

How do E-HRM Practices Affect Environmental Performance? The Role of E-HRM Performance and Job Satisfaction

Azam S.C.M¹, Thevanes N², Arulrajah A.A³

Eastern University, Sri Lanka ¹
caderazam@gmail.com, nadesthev@gmail.com., aantonarulrajah@yahoo.com

ABSTRACT

This study aims to examine the relationships among e-HRM, e-HRM performance, job satisfaction, and environmental performance by employing data collected from 176 employees of five selected commercial banks operating in the Batticaloa district of Sri Lanka. In addition, the study investigates the mediating effects of e-HRM performance and job satisfaction on the relationship between e-HRM and environmental performance. The data analysis using structural equation modeling revealed positive and statistically significant relationships between the four study variables. In addition, the study found that e-HRM performance and job satisfaction partially mediate the relationship between e-HRM and environmental performance. The main contribution of this study is to reveal how e-HRM influences environmental performance in the context of the Sri Lankan banking sector.

Keywords: e-HRM; employee satisfaction, environmental performance, Sri Lanka

INTRODUCTION

Organizations are currently concentrating more on the adaptation of information technology (IT) in various organizational functions to accomplish substantial organizational advancements. Snell, Stueber and Lepak (2002) pointed out that IT could reduce administrative costs, increase productivity, reduce response times, improve decision-making and improve customer service, which are essential to achieving organizational strategic goals. Human Resource Management (HRM) is seen as a crucial strategic partner for implementing organizational strategies that give organizations a significant advantage in a highly competitive business environment (Opatha, 2019). Information and Communication Technologies (ICT) advancement, coupled with an ever-increasing demand for HRM functions to be more efficient, effective, and capable of supporting the strategic goals of every business function, has led to the adoption of electronic human resource management (e-HRM) (Wahyudi and Park, 2014). Lately, e-HRM has been defined as a “set of ‘configurations of computer hardware, software and electronic networking resources that enable intended or actual HRM activities (e.g. policies, practices and services) through coordinating and controlling individual and group-level data capture and information creation and communication within and across

organizational boundaries” (Marler and Parry, 2015, p. 2). Organisations invest in e-HRM by buying into its potential of strategically transforming the HR function to support to the achievement of organizational goals and objectives (Iyer, 2019). Bondarouk and Ruel (2009) found that there are essentially three goals related to the adaptation of e-HRM in an organizational context namely (1) reducing costs, (2) improving HR services and (3) improving HR strategic orientation. Due to these benefits, contemporary organizations are intending to adopt the e-HRM to enhance the strategic contributions of HRM in organizational development.

In Sri Lankan context, the banking sector is of paramount importance to ensure the economic development of the nation (Central bank report, 2021). Especially, banks play an essential role in the financial system since they provide liquidity to the entire economy while also modifying the risk characteristics of assets (Wijesinghe and Pallearachchi, 2022). The banking industry is expected to become more digital in the future. In this respect, almost all Sri Lankan banks are moving from conventional banks to online banks due to the rapid development of information technology. In this context, the Sri Lankan banking sector has incorporated e-HRM as one of the digital initiatives to manage their human resources effectively and efficiently (Pratheepan and Arulrajah, 2012) which ultimately yields the benefit of banking productivity and performance.

Shaumya and Arulrajah (2018) conducted a study to find out the relationship between e-HRM and environmental performance in Sri Lankan banks. The findings of the study revealed that e-HRM practices which are incorporated in Sri Lankan banks can improve the environmental performance of banks. Bag et al. (2021) revealed that e-HRM systems improve the firm performance, especially from the cost efficiency and customer satisfaction perspective. A study conducted by Marler and Fisher (2010) suggested that e-HRM investments help to reduce costs by restructuring HRM operations, advancing efficiency by improving the quality of HRM services and transforming HRM functions into a strategic business partner. In their study, Ruel and Kapp (2012) pointed out that e-HRM contributes to improving organizational effectiveness and efficiency. Parry (2012) conducted a large-scale survey across 12 countries and revealed that e-HRM can transform HRM from transactional work to more strategic and value-added activities. Strohmeier (2009) suggested that the application of e-HRM can produce diverse positive consequences for organizational development such as reducing costs, speeding up processes, improving quality, and even gaining a more strategic role for HR within the

organisation. Empirical findings of Bondarouk and Ruel (2009) proved a positive relationship between e-HRM applications and the perceived effectiveness of HRM. Roehling et al. (2005) stated that e-HRM facilitates employees to access everything they need to change and manage their personal files, plan their development, process financial documents and apply for new jobs. A recent study conducted by Alshibly and Alzubi (2022) stated that e-HRM practices contributed to improving the job satisfaction of employees during the covid-19 period by allowing them to remote e-working.

According to the above recent e-HRM research findings, e-HRM has a positive relationship between e-HRM performance, job satisfaction and environmental performance. In this context, a number of studies revealed the relationship between e-HRM and e-HRM performance (eg., Bondarouk et al., 2009) Parry, 2011; Lin 2011; Bag et al., 2021). However, only a few existing studies revealed the relationship between e-HRM and job satisfaction (eg., Iqbal et al., 2017); e-HRM and environmental performance (eg., Shaumya and Arulrajah, 2018). However, most of the studies were carried out from the perspective of developed countries. Sri Lankan banks are focused on the widespread adoption of e-HRM probably based on expectations of positive consequences for e-HRM under their digitization agenda. However, only a few studies were conducted in the banking industry regarding e-HRM's positive consequences (eg., Pratheepan and Arulrajah, 2012; Shaumya and Arulrajah, 2018). From the researchers' point of view, there is an empirical gap and contextual gap exists regarding the relationships among the e-HRM, e-HRM performance, job satisfaction and environmental performance holistically. The existing literature on e-HRM mainly deals with the positive consequences of e-HRM rather than its relationship with job satisfaction and environmental performance. Bag et al (2021) suggested that future researchers need to conduct studies on how e-HRM systems can improve environmental performance. Myllymaki (2021) revealed that e-HRM contributions have not extended far beyond the frames characterising the general HRM research. Thus, this study focuses on the relationships among e-HRM, e-HRM performance, job satisfaction and environmental performance. In the existing literature, these relationships are not clearly explored and remained unclear. Therefore, this study fills these relationship gaps in the existing literature. Further, there is no empirical evidence concerning the mediating effect of e-HRM performance and job satisfaction on the relationship between e-HRM and environmental performance in the Sri Lankan context and perhaps the international contexts. So, this study may be considered a pioneering study in the realm of e-HRM in testing the mediating role of e-HRM performance and job satisfaction. The problem addressed for the study is: Are e-HRM,

e-HRM performance, job satisfaction and environmental performance positively related and the positive relationship between e-HRM and environmental performance mediated by e-HRM performance and job satisfaction?

Objectives of the Study

- To examine the relationship between e-HRM and selected variables namely e-HRM performance, job satisfaction and environmental performance.
- To test the mediating effect of e-HRM performance on the relationship between e-HRM and environmental performance
- To test the mediating effect of job satisfaction on the relationship between e-HRM and environmental performance

Conceptualization of Variables

E-HRM

The strategic contributions of HRM are being increased by contemporary organizations in an effort to boost their business performance. From this perspective, e-HRM may be seen as a substantial improvement in the field of human resource management with the potential to enhance HRM's strategic contribution. A review of the literature shows various definitions of EHRM as shown in Table 1.

Table 1: Definitions of E-HRM

Author	Definition
Ruel, Bondarouk and Looise (2004)	EHRM is defined as “a way of implementing HRM strategies, policies, and practices in organizations through the conscious and directed support of (and with the full use of) web technology-based channels”.
Voermans and Veldhoven, (2007)	E-HRM is defined as “the administrative support of the human resource function in organizations by using Internet technology”.

Strohmeier (2007)	E-HRM is defined as “an application of IT for both networking and support by at least two individual or collective actors in their shared performing of HRM activities”.
Ruël, Bondarouk, and Van der Velde (2007)	E-HRM is defined as “a way of implementing HRM strategies, policies, and practices in organizations through a conscious and directed support of, and/or the full use of, web technology-based channels”.
Bondarouk and Ruel (2009, p.507)	E-HRM is defined as “an umbrella term covering all possible integration mechanisms and contents between HRM and technologies aiming at creating value within and across organizations for targeted employees and management”.

Many definitions of e-HRM exist based on the aforementioned literature. However, prior research in the area of e-HRM has largely cited the definition proposed by Bondarouk and Ruel (2009, p. 507): an umbrella term covering all possible integration mechanisms and contents between HRM and technologies aiming at creating value within and across organizations for targeted employees and management. In light of this, researchers opted to use it as the working definition of e-HRM for this study.

