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FACTORS AFFECTING THE ADOPTION OF CLOUD-BASED HUMAN RESOURCE MANAGEMENT ON INNOVATION BEHAVIOUR AMONG SMEs IN JORDAN

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ABSTRACT

Innovative behaviour is attracted research interest. The research draws on Theory of Planned Behaviour (TPB) and Diffusion of Innovation (DOI) frameworks to examine the impacts of technology factors and intention to adopt Cloud-based Human Resource Management Systems on innovative behaviour. The mediating variable of intention to adopt Cloud-based HRMS was examined. Data were collected and analysed from 366 full-time employees who are working within the information and communication sector in SMEs in Jordan. The outputs from smart partial least square (SmartPLS) analysis reveal that technology factors effects intention to adopt Cloud-based HRMS, which consequently affects innovative behaviour. Whereas, leadership support was found to play a significant role in the relationship between intention to adopt Cloud-based HRMS and innovative behaviour, it has a positive effect. These results provide the relevance of the technological factor on how to foster innovative behaviors through intention to adopt Cloud-based HRMS and leadership support.

Keywords: Cloud-based Human Resource Management System, Innovation Behaviour, Leadership Support, Cloud Computing, and Technological Factors.

INTRODUCTION

In the last few years, innovative change has occurred in Human Resource Management Systems (HRMS) with the advent of cloud computing (Ahmed, 2015). Cloud computing was introduced in HRM to realize innovative solutions for a company's sustainability. Centrally situated data are beneficial for a company as clouds ease the work and bolstering the efficiency of the HR department (RashmiBhadani, 2014). Bourini (2021); Torres et al., (2017) reported that to gain a competitive advantage, companies need to develop and launch new services. Earlier studies claim that the development of an employee's innovation behaviour is critical for an organization because it must adapt to technological changes with increased completion and technological developments (Yuan & Marquardt, 2015). Indeed, in a dynamic business environment, leadership support in any organization plays one of the most significant and vital roles in motivating and shaping an employee's behaviour towards innovation (Hossain et al., 2011). Despite the growing interest in using human resource management technologies for various business organizations, there is a dearth in conducted empirical studies about cloud computing applications within the human resource field in developing countries (Mjlae, Mohamad, and Suryani 2019). As one of the developing countries, Jordan is categorized as suffering from a lack of innovative human resources (Alnidawi, Alshemery, & Abdulrahman, 2017). AL-Awamleh (2020) found that innovation capabilities are not present among many employees in Jordanian companies. The researchers recommended that Jordanian companies seek to develop and motivate innovation behaviour among their employees (Alnidawi & Omran, 2018). Previous studies have found a positive correlation between technology implementation and innovative behaviours (Al-Khattab & Saeed 2016). Litwin (2011) found that new technologies offer an important avenue by which the company can improve HRM performance. Upgradation of the existing HR traditional into HRMS can prove to be a feasible optimal decision (Yagneshnath and Shankarrao 2020). HRMS can be a support for employees. Indeed, the advantages of Cloud-based HRMS are seen as numerous. Among them are potential cost savings, increased security, immediate upgrades, mobility, flexibility, scalability, boosted collaboration, quality control, the potential for disaster recovery and automatic software updates, availability/sustainability, and competitive advantages (Avram, 2014; Martins, 2020). Thus, the statement addresses the question What is the relationship between the intention to adopt Cloud-based HRS and innovation behaviour?.

Some researchers have determined the importance of three constructs of innovation: relative advantage, complexity, and compatibility (Carter & France, 2005; Tornatzky & Klein, 1982; AL-Madhagy, 2018, Aremu, et al., 2021). Thus, the last statement addresses the question What is the relationship between technological factors and the intention to adopt Cloud-based HRS?. Thus, the current study will investigate the intention to adopt Cloud-based HRS as a mediator to figure out in more detail the mechanism of how technology factors might lead to innovative behaviour. Moreover, Azim et al. (2019) conducted a study whose results reveal that the leader has a positive effect on employees' intrinsic motivation within information and communication services. Particularly, a leader provides an empowered working environment by making subordinates believe in creative self-efficacy, intrinsically motivated work settings to engage employees in innovative tasks (Bourini 2021). Thus, the last statement addresses the question Does leadership support moderate the relationship between intention to adopt Cloud-based HRS and innovation behaviour?

