

The professional profile of tutors in work-integrated learning

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Work-integrated learning (WIL) responds to the labor market's requests by fostering students' competency acquisition and development through active methodologies and profession-oriented practices. This training system means that both academic and workplace tutors guide and supervise the student. The research goal was to identify the tutors' professional profiles in WIL. This study's qualitative methodology is based on data triangulation obtained by the Delphi method, focus groups and a literature review. The participants are international experts in WIL. The outcome of the research is a set of specific and transversal competencies and functions for both types of tutors who guide and supervise students throughout their learning process in a workplace-based university program. In conclusion, the results enabled the establishment of a basis on which to identify WIL professionals working in different territories, as well as create professional development training for such agents involved in this innovative system.

Keywords: Work-integrated learning, professional profile, academic tutor, workplace tutor, Southwestern Europe

In a particularly competitive labor market, the demand for highly skilled and qualified people becomes a priority for society. Simultaneously, higher education institutions need to answer to social and economic challenges in their territories by finding local partners (Connell, 2019). In this respect, the OECD (2018) has been promoting an education paradigm shift, in which learning becomes lifelong and focuses on fostering students' specific and transversal competencies acquisition and development through dynamic, active, and professionalizing practices.

However, there is a gap between higher education training and the business networks need for a qualified, professionalized, and active population (Jackson, 2018). In light of these demands, work-integrated learning (WIL) could address the needs of all parties involved: university, employers, students and society.

Martin et al. (2019a) refer to WIL as an educational strategy in which students integrate theory with meaningful practice through a pertinent work-based experience. This is an intentional part of the curriculum, and it seeks the development of relevant professional skills to prepare students for their future career opportunities. In this regard, in another study, Milne and Caldicott (2016) identified the most valued skills according to industry supervisors, which were mostly soft skills such as punctuality, attendance, positive attitude, work ethics, and interpersonal skills. Such skills are likely to be developed and acquired in a professional environment. Workplace-based university programs, the form of WIL on which this study focuses, offers this opportunity.

The integration of work-based learning periods in enterprises during university studies contributes to developing students' professional competencies and improving their work readiness (Fleming et al.,

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2021; Jackson & Meek, 2020; Winchester-Seeto et al., 2021). However, Ferns and Zegwaard (2014) and Robinson (2018) highlight that in order to do this, the use of critical reflection is key. It is essential that students acknowledge the value of on-the-job learning and reflection to analyze their professional performance while acquiring knowledge through new theoretical frameworks (Trede & Jackson, 2021). This learning integration process is fostered by both the academic and the workplace tutor (Ulmann, 2018).

Other studies point out that good guidance and clear communication between tutors is essential to the success of WIL programs (Winchester-Seeto et al., 2021), and that workplace tutors become role models and educators to the students (Fleming et al., 2021). Hence, tutoring and the assessment process become key elements when designing and planning a workplace-based university program.

According to Nuninger and Châtelet (2018), double tutoring is one of the greatest risks and, at the same time, the most valuable asset in workplace-based WIL, due to its intricacy. To Effenev (2020), a tutorship is a complex process that requires establishing a shared personal and supportive relationship with students. Generally, it entails discussions, mediation, feedback, learning support, counseling, and supervision. According to the same author, tutors need to demonstrate a combination of personal and professional qualities that will contribute to creating a supportive bond. This can happen with accessible, credible, knowledgeable tutors, with professional authority, especially meaningful in the workplace tutor's case.

In this regard, Martin et al. (2019b, p. 229) deem workplace supervisors 'crucial stakeholders' in the partnership established between the university, the workplace and the students. Supervisors' role comprises counseling, advising, mentoring and managing performance, and problem-solving, among other tasks. The authors also mention the importance of supervisors' assistance to students when transferring theoretical knowledge and skills to the workplace and the need for employee coaching to develop these supervisory skills.

Double tutoring and guidance in workplace-based university programs demands previous preparation or training for the tutors to take up their new roles. Consequently, as a first step, it is necessary to define and establish the professional profile that these agents need to possess. Regarding the concept of a professional profile itself, Davis et al. (2006) acknowledge it as a useful competency framework for students, university staff and employers. According to the same author, there are six criteria to define a professional profile: integrity, conciseness, distinction, organization, action-oriented, and the ability to inspire development and respect.

The value of establishing a professional profile, within this research, lies in the opportunity for both tutors to relate to a competency framework when adopting their new role. The academic tutors can use the profile to contrast their current practices and abilities, engage in continuous improvement processes, and question their role within the system. Workplace tutors benefit from this profile as it enables them to adapt to their role as a supervisor in a workplace-based university program, fostering a dialog with other tutors about their expectations and identifying potential training needs.

In this case, the professional profile is essential to define the parties involved in this form of WIL, it serves as a function and competency framework to adopt when engaging in such roles, and to design and develop targeted training to ensure their professional development and meet their needs. This study focuses on establishing the tutors' professional profile by setting their hard skills, specific competencies, and soft skills, transversal competencies. Colombo et al. (2019, p. 30), describe the difference between both groups by identifying hard skills as "typically job-specific skills and

competencies that are needed to perform a specific job or task” and soft skills as “more transversal in nature and refer to the capacity of individuals to interact with others and the environment.”

In this study, the terms specific and transversal competencies are used to refer to the set of behaviors, knowledge, skills, and abilities the tutors need to possess both in relation to their job (specific) and their environment (transversal).

Academic Tutor

According to Ghysel (2019), the academic tutor is the referent in regard to integrating students’ learning outcomes, respecting a double process (practice application-formalization). To ensure that university orientation contributes to professionalizing students, academic tutors have to work on learners’ psychosocial, emotional and professional identity construction. Besides, Portelance et al. (2009, p. 109) consider that the academic tutor must have the:

- Competency to build a professional identity.
- Competency to support professional skills development in coordination with the workplace tutor.
- Competency related to reflective practices, fostering learners’ critical and reflective thinking.
- Competency to lead the institutional evaluation process as the academic representative.
- Competency to coordinate, collaborate and communicate with the workplace tutors.

