Initial Training in the Use of Didactic Game Strategies: What Do Practising Teachers Say?

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To carry out good teacher training, we need professionals capable of teaching from all aspects. To do this, they must be trained in various active methodologies, among which is game-based learning. It is said that it is necessary to break the apparent opposition between play and work, which considers the latter associated with the effort to learn and play as idle fun. The objective of this research is to know the opinion and assessment of teachers on initial training and learning of recreational/didactic tools, and their impact on the teaching/learning process. This research was carried out through semi-structured interviews with 16 Primary Education teachers from different educational centers in Andalusia (Spain). Subsequently, a content analysis was carried out to collect the evaluations provided, extracting the most fundamental characteristics. Data processing was carried out using the QSR Nvivo 12 Plus qualitative program. The results conclude that the initial training of teachers presents deficits in the acquisition of knowledge on the subject. A fact that is supplemented during the training received during the exercise of their professional performance. Likewise, suggestions and elements for improvement of the issue are presented, pointing out the teacher, the study plans and the university institution itself as axes of change.

Keywords: initial teacher training, primary education, active methodologies, educational game, learning methods

INTRODUCTION

Much has been written about the opportunities offered by the use of active methodologies in the learning and school processes, as well as the role played by the teacher in this process (e.g., Martínez-Valdivia et al., 2023; Molin, 2017; Rocha, 2020), who moves from a leading role in the classroom to a secondary role (Freeman et al.,

2014; Konopka et al., 2015). The use of such active and innovative methodologies not only offers advantages to students but also contributes to the training of education professionals (EsteveMon y Gisbert, 2011). This issue also concerns university teachers, who must stop focusing their professional development on content and offer a perspective in line with today's needs (Morales-Ocaña & Higueras-Rodríguez, 2017; Muntaner-Guasp et al., 2022).

Through a creative mind, we are able to explore reality while keeping all possibilities open (Mena & Espinoza, 2019; Louise et al., 2018). Moreover, fostering creativity can generate new ideas by combining existing ones and choosing the mix that best suits our purpose at any given moment. The different characteristics that the mental structure possesses and that Chacón (2008) points out, enter into connection with the dynamics that are generated during the development of the game, learning, creativity and reflection, among others. From this it follows that the dynamics of the game enters into full development with creativity, learning, reflection, etc.

When we refer to Primary Education, play activity is a particularly appropriate resource at this stage. Game is present in the objectives, in the assessment and fundamentally in the methodological principles. In many cases, teaching and learning activities will have a playful character and, in others, they will require a greater degree of effort from students, but, in both cases, they must be motivating and rewarding, which is an essential condition for students to build their learning (Chacón, 2008; Manzano et al., 2022).

It is said that it is necessary to break the apparent opposition between game and work, which considers the latter associated with the effort to learn, and the game as idle fun (Kosh et al., 2013; Mena & Espinoza, 2019). Preparing teachers for the use of active methodologies in the classroom must be a key and essential factor in education today. At the Spanish level, the general consideration that emerges from the latest educational laws is that the game is present throughout the formative process, especially in its motor/manipulative aspect. This, although important, is not enough, as it is necessary for it to take on a more central role in learning (Torres & Torres, 2002).

However, despite the recognition that this topic deserves, little has been done in the study and proposals to strengthen initial teacher training in the design and development of didactic strategies based on games. This argument can be based on a review of the literature, in which we find that most of the previous works and research are aimed at active teachers as part of their professional improvement and focused on stages such as infant (Garzón, 2011) or environmental learning (Lorite et. al., 2020) among others. Therefore, this work delimits a research objective that seeks to reinforce this line of research. The aim of this research is to find out the opinion and assessment of teachers on the use of active methodologies, including the use of ludic/didactic tools, and their impact on the teaching/learning process.

Framework

The role of the educator during the course of the game as a didactic resource

The game is an important part of the child's day at school, but more research remains to be done on the role played by teachers in this process (Molin, 2017). During the games, the teacher is present, but leaves space for the children to organize themselves (Bonals, 2006; Higueras-Rodríguez, 2019; Sarlé, 2006).

The importance of the game lies in the continuous explorations, discoveries, and knowledge that the child makes in the physical space (Pérez, 2017). Precisely because of this value, it is necessary for teachers to take an interest in what is happening, observing the game and the different skills they show, introducing novelties to achieve greater motivation, promoting interactions between the group, among other things. In addition, differences have been found if the teacher is experienced or inexperienced (Hattie's, 2003).

