

## IMPROVING TEACHING PRACTICE: ANALYSIS OF EXPERIENCES IN INTEGRATIVE PROJECTS AT UNIVESP

MEJORA DE LA PRÁCTICA DOCENTE: ANÁLISIS DE EXPERIENCIAS EN PROYECTOS INTEGRADORES EN LA UNIVESP

APRIMORAMENTO DA PRÁTICA DOCENTE: ANÁLISE DE EXPERIÊNCIAS EM PROJETOS INTEGRADORES NA UNIVESP

Beatriz Martins Arruda <sup>1</sup>

Amanda Ferreira Branco da Fonseca <sup>2</sup>

Janaína de Souza Silva <sup>3</sup>

Isabela Lia Vaccari <sup>4</sup>

Ana Lúcia Gabas Ferreira <sup>5</sup>

**Manuscript received on:** March 31, 2023.

**Approved on:** July 8, 2024.

**Published on:** August 8, 2024.

### Abstract

This paper explores the possibilities and limitations of facilitation in the Integrative Project course offered in the distance learning mode, with the aim of enhancing teaching practices. Descriptive bibliographic research was conducted, adopting a qualitative approach, and employing thematic analysis informed by four experience reports. This facilitated the development of a methodology to generate and analyze data based on the competencies framework for distance learning tutoring provided by the Brazilian Association of Distance Education (ABED). The application of this methodology enabled critical reflection on practical performance at the Virtual University of São Paulo (Univesp), leading to recommendations for self-improvement in teaching practices. The study concludes that examining practical experiences in online tutoring can not only improve distance education, but also help address gaps and challenges highlighted by emergency remote education during the Covid-19 pandemic.

**Keywords:** Professional Training; Mentoring; Distance Education.

---

<sup>1</sup> Doctoral student in Civil Engineering at the State University of Campinas. Master in Urbanism from the Pontifical Catholic University of Campinas.

ORCID: <https://orcid.org/0000-0002-5791-9988> Contact: [b072834@dac.unicamp.br](mailto:b072834@dac.unicamp.br)

<sup>2</sup> Doctorate in Visual Arts from the São Paulo State University Júlio de Mesquita Filho.

ORCID: <https://orcid.org/0009-0002-3719-4307> Contact: [amandabrancoarte@gmail.com](mailto:amandabrancoarte@gmail.com)

<sup>3</sup> Doctoral student in Education at the State University of Campinas. Master in Education from the São Paulo State University Júlio de Mesquita Filho. Teacher in the Municipal Education Network of Limeira.

ORCID: <https://orcid.org/0000-0003-3984-6735> Contact: [j181071@dac.unicamp.br](mailto:j181071@dac.unicamp.br)

<sup>4</sup> Doctorate in School Education from the São Paulo State University. Teacher in the São Paulo State School System.

ORCID: <https://orcid.org/0000-0002-4033-8626> Contact: [isabela.lia@unesp.br](mailto:isabela.lia@unesp.br)

<sup>5</sup> Doctorate in Food Engineering from the State University of Campinas. Professor in the Postgraduate Program in Chemical Engineering at the University of São Paulo.

ORCID: <https://orcid.org/0000-0002-8361-8767> Contact: [gabas@usp.br](mailto:gabas@usp.br)

## Resumen

El artículo discute las potencialidades y límites de la facilitación en la disciplina de Proyecto Integrador en la modalidad de educación a distancia (EaD) para la mejora de la práctica docente. Se realizó una investigación bibliográfica descriptiva, con enfoque cualitativo, basada en un análisis temático informado por cuatro informes de experiencia escritos de forma libre. Así, se creó una metodología para generar y analizar datos basada en el marco de competencias para la tutoría en EaD de la Asociación Brasileña de Educación a Distancia (ABED). Su aplicación permitió una reflexión crítica sobre el desempeño práctico en la Universidad Virtual del Estado de São Paulo (Univesp), de donde se extrajeron recomendaciones para el automejoramiento en la enseñanza. Se concluyó que la investigación de experiencias prácticas con tutoría en línea puede, además de mejorar la educación a distancia (EaD), contribuir a cubrir las lagunas y desafíos evidenciados por la educación remota de emergencia durante la pandemia de Covid-19.

**Palabras clave:** Formación profesional; Tutoría; Educación a distancia.

## Resumo

O artigo discutiu potencialidades e limites da facilitação na disciplina Projeto Integrador na modalidade de Educação a Distância (EaD) on-line para o aprimoramento da prática docente. Realizou-se pesquisa bibliográfica descritiva, com abordagem qualitativa, fundamentada numa análise temática informada por quatro relatos de experiência, redigidos de forma livre. Assim, foi criada uma metodologia para gerar e analisar dados baseada no quadro de competências para tutoria EaD da Associação Brasileira de Educação a Distância (ABED). Sua aplicação permitiu refletir criticamente sobre a atuação prática na Universidade Virtual do Estado de São Paulo (Univesp), extraindo recomendações para o autoaprimoramento na docência. Concluiu-se que investigar experiências práticas com tutoria on-line pode, além de melhorar a EaD, contribuir para cobrir lacunas e desafios evidenciados pela educação remota emergencial na pandemia de Covid-19.

**Palavras-chave:** Desenvolvimento profissional; Tutoria; Educação a Distância.

## Introduction

The Covid-19 pandemic that began in 2020 has forced educational institutions to make an emergency transition to remote working, revealing the importance of Information and Communication Technologies (ICT) in supporting education. The abrupt move has exposed many difficulties surrounding access to ICT, as well as its acceptance, assimilation and full use by managers, teachers, students and guardians. The disruptive context of the pandemic has unleashed in face-to-face educational environments what Distance Education (DE) has been developing for a long time: a global education strategy that brings together technical, managerial and

technological skills to facilitate learning, equipping students with the skills and tools they need to study and learn anytime, anywhere. In the return to face-to-face activities, rather than a return to previous teaching conditions, we can imagine a future of progressive hybridization of the educational environment, in which the physical and digital realities complement each other, supporting each other.

Interactions between people already take place via the internet and will increasingly occupy educational spaces that were previously exclusively face-to-face, with a variety of formats, tools, scope and intensities of use. Among the supporting ICT, those that make it possible to interact in real time stand out: text messages, audios, videos and virtual meetings. They also include various forms of asynchronous communication, such as e-mail, forums, blogs, wikis and even documents stored in the cloud and shared with access permission for comments or editing, among others. In addition, with the Internet of Things (IoT), there is potential to expand people's interaction with the physical environment through ICT, especially with the tendency for both the field of study in this area and the population's access to mobile applications to expand in the coming years, providing new ways to engage students.

ICT diversifies forms of interaction and can help support the implementation of more active and collaborative learning processes and formative assessments, which are more compatible with the profile of digital generations. It is necessary to overcome the content-based approach, emphasizing processes rather than just results, orienting teaching towards the development of skills related to proficiency in competencies that combine individual improvement with collective learning. Students experience increasingly collaborative and problem-solving roles based on the skills of questioning, research, discernment, systematization, critical reflection and communication.

