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Pedagogical models and their application to pedagogical strategies for citizenship education

Modelos pedagógicos y su aplicación a las estrategias pedagógicas para la educación ciudadana

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	ABSTRACT
Keywords: Pedagogical models, pedagogical strategies, citizenship training, experimental constructivism.	The following article aims to carry out a documentary review of the pedagogical models in order to establish one that adapts to the needs of current education, specifically the citizenship training of individuals. With a qualitative methodology, the article has first a theoretical part that focuses on the different pedagogical models, followed by an argumentative part in which we propose the experimental constructivist model as the basis of strategies for the formation of current citizens. It concludes with the analysis of the model mentioned as the proper way of educating to encourage more the focus of human beings on themselves and their community.

	RESUMEN
Palabras claves: Modelos pedagógicos, estrategias pedagógicas, formación ciudadana, constructivismo experimental.	El siguiente artículo pretende realizar una revisión documental de los modelos pedagógicos para establecer uno que se adapte a las necesidades de la educación actual, concretamente a la formación ciudadana de las personas. Con una metodología cualitativa, el artículo tiene primero una parte teórica que se centra en los diferentes modelos pedagógicos, seguida de una parte argumentativa en la que se propone el modelo constructivista experimental como base de las estrategias para la formación de los ciudadanos actuales. Concluye con el análisis del modelo mencionado como la forma adecuada de educar para fomentar más el enfoque del ser humano sobre sí mismo y su comunidad.

Introduction

As the decades progress and visions of society change, new teaching methods are structured. Especially in pedagogical practice, one of the essential aspects for the progress of citizenship, teachers have to come up with strategies that make learning possible, taking into account different factors according to their contexts (Rivera Porras et al., 2019). This is why, over the years, conceptual guidelines have been studied that make it possible to outline the components of pedagogical practice; these are called pedagogical models.

These models are understood, according to Joyce and Weil (1985), as a designed procedure that can be implemented to configure a curriculum, to design teaching elements and to direct teaching practices in educational classrooms; that is, these are strategies that allow the continuity and development of the formative process in any educational environment.

Taking into account the current need to form citizens that take charge of their environment, who contribute to the construction of society, these educational strategies should be structured with

the objective of guaranteeing that the individual develops a sense of belonging as a citizen, learning the ways of participation and structuring relevant environments in relation to the policies that affect them. In this way, he or she can become an active and participative inhabitant in the construction of harmonious environments and good coexistence, capable of being aware of his or her duties and decision-making rights as a fundamental person in his or her social environment.

Therefore, the following research was carried out in order to study different pedagogical models in the search for the one that best suits current needs in terms of pedagogical strategies for citizenship education.

Thus, in the following pages, the definition and the elements that constitute and identify different pedagogical models will be presented in order to finally emphasise the model that achieves the aforementioned objective. In addition, we will consider how this model should be applied to the design and formulation of pedagogical strategies for civic education that promote civic participation.

Theoretical framework

The study of pedagogical models has been the focus of much research, as it has been necessary to adjust pedagogical strategies to each new social challenge. For this reason, the research took as a reference the approaches that Gómez and Polanía (2008) make to the different types of pedagogical models in their master's degree work Teaching styles and pedagogical models: A study with professors of the Financial Engineering Programme at the Universidad Piloto de Colombia.

They state that these pedagogical models of learning can be identified by analysing and delimiting their fundamental characteristics through the answers given to three essential questions about their purpose and objective:

1- What to teach? That is, what content, in what sequences and in what order, its teachability and relevance.

2- How to teach? This refers to methods, means and resources. Here the teaching styles of teachers and the learning styles of students become relevant.

3- What and how to evaluate? This refers not only to the moments, but also to the testing instruments and the contents planned from the beginning of the process. Teaching and learning styles are also important here (Gómez & Polanía, 2008, p. 41).

In the educational field, the needs and qualities of each environment must be considered in order to structure the strategies or plans to be developed in the training processes. It is relevant to consider that there are a myriad of ways of conceptualising knowledge, each having different practical foundations for determining such conceptualisation. Most of the ideas or theories in relation to the functioning of how the training process should be considered have been structured and refined under pedagogical models.

