



مجلة جامعة ذي قار لعلم التربية البدنية
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The Impact of a Sports Training Program on Some Elements of Physical Fitness in the Transition Phase of Youth Football in Iraq
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ABSTRACT

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Keywords:
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The research aims to improve some elements of physical fitness in the transitional phase of the youth category in the football category in Iraq, the researcher used the experimental method to suit the nature of the research, and the sample was deliberately selected from the youth category in football under 17 years old at the Oil Sports Club, where the exploratory study was conducted to calculate the scientific coefficients of the tests on (30) youth games outside the main sample, and the basic study was conducted on (60) Playing football under 17 years old. Among the most important results that the researcher reached through the research objectives and within the limits of the sample, the researcher concluded: Sports training led to an improvement in the transitional speed by (15.13%), motor speed by (37.07%), the speed of return time by (27.63%), and the speed endurance by (9.50%) in the transitional phase for youth in football in Iraq. Sports training led to the improvement of the strength characterized by speed by a percentage ranging from (22.38% to 57.41%) in the transitional phase of the youth category in football in Iraq. Sports training led to an improvement in agility (7.34%), flexibility (89.14%), balance (41.38%), accuracy (24.85%) and compatibility by 22.45% in the transitional phase among youth football in Iraq. The impact of the sports training program was high on some elements of physical fitness in the transitional phase for youth in football in Iraq.

1-1 Introduction and Importance of Research

Football is one of the sports that has a prominent position among other sports in terms of prevalence and popularity in different parts of the world, as those interested in it have been finding the best scientific means and methods through the researches and experiments they have carried out to develop this game, increase its attractiveness and enjoyment, and improve its performance by working to raise the efficiency of its practitioners and for its various age groups from all aspects (physical, skillful, planning, psychological, educational, and others).

Scientific planning for sports training programs is one of the effective means that leads to the advancement of the level of age groups and teams in all sports, especially football, which still faces many obstacles that hinder the march of the game, and that is the lack of use of training programs based on scientific foundations, it is difficult today to reach the prestigious high level in the field of sports in general and football in particular, unless sports planning is based on solid scientific foundations and programs in the field of football. The problem of research has crystallized in the mind of the researcher through his many years in the field of training at the level of football schools, as well as from his experience and follow-up of the various stages of training and how the training programs are built, and not taking into account the nature of the game and the characteristics and characteristics of the stages. In addition to this, despite what is observed from the first glance the weak results at all levels, and this is due to the lack of interest in sports schools, which is one of the requirements of sports professionalism.

1-2 Research Objective:

The research aims to maintain the level of some elements of physical fitness through the impact of a sports training program in the transitional period for youth in football in Iraq:

To identify the impact of the proposed training program on maintaining some elements of physical fitness in the transitional period for youth in football in Iraq.

1-3 Research Hypotheses:

1. There are statistically significant differences between the pre-measurement and the post-measurement of the experimental group in some elements of physical fitness in favor of the telemetry.
2. There are statistically significant differences between the pre-measurement and the telemetry of the control group in some elements of physical fitness in favor of the telemetry.

1.4 Research Areas

1. Human Field: Young Players at Al-Naft Club in Baghdad for the 2024/2025 Season
2. Temporal Domain: Period from 2/1/2025 to 2/4/2025
3. Spatial Domain: The Oil Club in Baghdad.

2-1 Research Methodology:

The researcher used the experimental method using two groups, one experimental and the other control, in order to suit the nature and assumptions of the

2-2 Research Population and Sample:

2.2.1 Research Community:

The research community included youth in football at the Oil Club in Baghdad Governorate under 17 years old for the 2025 sports season in Iraq, where their total number of games reached (80)

2.2.2 Research Sample:

The research sample was selected by the deliberate method of youth in football under 17 years old at Al-Naft Sports Club. The basic study was conducted on (60) games that were randomly divided into two groups, one experimental and the other control, where the experimental sample reached (30) games, the control sample reached (30) games, and the number of the survey sample reached (20) games.

