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SECTION: PAPERS

ACTIVE METHODOLOGIES IN HIGHER EDUCATION: TEACHER PERCEPTION IN A PRIVATE FEDERAL DISTRICT INSTITUTION[1]

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ABSTRACT

This is a study about the perceptions of professors about active methodologies in higher education. The research aimed to map the perception of lecturers of a private college about the use of these methodologies. The research was quantitative exploratory, characterized as a case study, and comprised of the use of a questionnaire. The sample consists of 57 university lecturers from a private institution of higher education located in Brasilia. The results show that 96% of the participants use the active methodologies in their teaching practice, the case study method and team-based learning were the most used by the group. It is clear in the perception of the participants, the most developed characteristics in the students are interpersonal relationships, initiative, and increased criticality. The awareness of professors regarding the importance of using active methodologies was verified. This research also pointed out the importance of HEIs (Higher Education Institutions) offering active methodologies courses in their spaces, without giving a critical and reflective view of how the methodologies have been applied.

Keywords: Active methodologies. Higher education. Teaching.

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METODOLOGÍAS ACTIVAS EN LA ENSEÑANZA SUPERIOR: PERCEPCIÓN DE DOCENTES DE UNA INSTITUCIÓN PRIVADA DEL DISTRITO FEDERAL

RESUMEN

Se trata de un estudio sobre percepción de docentes acerca de las metodologías activas en la enseñanza superior. La investigación objetivó mapear la percepción de docentes de una facultad particular sobre la utilización de estas metodologías. La investigación fue exploratoria cuantitativa, caracterizada como estudio de caso, y comprendió el uso de cuestionario. La muestra es compuesta por 57 docentes de una institución privada de enseñanza superior ubicada en Brasilia. Los resultados muestran que el 96% de los participantes utilizan las metodologías activas en su práctica docente, siendo el método del estudio de caso y el *team-based learning* (aprendizaje basada en equipo) las más utilizadas por el grupo. Se evidencia que en la percepción de los participantes, las características más desarrolladas en los estudiantes son las relaciones interpersonales, la iniciativa y el aumento de la criticidad. Se constató la conciencia de los profesores en relación a la importancia de la utilización de las metodologías activas. Esta investigación apuntó además la importancia de las IES a ofrecer cursos de metodologías activas en sus espacios, sin prescindir de una visión crítica y reflexiva de cómo las metodologías han sido aplicadas.

Palabras clave: Metodologías activas. Enseñanza superior. Enseñanza.

METODOLOGIAS ATIVAS NO ENSINO SUPERIOR: PERCEPÇÃO DE DOCENTES EM UMA INSTITUIÇÃO PRIVADA DO DISTRITO FEDERAL

RESUMO

Trata-se de um estudo sobre percepção de docentes acerca das metodologias ativas no ensino superior. A pesquisa objetivou mapear a percepção de professores de uma faculdade particular sobre a utilização dessas metodologias. A pesquisa foi exploratória quantitativa, caracterizada como estudo de caso, e compreendeu o uso de questionário. A amostra é composta por 57 docentes de uma instituição privada de ensino superior localizada em Brasília. Os resultados mostram que 96% dos participantes utilizam as metodologias ativas em sua prática docente, sendo o método do estudo de caso e o *team-based learning* (aprendizagem baseada em equipes) as mais utilizadas pelo grupo. Evidencia-se que na percepção dos participantes, as características mais desenvolvidas nos estudantes são as relações interpessoais, a iniciativa e o aumento da criticidade. Constatou-se a consciência dos professores em relação à importância da utilização das metodologias ativas. Essa pesquisa apontou ainda a importância das IES ofertarem cursos de metodologias ativas em seus espaços, sem dispensar uma visão crítica e reflexiva de como as metodologias têm sido aplicadas.

Palavras-chaves: Metodologias ativas. Ensino superior. Docência.

INTRODUCTION

Higher education has undergone a formidable expansion in recent decades. According to Neves (2007) the recognition of the need to raise the educational level of the populations, to search for a social transformation, comes with expectations that the models of education, still in a cast and rigid, will be rethought. This involves breaking paradigms, which is not a simple task.

The point of view of the same author, there are major challenges in Brazil in higher education, such as the urgency of expanding access to different university courses, the provision of quality assurance courses, investment in continuing professor education, the incentive to scientific research, and the possibilities of employability of the graduates. These challenges are coupled with a scenario of historical and cultural change in which the reach of knowledge is not restricted to the higher public, but is available to all through various technological approaches.

This accessibility to various knowledge arranged the lecturer and the student at levels very close to knowledge. In addition to the similarities between the teaching subject and the learning subject, such as age, life experience, and socioeconomic conditions, knowledge has become available to both, although not necessarily reaching knowledge is synonymous with a critical and transformative learning.

Borges and Alencar (2014, p. 127) point out that “higher education is challenging because it needs to be invented or reinvented daily”. Lecturers are required to rethink their practice and replace traditional forms of teaching with different methodologies, especially the characteristics of the adult student. Given this, we realize the importance of continuing education for professors aimed at working on perceptions about the use of different teaching methodologies.

This article emphasizes the importance of the teacher in the mediation of scientific knowledge through the use of active methodologies from the results of a research with professors. To guide the reader, the following presents theoretical aspects about the development and learning of adults, the different active methodologies, the methodology and the research results.

ADULT SUBJECT DEVELOPMENT AND LEARNING

There are numerous psychological theories applied to education that aim to explain human learning. Most of them use theories aimed at childhood and adolescence to understand adult learning, given the lack of specific studies on learning at this stage of development.