Based on its objectives, the current research contemplates two technology adoption models: the TPB and DOI frameworks (Alam, Omar, Mohd, Azmi, & Hashim, 2018). That could explain better the influence of independent and dependent variables. The Theory of Planned Behaviour is a useful model for understanding the use of information technology (Hung et al., 2003; Teo & Pok, 2003). The essential contribution of TPB is the concept of perceived behavioural control, which is the perception of a person of either the ease or the difficulty of executing a specific behaviour (Mimiaga & Safren, 2009). Groen, Wilderom, and Wouters (2017) pointed out the TPB is utilized to explain how the better-perceived quality of measurement can enhance employee performance. The primary five

constructs of DOI, according to Rogers (1983), are Relative advantage, Compatibility, Complexity, Trialability, and Observability. On a broad scale, DOI has been used to explain the adoption, acceptance, or usage of new technologies and innovative systems (Rogers, 1983). In this context, an innovation is an idea or object considered by the “individual or entity of adoption” to be new. Further, this process lowers the uncertainty surrounded by the innovation (AL-Madhagy, 2018). Harfoushi et al. (2016) reported that the technological factor had the most impact on the intention to adopt Cloud-based computing.

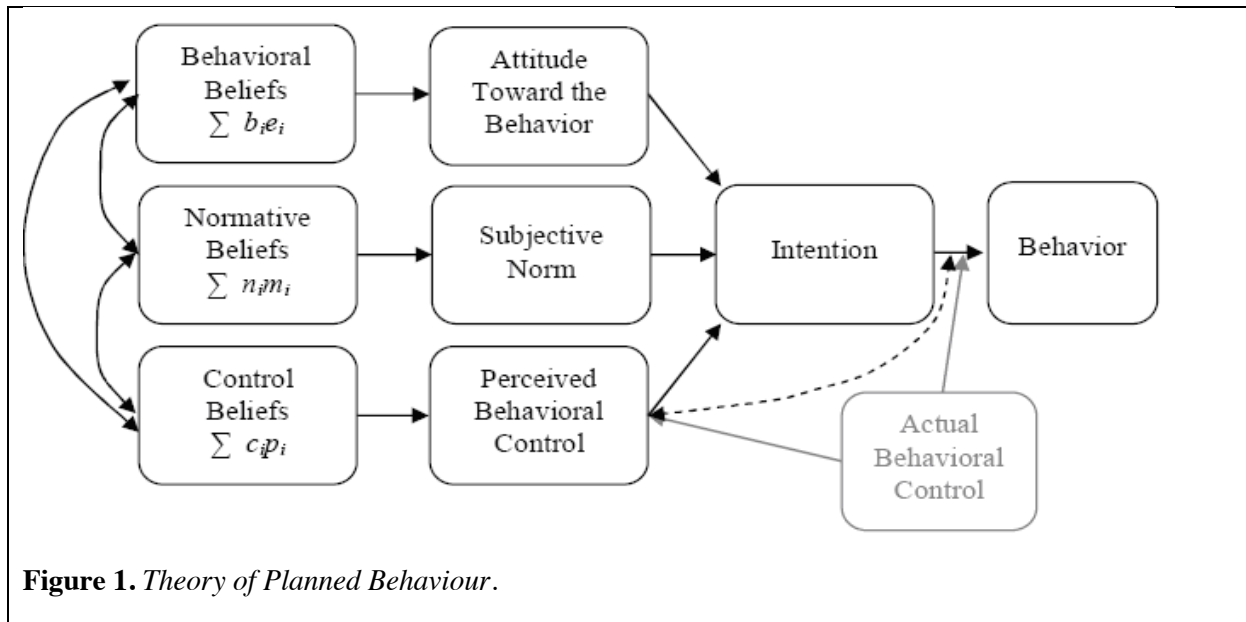


Figure 1. *Theory of Planned Behaviour.*

LITERATURE REVIEW

The association between Technological Factors and Cloud-based HRMS

Diffusion of Innovation theory (DOI) is one of the popular models used in the research of information technology and innovative systems by Rogers (1983). Some researchers have determined the importance of three constructs of innovation: relative advantage, complexity, and compatibility (Carter & France, 2005; Tornatzky & Klein, 1982; AL-Madhagy, 2018). Besides, complexity, compatibility, and relative advantage were found to be the critical factors explaining the adoption (AL-Madhagy, 2018; Aremu et al., 2018). As defined by Rogers (2003), relative advantage is the degree to which a new technology is seen as offering more benefits and opportunities than a previous technology. Previous studies (Harfoushi et al., 2016; Low et al., 2011; Oliveira et al., 2014; Gill et al., 2018) have found that relative advantage impacts cloud computing usage significantly. From this perspective, cloud computing offers various comparative advantages, including flexibility, mobility, and resource sharing, and can increase employee performance (Harfoushi et al., 2016). Mobility gives employees the facility of accessing and working on their documents from anywhere in the world, provided they have computer access and an Internet connection. Mobility can save both time and money (Ibrahim, 2014). Rogers (2003) said that compatibility was “the degree to which an innovation is perceived as consistent with the existing values, past experiences, and needs of potential adopters” (p. 240). Compatibility is a crucial factor in the adoption of innovations. Compatibility can deliver several benefits to adopters. For example, compatibility can produce cost and time reductions because users need not deconstruct a costly infrastructure when a new technology is utilized (Harfoushi et al., 2016). Besides, compatibility offers the possibility of reducing the degree of uncertainty among technology users (Gangwar, 2015). Complexity is “the degree to which an innovation is perceived as relatively difficult to understand and use” (Roger, 2003, p. 257). In cloud computing adoption, complexity is

measured by the time it takes the employee to perform the tasks, the integration of applications with the specialized cloud infrastructure, efficiency of data transfer, system functionality, etc. Generally, complexity is perceived to be quite close conceptually to ease of use (Harfoushi et al., 2016). Shih and Fang (2004) found that complexity is a vital factor in the technology adoption process.

