

ARTICLE

It takes two to tango: Linking signature strengths use and organizational support for strengths use with organizational outcomes

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Abstract

The present study tested and extended the motivational process of the Job Demands-Resources (JD-R) theory to explicate the role of signature strengths use as a personal resource and organizational support for strengths use as a job resource for a host of organizational outcomes. Our greater interest was to examine serial and parallel mediation of employee-level variables (i.e., work engagement, job performance, and turnover intentions) between both types of resources (personal and job) and organizational outcomes (i.e., organizational performance and turnover). We collected data from 202 top managers from 56 branches of a large bank in Pakistan. The participants filled in data for most of the study variables, whereas the concerned bank officials provided objective ratings of organizational performance and turnover. The results indicated the indirect effect of signature strengths use and organizational support for strength use on perceived and objective organizational performance mediated by work engagement, job performance, and turnover intentions. Signature strengths use also showed a direct effect on perceived and objective organizational performance. The findings illustrate the potential benefits of using one's signature strengths for employee and organizational success and reiterate the importance of enhancing organizational support for strengths use for management groups who in turn can contribute substantially to organizational performance.

KEYWORDS

job demand-resource theory, job performance, job resource,

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organizational performance, organizational support for strengths use, personal resource, signature strengths use, turnover, turnover intentions, work engagement

BACKGROUND

Organizational scholars have long been interested in understanding the factors that contribute to organizational performance. This interest has uncovered a broad range of contributing factors such as economic, environmental, and organizational (McGivern & Tvorik, 1997; Penrose & Penrose, 2009). Nevertheless, recent research has led to a revolution that seeks to understand how individuals contribute to organizational performance and bottom-line indicators (Kim & Ployhart, 2014; Ployhart & Hale, 2014; Schneider et al., 2013). This paradigmatic shift to understanding the psychological origins of work behaviours has co-occurred with the increased application of positive psychology at work. In particular, the study of strengths use and perceived organizational support for strengths use have expanded considerably in recent years offering extensive evidence on their role in employee-level outcomes (e.g., task performance and job satisfaction; Harzer & Ruch, 2014; Harzer et al., 2021; Lavy & Littman-Ovadia, 2017; van Woerkom & Meyers, 2015). However, their relations with organization-level outcomes have rarely been studied. Moreover, there is a dire need for an overarching theoretical framework that explains how strengths use and perceived organizational support for strengths use are linked to organizational outcomes. Taken together, the present study is grounded on the motivational process of the Job Demands-Resource (JD-R) theory focusing on signature strengths use as a personal resource and perceived organizational support for strengths use as a job resource. As it takes two to tango, we tested the distinct role of these two types of resources for organizational outcomes through potentially relevant mediators.

Peterson and Seligman (2004) introduced the Values in Action (VIA) Classification of strengths to describe good character as a measurable individual difference. The VIA Classification includes 24 character strengths, universally valued positive attributes, surmised to improve individuals' functioning as well as of organizations (Peterson & Seligman, 2004). These character strengths were organized into six clusters. For instance, strengths of justice include character strengths of fairness, leadership, and teamwork. Character strengths can be ranked for each individual concerning how central they are to the individual. Peterson and Seligman (2004, p. 18) stipulated that most people have up to seven core or 'signature' strengths. Signature strengths are the most dominant character strengths, which a person owns, celebrates, and frequently exercises. However, their use depends on two conditions (Harzer & Ruch, 2013). Firstly (like for every trait; cf., Fishbein & Ajzen, 2010; Saucier et al., 2007), an individual needs to possess the strength to a certain degree to be able to show strength-related behaviour (i.e., apply it). Secondly, situational circumstances (e.g., at the workplace) need to allow or call for the demonstration of the strength, as trait-related behaviour needs conducive circumstances to be displayed (Saucier et al., 2007; Ten Berge & De Raad, 1999). Formal situations like the workplace might not always encourage behaviour that suits an individual's trait pattern (Ten Berge & De Raad, 1999). Signature strengths use induces positive states like feeling competent and invigorated (Peterson & Seligman, 2004).

Along with the emergence of the strengths use as a construct in positive psychology, perceived organizational support for strengths use has also received scholarly attention (Keenan & Mostert, 2013). Perceived organizational support for strengths use refers to the extent to which employees perceive that their organizations support them to use their strengths at the workplace (Keenan & Mostert, 2013; van Woerkom, Bakker, & Nishii, 2016).

We applied the motivational process of JD-R theory (Bakker et al., 2023; Bakker & Demerouti, 2014; Demerouti et al., 2001; Schaufeli & Bakker, 2004; Taris & Schaufeli, 2015) as an underlying framework for our study. One fundamental assumption of the JD-R theory is that different job characteristics can be categorized into two categories: job demands and job resources. Later on, an extension was made by including personal resources and how they operate concerning the model's processes (Bakker & Demerouti, 2007;

Practitioner points

- An extended motivational process of the JD-R theory was supported by employing that personal and job resources validly predict organizational outcomes.
- The research provides an optimistic view of strengths use at work. Practitioners and coaches can apply interventions to enhance signature strengths use for likely benefits at the individual and organizational levels.
- Our findings also provide evidence that organizational support for strengths use is a win-win situation for both employees and employers.

Xanthopoulou et al., 2009). Bakker and Demerouti (2014) suggested that personal resources can play a similar role as job resources. Furthermore, the JD-R theory proposes that job demands and resources initiate two different processes, such as a health-impairment process and a motivational process, respectively. Job demands are supposed to play a crucial role in the health-impairment process but not in the motivational process (Bakker & Demerouti, 2017). Personal and job resources initiate a motivational process that may lead to high work engagement and performance (Bakker & Demerouti, 2007). Substantial evidence exists for these dual pathways and confirms the unique outcomes of the two processes (Bakker et al., 2004; Hakanen et al., 2008; Simbula, 2010). Accordingly, some researchers have exclusively focused on the unique contribution of resources in the motivational process (Wang et al., 2023; Xanthopoulou et al., 2009) concerning different outcomes. In line with this practice, personal and job resources (signature strengths use and organizational support for strengths use) were taken as antecedents to examine their contribution to organization-level outcomes (organizational performance and turnover) through employee-level outcomes (work engagement, job performance, and turnover intentions).

Personal resources are aspects of the self that are generally linked to resiliency and refer to individuals' sense of their ability to control and impact their environment successfully (Hobfoll et al., 2003). Signature strengths use, similar to personal resources conveys motivational and emotional features of fulfilment like excitement, yearning, inevitability, discovery, and invigoration (Peterson & Seligman, 2004). We studied these personal resources at the antecedent level considering the nature and established role of signature strengths use as an antecedent for different work-related outcomes (Harzer et al., 2017; Hoge et al., 2020). Employees who use their strengths in the workplace are inclined to perform better and are more proactive (Dubreuil et al., 2014; Harzer & Ruch, 2014), and have lesser turnover intentions (Mahomed & Rothmann, 2020). Moreover, the application of strengths at work relates to a variety of positive outcomes such as increasing productivity (up to 12.5%) and decreasing turnover rates (up to 50%; cf. Hodges & Asplund, 2010).

