Routledge Handbook of Ecotourism Edited by David A. Fennell

Theme 5: Learning

Ecotourism and theories of learning/education

Authors:

Manuel Ramón González-Herrera. Autonomous University of Ciudad Juarez, Mexico.

Silvia Giralt-Escobar. University of Alcalá, Madrid, Spain.

Abstract

Ecotourism is a scientific discipline closely related to the processes of the foundation and development of tourism, which at the same time constitutes an academic discipline as this activity becomes an objective for teaching and learning. For this reason, it is necessary to know how to teach and communicate knowledge to students, and how students learn during this education process. The Ecotourism education category is understood in this chapter as the teaching and learning processes that take place in different institutions, whether formal or non-formal, schooled or out of school. This educational process has the characteristics of a theoretical system composed of concepts, categories, laws, and a particular structure of its components, which determines an internal logic, in which different external conditions to the object itself intervene. According to this theoretical position, this chapter presents six sections organized in this order: Ecotourism and Education, the Ecotourism education process, theoretical and methodological bases of the teaching and learning processes, theories of knowledge and psychoeducational paradigms applicable to Ecotourism, teaching opportunities applicable to Ecotourism Education, and models and teaching approaches applicable to Ecotourism education.

Key words: Ecotourism, education, teaching, learning, pedagogy, didactics.

Introduction.

The teaching work of the ecotourism professor is more professional when it is based on science (Ferreiro, 2006). That is why, it is increasingly necessary to promote the strengthening and links between ecotourism, education and research (Robledano, *et al.*, 2018), especially in the globalized world in which we live, where communicative globalization has transformed educational potentials (Simon and Thi Kim, 2017). In this sense, it is considered that alternative tourism linked to education and culture can contribute significantly to human development from a socio-economic, political, cultural and spiritual point of view, in harmony with itself, with nature and with others human beings (Torres, Zaldívar and Enríquez, 2013). Based on this, new professionals will be able to transfer scientific-technological knowledge and socialization of ecotourism principles to local communities (Cujía, Pérez and Maestre, 2017), and to the tourists with which they interact.

Evidently, in tourism practice educational goodwill is not so coherently associated to the quality of the services offered. Recent research reveals that some companies pay little attention to the educational components of ecotours, and concludes that, while almost all tourist guides minimize their educational role or practice, most tourists prioritize education and new learning in their ecotourism experiences. That is why; they expect the guides to improve their educational role, recognizing that this constitutes a contradiction between the expectations of tourists and the understanding of the guides of their role, with significant implications for management and practice of ecotourism (Duong, *et al.*, 2019). The mentioned study shows two important educational axes for Ecotourism, the first, related to the work of tourist guides

(and tourist experiences in general) in relation to their educational role; and the second, regarding the teaching of this discipline.

Such a contradiction reflects one of the challenges facing tourism education, so a change from the traditional teacher-centered and classroom-based educational practices, to innovative student-centered approaches is necessary (Ramírez and Santana, 2019), with emphasis on strengthening the binomial formed by Ecotourism and Sustainability Education (Piñar, *et al.*, 2012). Given this opportunity, some destinations have opted to increase the number of international and national visitors through human resources education, and thus, have a trained and qualified workforce, especially in ecotourism (Brijesh, 2019).

Ecotourism and Education.

The links between **Ecotourism** and **Education** are closely related to the world of tourism and travel, based on which the need for training of the different stakeholders arises, either from a professional perspective or from that of general culture. B. Camargo and I. Sánchez (2016), argue that good tourism development starts with education. In this order, these authors coincide with the criteria of the Tourism Education Futures Initiative (TEFI), when they affirm that collaborative education and co-creation of knowledge are the basis for creating sustainable tourism (Camargo and Sanchez, 2016), one of the main principles of Ecotourism Education.

In response to this demand, tourism education is offered through different university models and tourism training technicians (Cervera and Ruiz, 2008; Boluk and Corey, 2016), as well as through tourism education and training promoted by UNWTO in response to the needs of employers and tourism professionals (Sancho, 1995; Fossati, *et al.*, 2003). In the same way, the general formation of the tourist culture of the host community is particularly favored (Alonso, Gallego and Honey, 1995; 2006), and the experiential learning during tourist trips is inspired (García-Allen, 2019). For this reason, tourism becomes a cognitive and affective-motivational phenomenon for different audiences, which is why this discipline needs to be studied by the Pedagogy and Education Sciences.

Pedagogy is one of the social sciences that studies consciously organized and goal-oriented education (Urías, 2013), as well as unconscious and unintended experiences grouped in the informal education category (Elías, 2016). That is to say, that it studies the formation of the students in all its aspects, in function of which the educational institution as a main factor, the family, and the social organizations intervene. Anyway, in the opinion of different authors, like J. A. Elías (2016) "Pedagogy has a dubious status as a scientific discipline, in conflict, voices inside and outside its domains debating its nature. In this way, it has incorporated theoretical constructs, methodological focuses and instrumental resources from sciences with a greater degree of consolidation - and recognition - (anthropology, sociology, psychology, among others); at the same time that it has developed its own theoretical and methodological body" (Elías, 2016, page 33, 34). With these approaches, tourism education represents the integrated set of knowledge that allows the guidance of the educational process of educational institutions and their environments of influence, as well as of other training institutions.

Didactics is the branch of pedagogy that studies the teaching and learning processes, through which instruction, education and student development are given (Álvarez, 1999; Urías, 2013). This subdiscipline has a dynamic, complex and multifactorial object of study, at the same time that it involves the active participation of the learner (*Ibid.*). P. Hernández and co-authors (2004) consider that "Education is a very complex sociocultural phenomenon and, for its complete study and analysis, the participation and collaboration of multiple disciplines that explain its different dimensions and contexts are necessary. [So] ... nobody doubts that without such concurrence of disciplinary perspectives, the analysis of education would be partial and incomplete" (Hernández, *et al.*, 2004, page 40).

Learning and teaching are conceptual categories corresponding to different disciplinary fields, although connected; so, they assume different objects of study. On the one hand, **learning** is the process of acquiring

knowledge, skills, abilities, attitudes and values, which are generally obtained through observation, study, teaching, experience or practice. Due to its complexity, there are various theoretical positions and conceptual meanings regarding its definition, methods and applications. Depending on these, different learning paradigms and theories have been developed regarding the act of learning, which are mainly linked to the disciplinary field of psychology. On the other hand, **teaching** is the action and effect of teaching or instructing through the transmission of ideas, principles, beliefs, knowledge, experiences, skills and habits to another person who does not have them. During this activity, teachers or facilitators interact with their students in a given educational context, through which learning or knowledge acquisition is facilitated. To achieve this goal, several paradigms, models and approaches related to the act of teaching have been developed, mainly linked to the disciplinary field of the Pedagogy and Education Sciences.

