

“THE EFFECT OF DISTRIBUTED AND INTENSIVE TRAINING ON SOME PHYSICAL, PHYSIOLOGICAL, AND SKILLS VARIABLES OF YOUNG SOCCER PLAYERS”

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ABSTRACT:

The research aims to identify the effect of a training program for the preparation period using distributed and intensive training techniques on some of the physical, physiological and skills variables of young soccer players under 14 years.

The researcher used the experimental method to suit the nature of the research using the experimental design of two experimental groups. The sample included (30) players randomly divided into two equal groups 15 each, intentionally selected from soccer players under 14 years

The results showed the effectiveness of the training program using the distributed and intensive methods and the intensive method was more effective in improving the physical, physiological and skill qualities of young people under 14 years of age.

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INTRODUCTION

The scientific development of soccer training methods is considered a goal that countries of the world seek to provide their knowledge and concepts in a simple way to their coaches in order to prepare and develop for their players to reach high standards.

In order for a Soccer player to achieve the highest level of performance in play during the matches, he must prepare an integrated technical preparation in accordance with the requirements of modern soccer practice, which requires a high level of physical and skill efficiency so that the player can perform the tasks assigned to him efficiently throughout the game.

The process of planning training for a sports season is one of the most important actions that contribute to the development of the athlete's level and upgrading his abilities. (12)

preparation period is one of the most important periods of the season, as it aims mainly to raise the level of the player's performance, physically, skillfully, strategically, psychologically and mentally, and to work to reach the highest

possible degree that his capabilities allow, which is called the sports form

(2).

Opinions differed about the time of the preparation period, indicated that the preparation period takes 12 weeks while all of stated that the preparation period takes 2-8 weeks (10).

The researcher believes that the preparation period for the juniors should not be less than (8) weeks, and through the researcher's follow-up of the junior competitions organized by the regions of the Egyptian Soccer Association and supervised by the Egyptian Soccer Association in accordance with specific regulations and rules, we find that there is no specific time for the start of these competitions, which makes many Of the clubs in the confusion and instability of their programs, in addition to the fact that the regions are organizing these competitions from the clubs preparing early and others preparing late, which leads to the fluctuation of the level of performance and incomplete training of the players, which made

the researcher turn in his thinking to the following question:

Why do we not prepare a scientific study aimed at setting up a training program for the preparation period using both the distributed and intensive methods?

By designing a program in which the volume of training is distributed within the weekly pregnancy cycle throughout the preparation period, which is called the distributed method, and by designing another program in which the volume of training is intensified within the weekly pregnancy cycle over the course of the preparation period, which is called the intensive method, provided that the grades and amounts of pregnancy are formed. The training content for each program is one (23).

TERMS:

Distributed method:

A training method in which the training load is distributed within the load period (preparation period) by reducing the number of training units as opposed to increasing the number of weeks (procedural definition).

Intensive method:

A training method in which training is intensified within the load period (preparation period) by increasing the number of weekly units as opposed to reducing the number of weeks (procedural definition).

The total time of both programs as well as the total number of modules and training content for each method are equal.

By designing a program in which the volume of training is distributed within the weekly load cycle over the period of preparation, the so-called distributed method, and another program is intensified within the weekly load cycle over the period of preparation, which is called the intensive method,

The load of training and the amounts of training content for both programs are the same. (2),(12),(14).

Study Objectives.

This study aimed to:

1. Prepare soccer training program using the distributed method.
2. Prepare soccer training program using an intensive method.
3. To know the effect of both programs on some physical and physiological and basic skills variables
4. Determining the most appropriate methods affects Physical fitness, physiological and skills variables.

Study hypotheses.

1. There are statistically significant differences between the pre and post measurement of the level of Physical fitness, physiological, and basic skills variables of the first experimental group and in favor of post measurement, which uses the distributed method.
2. There are statistically significant differences between the pre and post measurement of the level of Physical fitness, physiological, and basic skills variables of the second experimental group and in favor of post measurement, which uses the intensive method.
3. There are statistically significant differences between the first experimental group and the second experimental group in the post measurement of the level of Physical fitness, physiological, and basic skills variables for the favor of second experimental group.

STUDY SAMPLE:

The basic research sample was selected in the deliberate manner of soccer players in under (14) years and the sample consisted of (30) players randomly divided into two groups (15) players each.

The researcher also used a number of (20) players from outside the basic research sample and from the same research community.

EQUIVALENCE OF THE RESEARCH SAMPLE.

The equivalence between them was performed according to the results of pre measurements by applying the Man Whitney (U.S) on some selected variables (age- height- weight- training age), basic skills, physical variables, and physiological variables as shown in tables (1), (2), (3), (4).

