

Practice of dissection as teaching methodology in anatomy for nursing education

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Abstract

This study is focused at nursing education in the biological and health sciences field, specifically in terms of knowledge of anatomy and the application of dissection as a teaching practice in the light of active pedagogies. The objective was to assess the importance of the practice of dissection to teach anatomy in a graduation course in nursing. The hypothesis that the students would be more interested in discipline if the teaching methodology used was based on creative and constructivist methods, in relation to traditional teaching methods. The sample comprised 37 students, among those who actually had the practice of dissection and those who had not in a federal university. The mediation of the teacher and the contact with classmates during the discussions in the course of “learning to learn”, are important factors in the training of the academic in the view of the active methodology. The performance of the student as active subject in the teaching process allowed the construction of a concrete knowledge. The constructivist methodology associated with dissection enabled the construction of know-how and greater interactivity between students and teachers involved in the teaching-learning process.

Keywords: teaching, nursing education, anatomy, dissection.

1 Introduction

The process of training health professionals is becoming increasingly complex in order to meet the health needs of the population, in a wide concept of health (BRASIL, 2007) with great potential for solving health problems in primary care (SANTOS, 2009).

The objective is that the performance of health professionals could exceed supplying the demand for job positions in the sector, including a complex practice with listening attitudes of professional-user interactions, which determine the quality of care (CECCIM and FEUERWERKER, 2004). This represents a dynamic field, full of intersubjective aspects that emerge in the everyday relationship with those who we care, and that goes beyond the knowledge of diseases (MATTOS, 2004).

These are challenges to be faced by all involved in the teaching-learning process, among them, health managers, Higher Education Institutions (HEIs) and subjects from the teacher – student process. Thus, the topic of interest to this study is designed, which is the process of health care professionals’ formation, highlighting the formation of nurses in the current context of changes.

To meet these changes, some guidelines are printed to the curricula of undergraduate nursing through the National Curriculum Guidelines (NCG) that favors the formation of general skills in health care, decision making, communication, leadership, administration/management and continuing education. However, the nursing program should include contents in health and biological sciences, humanities and

social nursing (BRASIL, 2001). Among the contents of biological and health sciences, the teaching of anatomy is interesting, which in the context of curricular changes in nursing, has been through criticism and amendments without establishing clear criteria to ensure a training that meets contemporary requirements.

Recently, many of these changes are reflected in the simple need to decrease the workload of the various disciplines in biological sciences and related areas. Especially in human anatomy, this condition often results in the withdrawal of the practice of dissection as a teaching means in the discipline. Regardless of arguments for and against the withdrawal of the practice of dissection, it would be at least prudent to study the relationship between convenience and efficiency in the learning of students that should study anatomy in models far from reality and/or to learn anatomy using human parts, without dissecting them. Another reasonable measure would be to check the desire of the students in applying the discipline of human anatomy with or without dissection, because, as can be seen in its history, animals were used to train the dissection, with the advantage that new surgical and clinical methods should be tested first on animals.

The teaching of anatomy has been administered in the same way since the time of its initiation as a science. Currently, many people do not consider it as science because they believe that the description only, is not science. However, without the basic description, sciences related to anatomy would not have emerged and remained, not mentioning that many

species studied in behavioral terms do not have anatomical description, which can be shown, since some authors are wrong when behavioral aspects analyzed are dependent on inexistent anatomical studies (AVERSI-FERREIRA, 2009).

Despite the difficulties of teaching anatomy and morphology, in general, some authors have introduced alternative methods, which are well accepted by students, so that teaching and therefore learning become more effective (AVERSI-FERREIRA, MONTEIRO, MAIA et al., 2008, FREITAS, BARROSO, RODRIGUES et al., 2008).

Skinner (1991) peremptorily states that it is necessary to have schools where teachers are available to teach students the development of a wide variety of skills. Veiga and Castanho (2000) argues that despite the technical sophistication, pedagogical activities have always been in the perspective of education for human beings and emphasizes that the teaching techniques are not natural to the teaching process, but they are conditions that give access to it.

Thus, the teaching methods, which have recently evolved significantly in terms of effectiveness and psychology, creating new methods and concepts, can and should be an important tool for the teacher of morphological sciences, especially anatomy, to use in their daily activities.

