



## Preparing a scale for transformational leadership for administrative bodies from the point of view of Iraqi football club coaches

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### Abstract

The research aimed to build a scale of transformational leadership for administrative bodies from the point of view of coaches of Iraqi sports clubs in football, which affects the performance of human resources, and to identify the reality of transformational leadership among the administrative bodies in Iraqi sports clubs, as the problem revolves around identifying the reality of the study variables and for transformational leadership and proposing solutions that would raise the level of performance in Iraqi sports clubs in football. The references and studies related to transformational leadership were reviewed, and the review contained topics related to the research, and the researcher used the descriptive approach in the survey method, and the research community included the coaches of the Iraqi Stars League and Elite clubs for the advanced and youth categories for the sports season (2023-2024), which numbered (325) coaches, including (210) coaches for the advanced category, who constituted a percentage of (65%) of the community, including (115) coaches for the youth category, who constituted a percentage of 35%, and 30 coaches were selected in a simple random manner to be an exploratory sample by 9% of The research community and the selection of 100 trainers in a simple random method to be the sample of building the scale and formed a percentage (31%) and (150) trainers were selected as the sample of the head and constituted (46%).

The most important conclusions were the existence of a moral link between the transformational leadership and the reality of the members of the administrative bodies from the point of view of the coaches of the clubs participating in the Iraqi Stars League and the Iraqi football elite, and the researchers reached the most important recommendations, which is to focus on the development of mental and psychological capabilities and skills and develop them

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among members of the administrative bodies as the most important pillars of achieving sports achievements.

**Keywords:** transformational leadership, football coaches, governing bodies.

### Introduction:

Everyone is looking forward to the future and reaching the best level in sports, as these aspirations have made the sports environment a changing and unstable environment; due to the intensity of competition, and therefore we need leaders who master how to deal with the future and plan for it, as the new challenge is not managing the institution or sports club, but the challenge is how to manage it effectively in a way that is consistent with the changes in the work environment and its requirements in sports clubs according to the element of initiative and adaptation and not according to the continuity of workflow. (Jawad Kadhim, M., & Salman Ahmed, 2016)

The ability of sports management to build strong and solid foundations and rules helps in facing any problem or obstacle that may prevent the athlete from achieving the achievement or the coaches from achieving the goal of the club and its administrations in all their types, such as infrastructure, strategic plans, or good and qualified management to lead the institutions or their employees, as the presence of distinguished administrative groups and individuals with high professionalism at the top of the institutional pyramid is part of the success process, and has become one of the most important necessities that must be available in order to achieve the goals. (HalahAtiyah et al., 2024)

This does not happen unless the leader has a future vision that contributes to the rapid achievement of goals in light of the changes and their effective impact on the club's survival in light of the competition by setting its priorities and paying attention to the continuous creativity of work and staying away from personal benefits and focusing on achieving the club's plan. One of the priorities of every club that seeks to achieve its goals is the presence of a manager whose basic tasks include his ability to make appropriate and essential decisions and how to deal with the problems and variables facing the work by making effective and balanced decisions in finding ways to solve them. (Atiyah et al., 2024)

Given the changes mentioned above in the work environment and the social, political and economic circumstances that cast their shadows on the sports field, it has become necessary for every sports institution, including sports clubs, to arm themselves in order to be able to confront all these circumstances. They are basically capabilities directed towards change that help clubs and support them to redeploy and form the resource base and to form it to meet the requirements of the changing work environment, and to confront the strategies of competing clubs at the same time. (Kadhim, 2023)

The importance of the research comes from the importance of transformational leadership, as in light of all that was mentioned above of the change in the sports work environment and the decline in resources, comes the study of (transformational leadership) that affects the



performance of human resources, which the researchers see as one of the most important reasons for the continuation of the sports career of clubs, in addition to the importance of the game of football as it represents the first popular sport in Iraqi society and most of the media and social activities focus on it. (Majid, S., & Jawad, 2023)

Transformational leadership is of utmost importance in management topics. Many management studies have addressed important topics related to management and its important determinants.

**The most important of them must be mentioned briefly:**

The study (Anmar Ahmed Sobhi, Ahmed Mohamed Abdel Khaleq 2023) entitled (Transformational leadership and its relationship to creativity in job performance from the point of view of employees of the Ministry of Youth and Sports in Iraq) aimed to demonstrate the extent of the impact of transformational leadership on the level of creativity in job performance in the Department of Regional and Provincial Affairs in the Ministry of Youth and Sports, as the researchers built two scales, one for transformational leadership and the other for creativity in job performance, and to achieve the goals, the researchers adopted the descriptive approach using the survey method on the research sample that was deliberately selected to suit the research goals, which included (300) employees in the Department of Regional and Provincial Affairs in the Ministry of Youth and Sports, after which two scales were built and prepared for transformational leadership and creativity in job performance by distributing questionnaires to experts and choosing the most appropriate fields and paragraphs for the scale, and conducting the special foundations for building and modifying the scales from validity, reliability and objectivity, and after distributing them to the individuals of the research sample and collecting them and conducting statistical operations and extracting the correlations and then analyzing the results obtained by the researchers in the statistical bag to identify The relationship between the variables to be studied by the researchers, as the results showed that there is a direct relationship between the two variables and that there is a significant impact of transformational leadership on creativity in job performance. The researchers recommended relying more on transformational leadership in managing the affairs of the department and the rest of the ministry's departments. (Sobhi, Abdel Khaleq 2023)

