

**The relationship between intellectual capital development
and strategic competency development: An applied study on
the medical sector in Bahrain**

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Abstract:

This study aims to measure the relationship between the development of intellectual capital and the development of strategic competencies by applying to the medical sector in Bahrain, and to achieve the objectives of the study, a survey form was designed and distributed to 116 employees of the organizations under study, and 101 of them were retrieved, including 94 valid for analysis and study, where the data were analyzed and hypotheses were tested using the SPSS program. For statistical analysis, the study found a significant relationship between the development of intellectual capital and the development of strategic competencies .

Key words: intellectual capital, human and structural capital, relational capital, strategic competencies.

Introduction:

Human resources have become the most important resource that makes competitive differentiation in business organizations today with the global trend towards a knowledge economy, and this differentiation increases in strength as the organization has a qualified, efficient and high-quality human resource, which led to the human resource being considered the most important asset of business organizations, and the most influential in sustainable development (Babaei, H., Ahmad N., & Gill, S. S., 2012).

With the beginning of the third millennium, radical and very important changes have occurred in the business environment, the most important of which is the emergence of the knowledge and information revolution in various economic aspects, until the characteristic of the twenty-first century economy has become the knowledge-based economy . This has resulted in the emergence of the concept of intellectual capital, and the cognitive value of the employee has become specific to his ability to contribute to achieving organizational competitive advantage, the greater his knowledge value by increasing his abilities, knowledge and skills, the more worthy and influential on business performance as accurately as possible according to the specified standards and instructions (& Lytras, M. D 2008, .Pablos, P. O. D) Employment is described as meritocratic if it is able to use its knowledge and skills to successfully carry out

work activities in different situations and conditions, leading to the achievement of the level of performance expected from the business (Van der Merwe, R. P., & Potgieter, T. E., 2002).

Merit is defined as an implicit characteristic of the individual that has a causal relationship with effective superior performance that is considered a standard reference for the function or condition, it is deep and inherent in the individual's personality in a way that enables him to predict behavior and makes it able to direct him to a certain behavior in many job tasks, and is characterized by its stability for a reasonable period of time (Al-Janaini, 2016).

Workers are selected through the method of competencies by combining the dimensions of traditional work (knowledge and education) and the dimensions of outstanding performance (skills and personality traits), this combination touches the virtual part and the fixed and latent part of the human personality This fixed and latent part of the human personality is the part that touches the inherent properties associated with the effectiveness of performance, which through his knowledge can predict his behaviors, the quality of his performance and the extent of his effective actions in different situations (Al-Kurdi, 2010).

Intellectual capital is the result of the mutual interaction between the capabilities of employees, the organizational structure, and the internal and external relations of the organization, which leads to the highest levels of efficiency and

effectiveness, which in turn ensures the survival of the organization and its continuous development in the modern business environment (Gianpolo and Dominico, 2013).).

The development of intellectual capital is an important investment in one of its most important intangible assets, which has increased its importance in the modern era, due to the fact that the value of intellectual assets exceeds the value of tangible assets by several times and intellectual capital is the intellectual material for knowledge, information, intellectual property and experience that is put at the disposal in order to create wealth and achieve profits, because today's economy is completely different from yesterday's economy (2010, .Stewart, T. A).

The researcher studies the relationship between the development of intellectual capital in its various dimensions and the development of strategic competencies in a way that enhances the value of intangible assets of business organizations and achieves their differentiation in the contemporary business world.

Previous studies:

1- Intellectual Capital

Interest in intellectual capital began in the nineties of the last century, and the beginning was in 1990, by Ralph Styer, director of the JOHN SONVILLE Food Company (Marr, Gray, & Neely, 2003), after his famous saying, "In the past, natural resources were the most important components of national wealth and the most important assets of companies, after that

capital became represented in cash and assets. Fixed are the most important components of companies and society, but now natural resources, cash and fixed assets have been replaced by intellectual capital, which is the most important component of national wealth and the most precious assets of companies" (Al-Mufarji and Saleh, 2003).