Table (1): Equivalence of the first and second experimental study groups in pre measurement in age, height, weight, and training age variables

n1=n2=15

N	Statistics Statement	Unit	1 st experimental group		2 nd experimental group		J	Level of significance
			means	Total	Means	Total		
1	Age	Y	16.40	246	14.60	219	99	0.60
2	Height	Cm	14.13	212	16.87	253	92	0.41
3	Weight	Kg	16.73	251	14.27	214	94	0.46
4	Training age	Y	16.17	242.5	18.83	222.50	102.5	0.68

It is clear from table (1) that the (j) value calculated from the Man Whitney test to indicate the differences between the pre-records of the first experimental group and the second experimental group was recorded respectively (99-92-94-102.5)

and is greater than the value ((s) at an indicative level of 0.60, 0.41, 0.46, 0.68) which is greater than the value (0.05) and is not indicative of parity.

Table (2): Equivalence of the first and second experimental study groups in pre measurement in the physical variables under consideration

N	Statistics Statement	Unit	1 st experimental group		2 nd experimental group		r	Level of significance
			mean s	Total	mean s	Total		
1	Sprinting speed	SC	13.30	199.5	17.70	265.5	79.5	0.17
2	Agility	SC	15.93	239	15.07	226	106	0.81
3	Speed Endurance	SC	16.33	245	14.76	220	100	0.62
4	Cardiovascular endurance	SC	14.03	210.5	16.97	254.5	90.5	0.37

It is clear from table 2 that the (j) calculated value from the Man Whitney test to

indicate the differences between the pre standards of the first experimental group and the second

experimental group were recorded respectively (79.5, 106, 100, 90.5) and is greater than the (j) table value At a statistical significance level (0.05) and at an indicative level of 0.17, 0.81, 0.62, 0.37,

which is greater than the value (0.05), all of which are statistically non indicating the equality of the two sets of these variables.

Table (3): Equivalence of the first and second experimental study groups in pre measurement in the physiological variables under consideration

n	Statistics Statement	Unit	1st experimental group		2ed experimental group		J	Level of significance
			mean s	total	mean s	Total		
1	Pulse rate in rest	c/m	17	255	14	210	90	0.37
2	Pulse rate in effort	c/m	15.47	232	15.53	233	112	1.00
3	glucose in rest	mg/dl	14.80	222	16.20	243	102	0.68
4	glucose in effort	mg/dl	14.77	221.5	16.23	243.5	101.5	0.65
5	LA in rest	m /moll	15.77	236.5	10.23	288.5	108.5	0.87
6	LA in effort	m /moll	14.07	211	16.93	254	91	0.39

It is clear from table (3) that the value (J) calculated by applying the Man Whitney test - to indicate the differences between the pre standards of the first experimental group and the second experimental group, respectively (J) The

scheduling (72) at an indicative level of 0.37, 1, 0.68, 0.65, 0.87, 0.39, is greater than the value (0.05) and is not indicative of the parity of the two groups in these variables.

Table (4): Equivalence of the first and second experimental Study groups in pre measurement in the skills variables under consideration

N	Statistics Statement	Unit	1st experimental group		2ed experimental group		J	Level of significance
			mean s	total	Mean s	Total		
1	Kicking the ball with the right foot	m	12.35	188	18.47	277	68	0.07
2	Kicking the ball with the left foot.	m	14.10	211.5	16.9	253.5	91.5	0.39
3	Dribbling	s	16.03	240.5	14.97	224.5	104.5	0.74
4	Running with the ball.	s	15.27	229	15.73	236	109	0.90
5	Feeling the ball	n	12.93	194	18.07	271	74	0.12
6	Control the ball	n	15.27	229	15.73	236	109	0.90

It is clear from table (4) that the (J) calculated value from the Man Whitney test to indicate the differences between the pre standards of the first experimental group and the second experimental group were recorded respectively (68, 91.5, 104.5, 109, 90, 74, 109) and is greater than the (j) table value of the adult at a statistical indication level

(0.05) and at an indicative level of 0.7, 0.39, 0.74, 0.90, 0.12, 0.90 and is larger than the value (0.05) and is not statistically indicating the parity of the two groups in these variables.

Means of data collection.

a) Tests and metrics.

- b) Measure the length using the restameter to the nearest 1cm.
- c) Measuring weight using medical scale.
- d) Measure some of the specific physical qualities using physical tests.
- e) Measure some physiological variables using physiological tests. Measuring some skills variables using skill tests.

TOOLS.

1. Validity.

The researcher relied on the method of the sincerity of differentiation to find the sincerity of the tests where Mohammed Allawi Nasreddine Radwan (1996) believes that the sincerity of

differentiation means the ability of the proposed test to differentiate between people with a high degree of character or attribute on the one hand and those with a low degree of the same characteristic or attribute on the other. (15). The researcher applied the tests, which are under consideration, to two groups, one distinguished and the second group undistinguished from the same research community and outside the basic research sample, which were the same number as the first sample as shown in table (5), (6).

