Intellectual Capital and Business Performance Management: Knowledge Management and the Value of Knowledge

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Abstract

Human, structural, and relational intellectual capital and its impact on service sector commercial viability in modern corporate competitiveness are the focus of our research. This study uses questionnaires, surveys, and analytical, deductive, and comparative scientific research methodologies to assess intellectual capital's computational and strategic capacities through recruitment, employee development, evaluation, and engagement. A structured 20-question survey with 490 respondents was done in 2021 and 2022. Chi-square tests and Pearson's coefficient validated hypotheses and identified relationships. Despite industry underutilization of intellectual capital, our findings show a crucial but frequently overlooked link between intellectual capital and organisational learning and advancement. The results reveal that many service industry companies are uninformed of intellectual capital's benefits, which could hinder their innovation, adaptation, and growth in changing market conditions. This research shows linkages between training, employee satisfaction, and engagement, urging an organisational shift towards learning to advance society and survive the market. Discover compelling facts and practical consequences that show the need of prioritising and strategically employing intellectual capital to impact organisational trajectories towards sustained economic success.

Keywords: intellectual capital, strategic management, performance management, knowledge management

Introduction

In the current global landscape, operators across various industries and regions encounter a significant obstacle in their pursuit of consistent performance enhancement. Historically, entities have utilized key performance indicators (KPIs) as essential instruments to steer strategic orientation and evaluate the course of progress in their unwavering quest for superiority. Numerous studies have consistently shown that numerical indicators are effective in providing both quantitative and qualitative insights. This allows organizations to systematically assess their performance in relation to predetermined strategic objectives. As the knowledge economy continues to evolve, there has been a notable shift in the way businesses perceive their most critical assets. The notion of intellectual capital has gained substantial traction within contemporary educational institutions, with growing recognition of its status as a crucial asset category. The concept of intellectual capital has become a crucial factor in promoting long-term competitive advantage and facilitating continuous organizational success. This is due to its encompassment of an organization's combined knowledge, expertise, innovative capacity, and relational networks. The integration of intellectual capital and key performance indicators (KPIs) has emerged as a potent combination in modern organizational management. Currently, they are acknowledged as indispensable constituents in the formulation of an enterprise's tactics, their execution, and its assessment of effectiveness. According to Huang, He & Ren (2021), key performance indicators (KPIs) have transcended their conventional roles and have become crucial instruments that furnish organizations with vital, dependable, and significant data. The data serve as a valuable resource for making informed decisions, conducting comprehensive performance evaluations, and formulating precise strategic plans.

The contemporary commercial landscape is distinguished by instability and a dearth of leniency. Proficient management and in-depth comprehension of intellectual capital and key performance indicators can serve as potent instruments in a company's arsenal. The proficient and optimal utilization of said resources has the potential to distinguish enterprises that are merely enduring from those that are prospering, thereby establishing a distinctive stance within their respective sectors.

The management of firm performance can be significantly influenced by intellectual capital, as it facilitates a deeper comprehension of a firm's strengths and weaknesses (Martinidis et al., 2021). The term pertains to the entirety of the non-physical undertakings of an enterprise, encompassing knowledge, expertise, patents, databases, and customer connections (Vo, Tran, 2022). The performance of a firm is influenced by various factors, which in turn contribute to the firm's competitive advantage (Zeidan, 2021). Salehi et al. (2021) assert that enterprise performance management encompasses a range of procedures and tactics aimed at assessing, overseeing, and enhancing the performance of an enterprise. This may encompass the assessment of performance, the establishment of objectives, the formulation and execution of tactics to enhance performance, and the tracking of advancement. The variability of the outcome is contingent upon a multitude of factors, including but not limited to financial resources, human resources, processes, technology, and other relevant factors (Haldorai, Kim