2.2.3 Devices and Tools Used in the Research:

- A football field.
- Football goals.
- Footballs.
- Stopping hours .Medical scale. Tape measure.
- , whistles, collars.
- Cones, ladders for exercise.

Table (3/1)

The arithmetic mean, standard deviation, and the value of "t" calculated for the pre-measurement between the experimental and control groups in the basic measurements of youth in football under 17 years old in Iraq

Parameter Kurdistanization	Parameter Torsion	Value "T." Calculate d	Control Group N = 25		Experimental Group N = 25		Measurement s	m
			±	Q ⁻	±	Q ⁻		
-0.900	0.114	1.09	0.6 4	15.16	0.6 6	14.96	Age (year)	1
2.137	-1.165	0.13	5.6 1	167.2 0	5.6 1	167.0 0	Length (cm)	2
-0.839	-0.252	1.18	4.4 3	63.20	4.2 0	64.64	Weight (kg)	3

-1.464	-0.189	0.17	0.8 1	3.08	0.8 3	3.12	Number of years of practice (year)	4
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*The tabular significance of "T" at the level of 0.05 = 2.010

It is clear from Table (3/1) that there are no significant differences in the value of "T" calculated in the pre-measurement between the experimental group and the control group in the basic measurements, and the torsion coefficients came with values close to zero, and the kurtosis coefficients are limited to (± 3), which confirms the homogeneity and parity of the two research groups before applying the research experiment for youth in football under 17 years old in Iraq.

Table (3/2)

Arithmetic mean, standard deviation and "t" value calculated for pre-measurement between the experimental and control groups in some elements of physical fitness (speed) for youth in football under 17 years old in Iraq

Parameter Kurdistanization	Parameter Torsion	Value "T." Calculated	Control Group N = 25		Experimental Group N = 25		Tests	Fitness Items
			\pm	Q	\pm	Q		
0.594	-0.800	1.21	0.25	4.98	0.27	4.89	Sprint 30 meters from high start (sec)	Transitional Speed
-0.452	0.502	1.12	1.49	20.16	2.01	20.72	Kick speed in feet (counts/30 sec)	Kinetic speed
-1.103	0.246	1.35	1.80	20.60	1.77	21.28	Foot return time (degree)	Fast return time
-0.012	-0.302	1.99	1.61	30.97	2.20	29.89	Running back and forth to the right and left (second)	Withstand Speed

*The tabular significance of "T" at the level of 0.05 = 2.010

It is clear from Table (3/2) that there are no significant differences in the value of "T" calculated in the pre-measurement between the experimental group and the control group in some elements of physical fitness (speed), and the torsion coefficients came with values close to zero, and the kurtosis coefficients are limited to (± 3), which confirms the homogeneity and parity of the two research groups before applying the research experiment for youth under 17 years of age in Iraq in Iraq.

Table (3/3)

The arithmetic mean, standard deviation, and the value of "T" calculated for the pre-measurement between the experimental and control groups in some elements of physical fitness (agility, flexibility, balance, accuracy, and compatibility) of youth in football in Iraq

Parameter Kurdistanization	Parameter Torsion	Value "T." Calculated	Control Group N = 25		Experimental Group N = 25		Tests	Fitness Items
			±	Q ⁻	±	Q ⁻		
-0.273	0.309	0.25	1.33	12.19	1.17	12.28	Barrow zigzag running (sec)	Agility
-1.466	0.173	1.96	1.66	6.08	1.66	7.00	Fold the torso forward below the long sitting (cm)	Flexibility
-1.141	-0.228	0.67	10.41	56.00	10.80	58.00	Bass Modulator for Dynamic Balance (degree)	Balance
-0.333	0.000	0.51	2.49	20.24	2.53	20.60	Steering accuracy (degree)	Accuracy
-0.040	0.051	1.29	0.78	8.47	0.70	8.20	Numbered Circles (sec)	Compatibility

***The tabular significance of "T" at the level of 0.05 = 2.010**

It is clear from Table (3/3) that there are no significant differences in the value of "T" calculated in the pre-measurement between the experimental group and the control group in some elements of physical fitness (agility, flexibility, balance, accuracy and compatibility), and the torsion coefficients came with values close to zero, and the kurtosis coefficients are limited to (± 3), which confirms the homogeneity and parity of the two research groups before applying the research experiment to youth in football in Iraq.