Vidal and Labbé (2018) agree with some of the abovementioned aspects and add other relevant tasks to this profile, such as discussing the ethical dimensions in the workplace, assessing the training path once the workplace tutor sends the final report, managing any incident during the training, and evaluating the students including both academic and workplace learning outcomes. Other authors such as Martin et al. (2019a) focus on the role of the academic tutor in workplace-based WIL, regarding the students’ supervision and coordination with the workplace tutor. This sets out a series of additional functions: planning and organizing regular visits to the workplace; ensuring, together with the workplace tutor, the program coherence in terms of organization and subject distribution; identifying the professional competencies that students need to develop; and completing their assessment according to the performance in the workplace.

According to Bilgin et al. (2017), academic tutors need to engage in developing new strategies to identify and assess students’ abilities to perform real-world tasks and integrate the knowledge and competencies acquired in the workplace. Also, they need to ensure continuous contact with industry partners and that they receive students’ workplace assessment in time for integration with students’ grades. These authors emphasize formative assessment and effective feedback as crucial components of this workplace-based WIL, which are part of the essential tasks of both supervisors, and which can be time-consuming when high quality is sought.

Workplace Tutor

Jackson (2015) highlights the importance of employers in the development and assessment of competencies related to career management, which are key to adding realism and credibility to any workplace-based university diploma. At this point, the role of workplace tutors is essential to generate learning opportunities for students, with the supervision of an expert. Based on WIL students’ opinions, Jackson and Wilton (2016) point out how the lack of supervision from a professional expert

can negatively affect learners. They also stress the need for a welcoming and induction plan in the workplace.

Glaymann et al. (2015) carried out a study, using surveys and interviews, with workplace tutors and mentoring designers (business staff, normally human resources colleagues, hiring the trainees but not operationally supervising them). Their research revealed three main groups of functions that workplace tutors are responsible for in the workplace:

- Psychosocial support: discuss with students about their concerns; encourage them to talk openly about the difficulties they encounter in the working environment.
- Professionalize and network building: help the students to take up new responsibilities to meet and work with different colleagues.
- Be a professional role model: earn the students' respect and admiration and/or try to be a model within the organization.

According to Glaymann et al., the workplace tutor has to take on the responsibility for the learners' assessment. However, the study highlights the workplace tutors' lack of training in this regard, as well as their absence from the evaluation design process, thus having to apply assessment tools provided by the university without prior training.

In this regard, Milne and Caldicott's (2016) research acknowledges the key role in performance and competencies assessment that workplace tutors hold too. However, in this case, supervisors were provided with the assessment form at the beginning of the placement, together with guidelines describing their responsibilities, as well as those of the student and university during the placement period in the company.

Bilgin et al. (2017) and Robinson (2018) would also argue that workplace supervisors are responsible for assessing students with reports and/or through judgments about students' proficiency and professional competence acquisition. This may not be natural to the industry world and academic supervisors and/or faculty may be asked to provide further support to enable industry partners to fulfill their role.

Bilgin et al. (2017) conclude that staff expertise, connectedness, experience, and professional and institutional recognition of working in workplace-based university programs are important areas needing consideration.

The Present Study

Few studies published so far focus on analyzing both tutors' profiles. Cases such as Portelance et al. (2009), D. Jackson et al. (2017), and Coiduras et al. (2017) analyze what the necessary competencies for both tutors are, following an exploratory and literature review approach. These studies show that some competencies are transferable between profiles, given that they both accompany and supervise the students during their training path, although in different learning environments (academic or professional).

It is necessary to point out three aspects that make the present study stand out amongst the abovementioned ones. First, it provides a unique richness and complementarity of visions about workplace-based university programs and the role of both tutors in it, since the participants in this

study, tutors, university staff, researchers, and training coordinators, come from different territories across Southwestern Europe and carry out different responsibilities within this form of WIL.

Another distinctive aspect is the construction of profiles based on specific and transversal competencies. Each of these competencies is linked to a certain number of functions, allowing their further and complete conceptualization and acquisition. It is important to consider the difficulty to establish a transferable profile between countries, since this form of WIL is adapted to each higher education institution and territories' needs and reality.

The third distinctive feature is the data triangulation through three different sources of information, using a technique based on anonymity, asynchronous participation, and group discussion mediation to generate a debate on the subject matter. This process enabled the authors to collect and analyze the existing scientific literature on workplace-based university programs.

This research seeks two main objectives, which are underpinned by specific ones:

- Determine the academic tutor's professional profile in work-integrated learning.
 - Identify the academic tutor's functions.
 - Identify the academic tutor's specific and transversal competencies.
- Determine the workplace tutor's professional profile in work-integrated learning.
 - Identify the workplace tutor's functions.
 - Identify the workplace tutor's specific and transversal competencies.

METHODOLOGY

The methodology used in this study is based on Denzin (2017) and the conceptualization of methodological triangulation within method. This approach proposes the combination of more than one research method or technique to measure and collect data about the subject of study. As highlighted by Natow (2020), the self-limitation of certain methodologies reduces the possibility of knowing, understanding, and explaining a complex reality.

This study was carried out following the recommendations of the Declaration on Bioethics and Human Rights (UNESCO, 2009) and following the guidelines outlined in the European Code of Conduct for Research Integrity (ALLEA Member Academies, 2017), with written informed consent from all subjects to data treatment and anonymized publications.