& Garcia, 2022). The achievement of successful enterprise performance management necessitates the contemplation of all the pertinent factors and the efficient synchronization of these factors, as posited by Kusi-Sarpong et al. (2022). Effective management of intellectual capital necessitates the establishment of systems, processes, and a culture that facilitate the dissemination and utilization of knowledge and information within the organization (Faria et al., 2022). Possible academic rewrite: This may encompass various strategies such as establishing communication channels, providing employee training and development, forming innovation teams, and fostering external collaboration. Zhang, Wang (2022) posit that effective management of intellectual capital can facilitate a company's attainment of a competitive edge and sustained success. According to Astuti, Chariri & Rohman (2021), the configuration of intellectual capital is contingent upon the unique characteristics of the organization and the sector in which it operates. According to Jardon, Martinez-Cobas (2021), the term "human capital" pertains to the competencies and expertise possessed by workers, encompassing their educational background, work-related experience, and interpersonal connections. The term "structural capital" primarily pertains to intangible assets such as information, systems, processes, and intellectual property, including patents, trademarks, and know-how. Finally, social capital pertains to the connections established with external stakeholders, including customers, suppliers, and other entities (Puzynya et al., 2022). Mačerinskienė, Survilaitė (2019), along with Xu, Haris & Liu (2022), have deliberated on the concept of intellectual capital, which they have defined as a collection of non-physical assets that an organization possesses, and which have the potential to enhance the growth and prosperity of the organization. The utilization of this approach is frequently observed in business organizations as a means to attain a competitive edge and foster innovation (Dharni, Jameel, 2021). Organizations can benefit significantly from employees who possess a high level of intellectual capital, as they possess the ability to introduce novel concepts, tackle intricate issues, and foster innovation within their respective domains (Radonić, Milosavljević & Knežević, 2021). Organizations that acknowledge the significance of intellectual capital may allocate resources towards the enhancement of their workforce's competencies and expertise through training and development initiatives. This approach can facilitate the cultivation of a culture of innovation and creativity (Pratama, Innayah, 2021). Nkambule et al. (2022) assert that the practical utilization of intellectual capital may encompass the establishment of a center of excellence that concentrates on the exploration and innovation of novel products and services or the deployment of research teams to enhance internal processes and systems. Obeidat, Al-Tamimi & Hajjat (2021), Sheikh (2022), and Kaliyeva, Baisalova & Nathan (2022) have posited that an instance of value provision could be through the utilization of corporate social responsibility (CSR) in the domains of environmental, social, and ethical issues. By implementing this approach, an organization can cultivate a base of dedicated patrons and staff members while enhancing its reputation. Performance management encompasses a series of activities, including but not limited to periodic performance evaluation, retrieval of objectives, planning, monitoring, and compilation of feedback. According to Bayo-Moriones, De la Torre (2022), performance management is crucial for businesses as it facilitates the enhancement of employee and organizational performance. Furthermore, it facilitates the capacity of the organization to

strategize effectively, synchronize its operations, and prioritize critical goals (Huang, He & Ren, 2021). According to Maake, Harmse & Schultz (2021), the outcome of this phenomenon is an increase in efficiency and effectiveness, which can have a favourable effect on the performance of the organization. According to Đonlagić Alibegović, Mešanović (2022), performance management facilitates the establishment of a work environment that encourages employee participation in goal setting and work planning, thereby enhancing employee motivation and work quality. According to Christensen-Salem et al. (2022), the system also assesses the competencies of employees and adjusts their job responsibilities to optimize their contributions to the organization. According to Fuzi et al. (2022), a proficiently structured and executed management process can facilitate an organization's recognition of issues and inadequacies, thereby empowering them to intervene and rectify them promptly. The implementation of this measure has the potential to mitigate expenses related to inaccuracies and erroneous judgments. According to Samimi et al. (2022), strategic management is a multifaceted process that involves the planning, coordination, and execution of an organization's activities and resources with the aim of attaining long-term objectives and strategic priorities. Pasaribu et al. (2021) and Hoglund, Martensson & Thompson (2021) posit that strategic management pertains to decisions that significantly influence the overarching vision and trajectory of the organization. Contemporary perspectives on strategic management prioritize the importance of being adaptable and flexible in response to a dynamic and rapidly evolving business landscape. It is imperative for an organization to possess the capability to effectively address emerging challenges and modify its approach in accordance with evolving circumstances. According to Kulinich et al. (2022), it is imperative that strategic management be viewed as a continuous process rather than a singular plan. According to Tasgit et al. (2023), key performance indicators (KPIs) are quantifiable metrics that enable organizations to track and assess their progress in attaining their objectives. Key performance indicators (KPIs) play a crucial role in strategic management as they enable organizations to gauge their performance and evaluate the efficacy of their strategies. According to Ullah, Mirza & Jamil (2021), individuals play a crucial role in the establishment and maintenance of an organization's intellectual capital. The majority of an organization's intellectual capital is generated by the collective knowledge, expertise, and ingenuity of its workforce. According to Saad (2020), individuals are the custodians of intellectual capital and are accountable for its origination, conservation, and advancement. According to Torre, Tommasetti & Maione (2021), the optimal utilization of an organization's intellectual capital is contingent upon the efficient management and cultivation of its employees' knowledge. It is imperative for an organization to identify the fundamental competencies possessed by its workforce and ensure their effective utilization and dissemination across the organization, as suggested by Afshari, Hadian Nasab (2020). In order to achieve this objective, the organization may employ a range of tools and practices, including but not limited to training, mentoring, information and knowledge sharing among employees, and teamwork (Liao, Hsu & Chiang, 2021). The interdependence between individuals and the intellectual capital of an organization is significant. An organization that can proficiently manage and enhance the knowledge of its workforce is also capable of establishing and preserving its intellectual potential, thereby sustaining its competitive edge

