The Psychological Role of Green HRM in Improving Employee Well-Being and Environmental Sustainability

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Abstract

Introduction: Sustainable growth is a need for running a business in today's world, where the gap between classes is growing and the surroundings are in trouble. Human resources (HR) are the beginning of a business. To achieve corporate sustainability, it is important to use sustainability to handle HR, because human resource management (HRM) can affect how a company interacts with its outside world in terms of how it affects the community and the surroundings.

Objectives: Thus, there is a rising interest in green HRM studies that investigate the benefits of incorporating environmental management into HRM. Green HR is the use of human resource management practices to encourage the conservation of natural resources inside businesses and, more broadly, to advance the reason for environmental preservation. Human resource management strategies that prioritize sustainability are an integral aspect of CSR activities. Green HR is comprised of two fundamental components: green HR processes and the protection of intellectual property.

Methods: The primary goal of this study was to examine the tactics used to improve "organizational sustainability" (OS). With the use of tactical decision theory and the responsibility model, this research organizes the current literature and finds that GHRM practices are essential for environmental management and the long-term viability of organizations.

Result: This research examines the role that environmental efficiency and the performance of workers play in mediating the connection between GHRM activities such as learning and growth, performance assessment, incentive and pay, and a sustainable organization.

Conclusions: Specifically, the research found that GHRM techniques (including, but not limited to, learning and growth, performance assessment, and incentive and pay) had substantial benefits on OS. The relationship among GHRM techniques and OS is also examined experimentally, with a focus on the unique mediation roles played by the environment's efficiency and employee performance. The data from this research provide credence to the mediation theory that was postulated. While the GHRM is a novel concept, further research is required to see whether and how it can be implemented in developing nations and what effects it has.

Keywords: Human resources, green human resources, environmental sustainability, and organizational sustainability.

1. INTRODUCTION

For a long time now, immediate economic objectives have been the primary focus of business and corporate management. After the growth of industry and the population problem, however, the difficulty of this development paradigm and the need of conducting commercial operations while preserving the surroundings and society became clear (Saifulina et al., 2020). Employees are a crucial part of every company since they may agree with or disagree with company policies and so influence how these measures are carried out. Employees that take part in organizational operations, such as incorporating green practices into their daily job, may have a big impact on the culture of their workplace. Therefore, the attitude of employees toward greening projects is critical for success (Kuzmina et al., 2021). The goal of sustainable development is to provide for current demands without jeopardizing subsequent generations' capability to do the same. A strong social awareness and

environmental sense of responsibility are increasingly seen as commercial necessities, and organizations have begun to take notice. The HR department will take the lead in promoting environmental responsibility throughout the company by establishing eco-friendly policies and procedures (Jyoti 2019). The goals of the HR department and the rest of the employees of the business should be reflected in and inspired by the HR approach. The HR strategy should also be in line with the business's approach, values, and culture, and it should help meet the demands of customers and shareholders alike. In a word, the goal is to make the world a better place by encouraging people to live more sustainably. Human resources should be called "People and Society" instead (Jeronimo et al., 2020). These days, the term "environmental management" (EM) is used for a wide variety of corporate functions than only those formerly associated with it. Business groups in industrialized nations have also taken the initiative to initiate innovative campaigns under the banner of "green HRM" (Green Human Resource Management). In addition, GHRM techniques aid in boosting productivity and staff dedication to enhance environmental effectiveness (Yusliza et al., 2021) The GHRM method involves shifting the HRM system's values, procedures, and practices to prioritize environmental safety. Taking a Green HRM Approach entails adjusting HRM practices, systems, and policies with an eye on environmental responsibility. As a result, GHRM is crucial to the continued success of businesses. The goal of GHRM is to help businesses improve their environmental performance (EP). The rapid adoption of GHRM is being seen across industries as a means to foster an eco-friendly corporate culture and lessen the negative effects of modern industrialization on the surroundings. Employees in one division of a business are not singled out for accountability for becoming green, but rather all divisions share in the duty of protecting the company's ecological balance (Westerman et al., 2021). The term "green human resources" describes the strategy of utilizing all possible interactions with workers to raise environmental consciousness and encourage action. It entails implementing eco-friendly HR efforts like filing electronically, car-sharing, shared employment, telephone conferences and virtual interviewing, reusing, telepathy commutes, e-learning, energy-effective workplaces, etc., which lead to higher effectiveness, lower expenses, and better retention and engagement of staff, thereby helping organizations to decrease worker environmental footprints (Yafi et al., 2021). Organizations actively participate in the community by integrating their objectives with it, and the green HR or people administration performs in this context has sustainably at the center of its people development and talent administration focus. In addition to staff and investors, communities, consumers, and freelancers becomes equally invested parties (Tahir et al., 2019) Figure 1 shows the framework of human resource management.



