

The Effectiveness of Taekwondo Footwork in Kickboxing

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Abstract

Modern types of martial arts are increasingly perceived as combinations of improved techniques of several types of wrestling, contributing to increased efficiency, endurance, increased speed and fitness of athletes. Therefore, the aim of the study was to develop a new, improved methodology for preparing effective taekwondo strikes in various sections of kickboxing. To achieve this goal, the following methods were used: 1) analysis and synthesis of domestic and foreign scientific and information sources of literature on the problem of research; 2) pedagogical supervision; 3) testing; 4) methods of static and mathematical processing of recorded data for the purpose of their subsequent interpretation 5) biometric methods (content analysis). At the same time, three educational organizations of the city of Belgorod acted as a research base, whose students were involved in the educational and training process. The participants of the experimental part of the study were kickboxers, whose training was conducted from 2011 to 2021. The results of the systematic training process recorded during the athletes' performance clearly demonstrated the effectiveness of the author's taekwondo training program, which was reflected in the performance of athletes engaged during competitions and performances in medals at cups and championships of Russia, Europe and the world.

Keywords:kickboxing, taekwondo, kicks, fencing, competitions, point fighting, full contact, kick-light.

Introduction

Currently, a distinctive feature of popular kickboxing is the use by athletes in a duel of the technique of punching, borrowed from boxing, and kicking from taekwondo (mixed technique). There are several sections in the kickboxing technique that you need to master in order to achieve a high level of sportsmanship. Such variability provides not only a variety of types of techniques used in a duel, but also determines the complexity of mastering the entire variety of motor actions of a kickboxer for the development and strengthening of acquired skills in combat.

The aim of the study was to develop a methodology for preparing effective taekwondo strikes in various sections of kickboxing to improve the effectiveness of those involved.

To achieve the goal , the following methods were used: 1) analysis of scientific and information sources on the problem of research; 2) pedagogical observation; 3) testing; 4)

methods of static-mathematical processing of the data obtained, their systematization for the purpose of their subsequent interpretation.

Three educational organizations simultaneously acted as a base corresponding to the purpose of the study: Belgorod Palace of Children's Creativity, Lyceum No. 9 of Belgorod, Secondary School No. 21 of Belgorod. The experimental part of the study included kickboxers who trained from 2011 to 2021.

Theoretical basis of the research: the work uses the works of V.N. Kleshchev, S.L. Podpalko and A.A. Novikov, G.O. Jeroyan, A.A. Poteryakhin, V.I. Filimonov, Kim D.G., Chin D., Choi Hong Hee.

The practical significance of the result is justified by factors integrating knowledge of combat techniques, which made it possible to build in this study a methodology for training athletes, the use of which in competitive and training processes will help bring footwork in taekwondo to a new level, increasing the effectiveness of training and achieving high athletic results.

The article consists of an introduction, the main part, research results, conclusions and a list of references.

Mainpart

The knowledge gained during the theoretical analysis of experimental data on the power characteristics of kicks in taekwondo, expressed by the effectiveness of technical and tactical actions, allowed us to identify and justify the factors affecting the overall effectiveness of competitive activity.

The following factors were identified:

1. muscle strength of a running leg - by 25%;
2. the strength of the muscles of the striking leg - 26%;
3. the amplitude of the kicking leg movement is 21%;
4. the lifting height of the impact leg is 28%.

The effectiveness of the fight is largely due to the fact that the score with the foot is provided by the following components of the shock movement: the jump of the shock leg, the strength of the muscles of the shock leg, the amplitude of the movement of the shock leg and the height of the shock leg. The extension of the leg at the knee (70%) and the forward jump performed by the running leg (30%) contribute to movement [1].

Despite the fact that the taekwondo training system created by General Choi H.H. was conceived as an additional protection program during fights, it is possible to note the technical superiority of kicks during fights over punches, which has its roots in ancient combat directions in Korea [8].

For effective training in kickboxing, it is necessary to master the taekwondo technique with the mindset of using the most effective kicks, as well as to consolidate them in practice (Table 1) [2].

Table 1 – Effective kicks in the section of point wrestling and light contact

№	Effective kicks in the pointfighting section	Effective kicks in the light contact section
1	Single side kick to body from spot to body	Single side kick to body from spot to body
2	Single side kick to the body from a spot to the head	Single side kick to the body from a spot to the head
3	Fencing: side kick to the body - side kick to the head	Fencing: side kick to the body - side kick to the head
4	Fencing: round kick to the body - round kick to the head	Fencing: round kick to the body - round kick to the head
5	Fencing: two side kicks to the body - round kick to the head	Fencing: two side kicks to the body - round kick to the head
6	Fencing: side kick to the body - side kick to the head - side kick to the body	Fencing: Hook-kick to the head - side-kick to the head
7	Fencing: Side kick to the head from three to seven punches	Fencing: Hook-kick to the head - round-kick to the head
8	Fencing: Hook-kick to the head - round-kick to the head - side-kick to the head	Fencing: round kick to the head - side kick to the head
9	Fencing: ex-kick to the head - side kick to the body	Fencing: ex-kick to the head - side kick to the head
10	Fencing: side kick to the body - side kick to the head	Fencing: hook-kick from a turn with the back foot to the head - 2 round kicks from the back foot to the head

It should be noted that in the absence of distance control with the opponent, kickboxer - fencing blows with the front foot should be used at different levels in the point combat section [3]. In the light contact section, all punches are performed with the front or back foot to another level of the opponent. At the same time, primary knowledge and skills are of great importance, that is, the basic technique of the athlete, the execution of the rack and at the same time the studied crown blows (blows that the athlete is better able to perform) [7].

