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Research on the Winning Factors of 3x3 Basketball Techniques

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Abstract

Background and Aim: China's three-player basketball sport developed rapidly after being approved by the International Olympic Committee as an Olympic event, but there are obvious shortcomings in theoretical research, technical training, tactical strategies, and international experience. The lack of in-depth theoretical research and technical training models makes it difficult for players and coaches to fully understand the characteristics and winning factors of three-player basketball, resulting in insufficient international competitiveness. In contrast, other countries such as Serbia and Latvia have performed outstandingly in this field. If China can attach importance to the theoretical research and technical training of three-player basketball, and establish an effective training model, it is expected to rapidly improve the level of three-player basketball. **Materials and Methods:** This article aims to deeply explore the winning factors of 3x3 basketball technology. By comprehensively using literature review, mathematical statistics, and video analysis methods, the 3x3 basketball tournament of the 32nd Tokyo Olympics is taken as the research object to conduct in-depth research on 3x3 basketball technology.

Results: Latvia, the champion team of the 3x3 basketball tournament at the 32nd Tokyo Olympics, emphasizes teamwork. They have a higher three-point shooting percentage than their opponents, have more crucial close-range shots, and have a clear advantage in free throw shooting percentage. The proportion of team cooperation scores is high, mainly achieved through pick and roll assists, with high breakthrough times and success rates. They perform well in rebounding and have good error protection, but need to balance pressing and fouls. These factors together helped them achieve victory.

Conclusion: In terms of scoring, the team should focus on diversified three-point training, strengthen pick and roll coordination, improve breakthrough and layup abilities, as well as free throw techniques. Cultivate team collaboration awareness and cooperation skills to ensure excellent overall performance of the team. In terms of assists, focus on practicing pick and roll and direct pass techniques, while strengthening breakthrough and finishing abilities. In breakthrough training, emphasis is placed on improving the ability to break through cover and position perception. In terms of rebounding, mistakes, and fouls, emphasis is placed on teamwork in attacking, cultivating rebounding skills, intelligent pressing, and quick counterattacks to improve the team's performance in these key areas. These training strategies help teams gain more scoring opportunities in matches and improve their overall competitive level.

Keywords: 3x3 Basketball; Basketball Techniques; Winning Factors

Introduction

Three-person basketball has rapidly developed in China, especially after the first three-person basketball event was established at the 2020 Tokyo Olympics, and its importance has become even more prominent. However, despite its widespread popularity in China, relevant theoretical research has significantly lagged, especially in terms of its development relative to actual sports. Theoretical research in this field is not only relatively scarce but usually directly transplanting the traditional theory of five-player basketball to three-player basketball, without fully considering the unique characteristics of three-player basketball. This deficiency has affected the players' and coaches' deep understanding of this project.

In addition, the Chinese three-player basketball team faces a series of challenges in international competitions, including a lack of comprehensive understanding of success factors, insufficient technical training, immature tactics and strategies, and a lack of international experience. These factors may put the Chinese team at a disadvantage in international competitions.

Therefore, the goal of this study is to fill this knowledge gap, provide theoretical research on the winning factors of three-player basketball matches, and provide practical suggestions and guidance for the further development of Chinese three-player basketball. This will help Chinese players and coaches better understand this project, improve their technical level, develop tactical strategies suitable for three-





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Research Gate

player basketball, and gain valuable experience in international competitions, thereby becoming more successful in future international competitions.

Literature Review

Research on the history and origins of three-on-three basketball

Three-on-three basketball, which originated in the United States in the mid-20th century, is a variant of basketball that consists of two teams of three playing in half court. In China, this sport was introduced in the late 20th and early 21st centuries and was initially popular among students and basketball enthusiasts. Its rapid popularity was due to its low personnel requirements, simple rules, short-term games, and strong entertainment. The Chinese government also actively supports this sport, promoting the development of three-on-three basketball in China through policies and event organization.

Research on Winning in Basketball Games

Xie Yalong proposed in "On the Law of Victory" that the law of victory holds a decisive core position among all laws. He believes that to win the competition and achieve satisfactory results, the first step is to understand and master the essence of the winning laws of the sports event. Only by truly understanding the winning rules of the project can scientific training plans and strategies be formulated in competitions and training (Xie, 1991).