Specifically, education can be understood as a continuous improvement, a continuous quest for wholeness, and in a broad sense, it means any improvement, whether in physical or psychological aspects. The task of education is precisely to promote growth, to help the individual to become a person, to increase his value and make him self-conscious, improving in rationality and feeling, since it is a continuous process of correction of path in the improvement of man (WERNECK, 1996).

According to Pimenta and Anastasiou (2002), the teaching at the university is a search process, scientific construction and criticism of the knowledge produced, that is, its role in building society, and the tasks of education are, among others, to provide the domain of a set of knowledge, scientific methods and techniques that ensure the scientific and professional training of a specific field, to lead to a gradual independence of students in seeking knowledge, to develop the capacity for reflection, to replace the simple transmission of contents by a research process of knowledge, to integrate the research activity of students to the teacher's activity, to create and recreate learning situations and develop more interactive and participatory teaching and learning processes. This demands teaching activities different from those traditionally used, a posture as a reflective, critical and competent professional within his discipline, which requires besides teaching, conducting research activities.

Tavares and Alarcão (2001) consider that the traditional paradigm of education, the higher education teachers teach, transmit and explain to students the normal science available and then classify them as if it was "filling empty containers and verifying if they are full"; the good teacher is a good explainer, who knows how to transmit difficult things in a manner accessible to students (BEBRENS and OLIARI, 2007), the emphasis is on the teacher, on the knowledge and its acquisition; therefore, the teacher-student relationship is distant, of superiority, because the teachers has all the knowledge and the student is passive, receptor of information, so, the good student is someone who learns the entire program and correctly answers all the questions on it.

It is worth observing that the teaching of anatomy has been following this rhythm and precept since immemorial times. This fact is not difficult to be understood, because throughout history, the anatomy was chosen by few to be a career, and its knowledge grew with the development of man, since the number of cranial nerves in humans was not different in the time of Erasistratus and Galen, and the verification method was the same, the dissection, so, this seems to indicate that education accumulated over time turned man more methodical and disciplined in learning.

However, the anatomical study requires patience, concentration, concatenation and interpretation, without which one memorizes structures and concepts without knowing them and relating them, and these positive aspects are characteristic of people with natural ability, inherent in an anatomy teacher. Therefore, the domain of an area of difficult learning must offer a feeling of power and personality, which passed through generations, characterizes the anatomy teacher up to present times, keeping the traditional paradigm of education in this science inert and inflexible, creating a well-known conservatism.

Moreover, in the post-modern paradigm, where the student is the builder of his knowledge, less teaching and more learning are recommended.

Brzezinski (2005) considers that in this new teaching process, it is no longer possible to separate teaching from learning, they co-exist. In this new paradigm, one recognizes the importance of helping students to think, reflect and discover the world. Thus, the anatomy, due to the practical study of parts, may provide an important mechanism for the modern learning, because the student will be able to discover the organs for their own search, engendering effective and practical associations.

Knowing is not enough, one needs to "know how to do it", and the teacher will only develop a good work if he has teacher training and knows "what", "what for", "why," "how", "when" and "where" to work with students (CASTANHO, 2000). It is thought to bring learners to the total doubt of all their certainties and help them build knowledge from themselves (TAVARES and ALARCÃO, 2001), so, teachers and students both learn and develop a partnership for this (BRZEZINSKI, 2005; NÓVOA, 2002).

In this new paradigm, the center of the process is no longer the teacher, the teaching, and becomes the student, the learning. The learner is the main agent and responsible for his learning (SILVA and REZENDE, 2008; CUNHA, 1989; MASETTO, 2003). The student is the protagonist because he becomes the subject of learning and the teacher is the protagonist because he is the one who mediates the student with the objects of knowledge (GODOY, 2002; VEIGA and CASTANHO, 2000). Questions such as why the position of the heart in humans is cranial and the symmetrical features of organs to walk and dexterity derived from the location of the thumb can be made for the student to construct his conception of reality and the importance of anatomical studies.

Learning, according to the cognitive-constructivist theories is the personal construction resulting from an experiential process of the own person and that translates by a modification of relatively stable behavior. It is a dynamic process, a personal experience that leads to the construction

of knowledge. It is a personal act, internal to the learning individual, although it could be directed and organized externally. It goes beyond the acquisition of knowledge, together with the ability to process them and store them into the memory (ALMEIDA and TAVARES, 1998; BORUCHOVITCH and BZUNECK, 2004; VALLE, 2006), seizing upon them in real situations. Therefore, it is different from the simple acquisition of information, provided by the traditional paradigm.

