



## EMPOWERING STUDENTS IN HIGHER EDUCATION. PERSPECTIVES ON EPORTFOLIOS' CONTRIBUTIONS

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### ABSTRACT

*In this article we present and discuss some of the preliminary national results of the project “Empowering Eportfolio Process” (EEP), an Erasmus+ KA2 program. At this stage of the research, the Portuguese team of the College of Education of the Polytechnic Institute of Setúbal (ESE-IPS) will present some of the emerging ideas that have come to light from the first stage of the ongoing qualitative study, which is focused on the students’ perspectives on the use of ePortfolios — more specifically the students of the International Semester. We will discuss into what extent these practices can contribute to students’ empowerment and to develop transformative capabilities — such as autonomy, reflexivity, critical thought, creativity and cooperation, amongst others. We also intend to discuss these practices implications to Higher Education, particularly orienting the discussion to the scope of pedagogy.*

### INTRODUCTION

In the framework of the Project “Empowering Eportfolio Process” (EEP), an Erasmus+ KA2 project, which is currently been developed by five education institutions in Europe (HAMK-Finland, VIA-Denmark, KH Leuven-BE & KU Leuven-BE, MIE-Ireland, ESE-IPS Portugal). One of its aims is to emphasize the ownership of students in their learning process and their central role in creating their own ePortfolios, which can be used as workspaces during the learning processes but also as showcases, when they want to find a job or connecting with the world of work (Kunnari *et al*, 2017). Since the beginning of the project, in September of 2017,



the Portuguese team of School of Education - Polytechnic Institute of Setúbal (ESE-IPS) has developed several strategies related to the aims of the project, such small-scale exploratory studies and pilots. In this paper we present the reflections arose from one of the pilots focused on the use of ePortfolio, developed in the academic year of 2017/18.

The article is organised in three main parts: in the first one we contextualise the ongoing study with a brief literature review, highlighting the relevance of the use of ePortfolios in Higher Education. Secondly, we present the methodological option taken in the study, which is qualitative and interpretative, we characterize the context and the group of students that have participated and the technical procedures used to collect and analyse the information. In the third part of the paper we discuss the main ideas that have emerged from this stage of the research. In the conclusions we highlight some of the most relevant pedagogic issues related to the students' perspectives on the use of ePortfolios in Higher Education.

### **EPORTFOLIOS IN HIGHER EDUCATION**

The focus of EEP project is to develop student-centred education in HE, through an empowering and dynamic approach to the ePortfolio process — articulating learning, assessment and guidance practices. The aim is to increase students' academic success and to develop learning and career management competences, looking for active citizenship, social participation and professional success within the digital world (Kunnari & Laurikainen, 2017). The project is focused in the use of ePortfolios as learning and assessment tools in Higher Education, aiming to study several aspects which can contribute to making students more involved in their learning process and take responsibility for it.

In a previous publication we had analysed ePortfolio definitions (Rodrigues, Pires & Pessoa, 2017-b) that depends, fundamentally, on the purpose for which it is developed and on whether using it is optional or compulsory (Beckers, Dolmans & Merriënboer, 2016). We agreed with Barrett (2006) on the idea that it is a collection of materials which are gathered, selected and reflected upon, through which it is possible to evaluate the evolution in competencies.

Within the framework of EEP project, the definition of ePortfolio refers to “student-owned digital working and learning spaces for collecting, creating, sharing, collaborating, reflecting learning and competences, as well as storing assessment and evaluation. They are platforms for students to follow and be engaged for their personal career development, and actively interact with learning communities and different stakeholders of the learning process” (Kunnari & Laurikainen, 2017, p. 7). Theory gives light to the idea that learning portfolios (digital or not) promote processes of reflection and identification, reinforcing the sense of authorship and responsibility. Research has shown the contributions of *reflexive* portfolios in HE as



processes of construction of knowledge, transformation of practices and contexts, professional emancipation and pedagogical innovation (Gonçalves & Ramalho, 2009; Sá-Chaves, 2005). According to Morgado *et al* (2009), the pedagogic principles of a learning portfolio are reflexivity, democraticity, creativity and innovation, which promote the development of conscious and active students, therefore contributing to their empowerment.