When Pedagogy assumes tourism and ecotourism in particular as an educational study object, a specific branch of this known as **Tourism Pedagogy** or **Leisure Pedagogy** is created (Colton, 1987; Galles, Graves, Sexton, 2018; Zavydivska, Zavydivska and Khanikiants, 2019). Consequently, the **Didactics of Tourism** has as a specific study object the teaching and learning processes of tourism and its subdisciplines (like ecotourism), as well as ecotourism experiences (for example, the practice of a tour guide). It therefore covers the study of formal, non-formal and informal educational events, such as those that result from the daily experience of visitors who come to a destination. In this way, it includes attention to the components of the personal teaching and learning processes -teacher and student- and non-personal components such as objectives, contents, methods, means of teaching, and evaluation, among others.

In the opinion of A. Colom Cañellas and G. Brown González (1993), the Pedagogy of Tourism is focused on two main areas that correspond to training for tourism (formal and non-formal) and the educational content of tourism (passing from informality to non-formal education). These perspectives offer the possibility of application in specific areas, such as free time education, education for international and intercultural understanding, among others (Colom and Brown, 1993). Today, tourism academics and educators increasingly accept that education must meet the needs of the industry, and they have begun to wonder what can be done to help students think and learn more broadly and critically (Mair and Sumner, 2017), which contributes to the elevation of quality in tourism training and the improvement of Tourism Pedagogy.

Different research addresses the pedagogical study of tourism incorporating innovative topics such as the pedagogy of climate change, which potentiates the role and responsibility of visitors as key actors in the face of climate change, or the potential use of these sites to promote environmental learning. In addition, social and political actions on climate change are promoted "in situ", all of which facilitates experimental learning, responsibility and civic action towards conservation (Tazim and Smith, 2017). In the same way, different authors have incorporated pedagogical research into their daily work with the purpose of examining how sustainable the tourism education of future professionals is, recognizing that curricular programs with traditionalist approaches still persist (Cole, 2019), which represents a challenge for Tourism Pedagogy.

On the other hand, the Pedagogy of Leisure is considered as a specialized branch of the Pedagogy that is responsible for the study of leisure or free time of people, in order to promote teaching and learning oriented to the educational or productive use of it (Colton, 1987; Colom and Brown 1993; Teplicancova, *et al.*, 2017; Hjalmarsson, 2018). In particular, this pedagogical dimension pays attention to the free time of the whole society, since we all have this space of time in different measure, taking advantage of the free time budget due to educational opportunities. In this order, it facilitates from the pedagogical point of view instruction and education in its cognitive-instrumental, affective-motivational and developmental dimensions, by integrating the components of the teaching and learning processes. Leisure Pedagogy is related to school and out-of-school activities through the links that are generated by acting on the same subject. Thus, the first includes the pedagogical projection of the actions carried out in school institutions, while the extracurricular Pedagogy includes education of free time in the family, the community, and other institutions.

Conceptualized from this perspective, the Pedagogy of Leisure focuses its attention on the categories of Rest, Fun and Development (Miranda, 2006; Ávila, 2017). In such a way, the forms of occupation of free time are becoming an object of study, which has a favorable impact on human behaviors, generating a model for the use of free time based on education, and preparing us for a better socio environmental performance. It guides us pedagogically to assume the planning, development and control processes of different ecotourism activities, promoting appropriate didactic approaches to achieve a better efficiency and effectiveness of learning in different contexts of action.

Under this approach, the Pedagogy of Leisure promotes the fulfillment of basic educational, sociocultural and recreational functions that allow the personal and intellectual development of those who participate. The fundamental areas of leisure education concern school, cultural institutions and other leisure-time institutions of an educational nature that develop excursions, urban visits, parties and evenings out, community activities linked to local popular traditions, folk crafts, gastronomy, painting, photography, yoga, among many others. It also includes activities in parks and open spaces for leisure time, in which there is usually no face-to-face educational intervention, but which incorporate pedagogical criteria as part of the activities that are promoted. For example, the case of summer camps and other types of holiday stays in natural environments, clubs and other similar spaces where free time activities take place.

Ecotourism education process.

According to J. Jafari (2005), tourism is a scientific or academic discipline (Jafari, 2005, page 46-55). In this sense, it can be considered that Ecotourism is an academic subdiscipline, as this activity becomes an objective of teaching and learning. For this reason, it is necessary to know how to teach and communicate knowledge to students, and how students learn during this education process. The **Ecotourism Education** category is understood in this chapter as the **teaching and learning processes** that take place in different institutions, either formal, not formal or informal, in school or out of school. It is also recognized, that there is a dialectical union between instruction and education, through which the student assimilates the content of the teaching, while producing and developing their personality traits, which influences the feelings, development, emotions, values, and so on (Álvarez, 1999). Anyway, it is worth noting that in informal education there are processes that can hardly be referred to as "teaching", however there are lessons learned. All these educational processes have the characteristics of a theoretical system composed of concepts, categories, laws, and a particular structure of its components, which determine an internal logic, in which different external conditions to the object itself intervene (*Ibid.*).

For a long time, traditionalist teaching and learning practices have been characterized by the leading role of the teacher, who assumes the function of transmitting information as a part of a rote learning process by reception. Under this approach, the teacher explains to the students what they should learn in a unidirectional way, being in charge of the diagnosis of the student's learning needs, of the organization and presentation of the content of a particular discipline, and of the reproductive evaluation of the students. On the other hand, the student assumes a role of passive receiver of information, who memorizes and repeats the contents to face the evaluation administered by the teacher. Under this conceptualization, learning occurs individually and reproductively, so that everything is practically reduced to memory.

Such educational practices do not fully conform to the educational needs of the times in which we live, which is why it is necessary to promote alternative educational models and teaching strategies for ecotourism training. Based on these, the Ecotourism educational process could contribute to the formation and development of cognitive-instrumental, affective-motivational and axiological knowledge, and in this way, to assume a positive attitude and consequently responsible behaviors in each tourist destination. In this regard, it is recommended that the following categories be integrated into Ecotourism Education:

- Knowing (cognitive dimension).
- Knowing how to do: procedures (instrumental dimension).

- Wanting to do: motivation (motivational affective dimension).
- Knowing how to be: feelings (motivational affective dimension).
- Be willing to do: attitudes (attitudinal dimension).
- Doing: behaviors (behavioral dimension).
- Making to know: multiplier effect (communicational dimension).