Participants

All participants were contacted through the authors' professional networks involved in the European project that gave rise to this research. Electronic mail was used throughout the entire process to communicate with the people involved. Potentially relevant people related to workplace-based programs were identified, either because of their experience or because of their interest in it. The study was designed under the supervision of the coordination team. The participants' territories were several autonomous communities in Southwestern Europe. In each territory, a professor from the university was designated to liaise with the coordination team and the Delphi participants. Finally, it is important to mention that participation was voluntary, all participants could withdraw from the process at any time and only one person did so.

Data was collected using the following methods and techniques:

- Delphi Method. Two rounds were conducted based on the construction of a professional profile for each tutor. The first round involved 32 participants and the second round 31 participants.
- Focus group. Two focus groups were held, the first with nine participants and the second with ten. These were professionals from the territories with different profiles and none of them participated in the Delphi.
- Literature review. Four databases were identified, Web of Science, Scopus, Google Scholar, and ERIC. Using two selection procedures, 48 papers were selected for the triangulation of information.

In the Delphi method, all participants met the criteria previously validated by the coordination team and the territorial managers: university degree, professional or research experience in this form of WIL, and a minimum of three-years of experience in such university programs. In the researchers' case, a certain number of publications on workplace-based programs in higher education were required. In addition, the inclusion of human resources professionals was considered necessary (Glaymann et al., 2015), as they organize the induction plans together with the workplace tutors within the organization, and manage the bureaucratic-legal part of the programs. Delphi's panel was originally designed to be equal between profiles. Table 1 details the Delphi expert panel composition and their participation in the successive rounds.

TABLE 1: Panel configuration and evolution of Delphi participation.

Profile	Participants requested	Validated participants	Participation Round 1	Participation Round 2
Professor	15	13	6	5
Researcher	15	10	5	5
Tutor	15	14	10	10
Administrative officer	15	14	3	3
Manager/ Academic leader	15	11	4	4
Human Resources	15	13	4	4
TOTAL	90	75	32	31

Note that within the Tutor profile, $n=6$ were academic tutors and $n=4$ were professional tutors. Altogether, company-related participation (professional tutors and human resources staff) only represented around 25% of the participants in both rounds. Unlike academic collaborators – who had a certain degree of obligation to participate in this research – company professionals' participation relied only on their availability and willingness. Marques and Freitas (2018) underline this limitation within the method and this was acknowledged by the researchers. These authors also highlight that it can be difficult to align the experts' agenda with Delphi's established timeframes, which can reduce their participation.

Table 2 shows the configuration of the focus groups. In both groups, academic and workplace tutors were involved; the other participants were degree coordinators, company managers already collaborating in workplace-based programs, and faculty staff. It was necessary to include the administrative officer role, as it is an intermediary profile connecting university and workplace. In the second focus group, three Canadian researchers with extensive experience in this form of WIL (who had been academic tutors and, in one case, a training coordinator) were invited to participate. These participants did not take part in the Delphi.

TABLE 2: Configuration of the focus groups.

Group 1	Group 2
Faculty staff involved in WIL	Academic tutor
Academic tutor	Academic tutor
Workplace-based degree coordinator	Faculty staff involved in WIL
Academic leader	Workplace-based degree coordinator
Workplace tutor	Workplace-based degree coordinator
Workplace tutor	Administrative officer
Administrative officer	Academic leader
Company manager	Administrative officer
Company manager	Workplace tutor
	Workplace tutor

Data

Delphi method

A Delphi method was designed to collect information from different territories, following Rowe and Wright (1999) recommendations. This data collection method is useful “for structuring a group communication process so that the process is effective in allowing a group of individuals, as a whole, to deal with a complex problem” (Turoff & Linstone, 2002, p. 3). Skulmoski et al. (2007, p. 11) show the variety of Delphi designs in terms of studies’ objectives and the required rounds, stating that:

A two or three-iteration Delphi is sufficient for most research. However, if the goal is to understand nuances (a goal in qualitative research) and the sample is homogeneous, then fewer than three rounds may be sufficient to reach consensus, theoretical saturation, or uncover sufficient information.

Data collection was coordinated by the authors of this paper and territorial managers. The responsibilities of each were the following:

- Study leaders: design and develop the Delphi, establish the timeline, develop the validation process, design the rounds, coordinate territorial managers, analyze the results, obtain conclusions and communicate them to the participants.
- Territorial managers: communication between those leading the study and the participants in each territory.

In the first round, participants completed a questionnaire either online or in Word format, as preferred. This questionnaire was validated through an expert judgment ($n=10$), following the París and Tejada (2017) criteria of relevance, importance, and univocity. In the first section, participants were asked to provide their opinion on their understanding of workplace-based university programs. In the second section, the roles and competencies of the agents in the university and the professional environment were asked. Following Reguant and Torrado (2016) recommendations, to complete this second section, some functions and competencies were provided as examples. Participants could not see each other’s answers, to respect anonymity and non-interaction between participants.

The second Delphi questionnaire presented the profile information based on the results of the first round. Participants assessed the importance and relevance of functions and competencies, added or rephrased items if needed, and argued about the competency-function association proposed. At the end of the questionnaire, a list of 22 transversal competencies was provided as a result of the first round,

along with a request to select the 5 most important ones for both the academic tutor and workplace tutor.

After the second round, items with a standard deviation of ≤ 0.5 were excluded and the researchers proceeded to analyze all data. The researchers decided to stop the Delphi at that point because a high consensus between participants was obtained and the experts did not provide further information that could be verified in a third round.