In this sense, Tekman (2021) defines pedagogical models as methods to support the educational processes of teaching-learning, which respond to a series of guidelines that establish as an objective the potentiation of certain qualities in students. Knowledge of pedagogical models ensures that teachers reflect on and perfect all the events in their classrooms in the development of the training plans they carry out.

It is appropriate to consider then that these pedagogical models determine the directions or guidelines that sustain and regulate educational processes, clarifying their objectives and purposes of intervention. Thus, they guarantee the importance of what to teach and the sequence of the important contents to be developed according to each environment, responding to an education under certain qualities and virtues that characterise the students.

In addition, the pedagogical model underpins a relevant relationship between teacher, students and knowledge. In the same way, it delimits the didactic resources to be implemented within the teaching environments depending on the needs of each student and their environment.

Flórez (1999) presents a chart that sets out the main pedagogical models and their characteristics, organising in a detailed and precise way the main elements that make up each of these models.
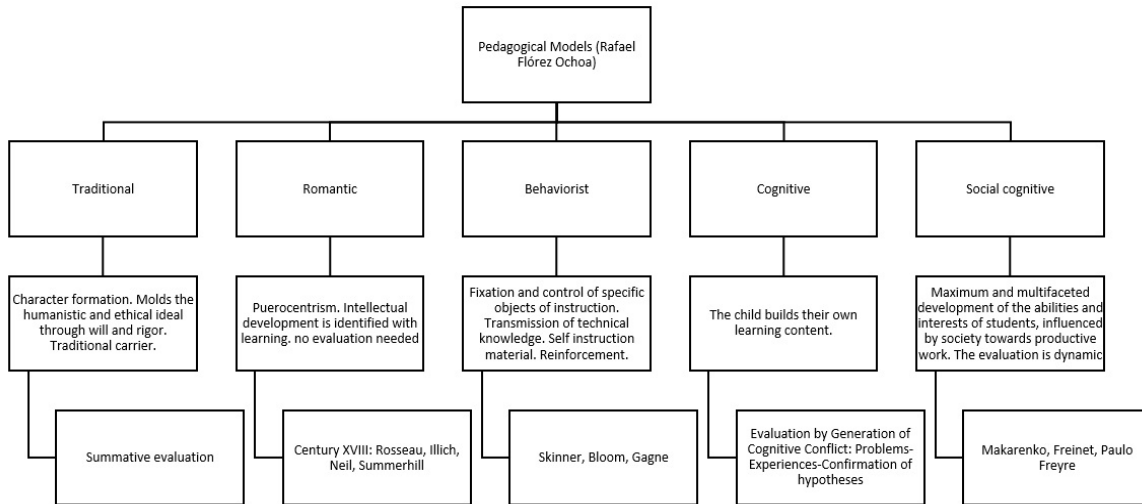
Figure 1. Pedagogical Models

Source: Flórez, 1999.

Thus, in the following paragraphs we will have as a horizon the definitions of these authors to understand the different pedagogical models in order to consolidate an opinion regarding which of these comes closest to supplying a pedagogical strategy that from the learning spaces achieves that the individual builds and promotes citizenship. The pedagogical models presented in the research by Gómez and Polanía (2008) that we will take into account are the traditional, behaviourist, social and constructivist models.

Methodology

In the development of this research work, a qualitative methodology was implemented. From the main objective, the analysis and interpretation of the pedagogical models studied are planned, through the documentary review of different theories, to identify those that allow the formulation of guidelines for a pedagogical strategy that strengthens citizenship training.

Results

Pedagogical models

In accordance with the theoretical approaches of Gómez and Polanía (2008), a pedagogical model is understood as the synthetic vision of theories that teachers use for the construction of curricula. It allows the systematisation of the teaching-learning process or the interpretation of the parts that make up a curriculum.

In this sense, various pedagogical models have been identified, among which the traditional model, the behaviourist model, the social model and the constructivist model stand out. Each of these has its own characteristics and derivations that provide a broad spectrum when making conceptual or theoretical approaches, and allow for analysis of the way in which knowledge is imparted.

Traditional model

For Vergara and Cuentas (2015) the father (or precursor) of the traditional pedagogical model is John Amos Comenius, European philosopher, theologian and pedagogue in the 17th century, known as the Teacher of Nations. From his perspective, each step of knowledge implies a complete set of elements, thus giving the beginnings for further study in a broader and better structured way. Thus, this educational model is framed in a hierarchical series of knowledge and skills that allows the learner to acquire a level of complexity and depth on a subject as they progress in study and knowledge.

