

THE EFFECTS OF THE PERKINS-BLYTH MODEL ON DEVELOPING FOOTBALL DRIBBLING, HANDLING, AND SCORING SKILLS

Ahmed Hassn Nasir*, Ishraq Ali Mahmoud

College of Physical Education and Sport Sciences, University of Baghdad, Iraq

Abstract

The purpose of the study is to determine how the Perkins-Blyth model affects students' learning of football skills of rolling, handling, and scoring. Participants in the study are first-year students at Wasit University's College of Physical Education and Sports Sciences. The experiment was conducted on a sample of (30) freshman students and the sample were divided into two groups, with (15) students in each group, and the authors used the experimental approach. The main experiment was applied, and then the post-tests were conducted, and the appropriate statistical methods were used after collecting the data for the tests in order to reach the results required to achieve the research objectives. The authors conclude that there is a preference for the experimental group over the control group in learning the RH and RS skills. Furthermore, the PB model raised the bar for skilled learners by focusing on learning for understanding and providing students with the chance to actively participate in and make a real contribution to the lesson's goals. Along with aiding in the learning process as a guide and facilitator, the instructor also played a part in the creation of products that improved the learner's proficiency in the skill and minimized performance errors. In order to raise students' skill levels, the authors advise instructors to incorporate the model into their lesson plans and learning activities.

Keywords: Perkins-Blyth model. Dribbling and handling skill. Dribbling. Scoring skill. Football.

Introduction

Since the objective is to provide students with everything necessary to bring about a change in their behavior in a manner commensurate with their abilities, many experts and specialists in the process of developing the teaching process see the need to contribute to the use of strategies, methods, and models that contribute to providing students with different concepts, skills, and behaviors. This prompted them to use contemporary teaching models that support the development of the student's abilities, not just a being receiver (Oudah & Rajabi, 2023).

Where a lot of teaching methods and models appeared, which are built on the basis of constructivist theory. It relies on the concept of building the learner's experience by linking the old experience with the new concept that the learner wants to learn through the intended educational situations that stimulate motivation to compete among peers to reach the desired results (Yaqoob, 2022). Which necessitated its entry into the educational process, especially in teaching sports skills and in all events, including the football game, which is one of the most important games due to its popular influence on societies and the importance it represents, both on the

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*Corresponding Author: Ahmed Hassn Nasir, College of Physical Education and Sport Sciences, University of Baghdad, Iraq

Correo-e: ahmed.hasan1104a@cope.uobaghdad.edu.iq

sports, social and economic side. Among these models is the PB model, which is regarded as one of the modern teaching models because it was used at Harvard University to address the issue of low cognitive output for students. The PB model, also known as the learning process for understanding the ability to provide learners with concepts and knowledge That serve the student in learning motor skills, especially in the area of coordination, consists of four educational stages and is built on the foundation of constructivist theory. By having the capacity to create a motor program that is dependent on the student's mental state and search for the desired and accurate information, which is reflected in his performance of these skills that demand the integration of fundamental abilities, which required a significant amount of the efforts of experts, specialists, and those in charge of the teaching process to develop them (Alwan, 2022).

Football skill execution is not a simple process for those in charge of the teaching process because it requires intellectual efforts on the part of students' minds, which are reflected in choosing the right course of action, which is connected to the cognitive aspect and the accumulated storage in the motor memory in order to achieve integration and compatibility between the cognitive stage and the actual application stage for skills. A modern teaching approach that focuses on the learner and activates his mental processes by offering stimuli that are appropriate for his abilities has become necessary in light of the aforementioned factors, allowing him to progress to the stage of skill mastery. Universities are the recipients of our research because they are viewed as an essential tributary for clubs and national teams. The research gains its importance by providing effective solutions in learning the skills of RH and RS in football for students using the PB model and knowing its impact on the events of the required development in the performance of the two skills.