Focus groups

Following a logical sequence, two focus groups were held, to discuss the agents involved in workplace-based university programs. The moderator established a specific dialog in relation to the identified profiles' functions and competencies. A list of three topics was used to structure the questions or statements:

1. Functions to be performed by tutors. E.g., what functions should academic tutors attend to? and what functions should they perform in coordination with other professionals?
2. Specific competencies to address the functions identified. Some competencies were mentioned but they were not related to any functions previously discussed.
3. Transversal competencies. On this topic, it was necessary to clarify what was meant by transversal competency and to provide examples to solve queries.

The data obtained in both focus groups were, after the process of transcription and categorization of information, divided into sections for each profile: functions and competencies. Although it was not initially planned, the focus groups also addressed the role played by each tutor in such WIL programs and how certain elements proposed in its design could cause difficulties in their professional performance.

Literature review

Four databases were chosen for the literature review: Web of Science and Scopus, for their relevance and reputation in terms of publications, and ERIC and Google Scholar for being the most appropriate to index the publications of researchers related to workplace-based university programs. The keywords entered were written in English, French, and Spanish. Papers had to be about this specific form of WIL and address both tutors' functions, roles, and competencies.

To reduce the number of articles to review, two filters were established. The first one allowed only papers in English, French or Spanish and excluded books, book chapters, and papers or communications in German and Russian.

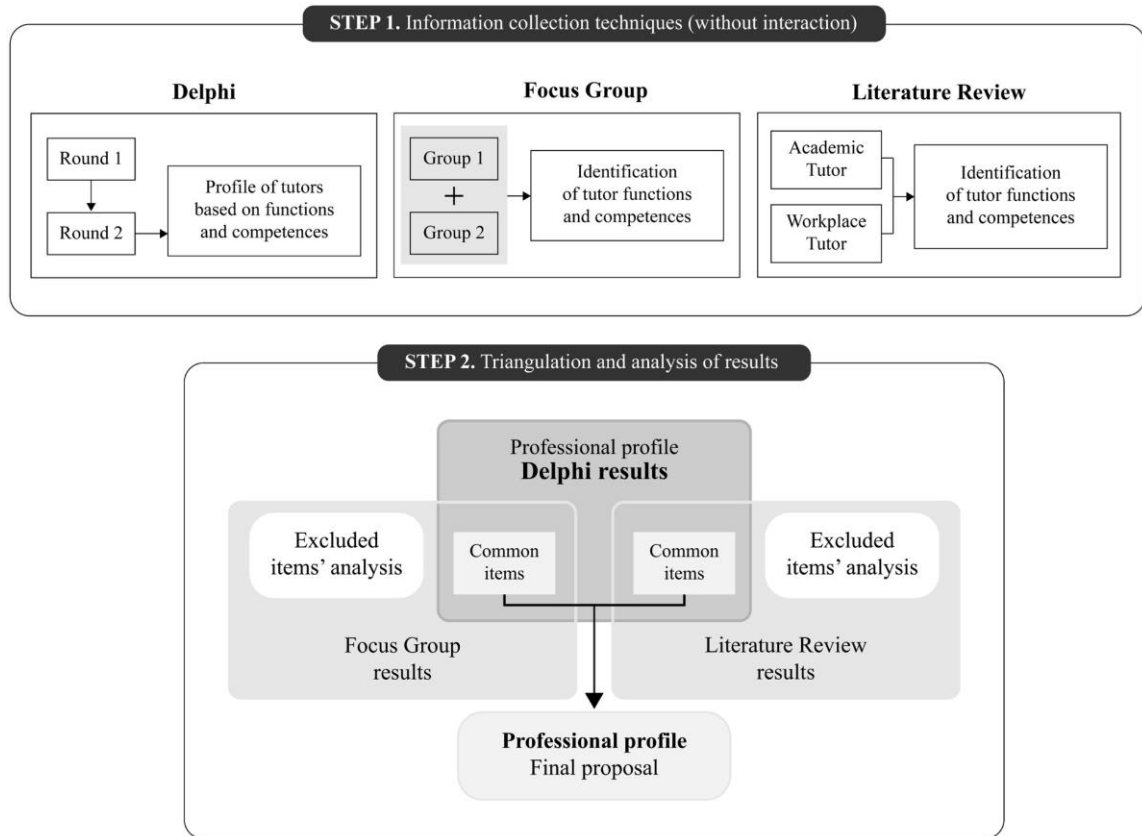
A second filter was used to exclude those papers that did not focus on higher education or the academic tutor or workplace tutor profiles. This process was crucial, especially to correctly distinguish the academic tutor's profile, as several articles focused on the university lecturer taking up tutoring and coordination functions. It reduced the review to a total of 19 papers addressing the functions and competencies of tutors involved in workplace-based WIL in university studies.

Triangulation Process

The Delphi and focus groups provided multiple and diverse perspectives on the subject matter, which enriched the findings of the study and its understanding (Hastings, 2010). The triangulation of the obtained data with the literature review results increased the reliability of the study (Denzin, 2017).

Figure 1 shows the steps taken during this process. First, all data collected from the aforementioned techniques were analyzed. Data obtained from the two successive Delphi rounds led to the definition of academic and workplace tutors' profiles, based on their functions and competencies, while data collected with the focus groups and the literature review were analyzed separately. Second, findings obtained through the three techniques in the first step were triangulated and compared to structure the conclusions based on the triple-checked data.

FIGURE 1: Information collection techniques and data triangulation process.



This research focuses on a complementary vision of triangulation (Nightingale, 2020), in which the results from the methods are meant to complete and enhance each other. However, divergence (items that did not reach consensus) was analyzed to better understand the subject study overall.

FINDINGS

The results were obtained at two different stages. First, isolated results were acquired from each of the data collection methods used (Figure 1, Step 1). Then, the final results were obtained by triangulating the information from these three data sources (Figure 1, Step 2).