According to Gómez and Polanía (2008), this model offers a rigorous methodical scheme, generally excused in the virtuosity characteristic of the seventeenth, eighteenth and nineteenth centuries. Its aim is to educate pupils through a structure established by means of the value of will, virtue, discipline, ethics and humanism. In parallel, it involves the teaching of the most ancient ideals, everything related to the Latin language and to the handling of rhetoric as the foundation of the training plans.

Thus, the curricular models or teaching plans are framed in a humanist and western doctrine where great relevance is given to intellectualism (one of the distinctive aspects of this pedagogical model). It is taught gradually taking into account the degree of knowledge acquired during the course of the school cycle, generally divided by levels.

With regard to this aspect, Amador (2018) criticises this educational model because it defines the student as a passive being, who is dedicated to receiving knowledge, prioritising an active memoristic behaviour in content. On top of this, the formation of emotions and values is left aside, and great importance is given only to theories, which are clearly divorced from practice and experience.

Likewise, Amador (2018) specifies that another of the distinctive features of this pedagogical model is verbalism: the expository method is given preponderance through lectures directed and determined by the teacher in charge and debates or discussions among students are rarely held, rather the memory and the apprehension of knowledge by means of repetition and emphasis are exalted. This characteristics lead to relevant readings from reliable sources, analysis and experience being left aside; it must be borne in mind that science is understood as something static, which the student must classify, understand and mention, but not discuss.

This model was developed mainly in mercantile European countries, such as the Netherlands and England, which would develop later due to the transformations of the industrial revolution. Hence, the main aim was to educate the most common workers involved in the world of work and especially in transcontinental companies and production factories. In fact, this education was basically aimed at establishing and converting workers into routine, mechanical beings, and proper to the factory environment (Vergara & Cuentas, 2015).

It is therefore not surprising that another characteristic of this teaching model for industrial societies is verticalism. According to Amador (2018), the teacher is privileged by being placed in a state of superiority, as an element of power over the students, determining that the students are at the bottom of this chain.

In this sense, it is the teacher who has the power to assess the student's knowledge (the question

of what and how to assess is answered) through knowledge tests that measure, as mentioned above, the individual's ability to memorise large amounts of information imparted by the teacher. All of this, according to Amador (2018), allows dependence and submission to become commonplace and authoritarianism to flourish, as the teacher's word becomes synonymous with authority. Moreover, in the learning process, learners cannot consider contradicting the ideals of the educator.

Behaviourist model

According to the work of Leiva (2005), the American psychologist John Broadus Watson is considered the father of behaviourism, who in 1913 published a treatise on philosophy known today as the behaviourist manifesto, in which he sets out the main postulates of this current of thought. Its application to learning and teaching is connected to research on learning experiences in animals, which are extrapolated to human beings, where it is the subject who allows the inclusion of knowledge to the outside world.

According to the behaviourist learning model, as exposed by Leiva (2005), learning: is achieved through the association of stimuli and their response; is related to the environment; is not stable or eternal, on the contrary, it must be kept in constant improvement; and, finally, is repetitive and mechanical, giving priority to memorisation and responding to stimuli.

Thus, behaviourism as a pedagogical model of teaching maintains that the task of institutions is to transmit and form knowledge accepted in "social" terms and that learning must be linked to the consequences of constant changes in the behaviour of the social conglomerate, so that it can be affirmed that this can be modified.

For Gómez and Polanía (2008), this model is understood as a kind of programmed teaching because its essential theoretical aspects are aimed

at achieving an engineering of behaviour and knowledge. Among the characteristics, these authors emphasise that:

• Knowledge can be achieved through a system of repeated experiences reinforced periodically;

• Learning is notable for its active aspect, in which one deals with elements of the environment in order to achieve the execution of a behaviour that has been programmed;

• The levels of difficulty of a behaviour are the basis for the exposition and sequence of a complex knowledge development;

• The planning of pupils' behaviour is completely relevant; in this sense, the learning path, the planning of contents and the control over the stimuli - antecedent and consequent - make the formation of the expected behaviour possible.