Figure 1: Human resource management

There is a demand for more research on the effects of GHRM practices on the environmental efficiency of the textile industry, as there are currently only a small number of accessible works on the topic. Developed countries have generally been successful in adopting environmental restrictions in response to rising pollution levels. Environmental laws can be difficult to enforce in developing nations like Pakistan due to issues including insufficient infrastructure, scarce funding, and resistance from government officials (Kainzbauer, A. and

Rungruang, P., 2019) The sustainability of the surroundings throughout the globe is the most pressing problem facing humanity in the 21st century. Long-term and immediate efforts must be made by all nations to maintain a high standard for the natural assets of the globe, ecological systems, and a variety of creatures and plants, as well as the human environment. Research on the destruction of the environment, human happiness, and sustainable practices has been conducted in the social sciences and behavioral sciences for several decades (Suleman et al., 2022). When an individual achieves environmental authorization from applicable international agencies, it satisfies international customers. That's why it's so important to advocate for and implement production methods that minimize harm to the environment (Abubakar et al., 2022). The economic contribution of the textile and garment sector to the country's economy is substantial. However, overseas consumers are becoming more cognizant of environmental issues and are demanding eco-friendly textiles. They have high standards for their suppliers to act ethically towards the environment. As a result, factories must consider the environmental concerns of their global clientele. Furthermore, environmental issues have been identified as a significant contributor to the textile industry's falling exports. All of these factors highlight the need of studying green ecological HRM practices in the industry as an efficient means of educating and training workers to reduce their impact on the surroundings (Abdulrahim Zaid, 2019

2. LITERATURE REVIEW

The purpose of GHRM is to influence employee actions so that businesses can meet their environmental objectives. Their research (Suharti & Sugiarto, 2020) aspires to shine a light on how Green HRM may be implemented through different HRM processes and to examine the ways in which doing so can benefit both employees and businesses. The findings proved that Green HRM deployment benefited both employees and the business as a whole. Both green and non-green work results improved for specific individuals. That article examines the prospects for green practices to fulfill an organization's social responsibility criteria and discusses current developments and study gaps in GHRM literature. 174 scholarly publications published among 1995 and 2019 were culled from the Academic and the Google Scholar platform databases as part of a comprehensive examination of particular literature in light of the rising consciousness surrounding improvement and sustainability. GHRM practices, green conduct in work among employees, and OS were shown to fall into three distinct clusters after content coding and clustering techniques. Social sustainability was found to be less researched than economic growth and ecological pillars of sustainability by additional manual study. Based on these findings, the authors (Amrutha & Geetha, 2020) used a grounded theory based to theoretically explore a conceptual framework proposing the mediating role of 'employee green activity at workplace' and in the connection among 'GHRM practices' and social sustainability of firms. Human resource management that takes environmental concerns into account prioritizes the company's and its employees' financial, community, and the health of the environment. The modern factory workforce is the focus of that study, which aims to learn more about their level of knowledge, attitudes, and behaviors related to responsible green practices in the workplace. The findings indicate that long-term viability during manufacturing is significantly influenced by the presentmoment workforce's Organisational Citizenship Behaviour towards the Environment (Jayabalan et al., 2020). Although "green" buildings have become shorthand for environmentally friendly structures, it is not always evident how the building's residents may best support green initiatives. That paper (Parida et al., 2021) argues that by encouraging beneficial workplace behaviors, GHRM, which is grounded in Social Identity Theory, can maximize the possibility of green behaviors to improve workers' results in green office buildings. They gathered information from several sources, including the responses of 549 workers and 91 supervisors at 17 businesses located in environmentally friendly business centers around Australia. They verify that Green HRM, green behaviors, and organisational identity serve as double mediators of the connections between organizational preparedness, job fulfillment, and movement at work. Organizations may improve their environmental impact by adopting "green" HRM practices. (Yong et al., 2020) uses cross-sectional data from 112 big manufacturing enterprises in Malaysia to investigate the impact of green HRM practices on sustainability, with an emphasis on the resource-based perspective of the organization. The findings demonstrate the beneficial impact of green hiring practices and green training on the environment. No substantial relationship between sustainability and green evaluation and positions, green selection, green evaluations of performance, or green reward was discovered. Within and outside of the larger subject of Sustainability HRM, GHRM has grown rapidly during