1-4 Presentation of Results:

4.1.1 Presentation of the results of the first hypothesis: There are statistically significant differences between the pre-measurement and the post-measurement of the experimental group in some elements of physical fitness in favor of the telemetry.

Table (4/1)

The arithmetic mean, standard deviation, improvement rate and the value of "T" calculated between the pre- and post-measurement of the experimental group in some elements of physical fitness (speed) for youth in football in Iraq

(n = 25)

Percentage Improvement %	Value "T." Calculated	Teams Between the two measurements		Telemetry		Tribal Measurement		Tests	Elements Fitness
		±	Q ⁻	±	Q ⁻	±	Q ⁻		
15.13	25.86**	0.14	0.74	0.17	4.15	0.27	4.89	Sprint 30 meters	Transitional Speed

								from high start (sec)	
37.07	29.22**	1.31	7.68	1.44	28.40	2.01	20.72	Kick speed in feet (counts/30 sec)	Motor speed
27.63	44.16**	0.67	5.88	1.93	27.16	1.77	21.28	Foot return time (degree)	Fast return time
9.50	34.27**	0.41	2.84	2.04	27.05	2.20	29.89	Running back and forth to the right and left (second)	Withstand Speed

*Tabular significance "T" at the level of 0.05 = 2.064, ** At the level of 0.01 = 2.797

It is clear from Table (4/1) that there are significant differences in the value of "T" calculated between the pre- and post-measurement of the experimental group in some elements of physical fitness (speed), and the percentage of improvement ranged between (9.50% and 37.07%) in favor of the dimensional measurement of youth in football in Iraq.

Table (3/4)

The arithmetic mean, standard deviation, improvement percentage, and the value of "T" calculated between the pre- and post-measurement of the experimental group in some elements of physical fitness (agility, flexibility, balance, accuracy, and compatibility) For Youth in Football in Iraq

(n = 25)

Percentage Improvement %	Value "T." Calculated	Teams Between the two measurements		Telemetry		Tribal Measurement		Tests	Elements Fitness
		±	Q ^r	±	Q ^r	±	Q ^r		
7.34	65.01**	0.07	0.90	1.12	11.38	1.17	12.28	Barrow zigzag running (sec)	Agility
89.14	59.68**	0.52	6.24	1.48	13.24	1.66	7.00	Fold the torso forward below the long sitting (cm)	Flexibility
41.38	13.86**	8.66	24.00	6.45	82.00	10.80	58.00	Bass Modulator for Dynamic Balance (degree)	Balance
24.85	42.67**	0.60	5.12	2.61	25.72	2.53	20.60	Steering accuracy (degree)	Accuracy
22.45	14.52**	0.63	1.84	0.93	6.36	0.70	8.20	Numbered Circles (sec)	Compatibility

*Tabular significance "T" at the level of 0.05 = 2.064, ** At the level of 0.01 = 2.797

It is clear from Table (4/3) that there are significant differences in the value of "T" calculated between the pre- and post-measurement of the experimental group in some elements of physical fitness (agility, flexibility, balance, accuracy and compatibility), and

the percentage of improvement ranged between (7.34% and 89.14%) in favor of the dimensional measurement of youth in football in Iraq.

4.1.2 Presentation of the results of the second hypothesis: There are statistically significant differences between the pre-measurement and the post-measurement of the control group in some elements of physical fitness in favor of the telemetry.