The years following the year 1990 witnessed research activity on the aforementioned topic, to discuss the concept of intellectual capital, its dimensions, ways to measure it, and invest it, and the result of the efforts made was the emergence of new and influential concepts such as: the learning organization, the knowledge economy, and the knowledge covenant: Knowledge assets are the basis for the formation and development of other physical assets. Intellectual capital has come to be seen as a source of knowledge and capacity development and enhancing competitive differentiation in business organizations (2009, Nahapiet). Intellectual capital is the basis for excellence of organizations and the most important sources of achieving their competitive advantage based on their knowledge and mental skills (Afaf, 2012).

The Finds (2010 ,Stewart, T. A) The real investment lies in the knowledge possessed by individuals, which is expressed by the amount of information and knowledge they possess and the degree of integration they have or that are necessary to achieve continuous improvements, so large institutions seek to

form a distinctive human capital according to specific scientific foundations based on situational analysis with comparison with the value of human capital in competitors. Guthrie et al, 2015) defines it as all the non-monetary and intangible resources that an organization controls, wholly or partially, so that they contribute to creating value for the organization.

Intellectual capital as a general concept consists of three components: human capital, structural capital, and relational capital (2006,Suciu, M. C).

Structural Capital is defined as all that organizations possess of structures, procedures, systems, regulations, laws, philosophies and policies of various kinds (2000 Jola) and may also be known as organizational capital, which is an investment in systems, tools and philosophy, which determines the process of knowledge flow within the organization and next to the dimension of the organizational structure, it includes intellectual property (patents, copyrights, licenses, trademarks), Business process capital (organizational culture, management style, technological software), market capitalization and development capital (Jurczak, J. 2008).

Relational capitals is defined as the outcome of the internal and external relations of an organization. which are harnessed to achieve their short and long-term goals (Ehsan et al, 2016) and is related to internal communications and the organization's relationship with the external environment and

represents the strength of the relationship with customers, strategic partners and employees (2008, Jurczak, J).

2- strategic Competencies:

The concept of strategic competencies has occupied great importance in recent years among researchers, practitioners and those interested in human resource management, and the concept of **strategic** merit is related to the factors that contribute to achieving excellence in performance and enabling the human element to achieve the goals of the organization. The human element with strategic merit in work is the individual who uses his knowledge, skills, and professional values to achieve expected performance rates and achieve excellence in his work (Al-Janaini, 2016). Dubois et al, 2004 defines it as a group as a group of hospitals in Bahrain that the individual owns and uses in an appropriate way to accomplish Or achieving the required performance, and these hospitals in Bahrain include knowledge, skills and professional values. Hayes (1979) believes that it generally includes knowledge, motivation, social characteristics, roles, or skills of the individual according to the requirements of business organizations. Sheron (2004) refers to competence as human characteristics that allow a worker to perform work duties and manage situations better. These characteristics are a set of traits consisting of knowledge, skills, social roles and motivations that distinguish one individual from another. Kiran (2007) defines it as the product of knowledge, skills and values,

and it is reflected in the acquired knowledge and skills that affect professional performance during professional practice. Boyatzis (1982) believes that competencies lie in the individual's ability to adapt the structures of his personal behavior to the standards required for work because the results of this adaptation make him suitable for employment. Albanes (1989) defines them as the characteristics of the individual that are used to influence the management of the organization. He defines them (2002, Rankin defined it as a set of behaviors and skills that people are expected to display in their organizations.

Mansfield (1997) argues that personal characteristics that affect better performance are called meritocracy, and Woodruffe (1992) argues that it is the set of behavioral patterns that an incumbent needs in order to perform his job tasks efficiently.

Armstrong (2019) argues that competencies are divided into two types:

The first is Generic Competencies:

It is the set of skills, knowledge and professional values that must be available in all human resources in the organization, regardless of the quality of the job.

The second is Specific Competencies:

It is the set of skills, knowledge and professional values specific to a specific job and must be available in the incumbent. El Loftler (2002) divided competencies into three sections:

First: Technical Competency

This category refers to the skill or ability to use the knowledge set related to the job to accomplish work tasks in an appropriate manner.

Second: Social Competency

This category refers to the skills of dealing with individuals in a way that allows the completion of work tasks.

Third: Personal Competency

This category relates to hospitals in Bahrain that are required to accomplish work tasks, and this category is highly related to the previous social group.

Hoffman (1999) suggests that there are two schools of thought that define the concept of meritocracy:

- 1) The American school that evaluates merit based on distinctive personality traits and called it Hoffman personal competencies.
- 2) The British school, which assesses merit based on performance and business achievement standards, called it Hoffman Strategic Competencies.