The aforementioned categories are related to the four pillars of education proposed by UNESCO: learning to know, learning to do, learning to be, and learning to live together. It is therefore important to strengthen Ecotourism Education by incorporating the ten commandments of learning raised by J. I. Pozo (2008), which means the development of teaching and learning processes considering:

- 1. Interests and motives of the students.
- 2. Previous knowledge of the students.
- 3. Adequate dosage of the amount of new information presented in each activity.
- 4. Suitable appropriation of the basic knowledge that will be necessary for future learning.
- 5. Diversification of tasks and learning scenarios for the same content.
- 6. Design of learning situations based on the contexts and tasks in which the learners must recover what they have learned.
- 7. Organization and connection of each learning activity with the other one, so that the students perceive the explicit relationships between them.
- 8. Incentive among students to reflect on their knowledge, helping them to generate and resolve cognitive conflicts that arise.
- 9. Assignment of learning problems and/or open tasks, and the promotion of the cooperation among students for their resolution.
- 10. Training of the students to plan and organize their own work.

Another question of interest that should be attended as a part of the Ecotourism teaching and learning processes is related to the way the students learn. C. M. Alonso, D. J. Gallego and P. Honey (2006) identify different learning styles according to the way each person learns. They recognize the *active style* through which students enjoy new experiences, the *reflexive* one in which they observe the experiences from different perspectives, the *theoretical* in which they are analytical, and the *pragmatic* one in which they are practical learners (Alonso, Gallego and Honey, 1995; 2006). The literature also refers to other learning styles (García-Allen, 2019); such as, *logical or mathematical*; *social* (based on interpersonal relationships); *solitary or intrapersonal*; *visual learning* (they learn through images, graphics, videos); *the auditory* (they learn by listening; *the verbal* (they learn through reading and writing); *the kinesthetic* (they learn in practical activities); and multimodal (students learn by combining styles). The didactic implication of the recognition of these learning orientations favors that the students develop their abilities and process the information better, so that teachers must attend the different learning styles of their students in each educational activity.

Theoretical and methodological bases of the teaching and learning processes.

The theoretical and methodological bases of the teaching and learning processes have been configured according to the specific conditions and educational proposal of each historical period, so they are the result of the transmission of the accumulated knowledge by humanity, and the assimilation of these for new generations (Labarrere and Valdivia, 1988, page 164). Regarding each of these historical moments, different scientific psycho-pedagogical theories have been formulated that have promoted the design of models, theoretical frameworks and didactic strategies (methods, techniques, activities), among others, which offer teachers the premises to conduct the teaching and learning processes. Learning theories makes it possible to understand and develop the processes by which students acquire knowledge, while teaching theories allows scientific guidance of the instructional and educational processes of each academic

discipline. Both groups of theories complement each other as part of Ecotourism Education, based on what the construction and appropriation of disciplinary knowledge of this specific field of knowledge materializes.

Different studies at international level have assumed the research and operationalization of psychopedagogical theories as a basis for improving the educational and transformative practice that tourism professors carry out (Benckendorff and Zehrer, 2017). D. Kay and J. Kibble (2016) recognize that educators should understand learning theories and be able to apply them in the classroom; in their study, they propose a summative table that includes basic principles, constructs, and classroom applications, indicating the role of teachers and learners in relation to each theory (Kay and Kibble, 2016). They present a summary of major learning theories paying attention to Behavioral (Behaviorism and Social Cognitive Theories), Cognitive (Cognitive Learning Theory), and Constructivist (Constructivism and Social Constructivism Theories) (Kay and Kibble, 2016, page, 23).

As a basis for the systematization of collected information in this chapter, the classification elaborated by J. Elías (2016) is used, in which the author relates the theoretical proposals corresponding to the psychoeducational and pedagogical dimensions of teaching practice as related disciplinary fields (Table 1). Based on this classification, Elías identifies theoretical proposals that obey different objects of study, that is, on the one hand, the disciplinary field of educational psychology (learning theories), and on the other hand, the disciplinary field of pedagogy (teaching approaches) (Elías, 2016).

Table 1 Psychoeducational and Pedagogical Dimensions of teaching practice.

PSYCHOEDUCATIONAL DIMENSION			PEDAGOGICAL DIMENSION		
Learning Theories		Psychoeducational Paradigms	Educational Paradigms	Exercise of Power	Teaching Approach
Environmentalists	Connectionism Behaviorism Contiguous conditioning Operant conditioning	Behaviorist	Focused on teaching	Coercive	Executive Approach
Cognitivist	Gestalt theories Information Processing Theories	Humanist Cognitive	Focused on learning	Persuasive	Cultivator Approach
Interactionists	Psychogenetic Sociocultural	Psychogenetic Sociocultural	J	Collective	Classic Liberating Approach Critical Liberating Approach

Source: Based on the multi-referential vision of teaching practice (Elías, 2016, page 87). The multi-referential analysis refers to "a plural reading of the objects, under different angles and depending on different reference systems, from which a reductability of one to another cannot be assumed a priori" (Manero, 1997, page 116).

Theories of knowledge and psychoeducational paradigms applicable to Ecotourism.

Among the learning theories with greater recognition and applicability to Ecotourism education are behaviorism, humanism, cognitivism, constructivism, and, social and sociocultural constructivism. In correspondence with each of these paradigms, educational proposals have been formulated based on their

own theoretical-conceptual frameworks, which has allowed the progressive development of Pedagogy and Education Sciences, especially during the twentieth century. Each of these theories has its own limitations and inadequacies, but their study and understanding serve as a guide to incorporate alternative forms of Ecotourism learning during the educational processes, which makes the paradigmatic, conceptual, methodological and instrumental understanding of each proposal necessary. The study of the psychoeducational dimension is carried out through two constructs, that of learning theories and that of psychoeducational paradigms as a derived concept (Elías, 2016).

• Behaviorism Learning Theory.

It represents a psychological current that is based on the description and explanation of observable human behavior according to the Stimulus - Response model, which assumes that before each stimulus is received a response is produced. The basic approach to behaviorism is based on the conditioning of learning, depending on which the change in behavior to external stimuli is explained. Currently, behaviorists use experimental procedures to analyze the observable behavior of subjects in interaction with their environment (objective explanation of behavior) and internal events such as feelings and thoughts (subjective explanation of behavior). The proposals of educational technology and programmed teaching correspond to this paradigm. In the behavioral model, structured and controlled study programs are developed based on which the teacher conducts the educational process frontally and directly in order to potentiate any type of desirable behavior, while the students assume a relatively passive and isolated role, so their participation is restricted, and the development of teamwork or autonomous activities is scarce. Among the main exponents of this theory are J.B. Watson, F.B. Skinner, and E. L. Thorndike.

• Cognitive Learning Theory.

