

ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

MODELING STUDENTS' MATHEMATICAL KNOWLEDGE THROUGH UNIVERSAL ACTION

https://doi.org/10.5281/zenodo.7893470

Khurramova Sojida Abdunazar qizi

Student of Termiz State University, Faculty of Social Sciences, Elementary Education, 3rd year, 220th group

Annotation.

This article discusses the effects of applying the State Education Standards in the primary grades and their further application through the modeling method. In addition, the introduction of universal motion in the method of modeling was considered.

Keywords.

modeling, DTS, universal action, success environment, interactive

Аннотация.

В данной статье рассматриваются последствия применения ГОСО в начальных классах и их дальнейшее применение посредством метода моделирования. Кроме того, рассматривалось введение всеобщего движения в метод моделирования.

Ключевые слова.

моделирование, ДТС, универсальное действие, среда успеха, интерактив.

Annotatsiya.

Ushbu maqolada Davlat ta'lim standartlarini boshlang'ich sinflarda qo'llash natijasida beradigan samaralari, ularni modellashtirish metodi orqali qo'llab yanada oshirish haqida keltirilgan. Undan tashqari modellashtirish metodida universal harakatlarni joriy etish haqida ham fikr yuritilgan.

Kalit so'zlar.

modellashtirish, DTS, universal harakat, muvaffaqiyat muhiti, interefaol

Today, at a time when much attention is being paid to education reform, the process of renewal is being studied in terms of scale and content. These reforms are the demand of today. At the stage of modern development of education, rather than giving the student as much knowledge and skills as possible in a certain academic subject, with the ability to perform actions that will help him in any conditions and situations armament is more important. These actions develop the student, increase his thinking ability, help him to become a necessary person for the developing society, and create ample opportunities for him to gain social



ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

experience. This includes how students can think, make logical conclusions, summarize their conclusions, come to a final conclusion, reason, give a description of things and events, and similar features. Simply put, the modern requirements for the education system require the student to be "taught to learn".

All the categories needed for modern education are also typical for primary education subjects (knowledge and skills, thinking and reasoning, logicality of discussions and accuracy of assessment of events, etc.).

Today, the basis of the education system is the state education standards. The analysis of the primary method documents for the state educational standards shows that all the manifestations of the universal educational activities (it can also be called universal educational activities) belonging to the four groups listed in them reveal the essence of a particular subject. reflects in It contains universal learning activities, and universal learning activities include management, perception, generalization, learning activities based on individual goals. It can be concluded from this that, on the one hand, universal educational activities are considered an important element of the educational subject, and on the other hand, we study them as a component of a specific educational subject.

As mentioned above, the four main universal learning activities are used separately or in general. Each form is used separately or in general in one lesson. The essence of the application of the modeling method of universal learning actions in the form of management to elementary education is that the teacher plays an important role as a manager of the flow of thoughts and opinions during the lesson. He announces the topic of today's lesson and shows the main direction of the expected discussion and clash of opinions. At the same time, universal educational activities in the form of introduction will be passed. In the introduction, the teacher brings to the attention of the students preliminary, primary information about the concept to be learned, the task to be solved. He actively encourages the students who passively participate in the discussions and give correct opinions. Generalization is a universal learning activity where the student or active student brings all the mentioned opinions into the form of a conclusion, the conclusions are evaluated and summarized. At the end of the generalization, a final conclusion is given about a specific concept. In the individualized form of universal learning activities, the teacher pays attention to the students who actively participated in the discussion, exchange of ideas and discussions. In this way, all forms of universal educational actions are fully manifested during one lesson. At the same time, we



ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

should note that by using universal learning activities, the teacher can conduct lessons based on the most modern requirements for education and training.

All forms of universal learning activities require a large amount of information on a specific topic, a variety of options for completing tasks. This is self-evident: for example, in a lesson where the initial concept is studied, it is natural that the teacher cannot provide enough information on this topic for the students. The information presented will be related to one concept, and there will be no relationship between terms, since another concept has not yet been studied. Naturally, in such situations, the effectiveness of universal educational efforts is lower. When the next topic is covered, there is enough information to completely change the next concept, the teacher can make a connection between the concept learned in the previous lesson and the concepts being studied in the current lesson and create a new concept with their participation. gives as a task to find a way to do it. As a result, universal learning activities develop and develop on the basis of the lesson-to-lesson principle, and finally become the teacher's main teaching tool.

Basic academic subjects in primary education form in students the qualities of thinking, reasoning, evaluating things and events from the point of view of their own opinion, and increase the ability of logical and algorithmic thinking. In the process of getting acquainted with expressions and relationships, the student ensures the sequence of completing tasks, the consistency of logical thinking; will have the ability to describe concepts first in a didactic way, and then in a logical-reasoning way; will have the ability to perform an action and compare the result; can find a way to reach the goal; they learn to realize situations with the help of symbols, signs and signs; the capacity to collect information, write in an orderly manner, and draw conclusions based on this information will increase; they learn to classify shapes, numbers and data and determine their importance". As a result of these educational and methodological activities, the student "along with mastering science, learns to use systematic signs and symbols necessary for his study and active participation in social life, in which the process of socialization is strengthened."