the last decade. That's why we think now is a good moment to survey Green HRM research up to the year 2020 and provide some critical thoughts on the field going forward. As the first meta-review of its kind, their work extrapolates the most salient findings from the burgeoning area of Green HRM during the last decade. (Paulet et al., 2021) wrap off with a look toward the potential destiny of Green HRM. The research aims to examine the growth of GHRM in Russia and provide a theoretical framework for incorporating ecological concerns into HR policies and procedures. The paper's primary contribution is an all-encompassing strategy for incorporating GHRM into existing HRM procedures. Fundamental theoretical and operational ideas for GHRM research are outlined in that article. The study (Tsymbaliuk et al., 2021) demonstrated that the GHRM may be used to undertake CSR initiatives focused on protecting the environment. In addition, GHRM encompasses a vast array of practices aimed at motivating eco-conscious conduct and inspiring novel environmental actions on the part of staff members. HRM that prioritizes environmental and social responsibility is called "green HRM." The purpose of that research is to investigate the mediating effects of social responsibility for companies and a green psychological environment in determining how GHRM affects workers' green behaviors. The suggested model was evaluated in that research using Partial Least Square Modelling structural equations using data from a specimen of 384 HR managers and workers drawn at random from businesses operating throughout all of Iran's provinces. Our research (Sabokro et al., 2021) showed that green HRM practices have an effect on social accountability, green attitudes inside the workplace, and green actions taken by workers. The purpose of that research was to examine how GHRM affects employees' sense of belonging to their organizations and how that, in turn, influences their pro-environmental behaviors and attitudes. Cross-sectional quantitative research (Ribeiro et al., 2022) was designed to get the necessary information, and participants filled out a predetermined questionnaire to collect the necessary data. A total of 235 workers from various Portuguese tourist companies participated in the research. The findings were previously evaluated using the Harman analysis and bootstrapping techniques. The hotel sector is under increasing pressure to address the many environmental challenges it faces by adopting sustainable solutions including GHRM practices. As a result, research on the benefits of green HRM for the surroundings is essential. Therefore, the purpose of that research is to investigate (Darvishmotevali & Altinay, 2022) the connection among green HRM, pro-environmental performance (P-EP) on the part of workers, environmental consciousness, and servant leadership. The information was gathered from hotel staff in Almaty, Kazakhstan. The results indicate that environmental consciousness modulates the effects of GHRM on proactive P-EP but does not encourage P-EP which is directly tied to doing one's job. The current economic calamity has made sustainable corporate performance a worldwide imperative, with green measures seen as the primary remedy. Recent research and regulators have paid attention to this issue; as a result, the current study (Zhao and Huang, 2022) investigated the effects of green transformational leadership, HRM, and innovation on the long-term success of Chinese manufacturing firms. The role of perceived organisational support as a moderator in the relationship between "GTL, green HRM, green innovation, and sustainable business performance" in Chinese manufacturing firms was also studied. HRM with a focus on the environment may help businesses and their workers in many ways, including the bottom line. In industrialized nations, where researchers and practitioners have prioritized environmental issues, "green HR practices" have been widely adopted. The purpose of that conceptual study (Ahmed et al., 2021) is to begin exploring the potential predictive value of green talents and green human capital. The primary goal of that research is to examine the literature on GHRM and the practices that have an impact on workers' green habits. That qualitative research delves (Sathasivam et al., 2021) into the ways in which GHRM has helped electrical and electronic firm managers and staff achieve a sustainable environment. NVivo 12 plus was used to thematically analyze data from 12 in-depth interviews, from which the following three themes emerged: beginning the journey towards sustainable development, constructing a foundation for environmental sustainability, and fully adopting ecological sustainability. The resource-based approach serves as the theoretical lens in this investigation, and the findings suggest that the organization engages in GHRM to further its environmental sustainability goals.

3. CONCEPTUAL MODEL AND OBJECTIVES

An actual investigation was conducted to verify the theoretical framework that was depicted in Figure 2.

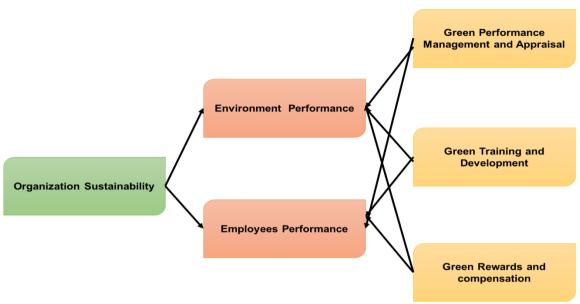


Figure 2: A proposed conceptual model

The research was done to accomplish the following goals:

- i. Examining how GHRM policies and procedures affect the long-term viability of businesses
- ii. To investigate how environmental performance mediates the relationship between GHRM practices and organisational viability.
- iii. Examining the link among GHRM practices and organizational sustainability by means of the moderating influence of worker efficiency.