Gong Shijun divided the winning systems of basketball into three categories in his "Research on Competitive Basketball Winning Systems": the winning principles of sports events, the strategic formulation of winning principles, and the implementation of strategies in competitions. He pointed out that the winning process in basketball matches is based on adhering to the rules, formulating strategies before and during the game, allowing athletes to fully utilize their competitive abilities, and limiting opponents' performance to achieve victory in the game. He believes that the characteristics of height, comprehensiveness, precision, and speed in basketball games are the keys to winning the game (Gong, 2006).

Zhang Dawei pointed out in his "Analysis and Research on Winning Factors in Competitive Basketball Games" that athletes are the key to winning, and their competitive level often determines the direction of the game's victory or defeat. He researched athletes' skills, coordination, physical fitness, and psychological quality, and concluded that with the athletes' technical level and team cooperation as the core factors, objective factors have a relatively small impact on the competition but cannot be ignored (Zhang, 2014).

Ma Xingkai pointed out in "Research on Winning Factors in Basketball Games" that winning factors are determined by basketball rules and the essence of sports, mainly including on-court sports, off-court coaches, game rules, the professional level of referees, and opponent strength. Among them, the athlete factor is considered the most important factor. He also put forward several requirements: to improve the athletes' strength level, formulate reasonable strategies and flexibly apply them in competitions, seize opportunities in competitions, and handle the relationships between various elements. Only when these requirements are met can the probability of winning be increased (Ma, 2006).

Han Yubin pointed out in "Analysis of Technical Winning Elements in Competitive Basketball Competitions" that the key to winning on the field is centered around the control of basketball by players. He also mentioned other winning factors, including athletes' control of movements, visual field, and emotional control during the competition. Among the technical elements, shooting accuracy is considered the core element of all basketball techniques (Han, 2010).

The above research mainly explores the winning factors of basketball games from multiple perspectives, including subjective and objective, technical and tactical, athletes and coaches. The research results indicate that among all the winning factors, athletes play an absolute leading role. Therefore, this article will focus on exploring the winning factors of three-on-three basketball matches from the perspective of athletes.





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At present, there is almost no research on the winning factors of three-on-three basketball matches, and existing research mainly focuses on five-on-five basketball matches. These studies explore aspects such as winning rules, winning principles, technical elements, athlete factors, and competition strategies. Among them, competitive level, teamwork, technical level, physical fitness, and the psychological quality of athletes are considered key factors that affect the outcome of the competition. Although the research on the winning factors of three-on-three basketball matches can draw on the existing research results of five-on-five basketball matches, it is also necessary to consider the characteristics and uniqueness of three-on-three basketball matches. There are differences between three-on-three basketball matches and five-on-five basketball matches in terms of the number of athletes, venue area, competition format, and tactical characteristics. Therefore, further research is needed on the winning factors of three-on-three basketball matches, exploring their commonalities and uniqueness.

In summary, the study of winning factors in three-on-three basketball matches is a relatively new field that requires further exploration and research. By drawing on the existing research results on the winning factors of five-player basketball and combining the characteristics and uniqueness of three-on-three basketball matches, new ideas, and methods can be provided for research in this field.

Conceptual Framework

Input

1.Review the research literature on the winning factors of three player basketball techniques in the past decade, and determine the research indicators and framework for the winning factors of three player basketball matches;

2.Statistical data of the 3x3 men's basketball matches at the 32nd Tokyo Olympics;

Process

1.Literature review method: To understand the previous research's understanding of the winning factors of three player basketball, and provide a theoretical basis for the research framework.

2.Mathematical statistics method: Analyze the correlation between technical and tactical data indicators such as scores, rebounds, assists, steals, blocks, picks, sudden points, passes, cuts, and countermeasures, and team performance, in order to ultimately determine the technical winning factors of the three player basketball game;

3. Video analysis method: Conduct statistical analysis on the performance of the winning team's technical winning factors during the competition process through video analysis method;

Output

Based on a systematic analysis of 3x3 basketball technical factors, the winning factors of 3x3 basketball technology are ultimately determined

Figure 1 Conceptual Framework

Methodology

Population and sample: Research literature on the winning factors of five-player and three-player basketball matches in the past decade both domestically and internationally; Technical data and video footage of the 32nd Tokyo Olympics Triple Basketball Tournament.

Research instruments: Observation tools: statistical tables, recording tables, cameras or video equipment, video cutting tools. Computer software and applications: Software tools for data entry, data analysis, and statistical analysis, such as SPSS and Excel.





