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BENEFITS AND POSITIVE IMPACT ON THE HEALTH OF SECOND-YEAR STUDENTS USING TABLE TENNIS IN THE PRACTICE OF PHYSICAL EDUCATION AT THE NATIONAL TECHNICAL UNIVERSITY OF UKRAINE "IGOR SIKORSKY KYIV POLYTECHNIC INSTITUTE"

Table tennis is the most accessible game in the physical education curriculum for students. This is because table tennis, as a sport and active game, does not require significant material resources or space for training and competitions. Meanwhile, through the game, which is characterized by high physical activity, students develop such important qualities as speed, agility, coordination, attention, reaction time, eye, thinking, and other skills.

Table tennis is an exciting, endlessly varied game, accessible to everyone, young and old. It is exciting and unpretentious. The ease and speed of movement, the swiftness of attacks and the dedication of defense, the unexpectedness of technical combinations make for a captivating spectacle. The variety of motor skills and actions, varying in coordination structure and intensity, contributes to the development of all physical qualities. During the game, participants receive a significant yet manageable physical load and, at the same time, an emotional boost. Table tennis fundamentals are part of the NTUU "Igor Sikorsky Kyiv Polytechnic Institute" curriculum. Students must master new elements of technique and tactics and become familiar with the basic rules of the game. Table tennis lessons are aimed at students' physical development, introducing them to discipline, daily routine, hygiene, and self-control.

Table tennis is not only a fun game, but also a challenging and challenging exercise for willpower. The game accustoms a person to the physical and mental effort so necessary for work and everyday life. A student's table tennis training session involves technical, tactical, physical, psychological, and theoretical preparation. A training session should consist of three parts: preparatory (warm-up), main, and final, each with its own objectives. The goal of the preparatory part is to prepare all bodily functions. The main part of the session is aimed at mastering and refining technique and tactics, as well as developing moral and willpower. It is conducted with balls at the table. The final part of the session includes relaxation and breathing exercises, facilitating the body's gradual transition from intense exercise to rest. A warm-up is a set of specialized techniques aimed at preventing injury. Its purpose is to establish mutual coordination between the body's systems and individual organs. During a warm-up, the body's physiological functions-circulation, respiration, excretory functions, and psychophysical functions-are prepared for serious work. Attention is focused, precision of movement is improved, and optimal stimulation of the nervous system is achieved.

Key words: *students, table tennis, benefits, influence, importance.*

Новікова Ірина. Користь та позитивний вплив на здоров'я студентів другого курсу засобами настільного тенісу у практиці фізичного виховання в Національному технічному університеті України «Київському політехнічному інституті імені Ігоря Сікорського». *Настільний теніс - найдоступніша гра в навчальній програмі з фізичного виховання для студентів. Це пояснюється тим, що настільний теніс, як вид спорту та активна гра, не потребує значних матеріальних ресурсів чи простору для тренувань та змагань. Тим часом, завдяки грі, яка характеризується високою фізичною активністю, студенти розвивають такі важливі якості, як швидкість, спритність, координація, увага, швидкість реакції, мислення та інші навички.*

Настільний теніс - захоплива, нескінченно різноманітна гра, доступна всім, молодим і старим. Вона захоплива та невибаглива. Легкість та швидкість рухів, стрімкість атак та цілеспрямованість захисту, несподіваність технічних комбінацій створюють захопливе видовище. Різноманітність рухових навичок та дій, що

відрізняються координаційною структурою та інтенсивністю, сприяє розвитку всіх фізичних якостей. Під час гри учасники отримують значне, але посильне фізичне навантаження та, водночас, емоційний заряд. Основи настільного тенісу є частиною навчальної програми НТУУ «Київського політехнічного інституту імені Ігоря Сікорського». Студенти повинні опанувати нові елементи техніки та тактики, а також ознайомитися з основними правилами гри. Заняття настільного тенісу спрямовані на фізичний розвиток студентів, знайомство з дисципліною, розпорядком дня, гігієною та самоконтролем.