As for the study (Heba Abbas, Ali Jalal 2021) entitled (Building and standardizing the transformational leadership scale for administrative bodies in the central Olympic federations from the point of view of the general bodies), the importance of the research lies in addressing the topic of transformational leadership, which is relatively new in administrative thought in general, and its adherence as a leadership trait for members of the administrative bodies in the Iraqi national Olympic federations in particular, which is positively reflected in stimulating and enhancing high self-confidence among players and members of the general body in the Iraqi national Olympic federations and national teams to ensure efficient performance, in addition to active participation in the vision and drawing up the strategy and planning that the concerned federation draws up and hopes to implement in the fields of play and achieve excellence and



victory in competitions. It was reached to build a transformational leadership scale for members of the Olympic federations from the point of view of members of the administrative bodies. According to (8) fields, distributed over them (73) paragraphs. And standardizing the transformational leadership scale for members of the Olympic federations from the point of view of members of the administrative bodies. And that members of the Olympic federations were distinguished by several standard levels. Members of public bodies are at an average level of opinions on the transformational leadership scale. (Abbas, Jalal 2021)

The study (Rahim and Shaker, 2024) entitled (Creative Performance of the Iraqi National Olympic Committee from the Perspective of Members of the Administrative Bodies in Sports Federations) dealt with building a creative performance scale for the Iraqi National Olympic Committee, and identifying creative performance for the Iraqi National Olympic Committee from the perspective of members of the administrative bodies in sports federations. The researchers adopted the descriptive survey approach to suit the nature of the research. The research community was determined from members of the administrative bodies in the Olympic sports federations, numbering (26) federations, with a number of members reaching (210) members. The researchers selected the research sample from the research community itself, and a number of phrases were formulated, numbering (29) phrases, and they were presented to the experts, and (9) phrases were deleted from them. After applying the scientific foundations, the scale became composed of (20) phrases, and then the final image of the scale was applied to the research sample.

As for the study (Falah Hassan Shadhan, Ali Abdul Latif Ali 2021) entitled (Administrative creativity and its relationship to transformational leadership of the directorates of sports and school activities in Baghdad Governorate from the point of view of teachers), the importance of the research lies in the importance of the topic it addresses, as the topic of administrative creativity and transformational leadership is one of the important topics that has received and continues to receive great attention from those interested in this field, as the progress of schools in the sports field, their development and continuity depend mainly on the leaderships that move them and draw up their plans and policies and what those leaderships possess of transformational leadership behaviors in developing their efficiency in administrative work, so the researchers put some of the following questions: What is the relationship between administrative creativity and transformational leadership behaviors? The descriptive approach was used using the survey method and the correlation method. The research sample was selected from physical education teachers (preparatory study), totaling (250) for the study application sample. The statistical description of the data of the administrative creativity and transformational leadership scales was presented and discussed, in addition to presenting the results of the correlation between the administrative creativity and transformational leadership scales and discussing them. The results showed that physical education teachers in schools enjoy encouragement from the administration to learn and



develop themselves. The results also showed that physical education teachers have the ability to communicate and influence others in a positive way. And that physical education teachers seek to develop current work to create creative work. And that there is a relationship between transformational leadership behaviors and creativity among physical education teachers. (Shadhan, Ali 2021)

**procedures:**

**Research methodology and field procedures:**

**Research methodology:**

Choosing the appropriate method to research any problem is one of the steps that lead to the success of the research, considering that the method is “the methods, procedures or approach used in the research to collect data material and reach results, interpretations or predictions related to the research topic (Raheem, Shakir, Hashim, 2024), as the researchers used the descriptive method using the survey method and mutual and predictive relationships because it aims to determine the conditions and relationships between reality and appearance and collect data from members of society to determine the current state of society in many variables (Gharabiyya, 2002, p. 120), which he sees as consistent and compatible with the specifications of his research and achieving the objectives of his study.

**Research community and sample:**

The research community included the coaches of the Iraqi Premier League and Elite clubs for the advanced and youth categories for the sports season (2023-2024), numbering (325) coaches, including (210) coaches for the advanced category, who constituted a percentage of (65%) of the community, and (115) coaches for the youth category, who constituted a percentage of (35%). (30) coaches were selected using the simple random method as a survey sample, representing (9%) of the research community, and (100) coaches were selected using the simple random method as a sample for constructing the measures, representing (31%), and (150) coaches were selected as a main experimental sample, representing (46%), and (45) coaches were neglected, some of whom did not complete their responses to the questionnaires, and some of them did not return the questionnaires. Table (1) shows this.

Table(1) shows the distribution of the research community and samples among the Iraqi stars and elite clubs.

Sports clubs	Survey sample		Sample building scales		Main sample		The excluded		the total
	Adults	youths	Adults	youths	Adults	youths	Adults	youths	
Stars League	10	5	35	15	50	25	5	20	165
Elite League	10	5	35	15	50	25	15	5	160
Total	30		100		150		45		325



Ratios	%9	%31	%46	14%	100%
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**Research methods, devices and tools used:**

The description of the tools used in the research gives an indication of the need for them in all field procedures (Raheem, Salah, 2023), as the following was adopted from them:

- Arabic and foreign sources.
- The Internet.
- Paper forms.
- Field visits to collect information.
- Electronic calculator.
- (SPSS) program to process data statistically.