Around the 1950s and 1960s studiesaddressing adult learning emerged. Andragogy (from the Greek: *andros* = adult and *gogos* = educating) is understood as "the art and science of helping adults to learn". A theoretical approach specifically aimed at clarifying the characteristics of adult learning. Knowles et al. (2009), although not the pioneers in Andragogy studies, organized the andragogical model based on various conjectures that differ from the pedagogical model, as described below:

1. The Need to know: Adults need to know the use of the knowledge they will learn before they even learn it. The authors stress the need for students to be aware of the importance of what they are taught, so that it is already a strategy, followed by methodologies that allow students to experience real or close to their reality.
2. The self-concept of the learner: The adult is characterized by the responsibility of their actions and choices, and in learning also feels the need for recognition of their skills and competences. When not seen in this sense, they tend to regress to a childish position in the face of knowledge, which can cause great difficulties in the professor-student relationship.
3. The role of adult experiences: Experience is what characterizes the adult student. “For many types of learning, the richest resources are in the adult learners themselves” (KNOWLES et al., 2009, p. 74). Thus, the emphasis of adult education is on experiential techniques - techniques that use the experience of the learners as discussions. Knowles shows again to experiential techniques as a way to value the student.
4. Readiness to learn: Some experiences brought about by human development are more propelling for the opening of some learning, such as student financial independence and readiness to understand financial education among others. Therefore, “there are ways to induce readiness through exposure to superior performance models, career counseling, simulation exercises, and other techniques” (KNOWLES et al., 2009, p. 74).
5. Learning Guidance: Adult learning is life-centered, problem-solving, meaning teaching should make sense to the student.
6. Motivation: Students are driven by external aspects such as salary improvements, employability, but intrinsic motivations are paramount for learning.

These characteristics proposed by Andragogy are correlated with studies from the 1970s, which understand adult learning by the potential to interact with aspects such as inconsistency, contradiction, imperfection, and tolerance. Studies pointed out by Papalia and Feldman (2013) name post-formal adult thinking, as opposed to studies of Piaget, to explain the way of thinking that is beyond cognitive aspects, it establishes relationships with intuition and emotion, and that makes the use of personal experiences in ambiguous situations.

> An important feature of post-formal thinking is its integrative nature. Mature adults integrate logic with intuition and emotion; facts with conflicting ideas; and new information with what they already have. They interpret what they

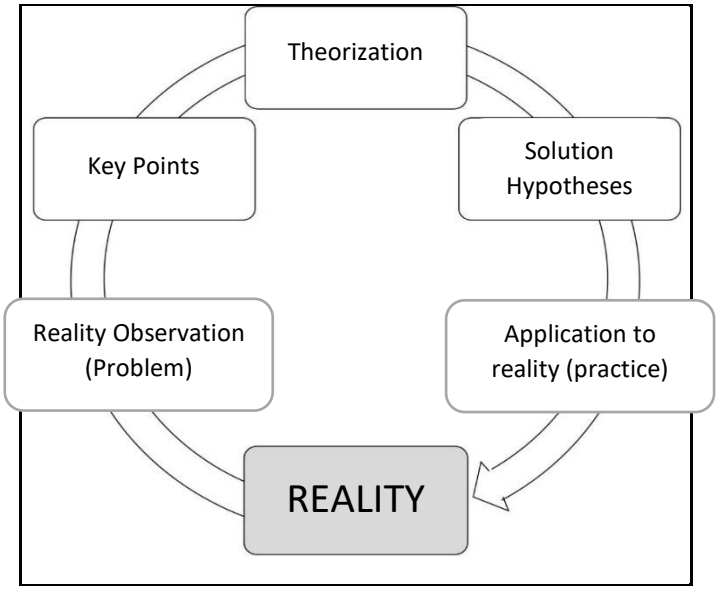
> read, see or hear in terms of what it means to them. Instead of accepting something for its visible result, they filter it through their respective life experiences and previous learning (PAPALIA; FELDMAN, 2013, p. 534).

This organization of way of thinking changes according to the development and aging of the person and the interactions performed in the world, especially in contact with different activities that arouse cognitive aspects. It is noteworthy that according to the studies gathered by Papalia and Feldman (2013) not all adults will develop this way of thinking, but those who develop are usually in higher education. This information highlights the commitment that scientific knowledge has on the life of the adult subject and changes their cognitive, subjective and emotional structures.

The information presented are fundamental to a dialogue about teaching methodologies used with adults. As mentioned, a contemporary education requires a teaching instruction for students or an active position in their learning that considers their life experience. Thus, a mediation of scientific knowledge cannot renounce methods in which teaching is marked by meaningful learning for professionals who are more critical and prepared in their fields, as is a stake on active methodologies.

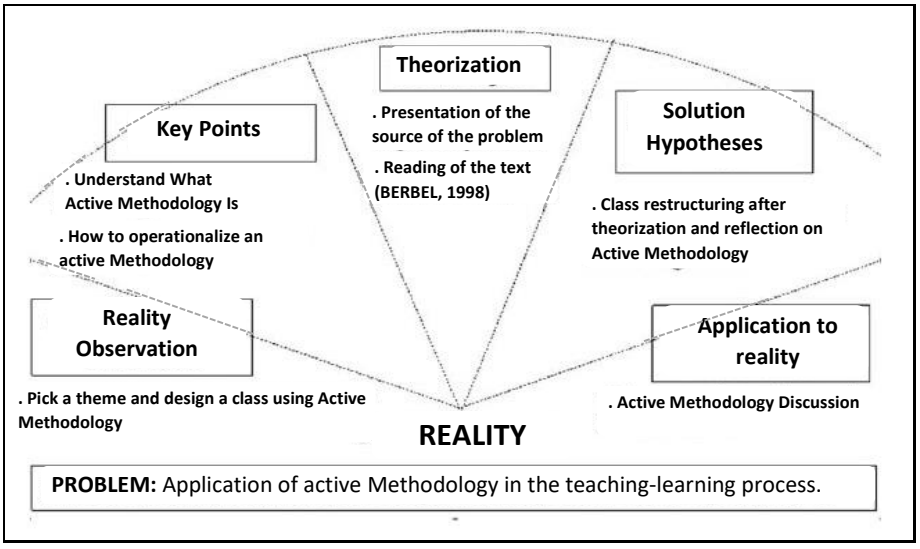
ACTIVE METHODOLOGIES

The active methodologies have as an assumption for the contextualization, or approach to the theory to the reality of the student. It is necessary in this conception that there is an identification, allowing an interaction and intervention of the student as protagonist of the learning process. Bordenave and Pereira (2017, p. 10) say that “a person only knows something well when he / she transforms it, becoming also in the process”. Using the Maguerez Arch it is possible to visualize how a Frenchman in the 1970s thought adult learning. As shown in Picture 1, five elements are needed: observe reality to identify the problem; identify key points of the challenge; theorizing, combining the syncretic view with the analytical; hypothesis creation; and application to the real problem.