The result to be achieved is that it is the child who, starting from the positive acceptance of the game, thinks that he/she has constructed his/her own learning process thanks to the stimuli provided by the teacher. Recent studies reveal that the impact of teachers who use this type of strategy is based on their ability to show their students the beauty of deep learning, their understanding as well as to present challenges to their students that provoke pleasure in learning (Bain, 2004).

Teacher training to carry out game strategies in learning.

This section of the theoretical framework addresses the efforts and interests that have been developed in recent years by the University to show the need for training primary education teachers so that in their professional practice they are able to use active methodologies, specifically those based on games. The University must be able to contribute to the training of professionals who know how to assume the important social changes that are currently taking place (ESU, 2010; Finkelstein, 2016), and how these challenges are incorporated into the training of professionals, specifically teachers (Cano et al., 2019). This idea is in connection with the central approaches of the European Higher Education Area (EHEA) as well as with what is stated by authors such as Muntaner et al. (2020), Bowden, (2011), Cabero, (2006; and Finkelstein (2016) who understand the training of future professionals in a continuous and developed way under terms of usefulness for social development.

It is for this reason that the University must consider what its mission is, and design and develop its own educational project, taking into account three aspects in a specific way which are influenced by the "Student Centred Learning: Time for a New Paradigm in Education" (ESU, 2010) and justified by Estevemon and Gisbert (2011, p. 57): a) That the student is the centre of the entire training process; b) That an active teaching methodology favours the training of more versatile and employable people and professionals; and c) That learning takes place on a permanent basis and it is necessary to monitor this process, also on a permanent basis. Therefore, evaluation will be a key factor in demonstrating that the proposed training objectives have been met.

Therefore, it can be said that a student-centred university is a university focused on promoting and stimulating education and active and practical learning, thus favouring the renewal of methodologies, and contributing to educational innovation (Bochkareva et al., 2020; Vidal et al., 2011). To contribute to meaningful learning in both students and teachers, as well as to respond to today's society that demands versatile education professionals who improve the quality of education, by using other methodological strategies such as the inverted classroom and the simulation and game methodology. (Baran et al., 2018; Ismaniati et al., 2023).

METHOD

Based on authors such as Sandin (2013), Flick (2015) and Denzin and Lincoln (2011), among others, we selected a qualitative methodological approach because it helps to determine the meaning given to phenomena, to discover the meaning and the way in which people describe their experience of a specific event. In this sense, and in accordance with the objectives of the research, we believe that it allows us to get to know details of the subject under study, which would otherwise be impossible to reach. We understand that it will facilitate access to the teachers' thoughts and reflections, giving us insight into the conceptions and evaluations they make about the need for, in initial training, the use of ludic/didactic strategies such as the educational game, as a tool for teaching and learning.

The data were obtained through in-depth interviews supported by a script developed for this research, validated by a system of judges. The questions are semi-structured, all of them focused on the objectives guiding the research. The interviews were recorded and transcribed verbatim and ranged in length from 50 to 100 minutes. The interview script used for the research is shown in Appendix 1.

Research subjects

For the selection process of the participants, certain characteristics were taken into account which had to be fulfilled: a) teachers in practice who were in the Primary Education stage, who had at least 5 years of service; and b) be working in schools that carried out innovative activities and that these schools had innovation streams.

A total of 6 schools were selected in Andalusia (Spain) that were classified as innovative or had an educational project as a movement of pedagogical renewal. These projects are carried out by the Ministry of Education of the Andalusian Regional Government (Junta de Andalucía, 2022). Table 1 shows the schools and the total number of teachers selected. Each school can carry out several projects, but the selection of each school was based on the project they had been running the longest and had the most positive results in terms of student learning.

In addition, other aspects such as intentionality, motivation, opportunity, accessibility, personal interest, relevance, and appropriateness were also considered. The most significant aspects were relevance and appropriateness, as they refer to the choice of subjects who could provide the best and most information for the research. Adequacy refers to having the necessary data for the most comprehensive understanding possible.

Finally, 16 teachers from different schools in Andalusia (Spain) participated.

Table 1
Educational projects and selection of participants

Educational centre	Thematic/ Educational project	Number of interviewed subjects
School 1	STEAM educational programme	3
School 2	Living and feeling the heritage educational programme	1
School 3	Film classroom educational programme	4
School 4	"Aldea" environmental education programme for the education community	2
School 5	Healthy lifestyle education programme	3
School 6	Film classroom educational programme	3

Data analysis

We used the Content Analysis procedure inspired by the work of Miles et al. (2014), addressed in four interrelated phases: 1. Data collection; 2. Reducing data by identifying and labelling units of meaning (in paragraphs, sentences or words) using a set of categories previously defined from the literature (e.g., Darling Hammond et al., 2017; Escudero et al., 2019) which was enriched by the contributions of the practice (Appendix 2); 3. Arrangement and transformation of data for interpretation, consisting of meaning using examples of recording units, and frequency of categories; 4. Obtaining results through comparison and contextualization of units of meaning, and drawing conclusions by integrating the results into broader theoretical and empirical frameworks.

