



# STRATEGY FOR SCIENCE AND RESEARCH 2020+ AT UJEP



## MISSION

*Our role is to provide stable and high-quality facilities for science and research, and to help to develop the level of education, knowledge, progress and human potential in science and research.*

## VISION

*We strive to be a trustworthy, sought-after and respected research organisation.*

## VALUES

*Our core values are quality, credibility and stability.*



EUROPEAN UNION  
European Structural and Investing Funds  
Operational Programme Research,  
Development and Education



MINISTRY OF EDUCATION,  
YOUTH AND SPORTS

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## Introduction

Jan Evangelista Purkyně University in Ústí nad Labem (UJEP) is the most significant and irreplaceable educational, scientific-research and art institution of the Ústí nad Labem Region and a key player and partner in socio-economic relationships at a regional, national and international level. It strives to contribute to the maximum extent to the development of the region, and to address the current needs of North-West Bohemia as a structurally disadvantaged region.

UJEP is an institution which focuses its activities on a wide range of economic, environmental, humanitarian, pedagogical, natural scientific, social, technical, artistic and medical fields. It therefore offers an extensive and diverse range of study programmes concentrating on various areas of human activity.

The University professes moral, ethical and professional approaches in all its activities. We strive to fulfil generally valid and recognised ethical principles, moral and human values in all activities of the University that include educational activities, creative activities (research and development and its other forms), the third role of the University and cooperation with areas of application in international and other activities. Our efforts have been recognised by the European Commission who has awarded us with the prestigious HR Award. The University, as a provider and voice of education, moral and ethical principles, is open to everyone regardless of their gender, race, origin, nationality, religion, sexual orientation, social status, including persons with specific needs. It strives to create such conditions so as to be able to fulfil the aforesaid approaches and principles.

Due to the wide range of disciplines, not all are equally focused on science and research. This in itself conceals pitfalls in terms of setting up evaluations of the quality of results across the university. Our efforts help us to identify fields where the university can clearly present itself in terms of current methodology for evaluating research organisations (according to FORD fields) and take appropriate measures to strengthen the volume of quality science and research results in these fields, while also taking into account quality results in artistic activities.

Some of the university's disciplines are professionally oriented and for these it is a priority to connect with potential employers and their requirements for the knowledge, skills and abilities of graduates. Besides science and research activities, the university also presents itself as a significant and internationally respected art institution.



## Strengths

- dominant position of the university in the region, implying a coordination role in the most important research activities
- profiling main research topics and activities that respond to current issues in society and the specifics of the region in the field of education, protection and development of the environment, and the perception of aesthetic and cultural values
- successful project teams cooperating across the university on projects of the Czech Science Foundation, Technology Agency of the Czech Republic, research projects of ministries, etc.
- modern equipment and its effective use, including sharing across the university
- a multi-disciplinary focus leading to a broader spectrum of research areas with potential for cooperation
- active cooperation with other research organisations (such as the Czech Academy of Sciences), both in the Czech Republic and abroad

## Weaknesses

- low proportion of successful researchers and low proportion of doctoral students
- the university is not a leader of research infrastructure incorporated into the roadmap of large research infrastructures
- low involvement of researchers in international research programmes
- low proportion of foreign staff and students at the university
- low cooperation in the field of applied and especially contractual research that would present a stable financial source for the university budget

## Opportunities

- making use of the potential of the university's dominant position in the region for the field of research and development in solutions for the specifics of mining regions in relation to their economic and technological transformation in the 21st century
- the proximity of the border (Czech Republic - Saxony)
- involvement of teams in excellent research, important infrastructures, ERC projects in profiled topics, together with the support of modern infrastructure and equipment
- gaining leading experts from practice and abroad as mentors for young researchers and post-docs
- education of new young experts (post-docs), development of doctoral schools, international mobility
- involvement of teams in excellent curator research and scientific activities in artistic fields, development of gallery infrastructures, CE (Creative Europe) projects with the support of modern infrastructure

## Threats

- legislative changes and restrictions, regulations, directives, both domestic and European, and the related continuously growing administrative demands
- annual amendments of research organisation assessment methodology
- different evaluations of the same research results by the institution where they have been created (universities x institutes of the academy of sciences, traditional x regional universities)
- low institutional funding limiting possibilities for growth
- lack of researchers and their outflow to traditional education centres in the Czech Republic (especially Prague), to professional practice, or to other countries
- rigid behaviour of some faculties refusing to cooperate across the university
- legislative restrictions, regulations and directives restricting the flexibility of generational renewal

## Time scale for fulfilling individual goals

Continuously from 2020, annual evaluation and subsequent formulation of measures at the level of both the university and its faculties.

## 1. Profiled Directions of Science and Research

In order to continuously strengthen the role of science and research and other forms of creative activity at the university, in the region and in an international context, it is essential to define a number of key professional topics on which scientific and research teams focus together with their partners, and which have demonstrable excellent scientific results.