Research problem

The researchers discovered that there is a shortage in the skill output to perform the students' complex skills by observing them in action, looking at previous studies and their recommendations, and attending meetings with football instructors. The researchers attribute the reason to a weakness in the mental processes of students when it is necessary to integrate two basic skills through perceiving the stimulus and the process of representation and adaptation. The reason for the weakness is that the learner is not given a role to be a participant, a researcher, or an explorer for information, which activates his mental processes and raises his level of ability to deal with stimuli, as opposed

to the method used, where his role is only a recipient of the information and a vessel for pouring out the instructor's ideas. Which is reflected on the student's skillful and cognitive performance, in addition to not using modern teaching strategies and models that keep pace with the development of the teaching process through the amount of cognitive stimuli that increase the learner's ability, raise his level of motivation, and reduce individual differences among learners.

Research aims

1. Determining the impact of the PB model on students' learning of RH and RS skills in soccer.
2. Determining the significance of the differences in post-test performance of the RH and RS football skills for students between the two groups (experimental and control).

Research hypotheses

1. There are statistically significant differences in the pre- and post-test results between the experimental and control groups for students who have learned RH and RS football skills.
2. In the post-tests, there are statistically significant differences between the experimental and control groups in how well the students learned the RH and RS football skills.

Research areas

The human field: It is comprised of first-year students at Wasit University's College of Physical Education and Sports Sciences for the 2021–2022 academic years.

Range of dates: From April 5, 2022, to June 1, 2022.

Physical field: Wasit University's stadium, College of Physical Education and Sports sciences.

The PB model: it is one of the instructional models that consists of four procedural stages, namely the stage (generating topics), the stage (understanding objectives), the stage (performance that demonstrates understanding), and the stage (continuous evaluation). Through the main

topics raised with explanation and clarification, finding evidence and examples, and generalization, the learner is able to do a variety of things that require thinking and developing concepts (Hethand: 2006, 33).

Research Methodology and Field Procedures

Research methodology

The authors used the experimental method with a pre and post-test for the two equal groups (experimental and control) due to its suitability to the nature of the research problem.

The research community and its sample

The research sample was chosen at random from the first-stage students at the College of Physical Education and Sports Sciences at the University of Wasit, who totaled (100) students divided into four divisions for the academic year (2021–2022). Division (C) served as the experimental group's representative, with (15) students. With fifteen students, Division (A) served as the control group, and Division (D) made up the exploratory sample. All injured, absent, repeat, and club players were disqualified.

Homogeneity and equivalence of the sample

The value of the torsion coefficient is between -1 and 1 which indicates a moderate distribution of the population (Tables 1 & 2).

The means, devices and tools used in the research

Research methods: scientific references and sources, in-person interviews, quizzes, and measurements

Equipment and tools used: HP laptop, scientific calculator, scientific posters, soccer balls 15, whistle, legal goals, medical scale, plastic signs number (10), adhesive tapes, cones.

Tests used

First: RH test (Amin, 2022)

Second: RS test (Al-Taie, 2018: 168)

Exploratory experiment

On (Tuesday), which corresponds to March 22, 2022, at 9 in the morning, the two authors conducted an exploratory experiment for the RH and RS skills

tests on a sample made up of (15) students who are outside the main sample with the aim of identifying all the benefits and drawbacks.

Field research procedures

Pre-test: With assistance from the assistant team, the authors conducted the pre-tests for the two groups (the experimental and control groups) on Sunday, 3/4/2022, at the stadium of the College of Physical Education and Sports Sciences/Wasit University.

The main experiment: The primary experiment was conducted on Sunday, April 5, 2022, using the PB model's 12 educational units, each of which had a time limit of (90) minutes, as part of a staged experiment that lasted a total of (1080) minutes. The model is based on the components of an educational unit, which include the stages of generating topics (10 minutes), comprehension goals (10 minutes), performance (which shows understanding) (30 minutes), and continuous evaluation (10 minutes).

Post-test: The post-tests for the two skills under study were conducted on Sunday, January 6, 2022, at precisely nine in the morning. The authors were concerned that the circumstances were similar to the pre-test.

Statistical means

The SPSS package is used.

Presentation and Analysis of the Results

Presenting, analyzing, and discussing the results of the pre and posttests in the studied variables (Tables 3 & 4).