Thus, learning occurs more effectively when the student experiences the contents/knowledge objects using various reception channels and processing of information (auditory, visual, tactile, kinesthetic, and others), because learning occurs from the interaction between subject and environment. It is easier if this interaction takes place through various channels and when new information has personal meaning, i.e., there is motivation to learn (ALMEIDA and TAVARES, 1998; VALLE, 2006). For learning to be meaningful, it must lead to a modification of relatively stable behavior; for example, promoting the performance of tasks not possible before (ALMEIDA and TAVARES, 1998).

An interesting way to verify that the biceps muscle is the main flexor of the forearm is to ask students to flex their forearm with hand in pronation and in supine position, and with the other hand to squeeze the biceps to feel the contraction, thus, they will find that the biceps muscle acts in the flexion of the forearm with the hand in supine position, also being in supine position and that its flexing action on the forearm with the hand in pronation is minimal or nonexistent.

In the context of this new concept of learning, the role of the teacher must go beyond mastering contents, disciplines and managing situations of teaching and learning; he must be an educator, a transmitter of knowledge and skills, a supervisor, a guide, a tutor a mediator. Learning should enable the establishment of bases for the construction of knowledge without taking their initiative and action. It should also reflect on their practice and promote a division of labor with the student, each with their responsibilities, rights and duties (ALMEIDA and TAVARES, 1998; LIBÁNEO, 2000; TAVARES and ALARCÃO, 2001).

In most cases, the student who comes to university from an educational system that aimed at passivity, information receiving, memorization, individualism, only interested in the grade believes that a good teacher is one that explains the contents well and holds the students' attention (PIMENTA and ANASTASIOU, 2002). Therefore, he considers himself out of the teaching-learning process and wants to avoid this responsibility (FURLANI, 2004). However, this student needs to consider himself as active learner responsible for his learning (TAVARES and ALARCÃO, 2001), and it is up to the teacher the task of encouraging him to become active, critical and reflective, teach him to "learn to learn", which is already an old concept, because according to scientist Galileo, "one cannot teach a man anything, only help him to learn by himself".

For teacher and students to be protagonists of the teaching-learning process, it is up to the teacher to choose the teaching procedures suitable for the construction of knowledge by students. Teaching procedures are technical means used to accomplish an educational proposal. To choose the teaching procedures, the teacher must have

clear goals, goals that he wants to achieve with his students. It is necessary that the choice of the method has specific criteria and be consistent with the teaching proposal of the teacher. The lecture method, for example, is important for the student to assimilate the knowledge, to be in contact with it, however, the reception of knowledge is little for the student to develop skills and form habits, so, it is necessary to exercise this knowledge. Exercising knowledge requires more active methods (LUCKESI, 1999) to be effective.

Thus, the student is no longer an information receiver and starts having a reflective and active attitude on the knowledge. The practical activity of students is a field of experience for the acquisition and production of knowledge, making the association between theory and practice possible, so, the college classroom is the locus of productive learning (VEIGA and CASTANHO, 2000).

The objective of this study was to test the hypothesis that students are more interested in the discipline of anatomy if the teaching method to be used is based on creative and constructive methods when compared to traditional ones, using the possibility of dissection as instrument in the discipline of human anatomy for the nursing course.

2 Material and methods

Practical lessons in human anatomy were given for Nursing students from a Federal Higher Education Institution (IFES) from the Midwestern region of Brazil (GO), using a methodology based on constructivism in which the student seeks to understand the material studied with the aid of a guide. The traditional teaching at the university is conducted with students seated around the anatomical tables with exposure of the parts, where the teacher shows to a class of about 20 students, and soon after the demonstration, the class is finished.

In the methodology of the article, students were divided into sub-groups of five to locate the anatomical structures required with the aid of a script, previously developed by teachers, atlas of human anatomy, a textbook and under the mediation of teachers and monitors. The students should read the script, the name of the structure, read in the textbook on the structures to be studied and to form a theoretical idea on the subject. Sometimes a student read to the group before the beginning of practical studies, which, often, generated discussion and doubts to be resolved by other students, monitors and teachers. A corpse has been made available so that students could train the dissection with teacher guidance, both to find structures that were not evident in other corpses or parts, and to train the use of scalpel, scissors and tweezers.