**Field research procedures (procedures for determining variables):**

**Procedures for measuring transformational leadership:**

In order to measure the transformational leadership variable among coaches of the Iraqi Premier League and Elite clubs for the sports season (2023-2024), this requires the researchers to construct a scale according to the following steps and procedures- :

**Determine the goal and purpose of building the scale:**

The aim of constructing the transformational leadership scale is to develop a scientific measuring tool, and the purpose of constructing it is to identify the transformational leadership possessed by the coaches of the Iraqi Premier League and Elite clubs. In light of the definitions and theoretical frameworks of the concept of transformational leadership, the researchers sought to divide the concept into areas and distinctive features and to formulate and collect paragraphs concerned with measuring it.

**Defining the theoretical framework:**

The researchers adopted one of the world's leadership theories (BASS) as a theoretical framework in forming the fields and formulating the paragraphs concerned with measuring transformational leadership among coaches of the Iraqi Premier League and Elite clubs.

**Defining the domains of the transformational leadership scale:**

After adopting the theoretical frameworks of the concept of transformational leadership in forming the fields and formulating the scale paragraphs, the researchers divided the scale into its primary elements so that each element represents a specific field or dimension. After reviewing the relevant sources and literature, the researchers were able to identify (10) fields for the transformational leadership scale, Appendix (1). In order to identify the validity of those fields, the researchers resorted to presenting them to a group of specialists, Appendix (3), in testing, measurement, management and sports organization within a questionnaire, in which the



importance of each field was determined. After collecting the forms and processing their data statistically, the relative importance value was extracted when collecting half the maximum value of the experts' agreement with half the value of the range (importance) found within the form. As for the relative importance value, it is dividing the importance by the maximum value of the agreement multiplied by one hundred (Hussein, 2011, p. 70).

**This can be explained as follows:**

- Maximum agreement value = Number of experts × Importance level =  $17 \times 10 = 170$
- Half of maximum agreement value =  $170/2 = 85$
- Half of importance level =  $10/2 = 5$
- Importance value = Half of range + Half of maximum value =  $85 + 5 = 90$
- Relative importance value =  $90/170 \times 100 = 53\%$ .

After collecting the forms, transcribing the data and processing it, the fields that received less than (90) importance, or less than (53%) relative importance, were excluded by taking the opinions of (17) experts and specialists, and Table (2) shows that.

Table (2) shows the degree of importance and relative importance of the areas of the transformational leadership scale.

N	Areas	Degree of importance	relative importance	Accept nomination	
				Yes	No
1	Attractiveness and Ideal Influence	160	94%	√	
2	Inspirational Motivation and Distinctive Motivation	55	32%		√
3	Intellectual Stimulation	150	88%	√	
4	Individual Consideration	65	38%		√
5	Sensitivity for Others	60	35%		√
6	Deductive Thinking	150	88%	√	
7	Self-Confidence and Confidence	55	32%		√
8	Mental Flexibility	65	38%		√
9	Ability to Analyze and Connect	60	35%		√
10	Administrative Creativity	155	91%	√	

**Collecting, preparing and formulating paragraphs:**

In order to collect, prepare and formulate an appropriate number of paragraphs concerned with measuring the areas of transformational leadership, the researchers sought to review the sources, literature and previous studies. After that, (36) paragraphs concerned with measuring the areas of transformational leadership were formulated, Appendix (4), with (9) paragraphs for each area, and they were presented to ((15 experts and specialists, Appendix (6) in the field of measurement and evaluation, sports psychology, management and organization, for the purpose of evaluating them and judging the extent of the suitability of each paragraph in measuring

what it was designed to measure, with the necessary comments if required, in addition to expressing an opinion on the suitability of the alternative answers adopted for the scale. After collecting the forms, transcribing the data and analyzing the opinions of experts and specialists on the suitability of the paragraphs, they suggested deleting and changing a section of the paragraphs, either because they were repeated in meaning with other paragraphs or because they were not suitable for measuring what they were designed for, and modifying and transferring the other section from one area to another. They also suggested that the alternative answers (the five-point) be (I completely agree, I agree, neutral, I disagree, I do not agree at all). In light of that, the opinions of experts and specialists were taken into account regarding the adoption of the proposed alternative answers, and then modifying a section of Paragraphs and the deletion of the other section as a result of the experts' agreement on that, and by using the experts' agreement percentage on the validity of the paragraphs and keeping the paragraphs that received an agreement percentage of (80%) from the experts or more, it retained (32) paragraphs concerned with measuring transformational leadership and distributed as follows: (8) paragraphs concerned with measuring the field of attraction and ideal influence, (8) paragraphs concerned with measuring the field of intellectual stimulation, (8) paragraphs concerned with measuring the field of strategic thinking, (8) paragraphs concerned with measuring the field of administrative creativity, and Table (3) shows that.

**Table (3) shows the percentages of agreement between experts regarding the validity of the transformational leadership scale items.**

No	Areas	Paragraph sequence	Number of paragraphs	Number of Approvers	Percent age	Disagree	percent age	Accept nomination	
								Yes	No
1	Attractiveness and ideal influence	1-3-5-6-7	5	15	%100	0	0	√	
		4-8-9	3	13	%87	2	13%	√	
		2	1	11	73%	0	27%		√
2	intellectual stimulation	2-4-5-8	4	15	%100	0	0	√	
		1-3-6-7	4	14	93%	1	7%	√	
		9	1	10	67%	5	33%		√
3	strategic thinking	2-5-8-9	4	15	%100	0	0	√	
		6-4-1-3	4	13	%87	2	13%	√	
		7	1	11	73%	4	27%		√
4	Administrative creativity	2-3-4-5-7-9	6	15	%100	0	0	√	
		6-8	2	14	93%	1	7%	√	





		1	1	11	73%	4	27%		√
		<b>the total</b>	<b>36</b>						

In order to ensure the validity of the modifications made by the researcher to the paragraphs, he presented them to the linguistic expert to modify the wording of the scale paragraphs in a way that does not conflict with their linguistic integrity.