All of this adds novelty to the experience of today's teachers and managers, who are still mostly trained in totally analogical teaching and learning circumstances. However, it is part of the cultural universe that influences the way current and future students understand education and develop an interest in what to learn and how. The younger generation's ability to interact virtually and create and share digital

content cannot be ignored in pedagogical projects and lesson plans. The technology that is already present in students' lives will probably expand and intensify its presence and, sooner or later, become internalized in their school lives. The speed and quality of this internalization will be greatly determined by the involvement of teachers and school managers in this process.

Being immersed in the context of public online distance higher education, we have the following question: based on what was experienced in 2021 and 2022, what practices could be optimized and implemented immediately, benefiting teacher training without financially burdening either professionals or institutions working in distance education? Based on this research question, the aim of this study was to discuss the potential and limits of facilitation in the discipline Integrative Project (IP) in the distance learning modality to improve teaching practice. To this end, four specific objectives were outlined: (1) To present the IP course in distance education; (2) To clarify the role of the Univesp facilitator in the IP course; (3) To report on the experiences acquired by the authors in facilitating the IP at Univesp; (4) To summarize the difficulties faced and the lessons learned. The first two specific objectives are dealt with in the theoretical-conceptual section that follows this introduction. The third section characterizes the research material and methods, detailing procedures and instruments for data collection and analysis. The fourth section presents and discusses the obtained results. In the fifth and final section, some final considerations are made about the object and the development of the research, offering practical suggestions for teacher self-improvement and for future research on the subject.

## Theoretical foundations

The Brazilian Association of Distance Education (ABED) states that the general competence of a professional qualified as a Distance Education Course Tutor is: "To tutor distance education courses, covering the areas of specific knowledge, pedagogy, communication, technology and management, with a view to student learning and the continuous improvement of good practices" (ABED, n.d., p. 1). The

work process to develop distance learning projects requires multidisciplinary teaching skills, covering different areas of knowledge: pedagogy, communication, technology and management (ABED, 2012). The tutor, as well as being an expert in the course content, is responsible for guiding learning, communicating effectively, invitingly and engagingly, with appropriate use of language and the resources available to carry out distance education mediation.

### - Tutoring and facilitation in online distance education

The internet has made it possible for distance education to go beyond the one-way communication that characterized its beginnings, when it was carried out by correspondence, radio or tele-transmission. ICT has enabled new ways of doing distance education, making it possible for teachers and students to interact more, either synchronously or asynchronously. In addition, the internet has made an unprecedented volume of content accessible. In online distance learning, with the presence of a tutor to accompany the classes, the focus is less on transmitting content and more on encouraging interactivity and the exchange of experiences and knowledge between teacher-student, student-student and student-teacher, as the driving forces behind the collective and shared construction of knowledge.

Online distance learning can overcome transactional distance, which is an emotional and communicational distance caused by the physical separation between students and teachers (Moore, 2002). Online distance learning is based on Virtual Learning Environments (VLEs), digital platforms that host courses and enable different actions such as: sharing multimedia content; pedagogical guidance by teachers and pedagogical mediation by tutors; the completion of tasks and problem-solving by students; the exchange of experiences and knowledge between all those involved; assessment; as well as technical and administrative support.

### - The Integrative Project (IP) subject in online distance education

Active pedagogical methodologies are used to provide an education that favors the exchange of knowledge, experiences and dialogues, benefiting students with the synergy generated by a cooperative and investigative spirit. This is the case with the Integrative Project (IP), a subject whose purpose is to articulate theory and practice, while also developing management and collaboration skills, simulating future professional performance. At Univesp, there is an IP in all of the institution's higher education courses, giving students the opportunity to relate the scientific concepts learned in regular subjects to possible solutions to real problems in their respective areas of activity. It is a "teaching modality that will provide, throughout the course, the interdisciplinarity and transversality of the themes covered in the curriculum" (UNIVESP, 2019, p. 2) and contributions to the external community.

It's worth noting that the proposal to discipline the IP is in line with article 80 of Law 9.394, of December 20, 1996, which provides for the accreditation of higher education institutions to offer courses or programs in the distance mode (Brasil, 1996, Art. 80). For clarification purposes, the respective decree contains important considerations about the objectives that guide the distance learning modality and the means or resources that can be used to achieve the planned objectives. According to Article 1 of the document,

Distance education is the educational modality that seeks to overcome space and time limitations with the pedagogical application of information and communication media and technologies and which, without excluding face-to-face activities, is organized according to a specific methodology, management and evaluation. (Brasil, 2005, Art. 1)

The IP proposed by Univesp aims to facilitate and give new meaning to the teaching and learning process, developing students' ability to critically analyze problems in real teaching contexts and think of improvement strategies. In addition, there is an obvious return for the community where the students develop the IP, since the lesson plans drawn up are tested and applied in the classes observed, helping teachers to gain a new perspective on the obstacles they face. Finally, there is also a contribution related to innovation in teaching, since undergraduate students can often propose new ideas and strategies with an outside eye, which teachers often fail to see for various reasons.

- The role of the Univesp facilitator in the Integrative Project (IP) course

In Univesp, IP students are organized into groups to develop a semester-long assignment, for which they have the help of a mentor, who is the learning facilitator. The facilitator is responsible for managing the groups and guiding the development of the collaboration processes: checking that the students have managed to make contact with their group mates, helping those who have had difficulties contacting the group, mediating conflicts, providing guidance in synchronous (fortnightly meetings) and asynchronous (via forum) situations on the development of the work stages, helping to define the topic, answering questions and suggesting materials and paths for the research, as well as correcting the assessments (UNIVESP, 2021b).

In addition to these functions, especially in the context of IP, the facilitator also has the role of humanizing distance learning, preventing the student from having the feeling of being alone to carry out the work, reducing the transactional distance (Moore, 2002). Because of this, facilitators are instructed to listen to students with empathy, considering their context, limitations and difficulties (UNIVESP, 2021a). Thus, the facilitator has the role of supporting the students in various aspects during the development of the IP.

## Methodology

The conception of the project and the development of the research, including the meetings for guidance and collaborative work, took place exclusively remotely, using two main digital technologies: the Microsoft Teams virtual environment and Office Suite tools. The research is characterized as bibliographical, descriptive with a qualitative approach, based on thematic analysis informed by written reports. The object of study was a set of four experiences described in the form of freely written narrative texts, with no predefined structure.

- Methodological procedures

Brainstorming sessions were interspersed with a literature review (bibliographic prospecting, reading and taking notes), writing narrative texts about individual experiences with IP at Univesp, defining categories of analysis to systematize the contents of the narratives produced, comparing them with experiences reported in the literature, synthesis and scientific writing. Narrative language was the source of the primary research data, complemented by secondary data collected from scientific journal articles retrieved from the Web of Science database and instructional materials provided by Univesp as part of the specialization course in the "Didactic-Pedagogical Training for distance learning courses" program. Thematic analysis by deduction was applied (Braun; Clarke, 2006), which makes it possible to identify themes or patterns within the data, with the aim of interpreting them based on synthesis, rather than incorporating them directly into this article with long transcripts or even full reproductions of the narratives. Psychology's methodological contribution to the field of education was made in a similar and successful way in a previous study (Rosa; Mackedanz, 2021).