Job Satisfaction

Numerous studies have been conducted on the concept of job satisfaction in relation to organizational behaviour and job design (Mustafa & Ali, 2019). Various researchers have provided definitions for job satisfaction. Luthans (1998) and Lim (2008) give a comprehensive definition of job satisfaction as a “pleasurable or positive emotional state resulting from the appraisal of one’s job or job experience”. According to Locke (1976), job satisfaction is referred to as “the employees’ pleasant and positive emotional status which experiences toward the company and the job and is explained by a comparison between actual results and expected results”. Job satisfaction refers to “how employees perceive their jobs” (McShane & Von Glinow, 2005). According to Hoboubi et al. (2017), job satisfaction relates to an employee having an effective direction towards their job/work. Using the aforementioned definitions as a basis, researchers defined job satisfaction as a favourable emotional state that results from an employee's perception of how their employer and job meet or exceed their expectations.

Employees will probably be satisfied when the actual results from the job or organization meet or beyond their expectations.

E-HRM Performance

E-HRM results in e-HRM performance. This study considered productivity and cost-efficiency as the e-HRM performance. Productivity is a rich blend of efficiency and effectiveness (Khan, 2003) and without it, there is no achievement of organisational goals (Ali et al., 2011). Productivity is defined as “an increase in output per unit of input employed”. This means that for every input of labour, capital or management employed, an extra or additional output is achieved. It is ideal that every organization seeks to experience (Brooks and Fredrick, 2005). Cost efficiency refers to how a bank seeks to reduce input costs to the lowest level to provide customer service. In other words, banks need to adjust their service strategy by considering the price of inputs in order to cut costs. Therefore, cost efficiency is calculated based on the combination of input-oriented service efficiency and input–cost allocative efficiency (Nguyen and Pham, 2020).

Environmental Performance

Organizations are increasingly required to extend their effort to ensure environmental performance due to adverse environmental impacts including climate change, global warming, and others. Further, besides that, an increasing number of environmental laws and pressures from the external environment have raised organizations’ awareness of environmental performance (DiPietro, Cao, & Partlow, 2013). As a result, Sri Lankan banks are still firmly dedicated to executing environmental management programs to maintain environmental sustainability in addition to their economic benefits (Jayaranthe et al., 2020). According to Judge and Douglas, (1998), environmental performance is defined as “organizations effectiveness in meeting and exceeding society’s expectations in the concern over the natural environment”. This study considered it as the working definition of the environmental performance of banks.

LITERATURE REVIEW AND HYPOTHESIS DEVELOPMENT

E-HRM and Environmental Performance

Thevanes and Arulrajah (2017) identified e-HRM as one of the sustainable HRM practices that can equally contribute to an organisation's economic, social and environmental performance. E-HRM significantly contributes to reducing the organisation's carbon footprint by moving from a paper-based culture to an electronic-based culture (Thevanes and Arulrajah, 2017). According to Ahmad (2015), paperless work and energy conservation within the organization can be treated as the driving forces to improve the environmental performance of the organization. In this context, certain HRM activities such as paid-time accruals and balances, benefits participation and coverage, personal information, information about a job or the workplace, time sheets and work schedules, foreign transfers, payroll changes, and retirement plans are required a lot of paperwork (Iyer, 2019). Through the implementation of e-HRM, it is possible to reduce the paperwork associated with the aforementioned HR activities. According to Ibrahim and Yusoff (2015), e-HRM significantly contributed to improving the paper-less HRM capabilities among agencies through the electronic distribution of human resource policy manuals and circulars electronically. Further certain e-HRM practices, such as e-recruitment and e-selection, e-communication and e-training may be considered as environmentally friendly practices that can reduce organizations' carbon footprint by paving the way to reduce paper waste and energy conservation. In covid-19, e-HRM practices improve the effectiveness of remote electronic work by providing real-time information-based communication, interactive work environments, e- training, and e-performance assessments that can also benefit organizations in improving environmental performance by enabling organizations to save electricity, water, and paper use within the organizational contexts by allowing employees to work from home. The empirical findings of the study conducted by Shaumya and Arulrajah (2018) revealed that there is a positive and significant relationship exists between e-HRM practices and environmental performance in the banking context. E-HRM system relates itself to important societal, environmental and ethical considerations in organizations. Due to the implementation of e-HRM systems, the amount of paperwork required for HR activities has significantly decreased. Furthermore, e-communication and e-training, and e-knowledge management considerably reduce carbon emissions by minimizing transportation. Efforts towards implementing the e-HRM system is meaningless if there is no improvement in the environmental performance of organizations. Based on the above arguments this study proposes the first hypothesis as;

H₁: E-HRM is positively and significantly related to environmental performance

E-HRM Practices and E-HRM Performance

This study considered productivity and cost-efficiency as the dimensions of e-HRM performance. In this context, several studies stated that e-HRM practices enhance the productivity and cost-efficiency of organizations (eg., Chiarini, 2017; Guerci et al., 2019). According to Guerci et al. (2019) revealed that the implementation of an e-HRM system within the organization leads to the automation of HR activities which leads to cost control and enhances the sustainable efficiency of the organization. E-recruitment can reduce recruitment costs and provide more candidates with better recruitment processes (Marchington & Wilkinson, 2005). It is highly possible to reduce training costs and improve the productivity of employees through the implementation of e-HRM practices namely e-training and e-learning (Thevanes and Arulrajah, 2017). In addition, e-HRM may be utilized to offer the organization to provide accurate information which will be the base for decisions on how to effectively manage its employees (Parry, 2011). E-HRM improves the HRM strategic involvement in organizations by saving time by speeding up the operational HRM activities which deal with basic activities related to the administration of HR activities like payroll and personal data records of employees (Marler and Parry, 2016). Further researchers argue that e-HRM significantly contributes to improving labour productivity (Marler and Parry, 2016; Parry, 2011; Shrivastava and Shaw, 2003; Snell et al., 2002) which drives organizational productivity. The use of e-HRM as a more efficient way of performing administrative HRM tasks may lead to a need for lower numbers of HR staff as the technology can perform simple tasks quickly and accurately (Parry, 2011). In overall, e-HRM practices significantly contribute to decreased organizational costs, enhanced communication between managers and employees, improve HR strategic involvement, improve quality and shortened processing time for HR activities in organizations (Fındıklı and Bayarçelik, 2015; Strohmeier, 2009; Marler and Parry, 2016). Ultimately, e-HRM practices ensure the effective and efficient utilization of human resources which turn in enhances productivity and significantly reduces organizational costs. A study conducted by Bag et al. (2021) proves that ability-enhancing HRM practices, opportunity-enhancing e-HRM practices and motivation-enhancing e-HRM practices can improve the firm performance by controlling the cost and improving the net productivity of organizations. Ruel et al. (2006) found evidence that one of the main goals of e-HRM was to produce efficiency gains or cost reductions by reducing headcount and removing administration. Hence, the implementation of e-HRM practices results in better e-HRM performance. Accordingly, the second hypothesis of this study is formulated as:

H₂: E-HRM is positively and significantly related to e-HRM performance

E-HRM and Employee Satisfaction

Essentially, HRM practices must be improved in order to increase the job satisfaction of employees (Ashton, 2017). Furthermore, Chow et al. (2007) noted that the performance of HRM practices has a crucial impact on boosting the job satisfaction of employees. In this context, Wickramasinghe (2010) conducted a study on e-HRM in the Sri Lankan context and found that e-HRM implementation in an organization can be viewed as a form of innovation in HRM, which yields several benefits to the organizations and increases employees' job satisfaction. HR service quality is an important value-creating factor for employees which leads to improved job satisfaction of employees (Iqbal et al., 2017). In this sense, Bondarouk et al. (2017) stated that contemporary organizations use e-HRM to improve the quality of their HR services to employees. Providing employees with the ability to autonomously do HR-related tasks including checking their leave eligibility, submitting a leave request, and monitoring their payroll is a major component of e-HRM systems that have been shown to dramatically increase employees' job satisfaction in contemporary organizations. E-HRM systems create unique opportunities for employees to improve their competencies and attitudes to successfully perform their job roles through e-learning and e-training, as well as provide transparent performance management through e-performance management, thereby contributing to an increase in employee satisfaction. Further, Thevanes and Arulrajah (2017) stated that e-HRM contributes to improving the work-life balance of employees by allowing the employees get to attend training and meetings in their workplaces without travelling to the head offices through e-training and e-communication methods and thus contribute to job satisfaction of employees. Based on the above empirical findings, theoretical and logical arguments, researchers hypothesize that:

H₃: E-HRM is positively and significantly related to the job satisfaction of employees

E-HRM Performance and Environmental Performance

E-HRM performance is the result of e-HRM implementation within the organization. Adaptation of the e-HRM system contributes to fulfilling the economic, social, and technological environmental requirements of the organization (Margherita, 2021). Researchers argue that e-HRM improves labour productivity by improving the quality of HR services

(Parry, 2011; Snell et al., 2002). Further, Wickramasinghe (2010) pointed out that, the e-HRM system allows HR employees to reduce their time spent on manual clerical tasks. E-HRM leads to cost savings through certain ways such as reduction of HR headcount and reduce paper which is possible through the automated form of HR services (Garmendia et al., 2020). In general, traditional HRM activities such as recruitment, selection, training, compensation, performance management and health and safety are done by using the paper-based approach. E-HRM has transformed activities traditional methods of activities into automated services which leads to improving profitability by reducing costs and improving the productivity of organizations (Lin, 2011; Kim et al., 2020) as well as these e-HRM practices may be considered eco-innovation in HRM as it significantly eliminates paper usage and energy conservation (Stone and Dulebohn, 2013). As HR services are fully done electronically it significantly contributes to creating a paperless culture within the organization. In addition, organizations can reduce the HR head counts which paves the way to improve environmental performance by reducing water, electricity, and paper usage. E-HRM practices such as e-communication, e-training, e-learning and etc significantly contribute to reducing costs by reducing stationery costs and transportation costs and other administrative costs. On the other hand, reducing transportation and paper usage are the indicators to reduce the carbon footprint of organizations. Thus, researchers postulate the following hypothesis in light of the aforementioned empirical results and theoretical and logical arguments.