**Setting up the scale instructions:**

In order to complete the initial picture of the transformational leadership scale so that it can be applied to coaches of the Iraqi Premier League and Elite clubs, the researcher set instructions for the scale, which are as follows:

1. It is necessary to answer honestly and accurately.
2. You are not allowed to ask another colleague to answer.
3. Answer all paragraphs.
4. Put a check mark (☐) in front of each paragraph and in the field you see fit.

The researchers took care in these instructions to conceal the real purpose of the scale, as the name of the scale was not mentioned in order to obtain accurate data. The instructions also included an example of how to answer the paragraphs and Appendix (7) showing the instructions for the transformational leadership scale with (36) paragraphs, of which (32) paragraphs remained from the experts' nomination and (4) paragraphs for the objectivity of the response (lie detection paragraphs), i.e. one paragraph for each field, which were written together and without mentioning the name of the field in preparation for surveying it on a sample of trainers.

**Transformational Leadership Scale Survey:**

In order to know the clarity of the instructions, paragraphs and answer alternatives by the members of the research sample, as well as to determine the time required to answer the paragraphs of the scales and to identify the difficulties that the researchers may face when applying the scale to the members of the building sample and thus avoid them (Raheem, AlShafai, 2019), the scale was surveyed during the period between (7/1/2024 to 11/1/2024), on the members of the survey sample, numbering (30) trainers who were randomly selected from the elements of the research community, as previously indicated in Table (1). It was shown from the survey experiment that the instructions were clear by the trainers and that the time taken to answer the paragraphs of the scale was between (10 - 15) minutes, and that the answer alternatives and paragraphs were clear to the trainers, and thus the scale, with its instructions, paragraphs and answer alternatives, became ready for application to the members of the building sample.

**Application of the transformational leadership scale to the construction sample members:**

After completing the procedures that qualify for the application of the transformational leadership scale consisting of (4) fields and (36) paragraphs after adding (4) paragraphs for the objectivity of the response, Appendix (7), on the sample members of the construction,



numbering (100) trainers during the period between Sunday, corresponding to 1/14/2024, and Thursday, corresponding to 2/1/2024, and after completing the implementation of the scale, the researchers collected the trainers' questionnaires in preparation for identifying the objectivity of the response and then analyzing the data statistically.

**Objectivity of response:**

To reveal the objectivity of the response, there are several methods, including hiding the real purpose of the scale and merging all the paragraphs of the scale together without mentioning the field or component, in addition to using the method of repeating a group of paragraphs to the original paragraphs that are similar in meaning and different in content (text). The researchers followed the methods concerned with the objectivity of the response and the method of repeating a group of paragraphs is the most common in revealing the falseness of the response, as the researchers chose (4) paragraphs from the paragraphs of transformational leadership, i.e. one paragraph from each field, after which they formulated (4) paragraphs for the transformational leadership scale, and Table (4) shows the original paragraphs and the repeated paragraphs.

Table (4) shows the sequence of the original paragraphs and the sequence of the duplicate paragraphs of the transformational leadership scale.

NO	ORIGINAL PARAGRAPH SEQUENCE	REPEATED PARAGRAPH SEQUENCE	THE FIELD
1	2	33	Attractiveness and Ideal Influence
2	10	34	Intellectual Stimulation
3	21	35	Strategic Thinking
4	25	36	Administrative Creativity

To achieve this purpose, the following was done:

- 1- Extracting the absolute difference between the original and duplicate paragraph scores for each questionnaire. The differences for the transformational leadership scale ranged between (1-20).
- 2- Extracting the sums of the absolute differences between these scores for each trainer from the sample members.



3- Extracting the values of the arithmetic mean and standard deviation for the sums of the differences. The values of the arithmetic mean and standard deviation reached, respectively, for the transformational leadership scale (3.47) and (1.03).

4- Collecting the values of the arithmetic mean and standard deviation for the purpose of finding the spoken score at which or below which the answer of any trainer from the sample members is accepted. The value of the sum of the mean and standard deviation for the transformational leadership scale reached (4.5).

Since the construction sample consisted of (100) trained people, we must have (100) forms. After these forms were subjected to the objectivity of the response and the necessary procedures were applied and the values of the sum of the absolute differences were compared with the value of the sum of the mean and the standard deviation of the sum of the differences (the reported value). For all the construction sample forms, no forms were excluded from the transformational leadership scale if the values of the sum of the absolute differences were less than the value of the sum of the mean and the deviation (the reported value). Thus, the number of forms for the transformational leadership scale became (100) valid forms for the purposes of statistical analysis of the data.

#### **Transformational Leadership Scale Correction:**

The process of correcting the scales is done by assigning an appropriate degree to each paragraph according to the respondent's answer through a correction key prepared for this purpose, which is "the tool by which the examiner reveals the answers that indicate the existence of the result being measured (Alam, 2000, p. 21). The five-point answer alternatives (completely agree, agree, neutral, disagree, disagree at all) were given degrees (1-2-3-4-5) for the positive paragraphs, from which the degrees of transformational leadership were determined for each trainer from the individuals in the construction sample, and by calculating the total sum of the degrees of each field that they obtain after answering each paragraph.

The transformational leadership scale consisted of (32) paragraphs, and after excluding (4) paragraphs that were placed in order to reveal the falseness of the response, the highest score that could be obtained was (160), while the lowest score that could be obtained was (32). After that, the statistical description of the transformational leadership scale for the trainers was calculated through their answers to the paragraphs, and Table (5) shows that.