Job resources refer to those physical, psychological, social, or organizational aspects of the job that are functional in achieving work goals, reducing job demands and the associated physiological and psychological costs, or stimulating personal growth, learning, and development (Bakker & Demerouti, 2007; Demerouti et al., 2001). In line with previous studies (Keenan & Mostert, 2013; van Woerkom, Bakker, & Nishii, 2016), perceived organizational support for strengths use being the organizational aspect of the job in achieving work goals was taken as a job resource. Organization-wide approaches enable employees to use their strengths as much and as often as possible at work (van Woerkom & Meyers, 2015; van Woerkom, Mostert, et al., 2016). Such holistic approaches become manifest in employees' perceptions of organizational support for the use of their strengths. Hence, perceived organizational support for strengths use is an important job resource that helps employees to achieve their work goals and engage in activities that foster their personal development. It is also important for organizations that struggle to gain a competitive advantage (van Woerkom, Bakker, & Nishii, 2016). The role of job resources as an antecedent of work-related outcomes is quite established (Bakker & Demerouti, 2017; Schaufeli & Bakker, 2004) and has also been examined with respect to organizational outcomes (Rahmadani et al., 2020; Xanthopoulou et al., 2009).

As per the JD-R theory, work engagement is taken as an intermediate mechanism that connects the resources with outcomes. Work engagement is defined as a positive, fulfilling, work-related state of mind that is characterized by vigour, dedication, and absorption (Schaufeli et al., 2002). Previous research examined the role of strengths use and support for strengths use for work engagement either by utilizing JD-R theory (Stander & Mostert, 2013; van Woerkom, Mostert, et al., 2016) or other positive psychology frameworks (Lavy & Littman-Ovadia, 2017; Meyers et al., 2019). Work engagement is also considered important for organization-level outcomes as it contributes to bottom-line indicators (Demerouti & Cropanzano, 2010). In the present research, it was therefore expected that the effect of signature strengths use and perceived organizational support for strengths use on organizational performance and turnover is sequentially mediated by work engagement and employee-level outcomes (i.e., job performance and turnover intentions).

As an employee-level outcome, job performance is defined as the aggregated value of the distinct behavioural episodes that an individual performs over a standard interval of time for the organization (Motowidlo, 2003). Different models and dimensions of job performance have emerged over time. The two known dimensions are in-role versus extra-role performance (Campbell, 1990; Jex & Britt, 2008). In-role performance includes the activities that are related to employees' formal role requirements (i.e., technical aspects of a given job) while extra-role performance includes activities other than formal role requirements (i.e., skills that transcend the specific content of a job such as communication skills and being a team player) that promote organizational effectiveness (Borman & Motowidlo, 1997). Organizations strive to improve employees' job performance as well as retain their top performers (Ulrich, 1997). Contrary to retention is the issue of turnover intentions, the second employee-level outcome of the present study. Turnover intentions affect the probability that an employee will leave an organization (Mobley et al., 1978), because they are a conscious and deliberate inclination to leave the organization (Tett & Meyer, 1993). Behavioural intention is a reliable determinant of actual behaviour. This implies that turnover intention can be used as a proxy for actual turnover (Jaros et al., 1993; Muliawan et al., 2009; Steel & Ovalle, 1984). Hence, job performance and turnover intentions were considered two parallel mediators between resources and organizational outcomes.

Literature highlights the importance of the role of top management's outcome in the organizational outcome (e.g., CEO burnout and firm performance; Sirén et al., 2018). Though strengths focus is necessary at all levels, it is important that leaders exhibit an openness to use strengths (Biswas-Diener et al., 2017). Considering the crucial role of leaders in business-level outcomes, the present investigation utilized a sample of top management from different branches of a large bank in Pakistan. Moreover, both perceived (perceived organizational performance) and objective measures (objective organizational performance and turnover) of organizational outcomes were taken to allow for a more fine-grained investigation.

The first organizational outcome of the present study, organizational performance, is an umbrella term that covers a number of business activities and how they are accomplished. The concept of organizational performance refers to whether the organization does well in performing the administrative and operational functions according to the mission and whether the organization produces the actions and outputs according to the mission of the institutional mandate (Kim, 2005). Organizational performance can be measured using objective and/or subjective indicators. Objective indicators measure organizational performance in terms of financial or tangible outcomes and acclaim to reduce the probability of common method variance (Wall & Wood, 2005). On the other hand, subjective indicators of organizational performance (also termed perceived indicators) make use of the self-ratings of employees, top management, or key stakeholders and are regarded as a reasonable alternative (Allen & Helms, 2002) to study organizational performance. The second organizational outcome, turnover is the movement of an employee out of an organization (Coomber & Barriball, 2007). Employee turnover is a major concern of all sizes and types of companies including the banking sector (Shukla & Sinha, 2013; Sun & Wang, 2017). Different factors influence turnover. For instance, high performers may find it easier to find alternative jobs, so when they are unhappy, they can afford to quit their jobs voluntarily (Sun & Wang, 2017; Williams & Livingstone, 1994). In contrast, the extent to which employees feel that the

organization supplies them with the required support for strengths use may lead to lower levels of turnover intentions (Els et al., 2018) a known precursor for actual turnover (Muliawan et al., 2009).

The present study

Despite the growing interest in the topic of strengths use and perceived organizational support for strengths use (Miglianico et al., 2020), little is known about their impact on organizational outcomes (Hodges & Asplund, 2010; van Woerkom, Bakker, & Nishii, 2016). Analogously, there is a huge urge to investigate the role of personal and job resources for group and organization-level variables (Bakker & Demerouti, 2017). The researchers tested the JD-R theory on team/organizational outcomes either by testing the whole model at the team level (Torrente et al., 2012) or by taking team/organizational outcomes (i.e., team effectiveness, team innovation, financial returns) through the mediating mechanism of work engagement or burnout (Bakker et al., 2008; Rahmadani et al., 2020; Xanthopoulou et al., 2009). However, these studies have not explored organizational outcomes through employee-level outcomes, whereas literature guides the contribution of employee-level variables to organization-level variables (Alfalla-Luque et al., 2015; Bakotić, 2016; Kim, 2005; Mabey & Raminetz, 2005). For instance, the effects of performance constructs on higher-level outcomes like organizational productivity have sparsely been examined (Carpini et al., 2017). Moreover, the role of work engagement in JD-R theory has been explored recently by a meta-analysis (Mazzetti et al., 2021) considering different antecedents and outcomes. The findings showed that the effect size of personal resources was higher than other kinds of resources (i.e., job resources). Furthermore, the effect sizes for job outcomes (job satisfaction, commitment, job performance, and turnover intentions) were higher than wellbeing-related outcomes.