in the market (Buallay, Abuhommous & Kukreja, 2021). The significance of an organization's intellectual capital cannot be overstated in terms of its effective operation and expansion (Sartawi, 2020). The expertise and skills of employees constitute a priceless asset that contributes to an organization's innovation, productivity, and competitiveness (Nazir, Tan & Nazir, 2021). Alrowwad, Aboulaoush & Masa´deh (2020) and Khalique et al. (2014) have posited that knowledge systems can manifest in various forms, including but not limited to databases, information and knowledge sharing systems, expert systems, tools for creating and sharing project documentation, and other similar systems. Baydar, Cetin (2021) and Hatamizadeh et al. (2020) assert that the implementation of such systems can facilitate an organization's utilization of its knowledge and expertise, resulting in enhanced management and decision-making capabilities, superior product and service quality, heightened productivity, and other advantages. According to Wang et al. (2020), the process of capturing an organization's intellectual capital can be achieved through various means, such as the development of know-how catalogues, expert databases, inventories of projects and project deliverables, the establishment of knowledge communities, and other similar approaches. Chatterji, Kiran (2021) have observed that these resources are subsequently utilized for the purpose of developing and revising knowledge systems that organizations employ to acquire and disseminate their knowledge and expertise.

Methods and Data

As a basic method of studying the state of the phenomenon, we chose the method of questionnaires and surveys. In doing so, we used the basic methods of scientific research, namely the methods of analysis, deduction, and comparison. In assessing the truth of the research hypotheses, we relied on the data obtained from the survey questionnaires. We verified the results of our hypotheses using the Chi-square test. We examined the strength of the association using Pearson's coefficient. In the evaluation, we tested the assumed statistically significant relationship between two variables. The structure of the questionnaire consists of 20 questions, and its stylization is based on the theoretical elaboration of selected strategic management practices in terms of intellectual capital, namely recruitment, training, and development of employees, their evaluation and motivation, and employee engagement. Responses were mostly single- or multiple-choice. The questionnaire, as a basic research and diagnostic tool, helped us reach and obtain the opinions of a relatively wide sample of respondents out of a total of 490. The survey was conducted in 2021 and 2022. We sought a regression model that would best describe the sample under study, but through research, we found that such a model had minimal reliability in terms of the companies surveyed in this sample. At the linear regression model level, we looked for a regression model that would best describe the pattern of dependence between the variables. After evaluating the data examined, we concluded that in neither case was the regression model appropriately chosen. For this reason, we chose the chi-square method and examined the relationships between the actual and expected dependencies.

Chi-square Test (Greenwood, Nikulin, 1996):

$$x^2 = \sum \frac{(O-E)^2}{E}$$

Pearson's Correlation Coefficient (Hoben, 2012):

$$r = \frac{n(\sum xy) - (\sum x)(\sum y)}{\sqrt{[n\sum x^2 - (\sum x)^2]\left[n\sum y^2 - (\sum x)^2\right]}}$$

In the present study, the chosen significance level (α) was established at 0.05. If the p-value obtained from the chi-square test is less than 0.05, it would lead to the rejection of the null hypothesis, suggesting a statistically significant disparity between the observed and predicted frequencies. On the other hand, if the p-value is equal to or larger than 0.05, it would be inappropriate to reject the null hypothesis. This implies that there is insufficient evidence to support the existence of a significant difference between the frequencies that were observed and those that were expected.

Research objective

The objective of the study was to examine the utilization of business performance assessment frameworks and associated performance metrics in the context of intellectual and intellectual capital, with the aim of comprehending the necessity of introducing a strategic management system. The present study aimed to investigate the matter of intellectual capital development strategies while considering contemporary management trends. The study proposed novel recommendations that could enhance the management of intellectual property and intellectual capital in enterprises, thereby improving their effectiveness. The objectives established were to assess the adequacy of employee qualifications for their respective job roles, investigate the frequency and nature of employee training, evaluate the employee appraisal process and its purpose, determine the extent of opportunities for employee self-development, and assess the level of employee commitment to their work. Additionally, the satisfaction of entity management with their employees was also examined as part of the research. The present study involved an analysis of the questionnaire's formatting to determine the degree to which the following scientific and research issues were validated: The identified issues include ambiguously defined applicant requirements, inadequate employee selection, unresponsive employee attitudes towards work, unconfirmed availability of training opportunities, apathetic attitudes towards employee training, irregular and unsystematic employee evaluations, limited knowledge of innovative evaluation techniques, inadequate management support for employees, and suboptimal working conditions and expectations.