Presenting, analyzing, and discussing the results of the post-tests in the variables studied and for the two research groups (Table 5).

Results and Discussion

It is obvious from the presentation and analysis of the results that there were significant differences between the research sample participants' pre-and post-tests, favoring the experimental group. The constructivist theory, whose core work depends on the learner and helps him to acquire skills through the active role that he represents within the educational situation through discussion, prediction, and discovery, is credited by the authors as the reason for this. This theory encourages students to become active and effective learners and seekers of information rather than just passive recipients of it. The PB model is used by the authors, and it is built on the principles and concepts of this

Table 1: The homogeneity of the research sample.

Statistical parameters	Measuring	Arithmetic	Standard	Torsion	sample number
	unit	mean	Deviation	Modulus	
Length	cm	170.13	6.5	-0.56	30
Mass	Kg	60.33	5.65	-0.47	
Age	year	19.6	0.38	0.73	

Table 2: Showing the equivalence of the two groups (experimental and control) in the two RH skills.

Variables	Meas. unit	Experimental group		Control group		Error level	Significance
		St. Deviation	Arith. Mean	St. Deviation	Arith. mean		
RH	Degree/Sec	0.139	0.465	0.168	0.59	0.091	Not Significant
RS	Degree/sec	0.134	0.478	0.168	0.606	0.101	Not Significant

Significant at a significant level of ≤ 0.05 .

Table 3: Showing the results of the pre and post-tests of the experimental group in the RH and RS skill tests.

variables	Meas. unit	Pre		Post		T-value	Error Level	Sig.
		Sec±	Sp.	Sec±	Sp.			
RH	Degree/sec	0.139	0.465	0.163	1.221	13.44	0	significant
RS	Degree/sec	0.134	0.478	0.217	1.253	12.934	0	significant

Significant at a significance level of ≤ 0.05 and a degree of freedom of 14.

Table 4: Showing the results of the pre and posttests of the control group in the RH and RS skill tests.

variables	Meas. unit	Pre		Post		T-value	Error Level	Sig.
		Sec±	Sp.	Sec±	Sp.			
RH	Degree/sec	0.168	0.59	0.126	0.168	3.409	0	significant
RS	Degree/sec	0.168	0.606	0.234	0.168	2.767	0	significant

Significant at a significant level of ≤ 0.05 and a degree of freedom of 14.

Table 5: Showing the results of the post-tests for the two groups (experimental and control) in the RH and RS skill tests.

variables	Meas.	Pre		Post		T-value	Error	Sig.
	unit	Sec±	Sp.	Sec±	Sp.		Level	
RH	Degree/sec	0.163	1.221	0.126	0.722	5.211	0.003	significant
RS	Degree/sec	0.217	1.253	0.234	0.78	5.385	0.001	significant

Significant at a significant level of ≤ 0.05 and a degree of freedom of 28.