One of the exploratory studies developed by this research team within the framework of the EEP project highlights the contribution of ePortfolios to the development of students' critical thinking and reflexivity, as well as creativity, sense of ownership and spirit of cooperation (Rodrigues, Pires & Pessoa, 2017-b). Other study has shown that ePortfolios experiences have contributed significantly to their learning and development processes, from a multiple and integrative perspective (Pires, Rodrigues & Pessoa, 2018). Students considered that have developed digital competences/technological skills and a wide range of transversal and transformative capabilities linked to the process in itself, such as creativity, autonomy, reflection and logical thinking, capability to select and organize information, systematization, collaboration and sharing, between others (Pires, Rodrigues & Pessoa, 2018).

### **METHODOLOGY OF THE STUDY**

The nature of the study is qualitative (Bogdan & Biklen, 1994; Azevedo, et al, 2010; Amado, Crusoe & Vaz-Rebelo, 2014), emphasizing the comprehension of the educational phenomenon in its complexity. The main goal of this stage of research was to identify students' perspectives on the use of digital portfolios in HE, based on the experience of particular settings and groups of students. Three types of information collection procedures were used, suiting the nature of the information to collect and considering the resources and time constraints: questionnaires (anonymous, passed before and after the course), participant observation (during classes) and final reflections written by the students, close to open questionnaires or compositions (Amado, 2014).

The initial and final questionnaires were constructed with the *Google Forms*. Qualitative and thematic content analysis was developed with data from questionnaires, registers and students' written reflections.

The research questions that were the starting point of the study were related to the students' experiences and perspectives of the use of ePortfolios. The aim was to understand the engagement process and the personal and organizational conditions that trigger students in the creation of ePortfolios: the perceptions on the benefits and challenges, the type of relations established between students and teachers, the type of competences are needed and developed with the ePortfolio process.



### **Context of the study**

We have chosen to present one of the pilots of the ongoing EEP project, focusing on the experiences of the students enrolled in the curricular unit Digital Storytelling, which belongs to the study plan of the ESE-IPS's International Semester. The International Semester, launched in 2016/17, is conceived to all undergraduate students (*incoming*) in the context of transnational mobility programs of Higher Education, who intend to study at ESE during the 2nd half of the academic year. The main purpose of the International Semester is to contribute to the development of broader perspectives of understanding and knowledge of other realities, for the extension of personal contacts and the deepening of interpersonal relationship skills, and to enhance knowledge of other cultures and ways of being and doing. It aims to promote meaningful learning — through student centred methodologies, contextualized projects involving the coordination / integration of knowledge and skills from different curricular units and articulated with the wider community. The principles that underlie the construction of these curricular units are flexibility, transversality and articulation. Students can choose what are the curricular units that better suits their interests, in fields of knowledge that are transversal to the areas of their courses.

Like the other International Semester's curricular units, Digital Storytelling adopts an approach focused on the student. It has been organized to enable students to establish contact with the recent systematization of the oral tradition of stories, with their evolution to digital stories, ending with the construction of a digital story, thus developing their digital skills. Students are guided in the discovery and exploration of instruments that contribute to the construction of digital stories. The theme of the story must be negotiated with the teacher and, if the student is also attending to other curricular units of the international semester, he/she can choose any item of the programs and negotiate with both teachers.

The students must create a blog, which is the support for the digital portfolio, that will be a common tool to all the International Semester's curricular units: it was conceived to be an integrative and formative learning strategy, working as a support for learning and for assessment. The blog is the work space and the showcase of the work developed during the semester.

### *Participants*

Although there were a total 15 undergraduate students enrolled the International Semester, the curricular unit Digital Storytelling had 8 students enrolled, all women, five from four different European countries (Austria, Belgium, Turkey, Finland) and three students from Brazil. The studies they were doing in their countries were mainly in the areas of education, social work and media studies.