4. METHODOLOGY

The purpose of this descriptive study is to examine the function of GHRM and the degree to which it serves to reinforce employee performance on the job. GHRM, green training and development, performance, incentives, environmental performance, and employee performance are all examined and tested as hypotheses in this study of organizational sustainability.

4.1 Organizational sustainability

Businesses in the 21st century have been at the forefront of bringing attention to sustainability challenges. Commercial and GHR teams may be crucial in creating a sustainable culture at their respective companies. It is crucial that administrative procedures adhere to sustainability standards. All HR choices are analyzed by the HR team from the point of view of the shareholders. Organizations now need to solicit input from a wide range of internal as well as external stakeholders to go over the many green performances such as electronic submission, drive sharing, working adaptability, online choosing and telephone discussions, reusing, and building more energy-efficient places that they can undertake to ensure their long-term viability in the face of the economy, society, and the environmental challenges. These eco-friendly reforms are essential to the long-term health of any business because they boost productivity while reducing overhead costs and increasing employee happiness and engagement. Businesses should make more hope to bring in more new ideas and technologies to help protect the environment. This can be done by making employees aware of the problem and making goods that are safe for the surroundings. Researchers talk about how important "Green and Green HRM" is and think about the benefits and drawbacks of using it to make an organization more sustainable. Sustainability can be described as "development that meets people's current requirements in a way that doesn't hurt the needs of future generations." The dedication to organizational sustainability is most needed if you want to make workers more aware of environmental issues and get them to work together to solve problems that are likely to come up. When organizations use HRM methods, the goal of GHRM is to find and hire the right people, train and grow them, control their performance, and give them rewards for doing a good job.

"Sustainability" may be described as "development that fulfills the requirements of current events without sacrificing the capacity of subsequent generations to satisfy their needs." Companies that carry out green HR strategies are sending a clear message to both current and future staff members that they possess a strong social responsibility for business goals and value their environmental and social priorities, which is essential for attracting and retaining top talent. In the eyes of potential employees, the organization's external reputation has just increased, making it a more "appealing" place to work. According to the concept of social identity, workers' opinions of GHRM should lead to loyalty to the company as a whole. Employee dedication is correlated with their level of organizational identification, which is an emotional relationship to the organization and an outward demonstration of pride in the organization. In order to boost their sense of worth and their function of belonging to the organization, workers are encouraged to adopt constructive methods and behaviors on the job. Research has also shown that a sense of belonging to one's organization is correlated with both high performance and low turnover intentions among workers.

4.2 sustainability

Changes in the natural world, new legislation, and public pressure to be socially and environmentally responsible have made sustainability a top priority for many businesses. Executives are now placing a greater focus on sustainability, and for many businesses, it has become an integral component of their long-term strategic objectives. Corporate in the framework of people is essential for a sustainable society because it addresses issues like income disparity, health disparities, and poverty head-on. The ultimate definition of sustainability is that a company's performance is gauged not merely by financial metrics like profit and return on investment, but also by metrics that take into account the impact it has on society and the environment.

Scholars agree that in the present climate, businesses need to adopt a uniform strategy for expansion that is good for the economy, the environment, and society as a whole. Sustainability may be used as a benchmark for developing solutions to social and ecological problems, and "the agenda of business can be moved upward by sustainability." HRM is crucial in creating the commercial acumen, collaborative strategies, and talents needed for an organization to be sustainable. Sustainable development, "environmental integrity," and "social equity" may be best integrated into GHRM's mission and goals. Human resource management systems that foster and maintain the financial, physiological, and social health of an organization's employees over the long term may be said to embody the concepts of sustainability. It is clear that GHRM contains HR that is in harmony with the 3 primary pillars of sustainability surroundings, social, and economical equilibrium—because it provides essential support for an accurate appraisal of the "triple bottom line" idea.

4.3 Green human resource management

GHRM is the use of HRM methods to help an organization use its property in a way that doesn't harm the environment. This is done to reach the objective of sustainable development. Most of the time, the phrase GHRM is used to mean what people and business leaders are worried about when they try to come up with new ideas and methods for better corporate environmental planning. Green awards can include using work surroundings and personal perks, like free bikes and carbon offsets, to keep people in the green program and continue to recognize their company. Even though a lot of workers feel like it's not their job to help the environment while they're at work, the new younger employers tend to understand this as they get closer to their bosses.