Table (5): Coefficients of differentiation validity of physical tests under consideration

n1=n2=10

n.	Tests	Distinguished		Undistinguished		t	ETA2	validity
		m	Sd	M	sd			
1	Sprinting speed	5.294	0.297	5.25	0.43	4.38	0.516	0.718
2	Agility	7.972	0.513	8.777	0.650	4.10	0.788	0.887
3	Speed Endurance	2.98	0.26	2.41	0.20	5.41	0.619	0.787
4	cardiovascular endurance	167.50	13.176	13.000	13.499	8.392	0.892	0.944

The (t) value at a statistical indication level of 0.05 = 2.10

Table (5) shows that the calculated (t) values of physical tests in question ranged from (4.10, 8.392) to indication levels Statistics (0.339,

0.994) for all tests, and honesty transactions were limited to (0.718, 0.944) and all of them are high validity transactions, indicating that these tests are valid, i.e. measuring what they were set for.

Table (6)

Transactions of the validity of differentiation of skill tests under consideration

n1=n2=10

n.	Tests	distinguished		undistinguished		t	ETA2	Validity
		M	sd	M	sd			
1	Kicking the ball with the right foot	22.30	3.76	13.06	1.36	7.31	0.748	0.865
2	Kicking the ball with the left foot.	11.51	2.05	7.54	1.34	6.13	0.594	0.771
3	Dribbling	14.968	0.717	18.469	1.469	6.22	0.826	0.908
4	Running with the ball.	12.150	1.182	8.400	1.298	8.91	0.994	0.997
5	Feeling the ball	5.80	3.01	2.70	1.16	3.04	0.339	0.582
6	Control the ball	24.225	3.239	8.947	15.278	8.72	0.899	0.948

Table (6) shows that the calculated (t) value of skills tests in question ranged from (3.04, 8.91) to statistical indications of 0.339, 0.994 for all tests and honesty transactions were limited to (0.582, 0.997) and all of them were high validity transactions, indicating that these tests were valid, i.e. measuring what they had developed.

2-Stability.

To determine the stability of the tests in question, the researcher used the method of applying the test- Retest method by applying the tests and reapplying them after a period of time of a week on a group of emerging players consisting of (10)

players from outside the basic research sample and from the same search community on 8/6/2006, as was Reapplying the same tests to the same sample on 15/6/2006 in order to find the coefficient of correlation between the results of the first and second indexes where pointed out that the method of applying the test and reapplying it is one of the best methods used to calculate the coefficient of stability of many measurements and tests. (15).

Tables (7) (8) show the stability factor for physical, and skill tests between the results of the first and second applications.

Table (7)
physical test stability coefficients under consideration

n1=n2=10

N	Tests	1st app		2ndt app		Stabili ty factor	Level of statistical significanc e
		M	SD	m	SD		
1	Sprinting speed	5.294	0.297	5.291	0.302	0.997	S
2	Agility	7.972	0.513	7.962	0.514	0.998	S
3	Speed Endurance	2.98	0.26	2.94	0.48	0.672	S
4	cardiovascular endurance	167.50 0	13.176	167.20 0	15.039	0.832	S

Table (7) indicates that the test stability factor by applying the Spearman Correlation Coefficient

was limited to (0.672, 0.998) and all high stability coefficients indicating the stability of these tests.

Table (8)

parameters for skill test stability in question

n1=n2=10

n	Tests	1st app		2ndt app		Stabili ty factor	Level of statistic al significa nce
		m	SD	M	SD		
1	Kicking the ball with the right foot	22.30	3.76	22.23	4.01	0.978	S
2	Kicking the ball with the left foot.	11.51	2.05	12.33	2.00	0.982	S
3	Dribbling	14.968	0.717	14.957	0.719	0.997	S
4	Running with the ball.	12.150	1.182	12.20	0.952	0.978	S
5	Feeling the ball	5.80	3.01	6.70	2.36	0.976	S
6	Control the ball	24.225	3.239	2.270	3.227	0.989	S

Table (8) indicates that the test stability factor by applying the Spearman Correlation Coefficient was limited to (0.976, 0.997) and all high stability coefficients indicating the stability of these tests.

The researcher also confirmed the validity of the devices used to measure the physiological variables in question, which is the instrument of measuring the concentration of lactic acid - Accusport - glucose concentration meter - Accutch, and this was done by taking the measurement of the player on each device three

times in the same conditions and the result of measurements on each device is very close, indicating the safety and efficiency of the devices for the measurement process. (4)

Results.

Table (9) shows the differences between pre and post standards in the specific physical variables under consideration in the first experimental group.

Table (9)

Indication of the differences between pre and post measurement in the specific physical variables under consideration in the first experimental group

n = 15

n	Statistics Physical variables	Un	N		mn		tn		z	Level of statistical significan ce
			-	+	-	+	-	+		
1	Sprinting speed	S	14	1	8.29	4	116	4	3.18	0
2	Agility	S	14	0	7.5	0	105	0	3.20	0
3	Speed Endurance	S	13	0	7	0	91	0	- 3.25	0
4	cardiovascular endurance	S	13	0	7	0	91	0	- 3.28	0

The value (z) at a statistical indication of 0.05 = 30 table (9) shows that the value (z) indicate the differences between the pre and post measurements of the first experimental group in the special physical variables were for the

transition velocity variable (3.18) agility (3.20) The speed (-3.25) cardiorespiratory tolerance (-3.28) at a statistical indication level (0.05) and the significance ratio for all these variables (0) is less than the value (0.05), indicating statistical

differences in favor of the post measurement of members of the first experimental group.