To assist us in the analysis process, data processing was carried out using the qualitative program QSR Nvivo 12 Plus, which facilitated the preparation of the results report. In the report, the findings obtained are shown, supported by textual quotations following the guidelines offered by McMillan and Schumacher (2011).

The stability in the categorization process was analysed by means of a validation process consisting of comparing the coding of the material from two researchers, analysing the stability of two categorizations of the material after a period of one month. The percentage of agreement obtained for the first categorization was 87%, and 90% for the second.

FINDINGS

The results, in terms of frequency data, are displayed in Table 2. We present the most significant results regarding the proposals offered by the interviewees indicated with their corresponding code in brackets. More in detail, compared results of provided frequencies.

Table 2
 Frequency of subcategories per element

Category (Code)	Frequency
Pathways of training received. (VFI)	46
Importance. (IMP)	38
Presence of the game in initial training (PREFI)	27
Overall assessment of the initial training received about the use of play strategies. (VALGLO)	29
Suggestions for improving initial training. (SUGFI)	45
Desirable elements in an initial training aimed at preparing in play strategies. (ELFI)	28
Desirable conditions. (COND)	40

Source: own elaboration

Table 2 of the categories provides an in-depth understanding of the study problem from the teacher's point of view through the aspects described in each of the categories, addressing teacher training, the use and needs of teachers, and what should be in place to promote learning situations with these characteristics.

Training pathways (VFI)

Although this work focuses on initial teacher training, it has been necessary to gain a broad knowledge of the teachers' training trajectories in order to have a more general perspective. In this sense, the results show two different types of training trajectories on the game. On the one hand, the initial training and, on the other hand, the period of continuous training during their professional practice. Their trajectories are diverse in nature and numerous in their appearance during the interviews (with a frequency of 46 mentions).

Thus, during initial training, the results show that most of the practising teachers have not received specific training on games as a teaching resource, as it is said to be "practically non-existent" (P2). In this sense, from undergraduate or postgraduate university studies, they say that they have approached the subject of the use of didactic strategies based on games, but mainly in a theoretical way: "I did a master's degree in mathematics education, and it is true that I started to look at projects, but in the end it was all about reading articles" (P10). This leads to the practical part being left aside, which makes students unable to apply what they have learned as the following participant expresses: "In the faculty there was a lot of theory. They started talking about active methodology and project-based learning, but we never put it into practice. We never put it into practice and so it was just knowledge that we had but we couldn't use it [...]" (P14).

In this way, all the knowledge and learning on this issue has been obtained mainly through subsequent periods in what we know as continuous training experiences (organised by training institutions, by their workplaces, self-training experiences, peer counselling and coaching, etc.). For example, we have references indicating: "I have no training at all, just trial and error. Besides, I have seen other types of teachers using it [...]" (P10).

Within in-service training, when analysing the teachers' responses and general comments, most of them allude to the period of in-service training during their professional practice, as a relevant moment of such learning, guided by their own desire and interest in using the game as a teaching resource, using it and modifying it for improvement through trial and error as part of the reflective teaching process, or derived from collaboration and teamwork with colleagues who used it. They also allude to other more systematic formulas for training, programmed through organised and planned activities such as courses, seminars, meetings, etc.

One of these more systematic training experiences are those offered by the Teachers' Centres (CEP), which offer the possibility of learning through courses that are proposed because of the teachers' interest in improving their teaching. "It is true that I owe a large part of this training to the PTCs, some people are magnificent, they have been teachers for many years and, well, they take care to look for courses related to this" (P3).

Teachers' Centres are conceived as external support systems for schools, i.e., as an interactive set of two or more people and processes with the common mission of providing support to two or more schools, where support is understood as the process of advising or assisting school improvement. These centres are places of training, resources and advice for education professionals, with the aim of improving the quality of teaching and learning. The PECs offer continuous training to teachers, as well as materials and resources to improve the teaching process and adapt to new educational methodologies.

These centres offer them the possibility of interacting with teachers from different schools. To this end, they organise convivial gatherings to give each other feedback and thus generate collaborative networks and show what they are working on in each other's schools. "One of the things that the Regional Ministry is considering as innovative is that teachers can go to other schools to see in situ what other teachers are working on in other classrooms" (P6). "It helps to know what other colleagues in other schools are doing" (P14). In addition, it has a wide network of collaborators and experts in different areas, which allows it to offer quality training adapted to the needs of each organisation.

