Abstract

In this paper we introduce the possibilities virtual mobility can offer to support and facilitate international internships. Virtual mobility is hereby defined as “a set of ICT supported activities that realize or facilitate international, collaborative experiences in a context of teaching and/or learning”. From a time perspective, we can distinguish three different phases in setting up and undertaking an (international) internship: before, during and after. In each of these phases one or more different stakeholders are involved and virtual mobility activities can help to enable an optimal interaction between the different stakeholders. A successful implementation of virtual mobility in international internships is not self-evident. Especially in case of fully virtual internships there are a lot of aspects and conditions to consider beforehand. The European project EU-VIP (Enterprise University – Virtual Placements) looked into these conditions for success. The findings of this project and the context of it’s follow-up project PROVIP are presented in this paper.

Keywords: Internships, virtual mobility, internationalization.

1 CONTEXT AND DEFINITIONS

International internships are gaining more and more importance in the context of internationalization of higher education and globalization of our (professional) world. Traditional international internships, where the learner travels to the company abroad, are not always feasible for all students because of financial, geographical, social or other reasons. For those physical placements abroad that do happen, there are also a number of difficulties to overcome, mainly related to a lack of communication between the student, the foreign company and the institution for higher education.

Virtual mobility, defined as “a set of ICT supported activities that realize or facilitate international, collaborative experiences in a context of teaching and/or learning”, offers possibilities to address these issues. It can be used to facilitate and support physical international internships (blended) or to realise international internships (virtual). We introduce virtual mobility here as an additional way of teaching and/or learning in an international context, not as a substitute for physical mobility. Both types of learning mobility have their own merits and disadvantages that should be taken into account.

Internships do exist in many different shapes and sizes. In the context of this article we focus on those internships that are offered and undertaken within the framework of formal tertiary education, as part of a curriculum. This type of internship involves three stakeholders: the higher education institution, the student and the receiving company or organization. During an internship these three stakeholders ideally interact with each other on a regular basis, although the main line of interaction will of course be between the student and the company/organization. Virtual mobility can be implemented to facilitate this interaction at a distance. This can happen on the three different lines of interaction between student, higher education institution and company/organization. The implementation of ICT to support interaction can also range from very limited (when most of the interaction between two stakeholders takes place face-to-face) to very far-reaching (when all of the interaction between two stakeholders happens at a distance). In what we refer to as a “virtual internship”, the interaction between student and company takes place (almost) completely at a distance, supported with technology.

2 VIRTUAL MOBILITY IN THE DIFFERENT PHASES OF AN INTERNSHIP

From a time perspective, we can distinguish three different phases in setting up and undertaking an internship: before, during and after. In each of these phases one or more different stakeholders are involved and virtual mobility activities can help to enable an optimal interaction between the different stakeholders. Every phase has its own attention points and issues.
2.1 Before

In the before phase preparations need to be made to ensure a successful virtual placement. In this phase it is essential to plan the placement thoroughly in all its aspects. Ideally all of these agreements, responsibilities and procedures are in the end part of a written agreement between all actors (see fig. 1).

![Fig. 1: the before phase of an internship](image)

Virtual mobility can be useful in this phase for example to organize a synchronous discussion between actors that are geographically widely dispersed, to select the right student, to introduce the student to the company and the culture of the “hosting” country and vice-versa to introduce the company to the culture of the student’s home country, offer preparatory training etc.

2.2 During

During the internship the focus will obviously be on the development of knowledge and skills through practical and authentic tasks. Next to discipline specific competencies the student will ideally also have the opportunity to work on generic skills like teamwork, international, social and communication skills. To stimulate this learning process coaching and feedback from academic and company mentors is essential. All coaching activities have to be in line with each other (see fig. 2).

![Fig. 2: during an internship](image)

Virtual mobility can be used in this phase to execute tasks for a company at a distance, for mentoring the student by academic or company staff, to organize peer feedback, or to stimulate student reflection (e.g. through use of a blog or an e-portfolio).

