



University: University of Pécs
Country: Hungary

SDG5: GENDER EQUALITY

5,3 Student access measures

5.3.4 - Does your university as a body encourage applications by women in subjects where they are underrepresented? **Yes.**

University of Pécs highlights the institutional commitment to supporting disadvantaged and underrepresented student groups throughout their studies. A scholarship system was established specifically for these groups, with special attention to expanding the available options. As a result, the proportion of students with disabilities, those from socially disadvantaged backgrounds, **women participating in engineering and natural science programs**, and students completing pedagogical or social science placements in disadvantaged districts has increased. Learning methodology development programs were created for students with disabilities, complemented by sensitization courses and the continuous assistance of the university's **Support Service**. Roma students are supported through a dedicated **college for advanced studies and an independent mentoring program**, while disadvantaged learners are also present in the university's secondary-level vocational and adult education institutions, where measures target dropout reduction, inclusion, and talent development.

Beyond student-level interventions, the university also places strong emphasis on **increasing the proportion of women among academic and research staff in leadership positions and other underrepresented areas**. Strengthening women's visibility and participation within the university is considered a priority, as it contributes to retaining high-quality staff. The university seeks to boost participation in initiatives such as **"Women in Science"** and similar innovative programs. The Faculty of Sciences serves as a model with its **scholarship program for female students** and the "Women on a Difficult Track" program series, where internationally and nationally recognized female scientists and teachers present their careers and life paths. A key objective is to develop a **career model for female academics and researchers**, which would increase the proportion of women in senior scientific positions. Plans also include launching a **Talent Program** to identify and prepare future key personnel and leaders. For female staff, the university emphasizes not only providing opportunities but also **motivating women to take on leadership and expert roles**, aiming to reduce the effects of the **"glass ceiling"**. Personalized training—such as personality development, leadership skills training, and coaching—supports the success of female leaders, also through the use of digital tools. These initiatives are intended to be implemented with the support of the **HOP** and **DIMOP** programs.

Together, these sections of the *Institutional Development Plan 2021–2024* demonstrate that the University of Pécs takes an active institutional approach to **encourage and support women's participation in underrepresented fields**, both as students and as academic leaders, through targeted scholarships, mentorships, awareness programs, and leadership development pathways.

The University also strives to encourage applications by women in subjects where they are underrepresented. Through university outreach or through collaboration with other universities, community groups, government or NGOs in regional or national campaigns.

- through university outreach
- through collaboration with other universities and/or community groups and/or government and/or NGOs in regional or national campaigns



Girls' Day at MIK!

Date: 25/04/25. 08:15 - 13:00

Art exhibition, 3D printing and welding simulator - Become an engineering student for a day!

Do you want a career in which you can contribute to the world and have the opportunity to invent and implement innovative solutions? Are you interested in natural science subjects and would you like to choose a profession where you can utilize them?

Then get to know the engineers of our faculty, who will tell you about the beauty of the engineering profession through their own experiences!

Planned program:

8.00 – Arrival (MIK aula)

We are waiting for interested parties from 8.00-8.15 at the information desk of the MIK aula. The meeting will be followed by a short introductory game, during which you can get to know each other and us a little. (Location: Room B224)

8.45 – Roundtable discussion (Room B224)

We will start the day with an informal roundtable discussion in the B224 meeting room. During the discussion, lecturers, former and current students of our faculty will introduce themselves and tell you what it is like to work as a woman in the scientific and engineering fields. We ask you to feel free to ask questions about the topics that interest you!

10.00-12.30 – Active programs

From 10.00 we will continue our program with a 5-station interactive tour, within the framework of which you can gain insight into the everyday lives of our engineering students.

Planned stops:

1) "Memories of Pécs" - Opening of the DLA exhibition by Dr. Jin Xin

2) Visit to the BIM lab

Are you interested in what exactly Building Information Modeling (BIM) means? Are you curious about the most modern digital solutions in the construction industry? Join us and immerse yourself in the virtual world of architecture!

3) Let's bridge the gaps! / Interactive games in the civil engineering lab

Within the framework of our playful-interactive engineering session, you can learn about the materials used in the construction industry, find out what a good foundation is like, and while playing with loads, you can also get a taste of the practical side of statics.

4) "We're chipping away" / 3D printer demonstration and welding simulator in the mechanical engineering labs

Watch our 3D printer demonstration, try out our welding simulator, and step into the shoes of our mechanical engineering students for a while!

5) Water purification with sedge and reed / Possibilities of water treatment and water purification

Would you like to find out how natural science subjects can be applied in everyday life? Join us and learn about the methods of natural wastewater treatment at the research pilot site of the Department of Environmental Engineering!

Be creative! Be an engineer!

Those waiting for you:

- Prof. Dr. Gabriella Medvegy - Dean, University Professor, Architect
- "The New Normal" - Be with us on the technical path - Dr. Éva Kovács, Associate Professor, Dean's Representative for Communications
Head of the PTE-MIK Television Program Production Department
- Dóra Simon - MIK student
"This path can give you the opportunity to express your creativity, knowledge and show the world what you are capable of!"
- Dr. Jin Xin - Associate Professor
- Dr. Erika Vörös - Associate Professor
- Diána Teodóra Bakk - Department Engineer
"Science belongs to everyone - be brave and be part of the change!"
- Nikoletta Landek – Trainer



“Modernization of technical and IT majors: Women in engineering: national marketing” was implemented in the framework of the EFOP-3.4.3-16-2016-00005 project “Modern university in the modern city: Value-centeredness, openness and inclusive approach in a 21st century higher education model” in 2019-2022. The current Pecs blog continues its results.