H4: E-HRM performance is positively and significantly related to the environmental performance

Job Satisfaction and Environmental Performance

According to Wehrmeyer (1996), 'if a company is to adopt an environmentally-aware approach to its activities, the employees are the key to its success or failure'. In other words, employees' active participation and commitment are essential components to reaching the environmental goals of an organization. In this context, Opatha (2009) pointed out that the generic purpose of HRM is to generate and retain an appropriate and well-satisfied workforce, which gives the maximum individual contribution to organizational success. According to the above statement, it is possible to reveal that the job satisfaction of employees is a driving force to accelerate the environmental performance of organizations. A study conducted by Daddi et al. (2019) proves that job satisfaction of managerial employees positively impacts environmental performance including eco-innovation implementation. In general, satisfied employees are always willing

to extend more organizational citizenship behaviour for the environment which significantly contributes to enhancing the environmental performance of the organization. Thus, we hypothesize that,

H₅: Job satisfaction is positively and significantly related to the environmental performance of the organization.

The linkage between e-HRM practices and Environmental Performance through e-HRM performance

E-HRM performance is the end outcome of e-HRM. In this context, several researchers pointed out that e-HRM practices contribute to enhancing the productivity and cost-efficiency of organizations (eg., Lin, 2011; Kim et al., 2020). By reducing employee travel and transportation, many e-HRM activities, including e-recruitment and selection, e-communication, e-training, and development, contribute to a lower carbon footprint. For instance, e-recruitment enables the data storage of several curriculum vitae (s) and allows the process to be location-independent (Tong, 2009). Based on the aforementioned literature, e-HRM systems can be viewed as innovative HRM approaches that help modern organizations become more productive and cost-effective by providing the option to perform HRM tasks and responsibilities electronically, as opposed to manually, which requires a great deal of paper and energy. Thus, it is possible to conclude that, e-HRM practices contribute to e-HRM performance (cost-efficiency and productivity) which paves the way to better environmental performance by creating a paperless and energy-efficient culture within the organization. Thus, we hypothesize that;

H₆: E-HRM significantly mediates the relationship between e-HRM practices and environmental performance.

The Linkage between E-HRM and Environmental Performance through Job Satisfaction

Based on the research references above, it is possible to conclude that e-HRM practices enable improving the environmental performance of organizations by applying paperless and energy-conserving HRM. According to Harvey (2010), employees' involvement and active participation in environmental performance programmes are crucial. In this context, Kirk (1998) pointed out that organizations require satisfied employees to actively participate and be involved in the environmental initiatives of the organization. Further, researchers contend that e-HRM practices can be treated as the

driving force to accelerate the job satisfaction of employees (Wickramasinghe, 2010). Thus, organizations may uplift the job satisfaction of employees via the adaptation of e-HRM practices which pave the way to improve the environmental performance of the organization. This logical belief was directed to formulate the sixth hypothesis of this study.

H7: Job satisfaction significantly mediates the relationship between e-HRM practices and environmental performance

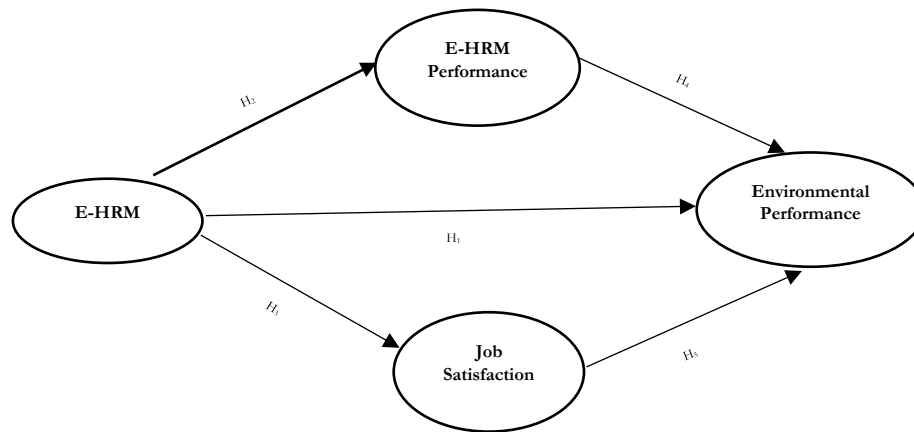


Figure 1: Theoretical Framework

Underpinning Theories

Institutional Theory

According to institutional theory, organizational actions are influenced by external forces. According to institutional theorists, organizations must adapt to and be compatible with the local institutional context to obtain legitimacy and ensure their survival (DiMaggio and Powell 1983). In this context, institutional actors (eg., government, environmentally conscious customers, community and environmental target groups and industry associations) pressured organisations to be concerned about the environment (Delmas & Toffel 2004). Thus, organizations are under pressure to adopt the e-HRM system, which is considered the significant driving force to accelerate the environmental sustainability of organizations.

Stakeholder Theory

Stakeholder theory is originally developed by Edward Freeman (1984). According to the stakeholder theory, the survival and success of an organisation depend on its ability to generate

satisfaction for all its stakeholders, not just shareholders (Clarkson, 1988). Kolk and Pinske (2006, p.60), proposed that stakeholders are ‘any group or individual who can affect or is affected by the achievement of a corporation’s purpose’. The main stakeholder groups include shareholders, employees, customers, the local community and the environment (Lepoutre and Heene 2006). At this juncture, through the implementation of e-HRM, an organization can satisfy the employees (via improving the quality of HR services), customers (e-HRM leads to job satisfaction which in turn leads to customer satisfaction), shareholders (e-HRM leads to profitability through enhancement of productivity and cost-efficiency), and local community (through reducing the carbon footprint of organization).

System Theory

The general system theory developed originally by Bertalanffy that explains how something can be materialized through taking inputs, processing and giving outputs. The system theory is useful in providing a framework in which one study complex variables that influence one another. Therefore, researchers developed the conceptual framework by adapting the open system model of system theory. This theory provides strong support for the framework given in Figure 1: Based on the systematic perspective, improving e-HRM performance and job satisfaction of employees through e-HRM practices is considered as the input of the system, enhancement of e-HRM performance and job satisfaction treated as the processing part of the system and finally environmental performance considered as the output of the system.

METHODOLOGY

Participants and Procedure

Due to increasing competition in the banking sector and the speedy development of information and communication technologies, digital banking is expanding at a quicker rate (Jeyasekara, 2021). Undoubtedly, digital banking is the way of the future in Sri Lanka. Yet, the pandemic has helped to accelerate this transformation even further. In this context, Sri Lankan banks focus more on the adaptation of digital HRM known as e-HRM to perform HR activities efficiently and effectively under the umbrella of digital banking. Thus, the sample for the study was selected from the banks that use e-HRM systems. The researchers chose five commercial banks based on their e-HRM system implementation, as announced on their websites and annual reports. The purpose of this study is to examine the proposed conceptual model on

employees who have the knowledge, experience and familiarity with e-HRM systems. Thus, a quantitative research method with stratified random sampling was used to deliberately reach participants working at five commercial banks operating in the Batticaloa district of Sri Lanka. The total population for the study was about 442 employees from banks operating in the Batticaloa district of Sri Lanka. There were 210 questionnaires delivered to the banks' employees based on a stratified random sampling method. However, only 176 employees responded to the questionnaire, yielding a response rate of 83.81%. Participants' demographic attributes are shown in Table 2.

Table 2: Participants' Demographic Attributes

		Frequency (N=176)	%
Age	18-28 years	88	50
	29-38	73	41.5
	39-48	13	7.4
	Above 49 years	2	1.1
Gender	Male	102	58
	Female	74	42
Educational level	Advance Level	118	67
	Graduate	48	27.3
	Postgraduate	10	5.7
Working Experience	02 year and below	32	18.2
	3-5 years	50	28.4
	6-8 years	46	26.1
	Above 8 years	48	27.3

Instruments

Unless otherwise stipulated, a five-point Likert scale (1= 'strongly disagree', 5 = 'strongly agree') was utilized to solicit participants' responses. E-HRM was measured through an eighteen-item scale from Pratheepan and Arulrajah (2012) and Hooi (2006). A six-item scale adapted from Adli, Gharib, Hakami and Pourmahdi (2014) was utilized to assess job satisfaction. E-HRM performance was measured through a ten-item scale, which was the

adaptation of Adli, Gharib, Hakami and Pourmahdi (2014). Environmental performance was estimated via Bangwal, Tiwari and Chamola (2017) five-item scale.