Has combined (2008) Spencer et al two schools in one definition defined competencies as an implicit property of the person has a causal relationship to the performance of superior effective is a standard reference for the job or situation made the first reason for the second and the second as a result of the first and indicates (Janaini, 2016) that there are targeted competencies and actual competencies and functional

competencies The targeted competencies are the set of knowledge, skill and trends that the employee must enjoy in order to perform his job tasks effectively and efficiently and that The actual competencies and competencies card are the set of knowledge, skills and attitudes that the employee actually possesses, and can be insufficient to accomplish job tasks as required, while strategic competencies are the set of knowledge, skills and attitudes that the employee has and are necessary to accomplish his job tasks with confidence and competence.

The researcher has studied the three dimensions of intellectual capital, structural capital, human capital and relational capital on strategic competencies after the distinctive personal traits that include skills, knowledge and values and after the differentiation of performance that ensures the completion of tasks and functions.

Research Methodology:

First: The research problem:

Through the researcher's access to many previous researches and studies and standing on the most important results and analysis of them, the following main question can be posed to represent the problem of the study, which is:

What is the relationship between intellectual capital development and strategic competencies development in the medical sector in Bahrain?

The dimensions of the problem and research can be identified through the following questions:

- What is the importance of intellectual capital in its dimensions in the medical sector?
- Dimensions of the application of the entrance to strategic competencies in the medical sector?
- Is human capital seen as one of the most important intangible assets that must be invested in and developed in the medical sector?

Does structural capital affect the development of strategic competencies in the medical sector? Does relational capital have a direct role in the success and development of the concept of strategic competencies in the medical sector?

Second: Research Objectives:

The main objective of this research is to study the relationship between the development of intellectual capital and the development of strategic competencies and the main objective of the research includes a set of sub-objectives represented in the following:

- Disseminate the concepts of knowledge-based economy and clarify their importance in the hospitals under study.
- Developing intellectual capital in a way that enhances competitive differentiation.

- Achieving the targeted strategic competencies through the development of the dimensions of personal traits and performance differentiation of strategic competencies.
- Promoting and developing intangible intellectual assets and making continuous use of them.

Third: Research variables:

Independent variable:

Which is represented by intellectual capital in its three dimensions – human capital, structural capital and relational capital.

Dependent variable:

Strategic competencies and distinctive personality traits and performance differentiation

Fourth: Research Hypotheses:

The main assumption is as follows:

There is a statistically significant positive relationship between the development of intellectual capital in its dimensions and the development of strategic competencies for medical workers in Bahrain.

A number of sub-hypotheses branch out of this main hypothesis, namely:

- There is a statistically significant positive relationship between human capital and the distinctive personality traits of medical professionals in Bahrain.

- There is a statistically significant positive relationship between structural capital and the distinctive personality traits of medical personnel.
- There is a statistically significant positive relationship between relational capital and the personality traits of medical personnel.
- There is a statistically significant positive relationship between human capital and performance differentiation for medical workers in Bahrain.
- There is a statistically significant positive relationship between structural capital and performance differentiation of medical personnel.
- There is a statistically significant positive relationship between relational capital and performance differentiation for medical workers.

Fifth: The importance of research:

A- Scientific importance:

The importance of the scientific study stems from the research perspective addressing the link between two important variables at the level of social and human studies, specifically in the fields of management sciences, knowledge economy and human resource management, especially with the global transformation of business organizations towards knowledge and investment in human capital as the most important intangible assets in the business organization, namely intellectual capital and strategic competencies, and the importance of addressing the

two topics comes from the fact that they are important research topics for organizations and the Arab library.

B- Applied Importance:

The importance of the applied study stems from its focus on studying the relationship between intellectual capital and strategic competencies applied to the medical sector in Bahrain, which is a very important sector due to its direct responsibility for combating diseases and maintaining public health on the one hand and its extreme sensitivity to the efficient human resource on the other hand and its great economic importance on the other hand.

Sixth: Research Methodology and Methodology:

The researcher used the descriptive analytical method, which is based on the description and analysis of the phenomenon under study, which is the study of the relationship between the development of intellectual capital and the development of strategic competencies.

The researcher used SPSS statistical software to analyze the data.