Fencing with the feet is performed from a standing position so that when the knee is kicked, the knee rises, turning the heel of the foot on which the athlete stands, and the opponent receives a blow. During the execution of the blow, a forward jump is performed, while the coordination of movements, including sharpness and speed, is monitored (Table 2) [4].

Table 2 – Effective blows in the section "Full contact" and "light blow"

№	Effective kicks in the full contact section	Effective kicks in the kick-light section
1	Front kick with a forward jump to the head	Two low kicks with the front foot
2	Round kick with a jump forward to the	Two round kicks with the front foot to the

	head	head
3	Side kick with a jump forward to the head	Ex-kick with the front foot
4	Front kick to the body - round kick with the front kick to the head	Ex-kick with a back foot
5	Front kick with the front foot to the body - round kick with the back foot to the head	Two low kicks with the front foot - a round kick with the front foot to the head
6	Side kick with the front leg to the body - side kick from the turn with the back leg to the head	Two low kicks with the front foot - round kick with the back foot to the head
7	Front kick with the front foot to the body - hook-kick with a turn with the back foot to the head	Two low kicks with the front foot - ex-kick with the back foot
8	Side kick with the front foot to the body - hook-kick with a turn with the back foot to the head	Ex-kick with the front foot - two low-kick kicks with the back foot
9	Two round kicks with the front foot to the body - front kick with the back foot to the head	Two low kicks with the front foot - front kick with the back foot to the body
10	Round kick with the front foot to the body - round kick with the front foot to the head - round kick with the back foot to the head	Front kick to the body - two low kick kicks with the rear kick

In the full contact section, the athlete must perform strikes from different sides at possible levels from a fighting stance in motion [11]. In the kick-light section, the kickboxer repeats the same blows at the same level twice (Table 3) [5].

Table 3 – Methods of teaching foot work in taekwondo in kick boxing

№	Mon	Tue	Wed	Thu	Fri	Sat	Sun
1	Single hits: different hits and level	Single hits: different hits and level	Single hits: different hits and level	Single hits: different hits and level	Single hits: different hits and level	Single hits: different hits and level	Dayoff
2	Fencing: different strikes and level	Fencing: different strikes and level	Fencing: different strikes and level	Fencing: different strikes and level	Fencing: different strikes and level	Fencing: different strikes and level	Dayoff
3	Two kicks at a different level	Two kicks at a different level	Two kicks at a different level	Two kicks at a different level	Two kicks at a different level	Two kicks at a different level	Dayoff

4	Three kicks at different levels	Three kicks at different levels	Three kicks at different levels	Three kicks at different levels	Three kicks at different levels	Three kicks at different levels	Dayoff
5	All kicks at different levels in motion	All kicks at different levels in motion	All kicks at different levels in motion	All kicks at different levels in motion	All kicks at different levels in motion	All kicks at different levels in motion	Dayoff
6	Fencing: all kicks to a different level through feints	Fencing: all kicks to a different level through feints	Fencing: all kicks to a different level through feints	Fencing: all kicks to a different level through feints	Fencing: all kicks to a different level through feints	Fencing: all kicks to a different level through feints	Dayoff
7	Pointfighting	Lightcontact	Kick-light	Fullcontact	Lowkick	K1	Dayoff

The technique of teaching taekwondo footwork in kickboxing is that the same exercise is performed for 6 days a week from a place [12], in motion and with the help of feints.

The strokes are performed according to the score for 2 minutes with a 30-second break. After that, the strokes are performed for 3 minutes with a break of 1 minute according to the task.

It is worth noting that the restoration of the motor skill of striking can be studied only after a thorough check of the flexibility and strength of the joints [10], and attention should be paid to passive and active flexibility, as well as relative mobility (with and without weights) [6].

Research results

The results obtained at the competitions of the city, regional, regional, All-Russian and international levels in various sections of kickboxing show that:

1) At the age of 7-9 years in the point wrestling section, athletes miss more than 80% of blows;

2) At the age of 10-12, kickboxers miss 40% of their punches in the point fighting section;

3) At the age of 10-12 years, athletes miss from 60% to 70% of their strokes in the light contact and light section;

4) At the age of 13-14, kickboxers miss 50% of their punches in the full contact section;

5) At the age of 15-16, athletes miss 70% of their strokes in the low-kick and K-1 sections;

6) At the age of 17-18, kickboxers miss about 30% with their feet in all sections of kickboxing;

7) Men and women over the age of 18 miss from 10 to 20% of their legs.