A semi-structured questionnaire was applied (Chart 1), containing 4 objective questions, including room for suggestions and comments for the 9 students who carried out the dissection in order to assess learning, participation, interest and satisfaction of students with the use of a more active and participatory teaching-learning methodology based on constructivism using dissection as tool, and for the other 31 students who did not choose to dissect, the same questionnaire was applied without question number 4, and from these, 28 responded it. The students filled the Term of Informed Consent (IC), considering the low risk to

the subjects; only the bother of answering some questions, according to Resolution 196/96 (BRASIL, 1996).

For the statistical analysis of data, the frequency of responses from 1 to 3 was calculated (Chart 1) for both groups and the correlation analysis was applied by calculating the correlation coefficient (r) associated with the t -test and the H_0 hypothesis was considered: the variables are independent for $p < 0.01$.

3 Results

The correlation coefficient (r) is performed when the variables cannot be considered independent from each other (CENTENO, 1982), since students from groups 1 and 2 had classes with the same teachers and monitors, the response should hypothetically have certain dependence; therefore, the regression analysis is not satisfactory. In this study, group 1 was considered as variable x_1 and group 2 as variable x_2 . The zero value of " r " indicates independence of variables and values $+1$ or -1 indicate maximum correlation.

For question 1 of the questionnaire, students from Group 1 marked only answers 2 and 4 and the modal class was answer 4 "dissection of anatomical parts", with 55.56%, and answer 2 had 44.44% of frequency, with an amplitude between both of 11.12%, while students from Group 2 marked all the alternatives and the modal class was answer 2 "The way the teacher explained the contents" with 46.43%, followed by answer 1 "The dynamics of the teacher in the classroom", with 42.86%, with a range of 3.57% between them. The value of " r " for these data was 0.095 and for $p < 0.01$, H_0 is accepted (Figure 1).

Question 2 had as modal class for group 1, answer 2 "improves learning, since it allows the formation of mental images closer to real and dynamic structures and

facilitates the association between theoretical and practical concepts" with frequency of 88.89% and only alternative 1 was marked by 11.11% and both are based on the term "improves learning ...", the amplitude between both classes was of 77.78%; group 2 had as modal class alternative 2 with 71.43%, followed by alternative 1 with 17.86%, with amplitude between the two classes of 53.57%. The value of " r " for these data was 0.98 and for $p < 0.01$, H_0 is rejected.

The students from Group 1, for question 3, determined the modal class for alternative 5 "More than one alternative mentioned, which one", with 33.33% of frequency, and for this alternative, items 2 and 4, together, were cited 2 times, items 2, 3 and 4 together were cited once, students from group 2 determined as modal class alternative 2 "It would help the learning obtained in the discipline of Human Anatomy already taken" with 50% of frequency, and for alternative 5, items 2 and 3, together, have been cited 4 times, items 2 and 4, 1 time. The value of " r " for these data was 0.47 and for $p < 0.01$, H_0 is rejected.

The answers from Group 1 for question 4 had as modal class item 1 "Opportunity to improve their knowledge on anatomy", with 33.33% of frequency, followed by answer 4 "close association between the various systems and tissues for use in topographical or regional anatomy", with 22.22% of frequency, with a range of 11.11% between both alternatives.

4 Discussion

In research conducted by Furlani (2004), college students stressed the importance of classes and teaching mediation to their training. They face challenges with motivation and enthusiasm, being invited to constant actions (activities) and to develop own productions under the guidance of teachers. The

Chart 1. Questionnaire answered by students from Nursing Course on the anatomy classes taught in the year of 2007.