The novelty in the design of the method here is, firstly: "letting oneself be carried away by the words" (Guitton, 2018, p. 75-76), in free writing and uncompromising with structure and formatting, encouraging a process of recovering personal memories that is fluid and abundant in information. Without imposing any kind of stylistic uniformity, we avoided constraining the spontaneity of each informant's written expression, in the expectation that the narratives would bring out what had been remarkable about their experiences. Priority was therefore initially given to reporting the facts, with their flavors and dissatisfactions, rather than stylistic uniformity or impersonality in the essays. In this sense, the brainstorming exercise provides fundamental support for writing, because verbalizing and organizing ideas in a visual way helps to create a sufficiently relaxed and safe environment for sharing, free of preconceptions and judgments, thus establishing empathy and trust between the research participants.

The second step was to create a common basis for analysis, based on categories that would enable synthesis exercises, critical reflection and even confrontation with emerging hypotheses in the brainstorming sessions, to draw



conclusions about the teaching practices experienced at a later stage, with a view to developing useful suggestions for self-improvement and recommendations to peers. To this end, it was decided to relate the themes identified in the content of the reports to the Units of Competence established by ABED (Table 1).

**Table 1** – Categories of analysis based on the General Competence matrix for Distance Education Tutoring.

Competence Units (CU)	Competence Elements (CE)	Competence Assessment Components (CAC)
1: Planning mediation actions in distance learning courses	1.1 Analyze the context of the course and all its components	1.1.1 - 1.1.7
	1.2 Planning the care of students while respecting their characteristics	1.2.1 - 1.2.5
2: Developing mediation in distance learning courses	2.1 Stimulating interaction	2.1.1 - 2.1.4
	2.2 Guiding students	2.2.1 - 2.2.8
	2.3 Communicating with learners	2.3.1 - 2.3.9
	2.4 Mediating conflicts	2.4.1 - 2.4.3
	2.5 Managing time	2.5.1 - 2.5.3
3: Evaluating pedagogical mediation in distance learning courses	3.1 Evaluate students' performance in the course	3.1.1 - 3.1.8
	3.2 Evaluating the course's communication process	3.2.1 - 3.2.5

Source: Adapted from ABED (s.d).

In this case, the so-called "Elements of Competence" correspond to the categories of thematic analysis broken down into components that aid the deductive inference of triggering issues within them. If there is no direct correspondence between the report and the element, a new category can be added, considering the specific nature of the information collected.

- On Building categories of analysis with ABED's competences framework

The choice is justified because

[...] it is closely related to the theoretical frameworks of distance education, which take into account the multiplicity of knowledge and professionals for the development of projects and educational mediation actions. Thus, the competences proposed are not restricted to a job or a specific area of knowledge, but to the combination and interaction between the dimensions of the areas of knowledge and the work process. (ABED, 2014, p. 69)

In addition, ABED (2014, p. 70) understands competence "not as something definitive and finished, but in constant transformation, stimulating research and the construction of new forms of production and distance learning projects and educational mediation actions with the introduction of new technologies.

This approach to understanding competence provides parameters for quality in distance learning and, at the same time, by interpreting it as dynamic and constantly changing, offers the possibility of reviewing and altering it whenever reality so indicates or determines. Finally, ABED (2014, p. 70) recommends that

[...] the competences matrix may favor the construction of a certification process, but it goes beyond this objective. It encourages continuing education and in-service training at the macro (education in general), meso (training processes) and micro (training) levels, which can effectively contribute to the quality of distance learning,

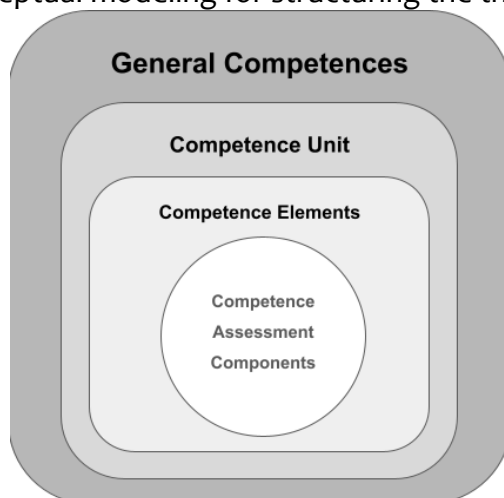
all aspects relevant to achieving the general objective of this paper.

## - Conceptual modeling

The diagram in Figure 1 explains the conceptual model used to structure the thematic analysis of the narratives produced by the authors. It shows the General Competences framework for distance learning tutors described by ABED with three levels of verbal hierarchy, with a gradual increase in specificity. The General Competence is the broadest dimension, referring to teacher training, which is subdivided into three Competence Units, corresponding to planning, carrying out and evaluating distance learning tutoring actions.

The Competence Units (CU) are described using Competence Elements (CE), which were operationalized as research themes in the texts. To do this, we tried to identify the Competence Assessment Components (CAC) that characterize each CE (ABED, s.d) in the reported content, to form an overview of the reports and extract a synthesis.

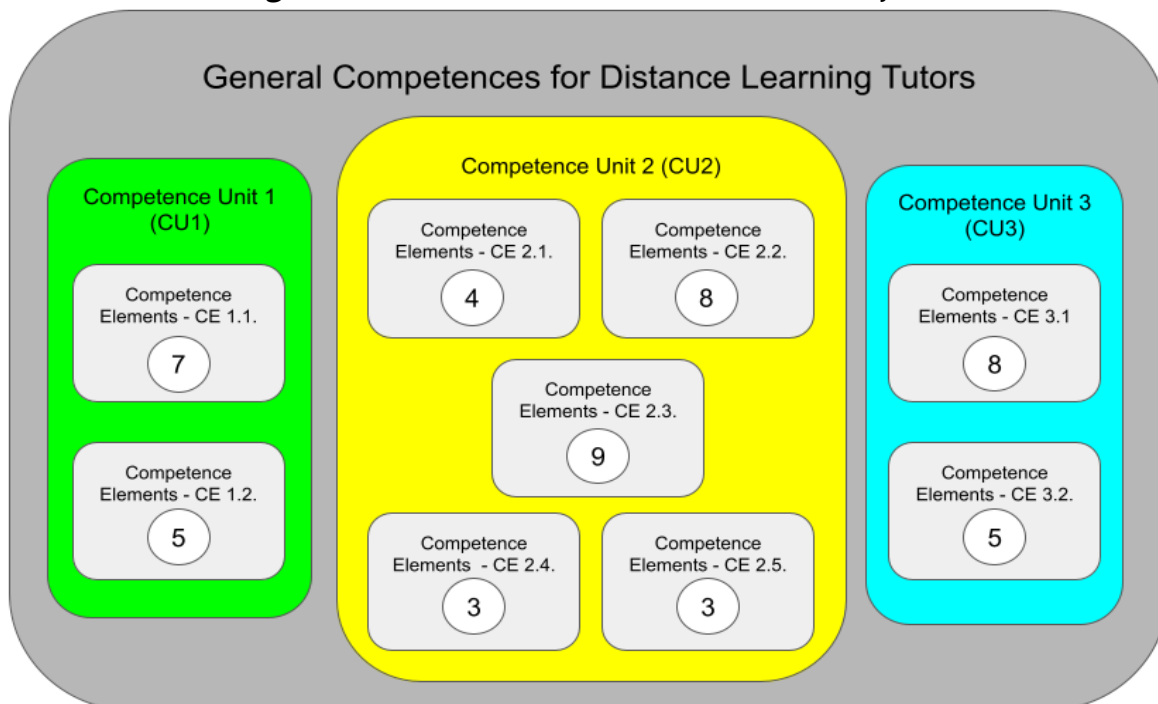
**Figure 1** - Conceptual modeling for structuring the thematic analysis.