It is recommended to introduce the modeling method separately and in general for each group of universal learning activities. The following is recommended for the formation and development of universal educational activities of an introductory nature:



ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

- 1. Selection, preparation and implementation of various models of preparing students for text assignments (types of models: symbolic, graphic, scientifically differentiated);
- 2. Establishing the use of a calculator model for the proper organization of research work of young students;
- 3. to ensure the variety of intellectual and practical tasks given as educational tasks for the formation and development of universal educational actions in students: management, introduction, generalization, universal educational actions in the content intended for the individual development for the lesson process (For example, explain..., check..., choose..., compare..., find the pattern..., is the conclusion correct?, find..., reason...,

observe..., draw conclusions...etc);

- 4. Shahla and Mahmoud receive a thought-developing task from the students: both of them are given the same information and the same task; their ability to use information and their imagination to complete the task are tested;
- 5. The "repetition", "reinforcement of the previous topic" part of the lesson is passed by introducing the main concepts learned in the previous topics and as a context in the new lesson, and the level of productivity of the method is recorded (in this case, the level of productivity is determined by the content of the given context, determined by size and appropriateness or inappropriateness);
- 6. Among the students, Shahla and Mahmoud are selected as subjects to determine the level of learning of the sequence of tasks: in this, their abilities to self-check, compare answers, set learning tasks, reason indicators such as performance levels and compliance with the task sequence are recorded;
- 7. Electronic textbooks on subjects will be developed to ensure that students can learn subjects independently, set goals, plan and test themselves;
- 8. A new type of assessment a comprehensive assessment based on primary education subjects is recommended, in which the results achieved by the students in the whole subject, as well as their mastery of interdisciplinary connections, are not recommended. appears and there is an opportunity to determine the formation of universal educational actions.

Creating an "environment of success" in education, helping the child to succeed in studies, gaining confidence in his own strength and talent, making the student understand that everyone around him is like him, developing a sense of belonging to the team. It is necessary to gain the respect and trust of the student, to look at oneself from the point of view of a person.



ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

The setting of new goals for primary education with a person-oriented content based on the DTS qualification requirements requires a relative simplification of the variable, multifaceted and evaluation criteria of primary education. We call all these features "versatility". In the following places, the concept of "multidimensionality" means the change of the principle of individual orientation in primary education, the ease of determining the results, and the non-linear nature of learning.

The introduction of the concept of versatility is manifested as a response to the requirements in the form of questions arising from students in the process of mastering concepts in primary education. It is up to the individual to turn the interests of students within the framework of the knowledge factor into the interests within the framework of the reasoning factor and to ensure that education is organized in an interactive way based on the "I know - I want to perceive - I perceived" scheme.

Should be considered as modeling methods of oriented primary education. The same cannot be said about the whole class. For example, a result of the form "I know - I want to perceive" can be achieved. But the effect of "we perceived" is not always there. Therefore, in primary education, education in the content of individual orientation is introduced, and this, in turn, leads to the implementation of the concept of "multidimensionality" defined above.

As a conclusion, it can be said that when introducing modeling methods in mathematics, the importance of the student in the class increases from class to class, and it further forms his intellectual and intellectual thinking. Accordingly, the demands placed on the teacher will also increase. It also increases universal learning activities through the modeling method and helps to improve the quality of education.

FOYDALANILGAN ADABIYOTLAR RO'YXATI:

- 1. Корнилов В.С. Гуманитарная компонента прикладного математического образования // Вестник Московского городского педагогического университета. Серия: Информатика и информатизация образования. 2006. №7. С. 94-99.
- 2. Мордкович А.Г. Беседы с учителями математики: Учеб.-метод. Пособие/А.Г. Мордкович. 2-е изд., доп. И перераб. М.: ООО «Издательство Оникс»: ООО «Издательство «Мир и Образование», 2008. 336с.



ISSN: 2945-4492 (online) | (SJIF) = 7.502 Impact factor

Volume-11 | Issue-4 | 2023 Published: |22-04-2023 |

- 3. . Моро М. И., Волкова С. И., Степанова С. В. Математика. Учебник. 1 класс. В 2 частях – М.: Просвещение – 2014.
- 4. Нуруллаева Ш.Ў. Бўлажак бошланғич синф ўкитувчилари педагогик тайёргарлигини моделлаштириш назарияси ва методикаси. Педагогика фанлари доктори (DSc) диссертацияси автореферати. Қарши. 2021.-63 б.
- 5. Пиаже Ж. Как дети образуют математические понятия // Вопросы психологии , 1966 . № 4 . с 121-127.
- 6. Подходова Н.С. Метаметодический подход к образовательному процессу // Современные наукоемкие технологии. № 6. 2004 С. 14 16.v
- 7. Пышкало А.М. Совершенствование математической и методической подготовки учителей начальных классов [Текст] / А. М. Пышкало, Л. П. Стойлова // Советская педагогика. 1976. № 2. С. 90 96.