Building on the existing literature, the present study aimed to extend the application of two frameworks (i.e., the JD-R theory and the VIA Classification; Bakker & Demerouti, 2014; Peterson & Seligman, 2004) from employee work behaviours to organization-level outcomes. The theoretical model of the present study extends the role of personal and job resources from employee to organizational outcomes (i.e., perceived and objective organizational performance, and turnover) through serial and parallel mediation (i.e., work engagement, job performance, and turnover intentions). Serial mediation assumes a causal chain linking the mediators with a specified direction of causal flow (Hayes, 2012). For instance, signature strengths use possibly will increase work engagement which may increase job performance and thus can increase perceived organizational performance, whereas parallel mediation assumes that more than one mediator exists in the model that is parallel to one another (Hayes, 2013). For example, work engagement may increase top managers' performance as well as decrease their turnover intentions and thus both may increase perceived organizational performance. The theoretical model is presented in Figure 1.

The first set of hypotheses focuses on the role of signature strengths use as a personal resource for organizational outcomes. In accordance with the proposition of the JD-R theory, personal resources can play a similar role as job resources (Bakker & Demerouti, 2014). Likewise, signature strengths use is an established antecedent contributing positively to positive outcomes (Dubreuil et al., 2014; Harzer et al., 2017) and inversely to negative outcomes (Mahomed & Rothmann, 2020). For these reasons, this personal resource was taken as an antecedent in the present study and the following hypotheses were formulated.¹

¹While critically reviewing the JD-R theory, Schaufeli and Taris (2014) elaborated that interaction between personal and environmental factors results in human behaviour (the same applies to work behaviours). Personal resources have been integrated into theory in different ways. However, which place they should take is as yet unclear. Previous studies have explored the role of personal resources at different levels such as an antecedent variable, mediating, and moderating mechanisms (Xanthopoulou et al., 2007, 2008) for different work-related outcomes. We positioned signature strengths use as a personal resource at the antecedent level akin to perceived organizational support for strengths use as a job resource in the model to examine their distinct role for a host of workplace outcomes. However, considering the literature about the ambiguous position of personal resources in the JD-R theory, we tested the moderating effects of personal resources along with job resources as an additional analysis.

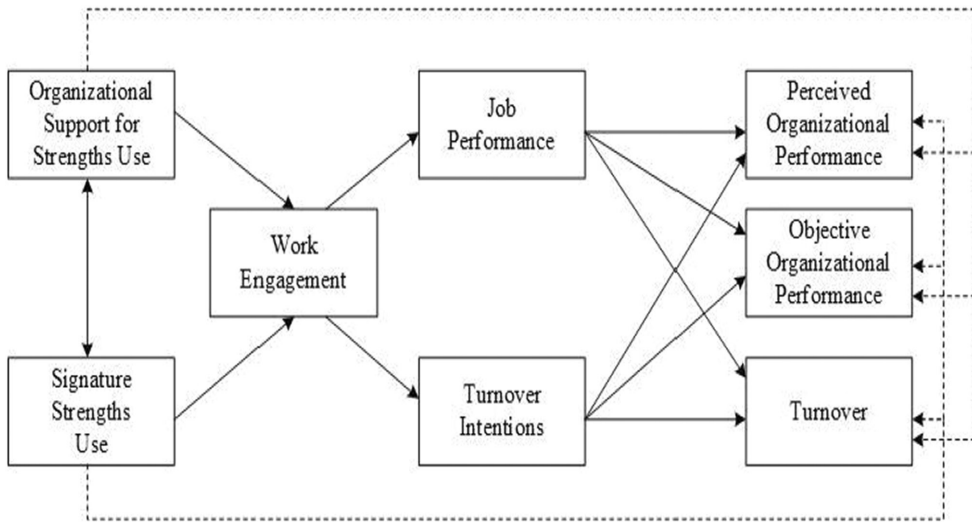


FIGURE 1 Proposed research model based on the extended motivational process of the JD-R theory.

Hypothesis 1a. The effect of signature strengths use on perceived organizational performance is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

Hypothesis 1b. The effect of signature strengths use on objective organizational performance is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

Hypothesis 1c. The effect of signature strengths use on turnover is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

The second set of hypotheses aims to examine the role of organizational support for strengths use as a job resource for organizational outcomes. Literature indicated that perceived organizational support for strengths use is positively related to work engagement (Botha & Mostert, 2014), job performance (Stander et al., 2014), and negatively related to turnover intentions (Els et al., 2018). Similarly, the role of job resources as antecedent in work-related outcomes is fairly established (Bakker & Demerouti, 2017; Schaufeli & Bakker, 2004) and has also been examined limitedly for the organizational outcome (Rahmadani et al., 2020; Xanthopoulou et al., 2009). Bearing this in mind, the following hypotheses were formulated:

Hypothesis 2a. The effect of perceived organizational support for strengths use on perceived organizational performance is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

Hypothesis 2b. The effect of perceived organizational support for strengths use on objective organizational performance is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

Hypothesis 2c. The effect of perceived organizational support for strengths use on turnover is mediated by work engagement, job performance, and turnover intentions (serial and parallel mediators).

METHOD

Participants and procedure

We collected data from 202 top managers from 56 branches (2–6 managers from each branch) of a large bank in Pakistan. The participants (185 men and 17 women) had a mean age of 44.46 years ($SD = 5.59$; range 34–58 years). The sample was highly educated as most of the participants had 18 years of education ($n = 127$) and the rest of them had 16 years of education ($n = 75$). The participants had higher representation from urban areas of Pakistan ($n = 150$) and relatively lower representation from rural areas ($n = 52$). Most of the participants (i.e., 57.4%) belonged to the nuclear family system, and the remaining 42.6% participants belonged to the joint family system. The participants were approached after the prior approval from the Center for Assessment Research and Employees Evaluation of the bank. They were informed about the purpose and requirements of the study and data collection proceeded after their formal consent. The participants completed all the assessment measures utilizing the in-house data collection software of the bank. Furthermore, concerned departments of the bank provided information and objective data for the assessment of organizational outcomes (i.e., objective organizational performance and turnover).

Measures

The *Perceived Organizational Support for Strengths Use Scale (POSSU)*; Keenan & Mostert, 2013) is an 8-item measure assessing employees' perceptions of the extent to which their organization aims at using their strengths. Participants rate the extent to which each item adequately describes their perception of organizational support on a 7-point Likert scale ranging from 1 = *almost never* to 7 = *almost always*. A sample item is “This organization uses my strengths”. The internal consistency of the scale was $\alpha = .89$ in the present research.

The *Signature strengths use* was computed by combining individual results of the Values in Action Inventory of Strengths-Mixed (VIA-IS-M; McGrath, 2017) and the Applicability of Character Strengths Rating Scales (ACS-RS; Harzer & Ruch, 2013). The VIA-IS-M (McGrath, 2017; Peterson & Seligman, 2004) is a 96-item measure assessing the possession of 24 character strengths of the VIA Classification. Participants rate the extent to which each item adequately describes them on a 5-point Likert scale ranging from 1 = *not like me at all* to 5 = *very much like me*. The ACS-RS (Harzer & Ruch, 2013) is a 96-item measure assessing the degree to which each of the character strengths is applicable at work. Short paragraphs are provided for each of the 24 character strengths, describing character strengths-relevant behaviour which was rated on a five-point Likert-scale (1 = *never* through 5 = *[almost] always*) indicating if (a) this behaviour is demanded, (b) perceived as helpful, (c) perceived as important for the individual, and (d) actually displayed in the daily working context.