Academic Tutor

Focusing on the Delphi results, after the two rounds and the descriptive statistical treatment, those items that reached a consensus in the academic tutor profile were identified. Concerning the

transversal competencies, Delphi participants agreed that involvement, ethics and commitment to workplace-based programs, empathy, and student orientation were relevant. To a lesser extent, there was also agreement on the competencies of ethical and moral referent and conflict management. Regarding the specific competencies, the participants agreed on five specific competencies. The results showed that the most highly rated competency in the criteria of relevance was the one related to tutoring and personalized guidance for the student. The need for knowledge about the degree's professional field and labor reality was also considered to be relevant. Other competencies that achieved consensus, in decreasing order of applicability and importance, were those related to assessment adapted to WIL, comprehension of the organizational business culture related to the degree, and acknowledgment of the opportunities generated by the learning contexts.

Secondly, a total of 20 functions were identified, associated with the five specific competencies at the end of the second round of the Delphi, for example, providing advice and tutoring for doubt resolution and task specifications, ensuring correct supervision of students' training and guiding them through the difficulties and tensions of their role as university student and trainee.

The focus groups brought out 26 items (between functions and specific and transversal competencies) for the academic tutor profile. According to the participants, this person must:

- a) link the theoretical frameworks and the professional experience acquired by the student,
- b) show a high instructional competency through activities and methodologies for learning integration,
- c) have a comprehension and sensitivity towards the work environment,
- d) offer tutoring and personalized guidance, and
- e) perform a competency-based assessment, considering both training contexts.

In addition, they must be committed to workplace-based university programs, take responsibility for being the student's referent, and use assertive communication.

The results of the literature review highlighted 25 items, obtaining information regarding functions and specific and transversal competencies.

The triangulation process allowed identification of a profile for the academic tutor. Table 3 shows the results in which five specific competencies associated with 14 functions and five transversal competencies were triple-checked. There are between two and four functions per competency.

TABLE 3: Data triangulation results on the academic tutor profile.

Academic Tutor Profile	
SC	1. Adaptation and adjustment of the degree in relation to its professional field. To know the objectives and competencies of the training program. To have a good understanding of the curriculum, formative projects, teaching guidelines, etc.
FU	To agree with the workplace tutor on the training program's distribution and the implementation of a set of specific tasks in the organization. To have a global knowledge of the job opportunities associated with the degree.
SC	2. Comprehension of the organizational business culture related to the degree. To know the professional profiles of the organizations partnering with the degree.
FU	To be constantly updated on the roles and functions of the jobs.
SC	3. Acknowledge the opportunities generated by the learning contexts. To integrate and link the theoretical knowledge to the internal logic of the organizations.
FU	To coordinate and bring consistency to the training contexts to create an integrated experience. To create opportunities for communication and exchange of experiences among trainees.
SC	4. Tutoring and personalized guidance. To address any doubts and to clarify tasks.
FU	To support students to ensure that their training is properly supervised. To guide students through the difficulties and tensions of their double status.
SC	5. Assessment adapted to WIL logics. To design and implement the evaluation including the experience in the workplace.
FU	To include continuous progress reports into the assessment.
	<ol style="list-style-type: none"> 1. Involvement, ethics, and commitment to WIL program. 2. Ethical and moral referent.
TC	<ol style="list-style-type: none"> 3. Student orientation. 4. Conflict management. 5. Empathy.

Note: SC= specific competencies, FU= function, TC= transversal competencies

Interestingly, functions related to the assessment competency were reduced to half after the triangulation process. Specifically, functions agreed upon in the Delphi method such as identifying students' previous knowledge or performing satisfaction and impact assessment did not achieve consensus in the focus group and the literature review.

Workplace Tutor

The Delphi results showed those items of the workplace tutor that achieved consensus. Regarding transversal competencies, the Delphi participants considered that these professionals should be good at communicating to transfer knowledge, without neglecting their involvement, ethics, and commitment to workplace-based programs. They considered, to a lesser extent, that they require empathy and must be ethical and moral referents for students. Regarding specific competencies, 5 were identified. The results show that the most highly rated competency in terms of relevance and importance is mentoring and guidance, followed by knowledge of the career and its evolution within the workplace. Other competencies that reached consensus, in decreasing order in terms of scoring, were: assessment adapted to WIL logics, awareness about their role in such programs, and knowledge of the degree and related professions.

Concerning the functions, 18 were identified in the first round but they were reduced to 14, as some of them did not reach a consensus in the second round. For instance: developing the initial reception of

the trainee in the organization, accompanying and motivating learning, and identifying and communicating regular goals to the students were finally excluded.

The focus groups showed a total of 21 items in the workplace tutor profile. According to the participants, these people must:

- a) know the professional competencies that the student must mobilize, and agree with the other tutor on the timing and professional activities that will make possible this mobilization of competencies,
- b) act as a professional referent for the apprentice, knowing the profession in-depth and identifying its evolution,
- c) integrate their professional role as tutors in a workplace-based program, and therefore self-assess their performance,
- d) be experts in mentoring and supervision processes, and
- e) know how to use competency-based evaluation with pre-designed instruments.

In the discussion groups, it was also emphasized that the workplace tutor should be committed to this form of WIL and have the capacity to transfer knowledge using assertive communication.

Finally, the literature review results provided 21 items about the workplace tutor, gathering information about functions and specific and transversal competencies. Compared to the other data collection methods, it is the one that contributed fewer functions.

The triangulation process allowed identification of a profile for the workplace tutor. Table 4 shows the results in which five specific competencies associated with 12 functions and five transversal competencies were triple-checked. There are between one and four associated functions for each competency.

In line with Nightingale's (2020) recommendations on observing divergence during triangulation processes, note that two of the three functions for Specific Competencies 3 that the Delphi participants deemed important, did not reach a consensus. These functions were: participating in the program's pedagogical design, and transmitting the company purpose, vision, and values throughout the learning process. Regarding assessment-related functions, identifying students' previous knowledge and experience was not validated either.