Table (10) shows the significance of the differences between pre and post standards in the skills variables under consideration in the first experimental group.

Table (10)
Indication of the differences between pre and post standards in the skills variables under consideration in the first experimental group

n = 15

n	Statistics Skills Variables	unit	N		Mn		tn		z	Level of statistical significance
			-	+	-	+	-	+		
1	Kicking the ball with the right foot	M	3	12	7.17	8.21	21.50	98.50	-2.18	0.03
2	Kicking the ball with the left foot.	M	3	12	8	8	24	96	-2.05	0.04
3	Dribbling	S	15	0	8	0	120	0	-3.42	0
4	Running with the ball.	S	15	0	8	0	120	0	-3.42	0
5	Feeling the ball	N	2	12	11.75	7.29	17.50	87.50	-2.28	0.02
6	Control the ball	N	0	12	0	6.5	0	78	-3.14	0

The value (z) at a statistical indication of 0.05 = 30 table (29) shows that the z value calculated by applying the test to indicate the differences between the pre and post standards in the first experimental group in the skill variables were for each variable kicking the ball with the right foot (-2.18), kicking the ball with the left foot (-2.05), the Dribbling (-3.42), Running with the ball (-3.42), Feeling the ball (-2.28), Ball Control (-3.14)

at a statistical significance level (0.05) and statistical significance levels of (0.03), (0.04), (0), (0), and (0) respectively, all statistically functioning, which means that the differences between the tribal pre and post measurements of the first experimental group were real differences in favor of post measurement, indicating that the members of the first experimental group improved in the skills variables in question.

Table (11)
Indication of differences between pre and post standards in physiological variables under consideration in the first experimental group

n = 15

N	Statistics physiological variables	un	N		mn		tn		z	Level of statistica l significa nce
			-	+	-	+	-	+		
1	Pulse rate after exertion	CM	11	1	7	1	77	1	- 3.08	0
2	Concentration of glucose in the blood	MG DL	15	0	0	0	120	0	- 3.45	0
3	Concentration of lactic acid in the blood	mM	0	15	0	8	0	120	- 3.42	0

The value (z) at a statistical indication of 0.05 = 30 shows that the value of (11) the value of (z) indicate the differences between the pre and post indexes in the first experimental group in the physiological variables in question was for the pulse rate variable after the effort (-3.08) The

concentration of glucose in the blood (-3.45), the concentration of lactic acid in the blood (-3.42), and the significance of all these variables (0) was less than (0.05), indicating statistical differences in favor of the post of the second group.

Table (12)

Indication of differences between pre and post standards in the specific physical variables under consideration - in the second experimental group

n = 15

n	Statistics Physical variables	unit	N		mn		tn		z	Level of statistical significanc e
			-	+	-	+	-	+		
1	Sprinting speed	S	15	0	8	0	120	0	- 3.4 2	0
2	Agility	S	14	0	7.5	0	105	0	- 3.3 1	0
3	Speed Endurance	S	12	0	6.5	0	78	0	- 3.0 7	0
4	cardiovascular endurance	s	15	0	8	0	120	0	- 3.4 4	0

The value (z) at a statistical indication of 0.05 = 30 shows that the value of (z) indicate the differences between the pre and post indexes in

the second experimental group in the special physical variables were both the transitional velocity variable (-3.42) agility (-3.31) , velocity

(-3.07) cardio respiratory tolerance (-3.44) at a statistical indication level (0.05) and the statistical indication ratio of those variables (0), (0), (0) and (zero) respectively, all statistical function, which means that the differences between pre and post

standards The second experimental group had real differences in favor of post measurement, which indicated that members of the second experimental group had improved in the physical variables in question.

Table (13)

Indication of the differences between pre and post standards in the skills variables under consideration in the second experimental group

n = 15

μ	Statistics Skills variables	Un	n		mn		tn		z	Level of statistical significance
			-	+	-	+	-	+		
1	Kicking the ball with the right foot	m	0	15	0	8	0	120	3.41-	0
2	Kicking the ball with the left foot.	M	1	14	2	8.43	2	118	3.30-	0
3	Dribbling	S	15	0	8	0	120	0	3.43-	0
4	Running with the ball.	S	14	0	7.5	0	105	0	3.31-	0
5	Feeling the ball	No	0	15	0	8	0	120	3.46-	0
6	Control the ball	No	0	14	0	7.5	0	105	3.35-	0

The value (z) at 0.05 = 30 table (13) shows that the z value calculated by applying the Luxon signal test to indicate the differences between the pre and post standards of the second experimental group in the skill variables were for each variable kicking the ball with the right foot (-3.41), kicking the ball with the left foot (-3.300) Dribbling (-3.43), ball running (-3.31), sense of the ball (-.46), control of the ball (-3.35) at a statistical indication level (0.05) With statistical indications of all (zero) and all statistical function, this means that

the differences between the pre and post measurements of the second experimental group were real and in favor of dimensional measurement, indicating that the members of the second group improved in the skills variables in question.