In this context, the following hypotheses are posited

H1: Relative advantage has a significant impact on the intention to adopt Cloud-based HRS.

H2: Compatibility has a significant impact on the intention to adopt Cloud-based HRS.

H3: Complexity has a significant impact on the intention to adopt Cloud-based HRS.

Cloud-based HRMS and Innovation Behaviour

Innovation behaviour refers to an employee's conduct in applying new ideas, processes, products, technology, and employees' role in the organization (Yuan & Marquardt, 2015). The development of an employee's innovation behaviour is critical for an organization because it must adapt to technological changes with increased completion and technological developments. Innovation is essential for the mere survival of organizations, as well as being competitive and ultimately successful (Bourini 2021). Previous studies have suggested that innovative behaviour positively relates to employee task performance (Dorner, Gassmann, & Morhart, 2012; Chan & Rasli, 2014). Innovative behaviours indeed lead to positive outcomes, such as employee job performance (Ying Zhang, Zhang, Forest, & Chen 2018). As a result, innovative behaviour roles speed an individual's mindset and, in turn, enhances employee performance (Chan & Rasli 2014). The development of an employee's innovation behaviour is critical for an organization because it must adapt to technological changes with increased completion and technological developments. Previous studies have found a positive correlation between technology implementation and innovative behaviours (Al-Khattab & Saeed 2016). Litwin (2011) found that new technologies offer an important avenue by which the company can improve HRM performance. While much research has found a connection between HRM and innovation (Messersmith & Guthrie, 2010; Bos-Nehles et al., 2017). HRM influences and shapes the attitudes, behaviours, and knowledge of individuals, and studies have linked HRM to innovation on the organizational level. Nonetheless, individual innovative behaviour remains fundamental to innovative organizational capacity because individuals serve as the keystone of every innovation (Nassoura and Hassan 2021).

In this context, the following hypotheses are posited:

H4: Cloud-based HRS has a significant impact on innovation behaviour.

The Mediating Role of the Intention to adopt Cloud-based HRS

Research has focused on some variables influencing the mediating variable, which is the intention to utilise cloud computing (Raut et al., 2017). These factors include the technological factors, which are compatibility, complexity, perceived ease of use, perceived usefulness, and relative advantage. Harfoushi et al. (2016) reported that the technological factor had the biggest impact on the intention to adopt Cloud-based computing. The current study incorporated “perceived usefulness, ease of use, relative advantage, complexity, and compatibility,” as elements that might affect “the intention to adopt Cloud-based HRMS. This current research focuses on some of the variables that impact the mediating variable, which is “intention to adopt Cloud-based HRMS,” towards the dependent variable, which is innovation behaviour.

In this context, the following hypotheses are posited:

H5: Cloud-based HRS significantly mediates the relationship between relative advantage and innovation behaviour.

H6: Cloud-based HRS significantly mediates the relationship between complexity and innovation behaviour.

H7: Cloud-based HRS significantly mediates the relationship between compatibility and innovation behaviour.

The Moderating Role of Leadership Support

Leadership support helps implement cloud technologies, identifying how cloud computing influences the effectiveness of HRM and HR and total organizational performance (Yaseen et al., 2018). The latest literature has concentrated on the impact of leadership support on innovation and performance (Yaseen et al., 2018). Executives and business leaders have acknowledged the impacts of technology on strategies and tactics and business processes and the influence of a leader on adopting and utilizing technology. Celaya (2015) reported that cloud computing is quickly becoming the norm for performing human resources processes, and leadership should be ready to implement changes that lead to Cloud-based HRS successfully. Previous studies have found that leaders have adopted cloud technology as a best practice for achieving innovative behavior. From this perspective, leadership serves as a catalyst to make HR activities more effective and empower companies to implement solutions based on technology (Celaya 2015). Indeed, leadership support is one of the most critical factors in the successful adoption of cloud computing (Oliveira et al., 2014). Leadership awareness of the prospective advantages of adopting cloud computing is seen as an indispensable element for managing organizational change. This is achieved through an expressed vision and commitment. Thus, leadership support is vital for an organization seeking to produce innovation behaviour, as it provides the necessary resources to adopt a cloud service (Harfoushi et al., 2016). Leaders in any organization play one of the most significant and vital roles in motivating and shaping an employee's behaviour towards innovation. A leader is significant in reassuring employees that the new technology can help them improve their behaviour.