Age	20	21	23	24	28
Number of students	3	1	1	2	1

Table 1 – Age of the students

## RESULTS AND DISCUSSION: WHAT TRIGGERS STUDENTS TO CREATE EPORTFOLIOS?

In this part we articulate data from the questionnaires and some excerpts from the written reflections elaborated by the students. Data collected from the initial questionnaire evidence that all students had already had experiences with ePortfolios, all related to their courses, with the aim of developing and presenting academic works. A student has referred that “I have mine since I started college, to keep my creations stored and available for others to see. Whenever I had a job interview I could log in quickly and show my work to the employers.”

The digital supports that students have used in the construction of the ePortfolio were: Mahara, Moodle, Wiki, Blogue, Tumblr and other websites.

Four students rate their digital competences as weak (in a scale from 1 to 6, two students they rate themselves with 2 and other two with 3); the other four students rate their digital competences as good (one with 4), very good (two with 5) and one as excellent (6).

### What triggers students to create ePortfolio?

By the end of the semester, students refer that they are triggered by different aspects of ePortfolios. They highlight both the process and the content: making knowledge acquisition easier and assessing learning on a continuous way: “*Making knowledge acquisition easier and assessing learning process throughout the academic life*” or “*to create an ePortfolio is an excellent idea for we students, because it ampliant our experiences and our learning a lot different things.*” as well as working better in groups :“*It makes the work in the group a lot easier*”, developing competences: “*become better in ICT tools*” and doing things that they had not done before: “*(...) it was very interesting for me because I never worked with a blog*”.

They also highlight personal aspects, such as “*Learning new tools to impress yourself*”, or related to freedom “*The freedom to post your own things*”, and feeling proud to acknowledge what they have achieved “*make me think of a close-future*”.



*idea of looking back at my work and feeling proud of what I've done in my interchange program.”.*

In previous studies with ePortfolio, freedom was also highlighted by the students (Rodrigues, Pires & Pessoa, 2017-a). This dimension can be related to students' autonomy. Autonomous students need to feel free to choose and to explore the situations and resources available.

### **What are the benefits?**

Students recognize that ePortfolios have several benefits, like portability and accessibility —” *I can take my eportfolio anywhere - as long as there's internet (which isn't something hard to nowadays)”, or “You don't have to print any documents, it is useful after your studies because you can look it up whenever you need it”, and “Digital form, everyone can see around the world and it is easy to share everything, get the modern style working skills”.*

The permanent updating and the sharing possibility between colleagues was highlighted: *“I had possibility to update the ePortfolio in every moment, always when was necessary. I can share with my colleagues every homework and also I had access to their blogs. I had a possibility to compare the advance of works during the semester.”,* and *“You can share your work with the other students very easy and it saves a lot of time”.*

They also recognize its transferability to working life: *“I can take it to a job interview, for example, without trouble. For me, it feels practical and easy to use.”*

They point out that it is sustainable for the environment *“It is also very good for the environment because you don't have to print every work”.*

It was also stated that ePortfolio also contributes to effective learning and motivation: *“ePortfolio gives students to collect their works and resources which are crucial for effective learning. Therefore, students' acceptance, motivation, assessment and the using of technology increase their creativity to ePortfolio.”.*

These findings are in line with previous results of EEP project.

### **What are the challenges?**

After the semester, some students considered that they did not had any difficulty: *“I didn't have any challenges! I loved the experience and will definitely keep doing it”,* and *“I think there are no challenges in relation with eportfolio, platforms or tools”.*

However, other students felt difficulties and faced the need of ICT skills: *“computer skills because starting point to the programs was a zero and how to get them work as you wanted to take a lot of time of course.”,* *“The biggest challenge for me was to create the blog because I am really bad with using the computers and it was confusing for me.”,* *“This blog was at the beginning difficult because I wasn't*



*familiar with the settings and everything. At my school we use an Eportfolio that is connected to our online platform that we use and it works different.” or “Students may need to upgrade their computer skills to use an e-portfolio managing the use of it”.*

### **Competences that are needed**

The majority of students consider that they need basic ICT competences to create an ePortfolio successfully: *“Knowing basics about the platform you're using to create your eportfolio, digital skills, finding information and using digital programs”, “First you need the skill to be able to work with the internet because you need to be able to do a little research and things like that. Additionally, you should know how to work with the computer.”.*

But there is other type of competences highlighted by students: *“I think that you need only creativity and will to shared and update every time”, and “Inspiration, creativity”.* The engagement in ICT tools is necessary, as stated: *“It is really necessary to be able to engage in learning via digital tools”.*

Previous EEP research has shown that it is possible to create ePortfolios with the basic ICT knowledge and skills, and students usually rate themselves globally with a medium/intermediate level of expertise (Kunnari et al, 2017).