Picture 1 – Problematizing education
Source: adapted from Bordenave and Pereira (2017, p. 10).

The observation of reality is important for teaching to make sense, in which the student can visualize the problem close to their experience in life. Key points need to be established so that there is a direction as to what should be resolved, i.e. it is a specification without losing generalization. After reaching this point, theorize and discuss possible hypotheses to solve the problem, and finally apply them to reality. If we carry the use of the Maguerez Arch for the application of active methodologies, we would have the following situation:



Picture 2 – Charles Maguerez's Arc of Problematization Planning
Source: Prado et al. (2012, p. 176).

The application proposed by Prado et al. (2012) establishes that in the first stage a theme and an active methodology are defined. Reality observation is fundamental for choosing the best

methodology to be applied to. The next step, after observation, defines how the active methodology will be operationalized and its appropriation to be used.

Throughout the theorizing period, questions arise, when the theoretical basis of the observed situation occurs. Alignment between participants is necessary to enable uniformity of knowledge. The next step is when the hypotheses, the transformation, the pointing of the solutions to the identified problems arise based on their experiences, their observation and the interaction with the relevant theory. Finally, the application happens and it is possible to verify if the solution is the best option or if there are alternative solutions.

This process clearly synthesizes the application of active methodologies for adult learning. As explained, the choice of methodology occurs from the observation of reality and this explains why we address to methodologies, in the plural, to highlight the wide variety of active methodologies in higher education, which can be used according to the objective and reality of the students.

Marin et al. (2010) point out as main positive sides of the use of active methodologies: a) approximation of reality; b) integration between theory and practice; c) preparation for group work; and d) student as responsible for their learning. Bollela et al. (2014) highlight the importance of active methodologies, pointing them out as a student-centered process, where problem solving and learning experience and awareness of their process (metacognition) are privileged.

Students who experience this method tend to gain more confidence in their decisions and knowledge application in practical situations, improve relationships with classmates, learn how to express themselves orally and in writing, acquire a taste for problem solving, and experience situations that require make decisions on their own, reinforcing autonomy in thinking and acting (RIBEIRO, 2005).

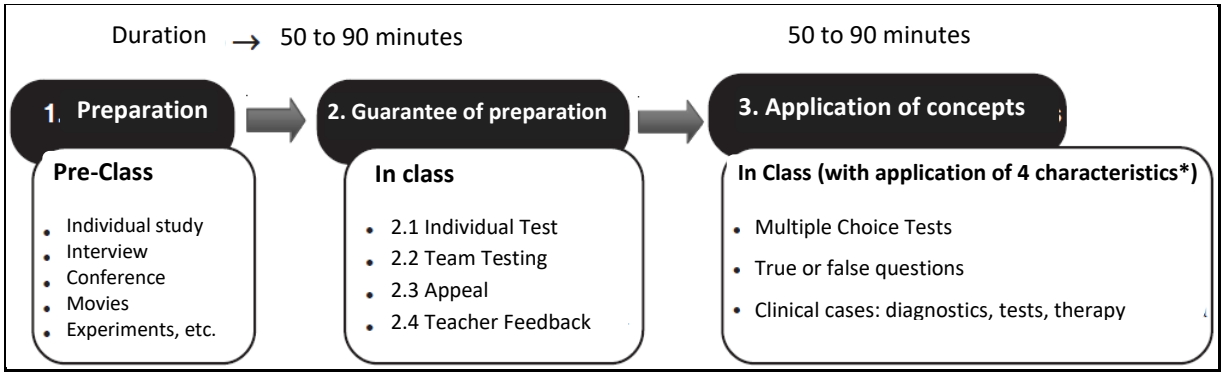
Due to many initiatives of educational institutions, some methodologies are more used than others, have been emerging or resurging according to the course in question, and the epistemological basis that corresponds to scientific and intellectual work. Among the main methodologies used at this level of education, especially in the business area, scope of this work, we can mention the case study method, Harvard methodology widely spread in Brazil. And in recent years, a growing body of work can be assessed through Problem-Based Learning (PBL), Team-Based Learning (TBL), and Peer Instruction, mentioned below.

The case method or the case methodology has been shown, from the perspective of Pessoa (2004), as a relevant approach to solve the dilemmas of teaching work, surrounded by scenarios that lead to uneasiness. According to the author, the use of cases serves as a development strategy of “learning to think as a teacher”. From the students' point of view,

although these cases often have a solution, as they are based on existing events, the students take the lead and with the exposed situation seek solutions to the problem posed. For Gomes (2012), the case study method maximizes learning by increasing the following skills: analytical; decision making; practice in using management tools; oral and written communication; time management; interpersonal relationship and creativity development.

The problem-based learning methodology has its theoretical framework based on Bruner and Dewey, and aims to motivate students, based on the use of real-life problems to stimulate the development of concepts, procedures and attitudes of the student (BOROCHOVICIU; TORTELLA , 2014). The problem investigation process should consider the following steps: 1. Presenting a problem; 2. Identification of the problem; 3. Suggested solution; 4. Experimentation; 5. Solution. For Tiballi (2003), this process of being challenged by a real problem drives the autonomous learning of students.

Another methodology to be synthesized is team-based learning - TBL, created for working with larger numbers of students, which are operationally subdivided into small groups for 3-step development (PICTURE 3): individual remediation; guarantee of preparation and application of concepts, in which the first occurs an individual preparation and in the second occurs the application of an individual test and a group test and enables the appeal and feedback by the teacher; In the last step, students must solve a significant problem, which is the same for everyone, with specific answer and reported simultaneously (BOLLELA et al., 2014).

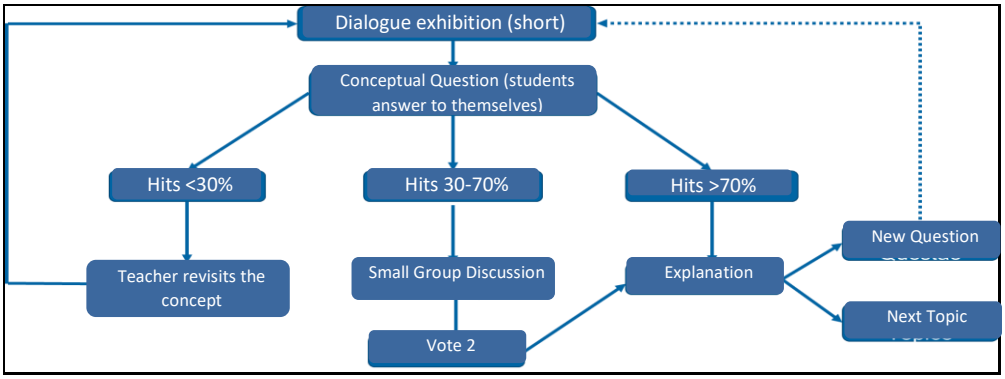


Picture 3 – TBL Steps
Source: Bolella *et al.*, 2014.