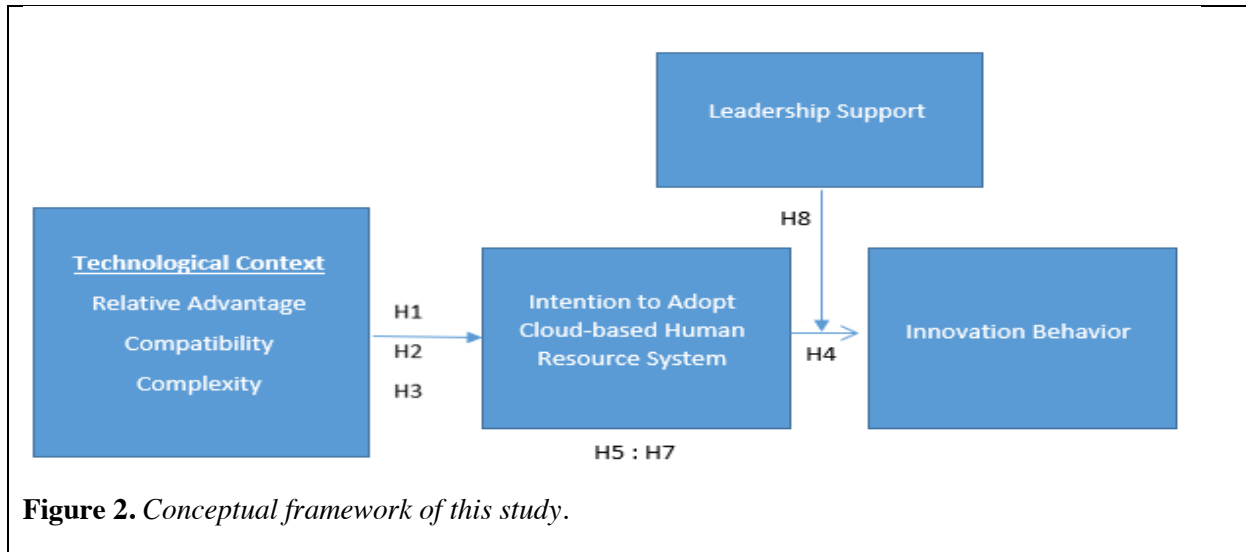
In this context, the following hypothesis is posited:

H8: The relationship between intention to adopt Cloud-based HRS and innovation behaviour is significant under the effect of leadership support.

METHODOLOGY

In this study, a self-administered questionnaire was adopted to survey factors impacting cloud computing adoption in HRMS among SMEs in Jordan. The study adopts the quantitative research methods to achieve research objectives (Sekaran & Bougie 2019). Mainly, the current study investigates the potential effect of Technological Factors through intention to adopt cloud-based HRMS on innovative behaviour with the moderation effect of leadership support. According to (Sekaran & Bougie 2019), the positivist research paradigm required quantitative research methods by the mono method. Hence, in this study, a self-administered questionnaire was adopted to survey factors impacting cloud computing adoption in HRMS among SMEs in Jordan. A deductive approach was adapted to collect specific quantitative information to support or not the hypothesis. The current study applies structural equation modelling (SEM-PLS) to investigate the relationship among the constructs in the proposed model, as mentioned in Fig. 2. In the instrument, taking advantage of a five-point scale to measure differences in behaviours according to a degree of significance. Based on current study's objectives, the conceptual framework built on the TPB and DOI frameworks, which could better explain the influence of independent and dependent variables as it appears in figure 2. Only a few empirical studies examined the impact of factors affecting the adoption of cloud computing

for a human resource management system. The model in this study combines more inclusive factors and the moderating role of leadership support. Hence, this current study rests on extracting factors that impact the intention to adopt cloud computing in a human resource management system among SMEs in Jordan. Figure 2 below presents the study's conceptual framework.



