The effects of green human resource management practices on sustainable performance: the mediating role of green climat and green employee empowerment.

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Abstract

The article aimed to investigate the mediating role of green climate and green employee empowerment on the relationship between green human resource management (GHRM) practices and sustainable performance. This research study goals to determine the impact of green recruitment & selection, green training & development, green rewards, and green performance evaluation on sustainable performance. The researchers chose the cross-sectional research design. Cronbach's alpha, exploratory factor analyses were used to verify the instruments. The results of the study revealed that proposed GHRM practices positively affect the sustainable performance. It was found that green climate and green employee empowerment act as mediators between GHRM practices and sustainable performance. This research contributes to the resource-based perspective theory, GHRM practices and sustainable performance over green climate and green employee empowerment as mediators.

Keywords: Green human resource management practices; green climate; green employee empowerment; sustainable performance

Introduction

The manufacturing sector is considered the most important factor contributing to the country's economy and increasing pollution and environmental concerns (Malik et al., 2021). Previously business organizations considered the whole world as a commodity or good. In addition, the business organizations also believed that their business has a limited effect upon the environment. As a result, depletion of resources and environmental issues were raised due to their negligible behavior and attitude (Malik et al., 2020). This problem i.e. environmental issue has forced business organizations

to pay attention to these environmental issues. These environmental problems have raised the issue of sustainable performance. Sustainability was given by WECD Brundtland's (1987). It has three attributes i.e., economic, environmental and social performance. GHRM includes four attributes. Organizations are more concerned about environmental an issue that is why they want to hire those intellectual, those hardworking, talented employees and should have awareness about environmental issues and how to reduce them is very important for organizations (Yusliza et al., 2020). Apart from these ideas, recent studies have given the new concept of green climate and green empowerment. The green climate is a psychological and social process through which organizations can achieve sustainability. It is the perception of individuals working in the organizations about work environment characteristics (Smith et al., 2003). In the same way, green employee empowerment also aims to improve performance. It emphasized employer trust, responsibility, information, autonomy, creativity and flexibility to the empowered workforce (Tiong et al., 2017). The novel idea of this project is to investigate the mediating role of green climate and green employee empowerment on the relationship between GHRM and sustainable performance using RBV. According to the researcher's best knowledge the availability of literature is very limited about the above mentioned variables. The current study will try to fill the gaps in the literature.

The manufacturing industry or sector is more responsible for increasing pollution. That is why it is essential to promote the idea of sustainable performance. Sustainable performance is also called the triple bottom line principle. Pakistan every year contributes 0.4% of the carbon towards world pollution (Shahzad et al., 2017). This percentage is increasing gradually. Stakeholders such as employees, employers, creditors, suppliers, communities and societies have shown great concern about increasing the environmental issues in Pakistan and the whole World (Malik et al., 2020).

Therefore, there is an intense need of a novel and holistic model which can restructure the business and help the organizations to obtain sustainability. On the basis of the above discussion and arguments, we can say that role of green initiatives are very crucial in attaining sustainability. This study has offered original and significant work upon GHRM and SP with mediating the role of green climate and empowerment. Previous studies have been conducted upon green HRM and green intellectual capital (GIC) (Malik et al., 2021, 2021). This is the first study that has included green climate and green employee empowerment as mediators in the current study.

Literature review

This section summarizes the literature in light of current research investigations on GHRM practices, sustainable performance, green climate and employee empowerment that have already been investigated by researchers.

Green Human Resource Management (GHRM)

When a company's environmental aims and human resource goals are aligned, this is referred to as GHRM (Jabbour et al., 2019). The term "green HRM" refers to the "systematic, deliberate integration of traditional human resource management techniques with the company's environmental objectives" (Jabbour, 2013). And according to (Mishra, 2017) GHRM refers to systems and procedures that involve the effective utilization zof resources to benefit humans, society, and the environment. GHRM is responsible for ecological management. It creates a green workforce and

fosters a green culture inside the company. It creates a green workforce and fosters a greener culture and environment inside the company. This is referred to as GHRM when a company's environmental priorities and human resource objectives are aligned (Yong et al., 2020). Four practices of GHRM are added in this thesis as adopted by (Yong et al., 2020).