In this model, the relationship that exists between the educator and the learners is similar to that of a director and his or her team. It is the teacher who is in charge of permanently encouraging and stimulating the students to achieve the goal of self-improvement, to constantly improve themselves and to achieve the goals of the institution, which become more and more difficult as the course progresses. As this happens, students are rewarded or sanctioned through the permanent measurement the achievement levels of each of them.

In this sense, in the words of Gómez and Polanía (2008), evaluation is a constant process of measuring and assessing the approach to the institution's goals. Contrary to the traditional model, this pedagogical model leaves aside verticality and allows interaction between the students and the teacher: the teacher is seen as a guide who helps to "correct" any shortcomings in the course of the desired learning process.

Social model

The pedagogical model of social teaching was first formulated by Bandura, with the aim of ensuring a comprehensive and systematic characterisation of the factors that are included in the learning processes of human beings, as Rivière (1992) puts it.

This same author starts his reflection from the premise of a model that establishes a fair determination between environment, behaviour and personal factors, to which he refers when he coins the concept of "triadic reciprocity", where the way of behaving is derived from environments and personal conditions. This time, one's own behaviour and environments are determined by the other factors. This reciprocity cannot be understood or determined as symmetry, because of the intensity of the two-way inclusion: it has the capacity to vary according to the individual learner and experience.

Now, according to the research of Gómez and Polanía (2008), the theoretical bases of this pedagogical model were largely taken from the research and social studies of the Frankfurt School, from the ideas of authors such as Max Horkheimer, Theodor Adorno, Herbert Marcuse and Erich Fromm, who worked and nurtured the theory with criticisms related to racism, subtraction, prejudices about races and separation policies. Thus, this pedagogical model was interested, in the first instance, in the analysis of the social structures that created difficulties for the development of educational programmes, specifically in everyday environments and power structures. Secondly, its interest turned to the formation of analytical-reflective thinking skills with the goal of positively transforming each social reality.

Likewise, in this model, teachers and students, as well as all individuals involved in educational processes, have the option of establishing their points of view and establishing a position on the situation studied without the position of one or the other having greater validity or force. Consequently, the ultimate goal of teaching is the development of critical thinking, which allows questioning knowledge from knowledge; that is to say, the positions that gain the most acceptance are those that are most relevant, well argued, coherent and especially those that have the ability to persuade the audience (Flórez et al., 2017).

To this extent, the assessment systems do not consider the option of a certain end product as static knowledge or know-how, but rather test and strengthen the learning potentials that are being developed. However, these assessment systems are not separated from teaching, but are implemented to identify between students, group, environment and teacher, the level of help that each student needs to solve each problem independently.

In these circumstances, it is not the teacher who has to provide the information that the learner needs, but the learner himself/herself will discover through exploration what is interesting and appropriate for his/her educational reality, with the goal of including new ways of learning.

Constructivist model

This pedagogical model of learning finds its theoretical foundation in the postulates of Dewey and Piaget, who state that education has the obligation to allow each individual to progressively access different levels of knowledge, bearing in mind the difficulties and particular characteristics of each learner (Gómez & Polanía, 2008).

For this theory, learning develops as a consequence of relevant and coherent interactions of two processes: firstly, assimilation, which is related to the relationship that students have with the elements of their environment with the aim of appropriating all the characteristics that are convenient for them. Secondly, accommodation, which is related to what happens with the elements learned, i.e. when they are integrated into the subject's cognitive network, which contributes to the construction of new thought

structures and ideas and allows adaptation to the environment. In other words, the learner uses what he or she has learned to improve his or her level of performance from each experience with his or her environment (Ortiz, 2015).

In this sense, according to Tünnermann's (2011) research, the central characteristics and principles of the constructivist model include that learning:

• Is achieved through an easy process based on relationships with other individuals in the same environment, as long as these are social and relevant;

• Involves the development and formation of a cultural identity, with extensive knowledge;

• Includes personal and self-structuring construction processes, setting a personal goal;

• Is linked to the levels of cognitive, social and emotional development, which direct their knowledge structures;

• Is the prior knowledge and experience of the students;

• Addresses elements of personal reorganisation governed by schemas;

• Develops when there is a conflict between what the learner knows and what they should know;

• Is fundamentally related to the affective component: aspects of self-knowledge, the establishment of personal motives and goals, the willingness to learn, attributions about success and failure, mutual expectations and representations play an important role;

• Involves contextualised aspects, as learners have to develop their own culturally meaningful activities;

• Is facilitated by support that directs knowledge from existing knowledge to construct new meaningful learning.