Population and sample

The level of the analysis was individuals. Those individuals include human resource management employees and IT staff, who know cloud computing services (Tarhini et al., 2017). These individuals were included because of their presumed level of information, knowledge, and proficiency in adopting Cloud-Based computing in SMEs. Those individuals were included because of their presumed level of skills, knowledge, and experiences. The information and communication sector was selected from official a database of the department of statistics, Jordan. This sector was chosen because of the high penetration rates. These companies can acquire new systems and utilise them because of the need for new methods to manage these employees professionally (Saleh, 2014). They have enough knowledge; this should lead them to implement and accept the application more effectively (Inmora & Suwannahonga 2017). Additionally, they can select and install best-of-breed applications and determine cloud services quality (Vithayathil, 2018). This study included companies in the Information and Communication sector that employed less than 100 full-time employees. The current research targets a population of employees in human resource management and the IT staff within SMEs across the capital of Jordan, Amman. Their perceptions of the adoption technology process are highly relevant. Those individuals were included because of their presumed level of skills, knowledge, and experience concerning Cloud-based computing adoption in their companies (Ali, 2016). According to the Department of Statistics (2018), the total number of employees working in the information and communications sector reached 11,661 employees. The number of employees in the Human Resources and the Information Technology staff in small and medium-sized companies reached 4461 employees. Krejcie and Morgan (1970) stated that the size must be reasonable enough for a valid sample. He suggested that for a sample population of 4,000 to 4,500, 354 questionnaires are recommended as a sample size. Therefore, this study's sample size, which is 354, is entirely acceptable and comparable with the samples used in most other studies. The survey was administered via email. Surveys were sent to 531 respondents out of which, 344 responses were received. However, after filtering the responses, eight responses were not eligible as they were from big-sized companies. A total of 336 surveys were available for analysis for an effective response rate of 63.3%.

Measurement

Google Forms questionnaire was utilised to gather the data for this survey. There are many types of online-based survey tools. “Google Forms” by email was used as it is free and does not limit how many questions one be in a survey. The study used a 5-point Likert scale for the close-ended questions. The questionnaire was divided into four parts: moderator (leadership support), technological factors, mediator (intention to adopt Cloud-based Human Resource System), and innovation behaviour. The seven items to operationalise the moderator (i.e. leadership support), were adapted from Ratten (2015) and Swart (2013). The operational definition that the administration in an organization is a basic constituent in assessing the utilization of information escalated administrations, for instance, a Cloud-based HRS and ascertaining the business necessities of the organization when it plays a critical role in creating advancement conduct among employees and by effectively taking an interest in making objectives and measurements to screen cloud innovation. Measurement included items such as, “Leadership plays a significant role in developing innovative behaviour among employees.”. The three technological factors were operationalised utilising 12 items. These items were mainly adapted, relative advantage (Moore & Benbasat, 1991), four items for compatibility (Al Khater, 2017), and four items for complexity (Gangwar et al., 2015). The seven items to operationalise the Mediator, i.e., Intention to adopt Cloud Computing, were adapted from (Al khater, 2017). The operational definition that an employee finds a way to use a Cloud-based human resource in the future to facilitate their work, make advancement in terms of service, and establish comfort with the work environment. Measurement included items such as, “A Cloud-based Human Resource System in our organisation will help me to develop a new service”. The seven items to operationalise the dependent variable, i.e., innovation behaviour, were adapted from (Scott & Bruce 1994). The operational definition that an individual innovation starts with the identification of problems and the creation of new or embraced ideas or solutions by offer and spread thoughts with others. Measurement included items such as, “I am combining existing ideas with modern technology to find solutions to issues that have arisen in my organisation”.

Partial least square (PLS-SEM)

To investigate the proposed model, PLS-SEM was utilised to predict the construct and relationships among constructs (Hair et al., 2013; Reinartz et al., 2009). Hair, Ringle, & Sarstedt (2011) reported that the PLS approach is a flexible tool and suitable to build a statistical style. PLS path modelling can simultaneously estimate the associations between constructs “structural model” and the relations among indicators and their corresponding latent constructs “measurement model” (Duarte & Raposo, 2010), which make it powerful statistical techniques (Tabachnick & Fidel, 2007).

Collinearity analysis

For PLS-SEM, common method bias (CMB) was detected through a full Collinearity assessment approach (Kock, 2015). Variance inflation factor (VIF) values should be lower than the 3.3 thresholds (Kock, 2015). Thus, the results reveal that the model is free from common method Variance where all the constructs have an inner VIF value of less than 3.3.

Assessment of Measurement Model

Two different types of measurement models (outer model) are used: formative and reflective. Assessing their quality requires applying different criteria and methods (Chin, 2010; Hair et al., 2011; Hair et al., 2013). This study examined the most critical elements that influence the adoption of cloud computing in HRMS, so the effects of the IV on DV are important and have been examined in this research. Thus, the measurement model assessment stage performed two analysis steps: 1) assessment of reliability and validity of the constructs together then 2) the R square and effect size analysis. The

reflective measurement model evaluates reliability and validity, and two key criteria for conducting such an evaluation are composite reliability (CR) and average variance extracted (AVE) (Chin, 2010; Hair et al., 2013) in Table 1.

Table 1

Results of the measurement model for first-order constructs.