DISCUSSION AND CONCLUSION

This study gathers and defines, for the first time using triangulation, the professional profile of both academic and workplace tutors in workplace-based university programs. These profiles have been identified considering both tutors' opinions and those of other professionals involved in this form of WIL, and respecting the six criteria that Davis et al. (2006) established to create a professional profile. Hence, the global approach when defining the key competencies is met and, at the same time, conciseness is reached thanks to a limited number of functions and competencies obtained. Additionally, differences and common aspects (supervision, support, and evaluation) of both types of tutors are highlighted.

TABLE 4: Results of the data triangulation on the workplace tutor profile.

Workplace Tutor Profile	
SC	1. Align both workplace-related and academic competencies. To know and comprehend competencies associated with the training program.
FU	To agree with the academic tutor on the distribution of the learning project and the implementation of a specific set of tasks within the organization.
SC	2. Prospective vision of the career and its possible evolution within the workplace. To stay updated on the evolution of the profession and the emerging trends.
FU	To integrate the knowledge, strategies, and resources acquired in continuous training in their performance in the organization.
SC	3. Integration of their role in the WIL program.
FU	To identify strengths and suggestions for improvement regarding their performance as a tutor.
SC	4. Mentoring and guidance. To develop the induction period of the trainee in the organization.
FU	To guide and foster learning. To promote autonomy and confidence. To identify and communicate regular goals to the trainee.
SC	5. Assessment adapted to WIL logics. To supervise and optimize the trainee's professional activity in the organization.
FU	To evaluate the trainee's learning progress in the organization in coordination with the academic tutor. To use specific evaluation tools.
<hr/> 1. Involvement, ethics, and commitment to WIL program. 2. Communication.	
TC	3. Empathy. 4. Transfer knowledge. 5. Ethical and moral referent.

Note: SC= specific competencies, FU= function, TC= transversal competencies.

These profiles are presented in an organized, action-oriented, and basic structure which enables their adaptability to multiple workplace-based programs in Southwestern Europe. This flexibility is key, as the project under which this research was developed aimed at obtaining cross-border professional profiles.

All participants agreed on the fact that academic tutors are not responsible for coordinating learning environments nor establishing collaborative spaces for other professionals. During the focus groups, it was clearly stated that the academic tutor has an important workload, including coordination with workplace tutors, supervising, offering support, design and developing activities to integrate the acquired knowledge. This is consistent with the Bilgin et al. (2017) findings. Hence, they cannot take up institutional or managerial responsibilities. In a recent study (Nguyen, 2022, p. 300), academic tutors also highlighted their lack of time and lack of institutional recognition for their effort and the huge workload that this form of WIL requires: "It is more time-consuming than doing other academic tasks at the university, but it has limited institutional recognition in terms of workload."

It is our understanding that the academic tutor has to master the integration process design as well as competency assessment in a workplace-based academic program. J. Jackson et al. (2017) consider that traditional evaluation through written tasks provides evidence of students' analytical and reflective skills, but that it can fail to grasp the complexity of the workplace environment and the way students transfer their skills.

Another aspect worth mentioning is the divergence observed after triangulating data regarding assessment responsibilities. Identifying previous knowledge and Assessing satisfaction and impact did not reach a consensus. This could be explained by the aforementioned workload already present in academic tutors' agendas but it could also reflect the participants' diverse organizational systems in which academic tutors may have different responsibilities (Bilgin et al., 2017). Interestingly, identifying students' previous knowledge was also discarded from the workplace tutors' profile, which could be explained by the added pedagogical training workplace tutors would need to undertake this task (Ceelen et al., 2021). Whatever the country or institution, participants agreed that academic tutors must take into account students' experience in the workplace during the assessment process and adapt it to its singularities.

Regarding workplace tutors, in both the literature review and the resulting profile after the Delphi method, it was stated that they are not responsible for participating in the programs' pedagogical design, although they will be asked to take up an important role within the system. During the focus groups, it was highlighted that even if the workplace tutors do not participate in the programs' design, it is advisable to acknowledge their points of view in order to facilitate their integration into the program.

Milne and Caldicott (2016, p. 175) refer to placement-based WIL when describing real industry placement periods thus, including the role of employers in assessing the students' performance since they are "the best judges of professional competence." This aligns with our findings, in which professionals involved in the Delphi and group discussions agreed on workplace tutors' assessment responsibilities.

However, the specific competency addressing tutors' understanding of their role is the one that presents the least number of functions. It seems that the variety of workplace-based university programs in different countries, even within the Spanish territory where various systems co-exist, hinders the possibility of defining a common competency framework. As Bilsland and Nagy (2015) highlight, workplace tutors need to understand that the purpose of this form of WIL in higher education is not only giving some tasks to students to familiarize themselves and practice, but to explore and develop a deeper consciousness of 'how to work.'

Although some interesting functions were discarded, the professional profiles obtained gather basic and key responsibilities for academic and workplace tutors working in this form of WIL: being aware of and meeting academic expectations, supervising students, coordinating with other agents, and assessing the learning process. The methodology used in this study is based on complementary triangulation (Nightingale, 2020) and led to the identification of common elements from all sources of information (Delphi, focus groups and literature review), regardless of some inherent bias generated.

LIMITATIONS AND IMPLICATIONS

One of the limitations of this study arises from the methodology itself, given the Delphi method is a filtering process and that triangulating data afterward can exclude some functions or competencies which could be relevant for the profile. Yet, this provides interesting information with which to comprehend WIL's organizational complexity across territories. The specific sampling of participants hinders the generalization of results, although the authors believe these profiles offer a flexible and comprehensive start which is adaptable to many forms of workplace-based programs.