Piaget, on the other hand, builds his own construction of this theory, thus creating what is known as "experimental constructivism". As explained by Saldarriaga et al. (2016), Piaget's theory studies cognitive development as a constant process in which the construction of mental schemas depends on the childhood schemas of each individual. It is a process of permanent reconstruction, which is segmented or segregated by stages or phases that are characterised by being successive and hierarchical, and which respond to a form of development (generally evolutionary) of mental structures.

At each stage, the degree of appropriation of knowledge is higher than the previous one, which produces quantitative and qualitative changes in the individual and in his or her cognitive capacities, which live in a constant cycle of restructuring.

In this sense, Piaget considers that there are four factors that directly affect the achievement of each of the stages: maturation, the influence of the social environment, experience and "equilibration". Maturation is based on the premise that intelligence is built up progressively through the actions of each individual: according to the level of maturity of the subject, he/she can increase his/her cognitive capacity by (Saldarriaga et al., 2016).

On the other hand, the influence of the social environment as a second factor is determined by the interpersonal relationships that the individual builds and the experience he or she acquires through social constructs. This can accelerate or delay the onset of the stages at certain chronological ages, when these are traumatic or involve many difficulties (Saldarriaga et al., 2016).

The third factor, experience, refers to the degree of knowledge and subjective experiences that have been gained through:

• Memory; it is associated with bodily exercises or the simple conditioning of a behaviour on an object;

• Physical stimuli, which can be seen as an aspect in which the individual has the ability to relate one characteristic to others;

• Logical and mathematical reasoning; here knowledge does not depend on the properties of the objects acted upon, but on the characteristics of the actions carried out on them.

Finally, Saldarriaga et al. (2016) present as a fourth factor equilibration, which is understood as the capacity that the individual has (and acquires) to mediate and assimilate the relationships that exist between those inherited and learned behaviours, maturation (as subjective experience) and physical and social experience. For Piaget, this is the most pertinent in terms of determining what aspects are included in the transition of the stations of cognitive development.

The ideal pedagogical model for citizenship education

In the pedagogical model for citizenship education, it is essential to consider the ideas of Maslow (1975),who states in his pyramid of well-being, that human beings require attention to several spheres or areas within the exercise of their social life in order to satisfy their needs. Some of these are understood as basic or fundamental: physiological needs, security, affiliation and recognition.

These needs include access to drinking water, health, education, housing, public utilities, basic sanitation and work, among others. However, it is no secret that many communities have not been able to satisfy these needs, so much less have they climbed to the top level of the pyramid where aesthetic and knowledge needs are located: self-realisation.

It is at this point that training from educational spaces becomes indispensable, since for human beings it is transcendent in their self-realisation to be able to access these basic or fundamental needs with the aim of achieving adequate progress on a personal and social level. Thus, it is necessary to satisfy spheres of life that concern having a decent home, an efficient health and social security system, minimum security conditions, a job, access to education, recreation and leisure time occupation.

This implies the coordinated participation of the academic sector in the research of new tools and strategies aimed at optimising education methods at different levels of education, improving public decision-making and strengthening civic education. It is essential that all actors involved achieve relevant and coherent goals that have an impact on the empowerment of citizens in general, both in their individual and collective contexts.

Thus, the implementation of pedagogical strategies should focus on a model that enables the consolidation of an active and conscious citizenship in decision-making regarding their environment. We consider that this model should be the experimental constructivist model proposed by Piaget, since from the theory this model understands the contexts of each individual and their impact collectively. It also specifies that knowledge is changeable and that individuals construct knowledge from their experiences and continually restructure themselves.

In addition, this model takes into account the influence of the social environment as an important factor, which translates into citizenship training strategies that are more in line with community contexts and that understand that individuals build knowledge from themselves, but with the influence of their communities. Furthermore, their experience should be analysed when constructing methodological strategies in order to identify the points that need to be intervened when training in citizenship.

Finally, this model takes into account the individual's relationships with others, which is indispensable in the creation of mechanisms that influence participation. Furthermore, they are essential for the individual to identify him/herself as a primary factor in the inclusion of a social group and to understand the importance of his/her voice in individual and collective decision-making.

