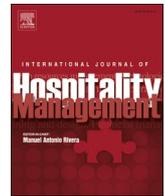




Contents lists available at ScienceDirect

## International Journal of Hospitality Management

journal homepage: [www.elsevier.com/locate/ijhm](http://www.elsevier.com/locate/ijhm)

# The effects of green human resource management and perceived organizational support for the environment on green and non-green hotel employee outcomes

Osman M. Karatepe<sup>a,\*,1</sup>, Hungchen Hsieh<sup>b</sup>, Mohammed Aboramadan<sup>c</sup>

<sup>a</sup> Faculty of Tourism, Eastern Mediterranean University, Gazimagusa, TRNC, Via Mersin 10, 99628, Turkey

<sup>b</sup> Department of Western Culinary Arts, National Kaohsiung University of Hospitality and Tourism, No. 1, Songhe Rd., Xiaogang Dist., Kaohsiung City 812, Taiwan

<sup>c</sup> Department of Economics, University degli Studi dell'Insubria, Varese, Italy

## ARTICLE INFO

## Keywords:

Employee turnover  
Green human resource management  
Hotel employees  
Perceived organizational support for the environment  
Pro-environmental behavior  
Work engagement

## ABSTRACT

Research about green human resource management and perceived organizational support for the environment in the hospitality and tourism literature is in its development stage. Therefore, our paper tests the interrelationships of green human resource management, perceived organizational support for the environment, work engagement, task-related pro-environmental behavior, and quitting intentions. Data gathered from hotel employees with a time lag of one week in Taiwan were assessed tapping structural equation modeling. The empirical findings offer strong support for hypotheses and suggest that our model is viable. More precisely, green human resource management enhances employees' perceptions of organizational support for the environment, while perceived organizational support for the environment fosters work engagement and task-related pro-environmental behavior and reduces quitting intentions. Perceived organizational support for the environment and work engagement sequentially mediate the effect of green human resource management on the aforesaid outcomes.

## 1. Introduction

In a strict competitive marketplace, hospitality managers realize that paying attention to the preservation of the environment and activating employees' eco-friendly behaviors are among the important indicators of the company's investment in environmental sustainability (e.g., Sharma et al., 2020). Though some hotels do not value environmental sustainable practices as much as commercial outcomes (Khatter et al., 2021), there is an increasing interest in green management and environmental sustainability in the hospitality industry. For instance, Marriott International has sustainability initiatives in four areas such as "nurturing our world", "empowering through opportunity", "sustaining responsible operation", and "welcoming all and advancing human rights" in the sustainability and social impact goals program for 2025 (Marriott, 2021). Investing in employees through favorable job conditions and the environmental sustainability program highlights the presence of green human resource management (GHRM) practices and the company's promotion of its employees' sustainable actions (cf. Umrani et al., 2020; Ramus, 2011).

GHRM, which denotes "...the systematic, planned alignment of typical human resource management practices with the organization's environmental goals..." (Jabbour, 2013, pp. 147–148), enhances employees' green-related and environmental outcomes (e.g., Úbeda-García et al., 2021a; Nisar et al., 2021). Employees' perceptions of green human resource practices represent the basis for the environmental support provided by the company (Aboramadan and Karatepe, 2021; Ahmed et al., 2021b). Perceived organizational support for the environment (POSE) denotes "...the specific beliefs held by employees concerning how much the organization values their contributions toward sustainability" (Lamm et al., 2015, p. 209) and results in green and non-green positive consequences (e.g., job satisfaction, diminished proclivity to quit, and organizational citizenship behavior for the environment, OCB-E) (Lamm et al., 2015; Paillé and Mejia-Morelos, 2019). Despite this realization, the hospitality and tourism research still lacks evidence about the potential green and non-green positive consequences of GHRM and POSE among hotel employees (Aboramadan and Karatepe, 2021; Nisar et al., 2021; Umrani et al., 2020). This is surprising because management cannot achieve the organization's environmental

\* Corresponding author.

E-mail addresses: [osman.karatepe@emu.edu.tr](mailto:osman.karatepe@emu.edu.tr) (O.M. Karatepe), [paulh@mail.nkuht.edu.tw](mailto:paulh@mail.nkuht.edu.tw) (H. Hsieh), [mohammed.aboramadan@uninsubria.it](mailto:mohammed.aboramadan@uninsubria.it) (M. Aboramadan).

<sup>1</sup> Orcid ID: 0000-0003-3120-8755

<https://doi.org/10.1016/j.ijhm.2022.103202>

Received 28 July 2021; Received in revised form 27 February 2022; Accepted 1 March 2022

Available online 7 March 2022

0278-4319/© 2022 Elsevier Ltd. All rights reserved.

sustainability goals without the active involvement of employees (Kalyar et al., 2021; Karatepe et al., 2020).

### 1.1. Purpose

Our paper proposes and tests a research model that explores the interrelationships of GHRM, POSE, work engagement (WENG), task-related pro-environmental behavior (PEB), and quitting intentions. Accordingly, our paper addresses four critical research questions: (1) what is the nature of relationship between GHRM and POSE?; (2) what is the nature of association between POSE, WENG, task-related PEB, and quitting intentions?; (3) what is the nature of linkage between WENG, task-related PEB, and proclivity to quit; and (4) do POSE and WENG act as the sequential mediators of the effect of GHRM on the aforementioned outcomes?

### 1.2. Contribution

With the present paper, we contribute to the hospitality and tourism literature on GHRM and POSE in the following ways. First, management needs to adopt green practices that would enhance the image of the company (Hameed et al., 2021a). This can be done through human resource management focusing on green practices. GHRM highlights various practices such as green training, green performance appraisal, green rewards, and green hiring in the workplace (e.g., Farooq et al., 2021; Kim et al., 2019). Such practices send messages to employees that the company invests in environmental sustainability and develops their knowledge and skills about green management (Ahmed et al., 2021a,b; Nisar et al., 2021). These signals are interpreted as the basis for POSE. Surprisingly, the extant literature presents only two empirical pieces concerning the linkage between GHRM and POSE (Aboramadan and Karatepe, 2021; Hameed et al., 2021b). In light of this, our paper fills in the said lacuna.

Second, the extant literature delineates few studies that have linked POSE to employee outcomes (Aboramadan and Karatepe, 2021; Bhatnagar and Aggarwal, 2020; Lamm et al., 2015). This is not unsurprising since management investing in environmental sustainability is in need of employees who can deliver exceptional quality services and accomplish customer satisfaction (e.g., Wang et al., 2021; Wu et al., 2021). Work-engaged employees can respond to the aforesaid need (Ozturk et al., 2021; Teng et al., 2021). WENG is designated by “vigor”, “dedication”, and “absorption” (Schaufeli et al., 2006). Employees who work with intensity on, possess positive feelings about, and devote much attention to their jobs exhibit good work-related performance (Ozturk et al., 2021). Such employees may also display task-related PEB (Karatepe et al., 2021), which denotes employees’ completion of tasks in an environmentally-friendly way within the company (Bissing-Olson et al., 2013). Therefore, ascertaining whether POSE fosters the level of employees’ WENG and results in positive workplace outcomes and PEB is imperative.

Third, recent empirical pieces call for research about the consequences of GHRM in service-related settings (e.g., Aboramadan et al., 2021a; Mousa and Othman, 2020). Exploring these outcomes in the hospitality industry is important because hotels are among the main energy-consuming companies (Chen et al., 2021; Karatepe et al., 2021). As stated by Sinclair-Desgagné (2021), companies have to adjust their human resource practices in the realm of environmental sustainability. This makes GHRM a relevant and significant strategy to accomplish the environmental sustainability goals and green initiatives (cf. Aboramadan et al., 2021a; Sabokro et al., 2021). In light of this, it is of utmost importance to exploring the mechanism through which GHRM is related to green and non-green work outcomes.

There are empirical studies reporting that GHRM, green training, or green performance appraisal promotes employees’ green creativity and environmental commitment (e.g., Pham et al., 2019, 2020). However, we do not know whether GHRM influences non-green positive

consequences directly and/or indirectly. This gap has been underscored in Shen’s et al. (2018) and Shafaei et al.’s (2020) papers. Recent studies have also begun to link GHRM to non-green behaviors (Aboramadan and Karatepe, 2021; He et al., 2021). More importantly, this is the first empirical piece of its kind testing POSE and WENG as the sequential mediators of the impact of GHRM on hotel employees’ task-related PEBs and propensity to quit. Such voids are noticeable in recent reviews about GHRM (Amrutha and Geetha, 2020; Yong et al., 2019). By gauging these linkages, it would be possible to ferret out whether green human resource managerial practices foster employees’ task-related PEBs and mitigate their proclivity to quit as a consequence of POSE and WENG.

Lastly, most the empirical pieces on GHRM have been conducted in Western societies and manufacturing industries (Cabral and Jabbour, 2019). There is call for more research about GHRM in the Asian continent (Cooke et al., 2020). To respond to this, we utilize time-lagged data obtained in hotels in Taiwan to test the interrelationships of GHRM, POSE, WENG, task-related PEB, and quitting intentions. Taiwan is an island with plenty of natural resources and has 1450 green hotels as of February 2019 (Chen et al., 2021). However, there is limited information about how hotels make green changes/adjustment and manage energy consumption in the realm of environmental sustainability in Taiwan (Chen et al., 2021).

In the rest of our paper, we delineate the research model. Then, we develop hypotheses based on organizational support (Rhoades and Eisenberger, 2002), social exchange (Cropanzano and Mitchell, 2005), job demands-resources (JD-R) (Bakker and Demerouti, 2017) theories, and limited evidence in the extant literature. These are followed by the method and findings of the empirical investigation carried out in Taiwan. Our paper culminates with a discussion of the key contributions, management implications, and avenues for future research.

## 2. Theoretical framework, hypotheses, and research model

### 2.1. Theoretical focus

Organizational support theory proposes that the availability of human resource practices sends signals to employees that the organization cares about their well-being and values their contributions (Rhoades and Eisenberger, 2002). These practices emanate from the company’s actions done voluntarily (Rhoades and Eisenberger, 2002). Green human resource practices associated with the company’s voluntary efforts to protect the ecological environment foster employees’ perceptions of organizational support toward the environment (Aboramadan and Karatepe, 2021). Employees display positive work-related outcomes such as green and non-green outcomes (i.e., green behaviors and diminished proclivity to leave) when the company develops their knowledge and skills regarding environmental sustainability and greening issues (cf. Rhoades and Eisenberger, 2002).