### Objectives

- Clearly profiled research directions based on collaboration between professional faculty and inter-faculty teams of scientists, taking into account solutions to current societal issues that have a major impact on the region and its educational, economic, social, cultural and environmental restructuring in the 21st century.
- From the point of view of the profiled research directions, a definition of the main fields according to FORD is determined, taking into account inter-faculty cooperation (e.g. with schools of doctoral studies).
- Involvement of significant domestic and international partners.
- Research directions have an international dimension, and research teams achieve demonstrably excellent results.

### Tools

- Creating conditions and targeting support for research teams in ways that enable their continuous professional activity and cooperation with partners (methodological, coordination and financial support).
- Development and support of human resources in the form of professional training, seminars and international mobility.
- Intensive development and support of networking with international research institutions.
- Active searching for and acquisition of external resources for funding strategic research topics.
- Promotion of profiled science and research topics and other forms of creative activity.

### Responsible

- University management and faculty management.
- Research teams, staff members and other members of the academic community.

### Indicators

- Number of profiled research fields according to FORD.
- Annually at least 3 research projects for a profiled area.
- Annually at least 5 recognisable results for a profiled area (especially first-rate, excellent results).
- Annually at least 5 international activities in a profiled area (e.g. mobility, international conferences, etc.).

## 2. Human Resources and Stimulation

Stimulating development in the field of personnel is a basic prerequisite for successfully fulfilling science and research objectives, and for competitiveness in an international context.

### Objectives

- Established first-rate professional teams with international representation, which are stable and sustainable in the long term with regard to age structure.
- A transparent and open system of public tenders for scientists and researchers in the context of the HR Award.
- An age- and gender-balanced stable system of actively working scientific teams guaranteeing long-term sustainable potential of science and research (topics, staff capacities, etc.).

### Tools

- University-wide and related faculty standards defining areas of stimulation of human resources in research and development, based on current results of science, research and other forms, and their evaluation by the RVVI (including the possibility of faculty support).
- Continuous head hunting, education, development and support of young researchers.
- Support for research personnel who guide young researchers (instructors and mentors).
- A transparent system for supporting graduate and post-graduate students, and places for international scientists and researchers.
- Support for scientific or research careers and qualification growth.
- Support for short-term and long-term international research fellowships (both outgoing and incoming).
- Promotion of key scientists, researchers, artists and their teams.
- Annual evaluation regarding the careers of science and research staff with regard to faculty standards and established plans.
- UJEP Internal Grant Agency (IGA).

### Responsible

- University management, faculty management and staff department.
- Science and research teams, and staff members.

### Indicators

- Proportion of foreign scientists, researchers and artists.
- Proportion of scientists and researchers working in projects registered by CEP.
- Proportion of scientists and researchers with a recognisable publication result according to Methodology 17+.
- Favourable age and gender structure of scientists and researchers in various degrees of qualification.

### 3. Projects and Collaboration

Sustainable development of the university and funding from multiple sources would not be possible without appropriate science and research projects, through which we meet our goals in the areas of HR development; professional development; building top-quality research facilities; the international dimension of science, research and other forms of creative activity; cooperation with research institutions; the spheres of application and public administration; and fulfilment of the third role of the university.

#### Objectives

- Professional teams (researcher, co-researcher) are involved in science and research projects (records in CEP, CORDIS, etc.).
- Growing external financial resources to support the development of university activities.
- Research teams deal with international research projects and are involved in international networks.
- Increasing intensity of cross-border cooperation through joint projects.
- Transfer of knowledge from science and research projects to educational activities. Involvement in particular of PhD and master's students.

#### Tools

- Continuous preparation and submission of science and research projects to individual major national and international grant providers (ERC, H2020, COST, CREATIVE EUROPE, GAČR, TAČR, ESIF, departmental projects of ministries, etc.).
- Project topics support the university's profiled topics of science, research and other forms of creative activity.
- Support for the Student Grant Competition (SGS) and the presentation of project results at the Student Scientific Conference.
- Preparation of projects through which the university fulfils its third role (social responsibility).
- Active searches for new calls from individual providers, and development of networking, coordination and methodological services through the activities of the UJEP Project Service Centre.
- An appropriate scope and level of education of scientists and researchers in the areas of project preparation and writing, publication of results and their presentation.

#### Responsible

- University management and faculty management.
- Science and research teams, and staff members.

#### Indicators

- Number of PhD and master's students involved in science and research projects.
- Ratio of financial resources from scientific projects to the contribution of the Ministry of Education, Youth and Sports to the university budget.
- Number of addressed projects registered in CEP.
- Success rate in obtaining projects of GAČR, TAČR and departmental programmes of ministries.
- Amount of funds obtained from foreign scientific and research projects.