There is also the possibility of in-school training to strengthen the relationship between the same colleagues, providing information on how they work with each other, for example, "from the readings, discovering authors that some colleagues have told you about, etc. in the same classes they provided you with a lot of bibliography" (P1).

Teachers can choose courses according to their interests and needs, with various motivations such as: "I like to challenge myself to improve and adapt everything I see to my class" (P11). They consider the time it takes to complete them as a possible drawback, as the vast majority do not want to spend time outside their working hours on training.

On the other hand, it is said that this type of training is limited because the CEP, as was the case in the initial training they received, offers courses of a theoretical nature, which hinders its possible application in the classroom. They suggest offering a variety of activities so that teachers can learn to use this type of methodology, as most "of the

courses offered by the Junta de Andalucía often focus on game theory such as resource games (which they develop) but do not usually offer a wide range of activities to carry out in class, which in the end is what makes the most difference in our daily game work" (P13).

In addition, it is commented that sometimes the CEP does not take into account the needs of the centres, and this generates little interest in attending training courses "We have little interest in going and it doesn't motivate us very much" (P16).

Finally, among the training trajectories, the participants also show other training options on the subject that are general or open and accessible at any time of training, both in the initial and continuous stages, from other entities and which offer courses where anyone interested can be trained in this type of methodology and which are systematic training courses: "By the CEP or on your own: doing moocs, online courses because there is a lot of training [...]" (P13).

Importance of initial training (IMP)

The results show that the participating teachers understand that, within university teaching, games as a didactic resource are a highly relevant topic at this stage of training and needs to be taught and used from initial teacher training. "I give a lot of importance to games, because in my speciality this teaching strategy is given much more importance during all the courses of the degree course" (P13). This theme is recurrent and is mentioned up to 38 times by the participants.

In a detailed analysis, different moments of teacher training are highlighted. During the interviews, there is a debate about whether or not teacher training is the right thing to do, and most of the participants agree that the best time to address it and give it the value it requires is during initial teacher training. "At the very least, they need to know the active methodologies that can be used in the classroom from the university. After that, they can improve their skills [...]" (P8).

Within this initial university training period, the interviewees comment on its importance for those who have to face it during their work experience during their university studies: "it is a shame that they arrive at the work experience and know nothing" (P11). They find themselves lacking in terms of teaching practice and begin to question their own training. There are situations in which strategies, resources and other elements are implemented that "they may have heard about it, but they don't know how to apply it" (P1). They comment that, finally, they ask the teachers themselves who work in these schools to teach them things that they do not know or that they have only heard in class.

Furthermore, in relation to their work experience, they questioned the fact that the reality of education in schools and the reality transmitted from the university do not always match. Perhaps these students have learned a lot about innovation and possible tools but then, when they go to educational centres, they find that they are still working with a more traditional model where children are always sitting quietly and listening to classes in which the teacher explains. This hinders the learning of innovative methodologies and the use of games as a teaching strategy.

From this experience, other evaluations of their time at university were derived, where the participants stated that university teachers should teach a variety of aspects of teaching and methodologies in depth. They should not limit themselves to naming them but go into them in depth so that future teachers know and understand them and then decide whether or not they want to use them in their professional future. They also comment that the attitude of the students and future teachers influences this whole process, as "there are some who have little attitude, but there are others who are very keen to learn, so they should be given these tools, even if they are only the main ones, and then they should start training on their own, but at least they should be given the opportunity to do so" (P11).

Another problem is the lack of knowledge that university teachers have of the reality of the centres, with the two realities being totally disconnected when they should complement each other. This leads to limitations in terms of innovative proposals and, at the same time, their implementation in practice. "The biggest criticism that the school makes of the university is that they live on a pedestal and as if they don't want to know anything about the school [...] The university is necessary because not everything that is done at school is innovative and not everything that is done at school is well founded" (P7). They comment that it is a pity that the importance of games as a basis for education is studied at university, but once studied, they fall back in practice to more traditional methodologies. "We only work with cards, the children sit quietly, in silence and paying attention to the teacher (who knows everything). It is a priority" (P12).

In another line, another aspect to highlight is that there is a widespread idea that everyone knows how to "play" and there is no need for training. The teachers interviewed think the opposite and affirm that training should be provided by teachers because playing is not the same as using it as a didactic resource that facilitates learning processes. Then, if it were learnt from the beginning, trainee teachers would be able to put it into practice and when they arrive at the schools, they would know how to use it to a greater or lesser extent. In the words of one participant: "I think it should be taught in all aspects" (P10). It should cut across all subjects and university teachers should be able to teach this type of methodology, "that is, explain and understand how to do it, because it seems that we all know how to play but we don't really know how to do it. As a resource, we don't know" (P10).