Seventh: Research Community and Sample:

Research Community:

Hospital Name	Number of Employees	physicians	Nursing	Others
Hospitals in Bahrain	1850	1000	550	350
Hospital in Bahrain	1023	110	560	353

Research Sample:

The researcher used the comprehensive inventory method with the leaders of the employees (heads of units - heads of departments - executive directors) and their number is (116) at the Heart Institute (74) and a hospital hospital in Bahrain (42), where survey lists were distributed to (116) single and recovered from them (101) form valid for statistical analysis (94).

Data and means of collection:

Secondary data:

To form the intellectual framework of the study, and to provide published data relevant to the research topic. Secondary data covered topics related to intellectual capital and its dimensions and strategic competencies and dimensions.

Secondary data sources:

- Arab and foreign books and references related to intellectual capital, strategic competencies in general, human, structural and relational capital, distinctive personal traits and performance excellence in particular.
- Reports of government organizations, private research companies and reports of the institutions in question.
- Periodicals and articles.

Preliminary data:

It was represented in the data collected through the survey list that was distributed to the employees of the hospitals in question.

Data Analysis:

Through SPSS statistical data analysis software

Eighth: Statistical Methods Used:

The researcher relied on descriptive statistical methods

- Numbers and percentages.
- Arithmetic Means .
- Standard Deviation.

This is because random samples are not used, but rather a comprehensive inventory and there is no need to conduct inferential tests to generalize the results.

Ninth: Research Limits:

Objective limits:

The researcher was limited to studying the relationship between the development of intellectual capital and the development of strategic competencies for medical workers.

Applied limitations:

- The researcher chose the medical sector in the Republic of Bahrain.

Spatial boundaries: Arab Republic of Bahrain

Time limits: Year 2020

Statistical analysis

1) Search Tool Design:

The researcher formulated a preliminary questionnaire based on the subject of the research, its objectives and questions, after careful reading and reviewing the literature and previous studies

related to the research problem and the researcher's practical experience, and the questionnaire consists of three parts as follows:

Part I: includes personal data.

Part II: The items on intellectual capital include 15 phrases divided into 3 dimensions.

The third part: includes items related to strategic competencies, and the number of phrases is 10 phrases divided into two dimensions, and in more detail, Table (1) shows the research variables, their measurement elements, and the symbols of their questions reflected in the survey list.

1) Research variables, elements of measurement, and question codes that reflect the survey list

Variables	Dimensions	Icon	Number of questions
(Independent variable) Intellectual Capital	Human Capital	X1	5 of (1 - 5)
	Structural Capital	X2	5 of (6 - 10)
	Relational Capital	X3	E from (11 - 15)
(dependent variable) Strategic Competencies	Distinctive personality traits	Y1	5 of (16 - 20)
	Performance differentiation	Y2	E (21 - 25)

The responses of the sample members to the paragraphs of the scale were measured according to the Likert five-point scale as shown in Table (2).

Table No. (2) Likert scale scores

I completely agree	I agree	neutral	Disagree	Completely disagree.
5	4	3	2	1

The level of importance was calculated according to the following formula:

- Importance level = (upper limit of answer - lower limit of answer) ÷ upper limit of the answer.
- Significance = $(5-1) \div 5 = 0.80$, as shown in Table (3)

Weighted average	Level of importance
Less than 1.80	very weak
1.80 to less than 2.60	Weak
2.60 to under 3.40	Medium
3.40 to less than 4.20	High
4.20 to 5	Very high

2) Authenticity and consistency of the search tool

The description of the search tool includes the sincerity of the apparent consistency and the consistency and sincerity of the internal consistency of the research tool as follows:

First: the sincerity of internal consistency

The sincerity of internal consistency means the consistency of each phrase of the questionnaire with the dimension to which this phrase belongs, and the researcher has calculated the internal consistency of the questionnaire by calculating the correlation coefficients between each of the phrases of the questionnaire dimensions and the total degree of the same dimension.

1. Internal consistency results

The validity of the internal consistency of the questionnaire is calculated by calculating the correlation coefficients between each of the questionnaire dimension phrases and the total score of the same dimension in order to

clarify the consistency of each statement of the questionnaire with the dimension to which this statement belongs on the survey sample $n = 20$.

