

ASSESSMENT OF INTELLECTUAL CAPITAL IN THE MODERN ECONOMY: BRIDGING THE GAP BETWEEN THEORY AND WORLD PRACTICE

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Abstract. The purpose of this article is to explore the issues related to the measurement of intellectual capital and to analyze ways to bridge the gap between theoretical foundations and practical applications.

The main task is to systematize existing approaches to assessing intellectual capital, identify their strengths and weaknesses, and identify areas for improving valuation tools for intangible assets in a modern knowledge-based economy.

The research uses methods of comparative and systematic analysis, which allow us to consider intellectual capital as a multidimensional structure that includes human, structural and consumer components.

The results of the study show that, despite the significant theoretical potential of existing models, their practical application is hampered by complex calculations, limited standardization of indicators and the lack of a unified approach to evaluation. The article substantiates the need to integrate quantitative and qualitative measurement methods and adapt models to the conditions of digital business transformation.

The relevance of this study is due to the growing importance of intangible assets for ensuring the competitiveness of an organization, as well as the need to increase the transparency of management and financial reporting. The results of the study can serve as a basis for optimizing strategic management and creating more advanced tools for assessing intellectual capital.

Key words: intellectual capital, business efficiency, enterprise competitiveness, economic value, labor productivity, corporate efficiency, sustainable business development.

Introduction

In contemporary economic landscapes, intellectual capital emerges as a pivotal element in fostering the sustainable growth of organizations, ensuring their competitive edge, and establishing long-term worth. Unlike tangible assets that can be physically measured, intellectual capital encompasses intangible resources such as knowledge, expertise of employees, innovation capacity, organizational processes, databases, corporate culture, and client relationships.

The significance of these assets cannot be overstated, yet their measurement and integration into management and financial practices remain a formidable challenge. The existing theoretical frameworks for assessing intellectual capital often fail to translate into practical applications in global management contexts, resulting in a disjuncture between academic advancements and the actual methodologies employed for evaluating companies' intangible assets.

The significance of this research stems from the fact that, in the era of digitalization and the widespread adoption of innovation, there is an increasing demand for efficient tools to evaluate intellectual capital. Contemporary enterprises strive to accurately assess intangible assets in order to enhance their operational efficiency, enhance their investment appeal, and foster strategic growth.

In reality, many organizations encounter difficulties in implementing existing evaluation methods, as they either lack practicality or fail to account for the unique characteristics of contemporary business practices. Consequently, there is a pressing need to refine approaches to intellectual capital assessment and adapt theoretical frameworks to the demands of real-world scenarios.

This study aims to critically examine existing methodologies for assessing intellectual capital and devise strategies to bridge the theoretical underpinnings with their practical implementation in global business contexts.

In order to accomplish this objective, it is essential to address the following tasks:

1. Explore the fundamental theoretical frameworks and models employed in the evaluation of intellectual capital.

2. Examine the challenges and limitations associated with the practical implementation of these models within organizational management.

The novelty of this research lies in its systematic analysis of contemporary approaches to intellectual capital assessment, as well as in identifying the key obstacles that hinder their effective implementation in managerial practices. Furthermore, the paper emphasizes the necessity of integrating theoretical models with practical instruments for evaluating intangible assets.

The theoretical significance of this research lies in its contribution to the expansion of scholarly understanding of the nature of intellectual capital and the methodologies for its evaluation. Moreover, it contributes to the development of conceptual frameworks for the analysis of an organization's intangible assets. The findings of this study can serve as a foundation for future investigations in the fields of knowledge management, intellectual capital, and strategic planning for companies.

Materials and methods of research

Within the framework of this research, scientific publications of domestic and foreign authors devoted to the problems of formation and measurement of intellectual capital were used. Articles from international scientific journals, analytical reports from international organizations and research data reflecting the practice of applying various models of valuation of intangible assets in modern organizations were also reviewed.

The analysis of these materials allowed us to systematize approaches to determining the structure of intellectual capital and identify the features of their application in world practice.

Two main methods were used in the study: comparative analysis, which made it possible to compare various theoretical models for measuring intellectual capital, and an analysis of the practice of applying these models in the management of organizations. The second research method is system analysis, which considers intellectual capital as a complex system of interrelated elements such as human, structural and client capital. This approach allowed us to pinpoint the key elements that influence the success of measuring and using intellectual capital in organizations. The use of these methods has contributed to a deeper understanding of the discrepancy between the theoretical foundations and their practical application in international business.

Results and its discussion

In the course of our research, which aimed at exploring the concept of intellectual capital and bridging the gap between theory and practice, we employed methods of comparative and systematic analysis. This allowed us to thoroughly examine existing models for assessing intellectual capital and evaluate their practical utility in contemporary organizations.

Utilizing these methods, we were able to delve into the distinctive characteristics of various approaches, discern their strengths and limitations, and identify areas that warrant further investigation in this field.

The initial phase of our research involved a comprehensive comparative analysis designed to evaluate and contrast the most prevalent theoretical frameworks employed in the field of intellectual capital measurement across global academic and managerial domains.