Research hypotheses

Based on the research objective, the following hypotheses were formulated:

H1: We expect a statistically significant relationship between employee qualifications and recruitment period.

H2: We assume a statistically significant relationship between employee training and manager satisfaction.

H3: We hypothesize a statistically significant relationship between employee self-development and self-education.

H4: We hypothesize a statistically significant relationship between employee satisfaction and employee engagement.

Results

A linear regression model was constructed in an attempt to explain the selected variables, as per the research hypotheses. The coefficient of determination (R-squared) was examined, with emphasis on the estimated error of the model as the significant variable. It is desirable for the estimated error to be minimized. A correlation exists between the assessment of error and the fluctuation of the dependent variable. The fundamental structure of the linear regression model is expressed as follows: the dependent variable, y_i, is a function of the intercept, the coefficient of the independent variable, 1, multiplied by the predictor variable, $x1_i$, and the error term, u_i. The linear regression model for the qualification factor is expressed as qualification = 1.0419 + 0.1166 recruitment per employee + $\hat{u}_i$. The coefficient of determination for the linear relationship between the variable X, representing employee qualifications, and the variable Y, representing the recruitment period, was determined to be 0.0930. This indicates that a mere 9.3% of the variability in the recruitment period can be accounted for by the linear relationship with employee qualifications. This suggests that a linear correlation with variable X only accounts for 9.3% of the variability in recruitment, leaving 90.7% unexplained. Comparable findings were obtained through the observation of the remaining three hypotheses. It can be inferred that the utilization of linear models is not appropriate for conducting analogous analyses. Instead, they are appropriate for conducting trend analysis.

Regarding education, the equation can be expressed as follows: $education_i$ = 1.8782 + 0.0463 satisfaction + $\hat{u}_i$, where $\hat{u}_i$ represents the error term. The R-squared value was 0.0207. The regression model's constant term indicates a 2.7% degree of variation in managers' contentment with their subordinates, which can be accounted for by a linear association with the education factor. The linear relationship between the variables of employees' education and managers' satisfaction with employees' accounts for less than 3% of the variance in the latter variable.

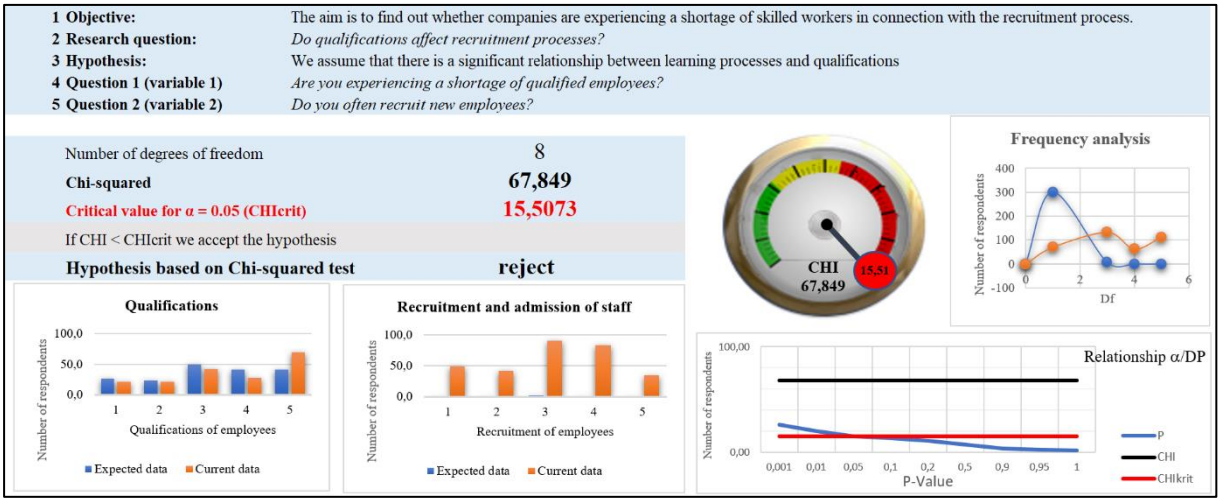
Regarding the assessment of employees based on their level of engagement, the model's formula was expressed as follows: evaluation = 3.7223 - 0.4547 exposures + $\hat{u}_i$. The coefficient of determination ascertained in the regression model was 0.0164, indicating that

only 1.64% of the variance in the employee engagement variable can be accounted for by a linear association with the employee evaluation variable. The model chosen for examining the relationship between employee engagement and the employee evaluation variable is deemed inappropriate, as it fails to account for 98.36% of the variability in employee engagement that cannot be explained by a linear relationship with the said variable.