Thus, older athletes perform more in one section of kickboxing and miss fewer blows, as they gain more experience [9], and also work out protection from blows. But there are exceptions when a kickboxer performs in different versions of taekwondo (WTF, ITF, GTF), constantly trains his punches in attack and counterattack, and deals 90% of his punches in combat with one foot, and accordingly earns points with one foot, which leads to uneven leg training.

The results of All-Russian and international competitions from 2011/2012 to 2020/2021 are presented in Table 4.

Table 4 - Results of All-Russian and international competitions from 2011/2012 to 2020/2021 academic year

Competitions	medals			
	Gold	Silver	Bronze	Total
CupofRussia	17 medals (32,6%)	15 medals (29%)	20 medals (38,4%)	52 medals (100%)
ChampionshipofRussia	24 medals (31,6%)	31 medals (40,8%)	2medals (27,6%)	76 medals (100%)
European Cup	18 medals (42,8%)	11 medals (26,2%)	13 medals (31%)	42 medals (100%)
EuropeanChampionship	-	1 medals (33,3%)	2 medals (66,7%)	3 medals (100%)
WorldTournament	6 medals (33,3%)	10 medals (55,6%)	2 medals (11,1%)	18 medals (100%)
World Cup	20 medals (32,8%)	19 medals (31,2%)	22 medals (36%)	61 medals (100%)
WorldChampionship	-	1 medals (50%)	1 medals (50%)	2 medals (100%)
TOTAL	85 medals (33,4%)	88 medals (34,6%)	81 medals (32%)	254 medals (100%)

From Table 4, the following conclusions can be drawn: kickboxers successfully perform at all-Russian and international competitions in all sections of kickboxing, using the technique of preparing kicks in taekwondo, proposed by the coaches. Every year athletes bring medals of various denominations from cups and championships of Russia, Europe, world and world tournaments.

Conclusions

1. The developed methodology for teaching taekwondo footwork in all sections of kickboxing includes seven weeks of training.

2. Preparation of athletes in training for all-Russian and international competitions has a priority in the training process of kickboxers.

3. The results of the performances of athletes - participants in the experimental part of this research clearly demonstrated the effectiveness of the author's training program; 17 gold at the Russian Cup, 24 gold at the Russian championship, 18 gold at the European Cup, 20 medals at the World Cup and 6 gold medals at the world tournament were won.

This type of struggle is not native to our country; however, it has become more and more popular with young people and juniors in recent years. For example, all athletes from Russia won prizes at the Olympic Games in Tokyo in 2020, with overwhelming success and all the data for further improvement and development.

Thus, the effective use of a fast and well-mastered fighting technique contributes to the quantitative excess of the kicks applied due to the speed and force with which the kicks are delivered by the practiced movements, and the increase in taekwondo footwork in kickboxing allows you to successfully perform at all-Russian and international competitions, given that the strength of the work of the hands depends directly on the leg located behind (the stubborn leg).

References:

1. Ashley, S. (2011). Kickboxing. England: Lumina Press, 139.
2. Filimonov, V.I. (2012). Boxing and kickboxing. Training: an educational and methodological guide for trainers-teachers in boxing and kickboxing. Moscow: Insan, 528.
3. Falsoni, E, Micheli, A. (2011). Kickboxing as a phenomenology of sports. Milan: miolagrafiche, 205.
4. Kleshchev, V.N., Kupryanov, A.A., Ukraintsev, V.V, Gerasimov, M.V., Kushtanova-M., M.E. (2015). The program of sports training "Kickboxing", 228.
5. Podpalko, S.L., Novikov, A.A. (2007). The main effective technical actions in taekwondo. Modern humanitarian studies, 2, 262-264.
6. Poteryakhin, A.A., Kondakov, V.L., Voronin, I.Y. (2020). Kickboxing. Tatami-disciplines: an educational and methodological manual. Belgorod: Epicenter LLC, 160.
7. Tsvetov, V.I, Tsvetov, S.V., Voronin, I.Yu., Poteryakhin, A.A., Kirichenko, Yu.N. (2019). Kickboxing. Full-contact with low-kick. Kursk: LLC "TOP", 60.
8. Voronin, I.Yu., Poteryakhin, A.A. (2018). Kickboxing. Kick-light. Belgorod: Epicenter LLC, 44 .
9. Voronin, I.Yu., Poteryakhin, A.A. (2018). Kickboxing. Light contact. Belgorod: Epicenter LLC, 56.
10. Voronin, I.Yu., Poteryakhin, A.A. (2018). Kickboxing. Pointfighting. Educational and methodological manual. Belgorod: Epicenter LLC, 56.
11. Voronin, I.Yu., Poteryakhin, A.A. (2018). Kickboxing. Technique for novice athletes. Belgorod: Epicenter LLC, 56.
12. YouTube-Internet channel (Branmanndan Channel). Available at: <https://www.youtube.com/channel/UCp95kNDS9hH71M1wyB68lb>.