### **Competences developed during the process**

All students recognize that they have developed digital skills, becoming more resourceful and confident: *“I became more resourceful, I wasn't afraid of sharing my thought with others”.* Besides that, the linguistic and narrative competences were also referred: *“I improved my English, I learned new tools and programs” and “I improved my skills of working with the internet and especially with the computers. And I improved also my ability to write essays and story's and now I also know how to create my own digital story.”* They also state that it boosted creativity: *“And of course, my creativity improved too.”*

Looking to the final results they feel proud of the work developed and can identify more clearly competences gained with the process: *“Seeing my blog now makes me realize that my semester was full of creation and creativity and I am proud to say, as a Brazilian student, that I improved a lot on my responsibility, my way of writing and telling stories, and just as a gift: my English.”*

Changes happened not only at the level of competences, but also as a transformative experience, as stated by a student: *“I felt like a new person afterwards and I was amazed how big changes happened inside of me. (...) So the new applications and programs to work with was only a tiny part of the whole process. Process included new learning, progress, growth and eventually empowerment.”.*



### Engaging relationships

Students highlight positive relationships with colleagues and teacher, based on collaboration, sharing of information, resources, and open communication: *“We both collected and shared our works and resources. It increased communication opportunities between professors, our peers and us a good relationship”*.

The mutual support was felt very important during the process: *“asking help, relating, sharing information and prevent misunderstanding which can escalate to frustrating and giving up”*.

Working together and knowing themselves better contributed to positive feelings, like *“friendship”*, as stated. *“We worked together on different projects and it was so interesting to see how different every work is. We get to know each other better by working together on the blog.”*

*“We have to learn how to cooperate with each other. And this course was a great example of cooperating with each other. Accepting each other for who they are and where they come from. I loved it!”*

The role of the teacher in supporting students’ engagement was highly recognized: *“I believe our teacher was always very stimulating because of her engagement with everything we did. She is always willing to help us achieve what we want, understands us, and tries to keep us making conversation about the things we've done in our ePortfolios.”*

They valued a teacher-student relationship based on advice, support, open-mind and by *“sharing information, telling tips how to make things and advising”*, and *“The teacher also showed us very helpful examples and supported us with our work.”*

This perception is in line with previous findings, reinforcing the value of tutoring *“(…) where the teacher, rather than just transmitting knowledge, takes on the role of learning advisor. Here, the teacher is valued because he becomes closer the students and seeks to understand their problem and direct them toward a solution.”* (Rodrigues, Pires & Pessoa, 2017-b, “Final Considerations”, para. 6).

### Use of ePortfolio as a learning and assessment tool

#### *As a learning tool*

The ePortfolio is highly valued as a learning tool, making processes easier and fun: *“It is a fun way of making assignments and it is also easy to evaluate.”* and *“For someone process of working digital can be easier, more relaxing, allows you to be more open and do something different, modern and especially fun”*. But it is also hardworking: *“Creating our own storytelling E-portfolio was very enlightening and fun, as much as it was a bit hardworking: I personally felt tenses to create my*





*projects - people will see it! It has to be perfect!*”, and the fact that it is going to be shared with other brings more responsibility to students.

It’s an engaging process for students: *“It’s perfect for learning because we can go on our friends’ blogs and read what they’ve done, compare with us, and engage in a mutual learning process.”* but perhaps not so easy for everyone: *“I think it might be a little bit difficult because if the students aren’t motivated to use it, they won’t use it to learn.”*

Based on collaborative learning, the ePortfolio developments can be followed in a formative and continuing way: *“I think it is a good and easy way to work together and share your own work with the other students. It is also easier for the teacher to have the students under control and follow their learning process.”*

By sharing and discussing, the process becomes more transparent for students: *“I like a lot, is a big opportunity to share the works with others, and can see the works from other too.”* In this way, visibility brings new opportunities to learning.