Table (14) shows the differences between pre and post standards in the physiological variables in question in the second experimental group.

Table (14)

Indication of differences between pre and post standards in physiological variables under consideration in the second experimental group

	Statistics Physiological variables	U	no		means		Total no		Z	Level of statistical significance
			-	+	-	+	-	+		
1	Pulse rate after exertion	/M C	14	1	7.93	9	111	9	-3.08	0
2	Concentration of glucose in the blood	/dl mg	14	1	7.5	15	105	15	-3.45	0
3	Concentration of lactic acid in the blood	mmol	0	15	0	8	0	120	-3.42	0
4	Anaerobic capacity	wat t	0	15	0	8	0	120	-3.41	0

The value (z) at 0.05 = 30 table (14) shows that the value (z) indicate the differences between pre and post co-authors in the second experimental group in physiological variables – in question was for the post-exertion pulse rate variable (-3.08), the concentration of glucose in the blood (-3.45), concentration of lactic acid in the blood (-3.42), anaerobic capacity (-3.41), anaerobic action ratio (-3.41) and a significance rate of all these variables (0) which is less than (0.05), indicating a

statistical indication of a pre-measurement variables for members of the second experimental group.

Table (15) shows the differences between the two experimental groups in variable measurement in the specific physical variables in question

Table (15)

Indication of differences between the first and second experimental groups in post measurement in the physical variables under consideration

$n_1 = n_2 = 15$

N	Statistics Physical variables	U	1st experimental group		2ed experimental group		Y	level of signi fica nce
			m	total	m	Total		
1	Sprinting speed	S	10.40	156-	20.60	309-	36.5	0
2	Agility	S	18.70	280.5	12.30	184.5	64.5	0.04
3	Speed Endurance	S	18.9	283.5	12.1	181.5	61.5	0.03
4	Respiratory circulatory endurance	S	19.37	290.5	11.63	174.5	54.5	0.02

The value (j) at a statistical indication level of 0.5 = 72 shows from a table (15) that the (j) value calculated from the Man Whitney test to indicate

the differences between the first and second groups in the physical variables in the post measurement were for both the variable

transitional velocity (36.5), agility (64.5), the tolerance of speed (64.5), the tolerance of speed (61.5), cardio respiratory tolerance (54.5) and statistical indication levels of (0.04), (0.04), (0.04), (0.05) and (0.04) respectively, which means that the differences between the two test

groups in the post measurement of these variables are real and this indicates the superiority of members of the second experimental group over members of the first experimental group in the physical variables in question

Table (16)

Indication of the differences between the first and second groups in the post measurement in the skills variables under consideration

$n_1 = n_2 = 15$

N	Statistics skills variables	U	1st experimental group		2ed experimental group		g	level of signi fica nce
			m	t	m	T		
1	kicking the ball with the right foot	M	9.00	135	22.00	330	15.00	0
2	kicking the ball with the left foot	M	11.9	178.5	19.10	286.5	58.5	0.02
3	Dribbling	S	18.63	279.5 0	12.37	185.5	65.5	0.05
4	ball running	S	18.70	280.5 0	12.3	184.5	64.5	0.04
5	Ball feeling	No	8.20	123.0	22.8	342.0 0	3.00	0
6	ball control	N0	10.83	162.5	20.17	302.5	42.5	0

The value (j) at a statistical indication of 0.05 = 72 table (16) shows that the value (j) calculated by applying the Man Whitney test to indicate the differences between the first and second experimental groups in the variables in the distance measurement was for each variable kicking the ball with the right foot (15.00), kicking the ball by foot Left (58.5), Dribbling (65.5), ball running (64.5), ball control (42.5) and

statistical indication levels of (0.02), (0.02), (0.05), (0.04), (0) and (0) respectively, meaning that the differences between the two groups The two experiments in the dimension measurement of these variables are real, and this indicates that the members of the second experimental group are superior to the members of the first experimental group in the skills variables in question.