Businesses that embrace GHRM tactics gain external prestige by demonstrating that they care about the community and the well-being of their staff members, and this, in turn, makes the company more "appealing" to potential employees. Therefore, according to the social theory, workers' impressions of GHRM should lead to a sense of belonging to the organization. Employees' dedication to the company increases when they develop a personal connection to it via a feeling of pride in what they do. In order to boost their sense of worth and their sense of belonging to the company, employees are encouraged to adopt constructive attitudes and behaviors on the job. Research shows a negative correlation between organisational identity and employee turnover intentions and a positive correlation between organisational recognition and job satisfaction. Individual staff might find a lot of opportunities for meaningful work and personal fulfillment in today's workplace. Word count restrictions in executive termination, compensation reviews, etc., are another simple but important example of an

environmentally responsible action. There is little question that there is a lot of "greenwashing" occurring in the realm of waste minimization, but there are also many options available.

4.4 Training and development

Companies that care about the environment often offer their workers access to comprehensive training programs that teach them how to implement eco-friendly procedures, reduce their impact on the surroundings, and increase their capacity for long-term success. Only a few businesses understand the critical role that sustainable education and training programs play in ensuring sustainability (in terms of both business and ecosystems) over the long run. Sustaining economic development with the rise of organizations is now the most difficult task facing the corporate sector. Furthermore, green training courses instruct attendees on environmental concerns to change the mindset and behavior of both upper and lower-level workers. Another challenge in the contemporary world is balancing sustainable expansion with monetary growth and enhancement. Management and staff, both admin and non-administrative, need to be provided with education regarding the environment aimed at changing their mindsets. To put it another way, GHRM is the application of defined practices and policies concerning human resources in the context of the economic, social, and environmental pillars of sustainability. The following hypotheses were formulated based on the existing literature: The growth of environmentally friendly training programs is strongly correlated with the longevity of businesses, hence hypothesis 4 holds.

4.5 Performance management and appraisal

Organizations may improve their environmental sustainability by raising staff knowledge via green performance administration and evaluation systems. The PA takes environmental responsibility into account, along with all the actions that contribute to lower carbon output and compliance with environmental regulations. In order to maintain higher levels of worker efficiency, businesses should use corporate-wide measures for evaluating the acquisition of resources. Management could provide incentives based on workers' green performance appraisals to increase staff enthusiasm for Green practices. In order to use green HR practices, managers should encourage workers to speak out about their experiences in the office as well as their roles in jobs. The management members should take action for the future year to execute these eco-friendly concepts and evaluate worker productivity. Performance evaluations in the green sector are often based on indicators such as Green Productivity Quality.

To boost their EP, managers might comment briefly to employees or unions on the company's progress towards environmental objectives. Employees' outlooks, skillsets, and potentials will all benefit from this feedback. Employees will be more motivated and dedicated to their EM tasks if they are informed of the results of their performance reviews and how they are progressing toward their objectives. Employees can have a voice in the process of creating an eco-friendly workplace by implementing a digital platform that encourages them to voice their opinions, allows members to track their individual EP, and provides online data systems and reviews. The following hypotheses were formed based on the study of existing literature.H7: Green reward remuneration significantly correlates with organizational sustainability.

4.6 Green incentives and pay

Giving staff incentives to work harder may boost a company's productivity. Employees' efforts to adopt more sustainable practices might be financially rewarded via adjustments to the existing remuneration structure. Instead of reinforcing detrimental practices, personnel will be incentivized to embrace those that are better for the environment. Employees may be recognized with rewards when they contribute to environmental improvement; for instance, 3M provides incentives for ideas that enhance the company's bottom line and the surroundings. The widespread use of incentives also results in exceptional levels of job satisfaction across the company.

The main types of benefits are monetary (like bonuses, cash, and rates) and non-monetary (like giving their workers holidays, leaves, and gifts), as well as credit scores. All of the benefits have a big effect on how well the employees do their jobs, which helps make the world more sustainable. To do this, organizations should use "green management practices" by putting all of their time and money into using green practices that help with growth or business, or by encouraging eco-friendly practices like reusing waste and keeping waste under

control. Based on the study of the research, the following assumptions were made. H7: There is a strong link among Green incentive Pay and the sustainability of an organization.