The purpose of this study was to identify common transferable profiles between Southwest European territories, and we consider that the results offer a realistic and applicable approach to the majority of academic and workplace tutors working in such form of WIL in higher education. These sets of competencies and functions provide institutions willing to develop WIL programs with a general yet solid framework to relate to.

This could also be used to develop harmonized tailored training for higher education institutions and company stakeholders, based on competency development (Ramos et al., 2021). The authors of the present study believe that ultimately, this should foster and improve tutors' professional performance and enhance their importance and key role within this learning system.

Finally, we acknowledge the need for further studies to complete the theoretical understanding of all the agents involved in workplace-based WIL. This research presents a useful approach to identifying and defining professional profiles, but it only takes into account academic and workplace tutors. Other agents such as coordinators or administrative staff are also worth studying, as they are an essential part of successful WIL program structures

REFERENCES

- ALLEA All European Academies. (2017). *European code of conduct for research integrity*. <https://allea.org/code-of-conduct/>
- Bilgin, A. A., Rowe, A. D., & Clark, L. (2017). Academic workload implications of assessing student learning in work-integrated learning. *Asia-Pacific Journal of Cooperative Education*, 18(2), 167-183.
- Bilsland, C., & Nagy, H. (2015). Work-integrated learning in Vietnam: Perspectives of intern work supervisors. *Asia-Pacific Journal of Cooperative Education*, 16(3), 185-198.
- Ceelen, L., Khaled, A., Nieuwenhuis, L., & de Bruijn, E. (2021). Pedagogic practices in the context of students' workplace learning: A literature review. *Journal of Vocational Education & Training*, <https://doi.org/10.1080/13636820.2021.1973544>.
- Coiduras, J. L. R., Correa-Molina, E., Boudjaoui, M., & Curto, A. R. (2017). Formación dual en el Grado de Educación: claves organizativas y pedagógicas [Dual training in the education degree: Organizational and pedagogical keys]. *Revista Curriculum*, 30, 81-102.
- Colombo, E., Mercurio, F., & Mezzanzanica, M. (2019). AI meets labor market: Exploring the link between automation and skills. *Information Economics and Policy*, 47, 27-37. <https://doi.org/10.1016/j.infoecopol.2019.05.003>
- Connell, R. (2019). *The good university: What universities actually do and why it's time for radical change*. Bloomsbury Publishing.
- Davis, D. C., Beyerlein, S. W., & Davis, I. T. (2006). Deriving design course learning outcomes from a professional profile. *International Journal of Engineering Education*, 22(1), 1-8.
- Denzin, N. K. (2017). *The research act: A theoretical introduction to sociological methods*. Routledge. <https://doi.org/10.4324/9781315134543>
- Effeney, G. (2020). Risk in work integrated learning: A stakeholder centric model for higher education. *Journal of Higher Education Policy and Management*, 42(4), 388-403. <https://doi.org/10.1080/1360080X.2019.1701852>
- Ferns, S., & Zegwaard, K. E. (2014). Critical assessment issues in work-integrated learning. *Asia-Pacific Journal of Cooperative Education*, 15(3), 179-188.
- Fleming, J., Rowe, A. D., & Jackson, D. (2021). Employers as educators: The role of work placement supervisors in facilitating the transfer of skills and knowledge. *Journal of Education & Work*, 34(5-6), 705-721. <https://doi.org/10.1080/13639080.2021.1969343>
- Ghysel, J. (2019). *Caractériser le tutorat dans les formations en alternance : Objectifs poursuivis et activités menées par les tuteurs académiques en Institut Universitaire de Technologie* [Characterizing tutoring in work-study training: objectives pursued and activities carried out by academic tutors in the University Institute of Technology]. Université Toulouse Jean Jaurès.
- Glaymann, D., Garrouste, C., Grima, F., Barbusse, B., de Briant, V., & Frias, V. G. (2015). Le tutorat des stagiaires en entreprise. Enquête sur la place du tutorat dans le travail des cadres dans un contexte de multiplication des stages [Tutoring for trainees in companies]. *Les Études de l'emploi-Cadre*, No. 2015-72, 1-88.
- Hastings, S. L. (2010). Triangulation. In N. J. Salkind (Ed.), *Encyclopedia of research design* (pp-1537-1539). Sage.
- Jackson, D. (2015). Employability skill development in work-integrated learning: Barriers and best practice. *Studies in higher education*, 40(2), 350-367. <https://doi.org/10.1080/03075079.2013.842221>
- Jackson, D. (2018). Developing graduate career readiness in Australia: Shifting from extra-curricular internships to work-integrated learning. *International Journal of Work-Integrated Learning*, 19(1), 23-35.