After all that has been said, the idea that most prevails in the testimonies of our teachers is that games should form part of initial teacher training, that they should be taught in all courses of university studies in education degrees in a theoretical and practical way, with greater connection between the university and the educational centres.

Presence of the game as a didactic resource in initial training (PREFI)

Within the initial training, this work has studied the moments, contents, subjects, among others, in which games have been present as a didactic resource, and the participants referred to this category on 27 occasions.

The presence of this resource within the faculty was present in the university life of some of the interviewees, although they usually mention that only in a theoretical way,

where they were told that it existed, but they could not really put it into practice. "In the initial training there was no mention of the game. They did talk about the methodology of the project, but in a theoretical way, and well, within the methodology of the project there was the game" (P14). Although they talked about innovation, they did not explain what to do or how to do it. "I only remember that they said that you had to innovate but they didn't tell you how. What less than giving you some little guidelines so that you would know, or you would start on your own." (P11)

Others, however, have not had any experience during their time at university. Rather, they have been interested and have been learning by trial and error and training at a later stage. "If they were taught from the beginning how to use these tools effectively, it would be much more beneficial for both teachers and students" (P1).

Although there is no talk of poor initial training, there is talk of a lack of initial training among novice teachers, which translates into a lack of subsequent teaching preparation and the need for professional retraining. "There is a need for continuous personal and professional enrichment and not to stagnate" (P7).

Overall evaluation of the training received about the game as a teaching resource (VALGLO)

With regard to this item, it was mentioned 29 times during the interviews, showing the teachers' perception of the game as a strategy and of it in reference to their initial training. In general, they do not receive a good rating, but this perception is based on the lack of specialised training. Teachers have not learnt to use this tool since their university studies but have been learning throughout their teaching experience. "It was then that I realised that I didn't want to be a typical textbook teacher and that I needed to do other things" (P11).

The main criticism of the initial training received is that it is theoretical, limited, and leaves it up to the trainee teachers or recent graduates to find their own solutions and strategies: "that is what I have missed in teaching, because if all this is all very well but we don't know how to use it, then it comes to the classroom and you don't know what to do with the students" (P10).

Another perspective is that this initial training is basic, i.e., the minimum necessary to be able to work as a teacher: "I can say that it was basic. I needed to know in order to be able to prepare for the competitive examinations and work as a teacher" (P14).

On the other hand, some of the participants say that it was a positive stage in general and that all the new things or difficulties they encountered were normal and part of the path that every teacher has to follow. "It was clear to me that it is a stage of discovery" (P5) and in which the student must not only learn in the university classroom but must also gather and acquire the necessary competences to continue training when facing the teaching task.

And, as mentioned in previous ideas, it is once again clear that there must be a link between school and university, as they cannot be one in front of the other but must advance and innovate at the same time. An articulation is necessary between the

relationships, methods and work styles that characterise the one they are trained for and those of university teaching, aimed at promoting the improvement of the teacher's pedagogical activity. This is why they mention that the university teaching staff has lagged behind the school, since it is not possible to talk about innovation by explaining it through a totally magisterial lecture. These two institutions must be connected and go hand in hand in the projection for the improvement of future teachers, university professors, teachers and students. "With this union, everyone improves" (P2).

This relationship should be strengthened, and both should have equal weight. It is seen as a way of optimising responses to the diversity of problems that processes may present; as the basis of the professional culture that should govern the integration of influences that becomes the central axis of the work of the university and the school, as institutions involved in teacher training. Also, as a way of increasing the potentialities and dispositions for educational transformation and as an essential reference for the understanding and responsibility of those who participate in it. In the words of one of our participants: "I think that school is far ahead of university teaching. So, I think it is much more necessary to mix people from the university, both what they are studying and university teachers with people from the classroom" (P6).

Suggestions for improving initial training (SUGFI)

This topic was raised 45 times by the participants. The results obtained provide suggestions for improving initial training in the knowledge of games as a teaching resource. The interviewees commented that in order to implement the game as a didactic resource in the faculty in one way or another, one of the main elements are the teachers and the need to innovate in their professional practice. Teachers interested and willing to teach through different active methodologies that make their students' learning more effective and practical. "Teachers who are in charge of training future teachers must be aware that in education, the main change is in them. It is not enough to say that they are innovative" (P1).

Teachers who take into account the characteristics of the school and the pupil. Teachers who know how to work taking into account the educational reality and provide strategies on how to work in a school classroom in the most realistic way possible. "What is done in a classroom, but everything in a real classroom, not an idyllic one" (P14). Discussing that "real" classrooms are needed for diverse pupils with different characteristics, and from there start doing the practice so that future teachers know how to carry it out.