The background of cognitive theories is related to different academic disciplines, such as psychology itself (Gestalt, Genetic Psychology and Sociocultural Psychology), which were forged in correspondence with the advances produced in the fields of communication and computer science. At present, cognitive theories include genetic-cognitive psychology (J. Piaget, J. Bruner, D. Ausubel, B. Inhelder), Genetic-dialectic psychology (L. Vygotsky, A. Leontiev, S. L. Rubinstein), and "cognitive psychology" (the Theory of information processing) (R. M. Gagné, A. Newell, H. A. Simon). This paradigmatic approach is focused on cognition as a way for the search, acquisition, organization and use of knowledge. Therefore, it has as its purpose the description and explanation of mental representation as a model of information representation, based on which it incorporates the categories of the cognitive (attention, perception, memory, intelligence, language, thought, among others) for the understanding of the complex mental phenomena that lead to learning (Vega, 1984; Gardner, 1987). In this sense, it takes as an approach the question of how information is processed, and presents learning as the result of the acquisition of knowledge, while considering the possibility of developing the cognitive potential of the subject that learns as a condition for the solution of problems.

Under this paradigm, the teacher is responsible for promoting the development of mental representations in their students with the purpose of ordering the information obtained through these representations, and thus promote the formation of learning skills; for this, different paradigmatic positions are assumed as the meaningful learning approach (D. P. Ausubel). For their part, the student is not a simple subject that responds to external stimuli, but instead becomes an active processor of information, capable of processing representations (models, schemes) that serve as the basis for interpreting and transforming reality. The proposal of projects and programs "to teach to think" and "to learn to learn" correspond to this paradigm. Among the main exponents of these theories we should highlight the work of F. Bartlett, J. Bruner, M. Vega, M. Gardner, and I. Pozo.

• Constructivism Learning Theory.

The constructivist theory of teaching and learning originates between the 1970s and 1980s. Although it is based on several preceding paradigms, derived from the classical theories of learning (Sociocultural

Psychology of L. Vygotsky and the Psychogenetic theory of J. Piaget) and Pedagogical theories (Critical Pedagogy of P. Freire, and Action-oriented teaching based on the theory of activity formulated by L. Vygotsky y A. Leontiev), this psychological current has a student-centered approach, and is oriented to the question of how knowledge is constructed, that is, how reality is known and how to learn, which reflects a transition from traditional practices of information exposure towards the construction of knowledge and personality.

Researchers and academics from different disciplines intervene in this area of study with the purpose of achieving meaningful and cooperative group learning, based on which the teacher must create learning situations that allow their development. Such situations must be supported by the presentation of problems and conflict scenarios, which favor the appropriation of working methods for their cognitive solution. Under this paradigm, the teacher is not a simple transmitter of knowledge, but a facilitator or mediator of the most favorable conditions for the learning of the students. Therefore, the main function of teachers is to guide the process in such a way that their students learn; in this sense, the teachers must relate the contents of the teaching with the needs, interests and previous experiences of their students, and promote the conditions for the full enjoyment of this process. On their part, the student is not a passive recipient of information, but an active subject, and at the same time is responsible for discovering and building their own learning, as well as providing meaning to that knowledge in order to transfer it into new learning situations. Some recent studies corroborate that learning is an active experience, so, the ideas that students have on the subject and the subject taught will be part of their learning experience, as learning is socially and culturally rooted (Sithara and Marikar, 2017). Among the main exponents of this theory we should highlight J. Piaget, and J. Bruner.

• Social Constructivism Learning Theory.

The theory of social constructivism in teaching and learning originates at the end of the 20th Century from the criticisms made to the theories of cognitive psychology and constructivism, regarding the need to consider the influence of context and social interaction during the learning process. This psychological current has its focus on the assumption that learning is based on participation and social negotiation, so that learning is conceived as an expression of the subject's interactions in a given situation, which is why, it constitutes a product of the activity, context and culture where it takes place. According to this paradigm, knowledge and personal growth processes are built in interaction with the socio-cultural context in which they take place, a premise that allows for enhancement of the significant learning of the student. The teaching and learning processes under this paradigm potentiate the creation of environments close to the reality of the student, the integration of their experiences prior to new learning, the development of learning strategies as tools for action, and the realization of learning group activities, among others. The cooperative learning proposal corresponds to this paradigm. At present, different studies related to the social constructivist perspective are carried out in different areas of knowledge, through which the explanation of learning is sought from this paradigmatic position (Bozkurt, 2017), an approach of great value for Ecotourism education. Among the main exponents of this theory we should highlight L. Vygotsky and B. Rogoff.

• Sociocultural Learning Theory.

The sociocultural paradigm arises from constructivism, and has its fundamental bases in the theory of knowledge -consciousness as a subjective reflection of objective reality-, and dialectical materialism. This paradigmatic trend recognizes the contribution of society to the development of the individual, and highlights the role of the interactions that are established between each subject and the culture of the context in which it operates, which is why cognitive development is carried out collaboratively. M. Simon and Thi Kim (2017) point out that Vygotsky's sociocultural theory is widely used in educational research, and relate this potential to the proposal made by this author regarding the four "genetic domains" to investigate higher cognitive processes, that is, phylogenetic (humans in natural evolution), the historical cultural (social activity of humans), the ontogenetic (individual life expectancy) and the microgenetic (immediate events) (Simon and Thi Kim, 2017).

The main focus of sociocultural theory (L. Vygotsky) is sociocultural learning, which recognizes that cognitive development cannot be isolated from human development, from the social, cultural, political and economic conditions in which it is carried out (development unit), highlighting the important function of education for this purpose. The proposal of "Zone of Proximal Development" (ZPD) corresponds to the sociocultural paradigm; this represents the distance between the level of real or effective development of the student, in which it is possible to solve learning problems faced by themselves (comfort zone), and the level of potential development in which they would require guidance or assistance for the resolution of these problems, since they are not yet able to perform them independently. This conception explains that in the learning process, there is always a zone of near development towards which the student's knowledge will advance under the guidance of the teacher, and that such learning can be stimulated and directed from the educational institutions.

Under this paradigm, learning is recognized as a social and interactive construction, in which a bidirectional and dynamic relationship between the subject-ecotourist- and the object (reality) adjusted to historical-cultural conditions, is established. For this, the main function of the teacher is to teach interactively and promote the progressive advancement of the students from their comfort zone (autonomous) to the area of near development (not autonomous), so that the knowledge and skills required are acquired to gain autonomy and self-regulation. At the same time, the students assume an active and leading role in the construction and reconstruction of their knowledge, so they play an important role in the elaboration of procedures that allow the solution of problems. In this way, they are capable of making the knowledge their own through a process of progressive internalization from an external plane to an internal one. Among the main exponents of this theory may be highlighted L. Vygotsky, A. Leontiev, and P. Y. Galperin.

