International Journal of Computer Information Systems and Industrial Management Applications
ISSN 2150-7988 Volume 18(21s) 2026 pp. 953-967
https://doi.org/10.70917/ijcisim-2026-5370
Article

Digital Transformation and Workforce Adaptability: A Strategic Alignment of Finance, HR, and Marketing

Dr. Sonali Prasad Dharmadhikari[1], S. Tulasi Ram[2], Dr. Shwetha K. R.[3], Dr. T. Mohanapriya[4], Dr. Champa Sharma[5], Manju Singh[6]

[1] Associate Professor, Department of Management, Bharati Vidyapeeth (Deemed to be University) Institute of Management and Entrepreneurship Development, Pune, Maharashtra, India.
Email: sonali.dharmadhikari@bharatividyapeeth.edu
[2] Assistant Professor, School of Management Studies, Chaitanya Bharathi Institute of Technology, Hyderabad, Telangana, India.
[3] Assistant Professor, Department of Commerce, Christ Academy Institute for Advanced Studies, Hullahalli, Begur-Koppa Road, Bengaluru, Karnataka, India.
[4] Associate Professor, Department of Management Studies (MBA), Velalar College of Engineering and Technology, Maruthi Nagar, Thindal, Erode, Tamil Nadu, India.
[5] Assistant Professor, School of Management, Bahra University, Solan, Himachal Pradesh, India.
[6] Research Scholar, Department of Commerce, DAV (PG) College.

Abstract: For companies to compete in a tech-driven business landscape, digital transformation is a major strategic initiative they need to take on. The application of AI, cloud computing, data analytics, automation, digital platforms and other innovative technologies is driving change in business processes, and also in the nature of work, skills and expectations of workers. The study explores how digital transformation influences an organisation's adaptability of its workforce through the lens of strategic alignment among its functions of finance, human resources and marketing. The study delves into how these three functions can work together to respond to technological change, instead of digital transformation as an isolated technological initiative. Finance adds value by allocating resources based on data; by the use of digital financial systems; by investment decisions; HR contributes by reskilling the workforce; supporting employee engagement; developing talent; and by supporting change readiness; and marketing adds value by providing customer intelligence; digital engagement; and market responsiveness. The study considers a characteristics of the organization to be adaptability of the labour force, which includes technological competence, an orientation towards learning, flexibility and openness to new working practices. It also looks at the relationship between the financial priorities, human capabilities, and the market needs, and how cooperation across functions can connect the three. We can expect to see the results highlight the need to accept technology and to create a flexible workforce, as well as to integrate good practices into digital transformation. The study centers on the following themes: the need for ongoing learning, interactive decision making, data-based decision making, and employee-focused change practices. It discovers that greater organizational resilience, strategic agility and sustainable value creation in digitally transforming business models can be achieved when finance, HR and marketing are more aligned.
Keywords: Digital Transformation, Workforce Adaptability, Human Resource Management, Finance, Marketing, Artificial Intelligence, Digital Skills, Strategic Alignment

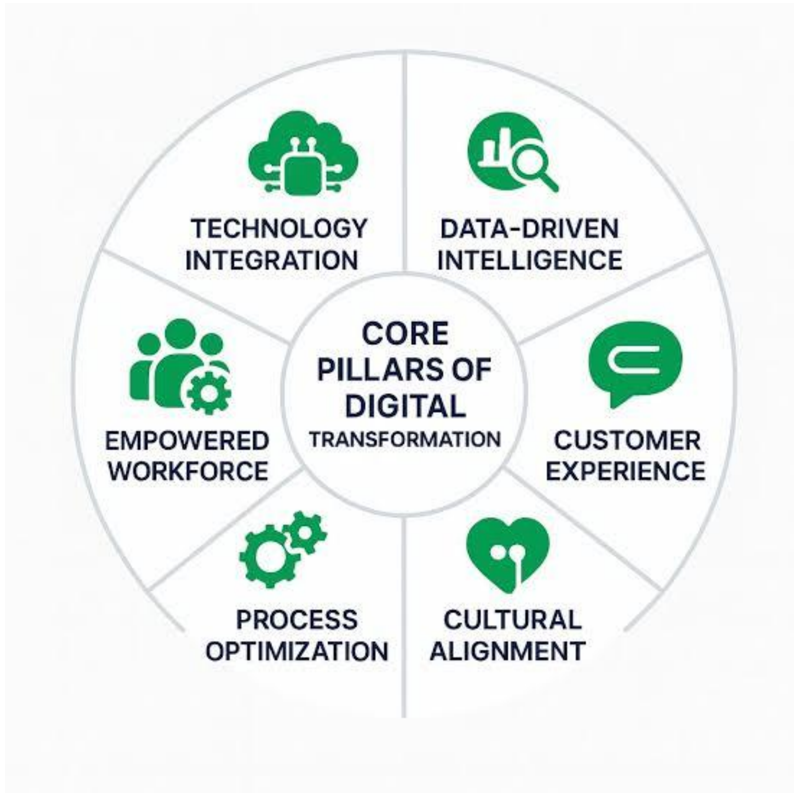
1. Introduction

Digital transformation has become a key driver of the transformation of the structure, processes and competitive approach of modern organisations. With an explosion of AI, cloud, big data analytics, automation, digital platforms and communication technologies, organizations create value and interact with employees, customers and stakeholders in a different way today. Digital transformation isn't a technology project or a technology tool, it's an organisational capability change, decision-making change, business model change and work practice change. Within the competitive business environment, organizations must not only keep up with technology, but make money, build agile workers and provide targeted value to their customers.

The key to the success of a digital transformation is to match the technology and human and functional capabilities. In this context 3 main functions can affect the effectiveness of the digital initiatives, namely: Finance, Human Resources (HR) and Marketing. They provide businesses with the financial tools and analysis that is needed to make technology investments, and to measure the financial ramifications of transforming, and help guide decisions based on information. HR is on the leading edge of training, reskilling and recruitment for changes in technology, managing performance, and change management. In contrast, marketing uses digital technologies and customer information to better understand changing customer needs, strengthen engagement, customize the way messages are delivered, and develop new marketing strategies to add market value. When they operate independently, businesses may experience different results from their digital efforts, have inefficient use of resources, employee resistance, and consistency issues.