Green Recruitment and Selection (GRS) and Sustainable Performance

Professionals and human resource managers, directors are looking for talented and hardworking employees who are willing to help firms successfully implement their green policies (Tang et al., 2018). It is not simple as it looks, but firms have realized the importance of GRS. There is a significant relationship reported between green recruitment and selection and sustainable performance (Yong et al., 2020). Furthermore, researchers like Jabbour et al. (2019) also reported the positive and significant relationship among GHRM practices and sustainable performance. Zaid et al., (2018) claimed that organizations could obtain competitive advantage and sustainable performance through GRS. Besides, the study of (Malik et al., 2021) also analyzed influence of GHRM practices on sustainability and results indicated that GRS has positively effect on sustainability (economic, environmental and social performance). So, it hypothesized that:

H_{1a}: GRS has positive effect on sustainable performance.

Green Training and Development (GTD) and Sustainable Performance

One of the most essential GHRM practices for the success of green management at companies is green training and development (GTD). Training help employees how to get maximum output by using minimum resources (Malik et al., 2020 b). It is necessary for firm to give their employees the knowledge in training sessions to purchase green products which are eco-friendly. Anwar et al. (2020) reported the association between sustainability and GTD. Also, the research study of (Yong et al., 2019) investigated the effect of GHRM practices on sustainability in the manufacturing sector. The results showed that green training positively influences on sustainability. Furthermore (Malik et al., 2021) also reported that GTD is helpful in attaining sustainability. Therefore, it is assumed that GTD and development has a positive influence on sustainable performance (environmental , social and economic performance). So, it hypothesized that:

H_{1b}: GTD has positive effect on sustainable performance

Green Rewards (GR) and Sustainable Performance

Employees are rewarded for achievement and performance through the HRM procedures of compensation and rewards. These human resource strategies have been the most effective techniques for connecting an employee's interests to the company's objectives. Employees with better ideas and the potential to help with environmental concerns may be offered various green awards (Anwar, 2020). The study conducted by Singh (2018) reported the role of green rewards upon sustainability. Moreover, (Malik et al., 2021) findings stated that green rewards contribute to achieving sustainability, explicitly stating that green incentives are responsible for delivering considerable long-term success in companies. Hence, it is assumed that green rewards and development have a beneficial impact on sustainable performance. While Malik et al. (2020) also supported the notion

that green rewards have significant effect upon economic, environmental and social performance. So, it hypothesized that:

H_{1c}: GR has positive effect on sustainable performance.

Green Performance Evaluation (GPE) and Sustainable Performance

According to (Jabbour, 2010) green evaluation refers to "evaluating and documenting workers' environmental performance in their workplaces, as well as offering comments on their performance to help them improve their excellent conduct". Management of environmental standards has been set by ISO 14001. Manufacturing firms have to strictly follow the criteria set by ISO. Once the firms fulfilled that criteria, they have been provided with a certificate from ISO. Giving employees regular feedback on their environmental performance helps them improve their environmental sustainability, capacity, and expertise (Jackson et al., 2011). According to the study by Jabbour (2011), there is significant impact of green performance assessment on sustainability. Similarly, (Malik et al., 2021) findings showed that GPE has significant and positive effect on sustainable performance. Besides, GPE positively influences sustainability (Longoni et al., 2018; Renwick et al., 2013). So, it hypothesized that:

H_{1d}: GPE has positive effect on sustainable performance.

Sustainable Performance (S.P)

The concept of sustainability was first given in 1987 in World Commission on Environment development by Brundtland (Environment W C O, 1987). With the growth of the fourth industrial revolution and massive changes in manufacturing sectors numerous environmental concerns have arisen. As a result organizations are taking a strong interest in addressing these problems (Higgins, 2016). The study from Malik et al. (2020) and Malik et al., (2021) was conducted in the manufacturing sector in Pakistan and reported that there is limited knowledge firms have about green initiatives. And their findings indicated positive association among GHRM and sustainable performance. The importance of HRM in promoting environmentally sustainable performance was emphasized by (Aragão & Jabbour, 2017). There is need to raise awareness about going green. That is why sustainable performance is selected as the dependent variable in this study.