Table (4/4)

The arithmetic mean, standard deviation, improvement percentage, and the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (speed) For Youth in Football in Iraq

(n = 25)

Percentage Difference %	Value "T." Calculated	Teams Between the two measurements		Telemetry		Tribal Measurement		Tests	Elements Fitness
		±	Q	±	Q	±	Q		
5.07	9.65**	0.13	0.25	0.24	4.73	0.25	4.98	Sprint 30 meters from high start (sec)	Speed Transitional
15.67	16.01**	0.99	3.16	1.52	23.32	1.49	20.16	Kick speed in feet (counts/30 sec)	Speed Kinetics
13.20	17.18**	0.79	2.72	1.73	23.32	1.80	20.60	Foot return time (degree)	Speed Time Return
3.65	26.37**	0.21	1.13	1.54	29.84	1.61	30.97	Running back and forth to the right and left (second)	Withstand Speed

*Tabular significance "T" at the level of 0.05 = 2.064, ** At the level of 0.01 = 2.797

It is clear from Table (4/4) that there is a significant difference in the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (speed), and the percentage of difference ranged between (5.07% and 15.67%) in favor of the telemetry of youth in football in Iraq.

Table (4/5)

The arithmetic mean, standard deviation, improvement percentage, and the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (strength characterized by speed) For Youth in Football in Iraq

(n = 25)

Percentage Difference %	Value "T." Calculated	Teams Between the two measurements		Telemetry		Tribal Measurement		Tests	Elements Fitness
		±	Q	±	Q	±	Q		
22.82	14.12**	0.67	1.88	1.01	10.12	1.05	8.24	Jump up in place (15s)	Characteristic power with speed
12.75	37.00**	0.02	0.17	0.06	1.53	0.06	1.36	Wide Jump of Stability (m)	
19.38	29.19**	0.98	5.72	4.57	35.24	4.78	29.52	Vertical Jump of Stability (cm)	

*Tabular significance "T" at the level of 0.05 = 2.064, ** At the level of 0.01 = 2.797

It is clear from the table (4/5) that there are significant differences in the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (strength characterized by speed), and the percentage of difference ranged between (12.75% and 22.82%) in favor of the telemetry of a young man in football in Iraq.

Table (4/6)

The arithmetic mean, standard deviation, improvement percentage, and the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (agility, flexibility, balance, accuracy and compatibility) for youth in football in Iraq

(n = 25)

Percentage Difference %	Value "T." Calculated	Teams Between the two measurements		Telemetry		Tribal Measurement		Tests	Elements Fitness
		±	Q	±	Q	±	Q		
4.70	61.80**	0.05	0.57	1.32	11.62	1.33	12.19	Barrow zigzag running (sec)	Agility
48.03	22.80**	0.64	2.92	1.47	9.00	1.66	6.08	Fold the torso forward below the long sitting (cm)	Flexibility
8.57	2.39*	10.05	4.80	8.62	60.80	10.41	56.00	Bass Modulator for Dynamic Balance (degree)	Balance
13.04	23.21**	0.57	2.64	2.35	22.88	2.49	20.24	Steering accuracy (degree)	Accuracy
4.88	9.93**	0.21	0.41	0.82	8.06	0.78	8.47	Numbered Circles (sec)	Compatibility

*Tabular significance "T" at the level of 0.05 = 2.064, ** At the level of 0.01 = 2.797

It is clear from Table (4/6) that there are significant differences in the value of "T" calculated between the pre- and post-measurement of the control group in some elements of physical fitness (agility, flexibility, balance, accuracy and compatibility), and the percentage of difference ranged between (4.70% and 48.03%) in favor of the telemetry of youth in football in Iraq.

4-2 Discussion of the Results:

After presenting the results of the study, the researcher interpreted and discussed these results in terms of the effect of the proposed sports training program on improving some elements of physical fitness:

It is clear from the tables (1/4) (2/4) (3/4) that there is an improvement in some physical abilities as follows: There are significant differences in the value of "T" calculated between the pre- and post-measurement of the experimental group in (speed), and the percentage of improvement ranged between (9.50% and 37.07%) in favor of the dimensional measurement of youth in football in Iraq. There were significant differences in the value of "T" calculated between the pre- and post-measurement of the experimental group in (force characterized by speed), and the percentage of improvement ranged between (22.38%, 57.41%) in favor of the dimensional measurement of football youth in Iraq. There were significant differences in the value of "T" calculated between the pre- and post-measurement of the experimental group in (agility, flexibility, balance, accuracy and compatibility), and the percentage of improvement ranged between (7.34%, 89.14%) in favor of the dimensional measurement of youth in football in Iraq.

pointed out that the training program and the planned content of the elaborate exercises in a scientific manner leads to the best results.