Since then, adapting the workforce has emerged as one of the most crucial elements in the successful implementation of digital transformation. As technology advances, jobs change, skills evolve, working methods and ways of working together are modified. Their digital skills are increasingly relevant to the duties they must perform, as are the ability to operate with automated systems, be able to understand and process data and adapt to the evolution of the ever-changing work requirements. Skills are not the only aspect of workforce adaptability, and employees' capacity to learn, accept change, solve problems, withstand stress, and collaborate in technology-enabled teams are important as well. Companies that commit to ongoing education and employee growth will be better positioned to manage technology's disruption and minimize skill obsolescence and change resistance issues.

The symbiosis between finance, HR, and marketing is especially significant when it comes to building an integrated digital transformation strategy. Financial decisions dictate what resources are available for digital initiatives and HR decisions dictate the sustainability of those resources (as they are required to ensure the organisation has the talent and organisational capacity to implement the digital initiatives). Marketing can provide market information and customer insights to guide technology investments and work force needs. Combined use of these functions, thus, can create a strategic feedback mechanism which enhances the use of financial intelligence, workforce capabilities and market information. For example, customer analysis could give rise to new preferences, HR analysis to new competency needs, and Finance could analyse the investment required to develop the required skills. This coordination can enable an organization to transition from technology adoption to digital transformation.



Source: https://premiernx.com/what-is-digital-transformation/

Meanwhile, digital transformation poses problems beyond those that can be solved by investing in technology. Automation can transform job roles and data-based decision-making can pose privacy, transparency, surveillance and fairness issues. Staff may also be unsure if their current working practices are replaced by automated working practices or digitally mediated working practices. Therefore, there is a need to strike a trade-off between efficiency and innovation, and employee development, ethical responsibility, organizational trust and sustainable performance. Completely human-centred approach is especially significant in the digital transformation because the value of technology lies in the organization only when its employees can understand, embrace and effectively use it.

By aligning the approach, Finance, HR and Marketing can help to resolve these issues. But digital transformation is not just a single information technology initiative; it is a strategic process that includes financial planning, employee training, customer focus, and organizational “learning”. This alignment can assist with uniformity of digital investments, prepared workforce, and more responsive marketing strategies. It can also help develop organizational skills that will enable the companies to adapt to the ever-evolving technologies and market conditions.

In this context, the present study aims at understanding digital transformation and adaptability of the workforce, based on strategic alignment of the Finance function, HR function and Marketing function. The objective of the study is to understand the interdependencies of these functional areas in relation to facilitating adaption in the organisation, the impact of digital transformation on the skill sets of the workforce in the organisation and the importance of cross functional alignment in supporting the effectiveness of the organisation. Combining financial, human-resource and market views, the study offers a more holistic view of digital transformation as an organizational and strategic transition process rather than just a technological change. The findings will also contribute to the discussion on workforce readiness, cross-functional collaboration, strategic resource deployment and sustainable digital transformation in the contemporary organizations.

2. Background of the study

Digital transformation is one of the major influences on how organisations work, how they compete and how they create value. With the advent of AI, cloud, big data analytics, automation, digital platforms and sophisticated communications, traditional business management methods have come to an end. It's not only a matter of new software or automating certain tasks. More and more it's about the entire restructuring of organizational processes, decision-making, customer relationships, working patterns and business models. Digitalisation is becoming more and more part of the organisations, but the ability to coordinate technological investments with human capabilities and market requirements is a significant aspect of sustainable organisational performance.

With changing business functions, interdependence among finance, human resource management and marketing is also increasing. Finance departments are increasingly seeing digital tools in use for real-time reporting, predictive analysis, financial planning and risk assessment and resource allocation. HR teams are increasingly adopting HR analytics, digital recruitment systems, AI, employee-management solutions and technology-enhanced learning to improve employee decision making. At the same time, marketing has become far more data-driven, in many aspects: customer analytics, digital communication platforms, social media intelligence, marketing automation and customer personalisation. These functions, in a traditional sense, had their own set of responsibilities, but in the digital context, strategic alignment between these functions is needed.

Finance plays a critical and important role in digital transformation and digital initiatives can be big investments that need to be monitored and evaluated constantly. Digital projects need to be evaluated from a cost, return on investment, efficient operation, risk and benefit to organisational goals perspective. Digital systems can also produce data that will help with financial forecasting and resource allocation that is more responsive. This is leading to finance reporting and control being delegated and to a more analytical and strategic role in technologically driven organisations.

Human resource management is also important because it is the nature of work that it influences, and that's what the technological change is changing. Automation reduces the need for some basic occupations, and it increases the need for analytical, technological, interpersonal and problem-solving occupations. This can require ongoing training and reskilling for workers to be able to function in new work settings. The employees' psychological readiness, zeal for learning, readiness to change in the organization, collaboration with digital technologies and skills are some of the factors that affect the adaptability of the employees in the workforce. HR teams then play a crucial role in creating talent strategies that allow them to adapt to the changing needs of their organisation.

Marketing has also changed dramatically because of the increasing use of digital channels and data on customers. Customers are now communicating with businesses through websites, mobile applications, social media, digital marketplaces and other technology-enabled communication channels. These trends have made it more critical than ever to gain real-time understanding of the customer, communicate with him/her, manage their digital brand and make decisions based on data. Marketing teams need to hire staff that is able to analyze data, know what new technological possibilities are available, can adapt to consumer changes and can work well with other departments within the organisation.

Finance, HR and marketing overlap, and create chances for a more holistic digital transformation. Financial data can help identify what technology investments should be made and where resources can be allocated, HR data can show you how your workforce is capable and ready, and marketing data can show you what your customers are looking for and what your competitors are up to. By taking all of these sources of information into account, organisations could be placed in a better position to match technological investments with the skills and opportunities of their workforce. This alignment can help minimize functional silos and aid in more effective strategic decision making.