	Item number (33)	Factor loading range	(AVE)	(CR)	Internal reliability Cronbach Alpha
RA	a1	0.802	0.652	0.882	0.824
	a2	0.753			
	a3	0.835			
	a4	0.838			
COM	b1	0.873	0.700	0.903	0.858
	b2	0.753			
	b3	0.894			
	b4	0.821			
CX	c1	0.893	0.467	0.772	0.806
	c2	0.581			
	c3	0.592			
	c4	0.618			
IA	d1	0.761	0.709	0.945	0.931
	d2	0.859			
	d3	0.865			
	d4	0.888			
	d5	0.820			
	d6	0.863			
	d7	0.833			
Moderating Effect 1 (LD)	e1	0.838	0.671	0.934	0.918
	e2	0.844			
	e3	0.829			
	e4	0.825			
	e5	0.797			
	e6	0.769			
	e7	0.828			
IN	f1	0.769	0.644	0.926	0.907

	f2	0.803			
	f3	0.865			
	f4	0.872			
	f5	0.727			
	f6	0.819			
	f7	0.751			

Note: IA = Intention to adopt A Cloud-based Human Resource System; RA = Relative Advantage; COM = Compatibility; CX = Complexity; LD = Leadership Support; and IN = Innovative Behavior.

To evaluate the reliability of the reflective measurement model for SEM, indicator reliability and construct reliability should be conducted. To assess indicator reliability, the loading of each indicator on its associated latent construct should be checked (Chin, 2010; Hair et al., 2011). Two coefficients are typically considered: CR and the more common coefficient Cronbach's alpha (Bagozzi and Yi, 1988; Gotz et al., 2010; Chin, 2010). However, CR is more suitable for PLS-SEM (Hair et al., 2011). Table 1 shows that the CR for all latent variables achieved more than 0.882, suggested that the construct had achieved the reliability requirement. Also, Table 1 shows that the values of AVE (more than 0.5) indicated that the model had attained adequate convergent validity (Anderson and Gerbing, 1988).

Discriminant validity is the extent to which each construct is genuinely distinct from the other constructs in the model (Chin, 1998; Hair et al., 2013). Two measures must be checked to test discriminant validity. The AVE of each construct should be higher than the highest squared correlation of the construct with any other LV in the model, and an indicator's loading with its associated LV must be higher than its loading with other LVs (Fornell & Larcker, 1981; Hair et al., 2011; Chin, 2010). Moreover, Table 2 presents the A comparison of the square root of AVE of each construct with the correlation of the other construct demonstrates that for all constructs of the discriminant validity is acceptable, and the square root of AVE is greater than the correlation between these and other constructs. Reliability, convergent validity, discriminant validity, and full collinearity were highly acceptable for the measurement model consisting of the constructs (See Tables 2).

Table 2

The Discriminant Validity Index Summary.

	COM	EU	IN	IA	LD	RA
COM	0.837					
EU	0.627	0.833				
IN	0.482	0.554	0.803			
IA	0.754	0.614	0.553	0.842		
LD	0.721	0.567	0.692	0.681	0.819	
RA	0.724	0.679	0.569	0.761	0.607	0.808

Assessment of Structural Model

According to this study's objectives, two rounds of assessment of the structural model should be performed. The relationships between the constructs and Innovative Behavior have been assessed. The following two criteria should be evaluated to obtain a preliminary assessment of the structural model (inner model): R-square (R²) measure of endogenous constructs and the path coefficients (Hair et al., 2011; Chin, 2010). The path coefficients must be significant, and R² is highly dependent on the research area. Chin (1998) suggested 0.67, 0.33, and 0.19 measures for R² to be considered substantial, moderate, and weak, respectively. An R² value of 0.20 is considered high in the consumer behaviour area (Hair et al., 2013). The R² value of endogenous construct Innovative Behaviour of the current study was 0.509. Therefore, the value was acceptable. Table 3 shows that all path coefficients were highly significant as well. Therefore, all hypothetical relationships were significant and supported. For effect size (f²), another criterion verifies whether the effects indicated by path coefficients are high, moderate, or low. 0.02, 0.15, and 0.35 values for f² represent low, moderate, and high effects, respectively (Cohen, 1988). The effect size implies whether the impact of a specific independent LV on a dependent LV is substantial or not (Chin, 2010) and calculated according to the changes of R² of dependent LV when the independent variable was included in the model and excluded. Table 3 shows that all relationships in the model have moderate and low effects which are between 0.010 and 0.090. Whereas the relationship between Relative Advantage and Intention to Adopt cloud-system HRS has the highest effect size.

Once the structural model's validity is confirmed, the next step is to assess the proposed structural model's path. Table 3 shows the structural model and the analytical results. Each path corresponds to each proposed hypothesis in this thesis. Each hypothesis's test is achieved by looking at the sign, size, and statistical significance of the path coefficient between the latent variable and its dependent variables. The higher the path coefficient, the stronger the effect of LVs on the dependent variable. Almost all the proposed relationships show significance at p<0.01 except for complexity. They are not significant. Table 3 summarizes the results of the hypotheses testing regarding relationship and effects based on the tests conducted.