Teaching opportunities applicable to Ecotourism Education.

Experiential Learning (C. Rogers, J. Gerstein).

The modern theory of experiential learning develops from the 1970s, despite having its antecedents in the postulates of J. Dewey. According to J. Seaman, M. Brown and J. Quay (2017) this approach describes a historical trajectory that began with training practices in human relationships in 1946, when it came to be understood as a natural psychological process and a basis for pedagogical reforms (Seaman, Brown and Quay, 2017). The main focus of this theory is learning through experience and own initiative, based on which a need to learn is recognized, so that experiences become the center of the learning process; at the same time, this approach assumes that the creation of meanings from the lived experience is more important than the simple accumulation of information.

Practical learning is a form of meaningful experiential learning in which the students interact with real-life experiences through direct observation and interaction with the environment, both personally, interpersonally and in teamwork. For this focus, Academic Study Practices play an important role, while recognizing that experiential learning is very useful for business careers, in programs such as business, accounting and finance (McCarthy, 2016; Cea, Sanhueza and Filgueira, 2018). Under this paradigm, teachers develop the ability of their students to learn from their own experiences based on a conceptual theoretical framework and well-planned objectives, leading to the development of skills that allow meaningful learning and possibilities of making decisions in new situations. On the other hand, the students assume an active role during the understanding of the reality in which they learn, reflect on the experience, conceptualize the experience, and apply their experiential knowledge to the solution of new problems.

• Discovery Learning (J. Piaget and J. Bruner).

It represents a constructivist teaching and learning approach oriented to the acquisition of knowledge through the active participation of the student, according to which their autonomous learning is promoted. In this sense, the teaching material presented to the student must be perceived as important and significant

for their learning; in this way, their actions will be decisive to achieve this goal. Learning by discovery requires the presentation of a real problem that represents a challenge to the student, encouraging their motivation to provide a solution. Teachers become a facilitator of the contents and materials so that the students can find an answer to the problems posed, by applying their own knowledge and previous experiences. In this context, students must be able to discover the learning content in a meaningful way, and solve the practical problems they face in their daily lives, so that they can transfer the learning to new situations and make decisions independently.

• Collaborative Learning (L. Vygotsky).

The concept of collaborative learning is sometimes used as a synonym for cooperative learning. Nevertheless, although some authors establish differences between both according to the functions of the teacher and the student with respect to the interactions that are established, in reality collaborative and cooperative learning are coincident in their theoretical bases, as they are supported in the theory of social constructivism (L. Vygotsky). With this didactic approach, students learn collaboratively in small structured groups, in which two or more members work with the same task or goal to be achieved. The learning is guided, and has a teacher-oriented purpose for the students to learn; participation is promoted through debates, solution of exercises and practical activities, group research, experiments, laboratory work, simulations, decision-making exercises, projects, guided visits, and fieldwork, among other alternatives.

In the opinion of R. Ferreiro, cooperative learning has a favorable impact on the critical selection, the creative application and the integral evaluation of the didactic techniques used, as well as on the conformation of the educational experiences that should be promoted during the mediation process between students and learning contents (Ferreiro, 2006). Thus, the construction of collaborative knowledge is determined by the way in which the activity is organized, and the way in which information is exchanged and socialized among the participants. The motivation of the participants, as well as their interactions "to give and to receive", the individual responsibility and commitment to participation, their communication skills, and autonomy for the performance of tasks are also important.

• Significant Learning (D. Ausubel).

This corresponds to the teaching and learning processes that are based on the previous knowledge of students, so this orientation is based on the theory of constructivism. With the approaches of this teaching and learning model "Information only becomes knowledge when it can be used" [so teachers must] "ensure that students have the opportunity to use knowledge in a meaningful way..." (Marzano and Pickering, 2005, p.5), since knowledge acquires meaning for the students only when they find a utility or application, that is, when it serves them in a practical way to understand and transform reality; in that sense, memorial learning by reception is not enough, since it does not require background knowledge. According to this model, the teacher plays a mediating role aimed at organizing relevant learning situations that will allow the learning of new content and the development of cognitive and metacognitive skills (ability to reflect on the way a person learns), in close interaction with previously assimilated knowledge. Consequently, the students are able to relate their previous knowledge and the experiences lived with the new learning content through a process of readjustment and reconstruction of knowledge, for which they must be motivated to learn by solving problems, and carrying out practical and laboratory activities.

Models and teaching approaches applicable to Ecotourism education.

• Problem-based learning –PBL- (McMaster University, Case Western Reserve University).

This learning methodology involves learning based on the solution of real problems through student research and reflection activities as a way to acquire knowledge, skills and attitudes, which is consistent with the approach of the theory of constructivism. Thus, the conceptual basis of Problem Based Learning is related to the following types of learning (Gutiérrez, *et al.*, 2012):

- ✓ Meaningful learning: new knowledge is built based on prior knowledge.
- ✓ Active learning: students learn "by doing" through active interaction with the subject matter.
- ✓ Student-centered learning: students are given responsibility for their own learning.
- ✓ Collaborative learning: students are organized in teams to learn based on their experiences.
- ✓ Learning based on discovery: solutions to relevant questions and content are sought.
- ✓ Critical reasoning: cognitive levels of analysis, synthesis and evaluation are established, which implies research, discovering new study materials, making judgments and making decisions.

In order to develop PBL, a problem must be presented to the students that serves as the basis for the discovery of new learning, and/or to identify scarcity or needs that are given at a specific time, with the purpose of finding a solution for them. Therefore, this focus favors the self-diagnosis of the learning needs as a way for the construction of learning and the integration of knowledge. In the opinion of J. Gutiérrez Ávila and coauthors, for the formulation of a good problem it is necessary to take into consideration the following aspects: it should be controversial; reflect a real-world situation; arouse the students' interest and induce them to search for a deeper understanding; be consistent with prior knowledge of the students; give students the need to make decisions and make judgments; stimulate collaborative work for its solution; and conclude with an open question for which there is no right or wrong answer, but possible solutions (Gutiérrez, *et al.*, 2012, p. 51).

The main functions of the teacher are to guide the students to be able to solve real-life problems based on a detailed planning of each learning situation, motivate the students and stimulate them to be able to apply their knowledge and identify new needs of learning, while promoting the development of communication skills and critical thinking. The students are the protagonists and are responsible for their learning process, work autonomously and collaboratively in solving problems and making decisions, while at the same time being able to evaluate their learning process and that of the rest of their classmates.