But the challenges of digital transformation are great. The advent of technology can lead to that uncertainty in people, and resistance to technology in organisations. Lack of digital skills can have a negative impact on the ROI of technology investments, and over-reliance on automation can lead to concerns of job security, employee autonomy, data privacy, and organisation trust. Similarly, if a digital project is not thought out in terms of employees' abilities and qualifications, and customers' expectations, it will not yield the desired outcome. The above challenges are all indicators of the importance of organisational readiness and the need to engage the financial, human and market dimension of the organisation in a successful digital transformation.

Flexibility of the workforce is therefore a key element in organisational change. Flexible workforces will have greater potential to learn new skills, adapt to restructured workflow, work with technology, and meet evolving business needs. However, organisational adaptability is reliant on the wider systems that are used to recruit, train, evaluate, reward and support employees. HR builds skills and capabilities of the workforce, Finance determines what resources are available and prioritised, and Marketing messages evolves the needs of the market. The interplay between these functions can then impact an organisation's ability to deal with digital disruption.

Building on all these, the present study seeks to explore the relationship between digital transformation and workforce adaptability as discussed in the concept of strategic fit between finance, HRM and marketing. The study does not focus only on the technology aspect of digital transformation, but rather on digital transformation as an organisational process that needs to be coordinated and coordinated between financial priorities, the capabilities of employees and customers-focused strategies. This correlation is particularly applicable to organisations that want to be digitally competitive, but also have a flexible, competent and motivated workforce. Overall, the study provides a multi-disciplinary perspective on how organisations can successfully link their human, financial and marketing resources in order to create a more resilient and digitally responsive organisation.

Justification

Digital transformation has been mentioned countless times in the past few years and for a good reason – it is now a top priority for businesses to remain competitive in a technology-driven business landscape. Organizations are undergoing transformation as AI, automation, cloud, digital platforms, data analytics and information systems integration are transforming the management of financial resources, training and nurturing of staff and customer interactions. Jobs, skills required, organizational structures and decision-making processes, too, have changed. Digital transformation is not just a technical challenge and for a coordinated and strategic management, it needs to be addressed in Finance, Human Resource Management (HR) and Marketing.

Digital technologies are becoming increasingly important to support the Finance function in financial planning and forecasting, risk assessment, performance monitoring and data-driven decision making. Meanwhile, HR teams need to make sure that workers have the abilities and flexibility they need to collaborate with new technology. The ability of its workforce to adapt is therefore an important organizational capability when it comes to the adoption of new digital tools, the willingness to embrace new working methods and the ability to work alongside intelligent systems. For its part, marketing is undergoing a major transformation with customer engagement, social media, marketing analytics, personalization, automation and AI-driven customer insights.

Yet all this has been studied independently for the three functions. This top-down strategy will not take into account the interdependencies between financial investment in digital technologies, skills of the workforce and market-oriented outcomes. Investment in technology can result in benefits for the organisation that do not materialise until employees are prepared to use the technology to its maximum potential and HR investment can have little strategic value without delivering clear business benefits or meeting customer changing needs. Likewise, marketing innovation also depends on the proper usage of technology and people who are able to understand and utilize digital inputs.

The study is thus warranted, as the digital transformation and adaptability of the workforce are both perceived as strategic challenges that require a whole-of-organisation approach, and not just organisational activity. By aligning the three departments, Finance, HR and Marketing, a business can become more aware of how it could leverage its finances, workforce and market strategy to undertake a successful digital transformation.

The relevance of the research is also related as adaptability of the workforce is not limited to the technical aspect. They need to accept change, be digital confident, embrace learning, be problem solvers and work across functional lines. If these dimensions are not tackled, organizations can face resistance to technology changes, skill deficits, lower productivity and challenges in realizing the expected results of digital transformation.

Furthermore, the analysis of this research is very useful for organizations in the lively and competitive business world. The findings can support managers on the way to integrated investments in technology, training of employees, digital marketing strategies and can contribute to better cooperation between the Finance, HR and Marketing departments. It can enable organisations to become agile, productive, responsive to customers and competitive.

The current study is therefore carried out to find the strategic and multi-disciplinary view on the effect digital transformation has on the adaptability of the workforce and the possibilities to maximise the value of digital transformation within the organisation by aligning Finance, HR and Marketing.

Objectives of the Study

1. To analyze how digital transformation impacts the processes and practices of organizations in their financial, human resources and marketing functions.
2. To evaluate how digital technologies affect the adaptability of the workforce, including their ability to adjust to evolving technologies, processes and organizational needs.
3. To examine how finance, HR and marketing work together to support business-wide digital transformation efforts.
4. To explore how digital transformation affects financial decision-making, resource allocation, cost management and efficiency of operations.
5. To assess the contribution of HR practices to a digitally capable workforce, focusing on digital skills, employee training, reskilling and lifelong learning.

3. Literature Review

Digital transformation has evolved from the use of single digital technologies to a process of change in business model, organization, system functions, working practices and relations with stakeholders. Digital transformation is a process, in which digital technologies bring about essential changes to the organizational properties and value-creation processes, according to Vial (2019). Similarly, Nadkarni and Prügl (2021) in their systematic review emphasized the need to have organizational actors and their ability to adapt in addition to technological resources for success in transformation. According to their research, digital transformation is now less about technology and more about creating flexibility in the organization and adapting to changing technology and market situations.

Digital Transformation and Organizational Adaptability

The link between digital transformation and change adaptability in organization has been in the focus of management studies. Hanelt et al. (2021) gathered 279 articles and determined digital transformation to be associated with an organization's design getting more flexible and adaptable. They also noted that instead of taking place in the confines of an organization, transformation more likely occurs in an interwoven digital ecosystem. The perspective taken here is that the investment in technology should be matched with changes in the way organisations operate, their management and the skills required of their members.

Verhoef et al. (2021) distinguished between the previous generation of digitization and digitalization and digital transformation, and emphasized the effect of digital transformation on organizational structures, business models and performance. They found that digital transformation is a process that entails coordinating several capabilities and not just new technologies. Specifically, finance, HR and marketing operations need to be aware of the potential impact that a technology investment could have on making decisions, the capacity of people, customer relationships and the resource allocation of other functions.