Source: Adapted from ABED (s.d).

Thus, by aggregating the information dispersed in the texts under the categories of analysis structured according to Figure 1, an orderly basis was formed for reflecting on subcategories. The overall analysis structure is shown in Figure 2, along with a quantitative indication of the amount of CACs present in each CE subcategory.

**Figure 2** - Overall structure of the thematic analysis.



Source: Adapted from ABED (s.d).

## Results and Discussion

The document analysis was performed on a file in the cloud that brought together all the texts produced by the authors. Themes were identified in the narratives using a combination of the highlight and comment tools. The CEs were differentiated by color (as shown in Figure 2) and a comment was inserted on each highlighted passage to indicate the corresponding CACs with numerical codes from the theme(s) dealt with in each highlight. As an example, a fragment of text was extracted from report R2 (Figure 3).

**Figure 3** - Illustrative section of a piece of narrative subjected to the thematic analysis, which was created based on ABED's General Competences framework for distance learning tutoring.

Follow-up with the advisor throughout the semester also helps a lot. There are fortnightly meetings, communication on the forum, as well as feedback on the assessments, which help to align the development of the word. It was hard for a group that had this continuous communication with the supervisor not to do a good job.

One thing I noticed was a difficulty in writing, even though the texts written by the students are understandable, they are often a bit confusing, or with a language that is not very clear.

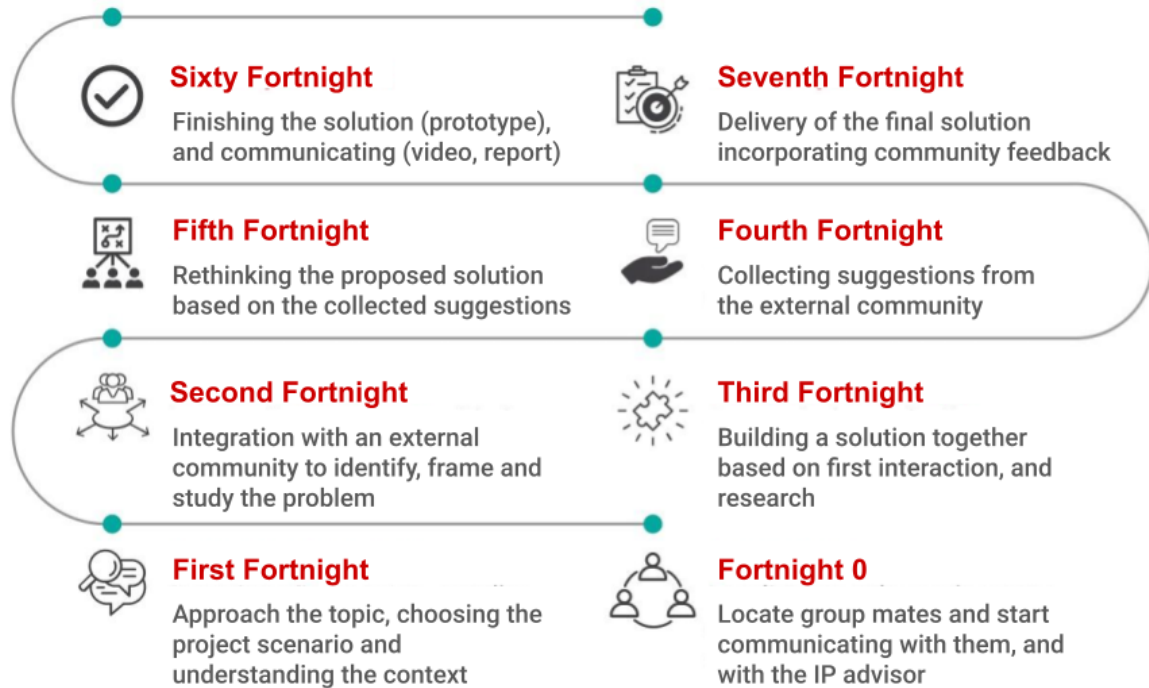
Source: Authors, 2023.

The clipping (Figure 3) shows three different colors of emphasis, each relating to a particular CU and, consequently, to its subcategories CE and CAC. The first comment balloon points to CU 1.2, indicating its relationship with the need to plan to meet the learners' needs during the IP, which involves all the CAC nested within it. Next, the subject of the emphasis is evaluating the suitability of the strategies used, so the second balloon specifies a link with CAC 3.2.1 and 3.2.3, about interactions between educator and student and communication interventions. The last highlighted section deals with a difficulty in relation to learning that was identified (CAC 2.3.9) and relates to clarifying and encouraging the use of language specific to the course, in this case in the preparation of reports with scientific writing.

The presentation of the results was organized based on the CU category (Figure 2), together with the students' trajectory in the IP at Univesp (Figure 4). In this alignment, it became clear that the periods of placement under analysis are

longer than the academic semester, since the General Competence framework for distance learning tutoring from ABED (s.d) used as a methodological basis covers teaching activities that either precede or follow the six-week period included in the IP course schedule (Figure 4).

**Figure 4** - The Integrative Project (IP) learning path in Univesp.



Source: UNIVESP (2021a, p. 7).

The IP trajectory in Univesp (Figure 4) presents a clear method to be followed (CAC 1.1.3), determined from Problem-Based and Project-Based Learning (ABPP), and operationalized with Design Thinking techniques (CAC 1.1.1, 1.1.3, 1.2.4). Each fortnight has specific objectives to be progressively achieved (CAC 1.1.1, 1.2.4, 1.2.5) and the groups are given guidance on how to plan an organized and viable schedule for carrying out the research and meeting the deadlines for the deliverables (CAC 1.1.6). For the students to be able to carry out the IP satisfactorily, considering the degree of complexity of the proposed activities, there needs to be a feasible timetable. In this sense, the organization in Fortnights proposed by Univesp (Figure 4) helps both the facilitators to organize the orientation meetings and the students to have a dimension of each stage to be followed during the semester. Despite this, it is

possible to find some obstacles to the fulfillment of the fortnightly activities in the reports, such as the low participation of students in the fortnightly meetings and their lack of understanding of the importance of each stage. As a result, some of the groups did not comply with the schedule set out in the Action Plan, leaving the facilitators to constantly demand and try to clarify the importance of each fortnight.