Table (17)

Indication of the differences between the first and second experimental groups in post measurement in the physiological variables under consideration.

n	Statistics Physical variables	U	1st experimental group		2ed experimental group		Y	level of signific ance
			M	T	M	T		
1	Pulse rate after exertion	Cm	18.80	28.0	12.20	183	63.0	0.04
2	Concentration of glucose in the blood	mg/dl	18.87	283	12.13	182	62.0 0	0.04
3	Concentration of lactic acid in the blood	Mmo l	18.80	282	12.20	183	63.0 0	0.04

n1

The value (j) at a statistical indication of 0.05 = 72 shows from a table (17) that the value (j) calculated by applying the Man Whitney test to indicate the differences between the first and second groups in the physiological variables in the post measurement was for the pulse rate variable (63.00), the concentration of glucose in the blood (62.0), the concentration of lactic acid (63.0), statistical indication levels of (0.04), (0.04) and (0.04) respectively, which means that the differences between the two experimental groups in the post measurement of these variables are real, indicating the superiority of the members of the second experimental group. On members of the first experimental group in the physiological variables under consideration.

DISCUSSION OF THE RESULTS.

Discussing the first hypothesis

After presenting the results of the research, the researcher tries to discuss and interpret these results based on the results of statistical analysis of the study data and guided by the results of related studies and the opinions of scientific references in order to study.

Physical variables

It is clear from the table (9) that there are statistically significant differences between the pre and post measurements in the first experimental

= n2 =15

group, which performs in the distributed method and in favor of the post measurement of both the transitional speed, agility, Speed Endurance, cardio respiratory tolerance, where the calculated z value of these variables ranged from (-3.18, -3.28) and with statistical indication levels of all (zero) and this means significant progress in physical attributes.

The researcher attributes this improvement in the physical variables of the members of the first experimental group, which used the method distributed to the time of preparation period, which lasted (12) weeks and achieved all the duties that lead to success The current study is in line with the study of .(3),(11)

The researcher also attributes this improvement in the physical variables of members of the first experimental group, which used the method distributed to the scientific method in the formation of the weekly load cycle and the rationing of loads as well as the rest period between each unit and the following where the researcher distributed the volume of training during the weekly load cycle to (4) weekly units and rest time between units (48) hours. (19),(25)

Physiological variables.

The table (11), show statistical differences between the pre and post indexes in the first experimental group used (distributed method) and for both the pulse rate variable after the effort, the

concentration of glucose in the blood after the effort, the concentration of lactic acid in the blood after the exertion, where the calculated z values of these variables ranged between (-3.08, -3.45) and statistical indication levels of all (zero) and indicated a significant improvement in these variables.

The researcher attributes this improvement in these variables to the distributed method of the preparation period, which depended on the distribution of load volume within the weekly load cycle at the rate of (4) units per week and for three months the time of preparation period, resulting in increased functional efficiency of the devices and thus improved the player's physiological ability

The researcher attributed the low concentration of lactic acid in the blood after the effort to the high level of training status due to the effect of the distributed method, which led to the high physical and functional ability of the player.

(21), (19).

Skills variables.

The two tables (10) show statistical differences between the pre and post measurements in the first experimental group, which performs in the distributed method in favor of the dimensional measurement of both the skill of kicking the ball with the right foot, kicking the ball with the left foot, Dribbling, running with the ball, feeling the ball, controlling the ball, with the estimated (z) values (2.05, 3.42) and statistical indication levels ranging from (0, 0.04) and indicating an improvement in these variables.

This progress in the performance of the basic skills of the members of the first experimental group is due to the distributed method, in which the preparation period lasted three months and at the rate of (4) units per week.

The researcher also attributes the improvement in the level of skill performance to the improvement of the members of the group in the level of physical variables.

We finish the training program applied to the first experimental group used for the distributed method that has had a positive effect on improving the level of physical and physiological variables and basic skills in question.(22)

The first hypothesis is clear:

There are statistically significant differences between both pre and post measurements of some physical and physiological variables and basic skills in the first experimental group and in favor of post measurement.

Discussing the second hypothesis.

A. Physical variables.

The table (12) show statistically significant differences between the pre and post measurements in the second experimental group, which perform training and in favor of post measurement of both transitional speed, agility, Speed Endurance, and cardio respiratory tolerance.

The calculated (z) value of these qualities ranged from (-3.07, -3.44) to statistical indication level of (0) and this meant an improvement in the level of physical attributes in question.

The researcher attributed this improvement in the physical variables of members of the second experimental group used for the intensive method to the time of preparation period of (8) weeks as well as the method of shaping the weekly load cycle, in which the volume of training was intensified to (6) training units per week (9).(12)

B. Physiological variables.

The table (14) show statistically significant differences between the pre and post measurements in the experimental group used for the intensive method and for the advantage of dimensional measurement in both the pulse rate variable after the exertion, the concentration of glucose in the blood after the exertion, the concentration of the lactic acid After the effort, the measured (z) values of these variables ranged from (-3.08, -3.45) to all statistical indications of

zero, indicating a marked improvement in these variables in the second experimental group.

The researcher attributed this improvement in these variables to the use of the intensive method, which is characterized by the method of intensifying the training load within the weekly pregnancy cycle at the rate of (6) weekly units and for the duration of (8) weeks preparation time, which led to improved efficiency of the body and increased efficiency of the work of the heart and increased its ability to pump more blood through the least number of strokes, as the number and elasticity of capillaries and the amount of blood and flow of blood flow and capillary and arteries dilatation when the contraction of the heart muscle leads to the contraction of the heart rate.