Table (5) shows the statistical description of the transformational leadership scale for trainers.

Sample number	100
Mean	109.74
Standard error of the mean	2.314
Median	114
Mode	132
Standard deviation	23.147
Variance	535.81
Coefficient of skewness	-.652
Standard error of the coefficient of skewness	.241
Coefficient of kurtosis	-.289
Standard error of the coefficient of kurtosis	.478
Range	97
Least value	50
Highest value	147

#### Statistical analysis of paragraphs:

The quality of the scales depends on the paragraphs that make them up. It is necessary to analyze each paragraph and reveal its efficiency and to retain the paragraphs that fit the logical foundations for which they were built (Abdul Hamid, Bahi, 2000, page 219).

There are several methods for analyzing the paragraphs of the scales, including the two-party group method to extract the paragraph discrimination coefficient, which is “the ability of the paragraph to distinguish individual differences between the examinees (Al-Zaghbi, 2007, p. 190)” and the internal consistency coefficient “which provides us with evidence of the homogeneity of the paragraphs through the relationship of the paragraph score to the total score of the field to which it belongs and the relationship of the field score to the total score of the scale (Alam, 2000, p. 279)”. The researchers used the statistical analysis of the paragraphs of the Transformational Leadership Scale for Iraqi Stars and Elite League Coaches, the two-party group method to reveal the ability of the scale paragraphs to distinguish between the examinees or reveal the differences between the examinees and the internal consistency coefficient method

by calculating the correlation coefficient (Pearson) between the paragraph score and the total score of the field or pattern to which it belongs.

**Two-party method:**

In order to extract the ability of the paragraphs of the transformational leadership scale for trainers, there are several steps that must be followed, which are (Al-Zaghbi, 2007, p. 197):

1. Arrange the scores obtained by the trainers on each paragraph in descending order from the highest score to the lowest score.
2. We take two groups of scores, the first represents the trainers who obtained the highest scores and the second represents those who obtained the lowest scores in each paragraph.
3. We take a percentage (27%) from the highest and lowest groups, and this percentage represents the best percentage that can be taken because it provides us with two groups with the maximum possible amount of differentiation, as the number of trainers in the highest group reached (27) trainers and the number of trainers in the lowest group reached (27) trainers.

After following the steps, the scale paragraphs were analyzed by using the (T) test for independent and equal samples in number to test the differences between the means of the two extreme groups for each paragraph separately, as the calculated (T) value represents the discriminating power of the paragraph between the upper and lower groups. Thus, the results of the analysis came out that all the scale paragraphs have a significant discriminating power between individuals by comparing the values of the significance level (sig) as it is less than (0.05), and Table (6) shows that.

**Table (6) shows the values of the discriminating ability and the moral significance of the items of the transformational leadership scale.**

PARAGRAPH	TOP GROUP		LOWER GROUP		TEST VALUE	SIG	DISTINCTIVE SIGNIFICANCE
1	4.52	.657	2.84	.419	14.44	.000	Distinctive
2	4.67	.559	2.73	.491	17.53	.000	Distinctive
3	4.89	.314	3.43	.620	14.22	.000	Distinctive
4	4.93	.249	3.58	.580	14.47	.000	Distinctive
5	5.00	.000	3.84	.868	8.99	.000	Distinctive
6	5.00	.000	4.21	.786	6.75	.000	Distinctive
7	4.97	.147	3.63	.741	12.09	.000	Distinctive
8	5.00	.000	3.82	.768	10.35	.000	Distinctive
9	5.00	.000	3.91	.724	10.16	.000	Distinctive
10	4.97	.147	3.78	.467	16.55	.000	Distinctive
11	4.97	.147	3.50	.658	14.86	.000	Distinctive
12	5.00	.000	4.04	.469	13.82	.000	Distinctive
13	4.93	.249	3.82	.569	12.08	.000	Distinctive



14	4.93	.249	3.71	.750	10.44	.000	Distinctive
15	4.84	.363	3.78	.629	9.95	.000	Distinctive
16	4.97	.147	3.86	.452	15.77	.000	Distinctive
17	4.89	.314	3.78	.512	12.52	.000	Distinctive
18	4.91	.284	3.78	.593	11.66	.000	Distinctive
19	4.80	.401	3.80	.499	10.57	.000	Distinctive
20	4.76	.431	3.80	.499	9.83	.000	Distinctive
21	4.86	.340	3.82	.437	12.66	.000	Distinctive
22	4.93	.249	3.67	.668	11.68	.000	Distinctive
23	4.82	.383	3.56	.620	11.74	.000	Distinctive
24	4.89	.314	3.52	.547	14.73	.000	Distinctive
25	4.67	.473	3.30	.591	12.26	.000	Distinctive
26	4.65	.481	3.28	.544	12.77	.000	Distinctive
27	4.73	.443	3.06	.490	17.57	.000	Distinctive
28	4.58	.580	2.84	.363	17.28	.000	Distinctive
29	4.89	.314	3.43	.654	13.79	.000	Distinctive
30	5.00	.000	3.76	.873	9.61	.000	Distinctive
31	4.97	.147	3.50	.658	14.66	.000	Distinctive
32	4.76	.431	3.26	.574	14.35	.000	Distinctive

**\*Significant at a significance level of (0.05) and a degree of freedom of(52)**

**Internal consistency coefficient method:**

The researchers used another method to detect the efficiency of the transformational leadership scale paragraphs that differs from the previous method (the two-party groups). This method depends on finding the value of the correlation coefficient between the paragraph score and the total score of the field to which it belongs, as well as the paragraph score and the total score of the scale. The researchers extracted the values of the (Pearson) correlation coefficient between the paragraph score and the total score of each field, the paragraph score and the total score of the transformational leadership scale consisting of (32) paragraphs for the sample of the construction, numbering (100) trainers. As a result of this procedure, the moral significance appeared in all calculated correlation coefficients, and Tables (8-7) show this.