Настільний теніс - це не лише весела гра, але й складна та вибаглива вправа на силу волі. Гра привчає людину до фізичних та розумових зусиль, таких необхідних для роботи та повсякденного життя. Тренувальний процес студента з настільного тенісу включає технічну, тактичну, фізичну, психологічну та теоретичну підготовку. Тренувальний заняття повинно складатися з трьох частин: підготовчої (розминки), основної та заключної, кожна зі своїми цілями. Мета підготовчої частини - підготовка всіх функцій організму. Основна частина заняття спрямована на оволодіння та вдосконалення техніки та тактики, а також на розвиток морального духу та сили волі. Вона проводиться з м'ячами біля столу. Заключна частина заняття включає вправи на розслаблення та дихання, що сприяють поступовому переходу організму від інтенсивних навантажень до відпочинку. Розминка - це комплекс спеціалізованих прийомів, спрямованих на запобігання травмам. Її мета - встановити взаємну координацію між системами організму та окремими органами. Під час розминки фізіологічні функції організму - кровообіг, дихання, видільні функції та психофізичні функції - готуються до серйозної роботи. Увага зосереджується, покращується точність рухів і досягається оптимальна стимуляція нервової системи. Ми розглядаємо настільний теніс як один із засобів покращення загального здоров'я та психічного стану студентів.

Ключові слова: *студенти, настільний теніс, переваги, вплив, важливість.*

Formulation of the problem in general form. Physical education classes at the university aren't limited to just classes. Especially since today, when technology largely replaces human activity, it's essential to maintain muscular activity throughout the body through physical education and sports. One of the most effective ways to improve students' functional capabilities and athletic performance is through specialized sports. For maintaining physical fitness, such forms of recreational physical education as cross-country running, cycling, swimming, and sports games are useful. However, not everyone enjoys these types of activities. On the one hand, they can be a bit boring and monotonous, as only the muscles are engaged, leaving the mind inactive. On the other hand, not everyone has the courage to run even in a secluded area; some are self-conscious about their figure in a tracksuit. All of this can be avoided by playing table tennis, as no special clothing is required. Any comfortable pants and shirt, or a skirt and top, will do, as long as they don't restrict movement and allow the body to breathe. Furthermore, the advantage of table tennis is that it doesn't require a special gym. A small room, hallway, or stairwell, a park, resort grounds, a recreational park, or even a veranda can all be perfect for this simple and engaging game. Moreover, it can be played year-round, both indoors and outdoors. The relevance of this study lies in the fact that teaching table tennis skills and techniques, taking into account the anatomical, physiological, psychological, and pedagogical characteristics of students aged 17-19, is most beneficial. Therefore, the study's hypothesis is that if young men aged 17-19 engage in table tennis, their physical abilities develop more intensively, which contributes to the formation of a stable motor stereotype.

Analysis of literary sources. The topic of the positive impact of table tennis on the body of first and second year students has been well analyzed by the following authors: Bilokon V.P., Anikeenko L.V. [1], Zenina I.V., Kuzmenko N.V., Uskova S.M. [2], Syrovatko Z.V. [3], Tymchyk S. G. [4].

Review of previously unsolved parts of the overall problem. Table tennis is suitable not only for people of all ages and professions, but also for those with health problems, hearing impairments, and visual impairments. The game can be successfully used in physical education classes or training sessions at children's and youth sports schools, as well as for students with health problems. Table tennis is especially beneficial for these students, as it promotes positive emotions, improves health, and instills self-confidence. This methodological development will help the teacher to competently structure table tennis lessons in order to achieve better results.

The purpose of the study. This game is becoming especially popular at universities. On table tennis tables, practicing exercises with a racket and ball helps improve such important skills as reaction time, attention, thinking, and motor coordination. Furthermore, recreational activities involving table tennis contribute to the development of many useful skills. An equally important advantage of table tennis is its surprisingly easy learning curve. Hitting the ball with a racket and sending it to your partner's side of the table is not difficult, especially as the ball becomes more manageable with each practice [1; 2].

Presentation of the main research material. Table tennis is a fascinating game. It's highly suitable for the needs of the masses. Young and old alike enthusiastically practice with racket and ball. Tens, even hundreds, thousands of people who have had the chance to try this game try to master it and become its devotees, for its rules are simple, and the game itself seems quite straightforward: just hit the ball to your partner's court.