Analytical procedures

Structural Equation Modeling (SEM) was used to analyze the quantitative data because it allows for the estimate of complicated relationships, especially when there is a mediating impact (Hair et al., 2006). This technique is appropriate here because multiple relationships between latent constructs measured on multiple survey items are tested simultaneously, which enhances the strength of the test over a conventional regression method (Miller and Tsang 2011).

Anderson and Gerbing's (1988) comprehensive two-stage SEM analytical procedure was followed in the data analysis, using the AMOS 23 software to test the structural equation model. The first stage was a confirmatory factor analysis of the measurement model. This process assesses the discriminant validity of the measurement model as well as potential common method bias (CMB). The second stage estimated structural models for hypotheses testing. Hypotheses were tested in sequential steps. The main effect hypotheses (H₁ to H₅) were tested in a baseline structural equation model. The mediation effects of e-HRM performance (H₆) and job satisfaction (H₇) were tested by adding latent variable interactions to the baseline model.

RESULTS

Measurement and Model Tests

Table 3: Measurement items and loadings

Constructs and Measurement Items	Cronbach's alpha value	Standardized Loadings
E-HRM practices (recruitment and selection+ employee data and pay management+ performance management+ Training and Development + Communication + knowledge management + operational and other HRM activities) (CR: 0.78, AVE:0.58)	0.886	
<i>Recruitment & Selection</i>		
My bank posts a "hiring needs" list on its website.		0.73

My bank always uses a recruiting website/job board to identify potential job candidates.		0.76
In my bank, the candidates can apply for job vacancies by using online recruitment (e-mail) based system.		0.66
<i>Employee Data and Pay Management</i>		
My bank uses web based employee record keeping system (having all personal file in digital form) to facilitate employee		0.80
My bank uses electronic/computer-based payroll system (salary, overtime, claims and other benefits).		0.83
In my bank, the employee can apply for loan through online.		0.61
<i>Performance Management</i>		
My bank uses on-line/web based performance evaluation system.		0.73
In my bank, most of the data about employees' performance is stored in a computer that can be retried later on when evaluating employees		0.72
<i>Training and Development</i>		
In my bank, the employees can access e-learning facilities		0.84
In my bank, the employee can participate in e-conference training (especially employees in outstation branches).		0.68
<i>Communication</i>		
In my bank, the employees can suggest their progressive ideas through online.		0.80
In my bank, the employees can use intranet facilities/system to information exchange and day to day speedy communication with management.		0.81
My bank uses various electronic communication channels (e-newsletter, e-magazine and etc.).		0.81
<i>Knowledge Management</i>		
My bank uses the internet/web based system that facilities knowledge sharing and knowledge management		0.74
My bank uses online solution program to discuss day to day challenges (help desk		0.79

Operational and Other HRM Activities		
In my bank, the employees can apply for leave through online.		0.65
In my bank, the employee can request for transfer through online		0.78
In my bank, the employees can use on-line/web based promotion		0.77
Job satisfaction(CR: 0.89, AVE: 0.45)	0.829	
E-HRM tools provide current information that is beneficial to employee related decision making.		0.65
E-HRM tools are essential to the role of HR practitioners becoming more strategic.		0.71
Fewer errors occur when employee use e-HRM tools.		0.56
HR professionals, with the help of e-HRM tools, can play more of an advisory role to line management.		0.72
E-HRM information and decision-making tools promote my ability to make decisions.		0.70
The use of e-HRM tools has led to the automation of routine HR works.		0.70
E-HRM Performance (Productivity + Cost Efficiency) (CR: 0.86, AVE: 0.40)	0.845	
<i>Productivity</i>		
E-HRM tools can be used to improve underlying business processes.		0.72
E-HRM tools have allowed for higher quality HR services.		0.66
E-HRM tools allow me to work more productively.		0.65
E-HRM tools improve quality of services.		0.65
HR services have been streamlined and standardized using information technology.		0.59
<i>Cost Efficiency</i>		
E-HRM activities reduce cost spent on transactional tasks.		0.62
E-HRM tools allow me to work more cost efficiently.		0.59
The use of e-HRM tools is more cost effective than traditional, manual HR practices.		0.65

Less staff members are required when using e-HRM tools.		0.75
The advantages of e-HRM are more than its cost.		0.72
Environmental Performance (CR: 0.87, AVE: 0.43)	0.753	
E-HRM significantly reduce the usage of paper and other materials (or those that cause degradation) on the environment.		0.62
E-HRM discourages the internal and external resource wastages.		0.59
E-HRM significantly reduces the environmental problems through best HR practices.		0.65
E-HRM directly or indirectly reduces input resource consumptions.		0.75
E-HRM makes my work environment more comfortable.		0.72
<i>Full model fit index</i> <i>CMIN/df = 1.450; CFI = 0.90; TLI = 0.884; IFI = 0.90;</i> <i>RMSEA: 0.051</i>		
<i>Note: An item of operational and other HRM activities was deleted as its standardized factor loading was below the threshold level (<0.5)</i>		

To assess the measurement model, all constructs were subjected to confirmatory factor analysis (CFA) (maximum likelihood estimation) using AMOS 23.0. Accordingly, five clusters of fit indices were examined to decide on the goodness-of-fit for the current dataset. A value less than 5 for the relative chi-square (CMIN/df) indicates a good model fit (Schumacker and Lomax 2004). For the “incremental fit index” (IFI) and “comparative fit index” (CFI), values greater than 0.90 reflect a good fit (Bentler 1990). The “root mean square error of approximation” (RMSEA) with a value less than 0.08 represents a considerable model fit (Marsh, Hau, and Wen 2004). Finally, the “Tucker–Lewis index” (TLI) with a value close to 1 reflects a good fit (Bentler 1990). The resulting fit statistics were all above the minimum acceptable level. Chi-square/degree of freedom (CMIN/df) = 1.450; comparative fit index (CFI) = 0.90; incremental fit index (IFI) = 0.90; root mean square of error of index (RMSEA) = 0.051; and Tucker–Lewis index (TLI) = 0.884. All the factor loadings are above 0.5 (as shown in Table 1). Initially, Cronbach’s alpha, composite reliability (CR), and average variance extracted (AVE) were evaluated to test the reliability and validity of the study measures. As

displayed in Table 3, the alpha values ranged from 0.753 to 0.886, whilst their values of composite reliability ranged from 0.78 to 0.89. These values indicate the satisfactory reliability of the measures used. As shown in Table 3, AVE of e-HRM value is over the agreed-upon lower limit. However, job satisfaction, e-HRM performance and environmental performance have a lower convergent validity (AVE), but still have an acceptable level of composite reliability. Convergent validity is adequate when constructs have an average variance extracted (AVE) of at least 0.5 (Chin 1998). It is noted that high value of AVE for all the constructs are good, but this is unlikely to occur in real data. More common magnitudes in the social sciences are low to moderate communalities (or AVEs) of 0.40 to 0.70. Suppose an item has an AVE (communality) of less than 0.40. In that case, it may either (a) not be related to the other items, or (b) suggest an additional factor that should be explored (Velicer and Fava 1998; Costello and Osborne 2005). A study conducted by Wijekoon and Galahitiyawe (2016) also applied the same method in ensuring convergent validity. To test whether the study variables were distinct, Fornell and Larcker's (1981) suggestion was followed. As illustrated in Table 4, the squared root of AVE for each variable was higher than the values of all its correlations with other constructs. Thus, discriminant validity is ensured. Additionally, all correlations between constructs were less than 0.9, indicating that possible problems of multicollinearity were non-existent (Grewal et al., 2004). Hence, the reliability and validity of the measurements are assured.