Employees are highly work-engaged when they find that various job resources are in place. This is supported by JD-R theory that the availability of job resources is a sign of support provided by the company (Karatepe and Aga, 2016). JD-R theory posits that WENG, as a motivational variable, activates employees’ green or eco-friendly behaviors. This is because of the fact that individuals who have positive feelings about their jobs and are bursting with energy are work-engaged (Bakker and Demerouti, 2017). These employees exhibit positive behavioral outcomes and contribute to the organization via their eco-friendly behaviors (Raza et al., 2021).

Social exchange theory contends that the workplace encompasses various social exchanges between the company and employees (Cropanzano and Mitchell, 2005). For instance, job resources stemming from social exchanges makes employees become work-engaged and display lower intention to quit. Employees remain with the company as a consequence of favorable reciprocal exchanges (Saks, 2006). In light of the aforesaid theoretical underpinnings, it is proposed that POSE and WENG sequentially mediate the influence of GHRM on employees’ PEBs

and withdrawal cognitions.

## 2.2. Hypotheses

The hypotheses are: (a) an increase in GHRM results in an increase in POSE; (b) POSE fosters WENG and PEBs, while it mitigates quitting intentions; (c) WENG positively influences PEBs, while it reduces proclivity to quit; and (d) POSE and WENG sequentially mediate the impact of GHRM on these green and non-green work outcomes.

### 2.2.1. Green human resource management and perceived organizational support for the environment

GHRM consists of various practices. Specifically, arranging green training programs enables the company to implement its environmental sustainability operations successfully and results in cleaner production (Diana et al., 2017; Pinzone et al., 2019). These training programs increase employees' knowledge about green management and environmental sustainability, add more to their green-related awareness, and strengthens their environmental commitment and proactive PEBs (Aboramadan et al., 2021b; Ahmed et al., 2021a,b; Pham et al., 2020; Pinzone et al., 2019). The company's GHRM practices can also focus on green selection (Rubel et al., 2021; Yong et al., 2019). Utilization of rigorous selection criteria can result in the identification of the candidates with high levels of environmental sensitivity and knowledge about green- and environmental-related issues (e.g., Nisar et al., 2021). Having a well-managed green performance appraisal in place encourages employees to attain green goals (Mousa and Othman, 2020).

Recognition and rewards for employees' eco-initiatives would motivate them to help the organization accomplish the environmental goals (cf. Ahmed et al., 2021a,b; Kim et al., 2019). Without possessing an equitable green performance assessment mechanism and rewarding workers for their eco-friendly behaviors, hotels cannot achieve the green and environmental sustainability goals. It is also important to implement green information sharing within the company so that employees who can make potential contributions to the environmental sustainability program are informed about any investments made in the green area or the environment (cf. Rubel et al., 2021). These practices collectively suggest that GHRM plays a crucial in enabling the company to accomplish its environmental goals (Úbeda-García et al., 2021b).

The aforesaid GHRM practices constitute a basis for the development of POSE (Aboramadan and Karatepe, 2021). As organizational support theory posits, various human resource practices (e.g., rewards and training) activate employees' perceptions of organizational support and emanate from the company's actions (e.g., García-Chas et al., 2016; Rhoades and Eisenberger, 2002). Specifically, rewards represent a positive valuation of employees' contributions to the company, while training communicates investment in the development of employees' intellectual capacity (Rhoades and Eisenberger, 2002). Similarly, GHRM practices would be the signals of support for the environment provided by the company.

Surprisingly, the extant literature presents only two studies about the association between GHRM and perceived green organizational support. For example, a study of hotel employees in Palestine denoted that GHRM practices fostered perceived green organizational support (Aboramadan and Karatepe, 2021). Likewise, Hameed et al.'s (2021b) research in different settings in Pakistan supported the positive association between these two variables. In short, GHRM practices are the basis for POSE. Hence, we posit that:

**H1.** GHRM relates positively to hotel employees' POSE.

### 2.2.2. Perceived organizational support for the environment and green and non-green work outcomes

The second proposition in JD-R theory connotes two different processes: "the health-impairment process" and "the motivational process" (Bakker and Demerouti, 2017). Job demands are the unique

determinants of burnout, while job resources are the unique predictors of WENG or disengagement. However, research also demonstrated that lack of job resources predicted burnout (Schaufeli and Bakker, 2004). According to the motivational pathway in JD-R theory, employees have various opportunities to learn, grow, and develop in a supportive work environment (Bakker and Demerouti, 2017; Caesens and Stinglhamber, 2014). These individuals are work-engaged at high levels due to the presence of job resources such as support provided by the organization. Empirically, Caesens and Stinglhamber (2014) research in Belgium indicated that perceived organizational support activated service employees' WENG. Karatepe and Aga's (2016) work in Northern Cyprus illustrated that support provided by the company increased bank employees' WENG. A recent research conducted in India revealed that perceived organizational support positively affected hotel employees' WENG (Tripathi et al., 2021).

Despite the above theoretical background and the aforementioned findings, it is unclear whether employees are high on WENG as a result of the company's support towards the environment. Nevertheless, we assume that employees may display higher levels of WENG if they believe that organizational support for the environment contributes to their personal growth and development as well as goal achievement. They may also demonstrate high levels of WENG when their employer assists them in resolving environmental issues and shows appreciation for their environmental contribution and accomplishment at work. Hence, we posit that:

**H2.** POSE relates positively to hotel employees' WENG.

Organizational support theory contends that actions taken by managers are considered as indications of the company's intent (Rhoades and Eisenberger, 2002). If these actions are associated with the company's human resource practices and contribute to the development of employees' knowledge and skills, employees possess positive beliefs regarding the extent to which the company values their contribution and cares about their well-being (Eisenberger et al., 2001). Consequently, employees exhibit positive work-related consequences (Erdogan et al., 2015). Employees also display higher task-related PEBs or environmentally-friendly behaviors when they observe that the organization creates a workplace where there are resources needed to do the job (Paillé and Mejía-Morelos, 2019). For example, the company can implement green training to raise awareness about environmental sustainability and enable employees to behave more responsibly for the environment. These practices would fulfill the socioemotional needs of employees as emotional support (Rhoades and Eisenberger, 2002).

Though limited, there is evidence demonstrating that POSE gives rise to better environmentally-friendly behaviors. Specifically, Temminck et al. (2015) reported that POSE bolstered OCB-E in the United Kingdom. Bhatnagar and Aggarwal's (2020) research in various service settings in India indicated that POSE enhanced eco-initiatives. Paillé and Mejía-Morelos (2019) research in Mexico documented that POSE boosted OCB-E. Hence, we posit that:

**H3.** POSE relates positively to hotel employees' task-related PEBs.

As propounded by organizational support theory, the caring, approval, and respect implied by organizational support creates a felt obligation to care about the company's well-being and help the company accomplish its objectives (Rhoades and Eisenberger, 2002). Allen et al. (2003) argue that employees are unlikely to desire to leave the company when they perceive a number of inducements. An organization providing support to its employees can be seen as giving more inducements. Under these circumstances, these employees would repay the company through their continued participation. Kurtessis 's et al. (2017) meta-analytic work supports the association between organizational support and quitting intentions.

The aforesaid argument is also reasonable for the association between POSE and quitting intentions. Specifically, when employees believe that management invests in the preservation of the environment

and encourages them to pay particular attention to environmental sustainability, they will be less likely to leave the organization. Hameed et al. (2021b) cogently discuss that employees are eager to work for the organization if the company cares about their well-being while managing tasks associated with environmental sustainability. In empirical terms, Lamm et al. (2015) found that POSE reduced employees' intent to leave. Hence, we posit that:

**H4.** POSE relates negatively to hotel employees' quitting intentions.

#### 2.2.3. Work engagement and green and non-green work outcomes

As the sixth proposition in JD-R theory indicates, motivation exerts a positive impact on job performance (Bakker and Demerouti, 2017). Employees who possess positive emotions about and pay much attention to their jobs and are energetic are goal-oriented and complete the work-related tasks effectively (Ozturk et al., 2021). The general literature presents plenty of findings to support this linkage (e.g., De Souza and Hancer, 2021; Orłowski et al., 2021; Rich et al., 2010). However, few empirical studies have assessed the association between WENG and employees' PEBs so far. For instance, Karatepe et al. (2021) reported that WENG activated hotel employees' task-related and proactive PEBs in China. Raza et al.'s (2021) paper documented that WENG fostered voluntary PEBs among employees in Pakistan.

In view of JDR-theory and the aforementioned findings, we contend that hotel employees high on WENG focus on their personal growth and learning and have goal-orientation. In addition to elevated levels of work-related performance, they can contribute to the company through their environmentally-friendly behaviors. Hence, we posit that:

**H5.** WENG relates positively to hotel employees' task-related PEBs.

Social exchange theory proposes that both the company and employees can develop relationships based on trust, loyalty, and mutual commitment as long as they show compliance with certain "rules of exchange" (Cropanzano and Mitchell, 2005). Therefore, individuals who are highly work-engaged due to a number of favorable reciprocal exchanges exhibit reduced propensity to leave the company (Saks, 2006). This is a reciprocal interdependence (Cropanzano and Mitchell, 2005). Specifically, as the company cares about the development of employees' intellectual capacity as well as their well-being, employees are dedicated to the company and feel obligated to make contributions to the company they work for (De Souza and Hancer, 2021). Work-engaged employees not only demonstrate higher work-related performance but also display declined intentions to leave as they show uplifted level of energy and enthusiasm about their jobs (e.g., Kim, 2017). There is evidence supporting this premise. Specifically, Jung et al.'s (2021) empirical piece denoted that WENG mitigated deluxe hotel employees' quitting intentions in South Korea. Wang et al.'s (2020) work also disclosed that higher WENG led to low levels of turnover intentions among hotel employees in China. Hence, we posit that:

**H6.** WENG relates negatively to hotel employees' quitting intentions.

#### 2.2.4. The sequential mediating roles of perceived organizational support and work engagement

GHRM is comprised of various practices such as selecting the candidates on green criteria, organizing green training programs associated with environmental sustainability, implementing a fair performance appraisal mechanism for employees' green behaviors, and sharing green information with employees (e.g., Hameed et al., 2021b; Kim et al., 2019; Rubel et al., 2021). These practices implicitly demonstrate that the company considers a corporate green strategy and invests in the environmental sustainability program (cf. Ahmed et al., 2021a,b).