2.3 After

In the “after” phase evaluation is the central theme (evaluation of the student but also assessment of the cooperation between the higher education institution and the company/organisation) (fig. 3).
Virtual mobility can come in useful here to discuss student assessment or evaluation of the placement or to make a final assessment of the student’s performance based on an archived use of collaboration or reflection tools.

3 CONDITIONS FOR SUCCESS

A successful implementation of virtual mobility in international internships is not self-evident. Especially in case of fully virtual internships there are a lot of aspects and conditions to consider beforehand.

3.1 Student characteristics and motivation

Not every student will be able to undertake an international internship that involves a high level of virtual mobility activities. Especially in the case of a virtual internship, the student involved will need to have good meta-cognitive skills, i.e. he or she needs to be able to take control of and plan their own learning process. A virtual internship is therefore more suitable for students with a higher level of prior education (e.g. master students). A target group that is prominently suitable for virtual internships are adult learners, who would also benefit most from this flexible opportunity to undertake an international internship. In case students with lesser meta-cognitive skills embark on a virtual adventure, a stronger support during the internship by the academic staff will be required.

Students preferably already possess the necessary ICT skills and have previous experience with virtual mobility activities. If this is not the case, they will need proper instruction and time to practice and experiment with virtual communication before the internship starts. In general, motivation seems to be one of the major reasons why internships succeed or fail in their learning objectives [1]. A high intrinsic motivation of the student is even more important when it comes to bringing a virtual placement to a successful end. But a high student motivation at the start of the internship will not suffice. Motivation will need to be fed and stimulated throughout the entire enterprise. Important factors here will be: the quality of the e-coaching provided, integration of the human factor into the virtual experience and the quality of the tasks that need to be performed:

- tasks need to be in line with the expectations of the student regarding the contents of the internship,
- tasks need to be achievable in terms of difficulty, available time and resources, but they also need to be challenging at the same time [2],
- tasks need to be authentic and must be part of real projects addressed to satisfy real needs of the enterprise.

3.2 Involvement and commitment of all actors

Not only the student needs to be highly motivated to bring a (fully or partially) virtual internship to a good end. Because of the required preparation and crucial tutoring quality, the integration of virtual mobility activities in internships needs to receive proper support from the managerial level within the higher education institutions and the companies or organizations involved. Mentors and placement coordinators need to be motivated to guide students through the process. This motivation is more
likely to flourish in an environment where they have been specifically assigned this task and receive sufficient time and recognition to perform it in a satisfactory way.

A structural implementation of virtual(ly) supported internships, as part of a sustainable internship programme, will also help to gain general acknowledgement of and support for this type of internship. It is likely that a virtual internship will take a lot of time and “getting used to” the first time around for all actors involved, but this will improve when tutors, co-workers, managers etc. have previous experiences in this area.

3.3 Quality of e-coaching

We use the term e-coaching here as an umbrella concept which comprises all related terms like e-mentoring, e-tutoring, virtual support etc. E-coaching is coaching from a distance with the help of technology. It can be done using synchronous and asynchronous tools. The coaching can be aimed at one individual or at a group of people. Coaching can be about exchange of information, about training or instruction or about giving feedback [3]. This last function is the most important in a student–coach interaction, but also the most complicated. It is important to have a clear idea about the objective of the feedback before giving it. The academic mentor will focus in the first instance on providing the student with insight regarding his or her learning process (is the student on his/her way to reach the set learning goals?) and to stimulate student reflection and self-assessment. Feedback from the company tutor will be mainly aimed at the performance of the task at hand. Peer students can also be involved as e-coaches. Try to determine beforehand what the main function of the peer feedback will be and communicate this to the students. In the event of a large number of students and a limited amount of e-coaches, it can be a solution to use virtual group settings (e.g. through video or web conferencing) in which peer feedback can also be included.