Larry Michaelsen, the creator of this methodology, works learning through relationships, so groups must be fixed and tied several times. The social commitment of the individual with the group is the motivator of preparation, there is a responsibility for the individual work and consequently of the group, thus promoting team learning (MICHAELSEN; KNIGHT; FINK, 2004).

The *peer instruction* methodology created by Mazur is understood by the flowchart of Picture 4, where a concept is presented and then a conceptual question is asked to the students. After they answer, the hit rate is verified: if it is over 70%, the professor explains the question and

moves on to the next one; if it is between 35% and 70%, students should discuss the issue with their classmates, take a new vote, and explain as previously mentioned; if the hits are less than 30%, the concept is presented again and a new question is asked about the same concept (MAZUR, 2015).



Picture 4 –*peer instruction Florchart*
Source: According to MAZUR, 2015.

Other methodologies could be pointed out in higher education, but because this is not the aim of the research, Table 1 shows the main features of the active methodologies summarized by the authors of this article.

Metodologia	Definição
PBL/ABP	*Problem-based learning*. Problem-based learning. "A student-centered, research-centered learning method strategy for cooperative individual and group knowledge production that uses critical analysis techniques to understand and solve problems significantly and in continuous interaction with the tutor teacher "(SOUZA; DOURADO, 2015, p. 184-185).
TBL/ABE	*Team-based learning*. Team-based learning. "TBL is an educational strategy for large groups that, through teacher coordination, enables interaction and collaboration at work in small (student-centered) groups" (BOLELLA et al., 2014, p. 299).
Peer Instruction	*Peer Instruction*. "Peer instruction is a pedagogical approach that emphasizes the basics concepts, with students committing to one conception, providing an environment for discussion with peers and professors, where attention is drawn to misconceptions. Technology alone is not pedagogy "(LASRY, 2008, p. 243).
Case Study Method	"Cases are stories or narratives contextualized or situated in a time and space that describe the real, complex and multidimensional situations that characterize the real experience and thus represent knowledge in use and reveal how the main character or even the writer thinks to measure that identifies and solves problems "(MENDES, 2001, p.189 apud MENDES, 2004).
Tutorial Groups	"Group tutoring means one in which there is a tutor, who is a trained professional, adequately prepared for this task and who does not necessarily occupy a prominent career position and apprentices with a similar professional profile. Small group tutoring usually involves up to eight learners, and group tutoring involves more people. It is a model widely used in graduations and is intended to have better results when those involved already know each other and the group becomes cohesive, facilitating to overcome barriers such as the organization of meetings and the confidentiality of the group "(CHAVES et al. , 2014, p. 534).
PLE	*Project-led education*. Learning based on Interdisciplinary Projects. "This methodology has as its main characteristics the centrality of student learning, teamwork, the development of initiative and creativity, the development of communication skills and critical thinking and, finally, the articulation between the contents in interdisciplinary perspective" (FERNANDES; FLORES, 2011, p. 307).
ABEP	The ABEP or ICBL - *Investigative Case-Based Learning* "is structured on the principles that research: it provides meaningful contexts for study; initiates exploration-oriented learning; requires the development of skills needed for collaboration and problem solving; requires multidisciplinary approaches; serves as scaffolding for student-structured investigations; involves students for collaboration in proposing and solving problems and for persuasive argumentation; and provides flexible options to direct the learning of concepts "(MOREIRA; RIBEIRO, 2016, p. 100).

Chart 1 – Core Traces of Active Methodologies
Source: elaborated by the authors.

METHODOLOGY

The research is exploratory, with a quantitative approach, characterized as a case study. According to Prodanov and Freitas (2013), exploratory research seeks to approach the problem, clarifying it, or even aims to open perspectives for the elaboration of hypotheses. Quantitative research, in turn, "allows the measurement of opinions, reactions, habits, and attitudes in a universe through a sample that represents it statistically"; they are traits of quantitative research: enumerate or measure events; examine relationships between variables; employ statistical instruments for data analysis; confirm hypothesis; analyze the possibility of generalization of results; use structured questionnaires (TERENCE; FILHO, 2006, p. 3).

Yin (2015) reports circumstances where case study is indicated: when the case aims to test an existing hypothesis or theory; when the case is unique or extreme; when the situation or phenomenon is inaccessible to scientific inquiry; when the study is still in exploratory stages or as pilot studies. Gil (2011, p. 57-58) states that the case study is characterized by “a thorough and exhaustive study of one or a few objects, in order to allow their broad and detailed knowledge”.

SHORT DESCRIPTION OF THE RESEARCH FIELD

The researched institution is a private college located in the Federal District of Brazil. It is an educational group founded in the 1980s and the first higher education unit was inaugurated in 2000 and in 2016 was transformed into a University Center. The group is made up of seven units, one university center, six colleges, and one distance learning center.

The study was conducted with professors of the courses linked to the Business School, which covers eight courses, four bachelor degrees (Administration, Accounting, Executive Secretariat and Advertising and Advertising), and four technologists (Human Resources Management, Marketing, Public Management, and Logistics).

Since 2013, the institution has been developing with the lecturing staff a training program focused on training in Active Teaching Methods. The activities, mainly developed in the pedagogical weeks have allowed presenting methods and allowed the experimentation of these tools by the professors. They have since been provoked to work active methods in their teaching practice.

The population of this study is characterized as accessibility or convenience sampling (GIL, 2011). At the time of data collection, the school staff comprised one hundred and fourteen lecturers. Fifty-seven teachers participated in the study, which corresponds to a sample of 50% of the population.