GHRM practices can raise employees' perceptions pertaining to organizational support towards the environment (Aboramadan et al., 2021a). In hospitality settings, GHRM has been shown to trigger POSE (Aboramadan and Karatepe, 2021). Another study provided by Cantor et al. (2012) found that environmental training and rewards enhanced

POSE. In line with these studies, we argue that the company values employees' green contributions and cares about their well-being when it takes advantage of GHRM practices to develop employees' knowledge and skills in environmental sustainability. This also receives support from organizational support theory that POSE increases when organizational members believe that the company implements GHRM practices. In the same line of inquiry, POSE can serve as a socioemotional resource, and, if this resource is attained, the norm of reciprocity takes place and employees seek to pay back with positive attitudes and/or behaviors (Bhatti et al., 2021) such as WENG. The general literature also supports the linkage between human resource practices, organizational support, and WENG (Zhong et al., 2016).

As the motivational pathway in JD-R theory proposes, job resources enhance employees' WENG, which in turn engenders desirable work-related consequences (Bakker and Demerouti, 2017). The perceived organizational support → WENG → employee outcomes linkage has also been supported in the literature (Caesens and Stinglhamber, 2014). Likewise, we contend that POSE emerges from the relevant environment- and green-related resources, which trigger employees' WENG. Consistent with the norm of reciprocity (Cropanzano and Mitchell, 2005), employees who display high levels of WENG as a result of organizational support for the environment are more likely to engage themselves in task-related PEBs and show diminished intention to leave the organization. Bhatti et al. (2021) found that perceived green organizational support and innovative environmental behavior sequentially mediated the influence of GHRM on environmental performance in the gas industry in Pakistan. The abovementioned discussions implicitly suggest that POSE and WENG sequentially mediate the influence of GHRM on task-related PEBs and quitting intentions. Hence, we posit that:

**H7.** POSE and WENG sequentially mediate the impact of GHRM on task-related PEBs.

**H8.** POSE and WENG sequentially mediate the impact of GHRM on quitting intentions.

### 2.3. Research model

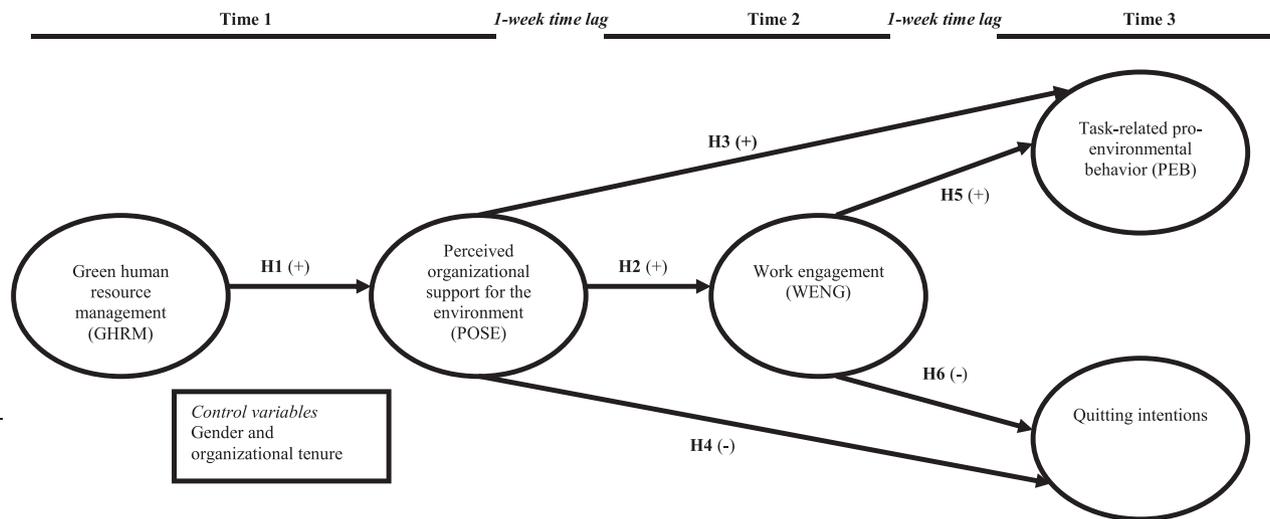
Fig. 1 depicts the interrelationships of GHRM, POSE, WENG, task-related PEB, and quitting intentions. As the model contends, the availability of GHRM practices stimulates employees' perceptions of organizational support for the environment. POSE triggers their WENG and task-related PEBs. POSE also mitigates their proclivity to quit. The model posits that employees high on WENG display environmentally-friendly behaviors and are less inclined to leave the company. These relationships altogether suggest that POSE and WENG sequentially mediate the impact of GHRM on task-related PEB and quitting intentions. Gender and organizational tenure were selected as control variables since they may be significantly related to the study variables and confound these associations (Dumont et al., 2017; Ozturk et al., 2021; Saeed et al., 2019).

## 3. Method

### 3.1. Sample and procedure

To ascertain the interrelationships of GHRM (Time 1), POSE (Time 1), WENG (Time 2), task-related PEB (Time 3), and propensity to quit (Time 3), we used three-wave time-lagged data obtained from full-time customer-contact supervisory and non-supervisory employees in the rooms divisions and food and beverage departments in the four- and five-star hotels in Kaohsiung, the major harbor city in southern Taiwan. Having two variables measured at Time 1 is in line with empirical pieces in the hospitality and service literatures (e.g., Cheng et al., 2020; Karatepe and Choubtarash, 2014). Each wave had one-week time lag.

The literature presents empirical studies that have specially used the



H7. POSE and WENG sequentially mediate the impact of GHRM on task-related PEB.

H8. POSE and WENG sequentially mediate the impact of GHRM on quitting intentions.

Fig. 1. Research model.

judgmental sampling technique due to the sample which was limited to employees at the bottom line in hotels (e.g., Darvishmotevali et al., 2017; Ozturk et al., 2021). To achieve such a sampling frame, judgmental sampling was therefore employed in the current study. There are at least three criteria for choosing these hotel types and employees in customer-contact positions. First, it has been shown that the four- and five-star hotels pay particular attention to the preservation of the environment and environmental sustainability (cf. Chan et al., 2020). Second, customer-contact employees play a critical role in providing the company's products and services to customers and delivering value in the hope of achieving customer attainment and creating customer loyalty (e.g., Jung et al., 2021). Third, management of the hotels cannot accomplish the environmental sustainability goals without the active involvement of employees (e.g., Kalyar et al., 2021).

The participating hotels were chosen from the government tourism website to fit into the four-to five-star hotel ratings. Although one of the surveyed hotels did not participate in the voluntary hotel grading system organized by the Taiwanese government, it is a well-known hotel brand managed by an international hotel management team. For example, its star rating is available on the websites of the major online travel agencies. It is rated as a four-star hotel by booking.com (Booking Holdings) and a five-star hotel by Trivago. It is also the sole international hotel brand operated in Kaohsiung. Its service quality is relatively high as evidenced on the Internet reviews. In total, the international brand hotel, three five-star hotels, and one four-star hotel partook in the present study.

The managers of the participating hotels were informed by the researcher about the sample before the survey. After arranging the matching numbers for those employees, managers had issued the questionnaires to those employees in each stage of data collection.

Data were gathered between April and July in 2020 during the COVID-19 pandemic. However, the COVID-19 alert level in Taiwan during the time of our research was considered low and the government's epidemic prevention measures were tight namely, wearing a mask in public areas, keeping social distancing, sanitizing hands regularly, checking body temperature, and scanning QR code for tracing before entering a store for each citizen.

In addition, according to Taiwan Labor Quarterly (2020), the press of the Council of Labor Affairs, the lodging industry in the country in June 2020 returned to a healthier operation from a year ago because of the demand by domestic customers who could not go abroad due to the

pandemic. The press further indicated that the unemployment rate in the job market was 4% in July 2020 which was relatively low compared to neighboring countries namely, Japan, South Korea, Singapore, and China. In addition, full-time customer-contact supervisory and non-supervisory employees completed the surveys during their work hours. We did not prefer to collect data online since it could be problematic for hotel employees to get access to the electronic devices with the internet connectivity as they were not permitted to use them at work.

Two hundred and eighty surveys in the first wave were distributed to the workers by management of the participating hotels and were returned. The Time 2 surveys were distributed to the same individuals. In total, 276 surveys were obtained. This was because of the fact that two workers were on long job leave in one hotel and two workers left the job in another hotel. Subsequently, 276 Time 3 surveys were distributed to the same individuals. Of the employees surveyed in Time 3, five left the company and nine did not return the surveys. A total of 262 surveys were collected. After each survey had been checked by the researcher side by side for completion and validation, there were 24 surveys with missing answers or information. Thus, they were discarded from the dataset. In addition, two surveys were removed as a result of outlier check. A total number of 236 surveys were utilized in the analysis. The response rate was 84.3%. Numbers were used to match the surveys with each other. To reach such a response rate, we received solid management support and corporation, used self-adhesive envelopes and separate boxes to place the questionnaires, and gave affirmation of anonymity and confidentiality (Anseel et al., 2010). The response rate obtained here is comparable to the rates reported in other empirical pieces (e.g., Chen, 2020; Liu et al., 2014).

There were few precautions taken to decrease the risk of common method variance. These precautions were suggested by Podsakoff et al. (2003). First, data were gathered through three surveys with one week apart (Cheng et al., 2020). Second, each survey comprised such information as: "There are no right or wrong answers in this questionnaire. Any sort of information collected during our research will be kept confidential. Participation is voluntary but encouraged. Management of your company fully endorses participation". Third, each participant was instructed to put the completed survey into the self-adhesive envelope with the school logo on it, seal it, and place it in the box. These remedies ensured anonymity and confidentiality (Ozturk et al., 2021). The data collection procedure was consistently and strictly followed throughout the three stages of survey.

Table 1 shows the participants' profile. Most of the respondents (78%) were aged between 18 and 37 years. One hundred and sixty-two participants (69%) had four-year college degrees, while 61 (26%) had two-year college degrees. The sample included 82 (35%) male and 154 (65%) female employees. One hundred and twenty-two participants (52%) had tenures between 1 and 5 years, while 41 (17%) had tenures between 6 and 10 years. The sample consisted of 190 (81%) participants who were single or divorced. One hundred and twenty-seven (54%) participants worked as supervisory employees and the rest worked as entry-level employees.

