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**Recommended Citation**  
Available at: https://uzjournals.edu.uz/capmse/vol4/iss2/16

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THE IMPORTANCE OF INTERACTIVE TEACHING METHODS IN IMPROVING THE LEVEL OF CLINICAL KNOWLEDGE OF STUDENTS

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Annotatsiya. Ushbu maqola ichki kasalliklar propedevtikasi bo'yicha "miya bo'roni" va "akademik polemika" ni qitishning interaktiv usullaridan foydalanish natijalarini taqdim etadi. "Miya bo'roni" ni o'rganishning interaktiv yo'li asosan I (tanishish) va II (nusxa) bilim darajasini yaxshilashga yordam berdi. Shu bilan birga, "akademik polemika" ta'lim o'yinlari orqali erishilgan bilimlar juda ham mukammal va III (bilim-malaka), hatto IV (bilim-transformatsiya) darajalariga mos. O'quv-klinik o'yin
davomida "akademik polemika" analitik fikrlashning salohiyatini ancha tezroq kuchaytirdi, bu esa ushbu o'qitish uslubining muhim va ayni paytda o'ziga xos ustunligi hisoblanadi.

Kalit so'zlar: o'rgatish, interaktiv usul, miya bo'roni, alademik polemika, klinik bilimlar

Аннотация. В настоящей работе приводятся результаты применения интерактивных способов обучения «мозговой штурм» и «академическая полемика» по предмету пропедевтики внутренних болезней. Интерактивный способ обучения «мозговой штурм» способствовал преимущественному совершенствованию I(знакомство) и II (копия) уровней знания. В то же время знания, полученные с помощью учебной игры «академическая полемика», были гораздо более совершенными и соответствовали – III (знание-умение), а то и IV (знание - трансформация) уровням. Примечательным является то, что по ходу проведения учебно-клинической игры- «академическая полемика» гораздо быстрее укреплял потенциал аналитического мышления, что является важным и в то же время отличительным превосходством данного способа обучения.

Ключевые слова: обучение, интерактивный метод, мозговой штурм, академическая полемика, клиническое знание

Abstract. The article discusses the results of application of interactive ways of training «brain storming» and «the academic polemic» in a subject of propaedeutic of internal illnesses are resulted. The interactive way of training «brain storming» promoted primary perfection I (acquaintance) and II (copy) levels of knowledge. At the same time the knowledge received by means of educational game «the academic polemic», was much more perfect and corresponded - III (knowledge-ability), and even IV (knowledge - transformation) to levels. That on a course of carrying out of educational-clinical game - «the academic polemic» the potential of analytical
thinking was much fast integrated that is important and at the same time distinctive superiority of the given way of training is remarkable.

**Key words:** education, an interactive method, brain storming, the academic polemic, clinical knowledge

**Introduction.** A traceable new development in streamlining the learning process is undoubtedly related to the growing interest of teachers in the forms of interactive learning, which play the role of a ladder conducive to the progression of students' knowledge potential (6, 7, 8). The interactive teaching methods (ITM) include those that require students to independently extract, process and implement the information presented in a didactic form. This type of training, in contrast to traditional ones, significantly enriches the bank of knowledge with a simultaneous increase in the potential of creative thinking of students (9).

It is established that the used interactive learning methods have a different impact on the formation of levels of knowledge. The long-term goal-oriented work of the institute’s team to study the strength of learning and skills of students formed in the learning process and their results, as well as the desire to make teaching interesting, rich and, most importantly, effective, change the training methodology, introduce a special style of pedagogical communication student development and optimize the learning process (11).

**Literature review.** Interactive forms of education can be divided into imitational and non-imitational. Simulation methods, which include educational clinical games (ECG), immerse students in an atmosphere very close to the practical work of a doctor. Moreover, they form and maintain the emotional intensity of the participants and increase the sense of responsibility for the fate of the patient, at least to her intellectual level. ECG allow systematic monitoring of the improvement in the quality of students' training and play the role of a barrier to their passage to the bedside of the patient, allowing only trained students to pass to patients (1, 2, 4, 5).
Given the above, this work was done, the purpose of which was a comparative assessment of the level of clinical knowledge of students acquired through interactive forms of training "brainstorming" and "academic controversy."

It should be pointed out that the “three-step interview” ultrashort study caused a heightened interest among students. The knowledge gained through this type of educational game was much more perfect and corresponded to III (knowledge - ability), and even IV (knowledge - transformation) levels. More than half of the participants in the game clearly formed the elements of III (knowledge - ability), and the rest of the IV level (knowledge-creativity) knowledge. At the same time, the bank of clinical thinking was enriched much faster, which is an important and distinctive superiority of this method of education.