A more in-depth analysis by Calderon-Monge and Ribeiro-Soriano (2024) focused on management, marketing, finance and accounting. Their findings show the concurrent role digital technologies are playing in consumer behaviour analysis, organizational innovation, the financial services and managerial decision making. This cross functional approach backs the case for considering digital transformation as an organisational phenomenon as opposed to as distinct technological projects in each department.

Workforce Adaptability in the Digital Era

One of the crucial human factors of digital transformation is adaptability of the workforce. Staff need to acquire new digital skills, flex their current working practices and engage with technology and changing expectations of the organisation. Bresciani et al. (2021) highlighted the significance of organizational skills and employees' engagement when it comes to digital technologies and creating organizational benefits. But digital transformation isn't limited to the investment in technology, it's also about a constant learning and training process for the workforce.

Digital transformation should support organizations to evolve their dynamic capabilities to face technological and environmental change in particular, as said by Ghezzi and Cavallo (2020). In terms of workforce, this means that workers need to be enabled to be reskilled, upskilled, share knowledge and practice flexible work.

Alavi et al. (2024) recently have performed a systematic review of the literature on digital transformation and workforce agility in particular. One major finding of the review is that the attitudes, abilities and behaviours of employees are key to how well organisations embrace digital technologies. Workforce agility is therefore an important thread that weaves its way between technology adoption and effective organizational change.

Digital Transformation and Human Resource Management

HRM is an important part of the preparations for digital transformation of employees and the organization. Digital HR tools enable data-driven hiring, talent management, performance monitoring, talent forecasting and analytics. Bondarouk and Brewster (2016) argued technological changes are changing the face of HRM, while HR professionals can now make strategic contributions to organisational change.

As HR Analytics becomes more prominent in Evidence Based HR Decision Making (Marler & Boudreau, 2017), the tool is expected to become a key component of HR Strategy.HR Analytics is rising in significance in Evidence Based HR Decision Making (Marler & Boudreau, 2017) and is expected to play a crucial role in HR Strategy. The research suggests that patterns can be found in workforce data, workforce outcomes can be forecasted and that organisations can use workforce data to guide strategic decision making. Hence, HR is now moving towards a more analytical and strategic role, becoming a digital transformation partner.

Also, Boon et al (2019) has emphasized that strategic alliance between HR and organizational is also one of the roles of HRM and they have illustrated the relationship between HRM and organizational performance by strategic alignment and illustrate the connection between strategic HRM and organization goals. This alignment has to be embodied in HR strategies focusing on digital skills, adaptability of employees, technology acceptance, learning, leadership and organizational culture in a digitalizing organization.

A more recent systematic review of the digital HRM also indicates that digital technologies are affecting HR processes through automation, talent management with the support of artificial intelligence, data-based decision making and digitally enhanced employee experiences. An organizational agility is also emphasized as one of the benefits of digital HR transformation and review for productivity.

Digital Transformation and Finance

Finance has emerged as a key catalyst and enabler of the digital transformation. The financial planning, accounting and reporting, risk management, investment analysis and decision-making are undergoing a transformation with the help of digital technologies. Bhimani and Bromwich (2019) observed that the information landscape in management accounting is changing with the advent of digital technologies, and the latter is expanding its role within the strategic decision-making process.

Moll and Yigitbasioglu (2019) discussed how the increased presence of cloud computing in accounting and finance, along with the presence of big data, blockchain, and artificial intelligence, affected the accounting and finance industry. Digital technologies can enhance how information is made available, how information is analysed and how decisions are made within an organization, they argue, but can also raise new demands for organizational skills.

In terms of corporate finance, new studies indicate that digital transformation can also impact the investment decisions, financing designs, and firm value. Based on this systematic research, three big strands of the corporate-finance literature can be identified: measurement of digital transformation, but also internal and external factors that drive digital transformation as well as the economic consequences.

As seen above, when it comes to digital transformation and HR/marketing, finance can't go its own way. Employing workforce analytics, customer information, digital marketing success, investing in technology and cross-functional information systems are becoming part of the financial equation.

Digital Transformation and Marketing

Digital transformation has revolutionized marketing by providing greater capacity for organisations to gather, analyse and leverage customer data. Lemon and Verhoef (2016) highlighted the need for a multi-touchpoint approach to the customer journey and the use of digital technologies to connect customers' experiences across the physical and online worlds.

Kannan and Li (2017) suggested a digital marketing model that emphasizes the importance of data, analytics, digital channels, customer engagement and technology-based value creation. Their research suggests that marketing has become more data-driven, and that the marketing function is becoming more closely coordinated with an information systems, finance and analytics function.

In addition, Wedel and Kannan (2016) proved the relevance of marketing analytics in big-data days. Organisations can leverage customer and market data to enhance targeting, personalisation, pricing, customer acquisition and retention. But these qualities must be paired with suitable analytical and technological skills in employees, solidifying the connection between marketing transformation and the ability to adapt employees.

Research on digital transformation has grown in tremendous pace recently, but much information has been published on a functional basis, thus writing it in isolation. This is an important research opportunity to explore the strategic fit of the finance, HR and marketing aspects as interdependent aspects of organization change.

Reich and Benbasat (2000) defined strategic alignment as the link between business strategy and information technology strategy, and since then, strategic alignment has been broadened to strategic resources and strategic capabilities. Alignment should not be viewed as a matching of IT and business strategies, but as a multidimensional phenomenon, as Chan and Reich (2007) pointed out.

In an HR context, Marler and Boudreau (2017) provide a model for how HR analytics can be used to link workforce data to strategic decision-making. Kannan and Li (2017) illustrate how digital technologies transform customer engagement and value creation from a marketing point of view. If it's about finance, digitalization is helping more and more with real-time analysis, forecasting, risk management, and resource allocation. The two points above indicate that there is potential to create more value from digital transformation when functions in an organization share information, capabilities and goals.