Questions			
Question 1: In anatomy classes, taken in previous semesters, select what most attracted your attention:	Question 2: In your opinion, what is most important about dissection for the learning of Human Anatomy:	Question 3: Would you take a discipline with emphasis only at dissection of corpses, why?	Question 4: What most attracted your attention in the corpse dissection course?
The teacher's dynamics in communicating with students;	Improves learning, since students perceive the most realistic aspect for the acquisition of future professional expertise;	I would not;	Opportunity to improve my knowledge on anatomy;
The way teacher explained the content;	Improves learning, since it allows the formation of mental images close to real dynamic structures and also the association between theoretical and practical concepts;	It would help in the learning obtained in Human Anatomy course already taken;	Possibility of professional improvement;
Audiovisual resources used by teachers;	Impairs learning, since the contact with corpses leads to behavioral inhibition associated to general fears and ethical aspects;	It would help my future professional learning;	Analysis of organic systems with higher possibility of interaction with medical reality;
Dissection of anatomical parts;	Impairs learning, since it does not help the understanding of theoretical concepts;	More than one alternative mentioned above. Which?	Close association between the various systems and tissues with the use of topographic and regional anatomy;
Others.	Others.	Others.	This discipline is not attracting my attention;
-	-	-	More than one alternative. Which?

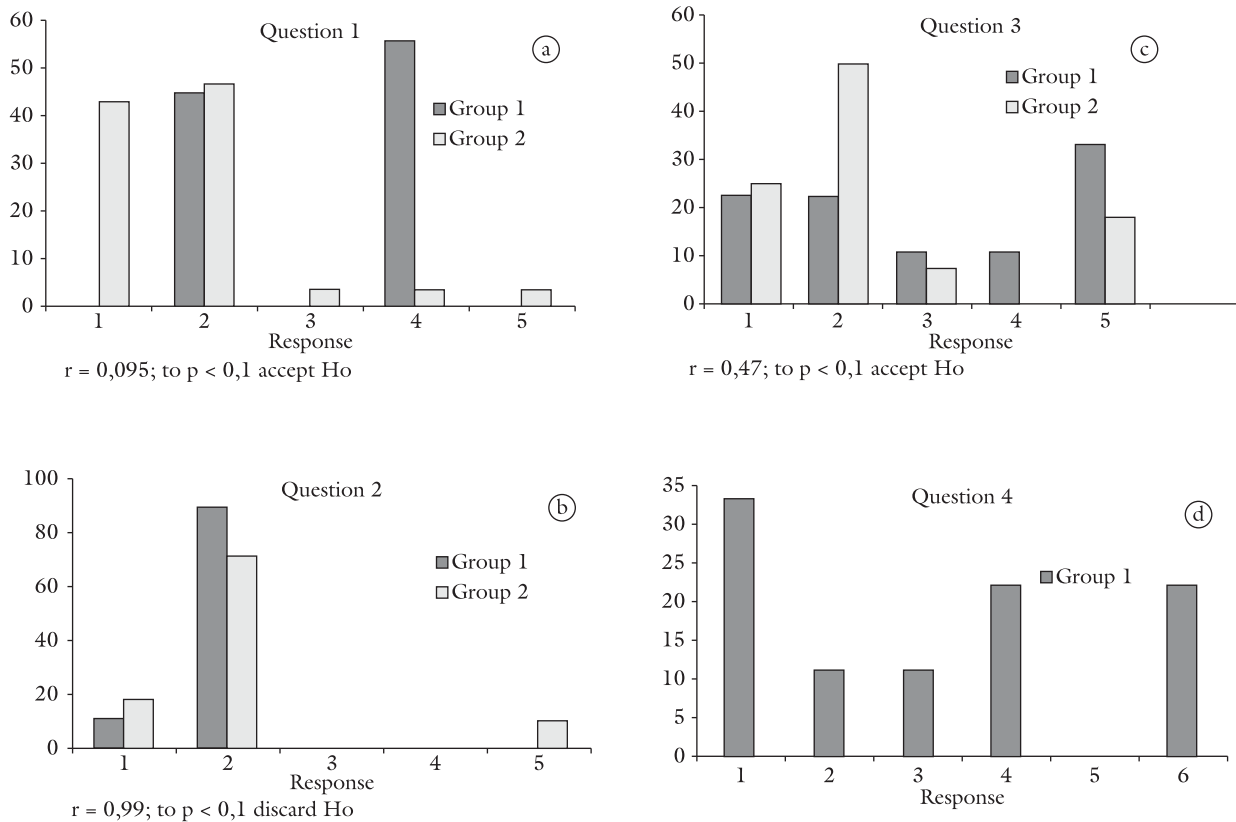


Figure 1. Group 1 represent the responses of students that done the dissection and the group 2 represent the responses of students that not done the dissection. Group 1 is represented by students who carried out the dissection of corpses and group 2 by students who did not. Questions from 1 to 3 were answered by all students and question 4 only by group 1. Below each graph answered by both groups, the value of the correlation coefficient (r) and the definition of acceptance or rejection of the hypothesis of independence of variables are shown, according to the t -test for $p < 0.01$.