The hypothesis being tested is H1, which posits that there exists a statistically significant correlation between the qualifications of employees and the duration of the recruitment process. Specifically, H1 proposes that the probability of this correlation being non-zero is significant (H1: $p \neq 0$). The null hypothesis posits that there is no statistically significant correlation between the qualifications of employees and the duration of the recruitment process (H0: $p = 0$).

The following figure presents a synopsis of the hypothesis H1 values, which were utilized to examine the potential impact of employee qualifications on the duration of the recruitment process. The study investigated a bivariate model of recruitment, with (1) denoting a monthly time interval, (2) denoting a quarterly time interval, (3) denoting an annual time interval, (4) denoting another annual time interval, and (5) denoting a recruitment process that is predominantly permanent. In contrast, the rows of the table depict data pertaining to the qualifications of the staff, with category (1) indicating a perceived inadequacy of qualified personnel, category (2) indicating a satisfactory level of qualified personnel, and category (3) indicating a lack of significance attached by respondents to the qualifications of their staff. Figure 1 displays the outcomes of our experimentation.

Figure 1: Dashboard for Hypothesis Testing H1



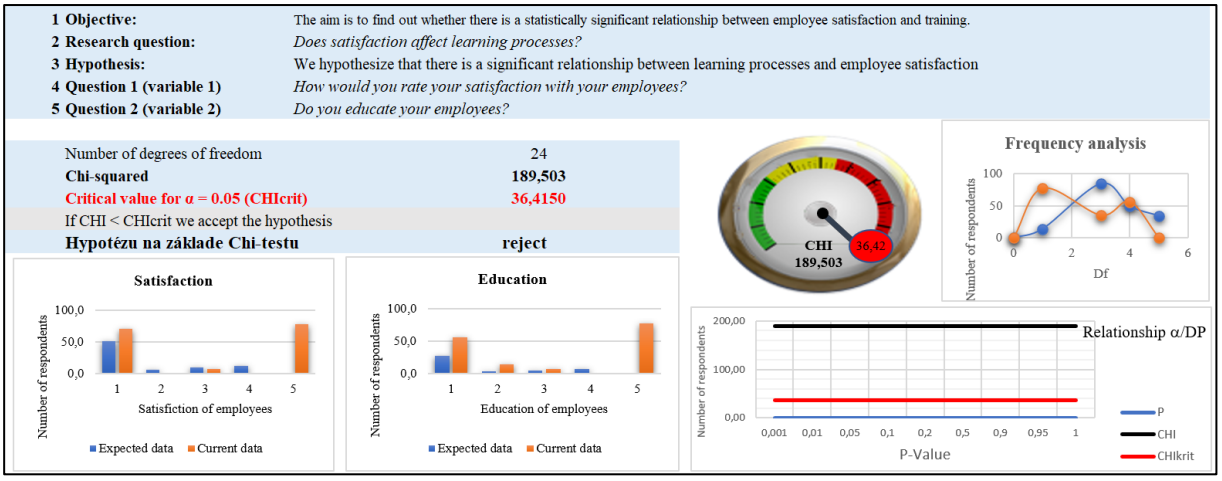
Source: Own.

The findings of Hypothesis 1, which examined the relationship between recruitment and qualifications, indicated a modest correlation (r=0.3), suggesting that the alignment between hiring processes and industry skill development patterns may be inadequate.

The hypothesis being tested is H2, which posits that there exists a statistically significant correlation between employee training and the level of satisfaction experienced by managerial employees. This is in line with the alternative hypothesis H1, which states that

the probability of this correlation being non-zero is high. The null hypothesis posits that there is no statistically significant correlation between the level of education of employees and the degree of satisfaction experienced by managerial employees (H0: p = 0). In relation to employee training, our study analysed the frequency of training sessions based on the following responses: (1) annual training; (2) training based on current trends; (3) no training provided; (4) consideration of training; and (5) lack of importance placed on training. To assess satisfaction levels, our inquiry centred around the following queries: extremely satisfied, satisfied, moderately satisfied, satisfied, neutral, uncertain, dissatisfied, moderately dissatisfied, dissatisfied, and extremely dissatisfied. Figure 2 displays the outcomes of our experimentation.