Except for the quality of the feedback, there are a number of extra attention points when it comes to making e-coaching work:

- It is strongly advisable to work with a communication protocol that defines the practical conditions for the coaching process.
- A good protocol will help to establish a feeling of availability of the e-coach. It is crucial that students can “feel” the presence of the e-coach(es).
- A good protocol is needed even more in a virtual group setting in order to prevent a chaotic and uneven discussion.

3.4 The internship model

Internships exist in many shapes and sizes. Not all types of internships are equally suitable for the integration of virtual mobility activities in the interaction between student and company/organization. Internships can differ in length: there are very short “work experiences” mainly aimed at immersing the student in the basic concepts of a professional function and there are long-term internships in which the student really becomes an employee for several months. Virtual internships work better on a long-term basis. In this way there will be sufficient time to build up trust via virtual communication and to get familiar with this “new” way of working. Virtual internships can create possibilities for students (e.g. adult learners) to undertake long-term international internships when they are not able to stay abroad for a long period of time. The virtual aspect really becomes an added value when a flexible work organization is allowed.

A lot of internships from higher education students are organized following the, what we might call, ‘Laissez Faire’ model: students are sent out to companies without much preparation before or guidance from the educational community during the internship [4]. The concrete contents of the placement are up to the receiving company. It is already clear from everything written above that the transfer of this model to a virtual internship is unlikely to be successful. The integration of virtual mobility in a placement will require a “Formally Structured” model which comprises thorough preparation, clear agreements and strict communication procedures. Internships can also differ as far as the general goal is concerned. Internships can be aimed mainly at discovery (short work experiences), specialization, recruitment or assisting in a specific company project. For the latter type of internship it will most likely be less necessary to be involved in all day-to-day activities of the company. Therefore this type will also be more suitable to be performed at a distance.
3.5 The human factor

Face-to-face contact between the actors at the company/organizations and the student at some point in time is almost always beneficial to the success of the activities. These contacts are important in building mutual feelings of trust and responsibility. For the company involved, face-to-face contact also creates a feeling of control over the student’s work. For the student on the other end there is less risk to start feeling isolated. Ideally a limited amount of face-to-face contact moments (e.g. at the start, the middle and the end of placement) are arranged. If this is not possible, there are a number of attention points to take into consideration that can help reduce the risk factors described above:

- Choose technology that creates the possibility to interact synchronously in a setting that is as close as possible to a face-to-face setting (e.g. video or web conferencing).
- Consciously define space for non-task-related communication. (e.g. talk about other projects of the company, the news, social events, etc.)
- In case a student does need extra control during task performance, an academic staff member could also fulfill this controlling role.
- Consider letting students work in a team to perform tasks for a company.

3.6 Organizational socialization

The overall design of the internship plays an important role in realizing “organizational socialization”, i.e. exposing the student to an organization’s social and cultural aspects and making him/her feel part of the organization/company. Organizational socialization is what makes the difference between conducting an isolated student project and undertaking a work placement. If we want to make the work placement a social learning process in an authentic context we need to pay attention to this point, even in a traditional setting where the student is physically present at the company’s premises. The degree in which organizational socialization can be realized is related to the length of the internship, to the degree in which interns are able to collaborate with different members of company staff, to the degree in which interns are allowed to work on tasks that are of real value to the company, etc. In a virtual interaction between company and student, organizational socialization is even more difficult to realize. Try to avoid a strict one-on-one setting. Concrete strategies here are:

- Inform the student elaborately about his or her virtual co-workers and provide information about how and when everybody can be reached (e.g. through the creation of an online environment with pictures and contact information).
- Also make sure all company staff members involved are informed of their temporary virtual colleague and of what is expected from them as far as collaboration is concerned. The first time around this will probably ask for some adaptation and guidance.
- Opt to work with electronic collaboration tools which allow group interaction, such as Skype (group audio conferencing) or Adobe Connect (group video conferencing and document sharing).
- Let the trainee participate in staff (or other) meetings via video conferencing.