### 3.2. Instrumentation

The Time 1, Time 2, and Time 3 surveys were originally prepared in English and then translated into Chinese via the back-translation technique. A pilot study among 10 employees tested the initial version of the Time 1 survey. This was repeated for the items in the Time 2 and Time 3 surveys. There was no need to make amendments in the surveys as a consequence of these pilot studies.

#### 3.2.1. Green human resource management

Congruent with various empirical pieces (Aboramadan and Karatepe, 2021; Ansari et al., 2021; Dumont et al., 2017), GHRM was measured as a uni-dimensional variable. Specifically, six items from Kim et al. (2019) were tapped to assess GHRM on a five-point scale ("1 = strongly disagree", "5 = strongly agree"). Sample items are "This hotel provides adequate training to promote environmental management as a core organizational value" and "This hotel considers how well employees are doing at being eco-friendly as part of their performance appraisals". Coefficient alpha (reliability) for the GHRM measure was 0.90.

#### 3.2.2. Perceived organizational support for the environment

POSE was operationalized with six items from Paillé and Meija-Morelos (2019). Example items are "The organization takes pride in my environmental accomplishments at work" and "My colleague really cares about my view on the environment". All responses were obtained on a seven-point scale ("1 = strongly disagree", "7 = strongly

**Table 1**  
Participants' profile.

	Frequency	%
<b>Gender</b>		
Male	82	34.7
Female	154	65.3
<b>Age (year)</b>		
18–27	104	44.0
28–37	79	33.5
38–47	34	14.4
48–57	15	6.4
58 or above	4	1.7
<b>Education</b>		
Secondary and high school	9	3.8
Two-year college degree	61	25.9
Four-year college degree	162	68.6
Graduate degree	4	1.7
<b>Organizational tenure (year)</b>		
Under 1	36	15.3
1–5	122	51.7
6–10	41	17.4
11–15	17	7.2
16–20	7	2.9
Longer than 20	13	5.5
<b>Marital status</b>		
Single or divorced	190	80.5
Married	46	19.5
<b>Position</b>		
Entry-level employee	109	46.2
Supervisory employee	127	53.8

agree"). Coefficient alpha for the POSE measure was 0.927.

#### 3.2.3. Work engagement

Schaufeli et al. (2006) have stated, "...it seems that the total UWES-9 score can be used as an overall measure of work engagement" (p. 712). The current literature delineates evidence about the use of nine items to operationalize WENG (Ozturk et al., 2021; Teng et al., 2021). In view of this, nine items from Schaufeli et al. (2006) were tapped to gauge hotel customer-contact employees' WENG. Example items: "At my work, I feel bursting with energy", "I am enthusiastic about my job", and "I feel happy when I am working intensely". Responses were made on a seven-point frequency rating scale ("0 = never", "6 = Always"). Coefficient alpha for the WENG measure was 0.961.

#### 3.2.4. Task-related pro-environmental behavior

Three items were taken from Bissing-Olson et al. (2013) to gauge task-related PEB. Example items are "I adequately complete assigned duties in environmentally-friendly ways" and "I perform tasks that are expected of me in environmentally-friendly ways". Responses were on a five-point format that ranged from "1 = never" to "5 = almost always". Coefficient alpha for the task-related PEB measure was 0.932.

#### 3.2.5. Quitting intentions

In our paper, quitting intentions were measured via three items from Singh et al. (1996). Example items are "It is likely that I will actively look for a new job next year" and "I often think about quitting". Participants utilized a five point scale ("1 = strongly disagree", "5 = strongly agree"). Coefficient alpha for the quitting intentions measure was 0.885.

#### 3.2.6. Controls

Gender ("0 = male" and "1 = female") and organizational tenure (six categories) were controlled in our paper (Jolly et al., 2021; Ozturk et al., 2021; Ugwu et al., 2021).

### 3.3. Strategy of analyses

We used SPSS 24 to report descriptive statistics and measure intercorrelations. Covariance matrix was utilized as input in AMOS 24 to assess the measurement and structural models. The measurement model was gauged via confirmatory factor analysis (CFA) to confirm convergent and discriminant validity and present internal consistency reliability scores (Fornell and Larcker, 1981; Hair et al., 2010).

The hypothesized associations were gauged via structural equation modeling (SEM). In this paper, we used the maximum likelihood estimation. Following previous research in hospitality (e.g., Aboramadan et al., 2021c), the sequential mediation process in this research was performed via the user-defined estimands plugin with bootstrapping of 5000 samples at 95% of confidence interval in AMOS 24. Concordant with other studies (e.g., Aguiar-Quintana et al., 2021), we used the fit statistics such as " $\chi^2/df$ , comparative fit index (CFI), Tucker-Lewis index (TLI), parsimony normed fit index (PNFI), root mean square error of approximation (RMSEA), and standardized root mean square residual (SRMR)".

## 4. Results

### 4.1. Measurement model

CFA was performed for the following factors: GHRM, POSE, WENG, task-related PEB, and quitting intentions. The fit indices for our model were:  $\chi^2 = 606.928$ ;  $df = 309$ ;  $\chi^2/df = 1.964$ ; CFI = 0.948; TLI = 0.941; PNFI = 0.793; RMSEA = 0.064; and SRMR = 0.046. These results were considered satisfactory. For instance, the values of RMSEA and SRMR were below the value of 0.08 (Hooper et al., 2008; Jiang et al., 2002), while PNFI value was larger than 0.50 (Hooper et al., 2008). In addition, CFI value was above the recommended value of 0.90 (Marsh and

Hocevar, 1985). Based on the outcomes of CFA, all standardized loadings were significant and were above the value of 0.70 (Table 2).

To confirm convergent validity of the constructs, the average variance extracted (AVE) value was calculated. The AVE values were above the 0.50 threshold (Fornell and Larcker, 1981). The AVE value for GHRM, POSE, WENG, task-related PEB and quitting intentions was 0.609, 0.626, 0.747, 0.827, and 0.734, respectively. In sum, convergent validity was confirmed. Furthermore, we computed the composite reliability (CR) for each variable. The findings denoted that the CR values were larger than 0.60. The CR value for GHRM, POSE, WENG, task-related PEB, and quitting intentions was 0.903, 0.909, 0.964, 0.935, and 0.891, respectively. This suggested that our research variables achieved reliability (Bagozzi and Yi, 1988).

Discriminant validity was checked via three techniques. First, we ran CFA for different models to assess the superiority of our measurement model against other models. The findings presented in Table 3 denoted that the measurement model was superior to other competing models such as model 2 ( $\Delta\chi^2 = 422.488$ ;  $\Delta df = 4$ ), model 3 ( $\Delta\chi^2 = 516.867$ ;  $\Delta df = 7$ ), and model 4 ( $\Delta\chi^2 = 1655.034$ ;  $\Delta df = 9$ ). Finally, a single-factor model produced poor fit to the data ( $\chi^2 = 2848.985$ ;  $df = 319$ ;  $\chi^2/df = 8.931$ ; CFI = 0.559; TLI = 0.515; PNFI = 0.484; RMSEA = 0.184; and SRMR = 0.247).

Second, we compared the square root of the AVE for each construct against the intercorrelations (Fornell and Larcker, 1981). The results indicated that the square root of the AVE was larger than the intercorrelations among the variables, excluding the one between GHRM and POSE. For instance, the square root of the AVE for GHRM and POSE was 0.780 and 0.791, respectively. This was lower than the correlation between GHRM and POSE (0.799). Accordingly, we used the Anderson

**Table 2**  
Measurement model results.

Variables and items	Standardized loading	t-value	Average variance extracted	Composite reliability
<b>Green human resource management (GHRM)</b>				
GHRM 1	0.774	11.878	0.609	0.903
GHRM 2	0.828	12.765		
GHRM 3	0.794	12.210		
GHRM 4	0.783	12.028		
GHRM 5	0.756	11.576		
GHRM 6	0.742	F		
<b>Perceived organization support for the environment (POSE)</b>				
POSE 1	0.810	F	0.626	0.909
POSE 2	0.765	13.409		
POSE 3	0.852	14.694		
POSE 4	0.791	12.420		
POSE 5	0.781	12.232		
POSE 6	0.744	11.551		
<b>Work engagement (WENG)</b>				
WENG 1	0.927	15.447	0.747	0.964
WENG 2	0.930	15.502		
WENG 3	0.911	15.133		
WENG 4	0.895	14.813		
WENG 5	0.829	13.535		
WENG 6	0.844	13.819		
WENG 7	0.850	13.928		
WENG 8	0.830	13.549		
WENG 9	0.748	F		
<b>Task-related pro-environmental behavior (PEB)</b>				
Task-related PEB 1	0.848	F	0.827	0.935
Task-related PEB 1	0.929	19.594		
Task-related PEB 1	0.948	20.074		
<b>Quitting intentions (QI)</b>				
QI 1	0.842	16.714	0.734	0.891
QI 2	0.758	14.311		
QI 3	0.958	F		

F = fixed.

and Gerbing's (1988) criterion to re-check discriminant validity between these two constructs. A two-factor model of GHRM and POSE showed the following chi-square and  $df$  ( $\chi^2 = 116.898$ ;  $df = 48$ ), while a single-factor model comprising GHRM and POSE showed the following chi-square and  $df$  ( $\chi^2 = 205.453$ ,  $df = 49$ ). The difference was significant ( $\Delta\chi^2 = 88.555$ ,  $\Delta df = 1$ ). Additional evidence was also obtained through Heterotrait-Monotrait ratios, which were lower than 0.85. Table 4 presented these ratios. Therefore, discriminant validity was confirmed.

Descriptive statistics and correlations of observed variables as well as the skewness and kurtosis values were given in Table 5. The skewness (smaller than 3.00) and kurtosis (smaller than 8.00) values indicated that there was no evidence of the non-normality of the data (Kline, 2011).