extent of the classes cannot then be relegated to the status of mechanical and static techniques, in which the students do not exercise their competences, being excluded from the teaching – learning process when knowledge is nothing else than showing the contents, without dialogue and individual and collective development of themes, when knowledge is detached from the reality of the student, with inefficiency in connecting theory with practice and when the contents are not a progressive and complementary sequence. The responses of nursing students from group 1 and 2 for question 2 proved the assertion of Furlani (2004), as most respondents indicated the overall theme “Improving the learning ...” and the modal class was the item that, in a specific way, suggests “... enables the formation of mental images closer to real dynamic structures and facilitates the association between theoretical and practical concepts”.

In this case, the association between theory and practice was the most mentioned by students. Both groups had alternative 1 as second most cited answer, which associates knowledge on anatomy with the acquisition of a future professional experience, in fact, the association between both groups was clear from the correlation coefficient data with acceptance of the dependence hypothesis between variables and low amplitude between the most cited answers.

Even students with relative cognitive ability may have different cognitive styles, i.e., have differences in the way of

perceiving, organizing and resolving situations (ALMEIDA and TAVARES, 1998).

In methodologies in which the student is active and participatory, this difference is respected and each one learns his way and his time. The nonuse of active methodologies by the teacher makes the construction of knowledge by the student difficult, which becomes a mere information receiver.

Active methodologies, based on sound constructivism, allow students to build their teacher-mediated knowledge.

According to Boruchovitch and Bzuneck (2004), the information coming through visual or auditory stimuli, as normally occurs in traditional methods, go to the sensory memory of the individual, staying for a few seconds, and if they do not move to the short-term memory, these information will be lost, and this requires a stimulus, such as attention (easily lost in a long lecture classroom) or interest. Therefore, the short-term memory shows little information and for a short period of time and this information will be lost if not repeated, used and/or processed and stored in the long-term memory.

Information can only be retrieved if stored in the long-term memory, (BORUCHOVITCH and BZUNECK, 2004) and only what can be retrieved by memory can be considered as learning. Based on neurological-behavioral aspects, it can be inferred that learning only conducted in lecture classroom is difficult to be kept, particularly if showing students

anatomical parts indicating them for about twenty students at a certain distance from them without meditating, reading, manipulating and having a closer contact with them.

Thus, meaningful learning occurs when the student participates as an active subject of the teaching and learning process in partnership with the teacher and peers in the classroom, seeking information, giving meaning to them, comparing them with their intellectual world, integrating theory and practice and finding solutions to problems raised (GOMES, DIAS-COELHO, CAVALHEIRO et al., 2008; MASETTO, 2003).

In this context, each question in the questionnaire placed the student in the reality experienced during the lessons. Clearly, these students agree that some contents should be learned through practical constructivist activities, using teaching techniques that provide viewing conditions and understanding of the part studied, even by students who chose not to perform the dissection. In fact, data from this study clearly indicate in question 1 the opinion of the teacher on behalf of teaching with higher participation from students, as group 1, who performed self-taught learning activities has item 4 as the most frequently mentioned answer “dissection of anatomical parts”, whereas group 2 had as modal class item 2, with little difference from item 3, which are respectively “The dynamics of the teacher to communicate with students” and “The way the teacher explained the content”.

This improves enhancers (consequences that increase the frequency of the previous behavior), because in a way, when the student finds out a structure, he has the feeling of accomplishment and increased self-esteem because he is the author of his learning, obtaining a powerful reinforcer, which is the immediate success of his actions associated with a recent accomplishment, which occurs in the discovery process provided by the constructivist methodology employed, as for the dissection method as an adjunct of this process.

Skinner (1991) mentions that students often begin with knowledge by description, they are taught about what can be done and what will happen when something is done, and if what they learn is useful, then, eventually, they will acquire knowledge by understanding when their behavior has reinforcing consequences. But this usually happens much later, possibly after graduation, so, conventional teaching methods prepare students for a world excessively remote, thus, the problem affecting the current practices of classroom is that students rarely do things that are immediate or visibly enhanced.