4.7 Environmental performance

Sustainability performance is described as "the evaluation of a company's capacity to meet environmentalist objectives and targets set out in the company's sustainability plan or policy." At the moment, various businesses are working on projects that are good for the earth to gain a competitive edge. People think that the importance of environmental performance is a good chance to improve the long-term health of an organization. In the early decades, groups all over the world have been focusing on green actions and how they affect the planet. It contains a need for green practices because organizations can do better work if they accept green practices. Based on what was written, the following assumptions were made. The important link among green performance administration evaluation and organizational longevity is mediated by environmental efficiency. H5: The important connection among green learning and growth and organizational longevity is mediated by environmental efficiency. H8: The important link between green incentives and pay and organizational longevity is mediated by environmental success.

4.8 Employee performance

It's challenging to assess workers' the environment's performance in the workplace. One of HRM's fundamental characteristics is the measurement of employees' eco-friendly performance on the job. The business's overall performance evaluation system must include one-on-one meetings to evaluate the performance of its less-experienced employees. Researching successful businesses might also help us understand the factors inside an organization that contributes to its success in the marketplace. An effort to do so is the resource-based theory (RBV). According to the comprehensive analysis of the organization based on available data, personnel with specialized knowledge are its most valuable asset. This notion, which has its roots in RBV, becomes institutionalized and permeates all facets of an organization, from its internal identities and cultures to its rules, practices, files, systems, and staff performance. The aim of intellectual learning has been shown to inspire people to take advantage acquire knowledge opportunities. Sustainable development objectives may be better integrated with ecological objectives with the use of effective EM.

In the area of policies, things like recruiting workers, efficiency, and training, as well as relations with staff policies and award systems, are taken into account. But some people think that organizations should look into the establishment of new HR and EM practices that have big effects on longevity and competitive edge. The critical connection among Green management of performance and evaluation and organisational sustainability is mediated by employee performance, as stated in H3. Green instruction and growth have a considerable link to organizational sustainability, however, this link is mediated by employee performance (H6). Green incentives, salaries, and long-term business viability are all linked, but only via the efforts of individual workers, according to Hypothesis 9.

4.9 Structure of Theory

In order to deal with environmental issues, organizations need to bring across both experts from the trade and academics to work on making a structure for sustainable practices. Even though these models are being made in numerous nations, many organizations face problems because they don't have enough GHRM expertise and actual expertise, they don't have clear goals, and don't plan well. The top management looked at their renowned method and an active way to put a structured GHRM in place. But some obstacles and problems make it hard to keep an organization stable. GHRM and OS are both parts of this study. Based on the optimal theory of choice and attribution modeling, the study groups the available literature to show that GHRM practices are very important for the management of the environment and the long-term health of organizations. The study looks at how GHRM practices (learning and growth, assessment of performance, award, and salary) affect the sustainability of an organization by looking at the role that environmental performance and staff performance play in making an organization sustainable. Figure 2 shows the plan for the study.

4.10 Hypotheses

H1: Appraisal of green performance management has a favorable effect on the long-term viability of an organization.

H2: The important connection among green performance management evaluation and organisational longevity is mediated by environmental performance.

H3: Organisational sustainability is linked to green performance management assessment, but only via employee performance.

H4: Organisational longevity is significantly correlated with green training and growth.

H5: The crucial connection among green training and growth and organisational sustainability is mediated by environmental performance.

H6: The crucial connection among eco-friendly learning and growth and long-term business viability is mediated through workers' output.

H7: Rewards and incentive programs that encourage environmental responsibility have a major impact on a company's viability over time.

H8: The substantial relationship among green incentives and remuneration and organizational sustainability is mediated by environmental performance.

H9: The crucial connection among green remuneration and retention is mediated by employee output.\

5. DATA ANALYSES AND FINDINGS

A total of 165 participants were included in the pilot study, which relied on a questionnaire to gather information. The 31-item questionnaires were sent out to various groups. Out of the 165 people that filled out the survey, 160 were returned. The information was gathered by sending a standardized questionnaire to each business that was visited at a predetermined time. There were five components to the evaluation of environmental sustainability assessment, five components to the evaluation of green learning and growth, and three components to the assessment of green incentives and pay. The sustainability of an organization was evaluated using eight indicators: ecological efficiency was assessed using five indicators, employee performance was evaluated using five indicators, and so on. The responses to each variable were rated on a five-point Likert scale.

5.1 Measurement design

The topics of environmental efficiency, worker efficiency, and OS were investigated, together with green management of performance and evaluation, green learning and growth, green incentives and pay, and so on. The model's accuracy and precision were first verified using an algorithm. According to Table 1, 29 of the 31 variables had exterior loadings larger than 0.70, indicating they were all within the acceptable range.