Green Climate role as Mediator

The green climate (GCL) is described according to the literature as climate that relates to companies that accomplish sustainable goals by applying a variety of pro-environmental strategies (Paille et al., 2014; Chou, 2014). Employees should be trained to contribute to a company's green goals and assist the company gains a competitive edge. Green HRM and corporate environmental strategy can play a significant role in encouraging environmental performance through green climate (Ojo and Raman, 2019). An empirical study as mediating the role of green climate among GHRM practices and sustainable performance is still being exposed. The existing research observed this gap while green climate was taken as mediator among GHRMP and sustainable performance. The green climate was used as a mediator in earlier studies; for instance, the study (Norton et al., 2014) used green climate as mediator. Further, the study of (Dumont et al., 2017) investigated the role of psychological green climate being a mediator for the relationship between GHRM and in-role green behavior. And the

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results confirmed that psychological green climate fully mediated the relationship GHRM and in-role green behavior. The suggested mediating role of green climate is theoretically justified by these above reasons. So, it hypothesized that:

H_{2a}: Green climate mediates between GRS and sustainable performance.

H_{2b}: Green climate mediates between GTD and sustainable performance.

H_{2c}: Green climate mediates between GR and sustainable performance.

H_{2d}: Green climate mediates between GPE and sustainable performance.

Green Employee Empowerment as Mediator

Green employee empowerment (GEE) is part of green management. Renwick et al., (2013) argued that greening every function of the organization including human resources is called green employee empowerment. Tariq et al., (2016) conducted systematic literature review on GEE and claimed that organizations must go green. The findings of the study of (Hameed et al., 2020) showed that green employee empowerment mediates the relationship between GHRMP and OCBE Kularathne (2020) has used green employee empowerment as a mediator as it positively changes the relationship between GHRMP and environmental performance i.e. predictors and criterion variables. And from his research findings, it is concluded that green employee empowerment significantly mediates the link between GHRMP and environmental performance. Given these findings, it's reasonable to believe that green employee empowerment mediates the association among GHRMP and sustainable performance. So, it hypothesized that:

H_{3a}: Green employee empowerment mediates between GRS and sustainable performance.

H_{3b}: Green employee empowerment mediates between GTD and sustainable performance.

H_{3c}: Green employee empowerment mediates between GR and sustainable performance.

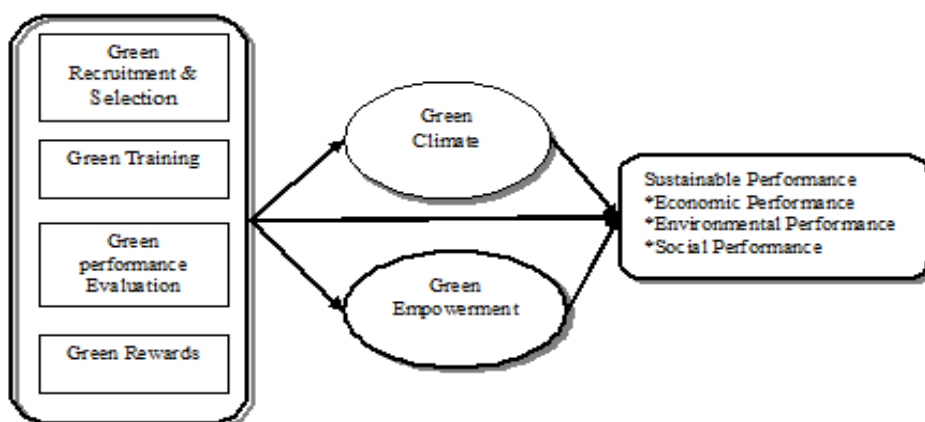H_{3d}: Green employee empowerment mediates between GPE and sustainable performance.

Figure 1 Theoretical Frameworks

Research Methods

Current study uses a survey approach research design. And advantage of a survey is to save time, cost, effort and data from a big population could be collected in a short time. The current study has been supported by positivism philosophy.