Table (7) shows the correlation values between the paragraph score and the total score of the field to which the paragraph belongs for the transformational leadership scale and the type of statistical significance.

THE FIELD	NO	CORRELATION COEFFICIENT VALUE	SIG	RESULT
Attractiveness and ideal influence	1	.459**	.000	positive
	2	.581**	.000	positive
	3	.449**	.000	positive
	4	.499**	.000	positive
	5	.569**	.000	positive
	6	.443**	.000	positive
	7	.527**	.000	positive
	8	.439**	.000	positive
intellectual stimulation	1	.348**	.000	positive
	2	.440**	.000	positive
	3	.469**	.000	positive
	4	.507**	.000	positive
	5	.428**	.000	positive
	6	.383**	.000	positive
	7	.421**	.000	positive
	8	.377**	.000	positive
strategic thinking	1	.391**	.000	positive
	2	.379**	.000	positive
	3	.409**	.000	positive
	4	.439**	.000	positive
	5	.383**	.000	positive
	6	.427**	.000	positive
	7	.429**	.000	positive
	8	.484**	.000	positive
Administrative creativity	1	.414**	.000	positive
	2	.396**	.000	positive
	3	.367**	.000	positive
	4	.468*	.000	positive
	5	.444**	.000	positive
	6	.393**	.000	positive
	7	.458**	.000	positive



	8	.460**	.000	positive
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\*Significant at a significance level of (0.05) and a degree of freedom of.(98)

Table (8) shows the correlation values of the paragraph score with the total score of the transformational leadership scale and the statistical significance.

No	Correlation coefficient	SIG	RESULT	No	Correlation coefficient	SIG	RESULT
1	.361**	.000	positive	17	.000	.289**	positive
2	.330**	.000	positive	18	.000	.337**	positive
3	.357**	.000	positive	19	.000	.422**	positive
4	.352**	.000	positive	20	.000	.416**	positive
5	.379**	.000	positive	21	.000	.479**	positive
6	.391**	.000	positive	22	.000	.447**	positive
7	.349**	.000	positive	23	.000	.418**	positive
8	.329**	.000	positive	24	.000	.353**	positive
9	.389**	.000	positive	25	.000	.404**	positive
10	.393**	.000	positive	26	.000	.364**	positive
11	.357**	.000	positive	27	.000	.417**	positive
12	.339**	.000	positive	28	.000	.344**	positive
13	.324**	.000	positive	29	.000	.296**	positive
14	.397**	.000	positive	30	.000	.347**	positive
15	.366**	.000	positive	31	.000	.348**	positive
16	.367**	.000	positive	32	.000	.344**	positive

\*Significant at a significance level of (0.05) and a degree of freedom of.(98)

**Scientific foundations of the transformational leadership scale:**

Validity and reliability are among the most important psychometric properties that must be present in a psychological scale, regardless of the purpose of its use. Accordingly, these properties and conditions must be verified in order to ensure the quality and validity of the scales used in measurement and evaluation (Alam, 2006, p. 88).

**Scale validity:**

Test validity refers to the “correctness or validity that the test actually measures the function it is intended to measure without measuring another function besides it (Mustafa et al., 2006, p. 111), and the validity of the scale also provides us with “direct evidence of the validity of the scale to perform its function and achieve the purposes for which it was developed” (Najati, 1999, p. 215). The researchers verified the validity of the transformational leadership scale through the content validity index when the scale was presented in its initial form to a group of experts and specialists to approve the validity of the scale’s paragraphs in measuring what it was developed for. Through statistical analysis of the scale’s paragraphs, the validity of the



structure was verified using the internal consistency coefficient method, which is one of the most common types of validity in the field of educational and sports research. This was achieved by finding:

**Correlation coefficient of the paragraph score with the total score of the domain to which the paragraph belongs:**

The transformational leadership scale included four domains, and for this reason the researchers sought to extract the value of the Pearson correlation coefficient between the paragraph score and the total score of the domain to which it belongs for the questionnaires of the building sample members, numbering (100). To know the type of statistical significance, the researchers compared the calculated correlation coefficient value shown in Tables (8-7) with the values of the significance level (sig) at a degree of freedom of (98), which showed the significance of all correlation coefficients.

**Scale stability:**

The concept of stability is one of the basic concepts in psychological and achievement scales and must be available in the scale in order for it to be valid for use. The stability of the scale means that “the test is reliable and dependable or that the individual’s score does not change substantially with repeated measurement or the consistency of the scale results with themselves” (Kawafha, 2005, p. 83). To verify the stability of the transformational leadership scale for Iraqi stars and elite club coaches, the researchers used the split-half method and the (alpha-Cronbach) method.