For the computation of signature strengths use, any particular character strengths must be possessed as signature strength (top seven). Ranking the 24 character strengths of VIA-IS-M from the highest to the lowest provided information about ‘signature strengths’ (McGrath, 2017; Peterson & Seligman, 2004). A signature strength was only defined as being used at work (see Harzer & Ruch, 2013), if (a) the VIA-IS-M score of that particular signature strength (self-rating) was 3.5 or higher (i.e., this is equal to possessing a character strength ‘at least slightly’) and if (b) the ACS-RS score of that particular signature strength was 4 or higher (i.e., this is equal to applicability that is at least rated as ‘often’). As a result, individual scores of signature strengths use varied between 0 and 7. This conceptualization and computation of signature strengths use is defined as a form of character strengths-related person-job fit (see Harzer et al., 2017; Harzer & Ruch, 2016) that best matches the need-supplies-fit. In accordance with the assumptions of *needs-supplies fit*, the individual's signature strengths form the individual's need to be approved to behave congruently with those strengths (Peterson & Seligman, 2004). The more frequently job tasks allow for the use of individuals' signature strengths, the more the job supplies this

need (Harzer & Ruch, 2013) and the closer the match. This operationalization (Harzer & Ruch, 2013) has been utilized in some previous studies as well (Harzer et al., 2017; Hoge et al., 2020; Strecker et al., 2020).

The *Utrecht Work Engagement Scale (UWES)*, Shorter version; Schaufeli & Bakker, 2003) is a 9-item measure assessing work engagement (three items for each subscale). Participants rate the extent to which each item adequately describes them on a 7-point Likert scale ranging from 0 = *never* to 6 = *always*. It measures work engagement through three subscales (i.e., vigour, dedication, and absorption). However, total scores were computed in the present study. A sample item is 'I am proud on the work that I do'. Internal consistency of UWES-9 was $a = .74$ in the present research.

The *Job Performance Scale* (Goodman & Svyantek, 1999; Shorter version by Xanthopoulou et al., 2008) is a 6-item scale measuring two dimensions of job performance including in-role and extra-role performance (3 items per subscale). In the current research, an employee's job performance is operationalized as a combination of the employees' in-role performance and extra-role performance (see Bakker & Bal, 2010; Rahmadani et al., 2020 for similar operationalization). Participants rate the extent to which each item adequately describes them on a 7-point Likert scale ranging from 0 = *not at all characteristic* to 6 = *totally characteristic*. A sample item is "I volunteer to do things not formally required by the job". In the present research, the internal consistency of the overall scale is $a = .60$.

The *Michigan Organizational Assessment Questionnaire (MOAQ)*; Cammann et al., 1979) is a questionnaire out of which three items assessing turnover intentions were taken. Participants rate the extent to which each item adequately describes them on a 5-point Likert scale ranging from 1 = *strongly disagree* to 5 = *strongly agree*. A sample item is 'I often think about quitting'. The internal consistency of the turnover intentions scale was $a = .78$ in the present research.

Organizational performance was measured in two ways viz. perceived organizational performance (branch performance perceived by the top managers) and objective organizational performance (objective ratings of branch performance). The utilization of objective organizational performance along with perceived organizational performance may overcome the issues in these two forms of ratings and provide a comprehensive picture.

The *Perceived Organizational Performance Scale* (Kim, 2005) is a 12-item measure assessing perceived organizational performance (two items per each subscale; internal and external efficiency, internal and external effectiveness, as well as internal and external fairness). Participants rate the extent to which each item adequately describes them on a 5-point Likert scale ranging from 1 = *strongly disagree* to 5 = *strongly agree*. In the present research, a total score was computed. A sample item is 'My branch is trying to reduce cost in managing the organization and performing works'. Internal consistency was $a = .55$ in the present study.

Objective Organizational Performance is the measure of annual bank branch performance based on several objective criteria such as branch productivity, quality, service, and costs. The bank records these financial and non-financial indicators that contribute to the relative efficiency of bank branches. In the present study, 56 branches of a commercial/private bank were included, and the headquarters provided ratings of all branches from 1 to 10. The said measurement highlights the strengths and weaknesses of the branches, their overall performance, and relative operating efficiency for internal benchmarking.

The *Turnover* is the percentage of employees who have left the branch during the whole year. The turnover rate for a given year is the number of employees who left the bank divided by the number of employees working in that year and expressed as a percentage. The turnover rate was provided by 56 branches.

Strategy of analysis

We collected data at two levels (i.e., individual and organization) in the present study. We recruited only branch heads and top managers considering the important role of top management in the organizational outcome which restricted the number of participants from each branch (e.g., 4 branches with

2 managers). However, at least five members are required at the individual level in a group for multi-level analysis (Maas & Hox, 2005). Therefore, the organization-level data of branch performance and turnover was disaggregated into 202 top managers. Sample size adequacy was fulfilled for Structural Equation Modelling as sample size plays a substantial impact in achieving statistical significance, both in small and large sample sizes (Hair Jr et al., 2014). The sample of the present study was adequate according to Quintana and Maxwell (1999) who suggested at least 200 participants for meaningful values of statistical indices. Therefore, the final model was tested considering the dependent variable (i.e., perceived organizational performance, objective organizational performance, and turnover). Before model testing using *RStudio*, certain prerequisites (i.e., absence of missing data and outliers, normality, linearity, sample size adequacy) were checked and fulfilled.

RESULTS

Descriptive and correlation analyses

Descriptive statistics and correlation of study variables were analysed. Table 1 provides an overview of descriptive statistics (minimum, maximum, mean, and standard deviation) as well as inter-correlations of signature strengths use and perceived organizational support for strengths use with the employee and organizational outcomes. Please see Table S1 for descriptive statistics and reliability of VIA-IS-M and ACS-RS.

Table 1 shows that the study variables demonstrated satisfactory variability in response (except perceived and objective organizational performance which exhibited range restriction to some extent). Signature strengths use and perceived organizational support for strengths use positively correlated with work engagement, job performance, and organizational performance, whereas negatively correlated with turnover intentions and turnover. Work engagement was positively related to job performance and organizational performance while negatively related to turnover intentions and turnover. Job performance did not correlate with turnover. The significant relationship of turnover intentions with turnover plus perceived organizational performance with objective organizational performance established the convergent validity of objective indicators.