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Data collection

Literature method: According to the needs of research purposes, this article searched for "3 on 3", "3 x 3", "streetball", "street basketball", "three-player basketball", "three-player basketball technology", "three-player basketball tactics", "winning factors", and "three-player basketball winning factors" from the Library of Guangdong University of Finance and Economics, the electronic database of China Knowledge Network, and the Internet. Foreign literature on three-player basketball was searched through EBSCO data; Find relevant information about the three-player basketball competition through the FIBA official website. By screening, summarizing, analyzing, and summarizing the literature obtained through the above channels, a theoretical basis is provided for the writing of the paper.

Data analysis: Mathematical statistics: Mathematical statistics is a method used to analyze and summarize specific data, which can help us analyze and summarize collected data, and discover valuable patterns and information from it. This article conducts statistical analysis of the technical data of the team, including scores, rebounds, assists, steals, blocks, covers, sudden points, passes and cuts, and coordination. The specific use of basketball statistical software is to collect basic data and video observation data from all men's competitions in the 32nd Tokyo Olympics' three-person basketball tournament. The obtained data will be utilized using SPSS20 software. Use multiple stepwise regression analysis to determine the significance of the correlation between two or more variables. Consider P<0.05 as a significant correlation and P<0.01 as a highly significant correlation in the results. The specific operation is as follows:

- 1. Data collection and processing, collect data on three-player basketball matches and technical statistics of players.
- 2. Pearson correlation coefficient analysis, Pearson correlation analysis is a statistical method used to measure the linear relationship between two numerical variables. It can help you determine whether these two variables exhibit positive, negative correlation, or no linear relationship.

The two main statistical results in Pearson correlation analysis are the Pearson correlation coefficient (r) and p-value:

The Pearson correlation coefficient (r) is used to measure the strength and direction of the linear relationship between two numerical variables. Its value is between -1 and 1, with absolute values closer to 1 indicating a stronger correlation, positive values indicating a positive correlation, negative values indicating a negative correlation, and close to 0 indicating no linear relationship. P-value is used to evaluate the significance of the correlation coefficient. It indicates whether the observed correlation coefficient is statistically significant, that is, whether it may be due to random factors. Usually, researchers compare the p-value with a pre-set significance level (usually 0.05). If the p-value is less than the significance level, the correlation is usually considered significant; If the p-value is greater than the significance level, the correlation is usually considered insignificant.

In summary, the Pearson correlation coefficient tells you the strength and direction of the relationship between two variables, while the p-value tells you whether the relationship is statistically significant. If the correlation coefficient is close to 1 or -1 and the p-value is less than the significance level, it can be concluded that there is a significant linear correlation between the two variables.

This study statistically analyzed the basic technical indicators of each team in a total of 34 3x3 men's basketball matches at the 32nd Tokyo Olympics and used SPSS software to perform Pearson correlation coefficient analysis. These technical indicators were correlated with the outcome of each match, represented in binary form (win=1, loss=0), and the Pearson correlation coefficient (r) and significance level (Sig.) were obtained. The Pearson correlation coefficient measures the strength and direction of the linear relationship between technical indicators and competition outcomes, while the significance level is used to determine whether the correlation is statistically significant.

3. Video analysis method, use video playback analysis to observe the techniques used by the 3x3 men's basketball champion team Latvia and their opponents in the 32nd Tokyo Olympics, and analyze the impact of these techniques on the outcome of the game. This includes watching game videos, capturing key clips, conducting statistics, and conducting comparative analysis.





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Results

1. Research and Analysis of Individual Technical Factors in the 3x3 Men's Basketball Tournament of the 32nd Tokyo Olympics

In a 3x3 game, some common basic indicators related to personal skills include score, number of shots taken, number of hits made, number of shots taken, number of free throws, number of hits, assists, breakthroughs, rebounds, blocks, errors, etc. The following author conducted a statistical table n on the basic technical indicators of each team in a total of 34 3x3 men's basketball matches at the 32nd Tokyo Olympics, and used SPSS software to conduct Pearson correlation coefficient analysis.