Population and Sampling

The manufacturing sector is considered as most contributing one towards the economy as well as pollution. So the researcher has decided to select all the manufacturing firms which have initiated green activities. The manufacturing sector is relevant for this study. it includes cement factories, textiles mills, sugar mills, leather industry, furniture industry, wood industry, food and beverages, pesticides and chemical industry, sports, pharmaceutical industry, health-related sector, plastic, agriculture, dairy industry, fruit processing industry, and construction industry i.e., real estate and brick-making factories. The convenience sampling technique is a non-probability technique. Total in Pakistan, approximately more than 3 million firms have been registered. Of which 19.72% were manufacturing while others are services or other kinds of firms. Those manufacturing firms with a minimum number of 10 employees up to 250 employees are selected in the current study. Those firms that have green activities initiated and listed at the Pakistan stock exchange are selected. Manufacturing companies in Pakistan have 10-250 people and yearly sales of 250 million Pakistani rupees (Subhan et al., 2013). Hence, 246 on the basis of the number of workers working, 246 manufacturing companies have been identified. Also, G*Power software could be used for selecting sample size. But in the current study researcher has chosen purposively the firms who fulfill the criteria for this study.

As a result, 246 questionnaires were distributed, six of which were incomplete and were not utilized in data analysis, and 16 respondents did not reply to the questionnaires. Consequently, the response rate was 91 percent, which included the 224 questionnaires that were correctly completed. Those with expertise and experience in GHRM practices, green climate, green employee empowerment, and sustainable performance were chosen as responders.

Measures

The scale of sustainability was adopted from Malik et al. (2021), Malik et al. (2020), it has three dimensions economic, social and environmental performances. Total 15 items scale measured on seven points Likert scale ranging from 1-7 not at all, to a great extent. This scale is already validated in previous studies. The GHRM practices scale has 12 items, four items for recruitment and selection. Three items for GTD, three items for GPE and two items for GR. This instrument is also adopted (Yong et al., 2020) has validated this questionnaire. It is also measured on seven-point scale ranging from 1-7 not at all, to a great extent. The green climate scale was adopted from Norton et al (2014) and Naz et al., (2021) it's a 5 item scale. This scale is previously used by researchers and validated. And green employee empowerment scale was five-item scale adopted from Tiong et al. (2017). Researchers have already used and validated this scale.

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Data Analysis

The research model i.e., the theoretical framework, will be analyzed in SPSS 25. The data collected will be cross-sectional in nature. Descriptive statistics and inferential statistics will be used for analyzing data. Mean standard deviation, reliability for Cronbach's alpha and factor analysis for validity will be used. While multiple regression was used to examine the direct impact of independent variable over dependent variable and hierarchical multiple regression used to test the hypotheses of mediation.

Table 1a Mean, Standard Deviation, KMO & BTS, Exploratory Factor Analysis, Cronbach's Alpha.

Construct	Item No.	Mean	S.D	KMO & Bartlett's Test	Loadings EFA	Cronbach's Alpha
Green Recruitment & Selection (GRS)	GRS 1	3.22	1.477	KMO= 0.718 BTS=648.9 85	0.862	7.26
	GRS 2	3.36	1.163		0.762	
	GRS 3	3.08	1.089		0.660	
	GRS 4	3.51	1.171		0.534	
Green Training & Development (GTD)	GTD 1	3.28	1.24		0.447	
	GTD 2	3.13	1.294		0.344	
	GTD 3	3.16	1.399		0.434	
Green Rewards (GR)	GR1	3.32	1.403		0.642	
	GR2	3.69	1.252		0.666	
Green Performance Evaluation (GPE)	GPE1	3.14	1.207		0.571	
	GPE2	3.29	1.1		0.594	
	GPE3	3.18	1.218		0.590	
Green Employee Empowerment (GEE)	GEE 1	3.58	1.017	KMO=0.62 0 BTS=272.4 28	0.641	.697
	GEE 2	3.69	1.163		0.755	
	GEE 3	3.62	1.207		0.461	
	GEE 4	3.53	1.152		0.808	