COLLECTION AND ANALYSIS PROCEDURES

The data collection tool used was the questionnaire. According to Gerhardt and Silveira (2009), questionnaires are formed by an ordered set of questions that aim to raise opinions, beliefs, feelings, interests, expectations, and situations experienced. The questionnaire consisted of 10 closed questions: 2 questions to collect demographic (age) and socio-graphic (teaching time in higher education), followed by 8 questions that focused on meeting the objective of the study.

The instrument was applied via the internet through Google Docs®. According to Faleiros *et al*. (2016), online surveys are increasing because they enable the accessibility of participants and the reduction of research costs. The awareness was given by email, in which teachers were invited to participate in the research voluntarily. All ethical precepts were respected, to guarantee the professors the voluntary participation, with confidentiality of the data, as well as the grouped treatment of these materials. Data were processed using Excel® software for descriptive analysis.

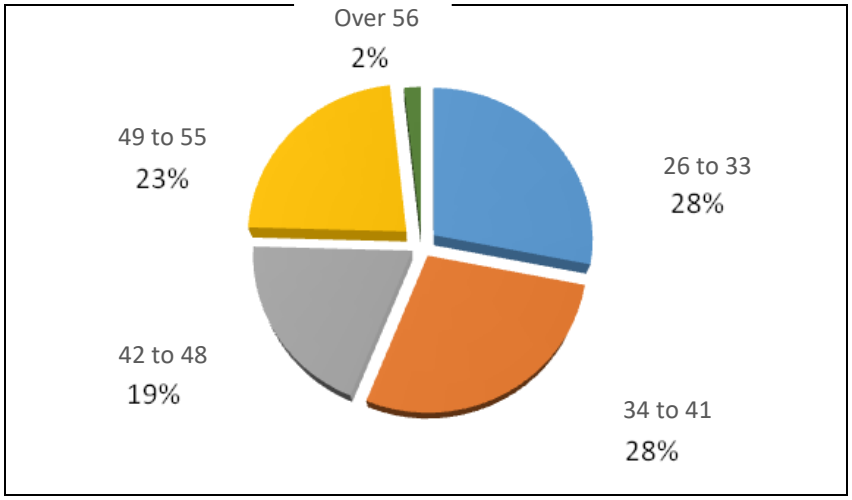
RESULTS AND DISCUSSION

To contextualize the reader, some information about the organization in which the study was conducted, and then present the main results. Since 2013, the institution has been developing, within the framework of the pedagogical week that precedes each academic period, a continuous teaching training program, whose central theme is focused on active methodologies. Since then, lecturers have been "presented" each semester to a methodology.

For that matter, teachers who have been in the institution for a longer time, have had the opportunity to know traces and characteristics of up to 9 different methods. The activities of the pedagogical week include the participation in a lecture with reference professionals on the subject and the participation in workshops that aim to experiment with the proposed method for the semester. We understand that this continuing education program is healthy, and meets the highlights of Veiga (2006, p. 3):

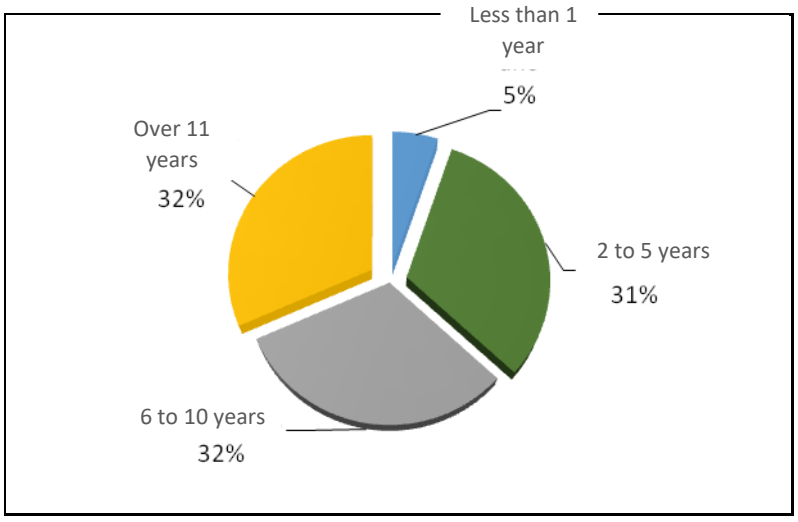
> Training university professors implies understanding the importance of the role of teaching, providing a scientific-pedagogical depth that enables them to face fundamental issues of the university as a social institution, a social practice that implies the ideas of formation, reflection, criticism.

Regarding the profile of respondents, a balance is noted regarding the age group. 56% of professors are between 26 and 41 years old, demonstrating a young profile, especially for higher education lecturers, where the level of education is naturally higher. Graph 1 visually demonstrates this profile.



Graph 1 – Age range of participants
Source: research data, 2017.

Referring to lecturing time, it is possible to verify that this is a researched group, experienced in teaching in higher education, as shown in Graph 2. 32% of the sample has experience between 6 and 10 years old. , and another 32% with more than 11 years of experience, that is, more than 60% of participants have been working in teaching for over 5 years.

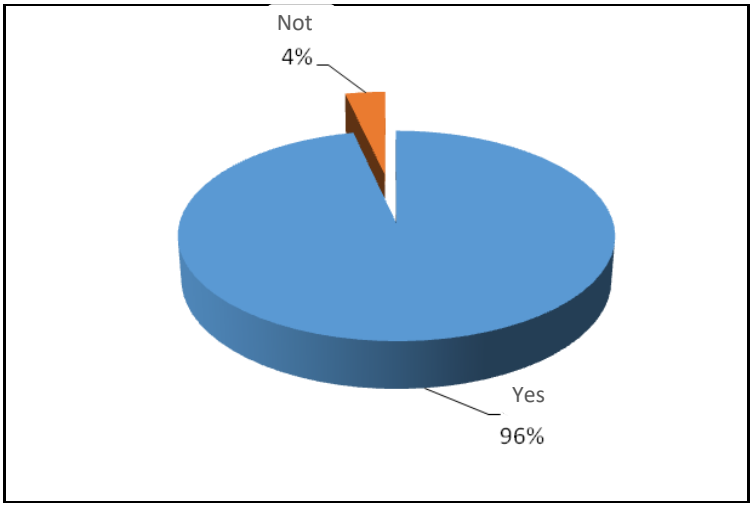


Graph 2 – Teaching time in higher education
Source: research data, 2017.