Table 1 Statistical Table of Pearson Correlation Analysis Results (N=34)

Win and lose (bi	inary)
Pearson correlation coefficient	Ranking
0.655**	1
0.413**	2
0.388**	3
0.318**	4
0.234*	5
-0.291*	6
-0.225*	7
0.218*	8
0.115	
-0.008	
0.103	
0.149	
-0.025	
	0.655** 0.413** 0.388** 0.318** 0.234* -0.291* -0.225* 0.218* 0.115 -0.008 0.103 0.149

^{**}P < 0.01, *P < 0.05

According to the Pearson correlation analysis results in the table above, it is shown that:

- 1. There is a strong positive correlation between scores and game outcomes, with a correlation coefficient of 0.655 and a P-value of 0, indicating a significant correlation. This indicates that in 3x3 basketball matches, teams with higher scores are more likely to win, and scoring is a key winning factor;
- 2. There is a significant positive correlation between the number of free throw hits and the number of free throws, with correlation coefficients of 0.413 and 0.388, respectively, and P-values of 0.001 and 0.002. This indicates that performance in free throws is also crucial for winning.
- 3. There is also a significant positive correlation between the number of hits from the two-pointers and the outcome of the game, with a correlation coefficient of 0.318 and a P-value of 0.008. This means that in the game, the team with the more chances of hitting the second goal is more likely to win.
- 4. There is also a significant positive correlation between the number of one-point shots hit and the outcome of the game, with a correlation coefficient of 0.234 and a P-value of 0.045, respectively. This indicates that performance in one-point shooting is crucial for winning.
- 5. There is a significant positive correlation between the number of assists and the outcome of the game, with a correlation coefficient of 0.218 and a P-value of 0.038, indicating that assists play an important role in helping teams achieve victory.
- 6. There is a certain negative correlation between errors and fouls and the outcome of the game, although the correlation is relatively low, it is still significant. The correlation coefficient for errors is -0.225 with a P-value of -0.065, while the correlation coefficient for fouls is -0.291 with a P-value of 0.016. This means that teams with more mistakes and teams with more fouls are more likely to lose. The relationship between other indicators such as the number of shots taken from a one-point shot, the





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number of shots taken from a two-point shot, breakthroughs, rebounds, and blocks, and the outcome of the game is not very significant, and the correlation is weak and not significant.

In summary, these data analysis results emphasize the importance of scoring, free throw hits, free throws, two-pointers, one-pointers, and assists in the 3x3 men's basketball competition at the 32nd Tokyo Olympics. They also point out that mistakes and fouls can hurt game results.

2. Comparative analysis of the score

The analysis object of the competition is Latvia, which won the 3x3 men's basketball championship at this Olympic Games. Analyze the data collected from 10 matches with opponents to identify the factors that led to Latvia's victory.

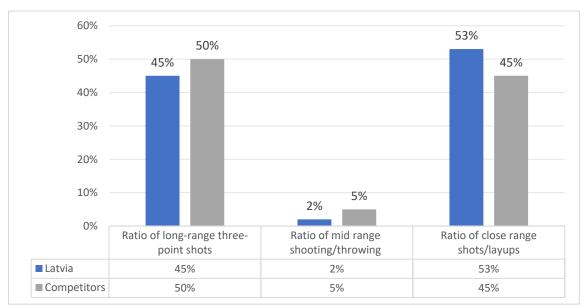


Figure 2 Proportion of shots taken by different scoring methods

Figure 2 shows that Latvia achieved 53% in close-range shooting/layup shots, which is significantly more inclined towards interior scoring compared to 45% in long-range three-point shots. Compared to this, mid-range shooting/throwing only accounts for 2%, which is the least of the three shooting methods. Compared to the opponent, their close-range shooting/layup ratio is 45%. This indicates that Latvia tends to seek scoring opportunities closer to the basket, and is more focused on interior scoring and layup opportunities compared to its opponents.

The shooting percentage of three-point shots has a significant impact on the outcome, although the number of shots is not high and the shooting percentage is higher than the opponent. This reflects the importance of three-pointers in the game. The Latvian team also plays a crucial role in the game by effectively utilizing the three-pointers through point chasing. In terms of mid-range shooting, although the shooting percentage is lower than that of the opponent, the impact on the game result is not significant due to the small number of shots taken. In terms of close-range shooting/layups, Latvia obtains more opportunities through pick and roll and reasonable under-basket coordination, and a high shooting percentage becomes a key factor in winning. In addition, free throws also have an impact on victory or defeat, with Latvia outperforming its opponents in terms of free throws and shooting percentage.