Table 4: Descriptive statistics, correlations matrix, and squared root of AVE

	Variables	Mean	SD	1	2	3	4
1	E-HRM practices	3.99	0.73	0.76			
2	E-HRM performance	4.13	0.53	0.54	0.66		
3	Job satisfaction	4.01	0.58	0.34	0.65	0.67	
4	Environmental Performance	4.36	0.52	0.54	0.61	0.50	0.66
Significant at 10% level							

Source: Survey data

Hypothesis Testing

The hypotheses were tested in two steps of SEM analyses as discussed above. First a baseline model was tested the hypothesis H₁ to H₅. Mediation hypotheses (H₆ and H₇) were tested in two separate structural equation models to keep the mathematical integration process

computationally feasible. The statistical analysis supported all the hypotheses. Table 4 and 5 gives the findings of the hypotheses testing along with the goodness of fit measures of each structural model. The goodness of fit measures reported good model fit all three structural equation models. As displayed in Table 4, E-HRM demonstrated a significant, positive association with environmental performance ($\beta=0.54$, $p < .01$), e-HRM performance ($\beta=0.54$, $p < .01$) and job satisfaction ($\beta=0.34$, $p < .01$) lending support for hypotheses H₁, H₂, H₃ respectively. In addition, findings of the study revealed that e-HRM performance significantly and positively associated with environmental performance ($\beta=0.61$, $p < .01$). Furthermore, job satisfaction significantly and positively correlated with environmental performance ($\beta=0.50$, $p < .01$) which were supported the hypotheses H₄ and H₅ respectively

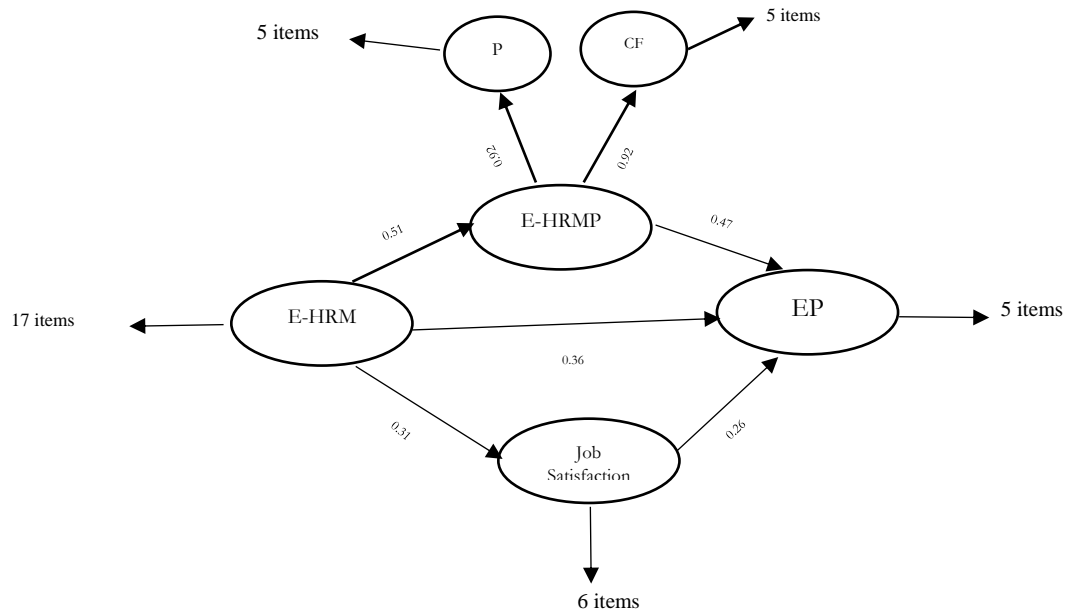


Figure 2: Main effect Structural Equation Model

Mediation analysis

H₆ and H₇ indicate the mediating effects of e-HRM performance and job satisfaction on the relationship between e-HRM and environmental performance. Bootstrap analysis was used to examine the mediating effects. The findings of the mediation analysis are illustrated in Table 6. In testing this mediation model, Baron and Kenny's (1986) method for testing mediation was followed.

Table 5: Hypothesis Testing using Path Analysis

Hypotheses		GOF Measures of the Structural Model					
Paths	Path coefficient	P value	CMIN/df	IFI	CFI	RMS EA	TLI
(H ₁) e-HRM environmental performance	0.365	0.000	1.669	0.842	0.839	0.062	0.827
(H ₂) e-HRM e-HRM performance	0.506	0.000					
(H ₃) e-HRM Job satisfaction	0.308	0.001					
(H ₄) e-HRM performance Environmental performance	0.467	0.000					
(H ₅) Job satisfaction Environmental Performance	0.258	0.001					
(H ₆) e-HRM performance environmental performance	0.330	0.000	1.595	0.880	0.878	0.058	0.867
e-HRM e-HRM performance	0.484	0.000					
e-HRM performance Environmental performance	0.633	0.000					
(H ₇) e-HRM practices environmental performance	0.500	0.000	1.570	0.903	0.901	0.057	0.890
e-HRM Job satisfaction	0.272	0.003					
Job satisfaction Environmental Performance	0.494	0.000					
Significant at 10% level							

Source: Survey Data

First Mediation Model

The first mediation model (H₆) examines the mediating effects of e-HRM performance on the relationship between e-HRM and environmental performance. In the first mediational model in the current study, the direct effects of e-HRM on environmental performance ($\beta=0.330$, $p < .01$), e-HRM on e-HRM performance ($\beta=0.48$, $p < .01$), and e-HRM performance on environmental performance ($\beta=0.633$, $p < .01$) were significant (see Table 5). After including the mediator (e-HRM performance) in the intended mediation model, the direct path linking e-HRM with environmental performance ($\beta=0.33$, $p < .01$) remains significant. Further, when “bootstrapping” with 2,000 sampling (resampling with replacement and empirically generating sample distribution, Hayes 2013) was carried out, the indirect path remains significant ($p < 0.01$). Drawing on the decrease of the path coefficients between e-HRM and environmental performance from 0.33 to 0.31 and both direct and indirect paths were significant (See Tables 5 and 6), the mediation of e-HRM performance between e-HRM and environmental performance is considered partial, lending support to H₆.

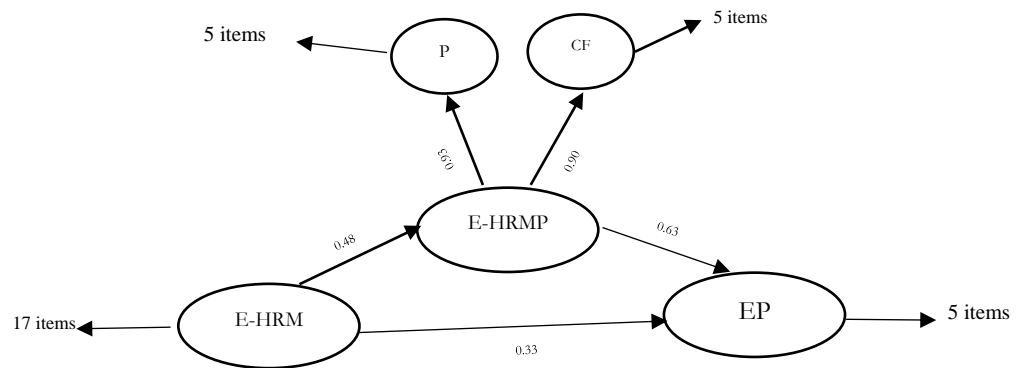


Figure 3: First Mediational Model (e-HRM performance as mediator)

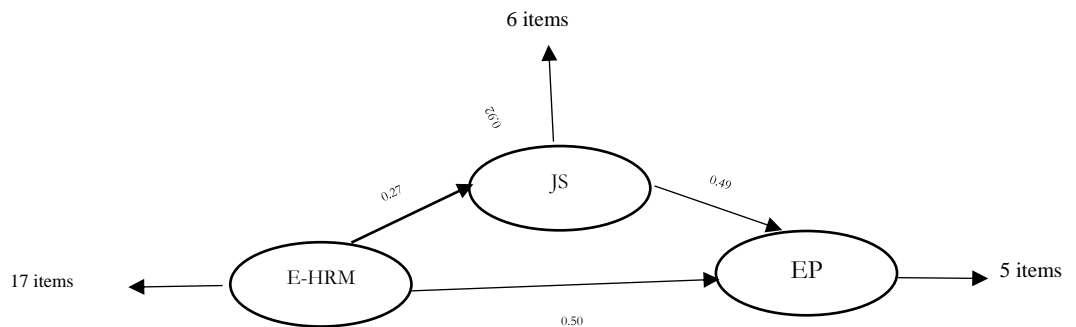


Figure 4: Second Mediational Model (Job satisfaction as mediator)

Second Mediation Model

Furthermore, second mediation model (H₇) examines the mediating effects of job satisfaction on the relationship between e-HRM and environmental performance. In the second mediational model in the current study, the direct effects of e-HRM on environmental performance ($\beta=0.50$, $p < .01$), e-HRM on job satisfaction ($\beta=0.27$, $p < .01$), and job satisfaction on environmental performance ($\beta=0.49$, $p < .01$) were significant (see Table 5). After including the mediator (job satisfaction) in the intended mediation model, the direct path linking e-HRM with environmental performance ($\beta=0.50$, $p < .01$) remains significant. Further, when “bootstrapping” with 2,000 sampling (resampling with replacement and empirically generating sample distribution, Hayes 2013) was carried out, the indirect path remains significant ($p < 0.01$). Drawing on the decrease of the path coefficients between e-HRM and environmental performance from 0.50 to 0.14 and both direct and indirect paths were significant (See Tables 5 and 6). These results provided supporting evidence for hypothesis (H₇) that e-HRM has an indirect impact on environmental performance via the mediating role of job satisfaction.