The results were as follows:

- that all 5 statements of the human capital dimension have achieved statistically significant correlations with the total degree of the dimension to which they belong, at a significance level of 0.01, so the statements are considered true to what they were designed to measure.
- achieved statistically significant correlations with the total degree of the dimension to which they belong, at a significance level of 0.01, so the statements are considered true to what they were designed to measure.
- that all 5 relational capital dimension statements have achieved statistically significant correlations with the total degree of the dimension to which they belong, at a significance level of 0.01, so the statements are considered true to what they were designed to measure.
- that all 5 statements after the distinctive personality traits have achieved statistically significant correlations with the total degree of the dimension to which they belong, at a significance level of 0.01, so the statements are considered true to what they were designed to measure.
- that all 5 statements after performance differentiation achieved statistically significant correlations with the total degree of the

dimension to which they belong at the significance level of 0.01, so the statements are considered true to what they were designed to measure.

Second: Structural Honesty:

Structural honesty is one of the measures of the credibility of the tool that measures the extent to which the goals that the tool wants to reach have been achieved, and shows the extent to which each dimension of the research is related to the total degree of the dimension statements.

By measuring the correlation coefficient of each dimension of the questionnaire with the total score in the survey sample $n = 20$

Third: Stability of the questionnaire:

The stability of the questionnaire means that this questionnaire gives the same result if it is redistributed more than once under the same conditions and conditions, or in other words, the stability of the questionnaire means stability in the results of the questionnaire and not changing significantly if they were redistributed to the sample members several times during certain periods of time.

The researcher verified the stability of the research questionnaire through two methods, namely the half-fractionation method and the Cronbach alpha coefficient.

First: Split-Half Coefficient method

The scores of the survey sample were used to calculate the stability of the questionnaire by the method of half segmentation and then using the equal Spearman and Brown Coefficient equation, and the Gethman equation for unequal half segmentation (Guttman Split-Half Coefficient) and the results confirmed that the correlation coefficients by the method of half segmentation before the amendment and that the correlation coefficient after the adjustment indicates that the questionnaire has a very high degree of stability Reassure the researcher of its application.

Second: Alpha Cronbach method: Alpha Cronbach

The researcher used another method of calculating stability, which is the Cronbach alpha method, in order to verify the stability of the research tool, "Alpha Cronbach depends on calculating paragraph variations and test variance, and although the measurement rules in the value to be obtained are not specified, but obtaining (Alpha It is considered reasonable.

The results indicated the stability of the dimensions of the questionnaire, which ranged between (0.966) for the human capital dimension as a maximum, and (0.899) for the performance differentiation dimension as a minimum, and the stability coefficient of the total questionnaire reached (0.942), and the above Cronbach alpha indicators indicate that the dimensions of the questionnaire have a high constant coefficient and their ability to achieve the purposes of the research.

1) Results of the field study:

The results of the field study were reached using:

- Arithmetic averages, standard deviations, and weighted percentage mean in the results of descriptive analysis of variables.
- Simple Linear Regression Analysis to find out the effect of the independent variable on each dimension of the dependent variable.
- Stepwise Multiple Regression analysis to find out the effect of the dimensions of the (independent variable) on the (dependent variable).

1- The results of descriptive statistics of the research variables:

Table (4) Averages, Standard Deviations, and Research Sample Responses to Research Dimensions for Each Organization n = 94

figure	Hospital Name	Dimension	Average	Standard deviation	Weighted Average Percentage	Level of importance
1	Hospitals in Bahrain	Human Capital	3.82	0.915	76.4	High
		Structural Capital	3.53	0.752	70.6	Medium
		Relational Capital	3.66	0.822	73.2	High
		Outstanding personality traits	3.71	0.863	74.20	High
		Performance differentiation	3.52	1.198	70.4	Medium
		Total		3.64	0.910	72.8
2	Hospital in Bahrain	Human Capital	3.39	0.802	67.80	Medium
		Structural Capital	3.59	0.756	71.8	High
		Relational Capital	3.85	1.782	77	High
		Distinctive personality traits	3.8	0.706	76	High
		Performance differentiation	3.83	0.896	76.6	High
		Total		3.69	0.868	73.80

Main Imposition:

There is a positive relationship of statistical significance between the development of intellectual capital in its dimensions and the development of strategic competencies for workers in the medical sector in Bahrain, and this main hypothesis is branched from 6 sub-hypotheses that the researcher verified the results of using simple linear regression, so they were as follows:

Table (5) Results of indicators that illustrate the relationship and impact between research variables

Independent variable (intellectual capital)	Dependent variable (strategic competencies)	Correlation coefficient R	Coefficient of determination R ²	Calculated value (F) 0,005	Shades of Freedom DF	Regression coefficient B	Calculated value 0,005 (T)
Intellectual Capital	Human Capital	0.406	0.165	18.196	Regression 1	1.642	4.1
	Structural Capital	0.516	0.267	16.547		1.062	3.497
	Relational Capital	0.558	0.311	13.539		0.866	2.405
	Human Capital	0.606	0.367	53.422	Leftovers 93	2.905	6.003
	Structural Capital	0.684	0.467	39.909		2.099	6.404
	Intellectual Capital	0.755	0.569	39.657		1.322	4.398
Total	X Y	0.587	0.358	30.2	Total 94	1.65	0.334

First sub-hypothesis:

- There is a statistically significant positive relationship between human capital and the distinctive personality traits of medical workers in Bahrain.

- From the previous table, it is clear that there is an effect of human capital on distinctive personal traits, as the results of the statistical analysis showed a statistically significant effect of human capital on distinctive personal traits, as the correlation coefficient reached (0.406) (R) at a significant level of 0.05, while the coefficient of determination R^2 was (0.165) (that is, its value was (0.165) (of the change in distinctive personality traits resulting from the change in human capital, and the value of the degree of influence reached (1.642), which means that the increase by one degree in human capital leads to an impact on the distinctive personality traits by (1.642) (and the significance of this effect confirms the value of F calculated, which amounted to (18.196), which is a function of the level of significance 0.05, and the calculated value of T ((ξ.) which is a function at the level of significance 0.05, and from the above it is clear to us the achievement of the first sub-hypothesis, which states that "there is a positive relationship of statistical significance between human capital and the distinctive personal characteristics of medical workers in Bahrain."".

Second sub-hypothesis:

- There is a statistically significant positive relationship between structural capital and the distinctive personality traits of medical workers in Bahrain..

From the previous table, it is clear that there is an effect of structural capital on the distinctive personal traits, as the results

of the statistical analysis showed a statistically significant effect of structural capital on the distinctive personal traits, as the correlation coefficient was (0.516) R at a significant level of 0.05, while the coefficient of determination R^2 was (0.267), that is, its value was (0.26). (7 of the change in the distinctive personality traits resulting from the change in structural capital, and the value of the degree of influence (1.062) and this means that the increase by one degree in structural capital, leads to the impact on the distinctive personal traits by (1.062) ‘ and confirms the significance of this effect value F calculated, which amounted to (16.547), which is a function of the level of significance 0.05, and the calculated value of T (3.497) which is a function at the level of significance 0.05, and from the above it is clear to us the achievement of the second sub-hypothesis, which states that there is a statistically significant positive relationship between structural capital and the personal characteristics of medical workers in Bahrain.

Third sub-hypothesis:

- There is a statistically significant positive relationship between relational capital and the distinctive personality traits of medical workers in Bahrain.

From the previous table, it is clear that there is an effect of relational capital on the distinctive personality traits, as the results of the statistical analysis showed a statistically significant effect of relational capital on the distinctive personal traits, as

the correlation coefficient reached (0.558) R at a significant level of 0.05, while the determination coefficient R^2 was (0.311), that is, the value of (0.311) of the change in the distinctive personality traits resulting from the change in relational capital, and the value of the degree of influence (0.866), and this means that the increase by one degree in relational capital leads to the impact on the distinctive personality traits by (0.866), and the significance of this effect confirms the value of F calculated, which amounted to (13.539), which is a function of the level of significance 0.05, and the calculated value of T (2.405) which is a function at the level of significance 0.05, and from the above it is clear to us the achievement of the third sub-hypothesis, which states that there is a positive relationship of statistical significance between the relational capital and the distinctive personal characteristics of medical workers in Bahrain.

Fourth sub-hypothesis:

- There is a statistically significant positive relationship between human capital and performance differentiation for medical workers in Bahrain.