The dynamics of monitoring the groups by the IP advisor (CE 1.2) involves synchronous fortnightly meetings and asynchronous communication via different means and platforms. As such, one of the first actions that IP supervisors must take is, in addition to the initial contact with the groups, to provide guidance on VLE tools and the use of technological resources and support for communication (CAC 2.2.4). Lack of technological aptitude was perceived as a limiting factor in stimulating interaction (CE 2.1) and the autonomy of students to study with independence and commitment (CAC 2.2.2). Inadequate use of resources also restricts the establishment of bonds, the feeling of belonging to the group (CAC 2.3.4) and overcoming physical distance in order to enrich the educational relationship (CAC 2.3.7).

An apparent excess of possibilities for communicating was reported, highlighting that a wide variety of available resources can expand the dissemination of information and, consequently, access to it, while at the same time creating unnecessary redundancies in communication processes, mismatches between interlocutors and even undue dispersion of what was intended to be informed. To give an overview, use of the following ICT support at Univesp was attested: Microsoft 365 application suite and BlackBoard (BB) Virtual Learning Environment (VLE). The former contains the Office suite (Word, Excel, PowerPoint) for online use, Outlook (email), Yammer (social network), OneDrive and SharePoint (cloud storage), Teams (virtual office, where you organize your schedule, hold video conferences, store and edit files in the cloud, post forums and chat. Other applications highlighted were Forms (online forms: surveys, polls and tests) and Planner (collaborative task management for teams).

The development of the IP requires the supervisor to maintain contact with the supervised groups throughout the semester, using the tools available to stimulate communication and the carrying out of activities (CAC 2.1.2), encouraging everyone to participate (CAC 2.1.3). Even though the supervisors try to keep in constant contact with the students, there are often no responses to these attempts at communication, which creates difficulties in development, as the report below shows:

There were very few groups that wrote to me often, that took part in meetings and that added my suggestions to the work they were doing. Perhaps students lack an understanding of the role of supervisors in the development of their projects (Report R3, 2022).

However, in the perception of these IP advisors, when groups manage to maintain this frequent communication, they are usually more successful in carrying out their work. That's why there's a need to be ready to answer students' questions during the IP, which appears in the report by one of the authors:

In terms of teaching attitude, I adopted two recommendations from Univesp for the TCC that helped a lot (...): 1. respond within 24 hours to any attempt to contact the student; 2. provide feedback preferably in writing, quickly, briefly and objectively (Report R4, 2022).

This can be translated into "responding in a clear, precise and immediate personalized way to all the students' questions" (CAC 2.2.1). In addition, the importance of feedback on evaluations was emphasized (CE 2.2), as it helps to align the development of the work (CE 2.5). Constant contact with the students not only helps to resolve doubts, but also to revisit what was defined in the Action Plan, with the aim of "encouraging the students' progress in order to avoid dropouts" (CAC 2.1.4). Although many students drop out of the IP at the beginning, communication is limited in identifying the causes of dropout (CAC 3.1.4), and it is not possible to understand the reasons why many students don't even start the IP. All the reports mention this problem, which often hinders the facilitation work, especially in the first fortnight, when the time dedicated to attending to groups with whom contact has been established competes with the persistent task of writing several times, using all communication resources, to locate the "inactive" students.

Learning from activities related to academic research makes up the objectives of IP (UNIVESP, 2019, p. 2, Art. 4, VII, X) to contribute more effectively to the study and solution of a problem experienced by a community or school institution (CAC 1.1.1, 1.1.3, 3.1.1). The IP methodology, by applying the processes of listening, creating and implementing, seeks to ensure that the problem to be worked on by the group is relevant to the community, which should benefit from a feasible solution, validating it (UNIVESP, 2021a). It is up to the facilitator, who is necessarily a postgraduate student, to carry out the proper didactic transposition of their own research experience, which was pointed out as a methodological weakness, since even in postgraduate courses this aspect is still very little worked on.

Furthermore, when analyzing the tutoring actions (CAC 3.1.5), weak points are also found, such as the divergence between the facilitators' training areas and the courses they work on, which often hampers the quality of the guidance. IP presupposes that students will work on content they have already studied in other subjects to meet a need or desire of an external community participating in the project, with which they engage to build and prototype a solution (CAC 1.1.3). An unfavorable aspect is the lack of prior knowledge of the guiding theme to be worked on in each IP (CAC 1.1.2) and of the disciplines with potential for integration into the project (CAC 1.1.3), since there are restrictions since the themes dealt with in the projects are not understood in depth. Although mastery of the course's specific content (CAC 1.1.2) is desirable, it is not mandatory in Univesp's IP, given its educational proposal (CAC 1.1.3). The reports show that when the course, or at least the guiding theme, is aligned with the tutor's area of training, guidance can add content to the solution, as well as managing the project. In this sense, communication with supervisors and teacher-authors is crucial (CAC 3.1.3) to provide the necessary support for satisfactory guidance.

Planning tutoring actions in distance learning courses involves analyzing the context of the course and all its components (CE 1.1) to meet the learners' needs while respecting their characteristics (CE 1.2). The institutional settling-in phase, which precedes enrolment, was reported as a time to identify the objectives (CAC



1.1.1), the contents (CAC 1.1.2), the educational proposal (CAC 1.1.3) and the teaching resources of the course (CAC 1.1.4), as well as the activities planned for the students (CAC 1.1.5). Before fortnight zero, the greatest difficulties were related to knowledge and mastery of the variety of technological resources provided for the course activities (CAC 1.1.6) and the role of the various actors involved (supervisor, teacher author, teacher trainer, pole operators, mediation and support teams) and the process of communicating with them (CAC 1.1.7). CAC 1.1.1, 1.1.3, 1.1.4 and 1.1.5 were met by using the institutional website, the repository of official documents from the institution and the subject (IP Documentation menu) on the AVA, as well as handouts and tutorial videos produced and distributed internally. They were also sources of research into student profiles to facilitate relationships and interaction (CAC 1.2.1).