theory. The constructivist theory puts the learner at the center of the learning process and emphasizes active learning, which emphasizes understanding through participation in the educational process and application of what is learned (Hassan et al., 2019). This is in line with a study that supports it (Naif and Atia: 2020, 82), which found that learning based on constructivist theory emphasizes the active role of the learner and the active participation of students in activities to produce good results. It is also in line with a study (Hamdan & Al-Sodany, 2022) that found that acquiring knowledge effectively requires self-reconstruction rather than receiving it from the outside. The model also introduced a competitive environment among the students, which sped up their learning and increased their motivation. The active role that the student plays in actually contributing to the achievement of the lesson's goals and the collaborative relationship between the student and the instructor gave students confidence in achieving high performance of the targeted skills. Learning is an emotional process because the student's active learning attitude is combined with feelings of excitement and suspense about the subject, which makes him positive, helps him understand, and makes him feel good about himself. These factors are reflected in the learning outcomes (Obada, 2002: 172). By giving students the full opportunity and the truth in cooperation with stimuli, encoding them, processing them, and coming up with solutions while taking into account individual differences, the use of contemporary models in the teaching process that are compatible with the changes of the era and its great developments, such as the PB model, clearly and significantly contributed to raising the level of thinking among students, which was reflected in their skilled performance. Learning new skills based on contemporary models and strategies while actively engaging in real-world applications encourages learners to use their thinking processes. In addition, the necessity of mastery in practical performance must be emphasized (Attia, 45: 2016). This is in line with the study's finding (Al-Aboudi, 2010: 20) that students' educational and performance outcomes are affected by their use of ineffective learning strategies, reliance on bad study habits, and poor information organization and retrieval skills. The PB model reveals what is going on in students' minds, which the authors believe enables instructors to create the educational unit in the best possible way and to achieve learning outcomes that are precise and stable. That is, in the sense of thinking aloud, and this is evident from the model's steps that gave the student the chance to find solutions to the issues he was facing, whether individually or in a group. In particular, the use of questions was encouraged, and this is consistent with the study (Al-Rammahi and Sattar: 2022, 391) that found that when students ask questions and seek answers from their peers, it helps them predict the proper steps to perform the skill, practice, and master. The acquisition of complex skills, which are the fusion of two or more basic skills, is facilitated by learning the fundamentals of football correctly and in accordance with studied scientific steps leading to the process of mastering it. This is because learning is transferred in an easy, and seamless manner. The program's inefficiency is the cause. The learner can always adjust a movement that is stable and clear without impairing performance. Since learning the fundamentals of movement facilitates the process of transferring to a wide variety of sports movements, even if they are challenging, it depends on the learner's ability and his ability to link them, the more similarities between the skills, the greater the impact of learning (Al-Rubaie, 2012). In addition, the gradation in giving exercises from easy to difficult and the complexity of the exercise commensurate with the abilities of the learners contributed greatly to the rapid acquisition of skills. This is consistent with what was proposed by (Mohammed and Fhadel: 2020,104) that the gradation from easy to difficult and the diversity in the use of exercises contributes to the enrichment of learners with information about the performance of the skills used. The authors also want to mention the educational program, which used prepared exercises and the visual and audio teaching tools they contained in its content. Their application through the model's steps helped to supplement the motor memory with experiences. This is reflected in the growth of mental functions, which in turn was reflected in the use of skills, and this is consistent with the study of (Ali and Jameel: 2020, 78). The development of the mental aspect is considered one of the most important foundations on which the success of the motor act is based, because of the elements it possesses that help the learner in understanding and realizing the different game situations until reaching the correct response at the right time. Additionally, breaking down the barriers of fear and loss of confidence among some of the students, active participation within the groups, and cooperative hard work in reaching solutions or perfect skillful performance gave an important addition to the learning outcomes for the process of teaching football skills. These actions fostered the spirit of love and increased confidence in their own. Collaborative learning is concerned

with groups, which is one of the effective strategies for learning, which is characterized by many characteristics such as positive interaction between group members, taking responsibility and developing self-confidence. Active learning is a collaborative situation in which the student interacts with his peers and cooperates with them (Ambo, 27: 2016).

Conclusions

The PB model contributed to raising the level of students in learning RH and RS skills. The students who used the PB model demonstrated a desire and enthusiasm to learn the two skills, and this is evident in how well they performed on the skills. The learner was given a significant role in directing the lesson and achieving the educational objectives by working through the PB model and the idea of its work according to constructive theory. We advise educators to talk about the necessity of varying their instructional approaches and incorporating all recent developments in football education and engaging instructors in awareness- and development-focused programs to learn about contemporary teaching models and methods.