The researcher attributes the improvement in the blood glucose variable after the effort, which led to the increase in the concentration in the blood to the high level of training status of the members of the experimental group

The researcher believes that as a result of the effect of the training program using the intensive method, which caused the high level of training status of players and increased the functional ability of the internal organs to resist fatigue, and thus reduced the secretion of the suprarenal gland of the hormone cortisol, which is the main factor to increase blood sugar, which explains the decrease in blood sugar.(8)

The researcher attributes the improvement in the variable concentration of lactic acid in the blood after the effort, which was in the direction of low concentration in the blood to the high level of training status as a result of the high level of fitness, which helped to increase the player's physiological ability.

This is consistent with what pointed out that the concentration of lactic acid decreases in the blood after exertion as a result of improved functional status, increasing the size and number of mitochondria, which increases the capacity to produce adenosine tri phosphate due to the activity of the Krebs cycle enzymes as well as the electron transmission system, and these changes

lead to the production of less lactic acid by trained muscles compared to the less trained muscle (16)

The researcher also points out that the result of the training program and its effect in raising the level of the previous physiological variables in the second experimental group led to a marked improvement in the level of anaerobic capacity as well as the ratio of anaerobic action.

Skills variables.

It is clear from the table (13) that there are statistically significant differences between the pre and post standards in the second training group, which performs in intensive style and in favor of the post measurement of each of the skill of kicking the ball with the right foot, kicking the ball with the left foot, Dodgy running with the ball, feeling the ball, controlling the ball where the value of (z) of these variables ranged from (-2.98, -3.47) to statistical levels of all (zero) and indicates a marked improvement in these variables.

The researcher attributes this improvement to the intensive training program, which has adopted its method of intensifying the volume of training within the weekly load cycle.(12),(2)

The researcher believes that the increase in the number of units during the preparation period may have contributed to the increase in the efficiency of the nervous system and increased the interconnection between sensory nerves, which were affected by the frequency of stimuli within the program, and motor nerves, which works to continuously improve the performance of the skills.

(4)

The second hypothesis is clear:

There are statistically significant differences between the pre and post measurements of some of the basic physical and skills and physiological variables of the second experimental group and in favor of post measurement

DISCUSSING THE THIRD HYPOTHESIS.

A. Physical variables.

Table (15) shows statistically significant differences between both the 1st and 2nd experimental groups in the dimension measurement of both transitional speed, agility, Speed Endurance, Respiratory circulatory endurance in favor of the second experimental group, which used the intensive method, with the calculated (J) value (36.5, 64.5) and statistical indication levels ranging from (0:0.04).

It also indicates differences in the percentages of improvement rates between the first experimental group used for the distributed method and the second experimental group used for the intensive method of sprinting speed, agility, Speed Endurance, cardio respiratory tolerance and for the second experimental group).

This means a marked superiority of members of the second experimental group that used the intensive method over the members of the first experimental group and which used the distributed method in all the physical variables in question

The researcher attributes this superiority to the effect of the training program for the intensive preparation period that the second experimental group underwent.

It shows that differences in the ratios of improvement values between the first and second experimental groups of agility were (3.5%) For the benefit of the second experimental group, which used the intensive method.

It shows that the differences in the ratios of improvement values between the first and second experimental groups of the strength characterized by speed in the horizontal direction, the strength characterized by the speed of the vertical trend was (2.4%), (5%). respectively and in favor of the second experimental group.

It shows that differences in improvement ratios between the first and second experimental groups of the two Speed Endurance groups, cardio respiratory tolerance swelled (4.5%) and (1.55%)

respectively in favor of the second experimental group used for the intensive method.

indicates that the cardio respiratory endurance develops at the beginning of the preparation period ranging from 4-5 times a week and that the Speed Endurance develops from 3-4 times a week and that speed-bearing exercises replace a large part of the 11 speed training (5),(7)

Physiological variables.

Table (17) shows statistically significant differences between both the first and second experimental groups in the dimension measurement of each of the after-exertion pulse rate variables, the concentration of lactic acid in the blood after the exertion, the blood glucose concentration, the ratio of "J" calculated between (62, 63) and statistical indication levels (0.04).

It shows also indicates differences between the first and second groups in the percentages of improvement rates of pre and post measurements of all physiological variables in question and for the second experimental group, where the differences ranged from (4.6, 15.1) to a marked superiority in favour of the second experimental group over the first experimental group in those variables.

This superiority is due to the effect of the program on the preparation period in an intensive manner that relies on daily training organized for (8) weeks.