## 4. Results of Science, Research and Other Forms of Creative Activity, Transfer of Knowledge, and Promotion

Science and research cannot exist without achieving results which are the subject of dissemination, protection and promotion.

### Objectives

- The results of science and research are presented (published) by research teams so as to ensure that they achieve the highest possible rating within the current evaluation methodology of a research organisation (even with regard to field specifics).
- The university has a system in place to protect the results of science, research and other forms of creative activity which are subject to intellectual property rights with regard to the satisfaction of the rights of their originators and the university.
- There is a means of transferring knowledge and results of science, research and other forms of creative activity into practice, including the protection described above.
- There is also an adequate means of presenting and promoting science, research and other forms of creative activity at the university and its results and cooperation, taking into account the specifics of individual scientific and artistic disciplines.

### Tools

- Reporting the results of science, research and other forms of creative activity with regard to current methods of evaluating such results and the needs of the university (OBD [Personal Bibliographic Database], changes, additions, import into the RIV [Register of Information on Results] and RUV [Register of Art Output] databases).
- The results of science and research are published and presented according to industry practices, with regard to the current evaluation methodology of research organisations and the effort to increase the quality of results in a national and international context.
- In terms of professional articles, they are published preferentially in journals kept in the first decile and quartile (for this area to monitor and evaluate materials from the RVVI for individual scientific disciplines).
- In terms of professional monographs and chapters in the book, they are published with maximum international reach at prestigious publishing houses, with renowned partners, with respected reviewers and editors, etc.
- An internal university standard in the field of stimulation with explicit emphasis on the previous 2 points.
- An annual evaluation of the university's performance in the fields of science, research and other forms of creative activity consisting in an assessment of individual criteria (top-quality and excellent results, first decile and quartile, conversion of results per academic according to the components of the research organisation, numbers of national and international projects, funds directed towards science and research, etc.) and adoption of adequate measures leading to an increase in the quality of the results of science, research and other forms of creative activity, the amount of funding, and the involvement of a larger number of members of the academic community.
- Intensive activity of the Technology Transfer Centre aimed at analytical, consulting and coordination activities in the areas of intellectual property protection, presentation and transfer of results of science, research and other forms of creative activity that can be applied in practice (proof of



concept), educational activities in these areas, etc.

- Application of a university-wide concept of optimal promotion and presentation of results of science, research and other forms of creative activity, which will be based on the university's unified visual system. The concept will also take into account the specifics of individual disciplines and the types of results and experiences of faculties, and use modern communication and presentation elements with regard to the target group, including educational activities in this field.
- Strengthening the role of the Project Service Centre in the coordination and preparation of projects, organising professional seminars and workshops with representatives of providers of funding for projects, and training staff in the field of project preparation and management.

### Responsible

- University management, faculty management and staff.

### Indicators

- Number of results in the 1st decile, Q1, Q2, and output assessed as “world leading” or “excellent”.
- Financial volume of contract research, and external revenue from commercialisation of research results.
- Number of results of applied research.

## 5. Funding

To support high-quality science and research, it is essential to obtain or allocate adequate funding that will support the development of human resources, building and renewal of infrastructure, and stimulation and promotion of the results of science, research and other forms of creative activity.

### Objectives

- To maximise funding from major national and international projects.
- To search for new partners and collaborators for funding science and research.
- Active cooperation with the application and public administration spheres.
- Increase of income resulting from the transfer (application) of results into practice.
- An approved method of grant distribution within the scope of the long-term conceptual development of the research organisation (TA16), which is based on the current method of evaluating research organisations and the proportion of total eligible results of the university, reflecting parameters of the quality and performance of individual components (with regard to their size and year-on-year changes).

### Tools

- An increase in funds supporting science, research and art from internal and especially from external sources (support from towns, the Ústí nad Labem Region, sponsorship donations, and contributions and subsidies of the Ministry of Education, Youth and Sports).
- Effective, purposeful, proper and aliquot use of funds for science and research during the year.
- An optimal system for distributing subsidies for specific university research (TA15).
- An increase in revenue from external scientific and research activities.
- The continuous transfer of results into practice and the appropriate financial evaluation of such results.
- A reward system for high-quality results of science, research and other forms of creative activity, etc. (see stimulation).

### Responsible

- University management and faculty management.
- Staff members.

### Indicators

- The amount of support and stimulation of scientific activities by the university or its faculties.
- Amount of funding for the long-term conceptual development of a research organisation.
- Amount of funding for specific university research.
- Amount of funding from external sources.

#### List of Abbreviations

CEP – Central project evidence  
 RVVI – Research, Development and Innovation Council  
 GAČR – Czech Science Foundation  
 TAČR – Technological Agency of the Czech Republic  
 ESIF – European Structural and Investment Funds  
 CORDIS – Community Research and Development Information Service  
 ERC – European Research Council