can be operationalized based on available resources and constraints.

#### Masters:

- skills of analyzing methodological problems that arise when solving research tasks in the field of Environmental Pedagogy;

- skills of critical analysis and evaluation of modern scientific achievements and results of activities to solve research problems in the field of Environmental Pedagogy as well as in interdisciplinary areas.

## 4. Course Workload and Academic Activities

The course workload of **«Research Methods of Environmental Pedagogy and Psychology**» is 3 credits.

Types of academic activities		Total hours		Ser	nest	ers
		1	2	3	4	
Contact academic hours						
Including:						
Lectures						
Seminars (workshops/tutorials)	10				10	
Lab works	-					
Self-study	71				71	
Evaluation and assessment (exam; pass/fai	27				27	
grading)		pass/fail				
	grading					
Total course workload	hours	108				108
	credits	3				3

Table 4.1. Course workload and academic activities

#### 5. Course contents

Table 5.1 Course modules and contents

course modules	topics
1. Research Methods of	Functions of methodological knowledge. Modern pedagogical
Environmental Pedagogy	concepts, scientific approaches to the study of problems of
	environmental education. Methodological foundations of pedagogical
	scientific research. Theoretical research methods. Empirical research
	methods. Methodology for the organization of the experiment.
	Organization of ascertaining, forming and control experiment.
	Approbation of the research results. Implementation of research
	results into practice
2. Research Methods of	Theoretical and empirical knowledge in psychology. Methodology of
Environmental	experimental psychological research. Classification of research
Psychology	methods in psychology. Theory of psychological experiment. Design
	of the experiment and control of variables. Quasi-experiments.
	Systematization and specifics of experimental research in various
	fields of psychology. Correlation approach in testing psychological
	hypotheses. Measurement in psychology. Analysis and presentation
	of the results of psychological research.

## 6. Classroom equipment and technology support requirements

Table 6.1 Classroom equipment and technology support requirements

Classroom for Academic Activity Type	Classroom equipment	Specialized educational/laboratory equipment and materials for mastering the module
Lecture hall (room)		
Laboratory		
Seminar room	Classroom, equipped with a set of specialized furniture; a whiteboard; a personal computer with a standard package of office programmes; a set of devices includes portable multimedia projector, laptop, projection screen, Stable wireless Internet connection. Software: Microsoft Windows, MS Office / Office 365, MS Teams, Chrome (latest stable release), Skype	
Computer lab		
For students'self- study		

#### 7. Resources recommended for course studies

#### Main reading

1. Bagdasaryan, N.G. History, philosophy and methodology of science and technology: textbook for masters / N.G. Bagdasaryan, V.G. Gorokhov, A.P. Nazareth; under total ed. N.G. Bagdasaryan. - M.: Yurayt, 2015. - 383 p.

2. Kolesnikova, G. I. Methodology of psychological and pedagogical research: textbook / G.I. Kolesnikov. - Rostov: Phoenix, 2015. - 318 p.

3. Pavlov, A.V. Logic and Methodology of Science: Modern Humanitarian Knowledge and its prospects [Electronic resource]: textbook / A.V. Pavlov. - M.: FLINTA, 2016. - 343 p. - EBS Lan. - Access mode: https://e.lanbook.com/book/84190.

4. Popkov, V.A. Pedagogy in the mirror of the research pedagogical search [Electronic resource]: textbook / V.A. Popkov, A.V. Korzhuev. - M.: Laboratory of Knowledge, 2017. - 217 p. - EBS Lan. - Access mode: https://e.lanbook.com/book/103036.

## Additional reading

1. Borytko, N.M. Methodology and methods of psychological and pedagogical research: textbook / N.M. Borytko, A.V. Molozhavenko, I.A. Solovtsov. - 2nd ed. - M.: Academy, 2009. - 320 p.

2. Vershlovsky, S.G. Methods of observation in pedagogical research: textbook / S.G. Vershlovsky. - SPb.: SPb APPO, 2011. - 58 p.

3. Zagvyazinsky, V. I. Methodology and methods of psychological and pedagogical research: textbook /V. I. Zagvyazinsky, R. Atakhanov. - 7th ed. - M.: Academy, 2012. - 207 p.

4. Korzhuev, A.V. General scientific foundations of pedagogy and pedagogical search / A.V. Korzhuev, A.R. Sadykov. - M.: LIBROKOM, 2010. - 300 p.

5. Korzhuev, A.V. Pedagogy in the mirror of research search. At the crossroads opinions / A.V. Korzhuev, A. S. Sokolova. - M.: LENAND, 2014. - 202 p.

6. Kraevsky, V.V. Methodology of pedagogy: a new stage: textbook / V.V. Kraevsky, E.V. Berezhnova. - M.: Academy, 2006. - 394 p.

7. Matyushkina, M.D. Methods of pedagogical research: textbook / M.D. Matyushkin. - St. Petersburg: SPb APPO, 2012. - 143 p.

8. Methodology and methodology of pedagogical research: materials of the V Interregional scientific-practical. conf. of graduate students and applicants, 9-10 Feb. 1999 / E.E. Smirnova [and others]; scientific ed. I.A. Kolesnikov. - St. Petersburg: St. Petersburg GUPM, 2000. - 190 p.