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Table 2 Proportion of Scores Based on Individual Ability and Team Cooperation

Team	Relying on Personal to Score	Proportion of scores based on personal abilities	Relying on teamwork to score	Proportion of scores based on team cooperation
Latvia	4	23%	13	77%
Competitors	5.2	33%	10.1	67%

From Table 2, it can be seen that Latvia relies on team collaboration to score 77%, which is much higher than the 23% that relies on individual ability to score. At the same time, Latvia relies on team collaboration to score an average of 13 points per game, which is 2.9 points higher than the opponent's average of 10.1 points per game. This indicates that the champion team Latvia places more emphasis on teamwork among teammates, and their scoring ability is superior to their opponents. Team cooperation can make the attack more reasonable and smoother, of course, personal skills are still the foundation. In the game, it can be seen that Latvia creates many open shooting opportunities through team cooperation. Players can throw the ball into the hoop after the opportunity appears, which is also the fundamental reason for Latvia's high shooting percentage. So, based on ensuring personal skills, it is crucial to pay more attention to teamwork as the key to winning. During the training process, we must instill in the practitioners the concept of teamwork, as basketball is a team sport. The following will provide a more in-depth analysis of team offensive coordination.

3. Comparative analysis of assists

In the research on assists in the field of 3v3 basketball technology, the author focuses on two key indicators: the number of assists and the method of assists., The assist method refers to the method by which a player passes the ball to achieve assistance, including pick and roll coordination, breakthrough scoring assistance, passing and cutting assistance, and fast transfer/direct assistance. Understanding different assist methods is crucial for formulating tactical strategies and improving the player's technical level.

Table 3 Statistical Table of Assisting Times and Methods

Team (per game)	Latvia	Competitors
Number of assists	7	4.6
Pick and roll with assists (proportion)	5.4 (77%)	2.7 (59%)
Breakthrough scoring with assists (proportion)	0.5 (7%)	0.5 (11%)
Give-and-Go with assisting (proportion)	0.2 (3%)	0.3 (7%)
Quick transfer ball assist(proportion)	0.3 (4%)	0.8 (17%)
Direct pass assist(proportion)	0.6 (9%)	0.3 (8%)

The correlation between assists and wins is significant in the Pearson correlation analysis mentioned earlier. Table 3 shows that Latvia has an average of 7 games, 2.4 times higher than the opponent's average of 4.6 games, which once again confirms that Latvia places more emphasis on team cooperation in competitions.

In terms of the selection of assist methods, the average number of Pick-and-roll assists per game is 5.4, while the opponent's average number of assists per game is 2.7. In terms of the proportion of Pick and roll assists, both Latvia and the opponent have the highest among all options, with Latvia having 77%, which is much higher than other methods, and also higher than the opponent's 59%, indicating that in a three-player basketball game, the number of assists obtained through Pick and roll is the highest, mastering this technique more proficiently will have a higher chance of winning. In watching the game, it can be observed that after Latvia's pick-and-roll cooperation, the majority of teammates chose to receive the ball from the basket and shoot from the bottom, while the number of times they chose to Pick and roll the ball from the outside is very small, resulting in fewer assists.



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Breakthrough scoring with assists, Give-and-Go with assisting, Quick transfer ball assists, and Direct assists are not more than 10% as shown in the above table. Latvia's average number of sudden assists per game is 0.5, which is equivalent to that of its opponents. In matches, Latvia rarely relies on personal ability to launch breakthroughs and attract defense before conducting ball distribution and assistance. Most of the time, they are launched through the pick of teammates, and the successful breakthrough results in more 2v1 assists. However, the author counts these types of assists in Pick and roll assists. What surprised me was that the number of Give-and-Go with assistants appearing in this game was very small. Latvia only had an average of 0.2 times per game, while the opponent had 0.3 times. Occasionally, during the game, players were seen using picks to cut and receive the ball and score points. In Table 9, it is shown that Latvia's fast transfer ball only assists 0.3 times per game. As the fast transfer ball cannot tear the opponent's defense, teammates still have a quick defense after receiving the ball. In the game, the fast transfer ball mainly serves as a transfer and transition function, preparing for the next Pick-and-roll cooperation. In the direct assists, Latvia averaged 0.6 times per game, which is higher than the opponent's average of 0.3 times per game. This is because Latvia made a brief mistake in the opponent's defense during the game by effectively pressing, snatching, and quickly attacking or transitioning.