In this analysis, we explored a range of models, including the Skandia Navigator, the Balanced Scorecard, the VAIC (Value Added Intellectual Coefficient), and the Intelligent Assets Monitor, which have gained widespread recognition for their utility in assessing the intangible assets of organizations [1].

The comparative examination of these models revealed their distinctive characteristics, the composition of their indicators, and their practical implementation in organizations across various industries, providing a deeper understanding of their capabilities and limitations.

Table 1. A Comparative Analysis of the Main Intellectual Capital Measurement Models

Model	Main Components	Advantages	Limitations	Practical Application
Skandia Navigator	Human capital, structural capital, customer capital	Comprehensive approach to evaluation	Complexity of implementation	Used in large international companies
Balanced Scorecard	Financial and non-financial indicators	Links strategy with performance indicators	Does not always isolate intellectual capital separately	Widely used in strategic management
VAIC	Indicators of intellectual capital efficiency	Simple calculation method	Limited number of indicators	Used in financial analysis
Intangible Assets Monitor	Growth, renewal and efficiency indicators	Flexibility of indicators	Requires a large amount of data	Applied in innovative companies

The source was compiled by the author

The findings of the comparative analysis revealed that the majority of existing models possess substantial theoretical potential. However, their practical implementation is frequently constrained by the intricate nature of computational methods and a lack of adequate adaptation to the unique requirements of individual organizations [2].

The Skandia Navigator model offers a sophisticated framework for intellectual capital, but it necessitates substantial information assets to be operationalized [3]. The VAIC model is straightforward to implement, but it fails to encompass the full range of intellectual capital, thereby limiting its analytical depth [4].

The second research method was system analysis, which allowed us to consider intellectual capital as a complex system of interrelated elements. Within the framework of this approach, intellectual capital was divided into three main components: human capital, structural capital and client (or relational) capital, which together form the intangible value of the organization [5].

The system analysis allowed us to determine the interrelationships between these components and identify the factors influencing the effectiveness of their use.

Table 2. The structure of intellectual capital and the results of system analysis

Intellectual Capital Component	Main Elements	Impact on the Organization	Example Indicators
Human Capital	Knowledge, skills, experience of employees	Innovation potential and productivity	Level of education, employee training
Structural Capital	Databases, technologies, organizational processes	Management efficiency and organizational stability	Patents, information systems
Customer (Relational) Capital	Customer relationships, brand, partnerships	Market position and competitiveness	Customer satisfaction level

The source was compiled by the author

The results of the system analysis indicate that effective measurement of intellectual capital is possible only if all its components and their interrelationships are comprehensively taken into account [6].

For example, a high level of human capital does not always lead to an increase in company efficiency unless an appropriate organizational infrastructure is created. In this case, the knowledge of employees should be supported by effective management and technological processes [7].

Strong customer capital requires constant updating of knowledge and the introduction of

innovative solutions to maintain competitiveness in the market [8].

The research also demonstrated that contemporary enterprises are increasingly implementing integrated approaches to assessing intellectual capital by combining financial and non-monetary metrics. This strategy allows for a more precise representation of the true value of intangible assets and takes into account their influence on a company's long-term development [9].

A critical analysis of the findings of the research suggests that the problem of the disparity between theoretical frameworks for evaluating intellectual capital and their practical application persists. Among the key factors contributing to this divergence are the intricate nature of current models, the absence of standardized metrics, and limited access to pertinent data.

The advancement of digital technologies, knowledge management systems, and analytical instruments presents novel avenues for a more accurate assessment of organizational intellectual capital [10].

The findings of the investigation suggest that future research in this field will focus on creating more adaptable and universal frameworks for assessing intellectual capital, balancing scientific rigor with practical utility.

In the coming years, it is feasible to develop integrated digital platforms that can automatically analyze data on an organization's knowledge, innovation, and intangible assets. Such systems could serve as a valuable tool for strategic decision-making and enhancing a company's competitiveness in the knowledge-based economy.

Conclusion

This paper seeks to examine the issue of assessing intellectual capital and the gap between theoretical frameworks and their practical implementation in global management.

The study examines major models for assessing intellectual capital, conducts a comparative and systematic analysis of these models, identifies their strengths and weaknesses, and argues for the need to improve tools for measuring intangible assets in today's knowledge-based economy.

It demonstrates that intellectual capital is crucial for organizational success, but its assessment remains a methodological challenge that requires further development of scientific methodologies and practical solutions.

The significance of this paper lies in its contribution to the theoretical understanding of intellectual capital as a complex system comprising human, structural, and client components. The paper systematically reviews existing academic approaches and assists in determining their practical applicability, laying the groundwork for the development of more effective methods for evaluating intangible assets.

The practical significance of the study derives from its potential to be applied in improving strategic decision-making, enhancing organizational transparency, and increasing investment attractiveness. The paper can be useful to managers, analysts, and researchers involved in knowledge management and innovation.