In the opinion of A. Rösner, M. Mair and H. Halkier (2016), "Higher education –especially education for management in hospitality and tourism– needs to adapt to the developments of the 21^{st} Century. To prepare students for their future careers, a new approach to education is required... adopting problem-based learning as the basis for their education" (Rösner, Mair and Halkier, 2016, page 1). To achieve this purpose these authors use the methodology known as "The Seven Steps of PBL", integrated into the following steps: clarify text and terms; define the problem(s); problem analysis; inventory of problems and solutions; formulate self-study objectives; self –study; and conclusion (Rösner, Mair and Halkier, 2016, pages 4 – 6).

• Project-based learning -PbL- (W. H. Kilpatrick).

This represents an educational methodology oriented to the collaborative management of learning through the development of a practical study project. This focus allows the students to appropriate knowledge, skills and competencies through the interpretation and investigation of objects, phenomena and processes of objective reality, in a way that encourages the relationship of their learning with a situation of daily life (challenge) to which they must find a solution. The main attributes of the PbL are that it is student-centered, promotes active learning and inclusiveness, generates a broad socialization, presents an open and flexible design, conceives evaluation as a continuous and formative process, and it is interdisciplinary (Gobierno de Canaria, 2012). In educational practice, the implementation of this methodological approach contributes to the development of the student's scientific culture, which is very valuable for ecotourism education.

The projects must contain clear and guiding objectives, as well as learning activities that stimulate reflection and respond to real situations faced by the students. Such projects should favor the construction of knowledge in a collaborative way and encourage creativity, therefore, they should be attractive, authentic and real. The basic components to build a PbL correspond to the establishment of an idea or topic which is relevant to the students; the elaboration of appropriate evaluation criteria; the approach of a guiding question or challenge;

the presentation of learning activities to be addressed during the development of the project; the final product to deliver, and the audience for the presentation (diffusion) of it (Gobierno de Canaria, 2012). To achieve this goal, the teacher plans learning tasks aimed at developing the creativity of the students, encouraging them to assess learning alternatives and argue important points related to the solution of cognitive tasks that allow them to build new knowledge. At the same time, the teacher supervises that the students have the information and resources necessary to develop the project successfully, promoting teaching strategies based on doing. In this context, the students face the project actively and critically, control their learning, and work autonomously.

There are other didactic proposals of applicability for the teaching and learning processes of Ecotourism. Among these are:

Inquiry-based learning, which promotes discovery learning by collecting data and researching a topic of interest.

Learning based on case study, through which the students build their knowledge using case studies that reflect problematic situations conducive to learning.

Learning in situ or Situated Learning, which represents a form of cognitive learning that promotes learning in real scenarios.

Learning by doing, represented by a constructivist methodology that assumes learning based on the approach of practical doing as a way to reach knowledge.

Learning based on Educational Technology, applied as a methodological approach of constructionism, which incorporates different Information and Communication Technologies (ICTs), such as WebQuest, digital learning objects, e-Learning platforms, and online learning approaches (Rodríguez and Ramírez, 2014; Harasim, 2017). Associated to this latest educational trend the following can also be used in Ecotourism education:

- The Virtual Laboratory as a virtual environment valid for experimentation.
- Massive Open Online Courses (MOOC) for massive and open online training.
- Open Educational Resources (OER) as a source of documents and multimedia materials for teaching and learning.
- Gamification by applying didactic games to teaching and learning.

Among other didactic proposals of applicability for the Ecotourism learning and teaching processes, the development of experiences outside the classroom is very important (for example, practicums -a college course prepared to give a student supervised practical learning related to a content which has been previously studied theoretically-, mobility activities, academic trips). Related to these didactic proposals, environmental learning (Castro, 2016) through **ecotourism interpretation** plays an important strategic role in the student's practical training.

References.

Alonso, C., Gallego, D., and Honey, P. 1995. *Los estilos de aprendizaje. Procedimientos de diagnóstico y mejora.* Bilbao: Ediciones Mensajero.

Alonso, C., Gallego, D., and Honey, P. 2006. Los Estilos de Aprendizaje: Procedimientos de diagnóstico y mejora. Edition: 7ª Publisher: Bilbao: Editorial Mensajero. https://www.researchgate.net/publication/311452891 Los Estilos de Aprendizaje Procedimientos de diagnostico y mejora

- Álvarez de Zaya, Carlos. 1999. *Didactics*. The school in life. Education and Development Editorial, Havana.
- Ávila, Sara. 2017. Las tres D en el tiempo libre: descanso, diversión y desarrollo. *Comunicae.es*. Publicado en Madrid el 27.12.2017. https://www.comunicae.es/nota/las-tres-d-en-el-tiempo-libre-descanso-1192288/
- Benckendorff, Pierre and Zehrer Anita (editors). 2017. *Handbook of Teaching and Learning in Tourism*. Edward Elgar Publishing journals. DOI: https://doi.org/10.4337/9781784714802
- Boluk, Karla and Corey, Johnson. 2016. Disrupting Traditional Pedagogy: Integrating Curriculum in Tourism Studies. *Tourism Education Futures Initiative (TEFI) Conference*. 14. http://digitalcommons.library.tru.ca/tefi/tefi9/day2/14
- Bozkurt, Gulay. 2017. Social Constructivism: Does It Succeed in Reconciling Individual Cognition with Social Teaching and Learning Practices in Mathematics? *Journal of Education and Practice*, v8 n3 p210-218 2017. https://eric.ed.gov/?id=EJ1131532
- Brijesh, Thapa (2019). Ecotourism Education and Development in Kazakhstan. *Journal of Hospitality & Tourism Education*, 31:2, 119-124. https://doi.org/10.1080/10963758.2018.1485499
- Camargo, Blanca., and Sanchez Villarreal, Isabel. 2016. Educators' Perceptions and Incorporation of Critical Perspectives in Tourism Programs: The Case of Mexico. 9th Tourism Education Futures Initiative Conference (TEFI9). Thompson Rivers University. https://digitalcommons.library.tru.ca%2Ftefi%2Ftefi9%2Fday1%2F11&utm_medium=PDF&utm_campaign=PDFCoverPages
- Castro, G. 2016. Proyecto de Educación Ambiental Comunitaria para el desarrollo de la Cultura Ambiental Turística en la población del Batey Reforma, Caibarién. Cuba. Tesis en opción al grado de Doctora en Ciencias de la Educación. Universidad Central Martha Abreu de Las Villas (inédito).
- Cea Rodríguez, Jorge, Sanhueza Burgos, Horacio and Filgueira Muñoz, Elba. 2018. Tipos psicológicos y estilos de aprendizaje de estudiantes de una facultad de ciencias económicas y administrativas en Chile. *RAN: Revista Academia &* Negocios. Vol. 1, N°. 4, págs. 65-80.
- Cervera, Amparo; Ruiz, M. Eugenia. 2008. Tourism education: a strategic analysis model. *Journal of Hospitality, Leisure, Sports and Tourism Education* (Pre-2012); Oxford Tomo 7, N. 2, (Nov. 2008): 59-70.
- Cole, Esther. 2019. Sustainable Tourism Pedagogy in Swedish Tourism Master's Programs: Higher education curriculum approach towards sustainable pedagogy. Dalarna University, School of Technology and Business Studies, Tourism Studies. OAI: oai:DiVA.org:du-29856; DiVA, id: diva2:1302555
- Coles, T., Duval, D., and Hall, M. 2005. Sobre el turismo y la movilidad en tiempos de movimiento y conjetura posdiciplinaria. *Política y Sociedad*, 42(2): 181-198. https://revistas.ucm.es/index.php/POSO/article/view/POSO0505230181A
- Colom Cañellas, A., and Brown González, G. 1993. Turismo y Educación (Bases para una Pedagogía del Turismo). *Revista Española de Pedagogía*. Año Ll, número 194, enero abril 1993. Pág. 57 75. https://revistadepedagogia.org/wp-content/uploads/2018/03/3-Turismo-y-Educaci%C3%B3n.-Bases-para-una-Pedagog%C3%ADa-del-Turismo.pdf
- Colton, C. 1987. Leisure, Recreation, Tourism: A symbolic interactionism view. *Annals of Tourism Research*, Vol. 14, N. 3, pp. 345-360.