The text output for each direct effect association in this current study, as seen in the model in Table 3. The testing of the direct effect hypothesis is decided based on the probability value (p-value). The value of the regression coefficient shows the effect of an exogenous construct on its corresponding endogenous construct. In this regard, a one-sided arrow represents the causal effect of an exogenous construct on its corresponding endogenous construct (Afthanorhan et al., 2019; Asnawi et al., 2019; Awang, 2015; Awang et al., 2018; Kashif et al., 2015, 2016; Mohd Azli et al., 2017).

Table 3

Results of path coefficients and hypotheses testing for the model

	Hypotheses	Path coefficient	T-value	P-value	F ²	Supported
Direct relationships	Compatibility → Intention to Adopt cloud-system HRS	0.161	2.986	0.003	0.036	Yes
	Complexity → Intention to Adopt cloud-system HRS	0.083	1.032	0.303	0.010	No
	Relative Advantage → Intention to Adopt cloud-system HRS	0.257	4.182	0.000	0.090	Yes

	Intention to Adopt cloud-system HRS → Innovative Behavior	0.172	2.721	0.007	0.032	Yes
Moderate effect 1	(Leadership) Moderating Effect → Innovative Behavior	0.126	3.440	0.001	0.035	Yes
Indirect relationship	Compatibility → Intention to Adopt cloud-system HRS → Innovative Behavior	0.027	2.327	0.020	N/A	Yes
	Complexity → Intention to Adopt cloud-system HRS → Innovative Behavior	0.014	0.857	0.392	N/A	No
	Relative Advantage → Intention to Adopt cloud-system HRS → Innovative Behavior	0.044	2.354	0.019	N/A	Yes

All Hypotheses were supported. Interestingly, complexity was not. The effect of Leadership Support on Innovative Behavior was significant ($\beta = 0.126$). Thus, the hypothesis that Leadership Support would have a positive effect on Innovative Behavior was supported. More importantly, the effect of Intention to Adopt on Innovative Behavior was significant ($\beta = 0.172$). Thus, the hypothesis that the Intention to Adopt would positively affect Innovative Behavior was supported. The path coefficient of Relative Advantage to Intention to Adopt was 0.257, the effect of Relative Advantage would have a positive effect on Intentional to Adopt was significant. Thus, the hypothesis that Relative Advantage would positively affect the Intention to Adopt was supported. The path coefficient of Compatibility to Intention to Adopt was 0.161, the effect of Compatibility would have a positive effect on Intentional to Adopt was significant. Thus, the hypothesis that Compatibility would have a positive effect on the Intention to Adopt was supported. The study utilised the method for testing the mediation effects in the model that Awang (2014, 2015) and Awang et al. (2018) proposed, which many others have used (Afthanorhan et al., 2018, Asnawi et al., 2019). Of these three hypotheses, two were fully mediated, and one was not mediated. The variables Relative Advantage and Compatibility fully mediate the Intention to Adopt Cloud-Based HRS on Innovation Behavior, whereas Complexity did not support the relationship.

Discussion

The results of this study generally align with previous studies regarding the use and adoption of technology. As others have found, compatibility and relative advantage are all concepts related to the adoption of new technology. Thus, the current study aligned with the findings of several other studies. Numerous scholars have found that compatibility and relative advantage were all significantly related to the adoption of new technology (Carter and France (2005); Tornatzky and Klein (1982), AL-Madhagy (2018), Kong (2018), Harfoushi et al., 2016.). The relative advantage of utilizing the cloud is that it will help to accomplish tasks more quickly and increase productivity and flexibility (Al khater 2017). The results of this study revealed that the relative advantage has a positive relationship with the adoption of the cloud-based HRMS. This result agrees with findings of former studies (Alshamaila et al., 2013; Borgman et al., 2013; Oliveira et al., 2014), which have found that relative advantage impacts cloud computing usage significantly. From this perspective, cloud computing offers various comparative advantages, including flexibility, mobility, and resource sharing, and can increase employee performance (Harfoushi et al., 2016). Besides, mobility offers employees the facility of