Given the ongoing digital transformation, advances in artificial intelligence, generation of vast volumes of data, and intensified global competition, the future of this field holds great potential. Intellectual capital is becoming increasingly important due to these factors.

In the future, there will be an opportunity to develop increasingly comprehensive and digitalized models for measuring intellectual capital, incorporating these metrics into financial statements and establishing international standards for their evaluation. This will help bridge the gap between theoretical concepts and practical application, providing a more accurate reflection of the true worth of organizations operating within the knowledge-based economy.

This article not only holds theoretical significance but also has practical implications. It contributes to advancing scholarly research on intellectual capital and lays the groundwork for further refining methods for measuring and integrating it into global management practices.

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ҚАЗІРГІ ЭКОНОМИКАДАҒЫ ЗИЯТКЕРЛІК КАПИТАЛДЫ БАҒАЛАУ: ТЕОРИЯ МЕН ӘЛЕМДІК ТӘЖІРИБЕ АРАСЫНДАҒЫ АЛШАҚТЫҚТЫ ЖОЮ

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Аңдатпа. Бұл мақаланың мақсаты зияткерлік капиталды өлшеуге байланысты мәселелерді зерттеу және теориялық негіздер мен практикалық қолдану арасындағы алшақтықты жою жолдарын талдау болып табылады.

Негізгі міндет-зияткерлік капиталды бағалаудың қолданыстағы тәсілдерін жүйелеу, олардың күшті және әлсіз жақтарын анықтау, сондай-ақ білім негізінде жұмыс істейтін қазіргі экономикадағы материалдық емес активтерді бағалау құралдарын жақсарту бағыттарын анықтау.

Зерттеу интеллектуалды капиталды адам, құрылымдық және тұтынушылық компоненттерді қамтитын көп қырлы құрылым ретінде қарастыруға мүмкіндік беретін салыстырмалы және жүйелік талдау әдістерін қолданады.

Зерттеу нәтижелері қолданыстағы модельдердің айтарлықтай теориялық әлеуетіне қарамастан, яғни оларды практикалық қолдану күрделі есептеулермен, индикаторларды стандарттаумен шектелген және бағалаудың бірыңғай тәсілінің болмауымен қиындағанын көрсетеді. Мақалада сандық және сапалық өлшеу әдістерін біріктіру және модельдерді бизнестің цифрлық трансформация жағдайларына бейімдеу қажеттілігі негізделеді.

Бұл зерттеудің өзектілігі ұйымның бәсекеге қабілеттілігін қамтамасыз ету үшін материалдық емес активтердің маңыздылығының артуына, сондай-ақ басқару мен қаржылық есептіліктің ашықтығын арттыру қажеттілігіне байланысты. Зерттеу нәтижелері стратегиялық басқаруды оңтайландыруға және зияткерлік капиталды бағалаудың жетілдірілген құралдарын құруға негіз бола алады.

Түйін сөздер: зияткерлік капитал, бизнес тиімділігі, кәсіпорынның бәсекеге қабілеттілігі, экономикалық құны, еңбек өнімділігі, корпоративтік тиімділік, бизнестің тұрақты дамуы.

ОЦЕНКА ИНТЕЛЛЕКТУАЛЬНОГО КАПИТАЛА В СОВРЕМЕННОЙ ЭКОНОМИКЕ: ПРЕОДОЛЕНИЕ РАЗРЫВА МЕЖДУ ТЕОРИЕЙ И МИРОВОЙ ПРАКТИКОЙ

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Аннотация. Цель данной статьи заключается в исследовании проблематики, связанной с измерением интеллектуального капитала, и в анализе путей преодоления разрыва между теоретическими основами и практическими применениями.

Основная задача заключается в систематизации существующих подходов к оценке интеллектуального капитала, выявлении их сильных и слабых сторон, а также в определении областей для улучшения инструментов оценки нематериальных активов в современной экономике, функционирующей на основе знаний.

В исследовании применяются методы сравнительного и системного анализа, которые позволяют рассматривать интеллектуальный капитал как многоаспектную структуру, включающую в себя человеческий, структурный и потребительский компоненты.

Результаты исследования показывают, что, несмотря на значительный теоретический потенциал существующих моделей, их практическое применение затруднено сложными расчётами, ограниченной стандартизацией показателей и отсутствием единого подхода к оценке. В статье обосновывается необходимость интеграции количественных и качественных методов измерения и адаптации моделей к условиям цифровой трансформации бизнеса.

Актуальность данного исследования обусловлена растущей важностью нематериальных активов для обеспечения конкурентоспособности организации, а также необходимостью повышения прозрачности управления и финансовой отчётности. Результаты исследования могут послужить основой для оптимизации стратегического управления и создания более совершенных инструментов оценки интеллектуального капитала.

Ключевые слова: интеллектуальный капитал, бизнес-эффективность, конкурентоспособность предприятия, экономическая стоимость, производительность труда, корпоративная эффективность, устойчивое развитие бизнеса.