Figure 2: Dashboard for Hypothesis Testing H2

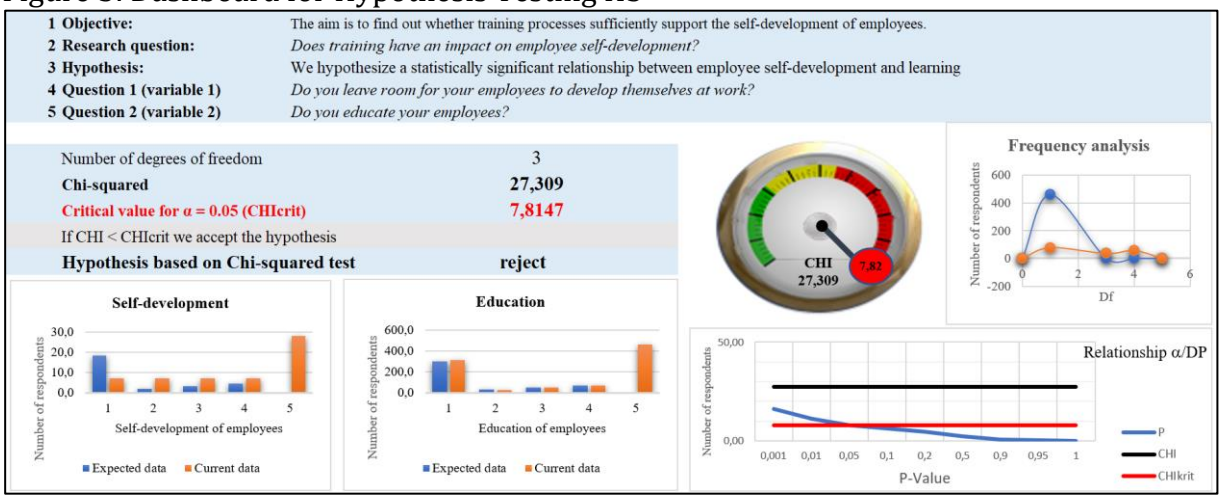


Source: Own.

Hypothesis 2 revealed a weak correlation coefficient (r=0.14) between employee satisfaction and education, suggesting the need for further investigation and strengthening of the relationship between employee contentment and continuous professional growth.

The hypothesis being tested is H3, which posits that there exists a statistically significant correlation between employee self-development and education. Specifically, H1 is being tested, which states that the probability of this correlation being non-zero is not equal to zero. The null hypothesis under consideration pertains to the investigation of employee training. Specifically, we analysed the responses to the frequency of employee training, which were categorized as follows: (1) annual training; (2) training in accordance with current trends; (3) no training; (4) contemplation of training; and (5) lack of importance placed on training. With respect to self-development, our inquiry centred on the following queries: Do we provide opportunities for employees to engage in self-development? Is self-development deemed a significant aspect of our organization? Figure 3 displays the outcomes of our experimental evaluations.