Very recently, a systematic review that focused on HRM and marketing integration in the digital business era identified four facilitators that are relevant to the study: digital readiness, CRM systems, AI and cloud-based platforms. They also found that organizational agility, customer satisfaction, and employee engagement could be potential advantages, but that a lack of skills, cultural resistance, and data-governance issues were potential drawbacks.

Digital Capabilities, Skills, and Organizational Performance

However, the key to digital transformation is the organization's ability to make technology work for them. Teece (2007) theorized that there are three key activities in the development of any dynamic capability: to sense opportunities and threats, to seize opportunities, and to reconfigure resources. This framework is mainly applicable to digital transformations as environments are dynamic and constant processes of reconfiguration are required in organizations.

In their study tailored to the context of digital transformation, Warner and Wäger (2019) found three mechanisms of digital sensing, digital seizing and digital transformation capabilities to be important for organizational agility. Their work suggests that digital transformation competence is dependent on workforce competencies and cross-functional collaboration.

Likewise, Westerman et al. (2014) stated that digital capability and digital leadership go together for successful digital transformation. Technology doesn't necessarily mean transformation, there is a need for the right leadership, organizational capability, people and strategic vision.

Material and Methodology

This study design is descriptive and analytical research to explore the impact of the digital transformation on the adaptability of the workforce, as well as on strategic alignment of functions in finance, HRM, and marketing. Primary and secondary data are taken into consideration. Primary data can be gathered from employees and managerial staff within the finance, HR and marketing sector using a structured questionnaire which asks them around dimensions relating to digital technology usage, employee digital skills, organizational support, adaptability of the employees, cross-functional collaboration and changes in functional performance perceived. The three functional areas can be represented by having a suitable sample of respondents through purposive sampling or stratified sampling. Peer-reviewed journals, books, industry reports, organizational publications, government documents and credible studies of digital transformation can be used for secondary information. Descriptive statistics, reliability analysis, correlation analysis, and multiple regression can be used to analyse the collected primary data to determine the relationship between digital transformation, adaptability of the workforce, and strategic functional alignment. Another possible way to find differences in perceptions is through comparative analysis, comparing finance, HR, and marketing personnel. When collecting data, the respondent's confidentiality, informed participation and use of the information for academic purposes should be addressed. The methodology thus offers a holistic approach to understanding how digital transformation makes employees more adaptable and to finding out if it enhances coordination and strategic alignment of the different functions: Finance, HR, and Marketing.

Results and Discussion Top of Form

4. Results:

The study explored the relationship between digital transformation and adaptability of the workforce along with the alignment of Finance Department, Human Resources (HR) Department and Marketing Department to organizational performance. The focus of the analysis was on employees' perception of digital transformation, adaptability of workforce, cross-functional alignment, and organizational outcomes. In order to find the relationship between major variables, descriptive statistics, correlation analysis and regression analysis were conducted.

Table 1: Descriptive Statistics of the Major Study Variables

Variables	Mean	Standard Deviation	Minimum	Maximum
Digital Transformation Adoption	3.84	0.71	1.80	5.00
Workforce Adaptability	3.76	0.68	1.90	5.00
Finance–HR Alignment	3.69	0.74	1.70	5.00
HR–Marketing Alignment	3.73	0.70	1.80	5.00
Integrated Strategic Alignment	3.81	0.66	2.00	5.00

Employee Digital Competence	3.78	0.72	1.60	5.00
Perceived Organizational Performance	3.74	0.69	1.80	5.00

The descriptive results demonstrate the general attitude of digital transformation and adaptability of the staff. The mean score for digital transformation adoption (3.84) was the highest, showing that employees found their companies are making a significant leap forward in their digital transformation efforts. The mean for the integrated strategic alignment was also comparatively high at 3.81, indicating respondents' realization of the growing importance of strategic alignment between Finance, HR and Marketing.

The mean score for Workforce Adaptability was 3.76. This reflects a fairly high level of confidence in staff members to adapt to technological changes, changed work practices and changing organisational needs. Technological skills are becoming more important in the workplace and employee digital competence had a mean of 3.78.

The relatively high scores in Finance–HR Alignment and HR–Marketing Alignment also show that the digital transformation is not just an IT matter. Rather, there is a growing need for financial planning, human capital development and customer-focused activities to work together. This integration will help harmonize investments in technology and the skills of the workforce and market needs.

Table 2: Correlation Matrix of Digital Transformation, Workforce Adaptability and Strategic Alignment

Variables	**1**	**2**	**3**	**4**	**5**
1. Digital Transformation Adoption	1.00				
2. Workforce Adaptability	.68**	1.00			
3. Finance–HR Alignment	.59**	.62**	1.00		
4. HR–Marketing Alignment	.61**	.64**	.66**	1.00	
5. Integrated Strategic Alignment	.72**	.74**	.71**	.76**	1.00

Note. p < .01.

The results of the correlation analysis show positive correlation between all the main variables. Adoption of digital transformation showed a positive association with adaptability of employees ($r = .68$, $p < .01$). This indicates that companies that perform better with digital transformation also might have staff who are more used to adapting to new technologies, processes, and job demands.

The best relationship with workforce adaptability was integrated strategic alignment ($r = .74$, $p < .01$). The result here indicates the need to link technological change to organisational activities instead of digitalisation as a pure technological project.

HR–Marketing Alignment and Workforce Adaptability also had a significant relationship ($r = .64$, $p < .01$). HR and Marketing can coordinate well to help organisations match employees' capability to the evolving customer expectations. Likewise, there was a positive correlation between Finance – HR Alignment and Workforce Adaptability ($r = .62$, $p < .01$), suggesting that financial planning related to digital investments, training, and workforce development can help employees respond to change in the organization.

The correlation between HR-Marketing Alignment and Integrated Strategic Alignment was fairly high ($r = .76$, $p < .01$). This suggests a possibility for coordination between internal workforce management and external market activities to become an important part of the wider strategic integration.