As for the use of active methodologies in higher education, Graph 3 shows that there is a massive use by professors of the participating group (96%). This data deserves attention. As illustrated in Graph 2, we realize that the group is experienced in teaching, which allows living the difficulties and facilitates the search for new methodologies.

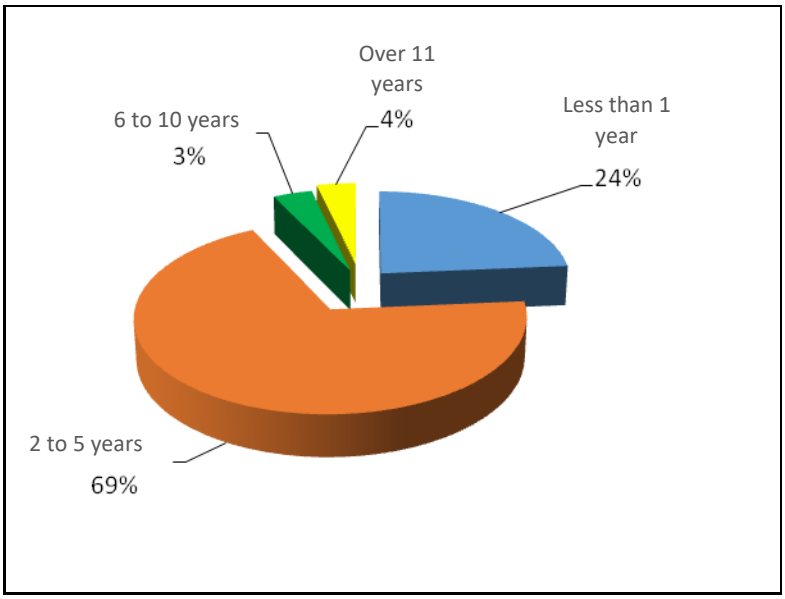
Veiga (2006) highlights that university teaching needs to be linked to innovation and this happens, among other things, when teaching practice breaks with the conservative way of teaching, learning, researching and evaluating, and when exploring new methodological

theoretical alternatives. Thus, what is seen in this result is what seems to be an effort of professors to innovate in their practice through the use of methods that go beyond the lecture and that improve the quality of their work.



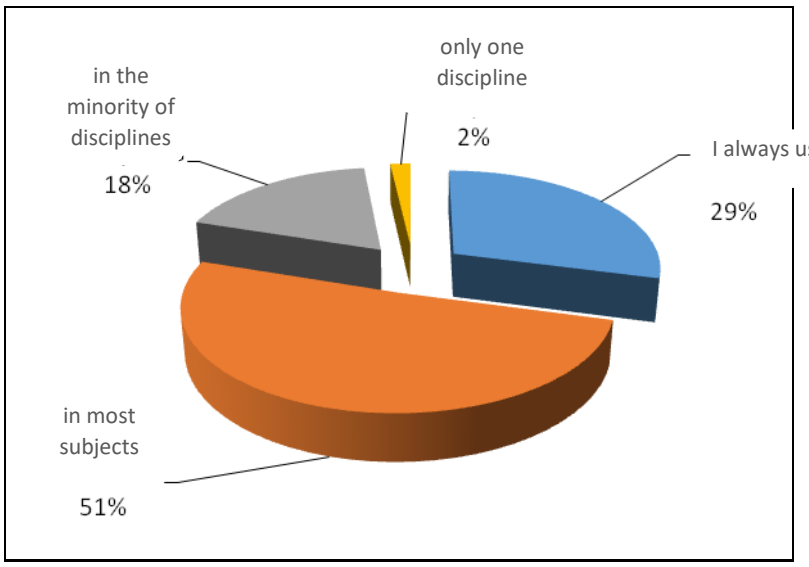
Graph 3 – Use of active methodologies in higher education in teaching practice
Source: research data, 2017.

It was also sought to map how long ago the teacher uses the active methodologies in their teaching practice in higher education and if this use occurs in all disciplines in which it operates. It can be seen in Graph 4, we see that 69% of participants have been using active methods between 2 and 5 years, matching with the time of implementation of the training program by HEI.



Graph 4 – Time spent using active methodologies in teaching practice in higher education
Source: research data, 2017.

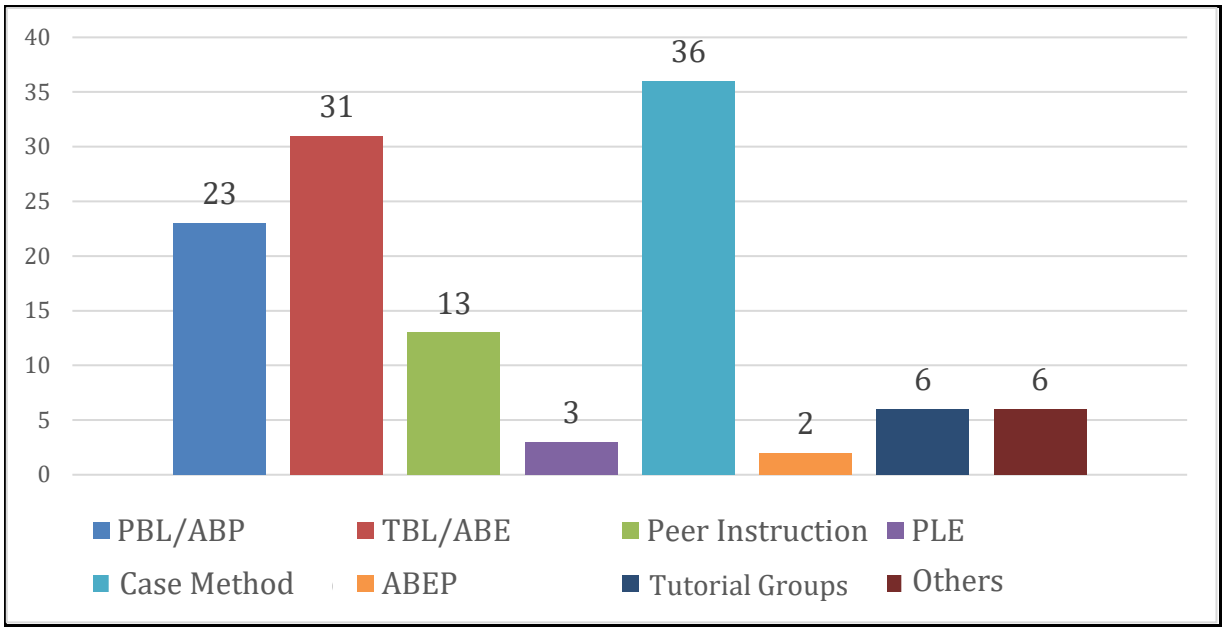
Graph 5 shows how many professors use active methodologies in higher education in the subjects they teach, showing that almost 80% of the sample uses in most or all subjects. Thus, it is verified that the culture of the use of methodologies occurs and that a significant portion already establishes them in their teaching practice.