In summary, based on these assist data, it is recommended to focus on cultivating the skills of Pick and roll coordination during the training process, including the passing and breakthrough skills of the ball holder, as well as the ability of the team members to Pick and roll smoothly and receive and terminate the ball. In addition, it is necessary to strengthen the practice of direct passes to improve the passing ability after steals and the fast attack direct pass ability during offensive and defensive transitions. These training focuses can help teams improve their assist efficiency, thereby increasing their chances of victory.

4. Comparative analysis of breakthrough

In the breakthrough research of 3v3 basketball technology, the author investigated two key indicators: breakthrough success rate and breakthrough method, to evaluate their importance in basketball matches.

The specific breakthrough methods include: relying on personal ability to break through, using cover to break through, and quickly moving to get rid of the defender's breakthrough after receiving the ball. These findings highlight the crucial role of breakthrough success rate and breakthrough method in 3v3 basketball technology for the game.

Table 4 Statistical Table of Hit Rates for Different Breakthrough Methods

Team (per game)	Latvia	Competitors
Breakthrough times (hit rate)	7.3 (70%)	6.4 (61%)
Number of breakthroughs based on personal ability (hit rate)	2.5 (41%)	2.8 (49%)
Number of breakthroughs through pick (hit rate)	3 (76%)	2.1 (69%)
Number of breakthroughs with positional advantage after	1.8 (85%)	1.5 (69%)
receiving the ball (hit rate)		

According to the data in Table 4, breakthroughs play an important role in basketball games. Although they were not directly related to victory in previous Pearson correlation analyses, their potential value cannot be underestimated. Breakthrough can have a huge impact on the opponent's defense system, even if it does not directly lead to scoring or assists in the end, it can change the opponent's defense formation and create good conditions for the subsequent stages of attack. The excellent ball handling ability after breaking through the defense line often cannot accurately reflect the potential positive impact of attack through data statistics. Taking the champion team Latvia as an example, their average number of breakthroughs per game is 7.3, which is more than the opponent's 6.4, indicating that their attack is more aggressive. In addition, their breakthrough shooting percentage is 9% higher than their opponent's, indicating that they are more capable of breakthrough scoring. Specifically, Latvia performs the best in breakthrough with positional advantage after receiving the





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ball, with a shooting percentage of up to 85%; The second is to use pick to break through, with a hit rate of 76%; However, the success rate of relying on personal ability to break through is only 41%, lower than the opponent's 49%.

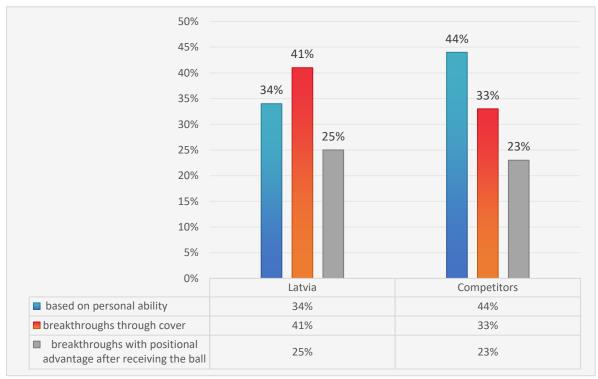


Figure 3 Proportion of shots made by different breakthrough methods

Figure 3 shows that in the proportion of shots made by different breakthrough methods, Latvia is more inclined to use a pick to break through, accounting for 41%, higher than the opponent's 33%. Secondly, breakthroughs are made through personal ability, accounting for 34%. It should be noted that most breakthroughs made through personal ability are achieved through direct breakthroughs after steals, and few players make breakthroughs through personal skills. Finally, there is a breakthrough with positional advantage after receiving the ball. Although the percentage is the lowest (25%), the shooting percentage is the highest, indicating that the effectiveness of this breakthrough method cannot be ignored.

Therefore, in the process of breakthrough training, it is important to focus on cultivating players' ability to break through pick and finish, while also improving their position perception ability, so that they can stand in a favorable position when receiving the ball and be good at seizing the opportunity to score breakthrough points. In addition, it is also necessary to strengthen the training of players' ability to quickly break through layups after steals or opponent's mistakes. In summary, breakthroughs have important value in basketball games, as they may not only be reflected in scoring but also affect the entire attacking process. Therefore, they need to be valued and cultivated in training.