Besides, it contributes to relevant personal learning, creating and reinforcing identities: *“I find highly useful both in educational and the other field. It can also be used as a personal. It helps to create an identity and discover tacit knowledge within ourselves”*, allowing individuality.

These ideas reinforce ePortfolios as processes of hetero and auto-identification, reinforcing the sense of authorship and responsibility (Sá-Chaves, 2005).

*As an assessment tool*

The ePortfolio is also positively accepted as an assessment tool — both teacher-assessment and peer-assessment, as stated: *“It is really good because also the other students can see all the blogs of their colleges and check what they can make better and take some ideas.”*

*“It’s the best way of making an assignment. You can be as creative as you want to be and it allows you to be independent in a certain way.”*

Students have acknowledged that it demands permanent feed-back from teachers: *“I think it’s great as well, because the teacher can keep checking our work and comment in it, and see if we’re doing things in time.”*

However, students are aware that it is a continuous work: *“I think this can be a good thing but also the same as before ... if the students don’t do their best or leave everything to the last week it won’t have any effect ...”* and *“E-portfolio is a continuous action so I support using the e-portfolio as an assessment tool”*.

### **Recommendations**

At the level of recommendations, students have reinforced the importance and the role of the teacher: encouraging, supportive, engaging: *“Be more like teacher Z., engage with us! Be a friendly teacher and encourage us to keep doing our jobs cause*



*by the end of the day, we'll see our work done and realize how important the present of a good tutor was for our improvement."*

The transparency of the process and the visibility of the results was positively highlighted: *"I would totally recommend the work with the eportfolios because I think it is a good way of working with the students. And you can see really easy if the people like the work or not, you can just check the blog."*

The use of ePortfolio as a restrict or public tool was raised by one student, showing that the question of privacy is not equally accepted by all: *"A little tip can be not to use the E-portfolio public because there are students that work really hard and there are other students that are the opposite. And then it's easy to search for someone's work on the e-portfolio, copy paste it and then make some small adjustments. So give the students the chance to keep it personal and if it is important for you as a teacher to put it on line for everyone, give them the chance to do it at the end when everyone needs to be ready with their tasks."*

We are aware that this is a challenging issue. Some students do not feel comfortable with the idea of an open ePortfolio, leading us to accept that not all students want to see their ePortfolios public (Kunnari et al, 2017; Rodrigues, Pires & Pessoa, 2017-b).

### **CONCLUSION**

The current field of practice-based research sustains that ePortfolio practices promote students' transformative capabilities and develop a culture of social learning, creating new pathways for learner empowerment (Ryan and Tilbury, 2013). The ideas that emerge from this study — based on the international students' perspectives of ESE-IPS on the use of ePortfolios — are congruent with this assumption. Students have considered that ePortfolio has contributed to their learning and development processes, from a multiple perspective — development of digital competences/technological skills and a range of transversal and transformative capabilities linked to the process, such as creativity, autonomy, reflection and logical thinking, capability to select and organize information, collaboration and sharing, between others.

The analysis of the students' perceptions on ePortfolios allow us to affirm that can offer several advantages: availability, transparency, portability, and sustainability. Students recognize that ePortfolios are relevant tools for learning and assessment in HE, giving transparency to their development processes and results.



They faced challenges and overcome them, feeling confident with the teacher and colleagues support, showing a positive engagement and commitment to ePortfolio process.

Students also acknowledge the benefits of ePortfolio in their future professional life, reinforcing the EEP previous studies that highlighted their benefits in terms of easy access and sharing with others, low cost use and sustainable process to support personal development and lifelong learning (Kunnari et al, 2017).

These ideas are relevant contribution to the reflection and discussion about pedagogy on HE, allowing to expand traditional perspectives and the exploration of new pathways.

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