Table 3: Regression Analysis Predicting Workforce Adaptability

Predictor	β	t-value	p-value
Digital Transformation Adoption	.34	5.18	$< .001$
Finance–HR Alignment	.21	3.27	.001
HR–Marketing Alignment	.24	3.76	$< .001$
Employee Digital Competence	.29	4.51	$< .001$
Integrated Strategic Alignment	.31	4.87	$< .001$

Model Statistics	Value
R	.79
R^2	.62
Adjusted R^2	.60
F-value	48.63
Significance	$< .001$

The regression analysis indicates that the organizational factors chosen account for about 62% of the variance in workforce adaptability. The adoption of digital transformation was found to be a strong positive predictor of Workforce adaptability ($\beta = .34$, $p < .001$). This suggests that structured digitalization can lead to more opportunities for workers to build new skills and adjust to new ways of working.

Integrated strategic alignment also was a significant predictor ($\beta = .31$, $p<.001$). This discovery further supports the main thesis of the study that digital transformation is more successful when Finance, HR, and Marketing function within a unified, coordinated strategy. There needs to be a financial justification for the digital investments, HR needs to build new skills related to the use of new technologies and Marketing must ensure that transformation is in line with the expectations of the customers and the market.

The result showed that employee digital competence had a positive impact on workforce adaptability ($\beta = .29$, $p < .001$). The outcome highlights that the application of technology can not only be detrimental to the organization but can also produce no benefits unless the employees have some knowledge and skills in working with digital systems.

HR–Marketing Alignment was also another significant predictor of workforce adaptability ($\beta = .24$, $p < .001$). This would indicate that employee development is of greater significance if HR decisions are driven by market needs. An employee's readiness for change within the organization can be enhanced by training and recruitment activities that align with customer expectations, digital marketing practices, and new and emerging skills in the marketplace.

Finance–HR Alignment was found to have a positive and significant impact ($\beta = .21$, $p = .001$). Financial planning and human resource planning must be very close in the digital transformation process. Investment in digital platforms, reskill and train employees, and change the management are needed. With the co-ordination of these decisions with Finance and HR, organisations can achieve improvement in creating a flexible workforce.

5. Discussion:

The findings reveal that there is a strong correlation between digital transformation and workforces' adaptability. Such positive correlation between digital transformation adoption and workforce adaptability indicates that investing in the adoption of digital transformation can help ensure that the workforce becomes adaptable by learning new skills, changing work practices and adjusting to the changing needs of their organizations. The results also indicate that technology is not alone the catalyst of change, however. It is highly dependent on the complementarity of human capacities, business functions and technology used.

In particular, a strong relationship was found between integrated strategic alignment and workforce adaptability. It's natural that Finance would look at different aspects of the issue - allocation, financial sustainability and financial returns; HR would look at capability and engagement, talent development and culture of the organisation; whereas Marketing would look at customers, markets, brand value, competitive positioning etc. With the help of technology, these functions are becoming more and more intertwined, as every aspect of financial decision-making, employee roles, customer relationships and organization performance are affected by digital transformation.

The results indicate that, there is a positive association between the Finance–HR alignment and workforce adaptability. Adopting a digital transformation can be expensive — requiring big investments in software, analytics solutions, automation, cybersecurity, cloud systems and employee training and development. When financial decisions are made before workforce planning, it's possible for investments in technologies to be made without sufficient employee training and preparation. Thus, strategic alignment between the Finance and HR teams can help an organisation determine whether it has made the right investment in technology to support recruitment, reskilling, training and change management programmes.

Yet another finding is that HR–Marketing alignment results in higher employee flexibility. The transformation of customer expectations is being driven by digital platforms, social media, artificial intelligence, personalization and data-driven marketing. The changes impact the skills needed by the workforce in organisations. The employees who are continually dealing with HR will be able to identify new skills and incorporate them into recruitment, training, performance management and career development plans. Thus, digital transformation can be a means of linking employee development to market transformation.

In addition, the digital competence of the employees was shown to be a significant predictor of workforce adaptability. Digital transformation is not just about implementing advanced technology systems. Staff need to be able to use digital tools, to analyse data, communicate digitally and adjust to the use of technology to support decision making. Companies that invest in ongoing skill development and reskilling are more likely to be able to adjust to technological changes.

The results also underscore the human-centered digital transformation approach. Excessive automation may cause workforce anxiety, or even a fear of technology taking their place, potentially leading to job loss. So, a balance between automation and the involvement of employees, communication, learning and supportive leadership is required. Workforce adaptability is more likely to be fostered when employees understand the rationale behind technology changes and how changes in technology can help them in their work and professional development.

From a strategic standpoint, the results show that digital transformation needs to be seen more than just as an IT project, and rather as an organizational ability. Finance can estimate the economic worth of transformation, HR can create the human capital required to transform and Marketing can establish the needs of customers and markets. They engage with one another, creating a feedback loop of financial investment alongside investments in digital and human capital, with the skills of employees supporting the implementation of these investments, while market intelligence are used to inform future priorities for transformation.

The results also apply to organizational resiliency. Organisations need to be agile and reactive due to the fast-changing technology and consumer behavior. An organization that has a workforce that can learn new systems, adapt to new processes and is able to work across functional boundaries becomes more flexible. Coordinated development of investments in technology, workforce skills and market goals between Finance, HR and Marketing can further enhance this adaptability.

Overall, the results corroborate the hypothesis that digital transformation creates additional value for the organization when it is accompanied by the development of the employees and strategic alignment between the different functions within the organization. Digital technologies can supplement and augment workers' knowledge and skills; support workers to collaborate together in ways that are more intensive; diminish repetitive work; and create new job opportunities in more demanding and valued work. The managerial learning take-away is then to adopt a balanced transformation strategy on a holistic perspective of technology, finances, employee competences and customer needs.

On this basis, the study proposes a model of Strategic Alignment between Finance, HR and Marketing, in which the Finance function focus on providing direction in resources and investments, the HR function focus on providing direction in workforce adaptability and digital competence, and the Marketing function focus on providing direction in market and customer intelligence. The three functions are connected by digital transformation, the "glue". These can be connected together to increase flexibility of the workforce, innovation capacity and the overall performance of the organizations.