Hypotheses testing

The hypothesized model was analysed using the *lavaan* package in *RStudio*. Model fit indices of the initial model indicated a poor fit. Therefore, model modifications were done to achieve a good fit (Hooper et al., 2008; Hu & Bentler, 1999). Four suggested modifications were performed in the final model based on the criteria of Arbuckle (2004) that modification indices for covariance should be at least 4.0. These modifications (i.e., correlations between the error terms of self-rated mediators [work engagement, job performance, and turnover intentions] as well as between the error terms the objective organizational outcomes [objective organizational performance and turnover]) provided a good fit for the final model presented in Table 2. The model fit indices of the final model were in line with the recommendations of Hu and Bentler (1999) who suggested RMSEA value below or close to .06, SRMR value between 0 and .08, CFI, TLI, and NFI value of .95 or higher for a good model fit.

Furthermore, unstandardized direct and indirect effects and robust standard error were assessed. Figure 2 provided an overview of direct effects and robust standard error.

Figure 2 shows that signature strengths use and perceived organizational support for strengths use predicted work engagement. Moreover, work engagement positively predicted job performance and negatively predicted turnover intentions. Among these two parallel mediators, job performance positively predicted both perceived and objective performance while turnover intention positively predicted actual turnover.

TABLE 1 Descriptives and zero order correlations of the study variables.

Variables	Min	Max	M	SD	2	3	4	5	6	7	8
1. Signature strengths use	0.00	7.00	5.72	1.36	.26***	.30***	.34***	-.26***	.54***	.37***	-.17*
2. Organizational support for strengths use	2.13	7.00	5.72	0.90	–	.62***	.53***	-.39***	.32***	.32***	-.20**
3. Work engagement	2.78	6.00	4.59	0.72	–	–	.50***	-.45***	.28***	.35***	-.19**
4. Job performance	2.50	6.00	4.45	0.72	–	–	–	-.16*	.47***	.40***	-.13
5. Turnover intentions	1.00	5.00	2.56	1.01	–	–	–	–	-.17*	-.15*	.26***
6. Perceived organizational performance	2.25	4.33	3.43	0.36	–	–	–	–	–	.31***	-.07
7. Objective organizational performance	6.50	9.00	7.37	0.83	–	–	–	–	–	–	-.56***
8. Turnover	3.08	17.39	10.08	3.37	–	–	–	–	–	–	–

Note: N = 202 leaders, N = 56 branches (for objective branch performance and turnover). * $p < .05$, ** $p < .01$, *** $p < .001$.

TABLE 2 Model fit indices (N=202).

Model	χ^2	df	CFI	TLI	NFI	SRMR	RMSEA
Model 1	124.89	11	.77	.40	.76	.10	.23
Model 2	8.97	7	1.00	.98	.98	.02	.04

Note: N=202 top managers. All changes in the chi-square values are computed relative to the model, $\chi^2 > .05$.

Abbreviations: CFI, Comparative fit indices; df, degree of freedom; NFI, Normed Fit Index; RMSEA, Root mean square error approximation; SRMR, Standardized root mean square residual; TLI, Tucker–Lewis Index; χ^2 , chi-square.

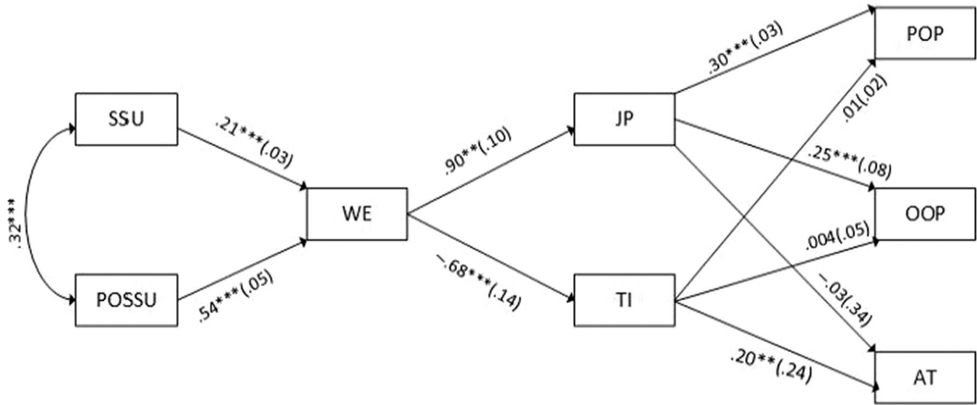


FIGURE 2 N=202. Multivariate model representing standardized regression co-efficient and robust standard error (reported in parentheses). AT, Actual turnover; JP, Job performance scale; OOP, Objective organizational performance; POP, Perceived organizational performance; POSSU, Perceived organizational support for strengths use; SSU, Signature strengths use; TI, Turnover intentions; WE, Work engagement. ** $p < .01$. *** $p < .001$.

Hypotheses 1 a–c stated that signature strengths use is likely to have an effect on organizational outcomes (perceived and objective organizational performance as well as turnover) through top managers' work engagement, turnover intentions, and job performance. Hypotheses 2 a–c stated that perceived organizational support for strengths use is likely to have an effect on organizational outcomes (perceived and objective organizational performance as well as turnover) through top managers' work engagement, turnover intentions, and job performance. Table 3 provides an overview of standardized direct and indirect effects and robust standard error of signature strengths use and support for strengths use.

Table 3 shows that signature strengths use had a significant total indirect effect on perceived organizational performance ($\beta = .05, p < .05$) and objective organizational performance ($\beta = .05, p < .05$). Moreover, signature strengths use had an indirect effect on perceived organizational performance ($\beta = .06, p < .01$) and objective organizational performance ($\beta = .05, p < .05$) through work engagement and job performance. It also showed a significant indirect effect of signature strengths use on turnover through work engagement and turnover intentions ($\beta = -.03, p < .05$). The result also showed that signature strengths use predicted perceived organizational performance ($\beta = .43, p < .001$) and objective organizational performance ($\beta = .25, p < .001$). This indicated that the effect of signature strengths use on perceived and objective organizational performance was direct as well as indirect through serial and parallel mediators (Hypotheses 1a and 1b accepted).

Table 3 also showed that organizational support for strengths use had a significant total indirect effect on perceived organizational performance ($\beta = .14, p < .01$), and objective organizational performance ($\beta = .12, p < .01$). Moreover, organizational support for strengths use had an indirect effect on perceived organizational performance ($\beta = .15, p < .001$) and objective organizational performance ($\beta = .12, p < .001$) through work engagement and job performance. It also showed a significant indirect

TABLE 3 Standardized estimates and robust standard error of direct and indirect effects.

Models	POP		OOP		TO	
	β	SE	β	SE	β	SE
SSU→POP/OOP/TO (Direct effects)	.43***	.02	.25***	.04	-.09	.19
SSU→WE→JP→POP/OOP/TO (Indirect effect)	.06**	.00	.05*	.01	-.005	.03
SSU→WE→TI→POP/OOP/TO (Indirect effect)	-.001	.00	-.001	.00	-.03*	.03
SSU→WE→JP & TI→POP/OOP/TO (Total indirect effects)	.05*	.01	.05*	.01	-.03	.05
POSSU→POP/OOP/TO (Direct effects)	.05	.03	.10	.07	-.08	.31
POSSU→WE→JP→POP/OOP/TO (Indirect effect)	.15***	.01	.12***	.03	-.01	.13
POSSU→WE→TI→POP/OOP/TO (Indirect effect)	-.002	.01	-.001	.02	-.08*	.11
POSSU→WE→JP & TI→POP/OOP/TO (Total indirect effects)	.14**	.02	.12**	.04	.05	.12

Note: * $p < .05$. ** $p < .01$. *** $p < .001$.