The fact of achieving finding a structure similar to that of the textbook or atlas already gives the student a previous satisfaction with his learning about the content involved, associated with the fact that he consulted the books several times and reviewed the contents with colleagues. Probably, the students felt involved in the teaching-learning process when acting directly on the acquisition of knowledge. This feeling tends to become commitment to training, which is reinforced by an efficient exposure of the contents by the teacher.

Such data are evident in the responses from both groups in question 3, in which the modal classes were most frequently mentioned were item 2 for group 2 and 5 for group 1, but in item 5, items 2 and 3 were the most commonly cited as “others”, hence the general term “Helps learning...” was widely accepted by students.

It is evident that the commitment to the training of students can and should make the student more demanding with the teacher because the teacher is no longer the only source of knowledge of the student during class, since he acquires more theoretical and methodological background to question him. This leads to a better teacher training and makes the student learn to learn, alone and in groups, generating secondary auto-didactic mode of learning, i.e. it meets the principles of self-construction of knowledge by facilitating enhancers.

The students-teacher approach was a reality in this work, thus responding to the distress of many researchers (RODRIGUES, FIEDLER, SANTOS et al., 2004), reducing the difficulty of learning (PEROTTA, FIEDLER, SANTOS et al., 2004). In this type of study, students always needed theoretical and technical support from teachers and mentors, and research constantly in the textbook so that learning becomes reliable to the reality that the student expects. This survey of data contained in the textbook also led to greater contact between students and the study material, as observed by the answers given by students who never experienced this methodology (AVERSI-FERREIRA, MONTEIRO, MAIA et al. 2008; FREITAS, BARROSO, RODRIGUES et al., 2008).

According to Ferraz and Terrazan (2003), the need for the use of analogical reasoning helps in the understanding of scientific knowledge, as it approaches heterogeneous subjects, such as learning and memory in real and virtual terms. In the specific case of anatomy, the analysis relationship is performed between the oral dissertation of the student with the group or writing in the textbook, and the visual image of the parts of most atlas with the reality that he finds when seeing the dark part is difficult to identify in the corpse. In this context, the constructivist methodology approaches these heterogeneous views, as observed in data from this article, since group 1 responded in Question 4, the modal class, that the dissection has provided greater opportunity to improve knowledge on anatomy, and group 2 indicated this perspective in the answer given by the majority to the question, which modal class was item 2.

Another factor covered in this teaching technique was the commitment of students with their learning and development of a skill highly valued in the labor market, to work as a team. Novaes (1999) advocates the use of new educational practices as a way of empowering people to become authentic protagonists of their vital pathways through enhanced cooperation, self-esteem, an effective availability to one another, thus constituting a real agent of social change and cultural transformation. This aspect was verified in the methodology described here by the formation of working groups where the students studied together, often without their own material. Thus, the owner of the book lent it to the study group or the study group borrowed the book from the library.

Literature, teaching practice and questionnaire applied to students emphasize the importance of the active student participation in the learning process and the need for the construction of knowledge by the student so that learning is really significant and reflects in the formation of critical, reflexive and qualified professionals.

The teachers of this method agree that the students felt more motivated, interested and interacted more in classroom. The teacher's role became nobler, since he is no longer a mere transmitter of knowledge that students could acquire by any other

medium (literature search, digitalized information and others) and became a mediator, a partner of the students in this search. The attempt to break with traditional teaching in the health care field was also perceived by other researchers, who reported a pro-change movement, both of curricula and active pedagogical approaches; however, there is a long way to go until this can impact in practice (ERDMANN, RODRIGUES, KOERICH et al., 2009). Thus, this study is a movement with possibilities of changes in teaching practices, without dropping or denying the action of dissection as an anachronistic method, but useful in mediating the teaching of anatomy, since the essence of this method is not only in using it, but how to conduct it.

5 Conclusion

In short, the possibility of using the constructivist method in the teaching of anatomy for students involved in this work was accepted at the expense of traditional methods and verified by responses given to the questionnaire. The use of the constructivist methodology associated with the dissection has provided the formation of knowledge with increase of learning enhancers, greater interactivity between the students with themselves and with teachers and greater association between theory and practice.

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