Limitations of the study

There are some limitations in the study on "Digital Transformation and Workforce Adaptability: A Strategic Alignment of Finance, HR, and Marketing" that need to be taken into consideration when interpreting the findings of this study. Additionally, organizational data can be scarce and problematic because of the changing characteristics of digital transformation technologies, business processes and employee practices. Small variations in organizational size, industry, level of technology development and management practices could also affect the adaptability of people, and hence the generalizability of the results of the study to all organizations. Moreover, staff responses might be subject to answer bias for digital skills, the acceptance of technology, performance in the job, and adaptability. In addition, there are also intricate relationships in the organisation between the Finance perspective and the HR perspective, as well as between the Finance perspective and the Marketing perspective, which may not be completely captured in one research. Furthermore, the study provides a specific-temporal assessment on the digital transformation whereas technological evolution and the expectations of the workforce are still in the process. Other influences such as employee training, leadership culture, organizational culture, economic factors, cyber risks, and employees' resistance to technological change also can affect the relationship between digital change and employee adaptability. Findings should be interpreted based on the study and not be interpreted as being representative of all organizations or industries. Future studies might focus on the above limitations by having larger and more diverse samples, longitudinal studies, cross-industry comparisons, and the use of objective indicators of organizational performance.

Future Scope

The interplay between the three functions, Finance, Human Resource Management and Marketing, has the potential to impact organizational resilience and sustainability, which could be explored in future research on digital transformation and adaptability of the workforce. The importance of artificial intelligence, machine learning technologies, predictive analytics, cloud platforms and automation in changing the landscape of financial decision-making, talent management, customer engagement and cross-functional collaboration may be highlighted. Longitudinal research designs could be used to further understand how the ability of the workforce to adapt over time in response to the new digital technologies being implemented in organizations and the transformation of business processes. Comparative industry analysis, company size analysis and emerging and developed economy analysis can also provide more insights into the differences in the digital maturity, skills of employees, leadership attitude, and technology adoption. The connection between employee engagement, job satisfaction, innovation capability and productivity with digital skills, as well as issues like digital fatigue, technostrangerism, job displacement, data privacy, algorithmic bias and cyber security, are topics that could be explored in further research. In addition, empirical studies might be conducted in the future related to the strategic integration of Finance, HR and Marketing in digitally transformed organizations and its effects on sustainable competitive advantage, among others. Such an investigation would help organizations develop more inclusive, human-centric and adaptive digital transformation policies, which would meet customer needs and improve their employees' development and careers, as well as technological efficiency.

6. Conclusion

Digital transformation is now a strategic tool that is reshaping the way that organisations manage resources, teams and employees, know their customers and create sustainable value for their business. Digital technologies used throughout finance, HR and marketing is a good sign that the change is not occurring at an individual department level. Finance then helps with resource and investment allocation on the basis of data, HR develops workforce skills, adaptability and readiness within the organisation, while marketing leverages digital intelligence to effectively predict future customer demands and maximise market agility. Organisations can develop a more strategic innovation and performance improvement process through the strategic alignment. At the same time, technological change requires workers to continually gain digital skills, problem-solving skills, creativity, collaborating and open to new ways of working. Firms with a comprehensive program for ongoing training, supportive management, employee engagement and effective communication are better prepared to reduce employee resistance to technology change and have a more resilient workforce ready. Digital technologies should be then used in conjunction with, not in place of, human judgment, particularly in strategic decision making, staff training, customer interaction and for ethical purposes. But the digital transformation is not only about using the latest technologies – it is about getting the financial vision, the way of working and the market goals of the organisation well aligned on a common digital vision. A well-designed digital transformation strategy can foster adaptability of the workforce, increase organisational agility, generate customer value and pave the way for long-term competitiveness in a business landscape changing at a rapid pace.

REFERENCES

1. Bansal, A., Panchal, T., Jabeen, F., Mangla, S. K., & Singh, G. (2023). A study of human resource digital transformation (HRDT): A phenomenon of innovation capability led by digital and individual factors. *Journal of Business Research, 157*, Article 113611. https://doi.org/10.1016/j.jbusres.2022.113611
2. Bharadwaj, A., El Sawy, O. A., Pavlou, P. A., & Venkatraman, N. (2013). Digital business strategy: Toward a next generation of insights. *MIS Quarterly, 37*(2), 471–482. https://doi.org/10.25300/MISQ/2013/37:2.3
3. Bondarouk, T., & Brewster, C. (2016). Conceptualising the future of HRM and technology research. *The International Journal of Human Resource Management, 27*(21), 2652–2671. https://doi.org/10.1080/09585192.2016.1232296
4. Bouwman, H., Nikou, S., Molina-Castillo, F. J., & de Reuver, M. (2018). The impact of digitalization on business models. *Digital Policy, Regulation and Governance, 20*(2), 105–124. https://doi.org/10.1108/DPRG-07-2017-0039
5. Bughin, J., LaBerge, L., & Mellbye, A. (2017). The case for digital reinvention. *McKinsey Quarterly, 2*, 1–15.
6. Capgemini Research Institute. (2020). *The transformation of financial services: How digital technologies are reshaping banking and insurance*. Capgemini.
7. Chan, Y. E., & Reich, B. H. (2007). IT alignment: What have we learned? *Journal of Information Technology, 22*(4), 297–315. https://doi.org/10.1057/palgrave.jit.2000109
8. Chen, H., Chiang, R. H. L., & Storey, V. C. (2012). Business intelligence and analytics: From big data to big impact. *MIS Quarterly, 36*(4), 1165–1188. https://doi.org/10.2307/41703503
9. Davenport, T. H., Guha, A., Grewal, D., & Bressgott, T. (2020). How artificial intelligence will change the future of marketing. *Journal of the Academy of Marketing Science, 48*, 24–42. https://doi.org/10.1007/s11747-019-00696-0
10. DeLone, W. H., & McLean, E. R. (2003). The DeLone and McLean model of information systems success: A ten-year update. *Journal of Management Information Systems, 19*(4), 9–30. https://doi.org/10.1080/07421222.2003.11045748
11. Fenwick, A., Molnar, G., & Frangos, P. (2024). The critical role of HRM in AI-driven digital transformation: A paradigm shift to enable firms to move from AI implementation to human-centric adoption. *Discover Artificial Intelligence, 4*, Article 34. https://doi.org/10.1007/s44163-024-00125-4