Construct	Item No.	Mean	S.D	KMO & Bartlett's Test	Loadings EFA	Cronbach's Alpha
	GEE 5	3.67	1.112		0.828	
Green Climate (GCL)	GCL 1	3.08	1.089	KMO=0.771 BTS= 233.871	0.562	.726
	GCL 2	3.51	1.171		0.696	
	GCL 3	3.51	1.100		0.690	
	GCL 4	3.37	1.129		0.758	
	GCL 5	3.43	1.074		0.532	
	GCL 6	3.61	1.074		0.646	
Economic Performance (ECP)	ECP1	3.50	1.059		0.601	
	ECP2	3.48	0.979		0.657	
	ECP3	3.27	1.021		0.454	
	ECP4	3.54	1.116		0.975	
	ECP5	3.51	1.160		0.938	
Social Performance (SCP)	SCP1	3.06	1.129	KMO=0.615 BTS=459.236	0.963	.813
	SCP2	3.47	1.050		0.993	
	SCP3	3.54	1.089		0.995	
	SCP4	3.22	1.477		0.811	
	SCP5	3.36	1.163		0.769	
Environmental Performance (ENP)	ENP1	3.36	1.189		0.963	
	ENP2	3.47	1.050		0.993	
	ENP3	3.55	1.099		0.995	
	ENP4	3.54	1.116		0.975	
	ENP5	3.51	1.160		0.938	

Results of study

Analysis of results shown that GRS has four items, GTD has three items, GR has two items and GPE has three items. Std. Dev. of all items are above >1.0, the Std. Dev. of all above items are relatively near to each other, indicating that respondents' replies are homogeneous. Similarly, analysis of results shown that total numbers of items are 15 regarding sustainable performance i.e. ECP, ENP, & SCP. And ECP has five items and Std. Dev. of all items is above >1.0.The Std. Dev. of all S.P items are relatively near to each other, indicating that respondents' replies are homogeneous. Also, GCL

has six items and Std. Dev. of all items is above >1.0, and GEE has five items and Std. Dev. of all items is above >1.0, indicating that respondents' replies are homogeneous. An exploratory factor analysis was conducted for GRS, GTD, GPE & GR. (Field) 2013 provided some specific rules. E.g. KMO value must be a higher than > 0.50 and BTS on the other hand must be significant and all factor loadings must be higher than 0.40. According to (Cronbach, 1951) Alpha should have a value of 0.6 or above to be considered satisfactory. And Cronbach's alpha is rated reliable if it is more than 0.70 (Field, 2013).

Table-1 shows KMO=0.718, BTS=648.985, factor loadings ranges between 0.344 - 0.862. Therefore scale of GRS, GT, GPE & GR have been found valid and reliable. Total numbers of items are 12 regarding GRS, GT, GPE & GR to test internal reliability using Cronbach's alpha. The value of alpha (α) is 0.726 demonstrating a reliable internal consistence. Likewise, table-1 shows KMO=0.620, BTS=272.428, factor loadings ranges between 0.461 - 0.828 for GEE. And table-1 shows KMO=0.771, BTS=233.871, factor loadings ranges between 0.532 - 0.758 for GCL. Thus scale of GEE and GCL have been found valid and reliable. Total numbers of items are 5 regarding green employee empowerment and total number of items are 6 regarding green climate to test internal reliability using Cronbach's alpha. And value of alpha (α) are .697 and .726 respectively. Similarly table-1 shows KMO= 0.615, BTS=459.236, factor loadings ranges between 0.454 - 0.995. Therefore scales of ECP, ENP, & SCP have been found valid and reliable. Total numbers of items are 15 regarding sustainable performance i.e. ECP, ENP, & SCP to test internal reliability using Cronbach's alpha. The alpha varies from 0 to 1. According to (Mugenda, 2003) the value of alpha (α) 0.80 or above indicates that the data is highly reliable. So, the alpha is rated reliable as the value of alpha for fifteen items .813. Hence, the data is highly reliable.

Regression Analysis

Table 2: Regression Analysis

D.V	I.V	R	R²	F	β	P	Accepted hypothesis
Model 1a SP	Constant	.646	.417	158.848		0.000	(H1a):Yes
	GRS				0.646	0.000	
Model 2a SP	Constant	.367	.135	34.524		0.000	(H1b):Yes
	GTD				0.367	0.000	
Model 3a SP	Constant	.466	.217	61.443		0.000	(H1c):Yes
	GR				0.466	0.000	
Model 4a SP	Constant	.282	.080	19.226		0.000	(H1d):Yes
	GPE				0.282	0.000	