#### 4.2. Common method variance check

In addition to a number of procedural remedies, the unmeasured latent method factor (ULMF) technique was performed (Podsakoff et al., 2003). In this statistical technique, the ULMF was included with the five-factor measurement model in the analysis where we freed 27 items to load onto their corresponding constructs and the ULMF simultaneously. We fixed the correlation between the ULMF and the other constructs to zero (Podsakoff et al., 2003). The fit indices for the ULMF with the five-factor measurement model were:  $\chi^2 = 605.972$   $df = 308$ ;  $\chi^2/df = 1.967$ ; CFI = 0.948; TLI = 0.941; PNFI = 0.790; RMSEA = 0.064; and SRMR = 0.046. We compared the CFI, TLI, RMSEA, and SRMR results in the measurement model with the ones in the measurement model with the ULMF. The difference in each of these statistics was below 0.05 (Bagozzi and Yi, 1990). In addition, the PNFI value (0.793) in the measurement model was larger than the one (0.790) in the measurement model with the ULMF. We conclude that our data are not contaminated by common method variance.

#### 4.3. Test of hypotheses

Multicollinearity was not an issue in our paper since none of the variance inflation factors exceeded 2.00 (Hair et al., 2010). The result concerning the comparison between the fully mediated model ( $\chi^2 = 679.588$ ;  $df = 359$ ) and the proposed model ( $\chi^2 = 666.056$ ;  $df = 357$ ) was significant ( $\Delta\chi^2 = 13.532$ ,  $\Delta df = 2$ ,  $p < 0.05$ ). Accordingly, the proposed model had a better fit to the data. The fit statistics for this model was:  $\chi^2 = 666.056$   $df = 357$ ;  $\chi^2/df = 1.866$ ; CFI = 0.946; TLI = 0.939; PNFI = 0.784; RMSEA = 0.061; and SRMR = 0.049.

The findings in Fig. 2 showed that GHRM exerted a positive effect on POSE ( $\beta = 0.798$ ,  $t = 10.077$ ). This gave a full support to H1. H2 was also confirmed since POSE positively affected WENG ( $\beta = 0.226$ ,  $t = 3.206$ ). The linkage between POSE and task-related PEB was significant ( $\beta = 0.172$ ,  $t = 2.400$ ). This also gave support to H3. On the other hand, POSE was found to negatively relate to quitting intentions ( $\beta = -0.196$ ;  $t = -2.820$ ). This lent support for H4. In accord with H5 and H6, WENG was found to depict a positive association with task-related PEB (H5,  $\beta = 0.179$ ,  $t = 2.577$ ) and a negative association with quitting intentions (H6,  $\beta = -0.163$ ,  $t = -2.438$ ).

The results illustrated that both POSE and WENG sequentially mediated the effect of GHRM on task-related PEB ( $\beta = 0.039$ ,  $SE = 0.021$ , lower-level confidence interval LLCI = 0.014, upper-level confidence interval ULCI = 0.085). No confidence interval consisted of zero. This provided support for H7. Furthermore, the findings denoted that the impact of GHRM on quitting intentions was sequentially mediated by POSE and WENG ( $\beta = -0.053$ ,  $SE = 0.033$ , LLCI = -0.128, ULCI = -0.015). Again none of the confidence intervals comprised zero. This confirmed H8. Among the control variables, organizational tenure was significantly linked to quitting intentions ( $\gamma = -0.235$ ,  $t = -3.719$ ). These results demonstrated that employees with more organizational experience tended to have lower quitting intentions. The absence of control variables in the analysis did not amend the significance of the

**Table 3**  
Model comparison and competing models.

	$\chi^2$	df	$\chi^2/df$	$\Delta\chi^2$	$\Delta df$	CFI	TLI	PNFI	RMSEA	SRMR
Model 1	606.928	309	1.964	–	–	0.948	0.941	0.793	0.064	0.046
Model 2	1029.416	313	3.289	422.488	4	0.875	0.860	0.741	0.099	0.093
Model 3	1123.795	316	3.556	516.867	7	0.859	0.844	0.734	0.104	0.098
Model 4	2261.962	318	7.113	1655.034	9	0.661	0.626	0.569	0.161	0.241
Model 5	2848.985	319	8.931	2242.057	10	0.559	0.515	0.484	0.184	0.247

Model 1 = hypothesized model

Model 2 = four factors (GHRM, POSE, WENG, and task-related PEB+ quitting intentions),

Model 3 = three factors (GHRM + POSE, WENG, and task-related PEB + quitting intentions)

Model 4 = two-factors (GHRM+POSE+WENG, and task-related PEB + quitting intentions)

Model 5 = all factors combined

CFI = Comparative fit index; TLI = Tucker-Lewis index; PNFI = Parsimony normed fit index; RMSEA = Root mean square error of approximation; SRMR = Standardized root mean square residual; GHRM = Green human resource management; POSE = Perceived organizational support for the environment; WENG = Work engagement; PEB = Pro-environmental behavior.

**Table 4**  
Heterotrait-Monotrait ratios.

	GHRM	POSE	WENG	Task-related PEB	Quitting intention
GHRM	–				
POSE	0.790	–			
WENG	0.142	0.220	–		
Task-related PEB	0.204	0.186	0.215	–	
Quitting intentions	0.175	0.233	0.224	0.209	–

GHRM = Green human resource management; POSE = Perceived organizational support for the environment; WENG = Work engagement; PEB = Pro-environmental behavior.

impacts. Finally, our model explained 4% of the variance in GHRM, 64.2% in POSE, 6.5% in WENG, 7.9% in task-related PEB, and 14.6% in quitting intentions. Having low values of R<sup>2</sup> is not uncommon in social science (Uen et al., 2018). The values of R<sup>2</sup> reported in our paper are comparable to the ones in other pieces (e.g., Aboramadan et al., 2021c; Ghosh, 2017; Nambudiri, 2012; Uen et al., 2018).

## 5. Discussion

### 5.1. General findings

In the present paper, which is underpinned by organizational support theory, JD-R theory, and social exchange theory, we investigated the interrelationships of GHRM, POSE, WENG, task-related PEB, and quitting intentions. We also examined POSE and WENG as the sequential mediators of the impact of GHRM on task-related PEBs and quitting intentions. The empirical findings delineate strong support for the

**Table 5**  
Descriptive statistics and correlations.

	Mean	SD	1	2	3	4	5	6	7
1. Gender	0.65	0.48	1	.					
2. Organizational tenure	2.48	1.24	0.013	1					
3. GHRM	3.83	0.71	-0.075	0.024					
4. POSE	5.50	1.00	-0.030	0.068	0.799**				
5. WENG	4.22	1.08	-0.112	0.032	0.135 *	0.244**			
6. Task-related PEB	3.67	0.78	0.017	-0.041	0.185**	0.198**	0.206**		
7. Quitting intentions	2.78	1.04	0.047	-0.254**	-0.177 *	-0.254**	-0.219**	-0.169**	
Skewness			-0.169	1.387	-0.445	-0.839	-0.074	0.036	-0.344
Kurtosis			0.272	1.657	-0.009	0.979	-0.803	0.126	-0.408

N = 236

SD = Standard deviation; GHRM = Green human resource management; POSE = Perceived organizational support for the environment; WENG = Work engagement; PEB = Pro-environmental behavior.

\*\*p < 0.01 level (2-tailed).

\*p < 0.05 level (2-tailed).

hypothesized associations.

GHRM is a strong predictor of POSE. That is, the path estimate concerning the association between GHRM and POSE corroborates the findings reported in recent writings (e.g., Hameed et al., 2021b). As propounded by organizational support theory (Rhoades and Eisenberger, 2002), favorable job conditions associated with GHRM practices send powerful messages to workers that the company values their environmental efforts. Simply put, GHRM is the basis for the support for the environment provided by the company (Aboramadan and Karatepe, 2021).

In addition, employees' perceptions of organizational support for the environment activate their WENG. This is congruent with the motivational pathway in JD-R theory (Bakker and Demerouti, 2017) that employees pay much attention to, possess positive feelings about, and work with intensity on their jobs as a consequence of POSE. In such a workplace, employees' contributions to the environment are highly valued by the company. Employees high on POSE display higher task-related PEBs and diminished quitting intentions. Concordant with organizational support theory (Rhoades and Eisenberger, 2002), employees exhibit positive consequences such as task-related PEBs when they perceive that the company's actions emerging from human resource practices enhance their knowledge and skills and the company values their environmental efforts (Paillé and Meija-Morelos, 2019). These employees also have lower turnover cognitions. This finding is important in a time of global talented employee shortages since retention of talented employees has become the key to the survival and growth of hotel companies. The path estimate pertaining to the association between POSE and task-related PEBs and quitting intentions corroborates the findings reported by Bhatnagar and Aggarwal (2020) and Lamm et al. (2015), respectively.

Job performance is an immediate outcome of WENG (Ozturk et al., 2021). In accord with JD-R theory (Bakker and Demerouti, 2017),

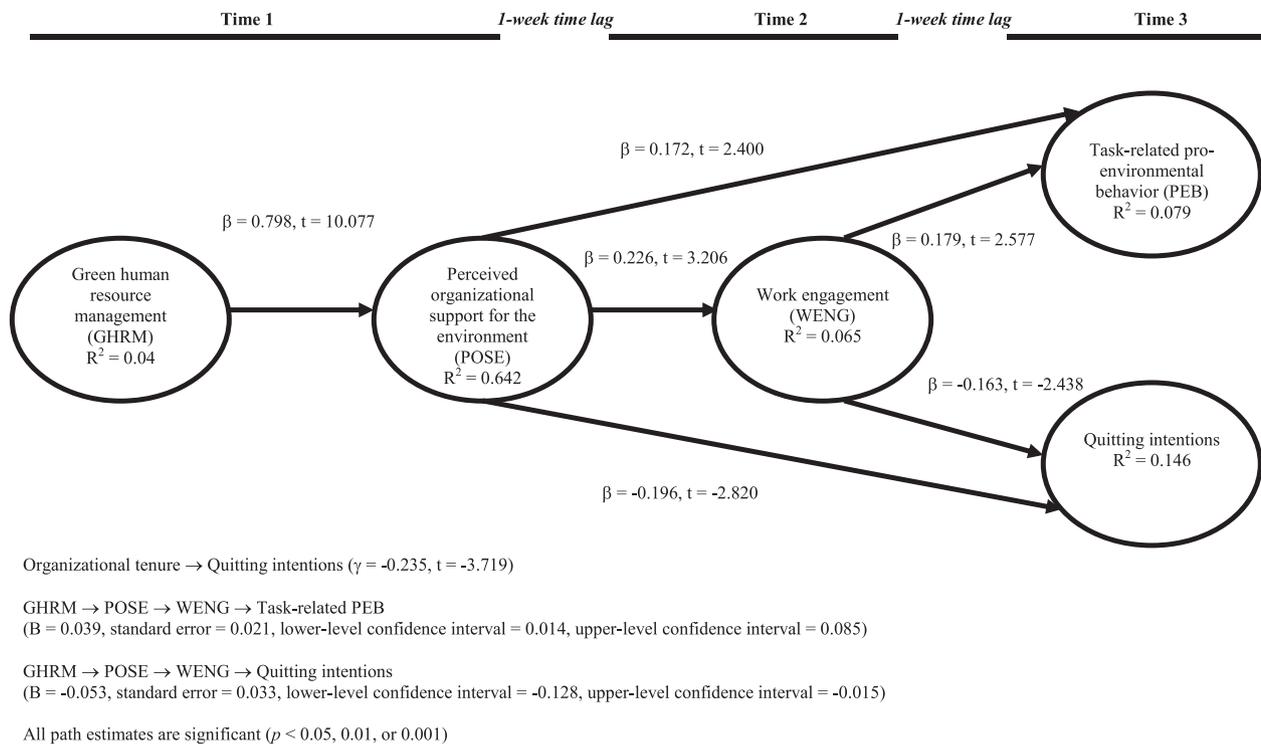


Fig. 2. Structural model test results.