Abbreviations: JP, Job performance; OOP, Objective organizational performance; POP, Perceived organizational performance; POSSU, Perceived organizational support for strengths use; SSU, Signature strengths use; TI, Turnover intentions; TO, Turnover; WE, Work engagement.

effect of support for strengths use on turnover through work engagement and turnover intentions ($\beta = -.08, p < .05$). This indicated that the effects of perceived organizational support for strengths use on perceived and objective organizational performance were indirect through serial and parallel mediators (Hypotheses 2a and 2b accepted).²

DISCUSSION

The present study examined the role of signature strengths use and perceived organizational support for strengths use for organizational outcomes. The greater interest was to test and extend the motivational process of the JD-R theory (Bakker & Demerouti, 2014; Demerouti et al., 2001; Schaufeli & Bakker, 2004) as a mechanism through which signature strengths use (as personal resource) and organizational support for strengths use (as job resource) operate for the organizational outcomes (organizational performance and turnover). The study utilized a sample of top managers from the banking sector and benefited from perceived and objective ratings of the organizational outcomes allowing for a more fine-grained test of the hypotheses. Most of the results were in the expected direction and consistent with previous literature. The findings corroborated the extended motivational process of JD-R theory supporting serial mediation of work engagement with two parallel mediators (job performance and turnover intentions) between resources and organizational outcomes. Furthermore, the results showed that these relations were mainly additive as opposed to interactive highlighting the distinct contribution of personal and job resources to organization-level outcomes. In addition, the study compared and concluded that personal and job resources explain specific parts of the variance in organizational outcomes above and beyond each other as they were examined simultaneously. Taken together, it is concluded that strengths-related resources matter at work.

²An additional analysis regarding the moderating effect of personal resources along with job resources was also performed in RStudio using the lavaan package. It was expected that personal and job resources have an interactive effect on organization-level outcomes through top managers' work engagement, turnover intentions, and job performance. Only the interactive effects are presented to avoid replication. Overall, findings indicated that interaction/moderation of job and personal resources have no significant total effect on perceived organizational performance ($\beta = -.08, p = .32$), objective organizational performance ($\beta = -.04, p = .52$), and actual turnover ($\beta = -.05, p = .40$). The findings support the additive role of resources more than the interactive role (Vleugels et al., 2022).

Personal resources and organizational outcomes

The findings supported the first set of hypotheses (1a and b) suggesting that signature strengths use as a personal resource initiates a sequence of desirable outcomes, through increased work engagement, reduced turnover intentions and improved job performance further predicting better organizational performance. These findings are supportive of the core theoretical notion of the VIA Classification of Character Strengths that the exercise of signature strengths embodies motivational and emotional features of fulfilment (Peterson & Seligman, 2004). Signature strengths use has been found as an important resource for employees at work (Harzer & Ruch, 2013; Peterson et al., 2010; Seligman, 2002; Seligman & Csikszentmihalyi, 2000). For instance, Lavy and Littman-Ovadia (2017) found the mediational role of work engagement between strengths use and employee productivity. Despite the fact that substantial evidence exists on the role of signature strengths use for work-related outcomes, yet several questions remain unanswered. In particular, Bakker and van Woerkom (2018) identified an emergent need to explain the mechanisms through which strengths use operates.

In a similar vein, the findings can be understood in terms of the motivational process of the JD-R theory that suggests the mediating role of work engagement in explaining the association between resources and outcomes. Personal resources are individuals' sense of their ability to control and impact their environment successfully (Hobfoll et al., 2003). In this sense, signature strengths use may be seen as a personal resource because employing one's signature strengths may foster work motivation which in turn leads to better job performance, decreases strain, and buffers the negative effects of demands (Harzer, 2020). Previously, Xanthopoulou et al. (2008) found a significant effect of personal resources on employees' job performance and that this effect was mediated through work engagement.

Considering the recent surge to understand the micro-foundations of organizational performance (Ployhart & Hale Jr, 2014), the present study contributed to the extension of the motivational process from employee job performance to organizational performance. This path was supported by the literature on the role of job performance in organizational performance (Brewer & Selden, 2000) and organizational effectiveness (Malik et al., 2011). As mentioned earlier, the role of signature strengths use (or personal resources) for organizational performance is understudied. As an exception, Xanthopoulou et al. (2009) studied the role of personal resources for financial returns as an indicator of unit performance. However, the expected relationship between the three personal resources (efficacy, organizational-based self-esteem, and optimism) and financial returns was not supported. Moreover, they considered personal resources as process variables, whereas the present study deemed personal resources as the antecedent variable. In addition to the previously discussed indirect effects, the present study also supported the direct contribution of signature strengths use to organizational performance. One possible explanation for this could be that signature strengths are theorized to improve individuals' functioning as well as of the organizations (Peterson & Seligman, 2004). This finding implicates that person-related constructs such as human capital and capacity (Becker & Gerhart, 1996) and leadership (Thompson, 1996) directly contribute to organizational performance. Similarly, Cameron et al. (2011) studied related constructs and found that positive practices predicted organizational performance. The contribution of character strengths in economic decision-making was also explored by Jordan and Rand (2018) who factor analysed character strengths. They found that one of the four factors of character strengths is associated with various factors of decision-making such as reliance on reason, intuitive decision-making, and deliberative decision-making.

Hypothesis 1c was partially accepted, the findings supported that signature strengths use, through work engagement, leads to lower turnover intentions that further contribute to lowering turnover. Previously, Mahomed and Rothmann (2020) explored the effects of strengths use on intentions to leave through different mediating mechanisms (e.g., autonomy satisfaction). Taking insight from the JD-R theory, Borst et al. (2019) analysed the role of personal resources in turnover intention through work engagement. Similar to the present study's finding, they established the effect of personal resources on turnover intentions through an energetic state of work engagement. Though, Hodges and Asplund (2010) concluded that the application of strengths at work relates to decreasing turnover rates

(up to 50%). However, the role of personal resources for turnover through mediating mechanisms was understudied and marks one of the main contributions of the present study.

Job resources and organizational outcomes

According to hypotheses 2 a–c, the role of serial and parallel mediators was expected between perceived organizational support for strengths use and organizational outcomes. This assumption was fulfilled for perceived and objective organizational performance. The findings suggested that organizational support for strengths use leads to high job performance and low turnover intentions through work engagement. This high job performance and low turnover intentions, in turn, lead to better organizational performance. One explanation for the role of organizational support for strengths use in organizational performance might be their intrinsic motivational aspect. For example, job resources are thought to be functional in achieving work goals, and stimulating personal growth, learning, and development (Bakker & Demerouti, 2007; Demerouti et al., 2001). The findings suggest that those employees who perceive and feel the work environment as to be adequate, safe, and congenial are prone to develop a positive attitude towards various job components such as work engagement which ultimately results in higher job performance among these employees (Meyers et al., 2020).