**First: The half-split method:**

It may be difficult for the researcher to apply two equivalent measurements to the trainers or it may be difficult for him to examine the examinees twice with the same scale, so the researchers resorted to using the fairness method. In this method, the scale is given in full and then divided when correcting into two equal parts so that all averages and standard deviations are equal in both halves. Usually, the first part contains the paragraphs with odd numbers and the second part contains the paragraphs with even numbers. The scores of each part are added separately, so we have two scores for each examinee (Al-Naimi and Taama, 2008, p. 413). The researchers adopted the odd and even numbers method in dividing the paragraphs of the transformational leadership scale (32) paragraphs into two halves. The first half included the paragraphs with odd numbers and the second half included the paragraphs with even numbers. After ensuring the homogeneity of the two halves using the (F) test by extracting the values of the arithmetic means and standard deviations and then the variance values for each part, the values of the arithmetic mean, standard deviation and variance for the first part of the transformational leadership scale reached, respectively, the values (55.21) and (13.48) and (181.74) and the values of the arithmetic mean, standard deviation and variance for the second section of the transformational leadership scale reached, respectively, values (55.42), (11.87) and (140.91) and by applying the equation of the absolute proportions, which confirms the randomness of the differences between the two halves of the scale and that they are homogeneous at a good



rate because the significance level (sig) is less than (0.05) and at two degrees of freedom (98-98). After that, the Pearson correlation coefficient was calculated between the halves of the scale (the partition stability coefficient), which showed that the value of the correlation coefficient of the two halves of the transformational leadership scale reached (0.801). Since these values represent the stability of one half of the scale, the researchers sought to use the (Spearman-Brown) equation to modify and extract the stability value of the entire scales after applying the correction equation and obtaining the stability degree of the scale, as the value of the stability coefficient of the transformational leadership scale reached (0.889), which confirms that the scale enjoys a high and reliable stability degree.

#### **Second: Cronbach's Alpha Method:**

This method aims to reach an estimated value for the stability coefficient of the scale, which has multiple item scores, i.e. it requires answering the questionnaire from among multiple alternatives. The idea of this method is based on the consistency of individuals' responses across the scale items and the extent of the correlation of the paragraphs with each other within the scale, as well as the correlation of each paragraph with the scale as a whole, as the rate of internal correlation coefficients between the paragraphs with the number of paragraphs is what determines the alpha coefficient (Costa. P. T. (Ondorhers), 1992, p. 44). To find the stability of the Cronbach's alpha coefficient for the transformational leadership scale, the researchers relied on data from the construction sample individuals, numbering (100) trainers, and using the Statistical Package for Social Sciences (SPSS), the stability coefficient was extracted, which amounted to (0.868), which is a high stability coefficient that indicates the consistency of the scale paragraphs.

#### **Basic research experience:**

After completing the construction of the transformational leadership scale with its (4) fields and (32) paragraphs for the coaches of the Iraqi Premier League and Elite League for the sports season (2024-2023), the researchers began applying the scale to the members of the main research sample, numbering (150) coaches, as shown in Table (1), who were selected from the members of the community using the simple random method, during the period between Sunday, corresponding to 4/3/2024 and Thursday, corresponding to 29/3/2024. After completing the application of the two scales and implementing the main experiment, the researchers collected the forms, transcribed their data, and arranged them in preparation for conducting statistical treatments on them.

#### **Statistical methods used:**

The researcher used the Statistical Package for Social Sciences (SPSS) to process the data to extract the results.

Hypothetical mean = the highest score that can be obtained in the scale - the lowest score that can be obtained in the scale / 2 (Al-Dardir, 2005, p. 175).



**Discussion of results:**

**Presentation of the initial data for the studied variables:**

After measuring the transformational leadership variables by applying the relevant scales to measure them and obtaining data for the individuals of the basic experiment from the coaches of the Iraqi Stars and Elite League for the sports season (2024-2023), numbering (150) coaches, the researchers sought to extract descriptive statistics indicators represented by the values of the arithmetic mean, standard deviation, standard error, skewness coefficient, and the largest and smallest value, for the study variables. The results related to the statistical treatments showed that the values of the skewness coefficient and for all variables were (zero), which is an indicator that the research sample is distributed in a moderate distribution, and that the value of the standard error indicates the suitability of the sample size for statistical analysis, and Table (9) shows this.

Table (9) shows the unit of measurement and descriptive statistics indicators for the variables under study.

Variables	Sample number	The mediator	Minimum value	The largest value	Standard error	Arithmetic means	Standard deviations	Coefficient of skewness
Transformational Leadership	150	113.00	50.00	147.00	1.82	109.74	22.32	-0.70

**Presentation, analysis and discussion of the reality of the level of transformational leadership:**

After completing the construction of the transformational leadership scale and applying it to the coaches of the Iraqi Premier League and Elite clubs for the basic research sample of (150) coaches, which included (4) fields and (32) paragraphs, distributed at (8) paragraphs for each field, the researchers then sought to extract the values of the arithmetic mean and standard deviation of the coaches' scores on the scale and then calculate the value of the hypothetical mean of the scale. After inferring the significance of the differences between the two means (the achieved arithmetic mean and the hypothetical mean of the scale) by using the (t) test for a single sample as a statistical means to achieve this purpose and identify the reality of the level of transformational leadership among members of the administrative bodies of the Iraqi Premier League and Elite clubs from the point of view of the coaches for the sports season (2024-2023), the results related to analyzing the data and conducting a comparison between the achieved arithmetic mean and the hypothetical mean of the scale amounting to (96) showed that there is a statistically significant difference between the two means, and that the calculated (t)



value is statistically significant at a degree of freedom (149) And under the significance level (0.05), Table (10) shows that:

Table (10) shows the significance of the differences between the achieved arithmetic mean and the hypothetical mean for the transformational leadership scale.