5. Comparative analysis of Rebound Turnovers and Fouls

Table 5 Statistical Table of Rebounds, Errors, and Fouls

Team	Rebound	Offensive rebound	Defensive rebound	Turnovers	Fouls
Latvia	14.7	3.8	10.9	3.8	6.7
Competitors	11.8	3	8.8	4.8	6.4





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According to Table 5, in terms of rebounds, the Latvian team averaged 14.7 rebounds per game, while the opponent received 11.8 rebounds. This means that Latvia has a certain advantage in rebounding, as they grab more rebounds than their opponents. Offensive rebounds: Latvia averaged 3.8 offensive rebounds per game, while the opponent received 3. In the game, it can be seen that Latvia tends to cooperate with the team in attack, with very few individual strong attacks. This team-coordinated attack method gives attacking players more opportunities to stand closer to the basket and compete for offensive rebounds. This is also the reason why Latvia has more offensive rebounds than their opponents, and the increase in offensive rebounds provides them with more opportunities for second attacks. Defensive rebounds: Latvia has an average of 10.9 defensive rebounds per game, while the opponent has 8.8. This means that Latvia also has a certain advantage in defensive rebounding, as they can limit their opponents' second offensive opportunities.

In terms of mistakes: Latvia has 3.8 mistakes per game, while the opponent has 4.8. This indicates that Latvia performs well in protecting the ball, making fewer mistakes than their opponents, which can help maintain control of the game. The reason why opponents make higher mistakes can be seen in the game. Once Latvia has a suitable pressing opportunity in defense, the Latvian players will be very decisive in attacking and pressing the opponent, causing multiple mistakes by the opponent, some of which are converted into steals and fast break scores.

In terms of fouls: Latvia has 6.7 fouls per game, while the opponent has 6.4. In terms of fouls, there is not much difference between Latvia and its opponents. However, it is worth mentioning that in the game, it was seen that due to Latvia's fierce defense, some pressing can cause opponents to make mistakes, while others may cause defensive fouls due to excessive pressing. So, in this stage, it is necessary to strike a reasonable balance between the two to better control the rhythm on the field.

Based on the above analysis, we can focus on the following aspects of training:

Teamwork Offensive: Strengthen team collaboration and cooperation between players, and encourage joint creation of offensive opportunities. This helps to improve offensive efficiency and increase the number of offensive rebounds.

Strengthen rebounding: Rebounding is an important part of the game, and it is necessary to focus on cultivating players' physical confrontation ability and positioning skills, enhancing their awareness of rebounding, including offensive and defensive rebounds.

Smart pressing: When defending, it is important to control the strength and position of the pressing to reduce the risk of defensive fouls. At the same time, it is necessary to cultivate players' defensive awareness, be good at predicting the opponent's movements and positions, and create opportunities for the opponent to make mistakes.

Quick counterattack: Once an opponent makes a mistake, one should be good at seizing the opportunity to quickly switch attacks to obtain easy scoring opportunities.

Discussion

In the 3x3 men's basketball competition at the 32nd Tokyo Olympics, success was closely related to personal technical factors, including scoring, free throw hits, 2-point hits, 1-point hits, and assists, showing a significant positive correlation. At the same time, there was a significant negative correlation between errors rule violations, and victory. The secret to Latvia's success lies in emphasizing teamwork, being adept at using cover tactics for efficient shooting, especially in three-pointers and free throws, and being adept at creating opponents' fouls. They also excel in assists, offensive rebounds, defensive rebounds, and reducing errors, but need to carefully control fouls and demonstrate high-intensity defense.

Han Yubin proposed in his research on "Analysis of Technical Winning Factors in Competitive Basketball Competitions" that the key to winning on the field is the control of basketball by players. He also pointed out that other winning factors are athletes' control of movements, visual control, and emotional control during the game. As a technical element, shooting accuracy is the core element of all basketball techniques (Han, 2010).





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Yang Pengfei found through his research in "Analysis of the Sports Law of Winning Factors in Basketball Games" that factors such as hit rate, speed, technical and tactical application ability, physical fitness, and psychological fitness are the key to winning a basketball game (Yang Pengfei. 2005).