Table 06: Mediation Analysis

	Direct Effect		Indirect effect		Mediation		
	B	P	β	P	Lower bound	Upper bound	
Hypothesis 6	0.33	0.004	0.31	0.000	0.210	0.465	Partial mediation
Hypothesis 7	0.50	0.001	0.14	0.004	0.042	0.265	Partial mediation

Significant at 10% level

Source: Survey data

DISCUSSION

This study deals with four variables such as e-HRM, e-HRM performance, job satisfaction and environmental performance. The findings of the study revealed that e-HRM has a significant relationship with environmental performance of the banks. Recently, Sri Lankan banks have focused more on implementing the green banking concept in order to enhance their operations and become recognized as green bankers in order to adhere to ethical and legal requirements. E-HRM can be viewed in this light as one of the most important green banking initiatives since this significantly improves the environmental performance of banks by fostering energy and paper-saving culture. The findings of the study is consistent with the previous study conducted

by Shaumya and Arulrajah (2018) in selected commercial banks in Sri Lanka which revealed that e-HRM practices have a significant impact on banks' environmental performance.

Our findings suggest that e-HRM practices could help banks become more productive and cost-effective (e-HRM performance). A study conducted by Bissola and Imperatori (2014) found that effective implementation of e-HRM leads to improving the overall productivity of an organization. Further, a study conducted by Obeidat (2015) revealed that e-HRM practices reduce HR transaction costs. Since the majority of functional HRM activities are automated, the adoption of e-HRM has reduced the cost of HR functions (Amoako et al., 2022). A study conducted by Iqbal (2017) stated that e-HRM practices lead to improve the labour productivity through enhance the quality of HR services within the organization. Several e-HRM scholars suggested that organizations are intended to implement e-HRM systems to achieve three main goals such as (1) reducing cost, (2) improving HR services and (3) improving the strategic orientation (Stanton and Coovert 2004; Bondarouk, Ruel and Van der Heijden 2009). However, finding of the study conducted by Parry and Tyson (2011) found that e-HRM is mostly directed at cost reductions and efficiency increases in HR services, rather than at improving the strategic orientation of HRM. A similar finding was reported by several e-HRM scholars (eg., Obediat, 2015; Parry and Tyson, 2011; Marler and Fisher, 2013; Iqbal, 2017) who reported e-HRM practices lead to e-HRM performance by contributing to increase productivity as well as mitigate the costs.

Empirical findings of the study supported the third hypothesis of this study which stated that e-HRM practices have a significant impact on the job satisfaction of employees. The findings of the study suggested that organizations can boost the job satisfaction of employees via the adoption e-HRM systems. The organization provide better HR services to their employees through the e-HRM system. Further, employees have the opportunity to access their HR-related information (eg., leave, salary, work performance and etc) at any time through the self-service and automation of HR services. In Sri Lanka, e-HRM has a considerable positive impact on bank employees' job satisfaction. The majority of bank offices are located in the country's capital city, and bank branches are dispersed across the districts. Employees may travel to the headquarters for meetings and training, which adds to the cost and strains the employees' ability to balance their personal and professional lives. In this way, banks in Sri Lanka are implementing e-training and e-communication for employees. In the end, these trends ensure employees feel more satisfied with their jobs. The insights this study provides support

assertions made by Nurlina et al. (2020) and Alshibly et al. (2022) that emphasise the role of e-HRM practices in improving the job satisfaction of employees.

According to the researchers' knowledge, this study first examines the impact of e-HRM performance on the environmental performance of the organization. Our results show that e-HRM performance has a significant impact on the environmental performance of banks. This study considered productivity and cost-efficiency as the dimensions of e-HRM performance. The automation of routine HRM operations and the transformation of HRM from a paper-based system into a strategic partner make it possible for e-HRM to reduce costs and increase productivity. Further, e-HRM functions including e-communication and e-training significantly mitigate employees' transportation which in turn leads to a reduction in organizational cost as well as the carbon footprint of an organization. Additionally, several e-HRM practices, such as e-recruitment e-selection, and e-performance management help to attract and retain productive employees while considerably reducing the amount of paper used for these HRM activities. Ultimately, this trend improves the environmental performance of an organization.

Our findings show that organizations can improve their environmental performance by increasing the job satisfaction of employees. More particularly, Ostroff (1992) discovered that organizations tend to be more successful when their employees are more satisfied than when they are unsatisfied. According to Renwick et al. (2013), job satisfaction can be a significant result of an organization's environmental performance since it drives employers to attract, select, and keep environmentally conscious employees who can support their environmental initiatives. Satisfied employees will feel more emotionally connected to the organization and more obligated to contribute to the environmental initiatives of the organization. Employees will only promote environmental behaviours within the organization and apply environmental knowledge and attitudes if they are satisfied with their job. In this context, the job satisfaction of employees has also been acknowledged for the greater environmental performance in the previous studies conducted by Stephen et al. (2015) and Daddi et al. (2019).

To our knowledge, this study is the first to examine the mediating effects of both e-HRM performance and job satisfaction on the relationship between e-HRM and environmental performance. The results of the study provided support for the mediation role of job satisfaction on the relationship between e-HRM and environmental performance. Thus, the study extends the HR literature in two ways: firstly, confirming the positive impact of e-HRM practices on

environmental performance in the banking context; secondly, this study reveals an important mechanism (i.e. job satisfaction) through which the e-HRM influences the environmental performance of an organization. The empirical findings of the study revealed that job satisfaction partially mediates the relationship between e-HRM practices and environmental performance. In other words, an organization can improve environmental performance directly through the implementation of e-HRM practices. Further, organizations can improve the job satisfaction of employees via e-HRM practices, which in turn leads motivates the employees to actively contribute to the achievement of the environmental goals of the organization. Further, the results of the study confirm that e-HRM performance partially mediates the relationship between e-HRM practices and environmental performance. This supports the theoretical argument of the study that the implementation of e-HRM practices results in better e-HRM performance, which leads to improving the environmental performance of the organization. Taken together, the results of this study lend support to the developed hypotheses and, in turn, contribute to the theory and practice of e-HRM literature. Overall findings of the study support the institutional theory, stakeholder theory and system theory.

Theoretical Implications

As mentioned earlier, the existing literature on e-HRM revolves around investigating the role of e-HRM on HRM effectiveness (e.g. Bandarouk et al., 2009; Strohmeier, 2009; Findikli and Bayarcelik, 2015; Parry, 2011; Bandarouk et al., 2017). Only a few studies discussed the relationship between e-HRM and environmental performance (e.g. Shaumya and Arulrajah, 2018). Thus, therefore, extends the emerging research on e-HRM by considering e-HRM performance and job satisfaction as the mediators to explain the association between e-HRM and environmental performance. This study provided empirical evidence about the mediating effects of e-HRM performance and job satisfaction on the associations between e-HRM and environmental performance. The study's findings contribute to e-HRM and organizational sustainability literature. Overall, this model provides a novel view of the relationship between e-HRM and environmental performance, providing an interesting line for future research.

Managerial Implications

Contemporary organizations are increasingly stressed by numerous stakeholders such as competitors, customers, regulators and community groups to engage in environmental management to respond to grave global ecological problems (e.g., global warming, climate

change, destruction of biodiversity, severe weather and sea-level rise etc.). As a solution, banks are paying more attention to the adaptation of the green banking concept to ensure environmental performance beyond economic and social performance to ensure organizational sustainability and contribute to sustainable development. In response to that, the findings of the current study provide several practical implications that can be suggested for HRM managers. Initially, this study provides HRM managers with empirical evidence on the relative significance of e-HRM practices in enhancing the bank's environmental performance. The study's findings also suggest how e-HRM practices can enhance job satisfaction and e-HRM performance, both of which are crucial to improving banks' environmental performance. The study's results also demonstrated how crucial it is for banks that focus more on green banking to incorporate e-HRM practices.

REFERENCES

Amoako, R., Jiang, Y., Frempong, M. F., Tetteh, S. & Adu-Yeboah, S. S. (2022). Examining the Effect of Organizational Leadership, Organizational Structure, and Employee Technological Capability on the Success of Electronic Human Resource Management. *SAGE Open*, 12(2). <https://doi.org/10.1177/21582440221088852>

Alshibly H.H. & Alzubi K.N. (2022). Unlock the black box of remote e-working effectiveness and e-HRM practices effect on organizational commitment, *Cogent Business & Management*, 9(1). <https://doi.org/10.1080/23311975.2022.2153546>

Annual Report (2021). Central Bank of Sri Lanka, Colombo.