Another sign is the link between school and university. This relationship must be real and connected to each other. They must know what is done in practice and how, in order to be able to train in this aspect, so that both can feed back to each other. "The first thing is to bring us closer together, the school and the university" (P2).

From this idea of union, we also learnt about what characteristics a university teacher should have. It is suggested that they should be teachers who really know the educational reality of the classroom, and that it is better for a teacher to be the one who teaches. "The first thing I would do is to start thinking that certain subjects in teacher training should be taught by teachers who are in the classroom. This is indisputable and

we have to start thinking a lot about it, and we have to think that maybe a teacher who is in the classroom could teach university students better" (P7).

On the other hand, we find that the subjects consider that introducing this type of methodology in all the subjects of the degree course offers different ways of working to foster motivation and interest among students. Introducing this strategy in almost all the subjects taught "in the degree course, offering different ways of working in the classroom to encourage motivation and effort among students" (P13).

Another suggestion is the distribution of the teaching plan, e.g., more lectures and practical seminars so that students can practice what they have learned. "Less content and more about how to actually apply the content" (P16).

Below we offer a series of findings, which although they do not directly respond to the object of this study, we consider that they contribute to understanding this phenomenon and predict the framework of changes that must be implemented to achieve the improvement of initial teacher training in the area of games as a didactic resource.

Thus, an element added to the central objective of this study, and which reinforces the relevance of didactic strategies such as games as key elements in the teaching-learning process, is related to evaluation during initial teacher training. In this sense, it is considered that the exam should not have so much weight in the final mark, as more consideration should be given to continuous assessment throughout the process and not to the exam. Regarding suggestions for improving initial training, "I would mainly do the type of assessment that teachers do because there is only one final assessment, although they say that afterwards it continues but then it has 30% and 70% of the exam. The weight is given to the exam" (P15). So, the assessment has to be through more participant observation, through collaborations, presentations, etc., so that the percentage is much more evenly distributed and not just the exam.

Continuing with the results that are complementary to our main objective, but which undoubtedly offer relevant knowledge for initial training and the appropriate development of didactic strategies such as games. We now turn to the minimum criteria for access to university studies that limit the entry requirements and the profile of university students on these courses. As it is a degree course with a low cut-off mark, many students decide to take it without any vocational motivation of their own. "People with a vocation for teaching and who really want to become a professional teacher are needed" (P13). We consider that this circumstance may predict one of the difficulties in implementing this issue in initial teacher education.

Based on this idea, we suggest reconsidering the number of years of training and the number of practical hours spent in a school. More training and more time in the classroom through curricular placements are needed so that students leave better prepared. "I think teacher training should be much richer than the three or four years that are planned. We need them to spend more time in a school and really see what daily work is like, not just a few months" (P8).

In short, all teachers should not stagnate and should innovate, taking into account the current educational reality. "I think that we educators have to be more innovative and

braver and break with conventional education and be able to attend to the needs of each child in a more individualised way" (P13).

Therefore, the question arises as to why some countries do and Spain does not. This change in teacher training and innovation must take place, we cannot continue to be anchored in traditional classes. We are seeing that the use of games and other tools are giving positive results, why do we continue with the same idea of not changing? That change must be a fact" (P12).

Desirable elements in an initial training aimed at preparing in play methodology (ELFI)

This topic was addressed 28 times by the participants. The aim is to find out what would be the most important elements within the initial training to implement the use of game strategies. At the level of competences, objectives, contents, methodology, agents, etc. The results show desirable elements around 4 aspects. The main one is the change of methodology in university classrooms. A more participatory methodology so that students can put into practice what they have learnt.

"I think it should be a slightly more participatory methodology, because if the students have to learn how to do it, then they have to make and invent and they have to create and make the game, and the games that have already been made, how do they use it in a didactic way? (P10).

A methodology that involves university teachers and students. A renewal of didactics is necessary. These teachers should not only focus on research as an important part of their profession, "but also on teaching as a fundamental part in addition to research" (P6). These are two parts united with the same value.

In addition to methodology as the main point for improvement, the contents taught should be focused on such a way that they connect with the reality of the classroom and the school.

The interviewees consider that the main thing that needs to change for teachers in the faculty is the methodology, and also the contents they have to teach. "The curriculum is established by law" (P11), but it would be useful for everyone to try to see what can be changed and how. "The most important thing is that if you change the methodology, that's where the change really starts." (P11)

In addition, the type of training that university teachers have is discussed. They must know the educational reality of the classroom in order to be able to train their students. "At the level of methodology is the most essential thing, and then also at the level of teacher training, because they are teachers who may have a lot of research, but they lack a little knowledge about what happens in the classroom" (P14).