Graph 5 – Level of utilization of active methodologies in higher education subjects
Source: research data, 2017.

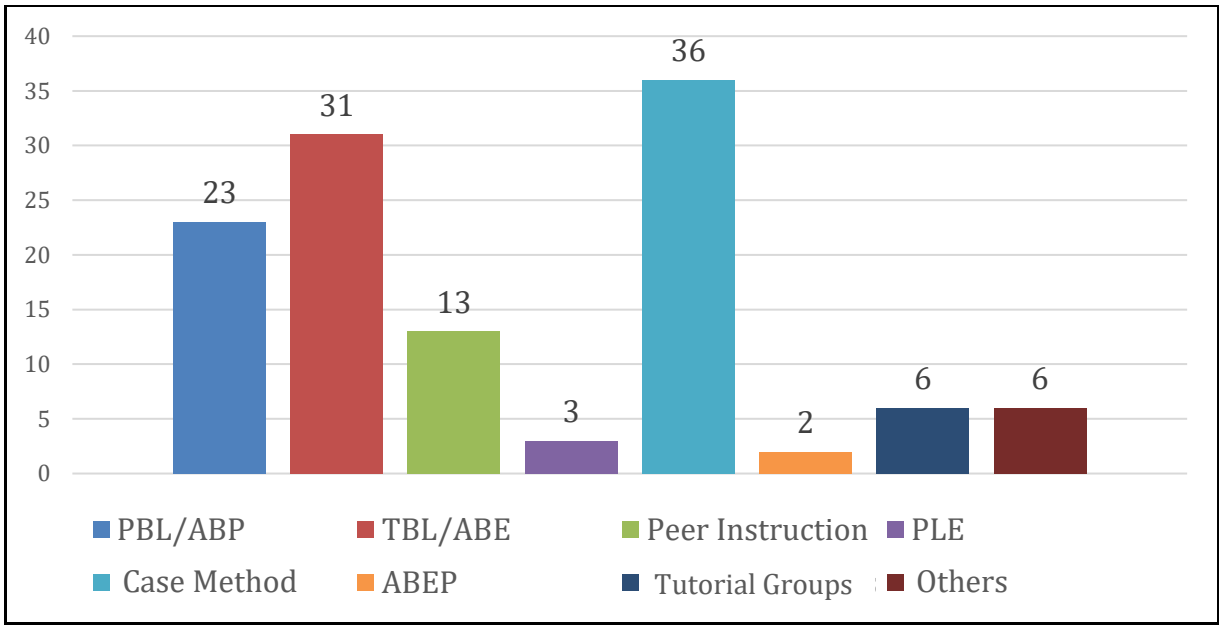
The work made by the institution, rulling for 5 years, is reflected in the data presented and it is inferred that the continuing education program has caused teachers to reflect on their practice, which seems to result in this change. Thus, analyzing graphs 4 and 5, we confirm what Bolzan, Isaias, and Maciel (2013) affirm, that the focus of training needs to be focused on the mobilization of the subjects so that they can continue learning, advancing towards new learning.

We seek to identify which active methodologies in higher education professors know and which among them are most used. Graphs 6 and 7 allow us to visualize the data, which also coincide with the first methodologies in which professors were trained, in the order: TBL, *peer instruction*, PBL, and case study method, it is noteworthy that the latter was already widely used in business courses.



Graph 6 – List of active methodologies in higher education that teachers know
Source: research data, 2017.

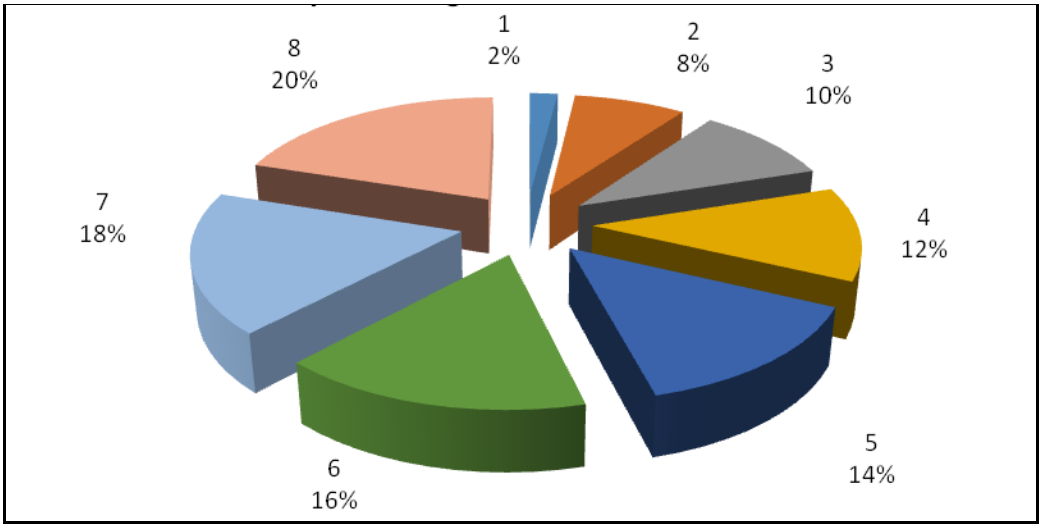
It can be seen in Graph 6, the 4 methodologies best known by the professors are the case study method (n = 43), the TBL / ABE (n = 40), the peer instruction (n = 39), and the PBL / ABP (n = 33). Graph 7 shows that the best known methodologies are also the most used by professors: case study method (n = 36), TBL / ABE (n = 31), PBL / ABP (n = 23) and peer instruction (n = 13). The case study method is already a widespread methodology in business as it is adopted by the Harvard Business School (HBS), a reference institution in the field. The other methodologies, it is noteworthy, were the first to be introduced by the training program.