Table 2 displays the results of regression analysis. It was clear from the analysis and the findings that GRS (Model 1a) shown significant variance on S.P i.e. R^2= 0.417, 41.7% variance and model has been found fit i.e. F=158.848, p=.000 β= 0.646, p=0.000 explain one unit change in GRS bring 64.6% change in S.P. Similarly, (Model 2a) GTD displays variance R^2=0.135 i.e. 13.5% and model found fit F=34.524,p=0.000, β=0.367, p=.000 explain one unit change in training and development changes 36.7% S.P positively. In (model 3a) GR display variance R^2=0.217, i.e. 21.7% F=61.443, β=0.466, p=0.000 explain 46.6% S.P may enhanced if fair GR are provided to workers. Also, (Model 4a) GPE R^2=0.080, i.e. 8.0% variance F=19.226, β=0.282, p=0.000 explains 28.2% increase observed.

Table 3: Mediation Table of Green Climate

DV	IV	R	R^2	F	β	p	Accepted hypotheses
MODEL 1 SUSPER	Constant	.6800	.4623	95.0237		0.000	H2a Yes
CPRIME	GRS				.3518	0.000	
B PATH	GCLIMATE				.2273	0.000	
MODEL 2 SUSPER	Constant	.4977	.2477	36.3874		0.000	H2b Yes
CPRIME	GTD				.2826	0.000	
B PATH	GCLIMATE				.3507	0.000	
MODEL 3 SUSPER	Constant	.5423	.2941	46.0446		0.000	H2c Yes
CPRIME	GR				.3579	0.000	
B PATH	GCLIMATE				.2979	0.000	
MODEL 4 SUSPER	Constant	.4901	.2402	34.9297		0.000	H2d Yes
CPRIME	GPE				.0980	0.000	
B PATH	GCLIMATE				.4025	0.000	

Through investigation of results, table-3 (Model-1) green climate (GCL) used as a mediator between GRS and sustainable performance (SP). And results showed that GCL positively and significantly mediated between GRS and S.P i.e. (R^2 = .4623, F= 95.0237, p = 0.000, β (GRS) = .3518, p = 0.000, β (Green Climate) = .2273, p = 0.000). The R^2 showing 46.2% of the variance in sustainable performance explains by the construct of GRS. This means that one unit change in green climate can positively bring change in sustainable performance and help firms to obtain competitive advantage over competitors. The above results show that GCL mediates the relationship between GRS and SP.

Based on the above results, H2a is accepted. Moreover, results showed that green climate positively & significantly mediated between GTD and sustainable performance i.e. (R^2 = .2477, F= 36.3874, p = 0.000 β (GTD) = .2826, p = 0.000, β (Green Climate) = .3507, p = 0.000). The R^2 showing 24.7% of the variance in sustainable performance explains by the construct of GTD. Based on the above results, H2b is accepted.

Besides from investigation of results, table-3 (Model-3) results showed that Green Climate positively mediated between GR and S.P i.e. (R^2 = .2941, F= 46.0446, p = 0.000 β (GR) = .3579, p = 0.000, β (Green Climate) = .2979, p = 0.000). The R^2 showing 29.4% of the variance in sustainable performance explains by the construct of GR. The above results show that GCL mediates the relationship between GR and SP. On the basis of above results, H2c is accepted. Moreover, table-3 (Model-4) results showed that GCL positively mediated between GPE and sustainable performance i.e. (R^2 = .2402, F= 34.9297, p = 0.000 β (GPE) = .0980, p = 0.000, β (Green Climate) = .4025, p = 0.000). The R^2 showing 24.02% of the variance in sustainable performance explains by the construct of GPE. That means one unit change in green climate may positively bring change in sustainable performance. The above results show that GCL mediates the relationship between GPE and SP. On the basis of above results, H2d is accepted.