Women engineers campaign

What is the engineering profession like today from a female perspective, is studying for an engineer, becoming an engineer an attractive, interesting process that also means self-realization for women in the 21st century – these were the topics that were the focus of the photo, poster and video competition announced last year by the PTE MIK for engineers, female engineers and future engineers, for which about fifty entries were received, including entries



from several men and foreign students. In connection with this, a blog featuring female engineers was launched on the application website mernoknok.hu. Today, the content of the platform focuses on a broader range, as the project has sparked a kind of thinking and discussion about the engineering career, women's roles, barriers, and motivating forces. In addition to presenting the everyday life of the engineering career, the blog also covers professional topics of interest to students, as well as many aspects of student life.

VIBE - Biomedical and STEM/STEAM Education

Project ID

2021-1-HU01-KA220-HED-000032251

Project title

Virtual Biomedical and STEM/STEAM Education

Project start date

01.11.2021

Project end date

31.10.2024

Coordinator

University of Pécs (HU)

Partner Organisations

Universidade do Porto (PT), Politechnika Śląska (PL), DEX Innovation Centre (CZ)

General description

Background:

In the XXI. century, the rapid development of IT based solutions are reshaping our world in our social life, work environment and education. The digital transformation has been especially apparent over the last decade and restrictions resulting from the Covid-19 pandemic have significantly accelerated this process. Well-established digital competences to a satisfactory level are very important to broad range of social groups of different ages. In the field of higher education, e-learning methods can provide an effective, standardized and relatively easy-to-share solution for teachers to share knowledge and provide tools for co-creation and collaboration. Digital education tools are also important for engaging younger generations in higher education, and can serve as a means of communication with citizens and the wider community. Medical and STEM education is essential for the continuous progress of our society through greater innovation, research and science activity, and the development of regional, national and international healthcare systems.

The lack of medical professionals and healthcare providers is a national and international phenomenon. STEM skills combined with medical training results in the concept and professional field of “biomedical engineering” that generates solutions for multidisciplinary medical issues. Biomedical engineering represents one of the most rapidly growing branches of industry in the developed world and aims to provide revolutionary and innovative healthcare professionals that operate beyond the bounds of classical treatment. These specialists use their expertise to develop novel technical solutions, for example, using robotics in medicine.

The demand for IT specialists, engineers and natural scientists is only partly covered by graduates from universities. International trends and the experience of our Consortium show that there is a huge demand for skilled and highly motivated professionals in these sectors. VR (virtual reality) technology has been found to be a highly effective, reliable and interactive method for a wide range of education. VR technology offers a unique and modular training environment for both commonplace and specialised situations. It allows participants to gain practical skills in a safe, replicable setting, supporting functional competence to an advanced level. However, there are several challenges regarding this immersive and innovative e-learning tool, VR based platforms are not readily accessible, potential users do not have the proper knowledge and information about the technology, and in most cases, the stakeholders do not



have the necessary digital competencies to successfully implement VR technology in everyday teaching.

Preliminary needs analyses show that PhD courses, joint degree programs and part-time education programs have not yet been developed in VR spaces before, despite the large number of students involved in this sector. Distance education methods can be used not only in teaching theory, but can also be useful in developing practical skills in a noninvasive environment. It is also important that in practice-orientated education of medical and STEM science, an innovative, reliable, and accessible tool is needed to enhance interdisciplinary project work, which is especially important in the field of biomedical engineering. Based on previous collaboration of the Consortium Partners, the needs are clearly defined in terms of digital transformation, they are committed towards reshaping online and distance education using innovative technologies and good practice guideline of the proposed V.I.B.E. project, involving the target groups and wider public.

Objectives:

The goal of the V.I.B.E. project is to develop and strengthen the digital competencies and educational cooperation of the participating organisations, as well as to share the knowledge and good practice guidelines with the wider community.

The stakeholders include young people interested in medical and STEM higher education, university students and staff,

and citizens who are interested in this field. By implementing the project, we aim to attract and retain students and encourage them towards ongoing, life-long education with practice oriented tuition. Along with the Consortium members, we believe that VR technology is a compelling and powerful e-learning method. It is interactive, easy to standardize and has innovative features that can be easily adapted and implemented in virtual platforms. When preparing future biomedical engineers, VR technology lets us to create dynamic clinical environments and allows a more authentic approach for continuous improvement and problem-based teaching. Based on the detailed needs analysis, we aim to thoroughly explore the possibilities that VR platforms can provide and critically evaluate available solutions.

The criterion for the evaluation includes the following: accessibility, availability, adaptability and sustainability. Standardization, the possibility for continuous feedback, and analysing data are key elements in the project. All results and conclusions will be disseminated on a scientific and public basis. Building on data and previous experience gained by our institutions, our aim is to establish VR based BSc and MSc training, as well as a joint degree program in collaboration with our partners. PhD courses and part-time courses will be organized for lifelong learning, along with sustainability and continuous improvement of the project. The Consortium would like to gain a deeper knowledge about digital and VR based online learning platforms, and share this knowledge, not only with the participants, but with the wider population as well. In addition to benchmarking and evaluation of different IT solutions, getting experience about virtual learning and course development is among the main goals of the project. The possibility of co-creation and collaboration using VR tools is especially important in STEM and medical education, therefore exploring the process of online, VR based project work will also be examined.

As a result, we expect an increased level of digital competencies in the participating higher education institutes, a growing number of students interested in applying to the STEM and medical fields, including a major increase in female professionals and candidates from rural areas. The Consortium believes that the results of the project will create a new, immersive and inclusive digital environment for all stakeholders.