Table 1: Comparison of discriminant validity

Discriminant validity	EMP	EP	GRC	GTD	GPMA	OS
Workers performance	0.737					
Environmental activity	0.727	0.736				
Green incentives and compensation	0.686	0.689	0.862			
Green learning and growth	0.721	.0732	0.675	0.739		
Green performance management and appraisal	0.679	0.726	0.713	0.710	0.780	
OS	0.705	0.710	0.704	0.738	0.722	0.721

5.2 Validity for discrimination

Model compatibility was assessed through convergence validity and discriminatory validity assessments. Composite reliability and average variance extracted were used to test for convergence validity. Each AVE and CR number must be larger than 0.50 and 0.70. All values of AVE and Composite Reliability are above the value

levels, proving convergence validity. The model's discriminating validity was examined using the researchers' criteria, which required all components' orthogonal values to be higher than their correlations with other themes. The findings provide evidence for the model's discriminatory validity. As seen in Table 2, the square root of the product of all diagonal values for an element is larger than the magnitude of its correlation with any other construct.

Table 2: Comparison of Model predictiveness and applicability

No.	R-squared (R ²⁾	Q^2
Efficiency of Workers	0.745	0.372
Environmental activity	0.688	0.342
OS	0.697	0.332

5.3 Model of the Structure

Previous studies have shown that the predictive potential of a model may be gauged by calculating its R-squared value. R-squared values are calculated; an R-squared value of 0.50 implies that the simulation has 50% predictive ability. The Q 2 test of cross-validation redundant systems, where a value larger than 0 indicates that the method has predictive value. No non-positive value of Q2 exists.

5.4 Hypothesis testing

There is a substantial and highly probable positive connection among the variables that are both dependent and independent and the mediators, as seen in Table 3's beta values. OS is strongly influenced by employee performance and by environmental performance. Green incentives and payment significantly impact employee performance; green incentives and payment significantly affect environmental performance; green instruction and growth significantly impact employee performance. Both the effect of green appraisal and management of performance and the influence of green performance management and appraisal are statistically significant.

Table 3: Cause-and-effect and mediating effects

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Hypothesis	Relationship	Indirect effects	Result	Direct effects	Total effects
	GRC→EP→OS	p value = 0.002		p-value = 0.026	p-value = 0.001
H7		$\beta = 0.111$	Partial	$\beta = 0.069$	$\beta = 0.179$
		t = 3.119		t = 3.023	t = 4.132
	GTD→EMP→OS	p value = 0.002		p-value = 0.046	p-value = 0.000
Н6		$\beta = 0.085$	Partial	$\beta = 0.076$	$\beta = 0.145$
		t = 2.595		t = 3.0996	t = 2.182
	GTD → EP → OS	p value = 0.01		p-value = 0.033	p-value = 0.032
H5		$\beta = 0.094$	Partial	$\beta = 0.064$	$\beta = 0.159$
		t = 1.762		t = 2.090	t = 3.451
	GPMA→EMP→OS	p value = 0.080		p-value = 0.044	p-value = 0.031
Н3		$\beta = 0.036$	Partial	$\beta = 0.348$	$\beta = 0.383$
		t = 1.653		t = 4.272	t = 7.575
	GPMA → EP → OS	p value = 0.0075		p-value = 0.001	p-value = 0.000
H2		$\beta = 0.562$	Partial	$\beta = 0.259$	$\beta = 0817$
		t = 7.119		t = 5.33	t = 7.575
		p value = 0.001		p-value = 0.001	p-value = 0.001
H9	GRC→ EMP→OS	$\beta = .150$	Partial	$\beta = 0.140$	$\beta = 0.289$
		t = 3.275		t = 2.232	t = 6.617

The findings demonstrate that environmental performance is a key intermediary among green incentives and pay and long-term success for businesses. Both the direct and indirect impacts are substantial, with environmental performance partly mediating the effect of green incentives and payment on organizational sustainability. This

evidence supports hypothesis 9. The findings recommended that the connection between green incentives and pay and organisational sustainability is somewhat mediated by employees' performance.

The data shows that both the direct and indirect effects are statistically significant, lending credence to H7. Organizational sustainability is linked with ecological performance, which in turn is linked to green learning and growth. Both the direct effect and the indirect impact are significant, indicating that staff performance partly mediates these effects. Therefore, we accept hypothesis 6.

The fifth hypothesis (H5) postulated that productivity was the intermediary among green learning and growth and long-term success for businesses. Table 4-5 and Figure 3-4 displays the results, which confirm the theory. Both the direct and indirect impacts can be shown in the table 3.