9. Novikov, A.M. Methodology of scientific research / A.M. Novikov, D.A. Novikov. - M.: LIBROKOM, 2010. - 275 p.

10. Training of a teacher-researcher in university education [Electronic resource]: monograph / V.I. Zagvyazinsky [and others]. - Tyumen, 2017. - 164 p. Access mode: https://e.lanbook.com/book/110066.

11. Priority directions for the development of pedagogical and psychological research. - M.: MPSI; Voronezh: MODEK, 2004. - 71 p.

#### **Internet-based sources**

Electronic libraries with access for RUDN students

Russian education: federal portal: http://www.edu.ru/.

Library of the federal portal Russian education: http://www.edu.ru/index.php?page\_id=242.

Pavlov A.V. Logic and Methodology of Science: Modern Humanitarian Knowledge and

its prospects / A.V. Pavlov. - M.: Flinta: Nauka, 2010. - 344 p.: http://znanium.com/bookread.php?book=241695.

Ruzavin G.I. Methodology of scientific knowledge / G.I.Ruzavin. - M.: UNITY-DANA, 2012. - 287 p.: http://znanium.com/bookread.php?book=392013.

3. Valeev G.Kh. Methodology and methods of psychological and pedagogical research: Textbook for students of 3-5 courses of pedagogical universities in the specialty "031000 -Pedagogy and psychology". – Sterlitamak: Sterlitamak. state ped. in-t, 2002. - 134 p.: .http://window.edu.ru/library/pdf2txt/445/56445/27208.

# 8. Assessment toolkit and grading system\* for evaluation of students' competences level upon course completion

The assessment toolkit and the grading system\* to evaluate the competences formation level (competences in part) upon the course study completion are specified in the Appendix to the course syllabus. \* The assessment toolkit and the grading system are formed on the basis of the requirements of the relevant local normative act of RUDN University (regulations / order).

# **ASSESSMENT TOOLKIT**

for the course

Research Methods of Environmental Pedagogy and Psychology course title

44.04.02 Psychological and Pedagogical Education

field of studies / speciality code and title

Environmental Pedagogy\_\_\_\_\_\_\_

\_\_\_\_\_Master\_\_\_\_\_ graduate's qualification (degree)

# **Passport to Assessment Toolkit for Course**

Field of studies: 44.04.02 "Psychological and Pedagogical Education"

Course: <u>RESEARCH METHODS OF ENVIRONMENTAL PEDAGOGY AND</u>

## **PSYCHOLOGY**

## 12.1. Competences under evaluation and assessment tools

Compete nces under	Course module under assessment	Tools to assess higher education programme mastering level   Classwork Self-					Points for module
assessme nt					studies		
		Test	Control work	Class work	Seminar report		
GC-1 SPC-1	1. Research Methods of Environmental Pedagogy	X		20	20		20
GC-1 SPC-1	2. Research Methods of Environmental Psychology	X		20	20		20

## 12.2 The maximum number of credits in the course is 3.

## Assessment & Grading System

Total points	Final assessment	Number of credits
95-100	5	3
86 - 94	5 (B)	3
69-85	4 (C)	2
61-68	3+ (D)	1
51 - 60	3 (E)	1
31 - 50	2 (FX)	0
<30	2 (F)	0

## 12.3 Previous and subsequent courses aimed at building up competences

Nr.	Competence code and title	Previous courses	Subsequent courses
General competences			-
1	GC-5 Able to develop	Environmental	Teaching Internship
	programs for monitoring	Education	
	the results of students'	Concept of	
	education, develop and	Environmental	

	implement programs to overcome learning	Pedagogy Research Work	
d	difficulties.		
Specialize	ed professional competences		-
r e r f t i	SPC-1 Able to carry out research support and educational and methodological support for the implementation of basic and additional, including professional programs.	Education Concept of Environmental Pedagogy Research Work	Teaching Internship

#### 12.4 Exam questions

- 1. Functions of methodological knowledge.
- 2. Modern pedagogical concepts, scientific approaches to the study of problems of environmental education.
- 3. Methodological foundations of pedagogical scientific research.
- 4. Theoretical research methods.
- 5. Empirical research methods.
- 6. Methodology for the organization of the experiment.
- 7. Organization of ascertaining, forming and control experiment.
- 8. Approbation of the research results.
- 9. Implementation of research results into practice.
- 10. Theoretical and empirical knowledge in psychology.
- 11. Methodology of experimental psychological research.
- 12. Classification of research methods in psychology.
- 13. Theory of psychological experiment.
- 14. Design of the experiment and control of variables.
- 15. Quasi-experiments.
- 16. Systematization and specifics of experimental research in various fields of psychology.
- 17. Correlation approach in testing psychological hypotheses.
- 18. Measurement in psychology.
- 19. Analysis and presentation of the results of psychological research.

#### Developer, Head of the Higher Education Program:

C.Sc., Associate Professor Environmental Engineering Institute Foreign Languages Department

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Y.L.Zakirova