The improvement of physical efficiency is considered one of the important indicators that determine the general condition of the individual, in addition to the one that is characterized by its vital systems, the heart and the lungs, through training and preparation, there is no doubt that the increase in the efficiency of the circulatory and respiratory systems is closely related to the increase in physical efficiency, as training works on preparing the individual, which leads to a change and improvement in physiological processes, and works to raise the efficiency of the individual and enables him to perform the required effort better, for a longer period and with the same efficiency .

From the previous presentation, it is clear that the first hypothesis of the study has been fulfilled, which states that there are statistically significant differences between the pre-measurement and the post-measurement of the experimental group in some elements of physical fitness in favor of the dimensional measurement.

2. It is clear from the tables (4/4) (5/4) (4/6) that there is an improvement in some abilities as follows : There are significant differences in the value of "T" calculated between the pre- and post-measurement of the control group in (speed), and the percentage of the difference ranged between (5.07% and 15.67%) in favor of the dimensional measurement of youth in football in Iraq. There were significant differences in the value of "T" calculated between the pre- and post-measurement of the control group in (force characterized by speed), and the percentage of difference ranged between (12.75% and 22.82%) in favor of the dimensional measurement of football youth in Iraq. There were significant differences in the value of "T" calculated between the pre- and post-measurement of the control group in (agility, flexibility, balance, accuracy and compatibility), and the percentage of difference ranged between (4.70% and 48.03%) in favor of the dimensional measurement of football youth in Iraq.

This is due to the fact that this slight improvement due to the lack of any training effects of the control group during the transition phase led to a stability or a slight increase in the level of physical fitness, and this is confirmed by Essam Abdel Khaleq (2005) that there

is a relationship between endurance and agility that there is a force tolerance for motor skills in good compatibility with the possibility of repeating them for a relatively long time, for example, the repetition of the performance of the skills in handball, i.e. by repeating the performance with the greatest effectiveness until the end of the competition. It is clear that endurance is not only a struggle against fatigue, but also an insistence on performing the task assigned to it efficiently and energetically.

With this slight improvement and from the previous presentation, it is clear that the second hypothesis of the study has been fulfilled, which stipulates that there are statistically significant differences between the pre-measurement and the dimensional measurement of the control group in some elements of physical fitness in favor of the dimensional measurement.

5.1 Conclusions:

Through the objectives of the research and within the limits of the sample, the researcher reached the following conclusions:

1. The Effect of the Sport Training Program on Some Elements of Physical Fitness in the Transitional Phase for Youth in Football in Iraq.
2. The proposed program has improved some elements of fitness
3. The effect of the sports training program led to the improvement of the transition speed by (15.13%), motor speed by (37.07%), the speed of return time by (27.63%) and the speed endurance by (9.50%) in the transitional phase of youth in football in Iraq.
4. The sports training program led to the improvement of the strength characterized by speed by a percentage ranging between (22.38% to 57.41%) in the transitional phase of youth football in Iraq .
5. The sports training program led to an improvement in agility (7.34%), flexibility (89.14%), balance (41.38%), accuracy (24.85%) and compatibility (22.45%) in the transitional phase among youth in football in Iraq.

5.2 Recommendations:

In light of the objectives and assumptions of the research, the methodology used, the sample, and the conclusions reached, the researcher recommends the following:

1. The use of the proposed sports training program (under discussion) and its application in the transitional phase for youth in football because of its positive impact.

2. Develop training programs to improve physical fitness by sports professionals that are consistent with the needs of each game and the periods of the training season.
3. Training programs should be an integral part of the physical preparation programs and its addition in the transitional phase.
4. The use of various training methods, physical exercises and special skills within an integrated training curriculum that positively affects the development of playing conditions in football.
5. The need to raise the cognitive capabilities of trainers in the field of training in a scientific manner, and this is through their contribution to scientific forums, training courses and study days under the supervision of specialized frameworks.

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