In order for initial teacher training to be adequate in terms of games as a didactic resource, it is necessary for there to be a connection with the educational reality throughout their training period and not only at the end of it. Through this proposal, students can check the suitability of its implementation and learn about the different ways and strategies for its correct development. In short, they comment that the most important thing is to try to get the students to go and get in touch with that reality, not

just that the teachers have been and worked in a school, but to try to make communication more fluid and practical. "Not only for the 3rd and 4th year of the university degree" (P4).

Principles, characteristics, and conditions that should be met (COND)

In order to complete the previously mentioned results and keeping in mind the need to obtain relevant and pragmatic information for the improvement of initial training on the game as a teaching resource, these results are presented.

Within the general objective of this work, we propose to know what type of conditions it would be advisable to adopt in initial training to improve the gaps or deficits present in addressing the central theme of this work. This is a question of interest to our subjects, since they make numerous references to it (40 times). The results obtained show two conditions that must be met for the implementation of the game as a teaching resource and the improvement of initial training: materials and spaces, and training.

The materials and spaces necessary to implement the game as a teaching resource are essential for its use. The huge number of students makes its use difficult. "Classrooms. Spaces are fundamental. Their distribution is the most important thing" (P9).

At the training level, it is mentioned what could be done to improve it, taking into account the characteristics of the students in the classroom. For all this to happen, teachers must prepare for it. That is why, through games as a teaching resource, what has been learned can be put into practice. The improvement of the students that "can be had in the future as our son's teacher" (P14). Furthermore, they comment that what is better than knowing how to prepare a good teacher, that is, if they are 4 years old, not only a year of practice is the best, but from the beginning the practices and examples are imposed. They are given "so that they see the educational reality and not only when they get here, they see it and are scared" (P16).

However, we must be aware that initial training is the beginning, since it is basic training, and that when the new teacher leaves, they must continue preparing to be able to face a classroom. "We have to be aware that university is not only basic training and that we have to continue learning" (P15). This basic training should provide some tools that "help us see that when we leave the university and enter a classroom with 25 students with different characteristics and with different needs and with different learning rates, we know what we should do to help them learn." (P5). Therefore, they recognize the importance of using innovative processes so that they have the possibility of changing the way of teaching and the way of learning of students, achieving great benefits for students, achieving greater motivation and that the knowledge they are produced is meaningful and lasting.

DISCUSSION

Complementing the theoretical background which endorses the relevance of initial teacher education (ESU, 2010; Finkelstein, 2016), and how these challenges are incorporated into the training of professionals, specifically teachers (Cano et al., 2019), in our results collected, one of the most relevant findings of this work is that initial teacher training is not the only way of training, but that beliefs that are not agreed upon

by the environment are of great importance, especially as it relates to teaching practice. Therefore, it is essential that university teachers not only focus on the acquisition of theoretical content, but that they are able to offer a broader and more global perspective that shows other aspects that it is important for future teachers to know about teaching (Morales-Ocaña & Higueras-Rodríguez, 2017; Muntaner-Guasp et al., 2022).

We therefore need open training through reflection and debate on educational practice in a training itinerary that includes proximity to innovative learning experiences, to singular and problematic case studies, to small-scale research on specific realities (García, Ferrer & de la Herrán, 2015). And this, as part of continuous and lifelong learning, often happens as part of professional development and improving effectiveness at work. In our work, initiatives such as the Teacher Centres (CEP) that exist in Spain, where innovation and growth are encouraged in the workplace, which can have a positive impact on the productivity and effectiveness of organisations, have been mostly positively evaluated. It is important that public employees take advantage of these opportunities to improve their professional skills and competencies.

This is why one of the novelties of this study becomes relevant, which places the use of active methodologies in the learning of our students as an aspect that guarantees an experiential education based on experience and practice, achieving a quality education for all. From theory, it is said that training in this type of tools is acquired from the practice and reality of the classroom, as well as from lifelong learning away from university education (Muñíz, García & Fernández-Río, 2017), although, as we have seen, our participants value the training received through practical, self-directed and lifelong learning experiences as more relevant, relevant and useful.

This is to be understood within the framework of the European Higher Education Area (EHEA) which also supports the feelings and positions of our participating teachers on the nature of learning during initial training, tending towards a more practical rather than theoretical character, and which are essential for the development of educational work. This is achieved - according to the EHEA's commitment - by putting the focus especially on the development of general competences, personal qualities so that individuals continue learning throughout their lives, are able to teach and communicate knowledge and can apply what they have learned in this changing society (Cabero, 2006; ESU, 2010).