**Research Methodology.** For the implementation of the tasks in practical classes on the subject of propedeutics of internal diseases (PID), the ITM-ECG (“academic controversy” and “brainstorming”) were purposefully used for a number of years. The control served as the rating indicators of students, obtained using traditional methods of assessing knowledge. Groups of students involved in the study were representative of the number of students, stages and types of knowledge assessment, as well as their individual rating. The level of knowledge was systematically tested from assignments in the course of ongoing, intermediate and final tests. An interactive brainstorming game was used in a modified version, the essence of which was as follows: questions were divided according to the level of complexity into easy (L1), medium (L2) and complex (L3). Their ratio in the general bank of questions was 1: 2: 1. The magnitude of points allocated and the time available for the correct answers depended on the degree of complexity of the question and increased as the latter grew.

The value of brainstorming is that it unites the group. Each participant is given to feel that his proposal is worth it to write. This allows you to turn a solution to a
problem not into a competition (when participants claim that their own ideas are accepted), but into teamwork, when the main opponent becomes the problem itself and not another member of the group.

**Analysis and results.** In the course of the research the following results were obtained. It has been established that, in contrast to traditional ones, ICG generally more effectively influences the process of mastering a complex of clinical knowledge. In addition, they clearly differed in the individuality of the nature of the action on the formation of well-known levels of knowledge. So, if traditional teaching methods have influenced the development of mainly primary I (knowledge-acquaintance) and II (knowledge-copy) levels, then ICG has influenced more advanced III (knowledge-ability) and IV (knowledge-creativity) their forms.

The classes conducted with the use of the brainstorming training game were distinguished by the high activity of the participants, which is partly explained by the condition of its conduct, requiring the indispensable participation of all members of the group. At the same time, the possibilities of this game in terms of improving certain levels of knowledge turned out to be far unequal. According to the results of the ICG, “brainstorming” contributed to the improvement of the I (acquaintance) and II (copy) levels of knowledge. The formation of more advanced levels (W - skill and IV - creativity), it is not particularly affected. The latter significantly limits the use of brainstorming training games. To achieve the desired result, the choice of this educational game must be differentiated according to the specifics of a particular occupation. For the level of knowledge acquired with its help, especially from the private section of the subject of the propaedeutic of internal diseases, may end up being low.

The results obtained from the use of ultra short disciplines, “academic controversy” turned out to be somewhat excellent. This ITM has contributed to a significant increase in the baggage of both theoretical and practical knowledge of
students, maximum understanding of the meaning of the doctor’s dialogue with the patient and the development of clinical thinking, as well as the ability to use theoretical knowledge in a timely manner. practical activities. It should be emphasized that for the successful conduct of an “academic controversy” a sufficiently large amount of knowledge in fundamental medical disciplines is required, as well as possession of a wide range of manipulations. This was obliged by the condition of collecting subjective and objective information, which is closest to the real clinical situation.

Another positive quality of the academic game “academic controversy” was also traced. Among the participants, the “players,” the number of individuals with physical research methods increased steadily, and most importantly, the quality of their implementation improved, which corresponded to the goals and objectives of the subject of propaedeutic therapy (3.10). The only drawback that was noted is the lack of active participation of all members of the group.

The department developed scenarios of various clinical situations with a clear definition of the range of responsibilities of each participant in the educational game. Along with this, special conditions have been created with the equipment necessary for conducting an ultrashort pulse. The teacher keeps an eye on the course of the educational game, controls every action of the participant. In cases of tolerance slip meticulously corrects it. At the request of the situation, he often brings additional information that complicates the clinical situation. In the course of the participant's educational game, it is allowed to discuss the role of each symptom in the diagnosis of this disease, the plan for the upcoming examination of such patients. Summing up the lesson, the teacher gives an objective assessment of the actions of each participant in the game, comments on the answers, corrects the compiled survey plan. Speaking as an arbitrator, he dwells in detail on the admitted miscalculations and failures of students - "players" and advises ways to eliminate them.
On the basis of the conducted research, it can be concluded that the ISO “brainstorming” and “academic controversy” do not equally influence the formation of individual levels of knowledge. So, if the first of them contributed to the predominant growth of I and II, then the second - III and IV levels of knowledge. Taking into account the latter, the choice of the educational game method should be carried out in accordance with the goal and objective of each class, we consider it expedient to use the interactive game “brainstorming” in the course of learning the general classes, and the “academic debate” of the special part of the PID.

Thus, the use of USPs in the process of teaching the subject of internal disease propaedeutics substantially develops the baggage of clinical knowledge while simultaneously increasing the cognitive ability of students, gives them creative independence, expands and strengthens the range of acquired practical skills. The main thing is that they are not perceived by students. All this ultimately contributes to the assimilation of new theoretical and practical knowledge, improves the quality of training of future general practitioners.

Conclusion. 1. Interactive ways of learning "brainstorming" and "academic controversy" differentially affect the formation of individual levels of knowledge.
2. The choice of the type of educational game should be carried out depending on the specific topic of practical training.
3. The interactive game “brainstorming” turned out to be more effective in the course of learning the general, “academic controversy” - a special part of the subject of PID.

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