- Cujía Guerra, E., Pérez Rojas, S., & Maestre Córdoba, D. (2017). Ecotourism, education, science and technology as factors of sustainable development. Case, Guajira, Colombia. *Educación y Humanismo*, 19(32), 174-189. https://doi.org/10.17081/eduhum.19.32.2540
- Duong, Hai Long; Fountain, Joanna; Stewart, Emma; Espiner, Stephen and Shone, Michael. 2019. Exploring the educative role of ecotourism guides in Vietnam. In: CAUTHE 2019: Sustainability of Tourism, Hospitality & Events in a Disruptive Digital Age: Proceedings of the 29th Annual Conference. Cairns, QLD: Central Queensland University, Australia, 2019: 116-126. https://search.informit.com.au/documentSummary;dn=413005512754589;res=IELBUS
- Elías Hernández, Juan Andrés. 2016. Compromisos e implicaciones que subyacen a la práctica docente en Educación Media Superior Una mirada desde la multirreferencialidad. Maestría en Investigación Educativa Aplicada. ICSA, UACJ. México. 236 pages.
- Ferreiro Gravié, R. 2006. Estrategias didácticas del aprendizaje cooperativo. El constructivismo social: una nueva forma de enseñar y aprender. Editorial Trillas. México.
- Fossati Marzá, R; Marín, A.; Pedro Bueno, A; Sancho, A. 2003. *Educando educadores en turismo*. Organización Mundial del Turismo. Madrid.
- Galles, Gary M., Graves, Philip E., Sexton, Robert L. 2018. Leisure and the Production Possibility Frontier: A Two-Step Pedagogy. *The American Economist*. Volume: 64 issue: 1, page(s): 123-130. Article first published online: November 1, 2018; Issue published: March 1, 2019: https://doi.org/10.1177/0569434518810425
- García-Allen, J. 2019. Los 12 estilos de aprendizaje: ¿en qué se basa cada uno? La explicación científica que está detrás de cada estilo de aprender. Director de comunicación de Psicología y Mente. Barcelona, España. https://psicologiaymente.com/desarrollo/estilos-de-aprendizaje
- Gardner, M. 1987. La nueva Ciencia de la Mente: Historia de la Psicología Cognitiva. Barcelona, Paidós.
- Gobierno de Canaria. 2012. Aprendizaje Basado en Proyectos. Kit de Pedagogía y TIC. Consejería de Educación y Universidades. España. http://www3.gobiernodecanarias.org/medusa/ecoescuela/pedagotic/aprendizaje-basado-proyectos/
- Gutiérrez Ávila, J., De la Puente Alarcón, G., Martínez González, A., and Piña Garza, E. 2012. *Aprendizaje basado en problemas. Un camino para aprender a aprender*. Departamento de Actividades Editoriales Secretaría de Servicios de Apoyo al Aprendizaje Colegio de Ciencias y Humanidades. UNAM. México. https://portalacademico.cch.unam.mx/materiales/libros/pdfs/librocch_abp.pdf
- Harasim, L. 2017. *Learning Theory and Online Technologies*. New York: Routledge, https://doi.org/10.4324/9781315716831
- Hernández, P., Hernández, C., Capote, C., and García, J. (2004). La percepción del alumnado de las teorías psicoeducativas de los mejores y peores maestros. *IV Congreso Internacional de Psicología y Educación "Calidad Educativa"*. Almería, España. Recuperado el 11 de Abril de 2015, de http://www.tafor.net/images/Comunica001.pdf
- Hjalmarsson, M. 2018. The Presence of Pedagogy and Care in Leisure-time Centres' Local Documents. *Leisure-time Teachers' Documented Reflections*. Volume: 43 issue: 4, page(s): 57-63. Article first published online: December 1, 2018, Issue published: December 1, 2018. https://doi.org/10.23965/AJEC.43.4.07
- Instituto de Investigaciones Turísticas /IIT/. 2003. Estado actual del conocimiento teórico acerca del desarrollo del turismo. ULSA, Cancún, México. En: Teoría y Práctica del Turismo. Texto Docente. Redactor Principal Ramón Martín Fernández. Universidad de la Habana, 2003. La Habana, Cuba.