Table 4: Mediation Table Green Employee Empowerment

DV	IV	R	R^2	F	β	p	Accepted hypotheses
MODEL 5	Constant	.6676	.4457	88.8572		0.000	H3a
SUSPER							
CPRIME	GRS				.3865	0.000	Yes
B PATH	GEE				.1835	0.000	
MODEL 6	Constant	.4769	.2274	32.5255		0.000	H3b
SUSPER							
CPRIME	GTD				.3186	0.000	Yes
B PATH	GEMP				.3214	0.000	
MODEL 7	Constant	.5198	.2702	40.9090		0.000	
SUSPER							
CPRIME	GR				.4211	0.000	H3c
B PATH	GEMP				.2548	0.000	Yes
MODEL 8	Constant	.4798	.2302	33.0404		0.000	H3d
SUSPER							
CPRIME	GPE				.0659	0.000	Yes
B PATH	GEMP				.3888	0.000	

Through investigation of results, table-4 (Model-5) Green employee empowerment (GEE) was used as a mediator between GHRM and sustainable performance. And results analysis showed that GEE

positively and significantly mediated between GRS and S.P i.e. (R^2 = .4457, F= 88.8572, p = 0.000, β (GRS) = .3865, p = 0.000, β (GEE) = .1835, p = 0.000). The R^2 showing 44.5% of the variance in sustainable performance explains by the construct of GRS. This means that one unit change in green employee empowerment can positively bring change in sustainable performance and help organizations to attain competitive advantage over rivals. Based on the above results, H3a is accepted. And results analysis showed, table-4 (Model-6) GEE was used as a mediator between GHRM and sustainable performance. Further analysis of results shown that GEE positively and significantly mediated between GTD and sustainable performance i.e. (R^2 = .2274, F= 32.5255, p = 0.000, β (GTD) = .3186, p = 0.000, β (GEE) = .3214, p = 0.000). The R^2 showing 22.7% of the variance in S.P explains by the construct of GTD. On the basis of the above results, H3b is accepted. Moreover, after scrutiny of results, table-4 (Model-7) results shown that GEE positively mediated between GRE and sustainable performance i.e. (R^2 = .2702, F= 40.9090, p = 0.000, β (GR) = .4211, p = 0.000, β (GEE) = .2548, p = 0.000). The R^2 showing 27.02% of the variance in S.P explains by the construct of GR. Based on above results, H3c is accepted. Furthermore, after study of results, table-4 (Model-8) GEE was used as a mediator between GHRM and sustainable performance. And results showed that GEE positively mediated between GPE and sustainable performance i.e. (R^2 = .2302, F= 33.0404, p = 0.000, β (GPE) = .0659, p = 0.000, β (GEE) = .3888, p = 0.000). The R^2 showing 23.0% of the variance in sustainable performance explains by the construct of GPE. This means that one unit change in GEE can positively bring change in sustainable performance. The above results show that GEE mediates the relationship between GPE and SP. On the basis of above results, H3d is accepted.

Discussion

In the current study the researcher examined the mediating role of green climate and green employee empowerment on the relationship between green HRM practices and sustainable performance. Getting support through the lens of resource-based view theory. The researchers adopted a cross-sectional research approach. Hypotheses H1a, H1b, H1c, H1d developed to examine that GHRM practices has a positive effect on sustainable performance. The results have shown that GRS, GTD, GR and GPE have positive impact on S.P. HRM strategies that allows a company to present green HRM initiatives to potential job seekers. Hiring and retaining skilled workers is often regarded as the most difficult issue for HR managers in today's competitive business environment (Sudin, 2011). The results of research indicate that GRS has positive association with S.P. And GRS has positive effect on S.P. These findings are consistent with previous findings of (Malik et al., 2021) who were also analyzed influence of GHRM practices on sustainability and results indicated that GRS has positively effect on sustainable performance.

One of the essential GHRM practices for the development and effectiveness of green management at companies is green training & development. According to research by (Bhutto & Auranzeb, 2016) green training and green recruiting have a substantial impact on a business's success. The results of study indicate that GTD has positive effect on S.P. These findings are consistent with previous findings of (Yong et al., 2019; Malik et al., 2021) they exposed that green training positively influences on sustainability and results indicated that GTD has positively effect on S.P. Green rewards system are important for motivating individuals and recognizing their major contributions to environmental management. According to previous study, the green reward program is an effective

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way to practice green HRM (Jackson, 2011). Thus the employee's desire to address the company's environmental concerns improves as a result of rewards. Besides, the findings of (Malik et al., 2020) also supported the notion that green rewards have significant effect upon economic, environmental and social performance. According to Anton, 2016 green performance evaluation may be described as the degree to which specific personnel participate in green behavior, actions and activities and generate outcomes over a duration of time. So, GPE is a method of assessing performance in terms of how effectively workers are progressing toward a greener environment. Green performance evaluation positively influences sustainability (Longoni et al., 2018; Renwick et al., 2013). Also, (Malik et al., 2021) findings showed that GPE has significant and positive effect on sustainable performance.