The researcher attributes the remarkable superiority in the pulse rate after the effort in favor of the second experimental group to the method of intensive training in the performance of exercises, which led to the high efficiency of the respiratory periodic as a result of the high efficiency of the cardiovascular muscle and the high level of fitness where considers that the rate of pulse relatively slow effect on the level of blood flow in the heart muscle both during load and rest, as this provides the heart with a relatively longer time for the diastolic stage, which inherits positively on the supply of Oxygenated heart muscle.(13), (26),(27)

The researcher attributes the reason for the remarkable superiority in favor of the second experimental group in the variable concentration of lactic acid after the effort to the high level of fitness of the members of the second group used for the intensive method, which had a positive effect on the functional efficiency of the organs and internal organs of the player's body represented in the promotion of glucose metabolism and oxygen consumption, which led to a lower concentration of lactic acid in the blood after the same effort suffered by the player in pre measurement.

Through the previous presentation, the researcher believes that the training program using the intensive method applied to the second experimental group is more effective using the distributed method applied to the initial experimental group in the development of physical and physiological qualities and basic skills.(1), (28)

Skills variables:

It is clear from the table (16) that there are statistically significant differences between each of the first and second experimental groups in the post measurement of each of the skill of kicking the ball with the right foot, kicking the ball with the left foot, dodging, ball feeling, ball running, controlling the ball in favor of the second experimental group used for the intensive method where the calculated values (J) ranged from (3, 65.5) and statistical indication levels ranged from (0.0:0,05).

The same table also indicates differences in the values of improvement ratios between the first and second experimental groups for both the kicking of the ball with the right foot, kicking the ball with the left foot, throwing a touch, dodging, running the ball, shooting, hitting the ball with the head, accuracy of passing with the sense of the ball, control of the ball and for the benefit of the

second experimental group which used the intensive method

This means that members of the second experimental group used for the intensive method outperform those of the first experimental group used for the distributed method in all the skill performances in question.

The researcher attributes this superiority to the effect of the training program for the preparation period in the intensive manner, whose method was based on intensifying training units within the weekly load cycle at the rate of (6) units per week as well as the rest period between each unit and the following.

The researcher also attributes this superiority to the skill performances of the second experimental group to the superiority of the second experimental group in the level of physical attributes over the first experimental group.

This is due to the superiority in the performance of the skill of running the ball to the superiority of the second experimental group over the first experimental group in the capacity of the Speed Endurance

The table (13) shows differences in the improvement ratios between the first and second trial groups in the skills of evasiveness, ball control and ball sense, and for the experimental group that used the intensive method.

This difference in improvement is due to the superiority of the second experimental group over the first experimental group in the two terms of agility, speed

Through the previous presentation, the researcher sees the training program using the intensive method used by the second experimental group more effective than the distributed method used by the first experimental group in the development of physical, physiological and basic skills (27),(21)

CONCLUSIONS.

In the light of the objectives of the research and its importance and within the limits of the method used and the sample of research, devices, tools and tests used and through statistical treatments the researcher was able to draw the following:

1. The training program using the distributed method applied to the first experimental group had a positive effect on the level of special physical variables - in question - where the rate of improvement was in transitional speed, agility, Speed Endurance, cardio respiratory tolerance
2. 2-The training program using the distributed method applied to the first group had a positive effect on the level of performance skills in question - the ratios of improvement for both the skill of kicking the ball with the right foot for a distance, kicking the ball with the left foot for a distance, dodging, running the ball, ball feeling and ball control.
3. The training program using the distributed method applied to the first experimental group had a positive effect on the level of physiological variables in question. Using the intensive method on the second test group had a positive effect on the level of skilled performance - in question - the ratios of improvement for both the skill of kicking the ball with the right foot for a distance, kicking the ball with the left foot for a distance, dodging, ball running, ball feeling and ball control.
4. 3-The training program using the intensive method applied to the second experimental group had a positive effect on the level of physiological variables under consideration, and the rates of improvement for both the pulse variable after the exertion, the concentration of glucose in the blood after the exertion, the concentration of lactic acid after the exertion
5. 4-The intensive training program applied to the second group was more effective than the training program using the distributed method applied to the first trial group, resulting in a higher level of special physical variables in question.
6. 5-The intensive training program applied to the second group was more effective than the training program using the distributed method applied to the first training group, which resulted in a higher improvement in the skill performance in question.
7. The intensive training program applied to the second experimental group was more effective than the training program using the distributed method applied to the first experimental group, which resulted in a higher level of physiological variables in question.

RECOMMENDATIONS

Based on the findings of the study, the researcher recommends:

1. The training program in question should be used when planning the preparation period programs, whether in the distributed method or the intensive method of the 14-year age stage.
2. Planning intensive method for the preparation period due to its superiority in raising the level of fitness, skill level and functional competence of young people in soccer.
3. Take advantage of the physical and skill tests that have been used in the study when selecting or evaluating the physical and skill status of the players.
4. Utilization the use of lactic acid concentration measurement in the blood when rationing training loads.
5. Further research to compare the effect of the two methods in question in other

variables and at different age stages during the current research sample.

6. The need to pay attention to physiological measurements during the training program period because it is important to stand at the actual level of young people.

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