- Jafari, Jafar. 2005. El turismo como disciplina científica. Department of Hospitality and Tourism. University of Wisconsin-Stout. *Política y Sociedad*, Vol. 42 Núm. 1, página 41, 2005.
- Kay D. and Kibble J. 2016. Learning theories 101: application to everyday teaching and scholarship. *Adv Physiol Educ* 40: 17–25, 2016; doi:10.1152/advan.00132.2015
- Labarrere, G., and G. Valdivia. 1988. *Pedagogía*. Segunda edición. Editorial Pueblo y Educación, La Habana, Cuba.
- Mair, H., and Sumner, J. 2017. Critical tourism pedagogies: Exploring the potential through food. *Journal of Hospitality, Leisure, Sport & Tourism Education*. Volume 21, Part B, November 2017, Pages 195-203. https://doi.org/10.1016/j.jhlste.2017.06.001
- Manero, R. (20 de junio de 1997). *Multirreferencialidad y conocimiento*. Obtenido de Tramas. Subjetividad y procesos sociales: http://tramas.xoc.uam.mx/resumen.php?id=919yarchivo=6-69-919gcg.pdfytitulo=Multirreferencialidad%20y%20conocimiento
- Marzano, Robert J., and Debra J. Pickering. 2005. *Dimensiones del aprendizaje. Manual para el maestro*. Instituto Tecnológico y de Estudios Superiores de Occidente (ITESO). Segunda edición. Jalisco. México.
- McCarthy, M. 2016. Experiential Learning Theory: From Theory to Practice. *Journal of Business & Economics Research (JBER)*, 14(3), 91-100. https://doi.org/10.19030/jber.v14i3.9749
- Miranda, G. 2006. El tiempo libre y de ocio reivindicado por los trabajadores. *Revista Pasos*. Volumen 4 Numero 3, septiembre de 2006, pág. 301 326. http://www.pasosonline.org/Publicados/4306/PASOS09.pdf#page=25
- Morín, Edgar. 2001. La cabeza bien puesta. Repensar la reforma reformar el pensamiento. Nueva Visión. Buenos Aires.
- Olmos K., and J. Rodas. 2014. KMoS-RE: Knowledge management on a strategy to requirements engineering. Journal Requirements Engineering. Volume 19, Issue 4, November 2014. Pages 421-440. USA.
- Ospina H., C. A. 2004. Disciplina, saber y existencia. *Revista Latinoamericana de Ciencias Sociales, Niñez y Juventud*, 2 (2), pp. 51-81.
- Pedroza, René. 2006. La interdisciplinariedad en la universidad. *Tiempo de Educar*. Vol. 7, núm. 13, enerojunio, 2006, pp. 69-98. Universidad Autónoma del Estado de México Toluca, México.
- Piñar Álvarez, Ángeles., García Segura, María Dolores., and García Campos, Helio. 2012. Ecoturismo y Educación Ambiental para la Sustentabilidad en la Reserva de la Biosfera de Los Tuxtlas (México). *TuryDes.* Vol. 5, N° 12 (junio/junho 2012). https://pdfs.semanticscholar.org/860a/8d77b5100e84dc1e763b15694572269efdba.pdf
- Pozo, Juan Ignacio. 2008. *Aprendices y maestros: la psicología cognitiva del aprendizaje*. Alianza Editorial. España.
- Ramírez, Fernando., and Santana Josefina. 2019. Education and Ecotourism. In: Environmental Education and Ecotourism. Springer, Cham. Pages 21-25. DOI: https://doi.org/10.1007/978-3-030-01968-6
- Robledano, Francisco, *et al.* 2018. Multi-criteria assessment of a proposed ecotourism, environmental education and research infrastructure in a unique lagoon ecosystem: The Encañizadas del Mar Menor (Murcia, SE Spain). *Journal for Nature Conservation. Volume* 43, June 2018, Pages 201-210. https://www.sciencedirect.com/science/article/abs/pii/S1617138117301218#!
- Rocha, Rogelio. 2011. *Metodología de la Investigación aplicada al Turismo. Casos prácticos*. Editorial Trillas. Reimpresión 2011. México.

- Rodríguez García, A.B., and Ramírez López L.J. 2014. Aprender haciendo-Investigar reflexionando: Caso de estudio paralelo en Colombia y Chile. *Revista Academia y Virtualidad*, 7, (2), 53-63.
- Rösner, Anja; Mair, Michael; and Halkier, Henrik. 2016. Problem-Based Tourism Learning. Principles, applications, experiences. Published May 2016 by Department of Culture & Global Studies, Aalborg University, Denmark. 27 pages.
- Sancho Pérez, A. 1995. *Educando educadores en turismo*. Organización Mundial del Turismo, Instituto de Turismo, Empresa y Sociedad: Universidad Politécnica de Valencia. España.
- Sandoval Medina and Eric Omar. 2015. Sistema localizador de especialistas basado en técnicas de gestión y representación del conocimiento en el dominio de crisis de turismo. Requisito para la obtención del título de Ingeniero en Sistemas Computacionales. Departamento de Ingeniería Eléctrica y Computación. Instituto de Ingeniería y Tecnología. UACJ. México. (Inédito).
- Santana, Agustín. 1997. Las Tipologías: Necesidad y Criterios. En: Antropología y turismo ¿Nuevas hordas, viejas culturas? Editorial Ariel. Barcelona, España: 29-46.
- Seaman, Jason, Brown Mike, and Quay John. 2017. *Journal of Experiential Education*. Volume: 40 issue: 4, page(s): NP1-NP21. Article first published online: January 29, 2017, Issue published: December 1, 2017. https://journals.sagepub.com/doi/abs/10.1177/1053825916689268
- Simon Marginson & Thi Kim Anh Dang. 2017. Vygotsky's sociocultural theory in the context of globalization. *Asia Pacific Journal of Education*. 37:1, 116-129, DOI: 10.1080/02188791.2016.1216827
- Sithara, Fernando and Marikar Faiz. 2017. Constructivist Teaching/Learning Theory and Participatory Teaching Methods. Journal of Curriculum and Teaching, v6 n1 p110-122 2017. https://eric.ed.gov/?id=EJ1157438
- Tazim Jamal, T., and Smith, B. 2017. Tourism Pedagogy and Visitor Responsibilities in Destinations of Local-Global Significance: Climate Change and Social-Political Action. *Sustainability* 2017, *9*(6), 1082; https://doi.org/10.3390/su9061082
- Teplicancova, M., Almasiova, A., Krska, P., & Sedlacek, J. 2017. Social Environment Selected Aspects Determination by School Children Leisure Time Movement Activities. *GYMNASIUM*, *XVIII* (2), 187-194. doi:10.29081/gsjesh.2017.18.2.15
- Torres Fernández, César David., Zaldívar Martínez, Pablo., and Enríquez García, Fabián. 2013. Turismo Alternativo y Educación. Una propuesta para contribuir al desarrollo humano. *El Periplo Sustentable: revista de turismo, desarrollo y competitividad*, N°. 24, 2013, págs. 125-154. https://dialnet.unirioja.es/servlet/articulo?codigo=4195434
- Urías, G. 2013. Tema IV: La Pedagogía como fundamento del autodesarrollo comunitario. Doctorado en Desarrollo Comunitario. UCLV. (Inédito).
- Vega, M. 1984. Introducción a la Psicología Cognitiva. Madrid, Alianza Ed.
- Zavydivska, N. Zavydivska, O. and Khanikiants, O. 2019. Features of free time pedagogy in the conditions of health preserving study of students. Edition 13, 2019 Pages 15 22. Doi: 10.32626/2227-6246.2019-13.15-222