However, those who want to learn table tennis at a high level, bordering on art, face a very difficult task, requiring persistent study and constant training. Table tennis is a complex sport, with a wide variety of technical and tactical approaches. It requires high speed, agility, endurance, ball awareness, a refined game plan, good reflexes, the ability to make quick decisions, a stable nervous system, and boundless perseverance and diligence [3, 10]. This work reveals and complements the working program of the discipline of physical education and is aimed at mastering the system of scientific-practical and social knowledge necessary for creative personal and professional development, improvement, organization of a healthy lifestyle in the performance of educational, professional and social activities, and also forms an ideological system of scientific-practical knowledge and attitude towards physical education.

The development provides a modern understanding of the health and educational value of table tennis, revealing the history of the development of table tennis, the anatomical and physiological foundations of the development of physical qualities, a psychological and pedagogical justification for the motor sphere of students and the physiological characteristics of table tennis as a sport.

The physiological basis for the development of physical qualities is the limited motor activity of modern humans, driven by the demands placed on them by the overall process. In recent years, secondary and higher education curricula have become significantly more complex: the population is increasingly engaged in design and operator work, which lacks muscle tension.

Insufficient muscle activity creates special conditions in human life, known as hypokinesia (lack of movement). This negatively impacts the structure and function of all body tissues. Under these conditions, the development of the younger generation is delayed. People who lead a sedentary lifestyle tend to have underdeveloped respiratory and circulatory systems [1, 5].

Muscles are the body's primary consumers of oxygen. If their mass is small, the body does not require much oxygen at rest. However, if untrained muscles perform even a light load, oxygen demand increases sharply.

A trained person, when performing the same intensity of work (compared to an untrained person), requires less oxygen. Hypokinesia is particularly harmful to the cardiovascular system.

The heart capacity of physically inactive people is smaller than that of athletes. At rest, the tissue blood supply is sufficient even with a small heart capacity. However, during muscular activity, such a heart cannot provide the necessary blood flow, leading to fatigue and the inability to continue working.

The functional reserve of the heart is limited in sedentary people. For example, their minute blood volume during extreme exertion may increase to only 15-20 liters, whereas in athletes it can reach 40 liters or more.

When tennis players develop motor skills, they repeat not the method of solving a motor problem, but the process itself. Therefore, developing a motor skill is not about memorizing a movement, but rather about learning how to construct it with the active involvement of the central nervous system. Movements gradually become more efficient and economical.

The time spent teaching a movement depends on the skill of the teacher, the individual characteristics of the student, their desire to master the skill, and their proactive approach to learning.

The process of developing a motor skill has several characteristics: 1) the first attempts at performing an unfamiliar movement only vaguely resemble the actions of a master in this field. For someone mastering a technique in a sport, the goal of the movement is usually immediately clear. The means by which this goal can be achieved are more complex. At the beginning of learning, a person either lacks existing auxiliary skills or is unable to apply them to solving a given motor task. Therefore, at the beginning of skill development, attention must be paid to all the details of the movement. This overloads the leading level of movement construction with unnecessary work that could be performed at lower levels. 2) In the initial stage of motor skill development, sensory corrections come into effect only when deviations from the movement program become very noticeable. 3) At the beginning of motor skill development, joint mobility interferes with the correct execution of the movement. Therefore, muscle stiffening occurs, rather than simply "locking" degrees of freedom unnecessary for a given movement. Beginners in classes typically experience general stiffness of movement, with muscle tension not only in the working limb but also in other parts of the body [4].

Gradually, the body finds ways to perform movements that eliminate unexpected inertial and reactive forces before they occur thanks to increased sensitivity of the corresponding receptors. At this stage, fixation of all joints is not required. Muscles not directly involved in the movement relax. 4) As a motor skill develops, first simple, and then complex, components of the movement begin to be performed at lower background levels of movement formation. At the same time, the leading level is relieved of unnecessary work. This shift represents a qualitative leap, a new stage in the development of the motor skill. 5) A motor skill can be fully developed when all auxiliary movements have migrated to background levels of movement formation. Under this condition, each time a person uses a given motor skill in their work or sports activities, their consciousness is focused solely on the goal of the action. All background movements occur automatically. The student gets the opportunity to focus on solving tactical problems, which is very important for achieving results [2].