SAMPLE	MEAN	ST.D	HYPOTHETICAL MEDIUM	DEGREE OF FREEDOM	TEST VALUE	RESULT
150	109.74	22.32	96	149	7.54	0.00

From Table (10), it is clear that the difference is in favor of the achieved arithmetic mean, and this indicates that the level of transformational leadership among the members of the administrative bodies of the Iraqi Premier League and Elite clubs, from the point of view of the coaches, is above average. The researchers believe that the opinions, tendencies, and beliefs of the study sample members play an important role in their positions and responses. This is based on the feelings of love and hate that the coaches have toward the members of the administrative bodies through the culture of teamwork and the feeling of belonging to the group, "because it is a group with a specific number of individuals in a state of interaction to achieve a common goal whose importance is agreed upon, within the framework of interaction through different but interconnected roles. The level of interaction varies according to the goals and members, and achieving goals or accomplishment is done through the group, through continuous interaction and cooperation, not through individual work. The group works to satisfy the needs of the individual as a social being, and it is a source of information for the individual, provides the return, and achieves goals for the individual that are difficult for him to achieve alone" (Al-Qaryouti, 2000, p. 286).

And trying to participate in making decisions related to collective and group work, which indicates the degree of sense of responsibility placed on their shoulders, and the ability to encourage creativity and innovation in sports administrative work, "because creativity is every process that results in a new outcome as a result of interaction between individuals using a new method that achieves distinction and superiority and gives greater flexibility (Masoud, 2012, p. 13)" The researchers believe that the culture of innovative administrative bodies is characterized by a tendency to emphasize the spirit of initiative and the priority of individuals over specific rules and procedures, with an open vision to accept any new idea with the least amount of objections that frustrate innovation and its initiatives. In order for sports institutions to achieve this, ready-made work rules and work guides must be reduced. Trainers and administrators who feel a high degree of perceived organizational support feel that they owe the sports institution and thus the need to exchange good organizational treatment with positive trends and behaviors towards the institution. Among these behaviors are working to improve productivity, innovation and achieve victory, in addition to the culture of self-development, commitment and respect for time. The researchers believe that the importance of





transformational leadership among members of federations is a social and civilizational gain. And cultural, which is the result of personal, psychological and social reasons linked to personal, social and economic compatibility and the nature of society and the required responsibilities, and it is consistent with what was indicated by (Darwish 1998, page 176) that mental, emotional and behavioral elements enter into the formation of transformational leadership, and the strongest types of cultures are those that charge psychologically and acquire emotional intensity, and the most effective of them is that which imprints its character on behavior. Transformational leadership is the result of what the members of administrative bodies have acquired in terms of behavioral patterns, ways of thinking, values, customs, trends and technical skills before joining the clubs and the sports work in which they work. Then the clubs add that cultural system to their members from their characteristics, interests, policies, goals and values, which determine the personality of the clubs and distinguish them from other clubs, and it is the sum of shared values and behaviors, mentalities and actions that direct the efforts of individuals towards achieving common goals. This means that the members of administrative bodies believe that each individual has a unique personality that must be respected, and that the average individual is able to think objectively if he is given the opportunity away from Personal considerations to a large extent, and that he is able to reach rational decisions based on sound scientific foundations in the situations he encounters or the problems that arise before him (Hareem, 2006, p. 154). The researchers believe that the transformational leadership of the members of the administrative bodies of the Iraqi Premier League and Elite clubs is considered one of the most important components of the internal environment of the sports institution, which affects the behavior of individuals within the sports club and constitutes an important motive towards achievement. There must be clear and explicit rules and a job description for mutual responsibilities between members and developing the belief that the time element is an important element and should not be wasted and that sincerity in sports administrative work leads to satisfactory results. These values and beliefs are among the priorities of the vision and mission of sports clubs. The researchers also believe that one of the underlying reasons behind this is the cultural value that sports have come to represent for individuals and its contribution to the formation of the cultural identity of societies. Since knowledge and experiences are the foundations of cultural construction, the large amount that physical education and sports sciences contain, due to the multiplicity of their fields and their diversity between health, educational, social, psychological, physical and recreational, makes sports culture. A tributary of the general culture of the individual and society. This is what (Fahmi Mustafa Al-Zayat 2009) confirmed: “The ability to sacrifice and serve others is one of the most important characteristics of a person who enjoys leadership and his ability to give, give and produce. The leadership personality is the one that contributes to serving humanity in general to achieve happiness for the largest possible number of people. In addition, transformational leadership is the ability of the individual to establish fruitful and enjoyable social relationships with others characterized by the individual’s tendency to love, give and



cooperate (Al-Zayat, 2009, p. 215)”, and what (Fakhri Abdel Hadi) indicated in his study: “He showed that leadership individuals who are psychologically and socially compatible possess certain characteristics such as loving others, integrating and interacting with them and the desire to provide them with aid and assistance (Abdel Hadi, 2010, p. 127).”

### **Conclusions and applications:**

Through the procedures and data processing, the researchers reached the following conclusions :

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1. Developing scientific research tools concerned with measuring and identifying transformational leadership among members of administrative bodies from the point of view of coaches of clubs participating in the Iraqi Stars and Elite Football League.
2. Members of administrative bodies of clubs are characterized by a high level of transformational leadership from the point of view of coaches.
3. In light of the research results, the researchers concluded several recommendations, which are:
4. The necessity of adopting the prepared scale as scientific research tools in identifying transformational leadership.
5. The necessity of developing the axes of transformational leadership among members of administrative bodies due to their great importance in management.
6. The necessity of conducting studies that include psychological, social, mental and motor variables with other variables among members of administrative bodies in football.



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