From the previous table, it is clear that there is an impact of human capital on performance differentiation, as the results of the statistical analysis showed a statistically significant effect of human capital on performance differentiation, as the correlation coefficient was (0.606) R at a significant level of 0.05, while the coefficient of determination R^2 It reached (0.367), meaning that

its value is (0.367) of the change in performance differentiation resulting from the change in human capital, and the value of the impact degree is (2.905), and this means that the increase by one degree in human capital leads to an impact on performance differentiation by (2.905) (and the significance of this effect confirms the value of F calculated which amounted to (53.422), which is a function at a significant level of 0.05.

The calculated T value was (6.003) (which is a function at a significant level of 0.05, and from the above, it is clear to us that the fourth sub-hypothesis has been achieved, which states that there is a statistically significant positive relationship between human capital and performance differentiation for medical workers in Bahrain."

Fifth sub-hypothesis:

- There is a statistically significant positive relationship between structural capital and performance differentiation for medical workers in Bahrain.

From the previous table, it is clear that there is an effect of structural capital on performance differentiation, as the results of the statistical analysis showed a statistically significant effect of structural capital on performance differentiation, as the correlation coefficient was (0.684) R at a significant level of 0.05, while the determination coefficient R^2 It reached (0.467), meaning that the value of (0.467) of the change in performance differentiation is due to the change in structural capital, and the

value of the degree of influence reached (2.099), and this means that the increase by one degree in structural capital, leads to the impact on performance differentiation by (2.099), and the significance of this effect confirms the value of F The calculated which amounted to (39.909), which is a function of the level of significance 0.05, and the calculated T value reached (6.404) which is a function at the level of significance 0.05, and from the above it is clear to us that the fifth sub-hypothesis is achieved states that there is a statistically significant positive relationship between structural capital and the personal characteristics of medical workers in Bahrain.

Sub-hypothesis VI:

- There is a statistically significant positive relationship between relational capital and performance differentiation for medical workers in Bahrain.

From the previous table, it is clear that there is an effect of relational capital on performance differentiation, as the results of the statistical analysis showed a statistically significant effect of relational capital on performance differentiation, as the correlation coefficient was (0.755) R at a significant level of 0.05, while the determination coefficient R^2 It reached (0.569), meaning that the value of (0.569) of the change in performance differentiation is due to the change in relational capital, and the value of the degree of influence reached (1.3229), and this means that the increase by one degree in the relational capital leads to an impact on the

differentiation of performance by (1.322),) and the significance of this effect confirms the value of F calculated, which amounted to (39.657), which is a function of the level of significance 0.05, and the calculated value of T (4.398), which is a function at the level of significance 0.05, and from the above it is clear to us the achievement of the sixth sub-hypothesis, which states that there is a statistically significant positive relationship between the relational capital and the differentiation of performance for workers in the medical sector in Bahrain.

From the above, it is clear to us that the main hypothesis that:

There is a statistically significant positive relationship between the development of intellectual capital in its dimensions and the development of strategic competencies for medical workers in Bahrain.

Findings and recommendations:

Results:

From the results of the statistical analysis of the field study, it is clear to us that "there is a positive relationship with statistical significance between the development of intellectual capital in its dimensions and the development of strategic competencies for workers in the medical sector in Bahrain for each dimension of the main variable, namely the dimension of human capital, after structural capital, and after relational capital on the dependent variable in its two dimensions. Distinctive personal features and differentiation of performance, and the

degree of impact of human capital increased in the case of the Heart Institute on it in a hospital in Bahrain. In Bahrain about the Heart Institute in organizational and relational capital, and relational capital was the most influential dimension on the dependent variable Strategic competencies after it.

Recommendations:

- Supporting senior management to apply intellectual capital concepts in all hospital departments.
- Spreading the culture of intellectual capital and its concepts among employees.
- Establishing a specialized unit for intellectual capital management within the Human Resources Department that works to attract, recruit and develop employees in accordance with the concepts of strategic competencies .
- Attention and benefit from human capital and the translation of distinctive personal traits for differentiation and success in performing tasks and functions.
- Work on updating and developing information systems, software and computers to enhance the efficiency of employees' performance.
- Continuous investment in human capital through holding effective training programs, contracting with specialized training companies, and sending distinguished people to foreign missions to find out the latest developments in the world in the field of medical or administrative work.

- Work to raise the quality of internal communications and strengthen relations between management and employees and between employees and each other.

-Developing customer service, customer orientation, strengthening ties with him and strengthening relationships on an ongoing basis.

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