References

- Al-Aboudi, Siham Ali (2010). Learning styles of distinguished students and their ordinary peers in the preparatory stage according to some variables, unpublished master's thesis, College of Education, University of Baghdad.
- Ali, M. F., & Jameel, S. M. (2020). Time of Motor Response To Stimuli (Auditory and Visual) and Its relationship with Blocking Accuracy In Volleyball. *Journal of Physical Education*, 32(4), 71–79. [https://doi.org/10.37359/JOPE.V32\(4\)2020.1042](https://doi.org/10.37359/JOPE.V32(4)2020.1042)
- Al-Rammahi, A., & Sattar, H. (2022). The Effect of Court Angles Strategy (Educational Corners) On Learning and Retaining Forehand in Tennis for Students. *Journal of Physical Education*, 34(3), 387–393. [https://doi.org/10.37359/JOPE.V34\(3\)2022.1294](https://doi.org/10.37359/JOPE.V34(3)2022.1294)
- Al-Rubaie, Mahmoud Daoud (2012), Learning and Teaching in Physical Education, 1st edition, Beirut, Dar Al-Kutub Al-Alami.
- Al-Taie, Hussein Ali (2018): Designing and rationing a test battery to measure some basic football skills for Premier League players, unpublished doctoral thesis, University of Baghdad, College of Physical Education and Sports Sciences.
- Alwan, S. A. (2022). Creative thinking and its relationship to visual field and visual speed among goalkeepers of the Iraqi Handball Premier League. *SPORT TK-Revista EuroAmericana de Ciencias del Deporte*, 22-22.
- Ambo, Saidi (2016), Active Learning Strategies 180 Strategies, Amman, Dar Al Masirah for Publishing and Distribution.
- Amin, N. M. (2022). Competitive performance exercises to develop transitional speed and agility and their impact on some offensive and defensive basketball skills for students. *Revista iberoamericana de psicologia del ejercicio y el deporte*, 17(6), 374-376.
- Attia, Mohsen Ali (2016), learning patterns and modern models, Amman, Dar Al-Safaa for printing and publishing.
- Hamdan, A., & Al-Sodany, A. K. (2022). The Effect of Web Quests on Academic Achievement in Handball for Female Sophomore Students of Physical Education and Sport Sciences College/ University of Baghdad. *Journal of Physical Education*, 34(2), 217–226. [https://doi.org/10.37359/JOPE.V34\(2\)2022.1268](https://doi.org/10.37359/JOPE.V34(2)2022.1268)
- Hassan, R. G., Mohammed, N. B. & Abbas, S. R. (2019). Effect of an educational program with visual effects on the development of sensory perception, motor compatibility and accuracy of basketball correction for deaf students. *Modern Sport*, 18(3). <https://www.iasj.net/iasj/article/230857>
- Mohammed, M. J., & Fhadel, A. H. (2020). The Effect of (Think - Pair - Share) Strategy on Performing Some Volleyball Fundamental Skills in Second Grade Secondary School Students. *Journal of Physical Education*, 32(3), 99–106. [https://doi.org/10.37359/JOPE.V32\(3\)2020.1025](https://doi.org/10.37359/JOPE.V32(3)2020.1025)
- Mohammed, N. B., (2018) Effect of training exercises according to the visual kinetic synergy in the learning of chest handling and high basketball dribbling for Down syndrome. *Modern Sport*, Volume 17, Issue 2, Pages 80-88. <https://www.iasj.net/iasj/article/161064>

- Naif, A. S., & Atia, M. A. H. (2020). The Effect of Constructive Learning Model on Cognitive Achievement and Learning dribbling Skill in Soccer for Secondary School Students. *Journal of Physical Education, 32*(2), 77-85. [https://doi.org/10.37359/JOPE.V32\(2\)2020.997](https://doi.org/10.37359/JOPE.V32(2)2020.997)
- Obada, Ahmed (2002), The effect of using the constructivist learning model on the achievement and development of scientific thinking among first year middle school students, Journal of the College of Education, Volume 19, Part One, Assiut University.
- Oudah, I. G. ., & Rajabi, R. . (2023). Designing an electronic vest to evaluate movement abilities in foil fencers. *SPORT TK-Revista EuroAmericana de Ciencias del Deporte, 12*, 2. <https://doi.org/10.6018/sportk.556251>
- Yaqoob, L. R. (2022). The Effect of Network Training Exercises In The Style Of Playing In The Development Of Some Basic Skills Of Young Footballe. *Revista Iberoamericana De Psicología Del Ejercicio Y El Deporte, 17*(6), 362-364]