Graph 7– List of the most used by professors
Source: research data, 2017.

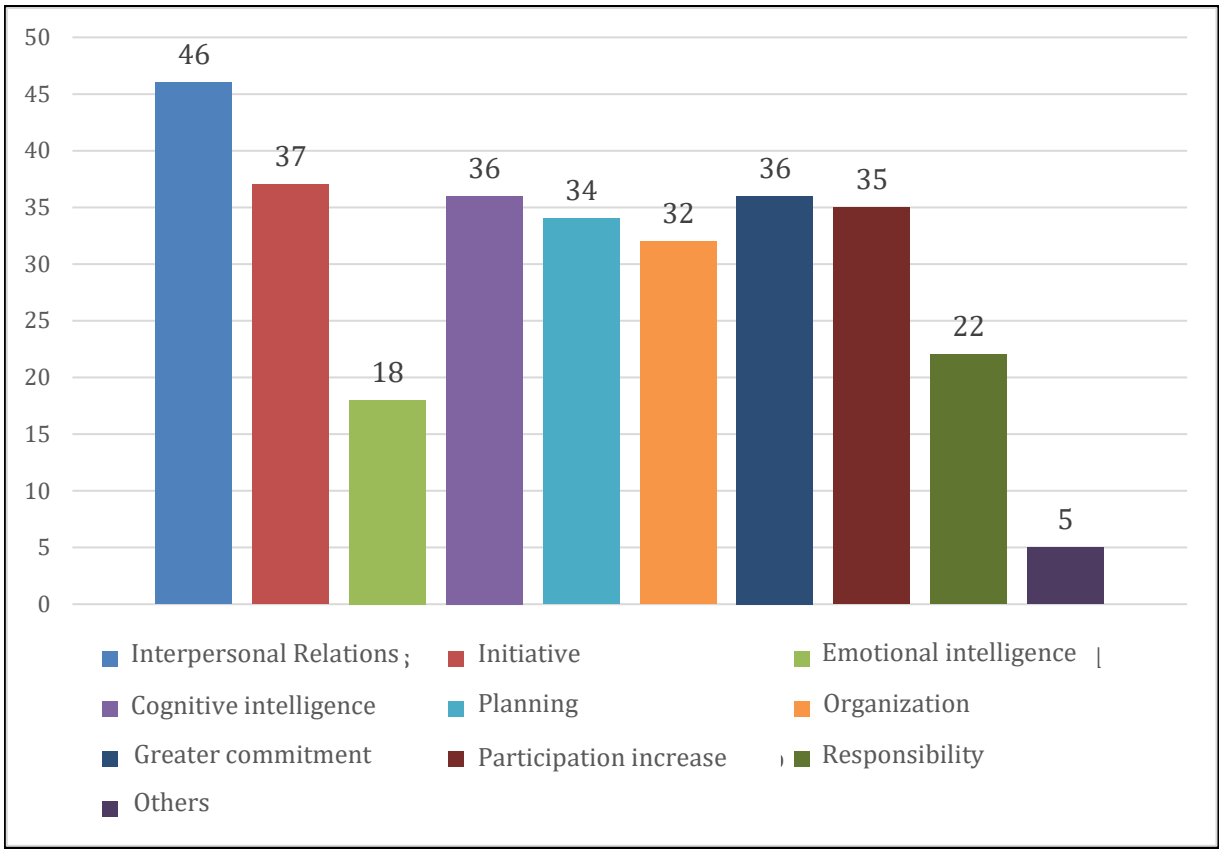
It is noteworthy that the four methodologies most pointed out in charts 6 and 7 (case study method, TBL / ABE, PBL / ABP and peer instruction) were themes of the pedagogical weeks of the institutions, which may have enhanced the use of these methods by teachers involved.

The following graphs 8 and 9 show the grades that professors assigned, on a scale of 1 to 10 points, to the degree to which active methodologies in higher education facilitate student learning and the characteristics developed by students.



Graph 8– Notes attributed to the degree to which active methodologies in higher education facilitate students' learning process
Source: research data, 2017.

The methodologies are understood by the faculty as facilitators in the teaching-learning process, 54% gave grades from 6 to 8. However, a small number of teachers cannot visualize this feature, which may occur due to lack of knowledge of the methodologies, as seen above, 4% do not apply and 24% apply less than a year ago. In graph 9 it is evident that the professors who apply can verify the development of fundamental characteristics for the personal and professional development of students.



Graph 9 – Characteristics developed by students using active methodologies in higher education
Source: research data, 2017.

These characteristics were explained in the different teaching methodologies presented, some of these skills aligned with the Curriculum Guidelines of the courses. It is in this sense that we highlight the importance of a mediation of knowledge that works beyond the scientific content knowledge that relates to skills also required by the labor market.

FINAL CONSIDERATIONS

This paper analyzed that professors notice active methodologies as conduct that promotes the learning of the students, especially because they recognize that the adult phase requires a posture of greater autonomy concerning their learning. It was also found that professors understand that the use of active classroom methodologies develops relevant characteristics listed in the curriculum guidelines of the courses. The use of the methodologies by 96% of the sample participants demonstrates the commitment of the faculty to the methodological proposal of the institution, considering that 60% of these teachers had been in the HEI for more than 5 years.

Although the case study is the most widely used and known method, mainly because it is a business environment, it is worth mentioning the diversity of methodologies applied by professors and their knowledge. This indicates that there is a dissemination of these practices

in the institution that has had positive results since lecturers know and are applying in classrooms.

A significant percentage of lecturers identified the methodologies that helped the student learning process. This leads to the expansion of the use of active methodologies in higher education since the main role of the teacher is in the student learning process.

However, it is noteworthy that these methodologies cannot be used without the professor knows the technique itself, since each methodology is based on epistemological assumptions that need to be in line with the conception of the development of the lecturer of students, as beings of potentiality and autonomy. This often requires the professor to rethink his role as a lecturer. In this sense, active methodologies cannot be applied merely because they are in evidence. Finally, this article points to the need for HEIs to enable training courses for teachers of different active methodologies and to have in their list strategies for measuring and monitoring the impact of methodologies on student learning and teaching work.

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