In relation to theory, it is commonly accepted that teachers, according to Barron and Darling-Hammond (2008), must redesign the way schools and universities work, and define which educational objectives should prevail. A change is needed in the educational approach, in the design of practices and in the development of learning skills rather than content. Our participants are proactive and active in this respect. They are clear about their needs and preferences for their teaching practice and have expressed this in our results. To this end, the creation of a school-university-content link is proposed, as well as the promotion of lifelong learning "learning to learn" (Guo et al., 2020), which is in line with the proposals that emerge from our work. The University can design and develop its own educational project taking into account the three aspects that ESU (2010) and EsteveMon and Gisbert (2011) comment on in their research: the student is the centre of any educational process; the use of an active teaching

methodology helps to train professionals; and that learning is permanent, and it is necessary to monitor this process, also permanent. Therefore, evaluation will be a key factor in demonstrating that the proposed training objectives have been achieved.

CONCLUSIONS

The main objective of this research focuses on knowing the assessment of practicing teachers on initial training in games as a teaching resource and its impact on the teaching-learning process.

The findings offer us useful information and knowledge about the state of the art and help us understand the reality of this phenomenon as well as predict the elements and strategies for its improvement.

Thus, we find that practicing teachers place initial training as a key stage to obtain knowledge about the game as a teaching resource. However, the majority have poor and scarce training trajectories on the subject, based on theoretical knowledge typical of the university stage or through trial and error implemented during their exercise, derived from their training gaps. This means that their assessment of the initial training received regarding the game is not adequate and that they find their training during the exercise to be complicated.

However, to respond to the objective of this work in its entirety, the results offer us a horizon on which to address the change of this issue, hence among the suggestions to improve this training period, and specifically, the knowledge about the game as a teaching strategy focus on the teacher as a key piece for change. This element becomes relevant by once again standing out among the desirable elements for improvement, specifically it points to the need for innovative teachers, who implement more innovative methodologies connected to the educational reality they will face.

In view of the above, we can affirm that the objectives allow us to describe in detail the details of the topic raised and contribute knowledge to studies on the game as a teaching resource and its use by teachers, as well as their initial teacher training.

In line with this question, it is worth exposing the practical implications of this work. Firstly, for university managers, by providing them with key evidence and guidance to implement changes and improvements in their training offer for future teachers. On the other hand, it highlights not only the relevance of producing changes in the methodological strategies of teachers, but also in other aspects such as study plans in terms of content, continuous approach to professional educational practice, etc. In this way, this work becomes an extremely useful and pragmatic document that only requires the will to put it into practice.

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Appendix 1

Semi-structured questions from the interview script

1.   Training received
1.1 Training modalities: initial/permanent;
1.2 Contents of training programs;
1.3 Impact on teaching; Assessment;
1.4 Suggestions for improvement, etc.
2.   Importance of the game in the initial training
2.1 On a personal level, what has it given you
2.2 Reasons, etc.
3.   Presence of the game in the initial training of primary school teachers
3.1 in curricula;
3.2 contents;
3.3 subjects;
3.4 courses;
3.5 methodology, etc.
4.   Overall assessment of the initial training received with respect to the use of play strategies.
4.1 Aspects to highlight
4.2 Aspects to improve
5.   Suggestions for improving initial teacher training.
6.   Desirable elements in an initial training aimed at preparing in-game strategies
6.1 Competences;
6.2 objectives;
6.3 contents;
 activities;
6.4 methodology;
6.5 agents;
6.6 times;
6.7 spaces;
6.8 evaluation, etc.).
7.   Principles, characteristics and conditions that should be met

Source: own elaboration

Appendix 2

Code System

Category and Code	Definition
Pathways of training received. VFI	References to training received (modalities, contents, impact on teaching, assessment and suggestions for improvement)
Importance. IMP	On a personal level, degree of importance of this resource within the teaching-learning process
Presence of the game in initial training. PREFI	If the game as a didactic resource is included in the initial training of teachers. If so, in what contents, subjects, etc..
Overall assessment of the initial training received about the use of play strategies. VALGLO	Level of satisfaction with the initial training received in the use of play strategies
Suggestions for improving initial training. SUGFI	Advice and suggestions for improvement in initial teacher training. Aspects to improve
Desirable elements in an initial training aimed at preparing in play strategies. ELFI	To find out what would be the most important elements within initial training to implement the use of play strategies. At the level of competences, objectives, contents, methodology, agents, etc.
Desirable conditions. COND	Necessary and indispensable aspects without which the game could not be applied in the teaching-learning process

Source: own elaboration