This preliminary phase of the experience, which preceded the IP, was associated with the influence of the institutional environment and the proposed training profile on the characteristics of the tutors themselves, as well as the students, in the context of distance education at Univesp (CAC 1.2.1). The scholarship students were initially welcomed by Univesp with an exchange of welcome emails (CAC 1.1.4, 1.1.7), formalizing their entry, in which documents and information pertinent to the agreement could be exchanged. It was reported that there is a Facilitator's Integration Week just before each academic term, in which new tutors are welcomed and encouraged to learn about the main tools, access various materials and establish contact with the mediation team (CAC 1.1.7), which offers asynchronous support (forum, e-mail, chat) and synchronous support (weekly meetings) to answer questions. In this way, we can see how mediation and supervisors also work to overcome the physical distance and enrich the relationship with the facilitators (CAC 2.3.7), making them feel part of a pedagogical community (CAC 2.3.4). This creates a receptive environment for answering questions and informing the teacher in charge when the facilitator is unable to resolve the students' specific difficulties in relation to the course (CAC 2.2.3).

However, a common negative point among the reports is that there is little or no feedback from the supervisors who look after and organize the work of the teaching facilitators. Each month, reports are submitted (3.1.7) in which the

facilitators write reflections on their performance and are even invited to self-assess in relation to deadlines, tasks and functions, but there were very few times when there was actual feedback. In this sense, facilitators can feel unassisted, as they write about their difficulties and don't receive any kind of help or recommendation.

Another negative operational point was the delay in gaining access to the groups they were supposed to mentor, as the time spent networking and interacting in the zero fortnight is not only preparatory from a technological and pedagogical point of view, but also important for understanding student and group profiles, observing their communication skills, attitudes, level of knowledge and socio-cultural position (CAC 1.2.1). The total number of groups mentored in the IP per semester varied from eight to twelve, with up to eight members in each. Not surprisingly, the "express" training for group facilitation in an entirely remote way was initially associated with mixed feelings of excitement, anxiety and insecurity. As they cooled over time, the focus shifted to improving simultaneous project management, collaborative work and communication.

"Monitoring the students' learning, indicating strengths and weaknesses in the course" (CAC 3.1.1) is a key factor in the facilitation work and can be done in different ways, since various tools are available. Despite this, in general, the students don't use most of them, restricting themselves to fortnightly meetings with the facilitators. About assessing student performance (CAC 3.1.6), one of the strengths of the course highlighted in the reports is the availability of a document with well-established assessment criteria, which promotes equalization between the work of the many facilitators Univesp has. The preparation of feedback was again emphasized, highlighting the contribution of the assessment rubrics to writing them more clearly and the formative assessment methodology for conducting the pedagogical process. This is probably why a common point in the reports on monitoring student performance (CAC 3.1.2) involved the recurring practice of corrections prior to the official deliveries made within the fortnightly deadlines, in the documents under construction concurrently with the development of the solutions.

One positive aspect concerns the documentation, forms and criteria established for monitoring the course (CAC 1.2.2), such as the Logbook and Action Plan, which help to plan the time/activities planned (CAC 1.2.3) and adapt the activities to the delivery schedule (CAC 1.2.4). Considering that facilitators are often responsible for guiding many groups at the same time, we criticize the secretive nature that CAC 2.5.2 attributes to the logbook for recording the guidelines for each meeting, as well as the doubts and difficulties that students bring up every two weeks. We believe that in IP it is more valuable for the teaching-learning process for the logbook to be a tool used together with the group, encouraging the students to feed the records in an organized and objective way that helps document the collaborative work process and the development of the solution. This does not exclude the possibility of the facilitator keeping a personal logbook, because it is necessary to maintain a constant pace of work. In addition, facilitators must always be aware of the progress and blockages in each of the groups, so that facilitation can really contribute to the students' learning. Having a separate file of group diaries, reminders and insights into the tutoring activity itself. This recording action can also help to identify recurring problems (CAC 2.5.3), such as the notable difficulties students have with academic writing, something that is common among the reports analyzed here.

As an example, one of the reports says that the groups had specific difficulties related either to writing or to understanding the stages of the project. In these cases, personalized guidance is important to indicate the best strategies for solving technical, pedagogical or technological difficulties (CAC 2.2.5), as well as selecting or preparing educational resources to deal with them (CAC 2.2.6). These actions can be seen in this excerpt from one of the reports:

[...] to help develop the writing of the paper, further meetings were organized with the groups. At that time, I was able to show the students several completed IP projects with numerous examples of how to write an introductory text. In addition, during the meeting we separated some texts so that the students could analyze the details carefully (Report R1, 2022).

By scheduling extra meetings and bringing examples of texts to work on their perception of the structure, rather than explaining step-by-step how they could do it, the IP's advisor stimulated the students' autonomy, encouraging them to study with independence and commitment (CAC 2.2.2). Considering the above excerpt, it is remarkable how the facilitator sought to resolve difficulties in relation to learning and help the students in this process (CAC 2.2.3), providing immediate and personalized assistance (CAC 2.2.1). In this situation, it was necessary to create different dynamics to problematize the weaknesses identified in the writing done by the groups (CAC 2.2.1).

Regarding the different ways of learning, as explained in the report, the student is considered to be a historical and social subject. Their human condition is granted by the social relationships they establish, as well as their recognition of their place in the world and their understanding of themselves as subjects in permanent movement and in need of learning. In this way, communication is an instrument for these conditions to be realized and for learning to take place. It's not enough to choose a different dynamic, but to provide the means to achieve the intended objectives, to propose situations to systematize the weaknesses pointed out so that students realize the mistakes and propose changes. This exercise encourages collaboration (CAC 2.1.1), as it helps students to take part in discussions (CAC 2.1.3), express their opinions (CAC 2.3.2), establish communication between group members (CAC 2.3.8) and the facilitator (CAC 2.3.3) and look for different alternatives to solve problems (CAC 2.3.9).

Situations requiring the use of differentiated strategies with a focus on conflict mediation were recounted. On this subject, look at the excerpt:

[...] I believe that the tensions experienced have fostered collective actions (...) of attentive listening, collection of suggestions for the development of the proposal, reflection on the problem together, knowledge and objective reading of the studies suggested by the institution, resizing of teaching practices to ensure learning possibilities, and especially the enhancement of teamwork (Report R1, 2022).

Considering the pedagogical concept defended by Univesp, working with conflict mediation (CE 2.4) should permeate actions that incorporate collective work, in a dynamic way, with the aim of developing attentive listening and voluntary

attention in the participants, to encourage collective reflection on the problem. It was reported how the online distance learning tutor at Univesp interacts with students with empathy, promptness and clarity, among other characteristics that make up their role as a facilitator of learning. The role involves a set of skills related to oral and written communication, synchronous or asynchronous, mediated by digital technologies.

If, on the one hand, the reports attested to the fact that mastery of technological resources is essential for good performance, on the other hand, they stressed the importance of the ability to humanize interactions in their various formats. As this characteristic can be related to the list of CACs 1.2.1, 2.2.2, 2.3.7, 2.4.2, 2.4.3, or even expressed in excerpts that may not be related to any CAC, we created an additional analysis category to the ABED reference framework: the Empathic Competence Component (ECC). This category is equivalent to a Competence Unit (CU), as it is a theme that cuts across Competence Elements (CEs) nested in different CUs. Therefore, it is represented with a highlight color (in this case, magenta) superimposed on the color of the CE of an already highlighted section.