employees high on WENG display environmentally-responsible behaviors. This finding obtains support from the work of Raza et al. (2021). Such employees are also less willing to quit due to various favorable reciprocal exchanges, as proposed by social exchange theory (Cropanzano and Mitchell, 2005; Saks, 2006). The abovementioned result corroborates the findings in recent papers (e.g., Jung et al., 2021).

More importantly, the findings suggest that POSE and WENG sequentially mediate the impact of GHRM on task-related PEB and quitting intentions. GHRM practices boost employees' perceptions of organizational support for the environment, which results in WENG at elevated levels. These employees in turn carry out their tasks in environmentally-friendly ways and are willing to continue to work for the company. The findings regarding POSE and WENG as the sequential mediators are new additions to current knowledge.

## 5.2. Theoretical implications

From a theoretical perspective, our paper advances current knowledge in the following ways. First, our paper fills in the lacuna by showing that GHRM exerts a strong positive influence on employees' perceptions of organizational support for the environment. This finding is critical because the literature has presented only two empirical pieces assessing the linkage between GHRM and POSE to date (Aboramadan and Karatepe, 2021; Hameed et al., 2021b). Second, there are few studies that have assessed non-green outcomes of POSE or perceived green organizational support so far (e.g., Bhatnagar and Aggarwal, 2020). With this stated, our paper advances the understanding about the consequences of POSE among hotel employees. Specifically, our research revealed that employees' favorable perceptions of the environmental support provided by the company led to an increase in the level of their WENG but a decrease in their propensity to quit. Our research also denoted that employees high on WENG fulfilled tasks in an environmentally-friendly way and exhibited lower inclination to leave.

Third, to our knowledge, the current literature presents no evidence about POSE and WENG as the sequential mediators of the influence of GHRM on green and non-green work consequences. Lack of such

research is also observed in recent reviews (Amrutha and Geetha, 2020; Yong et al., 2019). We found that GHRM activated employees' task-related PEBs and alleviated their intentions to quit as a result of POSE and WENG. Fourth, our paper has extended the GHRM research to the hospitality industry in Taiwan to respond to the research calls about the green side of human resource management in Asia (Cabral and Jabbour, 2019; Cooke et al., 2020).

## 5.3. Management implications

Management should invest in GHRM practices to develop employees' knowledge about the hotel's environmental sustainability initiatives and encourage them to have active involvement in the protection of the environment and scarce resources. For instance, management should arrange continuous green training programs about environmental sustainability to increase employee engagement and foster task-related PEBs. It is important that managers consider these training programs as an investment rather than a cost (Cabral and Jabbour, 2019). The presence of a fair green performance evaluation process and green rewards shows the company's commitment to GHRM (Aboramadan and Karatepe, 2021). These GHRM practices are the signs of favorable green job conditions and the environmental support provided by the company.

Management should increase the visibility of GHRM and environmental sustainability initiatives. This can be done through the company's official web pages and social media. The relevant stakeholders would perceive that the company makes investment in greening the workplace, takes into consideration the importance of the human side of green hotel management, helps employees handle various environmental problems, and values employees' contributions toward sustainability.

Highly work-engaged employees contribute to the hotel's environmental sustainability initiatives through their eco-friendly behaviors and exhibit lower quitting intentions, while both GHRM and POSE positively influence the level of their WENG. With this recognition, management should retain these employees by keeping the promises given to them (Karatepe et al., 2021). This is so critical since these

employees display both green and non-green positive workplace outcomes and play a crucial role in the achievement of customer satisfaction (Raza et al., 2021; Wang et al., 2021).

Having rigorous selection procedures would enable managers to identify the candidates with a green perspective and the ones who are work-engaged at high levels. Utilizing experiential exercises and taking advantage of Schaufeli et al.'s (2006) WENG scale during the process would be helpful. Lastly, employees who are inclined to leave the company erode the service delivery process. If such employees still intend to quit after the company's GHRM efforts and organizational support for the environment are in place, allowing them to leave the company would be less costly than trying to change their minds about leaving or staying.

During the COVID-19 pandemic, the abovementioned implications would enable hotels to maintain long-term relationships with customers who really pay particular attention to the preservation of the ecological environment. For example, hotels with their environmental sustainability and greening initiatives would motivate their employees to display PEBs and these efforts would send strong signals to customers regarding the protection of the ecological environment. Strengthening the company's green brand image would lead to a strong emotional bond with employees and customers. This is important because "Human health originates from the health of nature" (Jiang and Wen, 2020, p. 268) and any sort of environmentally-friendly hospitality and tourism activities is likely to be popular once the COVID-19 pandemic is pacified.

#### 5.4. Limitations and future research

The results should be considered in view of several limitations. First, our paper tested task-related PEB and quitting intentions as the consequences of GHRM, POSE, and WENG. There are various organizationally valued outcomes that could be tested in future research. For example, to further enhance the current knowledge base, future studies could assess whether POSE and WENG serially mediate the effect of GHRM on other critical green and non-green outcomes such as green creativity, hotel's green performance, adaptive performance, nonattendance behavior, green recovery performance, and employees' well-being (Ahmed et al., 2021a,b; Darban et al., 2022; Hartline and Ferrell, 1996; Kalyar et al., 2021; Karatepe et al., 2020; Wood et al., 2021).

Second, environmental culture in the organization (Shafaei et al., 2020), management commitment to the ecological environment (Karatepe et al., 2022), and environmentally-specific leadership practices (Aboramadan et al., 2021b) could predict GHRM. Inclusion of these predictors in future research would shed further light on the factors affecting GHRM and the relevant outcomes.

Third, our study utilized POSE and WENG as the mediators relating GHRM to task-related PEB and quitting intentions. Job embeddedness is a critical employee retention strategy (e.g., Teng et al., 2021), while harmonious environmental passion is a "...a positive emotion that results in an individual wanting to engage in pro-environmental behaviors" (Robertson and Barling, 2013, p. 180). Green human resource practices may foster organizational members' harmonious environmental passion and job embeddedness which in turn result in task-related PEBs and diminished quitting intentions. Future studies could enrich current knowledge by testing whether harmonious environmental passion and job embeddedness mediate the effect of GHRM on the abovementioned consequences in a sequential manner.

Fourth, there is support for the use of GHRM as a uni-dimensional variable (e.g., Ansari et al., 2021). To add to the general literature, future studies can unravel whether GHRM, as a uni-dimensional variable (Kim et al., 2019), the separate components of GHRM (Pham et al., 2019), and GHRM as a second-order latent variable (Tang et al., 2018) have similar or different green and non-green hotel employee work consequences. In closing, testing the study linkages with cross-national data (i.e., Taiwan, the United States, and Nigeria) would contribute to the literature and enlighten the potential consequences of GHRM and

POSE.

#### Data Availability

Data will be made available on request.