Ahmad, S. (2015). Green Human Resource Management: Policies and practices, *Cogent Business & Management*, 2(1), 1-13. <https://doi.org/10.1080/23311975.2015.1030817>

Ashton, A.H. (2018). How human resources management best practice influence employee satisfaction and job retention in the Thai hotel industry. *Journal of Human Resources in Hospitality & Tourism*, 17(2), 175-199 <https://doi.org/10.1080/15332845.2017.1340759>

Arulrajah., A.A., Opatha., H.H.D.N.P. & Nawaratne., N.N.J (2016). Employee Green Performance of Job: A Systematic Attempt towards Measurement. *Sri Lankan Journal of Human Resource Management*, 6(1), 37-62.

Adli, M., Gharib, S., Hakami, M., & Pourmahdi, K. (2014). A Survey on Electronic Human Resource Management Consequences, Its Outcomes and Performances. *Journal of Basic and Applied Scientific Research*, 4(10), 71-82.

Anderson, J.C., and Gerbing, D.W. (1988), 'Structural Equation Modeling in Practice: A Review and Recommended Two-Step Approach,' *Psychological Bulletin*, 103, 411– 423.

Bag, S., Dhamija, P., Pretorius, J.H.C., Chowdhury, A.H., & Giannakis, M. (2021). Sustainable electronic human resource management systems and firm performance: an empirical study, *International Journal of Manpower*, 43(1), 32-51. <https://doi.org/10.1108/IJM-02-2021-0099>

Bentler, P. M. (1990). Comparative Fit Indexes in Structural Models. *Psychological Bulletin* 107 (2), 238–246.

Baron, R.M. & Kenny, D.A. (1986). The moderator-mediator variable distinction in social psychology research: conceptual, strategic and statistical considerations, *Journal of Personality and Social Psychology*, 51(6), 1173-1182.

Bondarouk., T.V. & Ruël., H.J.M (2009). Electronic Human Resource Management: challenges in the digital era. *The International Journal of Human Resource Management*, 20(3), 505-514. <https://doi.org/10.1080/09585190802707235>

Benn, S., Teo, S.T.T. & Martin, A. (2015). Employee participation and engagement in working for the environment. *Personnel Review*, 44(4), 492-510. <https://doi.org/10.1108/PR-10-2013-0179>

Bissola, R. & Imperatori, B. (2014). The unexpected side of relational e-HRM", *Employee Relations*, 36(4), 376-397.

Bangwal, D., Tiwari, P., & Chamola, P. (2017). Green HRM, Work-Life and Environment Performance. *International Journal of Environment, Workplace and Employment*, 4(3), 244-268.

Bondarouk, T., Harms, R. & Lepak, D. (2017). Does e-HRM lead to better HRM service?. *International Journal of Human Resource Management*, 28(9), 1332-1362. <https://doi.org/10.1080/09585192.2015.1118139>

Bertalanffy., V.L. (1950). The Theory of Open Systems in Physics and Biology Science, 111(2872), 23-29. <https://doi.org/10.1126/science.111.2872.23>

Bondarouk, T., Rue'l, H. & Van der Heijden, B. (2009). E-HRM Effectiveness in a Public Sector Organization: A Multi-Stakeholder Perspective. *International Journal of Human Resource Management*, 20, 578–590. <https://doi.org/10.1080/09585190802707359>

Chiarini, A. (2017). Setting strategies outside a typical environmental perspective using ISO 14001 certification, *Business Strategy and the Environment*, 26(6), 844-854.

Clarkson, M. B. E. (1995). A stakeholder framework for analyzing and evaluating corporate social performance, *Academy of Management Review*, 20, 92–117.

<https://doi.org/10.5465/amr.1995.9503271994>

Chow, C.W., Haddad.K & Singh, G. (2007). Human Resource Management, Job Satisfaction, Morale, Optimism, and Turnover. *International Journal of Hospitality & Tourism Administration*, 8(2), 73-88, https://doi.org/10.1300/J149v08n02_04

Chin, W.W. (1998). Issues and opinion on structural equation modeling. *MIS Quarterly*, 22(1), 7–16.

Delmas., M & Toffel, M.W. (2004). Stakeholders and environmental management practices: an institutional framework. *Business Strategy and the Environment*, 13, 209–222.

DiMaggio, P., & Powell., W. (1983). The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields. *American Sociological Review*, 48, 147–160.

DiPietro, R. B., Cao, Y., & Partlow, C. (2013). Green practices in upscale foodservice operations customer perceptions and purchase intentions. *International Journal of Contemporary Hospitality Management*, 25(5), 779–796.

Daddi, T., Iraldo, F., Testa, F., & De Giacomo, M. R. (2019). The Influence of Managerial Satisfaction on Corporate Environmental Performance and Reputation. *Business Strategy and the Environment*, 28(1), 15-24.

Fındıklı M. A. &, Bayarçelikb, E. B. (2015). Exploring the outcomes of Electronic Human Resource Management (E-HRM)? *Social and Behavioral Sciences*, 207, 424–431.

Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18(1), 39-50. <https://doi.org/10.1177/002224378101800104>

Freeman, E. (1984). *Strategic management, A stakeholder approach*. London: Pitman Publishers.

Grewal, R., Cote, J. A., & Baumgartner, H. (2004). Multicollinearity and measurement error in structural equation models: Implications for theory testing. *Marketing Science*, 23(4), 519–529. <https://doi.org/10.1287/mksc.1040.0070>

Guerci, M., Decramer, A., Van Waeyenberg, T. & Aust, I. (2019). Moving beyond the link between HRM and economic performance: a study on the individual reactions of HR managers and professionals to sustainable HRM, *Journal of Business Ethics*, 160(3), 783-800

Hoboubi, N., Choobineh, A., Ghanavati, F. K., Keshavarzi, S., & Hosseini, A. A. (2017). The impact of job stress and job satisfaction on workforce productivity in an Iranian petrochemical industry. *Safety and Health at Work*, 8(1), 67–71. <https://doi.org/10.1016/j.shaw.2016.07.002>

Hooi, L. W. (2006). Implementing E-HRM: The Readiness of Small and Medium Sized Manufacturing Companies in Malaysia. *Asia Pacific Business Review*, 12(4), 465-485.

Hair, J. F., Black, W. C., Babin, B. J., Anderson, R. E., & Tatham, R. L. (2006). *Multivariate analysis*, 6th edition, Delhi, India.

Harvey, D. M., Bosco, S. M., & Emanuele, G. (2010). The impact of ‘green-collar workers’ on organizations. *Management Research Review*, 33(5), 499–511.

Iqbal, N., Ahmad, M., M.C. Allen, M. and Raziq, M.M. (2018). Does e-HRM improve labour productivity? A study of commercial bank workplaces in Pakistan, *Employee Relations*, 40(2), 281-297. <https://doi.org/10.1108/ER-01-2017-0018>

Iyer, S. (2019), Understanding the eHRM promise and adoption imperatives. *NHRD Network Journal*, 1-10. <https://doi.org/10.1177/2631454119873204>

Ibrahim, H., & Yusoff, Y. M. (2015). User characteristics as antecedents of techno stress towards EHRM: From experts' views. *Procedia—Social and Behavioral Sciences*, 172, 134–141. <https://doi.org/10.1016/j.sbspro.2015.01.346>

Jayasekara, S.D. (2021). Deficient regimes of anti-money laundering and countering the financing of terrorism: agenda of digital banking and financial inclusion. *Journal of Money Laundering Control*, 24(1), 150-162. <https://doi.org/10.1108/JMLC-04-2020-0035>

Jayarathne, P. G. P. J., Thevanes, N., & Arulrajah, A. A. (2020). The Impact of Employee Green Behavior on Green Banking Performance of Select Private Sector Banks in Sri Lanka. *IUP Journal of Bank Management*, 19(2), 47-65

Kirk, D. (1998). Attitudes to environmental management held by a group of hotel managers in Edinburgh. *International Journal of Hospitality Management* 17(1), 33–47.

Kim, S., Wang, Y. & Boon, C. (2020). Sixty years of research on technology and human resource management: looking back and looking forward. *Human Resource Management*, 60(1), 229-247, <https://doi.org/10.1002/hrm.22049>

Kolk, A., & Pinkse., J. (2006). Stakeholder mismanagement and Corporate Social Responsibility crises. *European Management Journal*, 24(1). 59–72.

Kreitner, R., & Kinicki, A. (1992). *Organizational behaviour*. Second edition, Boston, MA: Irwin Publishing

Khan, J.H. (2003). Impact of total quality management on productivity, *The TQM Magazine*, 15(6), 374-380.

Lepoutre, J., & Heene. A. (2006). Investigating the impact of firm size on small business social responsibility: A critical review. *Journal of Business Ethics* 67(3), 257–73.

Lim, S. (2008). Job satisfaction of information technology workers in academic libraries. *Library & Information Science Research*, 30(2), 115–121

Luthans, F. (1998). *Organisational behaviour*. 8th Edition, Boston, MA: McGraw-Hill.

Locke, E. A. (1976). The nature and causes of job satisfaction. *Handbook of Industrial and Organizational Psychology*, 1, 1294–1343.