The method included a phase of primary data production, proposing the writing of narratives about the experience of tutoring in online distance education in the IP course at Univesp, in a way that was uncompromising with any result. The sharing was spontaneous, without thematic or formal constraints. So much so that the lack of stylistic uniformity was the first challenge to the decision to use the texts as a source of research data. In a brainstorming session, it was realized that this could be a way of sharing experiences to get to know better what each author had experienced and to understand together how and in what way these experiences converge or diverge and to what extent they had contributed to teacher development. For this reason, in the methodological design process, reporting preceded defining categories of analysis, a decision that was therefore made after writing. The themes identified in the excerpts and translated as CAC, CE, CU, and ECC were there voluntarily and truly, written without prior access to the ABED criteria. Nor were they prompted with questions or structuring topics. Therefore, at the time

of retrieving and writing up the memoirs, it was impossible to bias results as to the presence or absence of CACs in the texts. Tables 2 and 3 show the numerical summary of the thematic analysis.

**Table 2** - Distribution of the mentions of the categories of analysis identified in the themes dealt with in the experience reports with IP guidance at Univesp.

Code	Source	Highlights	CU1	CE1.1	CE1.2	CU2	CE2.1	CE2.2	CE2.3	CE2.4	CE2.5	CU3	CE3.1	CE3.2	total CU	ECC
J	report 1	22	4	3	1	26	3	17	6	0	0	16	11	5	46	2
A	report 2	26	15	9	6	7	1	3	2	1	0	16	10	5	38	0
I	report 3	20	12	12	0	1	1	0	0	0	0	15	6	9	28	0
B	report 4	73	66	49	17	59	13	16	22	1	7	12	1	11	137	1
<b>total CAC</b>			<b>97</b>	<b>73</b>	<b>24</b>	<b>93</b>	<b>18</b>	<b>36</b>	<b>30</b>	<b>2</b>	<b>7</b>	<b>59</b>	<b>28</b>	<b>30</b>	<b>249</b>	<b>3</b>

CU - Competence Unit > CE - Competence Element > CAC - Competence Assessment Component | ECC - Empathic Competence Component

Source: Authors (2023).

Reading Table 2 from left to right, the codes at the top of the rows and columns refer, respectively, to the identification of the four reports (R1 to R4), the categories of analysis Competence Unit (CU), Competence Element (CE), Competence Assessment Component (CAC), organized hierarchically from the macro to the micro level, and the cross-cutting Empathic Competence Component (ECC), added to the general framework by the authors.

It was not uncommon to find more than one CAC related to the same highlight. This occurred in 59 of the 148 highlights (39.86%) made on the base document of the analysis. The five CACs most present in the texts are subcategories of CU 1, which establishes an association with the planning phase of tutoring actions in distance education, all derived from CE 1.1, indicating that the authors were concerned with "analyzing the context of the course and all its components" (CE 1.1). There was also a greater occurrence of CAC 2.1.2 and 2.3.8, linked to ICT, about establishing and stimulating contact with the groups and helping them to use the communication resources available in the course.

**Table 3** - Analysis categories and the absence of the CAC subcategory.

Category	Element of Competence (EC)	Competence Assessment Component (CAC)	CAC unallocated	
Competence Unit 1	2	12	0	0%
Competence Unit 2	5	27	7	25,93%
Competence Unit 3	2	13	0	0,00%
<b>total</b>	<b>9</b>	<b>52</b>	<b>7</b>	<b>13,46%</b>

Source: Authors (2023).

According to Table 3, the set of narratives dealt with themes directly related to 86.54% of the CAC (45 out of a total of 52). The wide coverage of CACs covered in the set of excerpts highlighted means that working as an IP tutor at Univesp provides an experience rich in opportunities to develop tutoring skills in online distance education, in line with the general framework recommended by ABED. This is an excellent result for the institution and its facilitators, as the very high level of thematic compatibility found between the texts and the reference framework indicates an abundance of training in competences related to the distance education modality that aims to go beyond the self-instructional dimension, as expressed in Univesp's Pedagogical Model. According to Univesp (2021a, p.3), providing meaningful learning experiences "strengthens the role of the student as an active participant in the process and defines the role of the teacher and tutor as facilitators, who guide and encourage them to learn how to learn [...] in tune with society". However, there is still criticism about the dismissal of CAC 1.1.2, relating to mastery of the content, as the facilitator with this competence can help with the details of the project, going beyond the mediation and guidance actions provided for in the IP teaching methodology.

Even so, when evaluating the stages, tools and communication processes of the course (CAC 3.2), it became clear that there are many relevant tools that enhance the development of IP (CAC 3.2.2), even if they may confuse students at first. The logbooks and individual records allowed for an analysis of the communication interventions and guidance strategies (CAC 3.2.3). The organization of time into fortnights also helped to follow a well-established schedule, making it easier to manage the time to attend to the students (CAC 3.2.4). Although there were challenges and criticisms were made, there was a consensus on the value of planning tutoring in distance education to properly manage the collaborative work of the groups and the development of their projects in the quest to improve quality (CAC 1.2.5). In writing the individual reports and systematizing these documents for this article, it was also possible to comply with the last competence listed (CAC 3.2.5), making it possible to provide data so that the tutor's work can always be improved.

## Final considerations

This paper discussed how the IP methodology combines active learning strategies, supported by various digital resources that complement each other and by formative assessment tools. It was observed that mastery of ICT is fundamental in this process, as it helps to manage the orientation routine and the collaborative work of the groups, taking care of storing the reference materials collected and the documents produced by the groups, as well as recording student and teacher activities throughout the semester. Difficulties in incorporating the scientific spirit into the dynamics of the course were highlighted by both the groups and the facilitators. This indicated a certain deficiency in skills related to understanding the course's educational proposal and mastering the content to be integrated into proposed solutions to problems identified with communities outside the institution. There were also adversities in communication, based more on a lack of technological skills than on the ability to humanize interactions or mediate conflicts. As an aggravating factor, the slowness of the allocations was pointed out and the lack of prior availability of the IP's content for the facilitators, who become aware of it at the same time as the students, was disapproved of, since the release of the materials follows the fortnightly schedule of the IP's trajectory (Figure 4).

The results confirmed hypotheses that were formulated prior to the actual analysis, about how facilitating the IP could help improve teacher training. In summary, it was found that the role of IP advisor stimulated the concomitant development of skills such as the management of collaborative work, scientific research, the Virtual Learning Environment (VLE) and the online classroom. In addition, mastery of the variety of digital technologies available to support education has increased, making it increasingly possible to exercise creativity to interact synchronously and asynchronously with students. This learning has involved the development of self-education, especially when facilitating IP outside the technical area of work or professional training of origin, whether at bachelor's or graduate level. It's about knowing how to plan and manage oneself, so as not to fail the groups



and the discipline, with organization and diligence to keep guidelines (in their various forms) and operational tasks up to date, as well as recording them in order to self-assess, adjust to demands and unforeseen events. Learning in practice what is taught was fundamental to gaining the confidence to instruct students on how to do the same, individually and collectively.