Figure 3: Dashboard for Hypothesis Testing H3

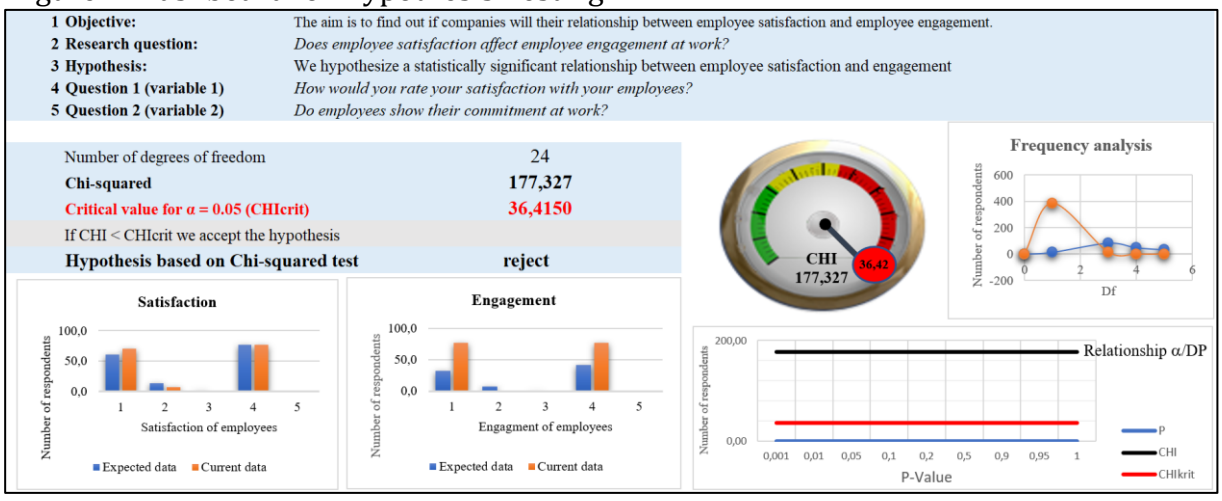


Source: Own.

Hypothesis 3, which examines the effectiveness of self-improvement and training activities, revealed a significantly low correlation coefficient of 0.1. This finding highlights a potential disparity between employees' ambitions for professional growth and the available training possibilities.

The hypothesis being tested is H4, which posits that there exists a statistically significant correlation between employee satisfaction and engagement. This is in line with the initial hypothesis H1, which states that the probability of this correlation being non-zero is high. The null hypothesis under consideration pertains to the issue of satisfaction. Specifically, we analysed the responses received for the following set of questions: very satisfied, somewhat satisfied, moderately satisfied, satisfied, neutral, don't know, dissatisfied, somewhat dissatisfied, somewhat dissatisfied, and very dissatisfied. With regards to engagement, our focus was on the various manifestations of engagement, namely: affirmative manifestation, lack of knowledge, absence of observation, negative manifestation, and non-manifestation. Figure 4 displays the outcomes of our experimentation.

Figure 4: Dashboard for Hypothesis Testing H4



Source: Own.

Hypothesis 4, which examined the relationship between employee engagement and contentment, did not show a significant association (r=−0.16). This finding suggests a disparity in the levels of employee involvement and satisfaction within organisations.
These findings suggest that although intellectual capital is inherently important, its management and integration within organisations, particularly in relation to factors such as recruitment, training, engagement, and employee satisfaction, are not easily understood or firmly established in real-world situations.
By using a comprehensive and well-planned approach to managing intellectual capital, organisations can effectively improve their internal operations and strengthen their external market position. This strategic management approach enables organisations to achieve sustainable growth and enhance their competitiveness in the long term. The cultivation of intellectual capital is not only a strategic decision, but also a necessary requirement inside the modern business environment.

Discussion

Based on the test results, it was determined that the anticipated correlation is absent, leading to the rejection of hypothesis 1. This association lacks substantial relevance in the context of intellectual capital endeavours. Hence, it is imperative to contemplate enhancing the recruitment process by aligning it with the requisite qualifications to cater to the evolving trends in the domain. This pertains to the overall development of the organization as a learning entity that is constantly evolving and expanding its skill set. The Pearson correlation coefficient yielded a value of 0.3, indicating a relatively weak strength of the relationship. The extant body of research indicates that firms operating within the industry sector under investigation ought to devise a comprehensive plan for enhancing their workforce's competencies and organizational expansion with respect to the acquisition of skilled labour (Fuzi et al., 2022). Furthermore, it is imperative that appropriate actions be taken in this regard.
Subsequent analysis revealed that the anticipated correlation was not present, leading to the rejection of Hypothesis 2. Like the initial instance, it was determined that this association lacks statistical significance in the context of intellectual capital management. It is imperative to consider enhancing job performance and the correlation between employee contentment and employee education to align with contemporary developments in this domain, namely the advancement of the proficiency of the entire organization as a learning and growing entity. The Pearson's correlation coefficient revealed a weak relationship between the variables, with a coefficient value of 0.14. The research highlights the importance for companies to establish a comprehensive development strategy and assess the influence of employee satisfaction, which is reinforced by their training program (Hoglund, Martensson & Thompson, 2021).
Hypothesis 3 was deemed not valid based on the obtained results. Like the preceding instances, it has been determined that this association is not particularly noteworthy in the context of intellectual capital management. It is imperative to consider enhancing work performance and fostering a strong correlation between employee self-

improvement and training initiatives to align with emerging trends in this domain (Saad, 2020). This pertains to elevating the skillset of the entire organization as a learning and growth entity. The Pearson correlation coefficient yielded a value of 0.1, which suggests a weak strength of the relationship between the variables. The research findings suggest that it is advisable for companies to establish a development strategy that incorporates employee self-development and aligns it with the learning system. This approach has gained traction in universities, which are increasingly forging connections with practical applications and lifelong learning (Ullah, Mirza & Jamil, 2021).

