Appendix No. 1.5 to the Resolution No. 7/2023

of the Rector of the University of Rzeszów

**SYLLABUS**

**regarding the qualification cycle FROM 2024/25TO2027/28**

**Academic year 2024/25**

1. Basic Course/Module Information

|  |  |
| --- | --- |
| Course/Module title | Knowledge about habitat |
| Course/Module code \* |  |
| Faculty (name of the unit offering the field of study) | Institute of Agricultural Sciences, Land Management and Environmental Protection |
| Name of the unit running the course | Department of Nature Conservation and Landscape Ecology |
| Field of study | Environmental protection |
| Qualification level | first level |
| Profile | academic |
| Study mode | stationary |
| Year and semester of studies | I year 1 semester |
| Course type | basic |
| Language of instruction | english |
| Coordinator | dr inż. Iwona Makuch-Pietraś |
| Course instructor | dr inż. Iwona Makuch-Pietraś |

\* - as agreed at the faculty

1.1.Learning format – number of hours and ECTS credits

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Semester  (n0.) | Lectures | Classes | Laboratories | Seminars | Practical classes | Internships | others | **ECTS credits** |
| 1 |  |  | 30 |  |  |  |  | 5 |

1.2. Course delivery methods

- conducted in a traditional way

- involving distance education methods and techniques

1.3. Course/Module assessment (exam, pass with a grade, pass without a grade)

pass with a grade

2. Prerequisites

|  |
| --- |
| Chemical and botanical knowledge |

3. Objectives, Learning Outcomes, Course Content, and Instructional Methods

3.1. Course/Module objectives

|  |  |
| --- | --- |
| O1 | Learning soil and climate factors and links between them. |
| O2 | Recognize the influence of factors on habitat conditions and functioning of the biocenosis. |
| O3 | Practice the ability to value worth of the habitat and its resistance to degradation on the base of self-determinate soil quality coefficient. |

3.2. Course/Module Learning Outcomes (to be completed by the coordinator)

|  |  |  |
| --- | --- | --- |
| Learning Outcome | The description of the learning outcome  defined for the course/module | Relation to the degree programme outcomes |
| LO\_01 | lists and describes the elements of the habitat and their interactions | (K\_W01, K\_W07, K\_W09) |
| LO\_02 | indicates the method for evaluation of basic worth parameters of habitat and soil quality | (K\_W02, K\_W03, K\_W07) |
| LO\_03 | be able to perform simple laboratory analysis and evaluate environmental soil values on this base | (K\_U01, K\_U02, K\_U04) |
| LO\_o4 | interpret the state of the habitat and its threats, based on laboratory tests | (K\_U04, K\_U06, K\_U08) |
| LO\_o5 | complete and present a presentation of optional habitat on the source materials | (K\_U09, K\_U12) |
| LO\_o6 | the ability of cooperation in group during laboratory analysis and with elaboration the environmental habitat report | (K\_U10) |
| LO\_o7 | demonstrate the responsibility for the equipment, and exhibits and safety in work | (K\_K01) |

**3.3. Course content (to be completed by the coordinator)**

1. Classes, laboratories, seminars, practical classes

|  |
| --- |
| Content outline |
| Basic properties and presentation of the most common minerals; systematic and identifying characteristics of rock and geomorphological conditions |
| Basic physical and biological properties and their impact on soil fertility |
| Determination of soil mechanical composition, soil reaction, content of carbonates and the quantity, quality of organic substances, hydrolytic acidity, total exchangeable bases and sorption capacity – laboratory exercises |
| Recognition of basic soil types |
| Water condition in habitats |
| Influence of climate on habitat conditions |
| Presentation of optional habitat |

3.4. Methods of Instruction

e.g.

*Classes: text analysis and discussion/project work (research project, implementation project, practical project)/ group work (problem solving, case study, discussion)/didactic games/ distance learning*

*Laboratory classes: designing and conducting experiments*

4. Assessment techniques and criteria

4.1 Methods of evaluating learning outcomes

|  |  |  |
| --- | --- | --- |
| Learning outcome | Methods of assessment of learning outcomes (e.g. test, oral exam, written exam, project, report, observation during classes) | Learning format (lectures, classes,…) |
| LO-01 | report, oral presentation | laboratory |
| LO-o2 | report, oral presentation | laboratory |
| LO-o3 | observation during classes, report | laboratory |
| LO-o4 | report | laboratory |
| LO-o5 | observation during classes, oral presentation | laboratory |
| LO-o6 | observation during classes, report | laboratory |
| LO-o7 | observation during classes | laboratory |

4.2 Course assessment criteria

|  |
| --- |
| *Final degree is based on laboratory report and by a multimedia presentation* |

5. Total student workload needed to achieve the intended learning outcomes

– number of hours and ECTS credits

|  |  |
| --- | --- |
| Activity | Number of hours |
| Course hours | 30 |
| Other contact hours involving the teacher (consultation hours, examinations) | 10 |
| Non-contact hours - student's own work (preparation for classes or examinations, projects, etc.) | 85 |
| Total number of hours | 125 |
| Total number of ECTS credits | 5 |

\* One ECTS point corresponds to 25-30 hours of total student workload

6. Internships related to the course/module

|  |  |
| --- | --- |
| Number of hours | *-* |
| Internship regulations and procedures | *-* |

7. Instructional materials

|  |
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| Compulsory literature:  Keefer, R. F. 2000. Handbook of Soils for Landscape Architects, New York Oxford University Press.  Reszel H., Reszel R. (translation by Iwona Makuch-Pietraś) 2010. Method book for laboratory exercise from Knowledge about habitat. Department of Agrobiology and Environmental Protection UR, typescript ss. 21  Sposito G. 2008 The chemistry of soils edition: 2nd ed. Oxford : Oxford University Press. |
| Complementary literature:  Coleman, David C., Crossley, D. A., Hendrix, Paul F. 2004. Fundamentals of soil Ecology Amsterdam: Elsevier Academic Press. |

Approved by the Head of the Department or an authorised person