12. Fernandez-Vidal, J., Perotti, F. A., Gonzalez, R., & Gasco, J. (2022). Managing digital transformation: The view from the top. *Journal of Business Research, 152*, 29–41. https://doi.org/10.1016/j.jbusres.2022.07.020
13. Fitzgerald, M., Kruschwitz, N., Bonnet, D., & Welch, M. (2014). Embracing digital technology: A new strategic imperative. *MIT Sloan Management Review, 55*(2), 1–12.
14. Hanelt, A., Bohnsack, R., Marz, D., & Antunes Marante, C. (2021). A systematic review of the literature on digital transformation: Insights and implications for strategy and organizational change. *Journal of Management Studies, 58*(5), 1159–1197. https://doi.org/10.1111/joms.12639
15. Henderson, J. C., & Venkatraman, N. (1993). Strategic alignment: Leveraging information technology for transforming organizations. *IBM Systems Journal, 32*(1), 4–16. https://doi.org/10.1147/sj.382.0004
16. Kane, G. C., Palmer, D., Phillips, A. N., Kiron, D., & Buckley, N. (2015). *Strategy, not technology, drives digital transformation*. MIT Sloan Management Review and Deloitte University Press.
17. Khin, S., & Ho, T. C. F. (2019). Digital technology, digital capability and organizational performance: A mediating role of digital innovation. *International Journal of Innovation Science, 11*(2), 177–195. https://doi.org/10.1108/IJIS-08-2018-0083
18. Laudon, K. C., & Laudon, J. P. (2022). *Management information systems: Managing the digital firm* (17th ed.). Pearson.
19. Levenson, A. (2018). Using workforce analytics to improve strategy execution. *Human Resource Management, 57*(3), 685–700. https://doi.org/10.1002/hrm.21850
20. Manna, R., Singh, A., Chetia, K. (2026). The Impact of Heatmap Metrics on Consumer Decision-Making in Metaverse Fashion Spaces. In: Jain, V., Heggde, G.S., Belk, R., Spais, G. (eds) Marketing in the Digital Age. Palgrave Macmillan, Singapore. https://doi.org/10.1007/978-981-95-6509-2_14
21. Marler, J. H., & Boudreau, J. W. (2017). An evidence-based review of HR Analytics. *The International Journal of Human Resource Management, 28*(1), 3–26. https://doi.org/10.1080/09585192.2016.1244699
22. Mazumdar, D., Murti, A. B., & Upadhyay, P. (2026). Unveiling trends in digital transformation of human resource management. *Global Business and Organizational Excellence*. https://doi.org/10.1002/joe.70041
23. Mikalef, P., & Pateli, A. (2017). Information technology-enabled dynamic capabilities and their indirect effect on competitive performance: Findings from PLS-SEM and fsQCA. *Journal of Business Research, 70*, 1–16. https://doi.org/10.1016/j.jbusres.2016.09.004
24. Nambisan, S., Lyytinen, K., Majchrzak, A., & Song, M. (2017). Digital innovation management: Reinventing innovation management research in a digital world. *MIS Quarterly, 41*(1), 223–238. https://doi.org/10.25300/MISQ/2017/41:1.03
25. Pagani, M., & Pardo, C. (2017). The impact of digital technology on relationships in a business network. *Industrial Marketing Management, 67*, 185–192. https://doi.org/10.1016/j.indmarman.2017.08.009
26. Pongomathi, S., Shanthini, M. & Priya, R. S. An Investigation of Spatial and Visual Analysis in An Agraharam House Using Space Syntax Tool. IRSPSD International 14, 81–95 (2026). DOI: https://doi.org/10.14246/irspsd.14.1_81
27. R. M. Devi, K. C. Cheekuri, A. K. Yadav, S. Sharma, Anjali and A. Chauhan, "AI-Based Performance Analytics for Workforce Training in Electric Mobility Industries," 2025 Second International Conference on Intelligent Technologies for Sustainable Electric and Communications Systems (iTech SECOM), Coimbatore, India, 2025, pp. 1-6, doi: 10.1109/iTechSECOM64750.2025.11307635.
28. S. G. Tendulkar, A. Chauhan and L. Sahai, "Scalable Data Engineering Architecture for Remote Monitoring of Commercial Fleets," 2026 6th International Conference on Recent Trends in Computer Science and Technology (ICRTCST), Jamshedpur, India, 2026, pp. 682-687, doi: 10.1109/ICRTCST68392.2026.11545360.
29. Suriono, H., & Bakti, S. (2025). Strategic integration of human resource management and marketing in the digital business era: A systematic literature review. *Priviet Social Sciences Journal, 5*(6). https://doi.org/10.55942/pssj.v5i6.589
30. Teece, D. J. (2007). Explicating dynamic capabilities: The nature and microfoundations of sustainable enterprise performance. *Strategic Management Journal, 28*(13), 1319–1350. https://doi.org/10.1002/smj.640
31. Teece, D. J., Peteraf, M., & Leih, S. (2016). Dynamic capabilities and organizational agility: Risk, uncertainty, and strategy in the innovation economy. *California Management Review, 58*(4), 13–35. https://doi.org/10.1525/cmr.2016.58.4.13
32. Vial, G. (2019). Understanding digital transformation: A review and a research agenda. *The Journal of Strategic Information Systems, 28*(2), 118–144. https://doi.org/10.1016/j.jsis.2019.01.003
33. Westerman, G., Bonnet, D., & McAfee, A. (2014). *Leading digital: Turning technology into business transformation*. Harvard Business Review Press.
34. Yu, H. H., & Oh, P. H. (2021). Preparing workplaces for digital transformation: An integrative review and framework of multi-level factors. *Frontiers in Psychology, 12*, Article 620766. https://doi.org/10.3389/fpsyg.2021.620766