



VRinHE

VIRTUAL REALITY IN
HIGHER EDUCATION

Summary of Partner Reports: Policy and Practice Guidelines for Higher Education Institutions from Result 4

2024 | University of Latvia



1. INTRODUCTION

The final phase of the project focused on exploring and recommending how to integrate Virtual Reality (VR) and Augmented Reality (AR) technologies in higher education. This process included organizing focus groups with nine education leaders and policy experts, carrying out desk research, and conducting surveys among university students, learning technologists, instructional designers, faculty members, and university leaders, collecting a total of 190 responses. The aim was to understand the current state, experiences, and strategic policy implications of VR/AR in academic settings. The project aimed to gather diverse perspectives on the challenges and opportunities presented by VR/AR, with the goal of providing actionable policy and practice guidelines for higher education institutions to effectively incorporate these technologies into teaching and learning environments.

2. THE RESULTS ACROSS PARTNER-COUNTRIES

Austria:

The focus group discussion with a Higher Education leader and a policy maker shed light on the integration of VR/AR technologies in higher education. They revealed a limited familiarity with current VR/AR trends due to minimal professional experience and the rapid pace of technological advances. Concerns raised included budget constraints, programming complexity, and the curriculum's inability to keep pace with technological advancements. Additional challenges identified were data protection, health and safety, and the need for curriculum adaptation to match technological progress. The conversation also highlighted the necessity of open dialogue and reducing anxiety around these technologies.

Key national policy recommendations called for the **complete integration of digital tools in education, proactive university engagement in digitization efforts, and enhancing teacher proficiency in digital technologies**. The COVID-19 pandemic's role in accelerating the shift towards innovative teaching technologies was noted as an irreversible change.

Greece:

Greek participants discussed the strategic integration of VR/AR to enhance learning outcomes, emphasizing collaborative initiatives, faculty training, and evidence-based decision-making for sustainable investment. There was a strong belief in the role of VR/AR in skill acquisition relevant to the labor market.

The integration of VR and AR technologies into higher education necessitates thoughtful policy development to enhance learning outcomes and create immersive educational experiences. Policies should focus on evaluating the pedagogical impact, cost-effectiveness, and sustainability of VR/AR, providing a basis for resource allocation and informed decision-making. Recognizing the potential of VR/AR to boost institutional attractiveness, these policies should support comprehensive adoption across education levels, facilitating industry collaboration to ensure graduates have relevant skills for the workforce. **A proactive policy framework** is critical for unlocking the potential of VR/AR in higher education, ensuring a dynamic, immersive, and innovative learning environment.

Latvia:

The discussions in Latvia highlighted the extensive knowledge and practical experience with VR/AR technologies among higher education and policy sectors. There was a consensus on the strategic need for integrating these technologies to improve learning outcomes, with emphasis on sustainable investment, enhancing institutional attractiveness, and addressing technological transformations.

To harness the transformative potential of VR and AR technologies in higher education, **strategic policy measures** and **collaborative efforts** are essential. Policies should focus on developing a comprehensive framework for VR/AR integration that balances educational benefits with costs, supports continuous professional development for faculty, enhances digital infrastructure, promotes the creation of quality VR/AR content, and fosters pedagogical innovation. Additionally, **fostering student engagement and competence in digital technologies** is crucial for preparing them for the technological demands of the future labor market. Importantly, **continuous and long-term funding** must be in place to plan for the long term,

ensuring sustainable investment in VR/AR technologies and their integration into educational practices.

Cyprus:

VR/AR integration into higher education is seen as a promising yet challenging endeavor. Participants acknowledge the potential of VR/AR to enhance teaching and learning experiences but note limitations in its applicability across all fields. Challenges include high equipment costs, lack of content creation skills among teachers, and insufficient high-quality materials.

To effectively integrate VR and AR technologies in higher education, it is essential to establish a **specific policy framework** that includes clear guidelines, aligns with curricula, and sets forth evaluation criteria for these technologies' use. Additionally, **securing funding and fostering collaboration with the private sector** are crucial for acquiring necessary equipment and infrastructure. Emphasizing **practical training and further support** is also vital; this encompasses providing ready-to-use, high-quality materials, facilitating the exchange of good practices and open educational resources (OERs), and encouraging collaboration across universities. These measures will guide higher education institutions in leveraging VR and AR technologies to enhance teaching and learning experiences.

3. Summary of Key Policy Recommendations for Integrating VR and AR in Higher Education:

The recommendations across these countries converge on the importance of thoughtful policy formulation, prioritizing educational benefits, addressing infrastructural and pedagogical challenges, and ensuring VR/AR technologies are sustainably integrated into higher education to prepare students for a future shaped by rapid technological advancement. Essential points include:

- **Developing Specific Policy Frameworks:** Tailored policies according to each HEIs profile should clearly outline integration guidelines, curricular alignments, and evaluation criteria for VR/AR use, ensuring they enhance learning outcomes and institutional appeal.

- **Securing Sustainable Funding:** Long-term financial strategies are essential, including partnerships with the private sector to fund necessary technology and infrastructure. Sustainability should also consider long-term structures, such as e-Learning Centers, to aid in each higher education institution's digital transformation.
- **Emphasizing Practical Training:** Enhancing educational institutions proficiency through practical training and support, including access to high-quality materials and good practice exchanges, is vital.
- **Fostering Collaboration and Innovation:** Encouraging cooperation across universities and with industry partners can help align educational content with labor market needs and support the development of relevant skills.