In this study, green climate has been used as mediator between GHRM practices including (GRS, GTD, GR & GPE) and sustainable performance and hypotheses H_{2a}, H_{2b}, H_{2c}, H_{2d} were formulated. In previous research, the green climate was employed as a mediator; for example, in the study (Norton et al., 2014), the green climate was used as a mediator. Organizations should encourage their staff to use ecologically friendly methods, since this will help to improve the green atmosphere. Employees express their views on company policies, conventions, practices, and laws relating to ecological concerns, as well as their own personal well-being. Employees should be taught to help a firm achieve its green goals and gain a competitive advantage (Yusliza et al., 2020). Green climate is defined as the climate that applies to companies that attain sustainable goals by applying a variety of pro-environmental policies, according to the literature. An empirical study as mediating the role of green climate among GHRM practices and sustainable performance is still being exposed. The present research observed this gap while green climate was taken as mediator among GHRMP and sustainable performance. The role of psychological green climate as a mediator for the connection between GHRM and in-role green behavior was studied by (Dumont et al., 2017). And the results established that psychological green climate fully mediated the relationship GHRM and in-role green behavior. Thus, on the basis of research findings and discussions, H_{2a}, H_{2b}, H_{2c}, H_{2d} are accepted.

In this study, green employee empowerment has been used as mediator between GHRM practices including (GRS, GTD, GR & GPE) and sustainable performance. And based on literature, hypotheses H_{3a}, H_{3b}, H_{3c}, H_{3d} were formulated. Employees with a greater sense of empowerment are more likely to engage in proactive behavior, which is necessary to environmental performance. Employees feel obligated to show a green conduct when they get advantages or incentives from the business for environmental activities of (Hameed et al., 2020). Green employee empowerment has been utilized as a mediator by Kularathne (2020) since it positively alters the relationship between GHRMP and environmental performance, i.e. predictors and criterion variables. Green employee empowerment substantially mediates the relationship between GHRMP and environmental performance, according to his research findings. Considering these findings, it's acceptable to infer that green employee empowerment is a mediating factor of relationship between GHRMP and sustainable performance. Hence, above findings are matched with the findings of current study. This clearly suggests that the hypotheses we've given are accurate. Therefore, on the basis of the above discussion H_{3a}, H_{3b}, H_{3c}, H_{3d} have been accepted.

Conclusion

This research study goals to determine the impact of green recruitment & selection, green training & development, green rewards, and green performance evaluation on sustainable performance. The novel idea of this project is to investigate the mediating role of green climate and green employee empowerment on the relationship between GHRM and sustainable performance using RBV. The manufacturing industry or sector is more responsible for increasing pollution. That is why it is essential to promote the idea of sustainable performance. Recent studies have given the new concept of green climate and green empowerment. The green climate is a psychological and social process through which organizations can achieve sustainability. The study's results and other related findings revealed that GRS, GTD, GR, GPE positively affect the sustainable performance. Also results of existing study shown that green climate and green employee empowerment positively and significantly mediated between proposed GHRM practices and sustainable performance. According to current research, GHRM practices are most suited to improving sustainable performance. Despite the fact that this study was performed in the perspective of Pakistani manufacturing firms which have important implications regarding management in general. The findings of this thesis have implications for the management of manufacturing firms that have assigned responsibility and authority for workforce & departments of HR and may benefit from the findings of study. The link between GHRM practices, green climate, green employee empowerment, and sustainability has been studied in this research, which adds to an existing body of knowledge. To successfully and efficiently implement corporate green strategies and policies, a rising number of studies have proposed that businesses should embrace GHRM practices. The current study supports these researchers by providing empirical evidence of significant links between GHRM and sustainable performance via the mediation of green climate and green employee empowerment. According to the present research findings, if a firm decides to set up and pursue a green goal agenda, it should adopt GHRM practices. Organizations may communicate their environmental policies to current and future workers to create accurate and educated opinions about the company.

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