Conclusions

From the analysis of the theoretical content presented above, it can be determined that the constructivist experimental pedagogical model is suitable for the formulation of strategies for citizenship education. Since it has as its main axes the subjective experience for the construction of an own and unique story, it allows the individual to reach increasingly complex stages of knowledge. It also takes into account the social experience that gives the individual the ability to understand himself in a set of shared knowledge that he can nourish and that nourishes him; this, through experimentation and direct contact with knowledge, as well as relationships with others.

The implementation of teaching methods based on this model implies taking into account the outline and formulation of contents that can be explored and that allow the subject to whom it is implemented to have a direct relationship with them. Likewise, they must feel identified in a personal and social way with what has been learned, all of this in pleasant and differentiated environments that facilitate learning in accordance with the particularities of this subject.

With these strategies, the individual will understand the transcendence of being a citizen, which will allow him/her to build an identity based on the very concept of citizenship and to recognise him/herself as an active member of society. This will lead him/her to exercise his/her political rights and duties in order to achieve what he/she considers fair for him/her and society.

Therefore, a pedagogical strategy based on the experimental constructivist model will have a direct impact on the process of civic education and decision-making at all levels of influence: the individual, leadership, community boards, social or cultural organisations, and other organisational or action structures in the communities.

References

Amador, A. (2018, marzo). *El modelo pedagógico tradicional. ¿Arquetipo de la educación en el siglo XXI? su influencia en la enseñanza del derecho. Algunas reflexiones sobre el tema* [Ponencia]. III Congreso internacional virtual sobre La Educación en el Siglo XXI. https://www.eumed.net/actas/18/educacion/67-el-modelo-pedagogico-tradicional-arquetipo.pdf

Gómez, M., & Polanía, N. R. (2008). *Estilos de enseñanza y modelos pedagógicos: Un estudio con profesores del Programa de Ingeniería Financiera de la Universidad Piloto de Colombia* [tesis de maestría, Universidad de La Salle].Repositorio Institucional Unisalle. https://ciencia.lasalle.edu.co/cgi/viewcontent.cgi?article=1553&context=maest_docencia

Flórez, R. (1999). Evaluación Pedagógica y Cognición. McGraw-Hill.

Flórez, R., Castro, J. A., Galvis, D. J., Acuña, L. F., & Zea, L. A. (2017). *Ambientes de Aprendizaje y sus Mediaciones. En el Contexto Educativo de Bogotá*. Instituto para la Investigación Educativa y el Desarrollo Pedagógico, IDEP.

Joyce, B., & Weil, M. (1985). *Modelos de enseñanza*. Gedisa.

Leiva, C. (2005). Conductismo, cognitivismo y aprendizaje. *Tecnología en Marcha*, 18(1), 66-74.

Maslow, A. (1975). *Motivación y Personalidad*.

Sagitario.

Ortiz, D. (2015). *El constructivismo como teoría y método de enseñanza. Sophia, Colección de Filosofía de la Educación*, (19), 93–110.

Rivera Porras, D., Carrillo Sierra, S. M., Silva Monsalve, G., & Galvis Velandia, L. N. (2019). Conocimiento y práctica pedagógica de los docentes en escolares con inatención, hiperactividad e impulsividad. *Revista Perspectivas*, 4(1), 66–76. https://doi.org/10.22463/25909215.1764

Rivière, A. (1992). La teoría social del aprendizaje. Implicaciones educativas. En C. Coll, J. Palacios, & A. Marchesi (Eds.), *Desarrollo psicológico y Educación* (II). Alianza.

Saldarriaga, P., Bravo, J., & Loor, M. (2016). La teoría constructivista de Jean Piaget y su significación para la pedagogía contemporánea. *Dominio de las Ciencias*, 2(Extra 3), 127–137.

Tekman. (2021, 08 de noviembre). *Modelos pedagógicos: Qué son y cuáles son fundamentales en educación*. https://www.tekmaneducation.com/blog/modelos-pedagogicos-en-educacion/

Tünnermann, C. (2011). El constructivismo y el aprendizaje de los estudiantes. *Universidades*, (48), 21–32.

Vergara, G., & Cuentas, H. (2015). Actual vigencia de los modelos pedagógicos en el contexto educativo. *Opción*, 31(6), 914–934.