3.7 Intercultural skills development

The main goal of internationalization is to develop intercultural competencies: to enable students to tolerate and embrace differences without feeling threatened in their own identity [5]. An international internship of course provides an excellent opportunity to work on these skills in a professional environment. However, the development of these type of skills is not self-evident just because a student is exposed to another cultural environment. Even in traditional physical international internships, intercultural competencies are only really acquired when explicit attention is paid to the development of these competencies. From before the internship the student should be aware of what “intercultural competencies” are and that it is an explicit learning goal to work on these competencies. During the placement, students need to be stimulated to reflect upon this on a regular basis. Essential here are formative assessment and feedback, also from peers in similar situations. Virtual mobility activities through video or web conferencing, or through the use of discussion forums, e-portfolio etc. are prominently suitable to support this process of feedback and reflection at-a-distance with the student in one country and the academic mentor and/or peer students in another.
Gaining intercultural competencies in a virtual setting is of course still an entirely different matter. There is no “immersion” in the other culture as will be the case during a stay abroad. Body language and intonation will also be less on the forefront during virtual interaction. Nevertheless it is possible to at least develop a sense for dealing with cultural differences through virtual mobility activities if the following points are taken into consideration:

- As for traditional internships: explain beforehand, give feedback and stimulate reflection. This is always of key importance.
- Focus on differences in written communication, negotiation styles, business cultures, decision making processes (e.g.: formal vs. informal communication; importance of hierarchy;…)
- Do not limit the interaction to a one-on-one situation. In this case personality traits will be more determining for the experience than cultural identities.
- The student preferably has previous experience with virtual communication.

4 BACKGROUND: THE EU-VIP AND PROVIP PROJECT

The findings above are the result of the EU-VIP project (http://www.euvip.eu). EU-VIP stands for Enterprise-University Virtual Placements. The project looked into the possibilities virtual mobility can offer in the area of international internships. EU-VIP was funded by the European Commission within the Lifelong Learning Programme. It ran from October 2009 until September 2011. The project brought together 16 partners from 8 different countries.

Firstly, the project established a state-of-the-art report regarding virtual and blended internships. Starting from this document and additional research, the partnership put together a scenario for organizing virtual and blended internships. This scenario served as a general framework to design and implement 19 pilot projects.

Before executing the pilots, pilot participants (students, teaching staff, administrative staff, company mentors…) received local training adapted to their specific needs (development of technology skills, help while implementing the general scenario, how to undertake e-coaching). After pilot execution, all participants contributed to the evaluation of the pilot, via surveys and/or interviews. The feedback from the pilot participants was used to further expand and fine-tune the framework and to identify critical success factors for the integration of virtual mobility in internships.

The topic of virtual mobility and internships generated a lot of interest and enthusiasm among higher education institutions and students during the many EU-VIP dissemination activities. However, the business stakeholder group turned out to be a lot more difficult to reach. A clear need was being felt to seriously enlarge the dissemination potential towards businesses. Secondly, as already mentioned before, the EU-VIP project noted that international internships are mostly the result of individual relationships or actions, while, as described above, for successful virtually supported internships a structural implementation and collaboration between higher education institutions and companies is desirable.

These issues are now being addressed in the follow-up project PROVIP (“Promoting Virtual Mobility in Placements” (2012-2014). This project is aimed at disseminating the EU-VIP and PROVIP results to business stakeholders on the one hand and creating structural international cooperation regarding virtually supported international internships between higher education institutions and the business world on the other hand, facilitated through a collaboration platform. The progress of the PROVIP project can be followed via the website http://www.provip.info. This project is also funded with support from the European Commission under the Lifelong Learning Programme and hope to contribute to the realization of mobility for all in the European higher education area.

REFERENCES