The virtual higher education that Univesp offers informs and instructs, yes, but not only, because, as the results show, IP incorporates the collaborative learning process mediated by facilitators who support both the interaction of students with the content and with each other and as a collective. There is a clear contrast with the limited perception that distance learning is the transposition of face-to-face teaching into virtual teaching with adaptations. The facilitation of learning, in the case of IP, leads the groups through creative paths that build prototypes and materializes a method for the collective development of knowledge. As the competences needed to be effective in guiding IP are fully expressed in ABED's General Competences framework for tutoring in distance education (s.d), this reference proved to be adequate as a parameter for analysis and provided substantial elements for discussion. Therefore, as the main recommendation for improving teaching practice, it is suggested that fellow facilitators apply the method themselves and use the results as a metric for evaluating their own competences.

Sharing the results does not imply divulging the basic text, because what matters is to understand how the occurrence of themes, coming from a self-made text, can signal what is most important to you, or uncomfortable, or even what you have paid little or no attention to. Thus, there are direct benefits to be gained from the analysis that can be applied to the next facilitation experience. As a suggestion for future work, in the microlevel you could start by simply looking at the competencies that were addressed in some reports written by the same person, comparing results relating to experiences in facilitating two or more different subjects in the same course, and weighing up the influence that the degree of mastery of the content has on the facilitation developed when this is greater or lesser. Another possibility along these lines would be to compare how the same subject is facilitated in different courses or even in different educational institutions.

This activity can be self-evaluative or based on third-party reports, if in both cases sufficient information is extracted about the CAC by using the method, in order to objectively interpret the criteria as quality indicators of performance in distance learning tutoring, which enables immediate action on the part of the individual themselves in the form of self-improvement.

But beyond what is concentrated on the individual, there may be indirect benefits at a higher level. Another possible continuation would be, for example, to carry out a greater number of individual analyses within the same institution. This would make it possible to look for patterns and trends to identify and examine aspects that are more structural than personal, based on the experiences recounted by the teaching staff. This information could support institutional actions at the meso level, aimed at collective improvement. In this logic, a statistically significant set of narratives from different online distance learning institutions would provide a dimension on the distribution of competences in a professional class, in a teaching network, in a demographic profile, in a geographical region, among others at a macro level.

Therefore, even if the original texts remain confidential, it is important to share the results. The greater the dissemination of reflections on practical experiences with tutoring in online distance education using a common language, the greater the reach and probably the impact of this communication. The authors of the texts analyzed were IP tutors at Univesp for the same period, but not for the same IP or in the same courses. The interactions covered classes with different levels of maturity in IP, which is offered in a sequence of subjects IP I to VI in Univesp's undergraduate courses. In addition, the areas of knowledge and educational institutions of origin of the authors also differed. The same reference framework gave uniformity to the reading strategy for extracting data, which could be interpreted together, observing what was or was not similar based on the thematic synthesis.

Finally, the unrestricted, massive and successive application of the method offered here could potentially help to establish a kind of syntax of competencies for discussing teaching practice in online distance education. This is because identifying

the arrangement of themes in the narratives reveals them, therefore, in the experiences. This gives us a lens through which to read reality and help us understand it. The historical accumulation of analyses could express changes in the emphasis given to competences over time, from individuals to groups working in online distance learning tutoring. In short, the prospects for future research are encouraging and open a line of investigation in the field of research into Competence-Based Education (CBE), aimed at balancing the technical and behavioral aspects that make up professional training for teaching.

## Acknowledgements

The authors are grateful for the funding made possible by the scholarships linked to the "Didactic-Pedagogical Training for Distance Learning Courses" Program, the result of a partnership between the São Paulo State Virtual University Foundation (UNIVESP) and other public universities (USP, UNICAMP and UNESP) in São Paulo state. This research was carried out between August 2022 and February 2023 as part of the Postgraduate Course Conclusion Work (Project) - TCC510.

## References

ABED - Associação Brasileira de Educação a Distância. **Site institucional**, 2023. Missão. Disponível em: <https://www.abed.org.br/site/pt/institucional/missao/>. Acesso em: 21 jan. 2023.

ABED - Associação Brasileira de Educação a Distância. **Competências para Educação a distância: Matrizes e referenciais teóricos**. [S.l.] 2a. Ed. 2014. Disponível em: [https://www.abed.org.br/documentos/Competencias\\_Final\\_Ago2012.pdf](https://www.abed.org.br/documentos/Competencias_Final_Ago2012.pdf). Acesso em: 15 set. 2022.

ABED - Associação Brasileira de Educação a Distância. **Perfil Profissional do Tutor de Cursos de Educação a Distância**. [S.l.; s.d]. Disponível em: [https://www.abed.org.br/arquivos/Perfil\\_Tutor\\_EAD.pdf](https://www.abed.org.br/arquivos/Perfil_Tutor_EAD.pdf). Acesso em: 15 set. 2022.

BRASIL. **Lei de Diretrizes e Bases da Educação**. Lei n. 9.394, de 20 de dezembro de 1996. Brasília: Diário Oficial da União, 1996.

BRASIL. **Decreto n. 5.622, de 19 de dezembro de 2005**. Brasília: Diário Oficial da União, 2005.

BRAUN, V.; CLARKE, V. Using thematic analysis in psychology. **Qualitative Research in Psychology**, v.3, n.2, p.77-101, 2006.

GUITTON, J. **O Trabalho Intelectual**: Conselhos para os que estudam e para os que escrevem. Campinas: Edições Kirion, [1951]2018.

MOORE, M. G. Teoria da Distância Transacional. Tradução: Wilson Azevêdo. **Revista Brasileira de Aprendizagem Aberta e a Distância**, v.1, p.1-14, 2002.

ROSA, L. S.; MACKEDANZ, L. F. A Análise Temática como Metodologia na Pesquisa Qualitativa em Educação em Ciências. **Atos de Pesquisa em Educação**, v.16, n.e8574, p.1-23, 2021.

UNIVESP - UNIVERSIDADE VIRTUAL DO ESTADO DE SÃO PAULO. **Orientações para alunos de projeto integrador**. 2021a. Disponível em [https://assets.univesp.br/Proj\\_Integrador/2023-15/Orientacoes\\_para\\_alunos\\_de\\_PI.pdf](https://assets.univesp.br/Proj_Integrador/2023-15/Orientacoes_para_alunos_de_PI.pdf). Acesso em: 01 jul. 2024.

UNIVESP - UNIVERSIDADE VIRTUAL DO ESTADO DE SÃO PAULO. **Regulamento para o Projeto Integrador (PI)**. 2021b. Disponível em [https://assets.univesp.br/Proj\\_Integrador/2021\\_2/\\_Regulamento\\_PI-2021\\_3.pdf](https://assets.univesp.br/Proj_Integrador/2021_2/_Regulamento_PI-2021_3.pdf). Acesso em: 26 nov. 2022.