accessing and working on their files from anyplace in the world, provided they have pc access and an Internet connection. Thus, it saves money and time (Ibrahim, 2014). Compatibility is a crucial factor in the adoption of innovations. Compatibility can deliver several benefits to adopters. For example, compatibility can produce cost and time reductions because users need not deconstruct a costly infrastructure when a new technology is utilised (Harfoushi et al., 2016). Besides, the compatibility of an innovation with old technology offers the possibility of reducing the degree of uncertainty among technology users (Gangwar, 2015). However, the current study's findings did not align with other research that found complexity was a significant issue related to the adoption of new technology. These include, for example, Harfoushi et al. (2016), Carter and France (2005), Tornatzky and Klein (1982), AL-Madhagy (2018), and Low et al., (2011). The reason for this rests in the fact that most respondents said that they thought using a cloud-based system would be easy, thought that they could learn how to use a system quickly and that it would not require much mental effort. Because of this, complexity was not an issue. The Intention to Adopt a cloud-base system was significantly associated with Innovative Behavior, and leadership had a significant moderating effect on innovative behaviour. As in other studies, leadership support was found to be a critical element in creating and maintaining a culture of innovation is key. As in other studies, leadership support was found to be a critical element in creating and maintaining a culture of innovation is key. The results also indicate that the role of leaders is considered a pivotal role when implementing technology, as supporting leadership, understanding technological complexity, and employee reaction to implementing the relevant technology is of great importance (Demircioglu & Van der Wal, 2021). The focus on innovative methods in human resource management technology by leaders makes them the primary influencers for the formulation and implementation of cloud computing. Leadership support promotes employee innovation by inspiring employees to improve performance and reach organizational goals (Nassoura and Hassan). A leader is significant in reassuring employees that new technology can help them to improve their performance (Hossain et al., 2011). Leaders in any organisation play one of the most significant and vital roles in motivating and shaping an employee's behaviour towards innovation. All relationships in the model had between small and moderate effect sizes. The results showed that 76.2% of the Intention to Adopt cloud be estimated by utilizing the constructs in the model.

Research Implications

Researchers are still investigating the salient factors that lead to the intention to adopt Cloud-based HRMS in SMEs in Jordan. The cloud computing paradigm remains new to most Jordanian organizations, and pertinent studies providing a comprehensive review of the usage of technologies in HRM in Jordan are generally lacking. This study filled a need to exert more effort to extract factors impacting cloud computing adoption in a human resource management system among SMEs in Jordan. This current research considered TPB and the DOI framework, with TPB as the underpinning theory and DOI as the supporting theory. Few studies have adopted TPB theory as a theoretical background. Few studies have integrated TPB theory with DOI theory, and fewer still studies have examined the adoption of cloud technology in Jordan. The results of this study have several practical implications. First, because compatibility is an important issue, managers should carefully consider the relationship of legacy systems before adopting any new cloud-based HR management systems. They should choose systems that are compatible with existing systems. Second, the relative advantages of a new system should be articulated. Third, leadership support is critical in adopting a new system. Managers, including top management, should stress the need to use a system and articulate its advantages. Fourth, the organization's culture should encourage the development of innovative behaviour through a rewards system.

Based on the findings and conclusions drawn, suggestions for further research can be made. First, the study focused on SMEs in Amman, Jordan. Thus, similar research should be conducted on large organisations in Jordan, as they have different contexts and financial resources. Second, a study focusing on different regions would provide more robust results. These could be conducted across Jordan or in other Arab states. Third, the present research used a quantitative method for collecting and

analysing the data. Future investigations could use qualitative techniques like in-depth interviews to develop a thicker, richer understanding of the issues involved. Fourth, longitudinal studies should be conducted to determine how the impact of the independent variables change over time.

Practical Implications

The results of this study have several practical implications. First, because compatibility is an important issue, managers should carefully consider the relationship of legacy systems before adopting any new cloud-based HR management systems. They should choose systems that are compatible with existing systems. Second, the relative advantages of a new system should be articulated. Third, leadership support is critical in adopting a new system. Managers, including top management, should stress the need to use a system and articulate its advantages. Fourth, the organization's culture should encourage the development of innovative behaviour through a rewards system.

CONCLUSION

This study aimed to identify factors affecting the adoption of cloud-based HRMS on the innovative behavior and the role of leadership support as a moderating variable in SMEs in Jordan. This study included companies in the information and communications sector. The sample size for this study was 354. The results of the study showed an effect of the intention of adopting cloud human resources management in enhancing the innovative behavior of employees in small and medium-sized companies in Jordan. The results of the study showed that compatibility and relative advantage were all significantly related to the adoption of new technology. It was also shown that there is a role for leadership support in promoting innovative behavior. This is due to the importance of HR in the organization's commitment to work efficiently and effectively and with tools and data to make the right decisions and demonstrate value, as HR professionals are now among the most dynamic people in the senior workforce. By gaining a deeper understanding of the cloud and digital technology. The study recommends the need for Jordanian small and medium-sized companies to adopt a unified plan and procedures for the use of cloud computing technologies, especially with regard to human resource management. As well as continuing to adopt innovative behaviors through cloud computing, as the results of the study showed that there is a role for the use of cloud computing in human resources management in improving innovative behavior, with emphasis on the importance of providing all means and procedures that ensure information security, especially since human resources data It is considered sensitive and confidential data, and therefore needs high protection measures.

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