- Jackson, D., & Meek, S. (2020). Embedding work-integrated learning into accounting education: The state of play and pathways to future implementation. *Accounting Education*, 30(1), 63-85. <https://doi.org/10.1080/09639284.2020.1794917>
- Jackson, D., Rowbottom, D., Ferns, S., & McLaren, D. (2017). Employer understanding of work-integrated learning and the challenges of engaging in work placement opportunities. *Studies in Continuing Education*, 39(1), 35-51. <https://doi.org/10.1080/0158037X.2016.1228624>
- Jackson, D., & Wilton, N. (2016). Developing career management competencies among undergraduates and the role of work-integrated learning. *Teaching in Higher Education*, 21(3), 266-286. <https://doi.org/10.1080/13562517.2015.1136281>
- Jackson, J., Jones, M., Steele, W., & Coiacetto, E. (2017). How best to assess students taking work placements? An empirical investigation from Australian urban and regional planning. *Higher Education Pedagogies*, 2(1), 131-150. <https://doi.org/10.1080/23752696.2017.1394167>
- Marques, J. B. V., & Freitas, D. D. (2018). Método DELPHI: caracterização e potencialidades na pesquisa em Educação [The DELPHI method: characterization and potentialities for educational research]. *Pro-Posições*, 29(2), 389-415. <https://doi.org/10.1590/1980-6248-2015-0140>
- Martin, A., Rees, M., Fleming, J., Zegwaard, K., & Vaughan, K. (2019a). Better WIL supervisors, better WIL students. In K. Zegwaard & K. Hoskyns (Eds.), *New Zealand Association for Cooperative Education refereed conference proceedings* (pp. 29-34). NZACE.
- Martin, A., Rees, M., Fleming, J., Zegwaard, K., & Vaughan, K. (2019b). Work-integrated learning gone full circle: How prior work placement experiences influenced workplace supervisors. *International Journal of Work-Integrated Learning*, 20(3), 229-242.
- Milne, L., & Caldicott, J. (2016). Exploring differences in industry supervisors' ratings of student performance on WIL placements and the relative importance of skills: Does remuneration matter? *Asia-Pacific Journal of Cooperative Education*, 17(2), 175-186.
- Natow, R. (2020). The use of triangulation in qualitative studies employing elite interviews. *Qualitative Research*, 20(2), 160-173. <https://doi.org/10.1177/1468794119830077>
- Nguyen, N. (2022). University-community partnerships in language teacher education through work-integrated learning. *Issues in Educational Research*, 32(1), 292-314.
- Nightingale, A. J. (2020). Triangulation. In A. Kobayashi (Ed.), *International encyclopedia of human geography* (2nd ed., pp. 477-480). Elsevier.
- Nuninger, W., & Châtelet, J. M. (2018). Tutoring integrated learning with video-based training to enhance the support of the learners in WIL: A proposal that drives the change in tutors' pedagogical culture. *International Journal of Distance Education Technologies (IJDET)*, 16(4), 93-111. <https://doi.org/10.4018/IJDET.2018100106>
- OECD (Organisation for Economic Co-operation and Development). (2018). *The future of education and skills: Education 2030: The future we want* -. [https://www.oecd.org/education/2030-project/contact/E2030%20Position%20Paper%20\(05.04.2018\).pdf](https://www.oecd.org/education/2030-project/contact/E2030%20Position%20Paper%20(05.04.2018).pdf)
- París, G., & Tejada, J. (2017). El desarrollo de los profesionales de la formación para el empleo: Afectación de las transformaciones estructurales, necesidades formativas y factores de calidad [The development of training professionals for employment: The impact of structural traffic, training needs, and quality factors]. *Curriculum*, 30(1), 15-29.
- Portelance, L., Gervais, C., Lessard, M., & Beaulieu, P. (2009). *La formation des enseignants associés et des superviseurs universitaires, Cadre de référence. Rapport de recherche présenté à la Table MÉLS-Universités* [The training of cooperating teachers and university supervisors, Reference framework, Research report]. Québec Ministère de l'Éducation, du Loisir et du Sport.
- Ramos, E., Otero, C. A., Heredia, F. D., & Sotomayor, G. (2021). Formación por competencias del profesional en administración: Desde un enfoque contingencial [Competence-based training of the administration professional: From a contingency approach]. *Revista de Ciencias Sociales*, 27(2), pp. 451-466.
- Reguant, M., & Torrado, M. (2016). El método delphi [The Delphi method]. *Revista d'Innovació i Recerca en Educació-REIRE*, 9(2), 87-102. <https://doi.org/10.1344/reire2016.9.1916>
- Robinson, K. (2018). What value do stakeholders place on the academic standards and grading practices in work-integrated learning? *International Journal of Work-Integrated Learning*, 19(4), 349-357.
- Rowe, G., & Wright, G. (1999). The Delphi technique as a forecasting tool: Issues and analysis. *International Journal of Forecasting*, 15(4), 353-375. [https://doi.org/10.1016/S0169-2070\(99\)00018-7](https://doi.org/10.1016/S0169-2070(99)00018-7)
- Skulmoski, G. J., Hartman, F. T., & Krahn, J. (2007). The Delphi method for graduate research. *Journal of Information Technology Education*, 6(1), 1-21. <https://doi.org/10.28945/199>
- Trede, F., & Jackson, D. (2021). Educating the deliberate professional and enhancing professional agency through peer reflection of work-integrated learning. *Active Learning in Higher Education*, 22(3), 171-187. <https://doi.org/10.1177/1469787419869125>
- Turoff, M., & Linstone, H. A. (2002). *The Delphi method: Techniques and applications*. New Jersey Institute of Technology.
- Ulmann, A. L. (2018). Les apprentis, au cœur de l'introuvable relation formateur-tuteur [Apprentices, at the heart of the "untraceable relationship" trainer-tutor]. *Formation Emploi*, 141, 11-26. <https://doi.org/10.4000/formationemploi.5274>
- UNESCO (United Nations Educational Scientific and Cultural Organization). (2009). *Universal Declaration on Bioethics and Human Rights: background, principles and application*. <https://unesdoc.unesco.org/ark:/48223/pf0000179844>

- Vidal, E., & Labbé, S. (2018). *La formation-action : Un modèle renoué d'alternance intégrative* [Training-action: A renovated model of integrative work-study]. École Professionnelle Artisanat et Service Communautaire EPASC.
- Winchester-Seeto, T., Rowe, A. D., & Mackaway, J. (2021). Effective supervision: A key consideration in work-integrated learning. In S. J. Ferns, A. D. Rowe, & K. E. Zegwaard (Eds.), *Advances in research, theory and practice in work-integrated learning: Enhancing employability for a sustainable future* (pp. 85-96). Routledge.