#### References

- Aboramadan, M., Karatepe, O.M., 2021. Green human resource management, perceived green organizational support and their effects on hotel employees' behavioral outcomes. *Int. J. Contemp. Hosp. Manag.* 33 (10), 3199–3222.
- Aboramadan, M., Kundi, Y.M., Becker, A., 2021a. Green human resource management in nonprofit organizations: effects on employee green behavior and the role of perceived green organizational support. *Pers. Rev.*
- Aboramadan, M., Kundi, Y.M., Farao, C., 2021b. Examining the effects of environmentally-specific servant leadership on green work outcomes among hotel employees: the mediating role of climate for green creativity. *J. Hosp. Mark. Manag.* 30 (8), 929–956.
- Aboramadan, M., Turkmenoglu, M.A., Dahleez, K.A., Cicek, B., 2021c. Narcissistic leadership and behavioral cynicism in the hotel industry: the role of employee silence and negative workplace gossiping. *Int. J. Contemp. Hosp. Manag.* 33 (2), 428–447.
- Aguiar-Quintana, T., Nguyen, T.H.H., Araujo-Cabrera, Y., Sanabria-Díaz, J.M., 2021. Do job insecurity, anxiety and depression caused by the COVID-19 pandemic influence hotel employees' self-rated task performance? The moderating role of employee resilience. *Int. J. Hosp. Manag.* 94, 102868.
- Ahmed, M., Guo, Q., Qureshi, M.A., Raza, S.A., Khan, K.A., Salam, J., 2021a. Do green HR practices enhance green motivation and proactive environmental management maturity in hotel industry? *Int. J. Hosp. Manag.* 94, 102852.
- Ahmed, U., Umrani, W.A., Yousaf, A., Siddiqui, M.A., Pahi, M.H., 2021a. Developing faithful stewardship for environment through green HRM. *Int. J. Contemp. Hosp. Manag.* 33 (10), 3115–3133.
- Allen, D.G., Shore, L.M., Griffeth, R.W., 2003. The role of perceived organizational support and supportive human resource practices in the turnover process. *J. Manag.* 29 (1), 99–118.
- Amrutha, V.N., Geetha, S.N., 2020. A systematic review on green human resource management: implications for social sustainability. *J. Clean. Prod.* 247, 119–131.
- Anderson, J.C., Gerbing, D.W., 1988. Structural equation modeling in practice: a review and recommended two-step approach. *Psychol. Bull.* 103 (3), 411–423.
- Ansari, N.Y., Farrukh, M., Raza, A., 2021. Green human resource management and employees pro-environmental behaviors: examining the underlying mechanism. *Corp. Soc. Responsib. Environ. Manag.* 28, 229–238.
- Anseel, F., Lievens, F., Schollaert, E., Choragwicka, B., 2010. Response rates in organizational science, 1995–2008: a meta-analytic review and guidelines for survey researchers. *J. Bus. Psychol.* 25, 335–349.
- Bagozzi, R.P., Yi, Y., 1988. On the evaluation of structural equation models. *J. Acad. Mark. Sci.* 16 (1), 74–94.
- Bagozzi, R.P., Yi, Y., 1990. Assessing method variance in multitrait-multimethod matrices: the case of self-reported affect and perceptions at work. *J. Appl. Psychol.* 75 (5), 547–560.
- Bakker, A.B., Demerouti, E., 2017. Job demands-resources theory: taking stock and looking forward. *J. Occup. Health Psychol.* 22 (3), 273–285.
- Bhatnagar, J., Aggarwal, P., 2020. Meaningful work as a mediator between perceived organizational support for environment and employee eco-initiatives, psychological capital and alienation. *Empl. Relat.* 42 (6), 1487–1511.
- Bhatti, S.H., Saleem, F., Murtaza, G., Haq, T.U., 2021. Exploring the impact of green human resource management on environmental performance: the roles of perceived organizational support and innovative environmental behavior. *Int. J. Manpow.*
- Bissing-Olson, M.J., Iyer, A., Fielding, K.S., Zacher, H., 2013. Relationships between daily affect and pro-environmental behavior at work: the moderating role of pro-environmental attitude. *J. Organ. Behav.* 34, 156–175.
- Cabral, C., Jabbour, J.C.C., 2019. Understanding the human side of green hospitality management. *Int. J. Hosp. Manag.* 88, 102389.
- Caesens, G., Stinglhamber, F., 2014. The relationship between perceived organizational support and work engagement: the role of self-efficacy and its outcomes. *Rev. Eur. De. Psychol. Appliqué* 64 (5), 259–267.
- Cantor, D.E., Morrow, P.C., Montabon, F., 2012. Engagement in environmental behaviors among supply chain management employees: an organizational support theoretical perspective. *J. Supply Chain Manag.* 48, 33–51.
- Chan, E.S.W., Okumus, F., Chan, W., 2020. What hinders hotels' adoption of environmental technologies: a quantitative study. *Int. J. Hosp. Manag.* 84, 102324.
- Chen, I.-S., 2020. Turning home boredom during the outbreak of COVID-19 into thriving at home and career self-management: the role of online leisure crafting. *Int. J. Contemp. Hosp. Manag.* 32 (11), 3645–3663.
- Chen, Y.-C., Lee, C.-S., Hsu, Y.-C., Chen, Y.-J., 2021. Why is green hotel certification unpopular in Taiwan? an analytic hierarchy process (AHP) approach. *Int. J. Geo-Inf.* 10, 255.
- Cheng, B., Dong, Y., Zhou, X., Guo, G., Peng, Y., 2020. Does customer incivility undermine employees' service performance? *Int. J. Hosp. Manag.* 89, 102544.
- Cooke, F.L., Schuler, R., Varma, A., 2020. Human resource management research and practice in Asia: past, present and future. *Hum. Resour. Manag.* 30, 100778.
- Cropanzano, R., Mitchell, M.S., 2005. Social exchange theory: an interdisciplinary review. *J. Manag.* 31 (6), 874–900.

- Darban, G., Karatepe, O.M., Rezapouraghdam, H., 2022. Does work engagement mediate the impact of green human resource management on absenteeism and green recovery performance? *Empl. Relat.*
- Darvishmotevali, M., Arasli, H., Kilic, H., 2017. Effect of job insecurity on frontline employees' performance: looking through the lens of psychological strains and levers. *Int. J. Contemp. Hosp. Manag.* 29 (6), 1724–1744.
- De Souza, J.V., Hancer, M., 2021. Using the social exchange theory to explore the employee-organization relationship in the hospitality industry. *Int. J. Contemp. Hosp. Manag.* 33 (2), 670–692.
- Diana, G.C., Jabbour, C.J.C., de Sousa Jabbour, A.B.L., Kannan, D., 2017. Putting environmental technologies into the mainstream: adoption of environmental technologies by medium-sized manufacturing firms in Brazil. *J. Clean. Prod.* 142, 4011–4018.
- Dumont, J., Shen, J., Deng, X., 2017. Effects of green HRM practices on employee workplace green behavior: the role of psychological green climate and employee green values. *Hum. Resour. Manag.* 56, 613–627.
- Eisenberger, R., Armeli, S., Rexwinkel, B., Lynch, P.D., Rhoades, L., 2001. Reciprocation of perceived organizational support. *J. Appl. Psychol.* 86 (1), 42–51.
- Erdogan, B., Bauer, T.N., Taylor, S., 2015. Management commitment to the ecological environment and employees: implications for employee attitudes and citizenship behaviors. *Hum. Relat.* 68 (11), 1669–1691.
- Farooq, R., Zhang, Z., Talwar, S., Dhir, A., 2021. Do green human resource management and self-efficacy facilitate green creativity? a study of luxury hotels and resorts. *J. Sustain. Tour.*
- Fornell, C., Larcker, D.F., 1981. Evaluating structural equation models with unobservable variables and measurement error. *J. Mark. Res.* 18 (1), 39–50.
- García-Chas, R., Neira-Fontela, Varela-Neira, C., 2016. High-performance work systems and job satisfaction: a multilevel model. *J. Manag. Psychol.* 31 (2), 451–466.
- Ghosh, S.K., 2017. The direct and interactive effects of job insecurity and job embeddedness on unethical pro-organizational behavior: an empirical examination. *Pers. Rev.* 46 (6), 1182–1198.
- Hair, J.F., Black, W.C., Babin, B.J., Anderson, R.E., 2010. *Multivariate Data Analysis: A Global Perspective*, seventh ed. Pearson Education, New Jersey, NY.
- Hameed, I., Hussain, H., Khan, K., 2021a. The role of green practices toward the green word-of-mouth using stimulus-organism-response model. *J. Hosp. Tour. Insights.*
- Hameed, Z., Naeem, R.M., Hassan, M., Naeem, M., Nazim, M., Maqbool, A., 2021b. How GHRM is related to green creativity? a moderated mediation model green transformational leadership and green perceived organizational support. *Int. J. Manpow.*
- Hartline, M.D., Ferrell, O.C., 1996. The management of customer-contact service employees: an empirical investigation. *J. Mark.* 60 (4), 52–70.
- He, J., Morrison, A.M., Zhang, H., 2021. Being sustainable: the three-way interactive effects of CSR, green human resource management, and responsible leadership on employee green behavior and task performance. *Corp. Soc. Responsib. Environ. Manag.* 28, 1043–1054.
- Hooper, D., Coughlan, J., Mullen, M.R., 2008. Structural equation modeling: guidelines for determining model fit. *Electron. J. Bus. Res. Methods* 6 (1), 53–60.
- Jabbour, C.J.C., 2013. Environmental training in organizations: from a literature review to a framework for future research. *Resour. Conserv. Recycl.* 74, 144–155.
- Jiang, J.J., Klein, G., Carr, L.C., 2002. Measuring information system service quality: SERVQUAL from the other side. *Mis. Q.* 26 (2), 145–166.
- Jiang, Y., Wen, J., 2020. Effects of COVID-19 on hotel marketing and management: a perspective article. *Int. J. Contemp. Hosp. Manag.* 32 (8), 2563–2573.
- Jolly, P.M., McDowell, C., Dawson, M., Abbott, J., 2021. Pay and benefit satisfaction, perceived organizational support, and turnover intentions: the moderating role of job variety. *Int. J. Hosp. Manag.* 95, 102921.
- Jung, H.S., Jung, Y.S., Yoon, H.-H., 2021. COVID-19: the effects of job insecurity on the job engagement and turnover intent of deluxe hotel employees and the moderating role of generational characteristics. *Int. J. Hosp. Manag.* 92, 102703.
- Kalyar, M.N., Ali, F., Shafique, I., 2021. Green mindfulness and green creativity nexus in hospitality industry: examining the effects of green process engagement and CSR. *Int. J. Contemp. Hosp. Manag.* 33 (8), 2653–2675.
- Karatepe, O.M., Aga, M., 2016. The effects of organization mission fulfillment and perceived organizational support on job performance: the mediating role of work engagement. *Int. J. Bank Mark.* 34 (3), 368–387.
- Karatepe, O.M., Choubtarash, H., 2014. The effects of perceived crowding, emotional dissonance, and emotional exhaustion on critical job outcomes: a study of ground staff in the airline industry. *J. Air Transp. Manag.* 40, 182–191.
- Karatepe, O.M., Rezapouraghdam, H., Hassannia, R., 2020. Job insecurity, work engagement, and their effects on hotel employees' non-green and nonattendance behaviors. *Int. J. Hosp. Manag.* 87, 102472.
- Karatepe, O.M., Rezapouraghdam, H., Hassannia, R., 2021. Does employee engagement mediate the influence of psychological contract breach on pro-environmental behaviors and intent to remain with the organization in the hotel industry? *J. Hosp. Mark. Manag.* 30 (3), 326–353.
- Karatepe, T., Oztüren, A., Karatepe, O.M., Uner, M.M., Kim, T.T., 2022. Management commitment to the ecological environment, green work engagement and their effects on hotel employees' green work outcomes. *Int. J. Contemp. Hosp. Manag.*
- Khatter, A., White, L., Pyke, J., McGrath, M., 2021. Barriers and drivers of environmental sustainability: Australian hotels. *Int. J. Contemp. Hosp. Manag.* 33 (5), 1830–1849.
- Kim, W., 2017. Examining mediation effects of work engagement among job resources, job performance, and turnover intention. *Perform. Improv. Q.* 29 (4), 407–425.
- Kim, Y.-J., Kim, W.G., Choi, H.-M., Phetvaroon, K., 2019. The effect of green human resource management on hotel employees' eco-friendly behavior and environmental performance. *Int. J. Hosp. Manag.* 76, 83–93.
- Kline, R.B., 2011. *Principles and Practice of Structural Equation Modeling*, third ed. The Guilford Press, New York, NY.
- Kurtessis, J.N., Eisenberger, R., Ford, M.T., Buffardi, L.C., Stewart, K.A., Adis, C.S., 2017. Perceived organizational support: a meta-analytic evaluation of organizational support theory. *J. Manag.* 43 (6), 1854–1884.
- Lamm, E., Tosti-Kharas, J., King, C.E., 2015. Empowering employee sustainability: perceived organizational support toward the environment. *J. Bus. Ethics* 128, 207–220.
- Liu, X.-Y., Kwan, H.K., Chiu, R.K., 2014. Customer sexual harassment and frontline employees' performance in China. *Hum. Relat.* 67 (3), 333–356.
- Marriott, 2021. *Serve 360: Doing good in every direction.* (<https://serve360.marriott.com/>) (Accessed on 12 July 2021).
- Marsh, H.W., Hocevar, D., 1985. Application of confirmatory factor analysis to the study of self-concept: first- and higher order factor models and their invariance across groups. *Psychol. Bull.* 97 (3), 562–582.
- Mousa, S.K., Othman, M., 2020. The impact of green human resource management practices on sustainable performance in healthcare organizations: a conceptual framework. *J. Clean. Prod.* 243, 118595.
- Nambudiri, R., 2012. Propensity to trust and organizational commitment: a study in the Indian pharmaceutical sector. *Int. J. Hum. Resour. Manag.* 23 (5), 977–986.
- Nisar, Q.A., Haider, S., Ali, F., Jamshed, S., Ryu, K., Gill, S.S., 2021. Green human resource management practices and environmental performance in Malaysian green hotels: the role of green intellectual capital and pro-environmental behavior. *J. Clean. Prod.* 311, 127504.
- Orlowski, M., Bufquin, D., Nalley, M.E., 2021. The influence of social perceptions on restaurant employee work engagement and extra-role customer service behavior: a moderated mediation model. *Cornell Hosp. Q.* 62 (2), 261–275.
- Ozturk, A., Karatepe, O.M., Okumus, F., 2021. The effect of servant leadership on hotel employees' behavioral consequences: work engagement versus job satisfaction. *Int. J. Hosp. Manag.* 97, 102994.
- Pailé, P., Meija-Morelos, J.H., 2019. Organizational support is not always enough to encourage employee environmental performance: the moderating role of exchange ideology. *J. Clean. Prod.* 220, 1061–1070.
- Pham, N.T., Tučková, Z., Jabbour, J.C., 2019. Greening the hospitality industry: how do green human resource management practices influence organizational citizenship behavior in hotels? a mixed-methods study. *Tour. Manag.* 72, 386–399.
- Pham, N.T., Thanh, T.V., Tučková, Z., Thuy, V.T.N., 2020. The role of green human resource management in driving hotel's environmental performance: interaction and mediation analysis. *Int. J. Hosp. Manag.* 88, 102392.
- Pinzone, M., Guerci, M., Lettieri, E., Huisingh, D., 2019. Effects of 'green' training on pro-environmental behaviors and job satisfaction: evidence from the Italian healthcare sector. *J. Clean. Prod.* 226, 221–232.
- Podsakoff, P.M., MacKenzie, S.B., Lee, J.-Y., Podsakoff, N.P., 2003. Common method biases in behavioral research: a critical review of the literature and recommended remedies. *J. Appl. Psychol.* 88 (5), 879–903.
- Ramus, C.A., 2011. Organizational support for employees: encouraging creative ideas for environmental sustainability. *Calif. Manag. Rev.* 43 (3), 85–106.
- Raza, A., Farrukh, M., Iqbal, M.K., Farhan, M., Wu, Y., 2021. Corporate social responsibility and employees' voluntary pro-environmental behavior: the role of organizational pride and employee engagement. *Corp. Soc. Responsib. Environ. Manag.* 28, 1104–1116.
- Rhoades, L., Eisenberger, R., 2002. Perceived organizational support: a review of the literature. *J. Appl. Psychol.* 87 (4), 698–714.
- Rich, B.L., Lepine, J.A., Crawford, E.R., 2010. Job engagement: antecedents and effects on job performance. *Acad. Manag. J.* 53 (3), 617–635.
- Robertson, J.L., Barling, J., 2013. Greening organizations through leaders' influence on employees' pro-environmental behaviors. *J. Organ. Behav.* 34 (2), 176–194.
- Rubel, M.R.B., Kee, D.M.H., Rimi, N.N., 2021. The influence of green GHRM practices on green service behaviors: the mediating effect of green knowledge sharing. *Empl. Relat.* 43 (5), 996–1015.
- Sabokro, M., Masud, M.M., Kayedian, A., 2021. The effect of green human resources management on corporate social responsibility, green psychological climate and employees' green behavior. *J. Clean. Prod.* 313, 127963.
- Saeed, B.B., Afsar, B., Hafeez, S., Khan, I., Tahir, M., Afridi, M.A., 2019. Promoting employees' pro-environmental behavior through green human resource management practices. *Corp. Soc. Responsib. Environ. Manag.* 26, 424–438.
- Saks, A.M., 2006. Antecedents and consequences of employee engagement. *J. Manag. Psychol.* 21 (7), 600–619.
- Schaufeli, W.B., Bakker, A.B., 2004. Job demands, job resources, and their relationship with burnout and engagement: a multi-sample study. *J. Organ. Behav.* 25 (3), 293–315.
- Schaufeli, W.B., Bakker, A.B., Salanova, M., 2006. The measurement of work engagement with a short questionnaire: a cross-national study. *Educ. Psychol. Meas.* 66 (4), 701–716.
- Shafaei, A., Nejati, M., Yusoff, Y.M., 2020. Green human resource management: a two-study investigation of antecedents and outcomes. *Int. J. Manpow.* 41 (7), 1041–1060.
- Sharma, T., Chen, J., Liu, W.Y., 2020. Eco-innovation in hospitality research (1998–2018): a systematic review. *Int. J. Contemp. Hosp. Manag.* 32 (2), 913–933.
- Shen, J., Dumont, J., Deng, X., 2018. Employees' perceptions of green HRM and non-green employee work outcomes: the social identity and stakeholder perspectives. *Group Organ. Manag.* 43 (4), 594–622.
- Sinclair-Desgagné, B., 2021. Green human resources management- a personnel economic perspective. *Resour. Energy Econ.* 66, 101261.