Lepak, D. P., & Snell, S. A. (1998). Virtual HR: Strategic human resource management in the 21st century. *Human Resource Management Review*, 8 (3), 215–234. [https://doi.org/10.1016/S1053-4822\(98\)90003-1](https://doi.org/10.1016/S1053-4822(98)90003-1)

Lin, A., Elorza, U., Aritzeta, A. & Madinabeitia-Olabarria, D. (2020). High-involvement HRM, job satisfaction and productivity: a two wave longitudinal study of a Spanish retail company. *Human Resource Management Journal*, 31(1), 341-357. <https://doi.org/10.1111/1748-8583.12307>.

Lin, L.H. (2011). Electronic human resource management and organizational innovation: the roles of information technology and virtual organizational structure. *International Journal of Human Resource Management*, 22(2), 235-257.

Marsh, H. W., K.T., Hau, & Wen.Z (2004). In Search of Golden Rules: Comment on Hypothesis-Testing Approaches to Setting Cut-Off Values for Fit Indexes and Dangers in Overgeneralizing Hu and Bentler's (1999) Findings.” *Structural Equation Modeling: A Multidisciplinary Journal* 11 (3), 320–341.

Miller, K.D., and Tsang, E.W.K. (2011). Testing Management Theories: Critical Realist Philosophy and Research Methods. *Strategic Management Journal*, 32, 139– 158.

Marler, J. H. & Fisher, S. L. (2010). An Evidence-Based Review of E-HRM and Strategic Human Resource Management, in *3rd European Academic Workshop on Electronic Human Resource Management Proceedings*, 33- 51.

Marchington, M. & Wilkinson, A. (2005). *Human Resource Management at Work: People Management and Development*. Third Edition, London: Chartered Institute of Personnel & Development (CIPD) Publishing.

Marler, J.H. and Parry, E. (2016). Human resource management, strategic involvement and e-HRM technology. *International Journal of Human Resource Management*, 27(19), 2233-2253. <https://doi.org/10.1080/09585192.2015.1091980>

McShane, S. L., & Von Glinow, M. A. (2005). *Organizational behaviour*, 3rd Edition. India: Tata McGraw-Hill Inc

Mustafa, G., & Ali, N. (2019). Rewards, autonomous motivation and turnover intention: Results from a non-western cultural context. *Cogent Business & Management*, 6(1), 1-16. <https://doi.org/10.1080/23311975.2019.1676090>

Myllymäki, D. (2021). Beyond the 'e-' in e-HRM: integrating a sociomaterial perspective, *The International Journal of Human Resource Management*, 32(12), 2563-2591. <https://doi.org/10.1080/09585192.2021.1913624>

Marler, J.H. & Fisher, S.L. (2016). The e-HRM value proposition: introduction to the special section", *Canadian Journal of Administrative Sciences*, 33(2), 1-94. <https://doi.org/10.1002/cjas.1388>

Marler, J.H., & Parry, E. (2016). Human resource management, strategic involvement and e-HRM technology, *The International Journal of Human Resource Management*, 27(19), 2233-2253, <https://doi.org/10.1080/09585192.2015.1091980>

Nurlina, N., Situmorang, J., Akob, M., Quilim, C. A., & Arfah, A. (2020). Influence of e-HRM and human resources service quality on employee performance. *The Journal of Asian Finance, Economics and Business*, 7(10), 391–399. <https://doi.org/10.13106/jafeb.2020.vol7.no10.391>

Opatha, H.H.D.N.P. (2019). *Sustainable Human Resource Management: Expanding Horizons of HRM*, Colombo: Department of HRM, University of Sri Jayewardenepura.

Ostroff, C. (1992). The relationship between satisfaction, attitudes, and performance: An organizational level analysis. *Journal of Applied Psychology*, 77, 963–974.

Obeidat, S.M. (2016), "The link between e-HRM use and HRM effectiveness: an empirical study", *Personnel Review*, 45(6), 1281-1301

Parry, E., & Tyson, S. (2011). Desired goals and actual outcomes of e-HRM. *Human Resource Management Journal*, 21, 335–354.

Parry, E. (2011). An examination of e-HRM as a means to increase the value of the HR function. *International Journal of Human Resource Management*, 22(5), 1146-1162.

Pratheepan, S., & Arulrajah, A.A. (2012). Application of electronic human resource management (e-HRM) practices and its effectiveness in selected private banks in Sri Lanka: An exploration. Proceedings of Seventh International Research Conference on Management and Finance (IRCMF). University of Colombo.

Ruël, H., & van der Kaap, H. (2012). E-HRM Usage and Value Creation. Does a Facilitating Context Matter? *German Journal of Human Resource Management*, 26(3), 260-281.
<https://doi.org/10.1177/239700221202600304>

Ruël, H.J.M., Bondarouk, T.V. & Van der Velde, M. (2007). The contribution of e-HRM to HRM effectiveness: Results from a quantitative study in a Dutch Ministry, *Employee Relations*, 29(3), 280-291. <https://doi.org/10.1108/01425450710741757>

Ruel, H., Bondarouk, T., and Van der Vald, M. (2006). The Contribution of e-HRM to HRM Effectiveness, *Employee Relations*, 29(3), 280–291.

Ruël, H. & Van Der Kaap, H. (2012). E-HRM Usage and Value Creation. Does A Facilitating Context Matter??. *Zeitschrift für Personal Forschung*, 26 (3), 260-281.

Roehling, M.V., Boswell, W.R., Caligiuri, P., Feldman, D., Graham, M.E., Guthrie, J.P., Morishima, M. & Tansky, J.W. F. (2005), The future of HR management: research needs and directions. *Human Resource Management*, 44(2), 207-216

Ruel, H. J. M., Bondarouk, T. V., & Looise, J. K. (2004). E-HRM: Innovation or irritation. An explorative empirical study in five large companies on web-based HRM. *Management Revue*, 15(3), 364-380.

Stanton, J.M., and Coover, M.D. (2004). Turbulent Waters: The Intersection of Information Technology and Human Resources, *Human Resource Management*, 43, 121–126

Schumacker, R. E., & Lomax. R.G (2004). *A Beginner's Guide to Structural Equation Modeling*. Second Edition, Mahwah, NJ: Lawrence Erlbaum Associates Publishers

Shaumya, K. & Arulrajah, A.A (2018). The Impact of Electronic Human Resource Management (e-HRM) Practices on Bank's Environmental Performance. *Journal of Business Studies*, 2(1), 33- 50.

Snell S. A., Stueber, D. & Lepak, D. P. (2002). Virtual HR Departments: Getting out of the middle. In R. L. Heneman and D. B. Greenberger (Eds.), *Human resource management in virtual organizations*, pp 81-101, CT: Information Age Publishing.

Shrivastava, S. & Shaw, J.B. (2003). Liberating HR through technology, *Human Resource Management*, 42(3), 201-222.

Strohmeier, S. (2007). Research in e-HRM: Review and implications, *Human Resource Management Review*, 17, 19-37.

Stone, D.L. & Dulebohn, J.H. (2013). Emerging issues in theory and research on electronic human resource management. *Human Resource management Review*, 23(1), 1-5.

Thevanes, N., & Arurajah, A. A.(2017). The Search for Sustainable Human Resource Management Practices: A Review and Reflections. Proceedings of 14th International Conference on Business Management (ICBM), University of Sri Jayewardenepura, 306- 328.

Trivellas, P., Reklitis, P., & Platis, C. (2013). The effect of job related stress on employees' satisfaction: A survey in health care. *Procedia - Social and Behavioral Sciences*, 73, 718–726. <https://doi.org/10.1016/j.sbspro.2013.02.110>

Voermans, M., & Veldhoven, M. V. (2007). Attitude towards E-HRM: An empirical study at Philips. *Personnel Review*, 36(6), 887-902. <https://doi.org/10.1108/00483480710822418>

Velicer, W.F. & J.L. Fava. (1998). Effects of variable and subject sampling on factor pattern recovery. *Psychological Methods*, 3(2), 231–251.

Wehrmeyer, W. (1996). *Greening people: Human resources and environmental management*. Greenleaf Publishing.

Wijesinghe, M.D.J.W. & Pallearachchi, D. (2022). Banking Sector Development and Economic Growth in Sri Lanka: An Econometric Analysis. *South Asian Journal of Finance*, 2(1), 1–13.

Wahyudi, E. & Park, S.M. (2014). Unveiling the value creation process of electronic human resource management: an Indonesian case. *Public Personnel Management*, 43(1), 83-117.
<https://doi.org/10.1177/0091026013517555>.

Wickramasinghe.V (2010) Employee perceptions towards web-based human resource management systems in Sri Lanka. *The International Journal of Human Resource Management*, 21(10), 1617-1630. <http://dx.doi.org/10.1080/09585192.2010.500486>

Wijekoon, A & Galahitiyaw, N, W, K. (2016). Innovativeness of IT Entrepreneurial Firms: The Roles of Knowledge Management and Dynamic Innovation Capabilities, *Sri Lankan Journal of Management*, 21(2), 40-64.