These findings can also be understood in the light of organizational support theory. Based on the norm of reciprocity, the theory states that employees who receive organizational resources are expected to compensate their organization with a high level of performance (Armeli et al., 1998). In this sense, perceived organizational support for strengths use is known as a concrete kind of support from the organization/employer (Ding et al., 2020) and is recognized as an important job resource (van Woerkom, Bakker, & Nishii, 2016). Nevertheless, limited studies have explored the role of job resources in different indicators of organizational performance through the mediation of work engagement or burnout. For example, Xanthopoulou et al. (2009) found that job resources like supervisory coaching predict financial returns through the work engagement of employees. Similarly, Bakker et al. (2008) found that cynicism as a subscale of burnout mediated the relationship between job resources and objective team performance.

The effect of perceived organizational support for strengths use as a job resource on turnover via serial and parallel mediators was not supported in the present study. This non-significant finding could have several possible explanations such as assessment types (perceived vs. objective) and levels (employee vs. branch). Furthermore, the turnover rate reported in the present study did not differentiate between voluntary and involuntary turnover. Theoretically, these two forms differ and have different contributing factors. For instance, higher involuntary turnover may suggest potential problems at the organizational level (e.g., hiring strategies; Shaw et al., 1998). In a previous study, a negative association between perceived organizational support for strengths use and company-registered sickness absenteeism (a related withdrawal behaviour) was established (van Woerkom, Bakker, & Nishii, 2016) but no mediating mechanism was considered. Therefore, future research should examine this phenomenon after careful examination of contributing factors. Overall, it is summarized that strengths-related resources (personal and job) significantly explain their predictive indirect effect on perceived and objective organizational performance.³

Interestingly, the serial indirect effects indicated the prominent role of job performance in organizational performance and turnover intentions in turnover. This finding holds an important

³The findings of moderation analysis specify that the relationships were mainly additive as opposed to interactive. This indicated the role of two independent pathways associated with both kinds of organizational performance, one under the direct as well as indirect control of the organization (perceived organizational support for strengths use) and one under the direct as well as indirect control of the person (signature strengths use). Therefore, both need to be addressed separately to get the best outcomes in terms of improving organizational performance and reducing turnover. These findings were consistent with the literature exploring the role of job and personal resources in the health impairment process of the JD-R theory (Vleugels et al., 2022).

direction and draws attention to the established role of job performance in organizational performance (Brewer & Selden, 2000) and organizational effectiveness (Malik et al., 2011). Moreover, it also strengthens turnover intentions to the turnover behaviour link (van Breukelen et al., 2004) that can be understood in terms of the theory of reasoned action and the theory of planned behaviour. Both theories propose that attitudes towards behaviour are strong predictors of behaviour (Fishbein & Ajzen, 1975). In a model of turnover decision-making (Mobley, 1977), the intention to withdraw is considered to be the last cognitive step before the turnover behaviour (van Breukelen et al., 2004). Furthermore, this theoretical argument is also supported by several empirical studies (Cho & Lewis, 2012; Griffeth et al., 2000). In addition, we compared the explained variance in organization-level outcomes by both types of resources above and beyond each other. In our data, results indicated that perceived organizational supports for strengths use as a job resource explained greater variance than signature strengths use as a personal resource. However, the differences were marginal for objective organizational outcomes. Putting together, the findings have set the ground to examine the contribution of these resources and employee work behaviours for organization-level outcomes.

Limitations and future directions

The study has certain limitations that need to be acknowledged and deserve future research. *First*, the study attempted to test and extend the motivational process of the JD-R theory precluding job demands in the model. It is recommended, future studies should include relevant demands along with strengths-related resources to test underlying assumptions comprehensively. *Second*, the study was conducted using a homogeneous sample of top managers that were highly educated professionals taken from different branches of the same bank. This allows us to reach specific conclusions about the managerial role in the banking sector. However, it limits the generalizability of the findings across other job levels and sectors. Therefore, it is important to further test the external validity of the present findings for other working populations. *Third*, the present study was based on self-report measures of all variables (except objective organizational performance and turnover) that might lead to a common method variance problem. Specifically, self-ratings of job performance may have been an issue and future research might benefit from other ratings of job performance, for example, from supervisors, colleagues, or subordinates. Moreover, available objective data on organizational turnover did not distinguish between voluntary and involuntary turnover. In theory, these forms of turnover differ and have unique contributing factors at different levels. Hence, future research should focus on different types of turnover and corresponding personal and organizational factors to understand their relative contribution as well as to suggest relevant interventions. *Fourth*, the present study extended the motivational process of the JD-R theory from employee outcomes to organizational outcomes but did not analyse the data at multi-levels (leaders and branch level) due to the restricted number of top managers from each branch. In contrast, the inclusion of middle management or branch-level staff could have increased representation from each branch, but the selected organizational performance indicators were less relevant to their role. Therefore, the desegregation of the branch-level data was done. It is recommended to use more advanced software for data analysis to deal with such datasets. *Lastly*, during the model testing, correlations between the error terms were drawn to better fit the measurement model. However, it was ensured that correlated measurement errors do not significantly alter the parameter estimates of the model. Allowing correlation between measurement errors has flaws even when correlated measurement errors do not significantly alter parameter estimates (Gerbing & Anderson, 1984; Hermida, 2015). As already utilized by researchers (Hermida et al., 2010; Landis et al., 2009), we applied this approach of improving model fit indices to save the data as it was really hard to collect different forms of data (perceived and objective) from different sources (leaders and organizational representatives) at different levels (individual and organization).

Theoretical contributions

Despite certain limitations, the present study has contributed to the relevant theories and existing literature in several ways. *First*, the study has introduced strengths-related resources (signature strengths use as a personal resource and perceived organizational support for strengths use as a job resource). It has made a significant contribution by explicating a theoretical mechanism through which these strengths-related resources contribute to the organizational outcomes in the banking sector. The study has extended the motivational process of the JD-R theory by (a) adding the paths to organizational outcomes from employee outcomes and (b) specifying strengths-related personal resources as antecedents along with job resources. We were mainly interested in their additive effects rather than their interactive effects. However, future studies should look at the moderation effects as well to see if it works for strengths-related resources (signature strengths use and perceived organizational supports for strengths use). Interestingly, the contribution of job resources in the whole motivational process was greater than the contribution of personal resources in our data. This needs further investigation. Further, most of the research related to resources considered positive outcomes in the motivational process (Demerouti et al., 2001). In contrast, the present research contributes to a small set of studies that tested the role of resources in negative outcomes (Agarwal et al., 2012; Borst et al., 2019; Schaufeli & Bakker, 2004). The consideration of positive as well as negative outcomes at employee and organization levels enhances the scope of the present study. Understanding the mechanisms by which strengths use and support for strengths use operates for organizational level outcomes has shed light on their job-specific contribution to banking sector performance. This has opened a new horizon for researchers to investigate the validity of the extended JD-R theory in different sectors (industries) and working contexts. However, the expansion of the JD-R theory from employee-level outcomes to organizational outcomes requires further validation. Moreover, it is suggested that future research may focus on job demands as well to extend the health-impairment process of the JD-R theory. We had a small sample size and an adequately complex model including personal and job resources, serial and parallel mediators as well as employee and organization-level outcomes. However, research shows that there are even more complex processes (i.e., positioning of job demands). In the future, researchers should address the buffering role of personal and job resources in the presence of relevant job demands. For instance, cognitive demands can be included in the model as they pose a serious threat to leadership success by negatively affecting leaders' work engagement and productivity. Similarly, performance demands could also be studied along with strengths-related resources in the model to evaluate their additive and interactive effects.

