

1.4 Blending physical and virtual mobility in Higher Education

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Project

1 Introduction

In recent years there has been an increasing need for a sustainable transformation in higher education that focuses on integrating digital and physical learning experiences (Abad-Segura et al., 2020; Kreuzer et al., 2022). This paper reports a blended learning approach combining online team learning with face2face interactions. The primary objective is to enhance learners' 21st-century skills, particularly in teamwork, interdisciplinarity, and international collaboration. The blended learning course was implemented first time in the summer term of 2023 with 30 participating students from Albania and Germany, supported by Erasmus + KA171 funds for short-term mobilities. The aim is to foster trust, commitment, and coordination while expanding digital competencies and promoting active online engagement.

2 Conception

The module is divided into two synchronous face-to-face sessions of one week each and an 8-week asynchronous online group work phase. The groups were supervised by a supervisor and an e-tutor who provided organizational and content-related support in all module phases.

Online phase

Between the face-to-face workshops, the small groups of 4 to 6 members are on the MS Teams learning platform. They receive regular tasks that they solve in the group. The concept is based on problem-based learning, which does not aim for a universal solution but allows for different strategies and results (Tan, 2010). The module's aim is the didactic conception of a case study with a freely chosen topic to be created within the framework of the Virtual Collaborative Learning Framework, which transfers learning in small groups into the virtual space (Schoop et al. 2021).

Face2face phase

At the beginning and end of the module, students are guests at one of the two participating institutions. The initial on-site workshop took place at the TUD Dresden University of Technology. It aimed to familiarize students with the Virtual Collaborative Learning Framework, which forms the basis for creating the case

studies. Furthermore, the internationally and heterogeneously mixed groups have already been divided. Subsequently, the first ideas for the thematic location of the case study were developed and discussed in plenary. Finally, the groups could get to know each other and bond during the cultural events. After the end of the virtual phase, another week of face-to-face workshops took place, but this time in Tirana at EPOKA University. Here, the students had further workshops on the possibilities and limitations of ChatGPT along with critical and ethical thinking that have gained increased attention within the digital domain. Finally, all groups presented their case studies developed during the online phase in front of a jury of Albanian and German professors. Afterwards, the presentations were discussed in the plenum and evaluated by the professors using an evaluation form.

3 Implementation

Timeline

The total 10-week duration of the module begins with a one-week on-site workshop at TUD Dresden University of Technology. This is followed by virtual work in small groups for eight weeks. The first two phases for onboarding and needs analysis last one week each. The subsequent phases for design, cover story and roles, and development and feedback, took two weeks each (See Figure 1). For the final presentation, follow-up and cultural exchange, the students, an e-tutor and two lecturers came to Tirana, Albania, for a week at EPOKA University.



Figure 1: Sequence of the module (Own representation)

Partners

The project between the TUD Dresden University of Technology and the EPOKA University, funded by the DAAD for three years, primarily promotes the physical exchange of students in the sense of short-term mobility (in this case, 15 students from each of the partner institutions) as well as the exchange for a complete semester. The partnership has grown from the previous Erasmus+ project VALEU-X and continues in the DAAD project described here and the Erasmus+ project COWEB.

Tools

The Microsoft Teams learning platform is available to students for communication and collaboration. Students can use this to its full extent. We follow the bring your own device approach (BYOD) to create as few barriers as possible for students. Albanian students can use the PC Lab financed by the VALEU-X project for their collaboration activities.

Activities

In addition to the learning activities, great emphasis was placed on cultural exchange and bonding in the group during the synchronous workshops to support the most realistic experience possible for the students. This was ensured on the one hand by joint excursions in the sense of cultural exploration and on the other hand by group activities to get to know each other and break the ice. In particular, the physical exchange before the start of virtual mobility (online activities that foster cross-border collaboration) is perceived by students as a clear advantage for group cohesion (Altmann & Clauss; 2020).

Evaluation

The motivation of the participating students was especially possible due to the bilateral recognition of ECTS. This is crucial for successfully implementing blended exchange modules (physical and virtual mobility) and avoiding conflicts and dropouts (Altmann & Clauss, 2020).

4 Lessons Learned from Tirana & Dresden

Cultural exploration and teambuilding

The cultural activities incorporated alongside the lectures proved to be highly beneficial, positively impacting the development of intercultural skills and fostering increased commitment within the team. Participants from both countries could leave their comfort zone and engage in cross-cultural learning with their colleagues. Due to the shared experiences during the city tours, networking dinners and exploration of local traditions, the team developed stronger bonds and built trust among team members.

Change between online and offline phases

To ensure continuous collaboration independent of the phases, the collaboration took place within the VCL framework. The framework integrates blended learning and flipped classroom elements and is used in all collaborative online international learning (COIL) modules (Bishop & Verleger, 2013; Seufferth & Mayr, 2002).

University infrastructure

A prerequisite for successful integration is the provision of technology, especially for virtual exchange. The previous VALEU-X project enabled EPOKA University to set up PC pools and labs for students. The University of Dresden also provides resources for students with computer science labs.

Active familiarization with the target format COIL and with the platform MS Teams

The successful establishment of the COIL module with accompanying short mobilities at each site benefited from using the Microsoft Teams collaboration platform during the online phase (Schoop et al., 2020). The necessary knowledge about MS Teams could be covered during the workshops by means of comprehensive introductory courses.

The motivation of external participants

The on-site workshops, organized by the research associates from TUD Dresden University of Technology at the EPOKA university, aimed to engage a wider audience and create awareness about Digital Readiness and Virtual Mobility. These workshops allowed students not directly involved in the project to learn and gain valuable insights. However, it became evident that there was a need for additional motivation among these students. To address this need, the TUD team recognized the importance of highlighting the relevance and potential impact of the project on a larger scale. Real-life examples were presented to demonstrate how the topics of critical thinking in a digital context and ethical digital citizenship could impact students in their daily life.

Support by E-Tutors

During the whole project, students were supported by virtual learning facilitators and e-tutors, who offered pedagogical support and promoted collaborative learning in the teams. The e-tutors played a vital role in bridging the gap between traditional on-site classrooms and online education, fostering a supportive environment for students' academic growth (Clauss et al., 2020).

5 Conclusion

The successful implementation of a joint COIL module between EPOKA University and Dresden University of Technology emphasizes the significance of virtual mobility in the landscape of Higher Education. Through the COIL module, students from both universities had the opportunity to participate in a structured educational program that combined online and offline phases. Hence, this blended approach integrated both virtual interactions and face-to-face meetings, ensuring a comprehensive learning experience. On the one hand, by leveraging technology, students can engage in cross-border collaborations and learning activities without the limitations imposed by physical distance. On the other hand, due to the offline phases in both countries, students had the chance to experience intercultural and collaborative exchanges that reinforced the development of international and intercultural skills.

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