Like previous instances of analysing test scores, it was determined that the correlation between the variables in question was not statistically significant in the context of intellectual capital. As a result, the fourth hypothesis was deemed invalid. It is imperative to consider enhanced work practices and the correlation between employee engagement and contentment to align with contemporary developments in the realm of learning and organizational advancement. The Pearson's correlation coefficient was utilized to measure the strength of the relationship, and the result obtained was -0.16, indicating a lack of strength in the relationship. At present, engagement stands out as a crucial key performance indicator (KPI) that warrants serious attention from organizations (Tasgit et al., 2023). It is imperative that they devise effective measures to eliminate any obstacles to engagement and establish a stronger connection between employee satisfaction and engagement in their strategic focus and human resources (HR) strategy. Once again, scholarly research indicates that it is advisable for companies to formulate a comprehensive development strategy and endeavour to synchronize employee engagement with their satisfaction levels.

The results of our study highlight the significant importance of intellectual capital in influencing the achievement of organizations. Nevertheless, the lack of expected correlations in the hypotheses indicates an urgent requirement to readjust management tactics. It is apparent that managers and executives must recognize that simply investing in recruitment or training alone would not be sufficient. However, it is imperative to match with the ever-changing trends in the market. For example, prominent technology companies such as Apple prioritize not only the evaluation of qualifications but also the assessment of potential and inventive cognitive abilities when selecting employees. This approach enables the formation of a highly skilled workforce that propels the development of progressive and visionary goods. In a similar vein, corporations such as Google place a high emphasis on the need of fostering both employee satisfaction and engagement, recognizing the interconnectedness of these factors and their consequential influence on overall productivity. For enterprises to achieve a competitive advantage, it is crucial to adopt a comprehensive approach to the management of intellectual capital. This entails effectively overseeing many aspects such as recruiting training, engagement, and satisfaction. It is important to note that these elements should not be treated as mere checkboxes, but rather as strategically linked initiatives that contribute to the overall performance and competitiveness of the firm.

Conclusion

Our study explores the intricate nature of intellectual capital and its significant impact on organisations, with a specific focus on the service industry. The study examined key areas including qualifications, self-improvement, employee satisfaction, and involvement. The findings revealed a significant underutilization and limited exploration of intellectual capital in the industry, which is supported by our empirical evidence and consistent with Sartawi's (2020) research. The endeavour highlighted a significant presence of service industry companies that have not fully utilised their intellectual capital, resulting in limitations on their ability to innovate, adapt, and progress within the dynamic business landscape.

Specifically, our findings reveal a noticeable gap between the acknowledgment and practical involvement with intellectual capital. The interconnected factors of training, engagement, and employee satisfaction are significant drivers that have the potential to transform companies into learning organisations. These organisations not only possess the ability to adapt to the ever-changing corporate environment but also exhibit inventive responses to its dynamic nature. Within this context, there exists a powerful instrument for individuals in managerial and leadership positions: a compelling invitation to shift their focus towards recognising and effectively cultivating intellectual capital. By adopting this approach, individuals create a path that leads not only to mere survival but also to a flourishing state characterised by exceptional innovation, a distinct advantage in competition, and a team that possesses extensive knowledge and drive. Together, these factors cultivate an atmosphere that is conducive to effectively navigating forthcoming obstacles with flexibility and foresight.

Nevertheless, it is important to recognise the challenges encountered in our research, such as the potential limitations in the representativeness of our sample and a significant emphasis on quantitative measures. This focus on quantitative measures may overlook the intricate impacts of organisational culture and informal learning processes. The temporal limitations of the study prevent it from providing a longitudinal perspective on the evolutionary path of intellectual capital inside organisations.

This study provides as an indicator of the importance of intellectually enriched organisational cultures for sustaining and improving commercial success in the current and future corporate environments, with practical implications. This proposal presents a feasible approach for managers and leaders, emphasising the need of strategic involvement with intellectual capital as a central element of organisational strategy. This approach aims to foster a future that is characterised by resilience, adaptability, and inherent innovation.

In order to advance the field, it is recommended that future research expands its scope by including a broader range of participants and employing a more comprehensive approach to thoroughly explore the complex dimensions of intellectual capital. By employing a mixed-method approach that incorporates both quantitative and qualitative methods, and by taking a longitudinal perspective, researchers can gain more comprehensive and nuanced

insights into how intellectual capital is utilised, evolves, and influences the success and growth of organisations in the face of rapidly changing business environments.

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