When a motor skill is developed, movements become precise and smooth. Even if an athlete puts great force into each strike, their work appears effortless and easy. With a strong motor skill, they avoid unnecessary movements and don't strain unnecessary muscles. Therefore, the amount of energy expended on movement is reduced compared to the initial stages of skill development. Consequently, movements become more economical.

To achieve success in teaching students new movements, the following principles of movement design must be considered: 1. The development of motor skills is associated with the active functioning of the central nervous system. At the beginning of skill development, all movements are performed under conscious control. Therefore, at this stage, a purposeful and attentive approach to their movements is crucial. 2. The student's primary focus should be on solving the motor task, not on the movements that accomplish that task. The student should not be forced to master technical details, nor should the central nervous system's ability to organize background movements be interfered with. 3. Correct movement execution is based on sensory corrections. Therefore, when practicing the details of a complex movement, receptor stimulation should be the same as in the entire movement. 4. A motor skill must be developed as a whole, focusing the athlete's attention on the main task of a complex set of movements. It is impossible to "break" a skill apart and refine the form of movements separately, and then their strength and speed. However, it is possible to select a series of skills in which each subsequent one builds on the movements of the previous one. 5. When selecting preparatory or auxiliary exercises, it is necessary to determine the leading level of movement structure. This is important because movements built on the synergistic level do not allow skill transfer to other movements [1; 4].

The essential prerequisite for any meaningful activity lies, as is well known, first and foremost in its motivation. During the preparation of students, it is crucial to foster and develop aspirations that will motivate them to systematically engage in sports and achieve the greatest possible results for society and the individual. One of the most important educational tasks in physical education is to ensure that students master the specific norms and rules of conduct stipulated by "sports ethics."

Conclusions. Fostering a sense of athletic hard work is a central goal of student training and is achieved (based on appropriate motivation), primarily through the systematic implementation of training exercises involving increasing workloads. Equally important in student preparation is cultivating a desire for athletic victory, initiative, persistence, courage, self-control, and other willpower qualities. Sport is rightly called a school of willpower. Physical education poses a number of complex educational challenges. Their solution generally depends not only on the teacher's educational influence during table tennis lessons. During lessons, intellectual development is presented in an organic connection with the teaching of sports technique, the development and refinement of sports tactics, and the athlete's specialized technical and physical preparation. The first-year student period is a period of relatively uniform physical development. Students experience proportional increases in height, body weight, and chest circumference, while their skeletal, muscular, and other systems improve.

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THE ROLE OF STUDENT MOTIVATION IN ATTAINING PHYSICAL EDUCATION AT THE NATIONAL TECHNICAL UNIVERSITY OF UKRAINE "IGOR SIKORSKY KYIV POLYTECHNIC INSTITUTE"

This article analyzes the impact of physical education and sports on students during their university studies. The issue of motivating students to engage in physical activity is becoming increasingly pressing. By examining these motivations, we can identify ways to best motivate students to engage in physical education. This topic is important and relevant, as students' physical health and active lifestyle are integral to their successful academic performance and future careers. One of the main challenges associated with physical education and sports for students is the insufficient number of accessible sports facilities and equipment. Many universities and colleges lack gyms, swimming pools, and other facilities, preventing students from participating in sports and maintaining their physical health. Another problem is students' low motivation for sports. Many students prefer to spend their free time on the computer or phone, unaware of the importance of physical activity for their health and well-being. Students also face a lack of time for sports. Due to a heavy curriculum and extracurricular activities, many students are unable to find time for physical education and sports, which negatively impacts their health and emotional well-being. The twenty-first century has become a time for young people to sit at home, completely immersed in their gadgets. In their free time, they try to watch movies, read e-books, or simply chat on social media. They completely forget that there is an alternative that is more beneficial for people and their health – sports. Young people entering university face a multitude of problems. They encounter physical education. Having abandoned physical education classes at school and spent a leisurely summer vacation, they forget about the strain on their motor system, thereby deteriorating their health. A pressing problem in physical education and sports among students is the lack of motivation to engage in sports and physical activity. Today, maintaining and improving health is an important issue for the younger generation. Young people's health is deteriorating, and they often experience cardiovascular and respiratory problems, as well as chronic and infectious diseases. There's a saying,