- Singh, J., Verbeke, W., Rhoads, G.K., 1996. Do organizational practices matter in role stress processes? a study of direct and moderating effects for marketing-oriented boundary spanners. *J. Mark.* 60 (3), 69–86.
- Taiwan Labor Quarterly, 2020. 論疫情下臺灣勞動市場現況與因應. 63(September). URL (<https://www.mol.gov.tw/media/>) (Accessed October 16 21).
- Tang, G., Chen, Y., Jiang, Y., Paillé, P., Jia, J., 2018. Green human resource management practices: scale development and validity. *Asia Pac. J. Hum. Resour.* 56, 31–55.
- Temminck, E., Mearns, K., Fruhen, L., 2015. Motivating employees towards sustainable behavior. *Bus. Strategy Environ.* 24, 402–412.
- Teng, H.-Y., Cheng, L.-Y., Chen, C.-Y., 2021. Does job passion enhance job embeddedness? a moderated mediation model of work engagement and abusive supervision. *Int. J. Hosp. Manag.* 95, 102913.
- Tripathi, P.M., Srivastava, S., Singh, L.B., Kapoor, V., Solanki, U., 2021. A JR perspective for enhancing engagement through empowerment: a study on Indian hotel industry. *J. Hosp. Tour. Manag.* 46, 12–25.
- Úbeda-García, M., Claver-Cortés, E., Marco-Lajara, B., Zaragoza-Sáez, P., 2021a. Corporate social responsibility and firm performance in the hotel industry: the mediating role of green human resource management and environmental outcomes. *J. Bus. Res.* 123, 57–69.
- Úbeda-García, M., Marco-Lajara, B., Zaragoza-Sáez, P., Manresa-Marhuenda, E., Poveda-Pareja, E., 2021b. Green ambidexterity and environmental performance: the role of green human resources. *Corp. Soc. Responsib. Environ. Manag.*
- Uen, J.F., Chang, H.-C., McConville, D., Tsai, S.-C., 2018. Supervisory mentoring and newcomer innovation performance in the hospitality industry. *Int. J. Hosp. Manag.* 73, 93–101.
- Ugwu, F.O., Onyishi, E.I., Anozie, O.O., Ugwu, L.E., 2021. Customer incivility and employee work engagement in the hospitality industry: roles of supervisor positive gossip and workplace friendship prevalence. *J. Hosp. Tour. Insights.*
- Umrani, W.A., Channa, N.A., Yousaf, A., Ahmed, U., Hussain, M., Ramayah, T., 2020. Greening the workforce to achieve environmental performance in hotel industry: a serial mediation model. *J. Hosp. Tour. Manag.* 44, 50–60.
- Wang, C., Xu, J., Zhang, T.C., Li, Q.M., 2020. Effects of professional identity on turnover intention in China's hotel employees: the mediating role of employee engagement and job satisfaction. *J. Hosp. Tour. Manag.* 45, 10–22.
- Wang, J.(S.), Fu, X., Wang, Y., 2021. Can "bad" stressors spark "good" behaviors in frontline employees? Incorporating motivation and emotion. *Int. J. Contemp. Hosp. Manag.* 33 (1), 101–124.
- Wood, B.P., Eid, R., Agag, G., 2021. A multilevel investigation of the link between ethical leadership behavior and employees green behavior in the hospitality industry. *Int. J. Hosp. Manag.* 97, 102993.
- Wu, L.-Z., Sun, Z., Ye, Y., Kwan, H.K., Yang, M., 2021. The impact of exploitative leadership on frontline hospitality employees' service performance: a social exchange perspective. *Int. J. Hosp. Manag.* 96, 102954.
- Yong, J.Y., Yusliza, M.-Y., Fawehinmi, O.O., 2019. Green human resource management: a systematic literature review from 2007 to 2019. *Benchmark.: Int. J.* 27 (7), 2005–2027.
- Zhong, L., Wayne, S.J., Liden, R.C., 2016. Job engagement, perceived organizational support, high-performance human resource practices, and cultural-value orientations: a cross-level investigation. *J. Organ. Behav.* 37, 823–844.