The connection among green performance management and assessment and organisational sustainability is mediated by the performance of the environment. Employee performance was shown to moderate this association, as indicated by the significance of the indirect consequences, indicating that H3 should be accepted. The effectiveness of green performance management and evaluation of organizational sustainability is mediated by employees' actual achievement. There is a substantial mediation impact on employee performance among green performance management and assessment and OS. The findings lend credence to Hypothesis 2.

Hypothesis	Beta value		
H1	0.469		
H2	0.535		
H3	0.542		
H4	0.181		
H5	0.162		
H6	0.264		
H7	0.142		
H8	0.196		
H9	0.122		

Table 4: Comparison of Hypothesis associations for Beta value

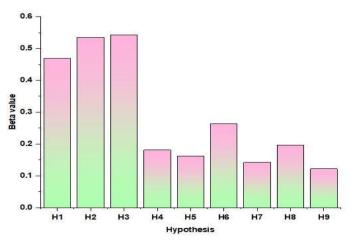


Figure 3: Hypothesis associations for Beta value

Table 5: Comparison of Hypothesis associations for the t statistic

Hypothesis	t statistic
H1	7.74
H2	7.053
Н3	7.087
H4	2.845

H5	0.1969
H6	3.378
H7	3.395
H8	2.943
H9	2.389

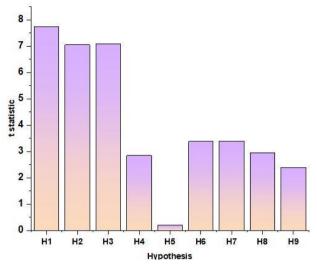


Figure 4: Hypothesis associations for t statistics

6. RESEARCH LIMITATIONS

Despite the fact this research is based on information gathered from the garments, the results need to be extrapolated to other societies and industries to find out how GHRM practices can improve organizational performance in the long run. Because there haven't been enough experiments, more study needs to be done to find out how GHRM practices can help companies make better goods and lower hazards to the environment. Detail-oriented studies of the garments and other production sectors in nations that are developing are needed to make the current results more applicable and to find the optimal contrast of GHRM practices needed for sustainable development, which in turn helps an organization stay in business.

7. CONCLUSION AND IMPLICATIONS

The present study's overarching goal was to learn how GHRM practices affect environmental performance and workers performance, and how those two factors interact to ensure the industry can thrive over the long haul. The findings indicate that sustainable instruction and growth have a moderate impact on workers' efficiency and productivity. Green learning and growth were shown to have the greatest impact on worker productivity in research conducted in Mexico between 220 industrial enterprises. Employee productivity is greatly aided by green learning and growth programs. Similar outcomes in other developing nations like India when it comes to reaping the advantages of GHRM practices from their workforce. These findings point to the need for increased investment in green education and training in Pakistan as a means of better implementing GHRM practices. The conclusions of this research are consistent with the claims of proponents of the idea that training programs for workers might improve productivity. Learning and development initiatives for staff should include a wide range of social and environmental topics.

Staff performance may benefit from having their efforts quantified. In order to maximize productivity, businesses should use ecological management systems and across-the-company KPIs for analyzing resource acquisition, utilization, and waste. By establishing EM goals and responsibilities, monitoring EM behaviors, and assessing the attainment of ecological goals using green work ratings, HRM may more effectively include EP in PMS. Green learning and growth were shown to have a positive influence on an OS, and this link was moderated by environmental performance. Conclusions from other research are consistent. There is a direct correlation between top-level management's involvement and support for environmental protection initiatives

and the longevity of the organization. The present research also discovered that the connection among green education and training and organisational sustainability is considerably mediated by employees' performance. Green training seems to have a considerable impact on EP in Mexico's industrial sector. The Pakistani manufacturing sector adopts a more cost-effective green training procedure since training is based on monetary compensation. Employee performance is significantly correlated with green incentives and remuneration, according to the study's results. Organizational performance improves when employees are rewarded for doing their part to protect the environment while bad actions are ignored. Management's dedication to workers' performance may be shown via incentive schemes that also serve to reinforce and motivate positive environmental behaviors on the part of the staff.

The outcomes of this study show that green environmental success has a strong effect on the relationship among green awards and pay and organisational survival. Studies from the past show that for organizations to keep up with overall achievement standards, they need to set up environmental management analysis tools and environmental reports. Scholars say that supervisors need to set goals and tasks for employees' sustainable development so that it is easy to measure their performance. Many experts have talked about how important it is to make green crews that include workers as part of the leadership group. The job of the green team, on the other hand, is used within manufacturing companies. It is expected that production companies that know how to handle it in a green way will be valuable.

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