In his research on the winning factors of women's basketball matches at the Beijing Olympics - also on the characteristics and coping strategies of Chinese women's basketball, Zhu Yong took all the matches of women's basketball at the 2008 Olympics as the research object. The research showed that in the matches, the average score in midfield, 2-point shooting, errors, 2-point shooting percentage, 2-point shooting times, assists, rebounds, blocks, and steals. The indicators of free throw scores and the average number of free throws per game affect the ranking of game results from highest to lowest. (Zhu, 2009)

Through comprehensive analysis of literature citations and the author's conclusions, we can draw the following viewpoints:

The importance of personal technical factors: The author's research found that in 3x3 men's basketball games, personal technical factors, including scores, free throw hits, 2-point hits, 1-point hits, and assists, are significantly positively correlated with victory. This indicates that the player's technical level is crucial for winning the game. This is consistent with the technical factors mentioned in other studies such as shooting accuracy, speed, and the ability to use techniques and tactics in basketball games.

The importance of teamwork: From the analysis of the literature, it can be seen that teamwork also plays an important role in basketball matches. The example of Latvia emphasizes the importance of teamwork in scoring, assists, rebounding, and defense. This is consistent with the importance of teamwork and assistance mentioned in other studies.

Emotional control and psychological quality: Although emotional control is not explicitly mentioned in the literature, psychological quality may also play a key role in basketball games. Other studies may include studies on player emotional control and psychological quality, which may also have an impact on game outcomes.

In summary, the author's conclusion, along with other studies, highlights multiple key factors in basketball matches, including personal technical level, teamwork, and possible psychological qualities. These factors are intertwined and affect the outcome of the game, providing a rich research field for basketball matches.

Table 6 Discovery of Technical Winning Factors in Triple Basketball Tournament

Factor	Correlation	Brief Explanation
Points	Positive	Points show a significant positive correlation with victory.
		Higher scores increase the likelihood of winning.
Free Throws Made	Positive	Free throw accuracy demonstrates a clear positive correlation
		with success.
2-Pointers Made	Positive	Successful 2-pointers exhibit a distinct positive correlation
		with victory.
1-Pointers Made	Positive	The accuracy of 1-pointers displays a significant positive
		correlation with winning.
Assists	Positive	Assists exhibit a clear positive correlation with success, emphasizing the importance of teamwork.
Turnovers	Negative	Turnovers demonstrate a notable negative correlation with winning. Reducing turnovers is crucial for victory.
Rule Violations	Negative	Rule violations show a significant negative correlation with success.
Teamwork	Success Key	Teamwork is one of Latvia's secrets to success, contributing to efficient shooting and assists.





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Factor	Correlation	Brief Explanation
Foul Control	Success Key	Another critical factor in Latvia's success is cautious foul
		control, maintaining balance in the game.
Screen Tactics	Success Key	Latvia's success is also attributed to their effective use of
		screen tactics, leading to efficient shooting.
3-pointers and Free	Success Key	Latvia excels in 3-pointers and free throws, increasing their
Throws		scoring capabilities.
Assists and	Success Key	Latvia's outstanding performance in assists, and offensive, and
Rebounds		defensive rebounds contributes to their victories.
High-Intensity	Success Key	Latvia's high-intensity defense aids in limiting opponents'
Defense		scoring.

Through Table 6, we can see that in 3x3 men's basketball games, there is a positive correlation between personal technical factors, including scores, free throw hits, 2-point hits, 1-point hits, assists, and success. The higher these factors, the greater the likelihood of victory. At the same time, there is a negative correlation between mistakes and rule violations and victory, reducing these factors contributes to success. The key to Latvia's success lies in teamwork, covering tactics, three-point shooting, and free throw percentage. At the same time, they excel in assists, rebounds, and defense, but need to pay attention to controlling fouls to demonstrate high-intensity defense.

By analyzing the matches of Latvian teams, valuable experience can be provided for Chinese players. Firstly, pay attention to personal technical factors such as scoring, free throws, two-point and one-point shooting percentage, and assists, which are positively correlated with winning. Chinese players can improve their technical level. At the same time, it is necessary to reduce errors and violations, which are negatively correlated with failure. Secondly, learn Latvia's teamwork and cover tactics, strengthen collaboration, and improve shooting accuracy. Three-pointers and free throws are worth paying attention to and striving to improve these skills. Latvia excels in assists and rebounds, while Chinese players can learn to fight for rebounds, protect rebounds, and reduce errors, but be cautious in controlling fouls. In summary, drawing on the experience of Latvia can help Chinese players improve their skills, teamwork, and game strategies, achieving better international results.

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