



WHAT WORKS (AND WHAT DOES NOT) TO INCORPORATE ETHICS AS A CROSS CURRICULAR COMPETENCE?

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ABSTRACT

In 2013, an ambitious plan was implemented at Universitat Politècnica de València aiming at ensuring that all graduates achieved a set of 13 transversal competences which would make them excellent graduates not only from a technical point of view, but also beyond.

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One of these competences in which we want to train and assess our students is "ethical, environmental and professional responsibility". This paper presents the study carried out to check whether this objective is achieved or not for graduates from six different degrees taught at UPV.

To this end, we analysed activities developed within each Bachelor degree curriculum, studying the suitability of each activity to the level of knowledge required in each course. We also analysed the perception of students and lecturers in charge of incorporating this transversal content within their subjects.

In view of the results obtained, "good practices" are proposed, indicating the activities carried out which have succeeded in increasing the students' training and knowledge related to this topic. Activities, which, despite being carried out for a certain purpose, do not manage to work on and assess this cross curricular competence, are discussed.

1 INTRODUCTION

The work presented herein summarises the main findings of the work carried out by the educational innovation and improvement team (EICE Remyp_07), by analysing the way in which the cross curricular competence of ethical, environmental and professional responsibility is worked and evaluated in several bachelor degree courses taught in different schools at UPV [1].

In particular, we focus on indicating the different teaching methodologies used to incorporate this cross curricular competence in the classroom and we analyse which of them have been most successful into their application.

To carry out the analysis we analysed materials used in subjects developing the competence within six degrees taught at UPV. This information was provided by the faculty teaching the specific subjects of the bachelor degree curriculum in which these competences are worked on and evaluated.

2 RESULTS

The specific description of the activities to be carried out for the achievement of the cross curricular competence is uneven, with a high number of subjects detected (27.45%) that do not describe them in detail [2].

After analysing the activities described by the faculty, interviews were conducted with lecturers to deepen their knowledge of activities carried out in the classroom. Even after the interviews, some of the proposed activities were not clear.

The way in which the incorporation of cross curricular competences at UPV degree programmes was approached has room for improvement. Once again, the workload was "passed on" to lecturers, who a priori had to work on and evaluate contents they did not necessarily are experts.

Participation in training courses was facilitated, but on a completely voluntary basis and as an additional task to the usual daily teaching and research tasks. On the other hand, there has been a lack of institutional evaluation of the way in which these

competences are being incorporated, with control being limited to the marks obtained by students (without considering whether we are evaluating these competences correctly). This fact leads to a loss of interest in correctly carrying out the difficult task of incorporating cross curricular competences into specific subjects.

Among the most common activities, one can mention the case study, used in 19.61% of subjects, followed by project-based learning and reading, both used in 11.76% of subjects (Figure 1). There is a very strong correlation between some methodologies and the particular Bachelor's degree.

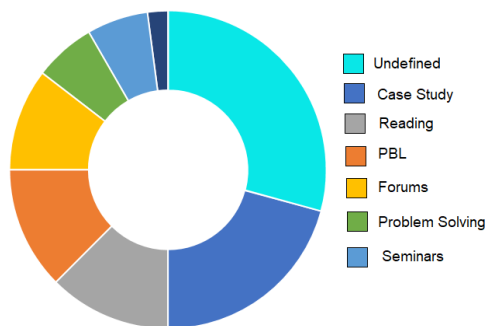


Fig. 1. Methodologies used for developing the UPV cross-curricular outcome [2]

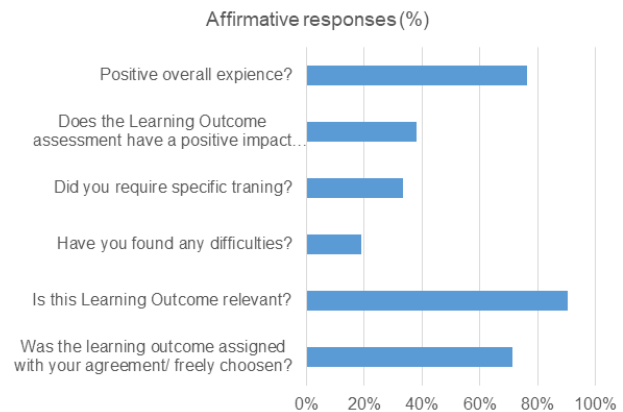


Fig. 2. Lecturers' opinions [2]

However, it is remarkable that most lecturers are willing to incorporate this content into their subjects along with other specific content. Most of them are also willing to design activities related to it. However, in a competence such as ethical and professional responsibility, it is essential to have knowledge of ethics in order to be able to do it correctly (although around 80% considered that they had no difficulty in incorporating it, Figure 2)

3 RECOMMENDATIONS FOR GOOD PRACTICE AND CONCLUSIONS

Having analysed all the material provided by lecturers in charge of working with and assessing the cross-curricular competence, we can highlight:

- It is necessary to train students who are to be assessed on the cross-curricular competence. Ethical, environmental and professional responsibility is not something that students have innately, nor is it something "personal" or belonging to the private sphere of individuals. For this reason it is imperative that students are trained prior to carrying out the activities in which they will be assessed.
- It is very difficult to assess both aspects of the competence in a single activity. As it has been shown, in most cases only one of the two parts of the competence is worked on and assessed effectively. For this reason, better results are achieved by developing activities that work on and assess the part related to environmental

- responsibility and other activities that work on and assess the ethical responsibility linked to professional performance.
- It is very important to link activities designed for the assessment of the cross curricular competence to the content of the specific subject, and if it is not possible, at least to the bachelor degree scope. Doing so, students become aware of the importance of responsibility in their professional performance.
 - Lecturers in charge of working with and assessing the part of the competence related to ethical and professional responsibility need guidance in training and designing activities for assessing students. Approximately 40% of the activities that are currently being carried out in the classroom do not work on or assess this competence despite the desire to do so [2].
 - Students have four academic years (the duration of the bachelor degree) to achieve a certain proficiency level of the transversal competence. This means that it is necessary to design the training in an evolutionary way, increasing the level of difficulty and complexity of the activities throughout the curriculum. It is desirable to develop coordination between lecturers who are going to work on this transversal competence throughout the degree, in order to correctly design the activities and increase the degree of complexity without repeating content, and taking into account the progress in the development of the competence.
 - Accordingly it is interesting to start in the first years (first proficiency level) with less complex activities (identification of unethical and unprofessional behavior, for instance [3-4]). As the curriculum progresses, more complex activities such as the resolution of ethical dilemmas that require knowledge in order to be able to argue the most appropriate solutions can be proposed.

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