Second, the findings have made an empirical contribution to the field of positive and organizational psychology by integrating the JD-R theory literature and providing insights into the psychological origins of organizational performance. Further, it is suggested that future studies should link strategic HRM practices—such as recruitment and selection, training and development, and performance management—to employee strengths use and proposed outcomes.

Third, the study has supplemented international literature on the role of signature strengths use and perceived organizational support for strengths use for employee and organizational level outcomes by providing empirical evidence from a less studied population (i.e., top management from the banking sector of Pakistan). To further establish the evidence, researchers may also examine the self-determination theory's basic psychological needs as mediators. To this end, the study made an important contribution by testing and confirming the mechanism through which signature strengths use and perceived organizational support for strengths use contribute to the organizational level outcomes.

Practical implications

The findings also hold several practical implications for employees and employers. At the employee end, identification of signature strengths and using them more often in novel ways is the first step

to reaping the benefits. Employees are encouraged to use self-administered instruments to identify their signature strengths such as the VIA Inventory of Strengths (Peterson & Seligman, 2004) and Applicability of Character Strengths Rating Scales (Harzer & Ruch, 2013) to assess the degree to which character strengths of the VIA Classification are applicable in their specific work context. For instance, finding a job or occupation that matches one's signature strengths is a prerequisite to career success. By building on their strengths, employees can benefit themselves in professions where they can use their signature strengths and experience high work engagement leading to improved performance.

At the organizational level, specific intervention programs can also be designed to enable employees to identify and use their signature strengths (Dubreuil et al., 2016; Harzer & Ruch, 2016). Besides, organizational leaders should consider creating additional opportunities for employees to recognize, acknowledge, and use their strengths at work (Asplund & Blacksmith, 2012; Clifton & Harter, 2003; Harter et al., 2002; Wang et al., 2023) benefiting the organization. Leaders have a dual responsibility to use their strengths and influence and support others to enable strengths use. The promotion of a strengths-based culture can help engage employees to contribute more to their organizations (Dubreuil & Forest, 2017; Linley et al., 2011). More specifically, organizations can adopt strengths-based HRM practices to achieve high performance. For instance, job analysis in which organizations can develop employee strengths profiling to better align job descriptions and person specifications.

Finally, employees' perceptions of organizational support for strengths use can be enhanced by communicating openly that the use of strengths is highly valued. Based on the findings of the present study, organizational policymakers, and managers are encouraged to implement customized strengths-based approaches to foster signature strengths use and develop a positive perception of organizational support for strengths use. The findings implicated that support for strengths use is a win-win situation for both employers and employees. On one hand, it gives employers more bang for their buck. In this sense, employers should seek to maximize business-level congruence of strengths and strive for strengths specialization. On the other hand, it is plausible that discovering, developing, sustaining, and owning strengths can inspire fulfilment and excellence at work. Said another way, findings highlight the fact that the mobilization of personal and job resources may be of value for employees to thrive that further contribute to the organizations. The prime reason for the popularity of the JD-R theory lies in its capability to build specific insights to develop interventions. Therefore, future research should continue to develop, implement, and assess JD-R interventions (Bakker et al., 2023).

In conclusion, the study made several noteworthy contributions by extending the application of two frameworks (the VIA Classification of Character Strengths and the JD-R theory) from micro (employee) to macro (organization) outcomes. It takes two to tango! The findings have provided empirical evidence that signature strengths use and organizational support for strengths use are important as well as distinct resources for individuals that are beneficial for organizations at large.

AUTHOR CONTRIBUTIONS

Tahira Mubashar: Conceptualization; data curation; formal analysis; funding acquisition; investigation; methodology; project administration; writing – original draft; writing – review and editing.

Claudia Harzer: Conceptualization; investigation; resources; supervision; validation; writing – review and editing.

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CONFLICT OF INTEREST STATEMENT

The authors have no conflict of interest.

DATA AVAILABILITY STATEMENT

The data that support the findings of this study will be available in ORCID after the manuscript is accepted for publication.

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REFERENCES

- Agarwal, U. A., Datta, S., Blake-Beard, S., & Bhargava, S. (2012). Linking LMX, innovative work behaviour and turnover intentions. *Career Development International*, 17(3), 208–230. <https://doi.org/10.1108/13620431211241063>
- Alfalla-Luque, R., Marin-Garcia, J. A., & Medina-Lopez, C. (2015). An analysis of the direct and mediated effects of employee commitment and supply chain integration on organisational performance. *International Journal of Production Economics*, 162, 242–257. <https://doi.org/10.1016/j.ijpe.2014.07.004>
- Allen, R. S., & Helms, M. M. (2002). Employee perceptions of the relationship between strategy, rewards and organizational performance. *Journal of Business Strategies*, 19(2), 115–139.
- Arbuckle, J. L. (2012). IBM SPSS Amos 21. Amos Development Corporation.
- Armeli, S., Eisenberger, R., Fasolo, P., & Lynch, P. (1998). Perceived organizational support and police performance: The moderating influence of socioemotional needs. *Journal of Applied Psychology*, 83(2), 288–297. <https://doi.org/10.1037/0021-9010.83.2.288>
- Asplund, J., & Blacksmith, N. (2012). Leveraging strengths. In K. S. Cameron & G. M. Spreitzer (Eds.), *Oxford library of psychology. The Oxford handbook of positive organizational scholarship* (pp. 353–365). Oxford University Press.
- Bakker, A. B., & Bal, M. P. (2010). Weekly work engagement and performance: A study among starting teachers. *Journal of Occupational and Organizational Psychology*, 83(1), 189–206. <https://doi.org/10.1348/096317909X402596>
- Bakker, A. B., & Demerouti, E. (2007). The job demands-resources model: State of the art. *Journal of Managerial Psychology*, 22(3), 309–328. <https://doi.org/10.1108/02683940710733115>
- Bakker, A. B., & Demerouti, E. (2014). Job demands–resources theory. In C. D. Fisher (Ed.), *Wellbeing: A complete reference guide* (Vol. 3, pp. 1–28). John Wiley & Sons. <https://doi.org/10.1002/9781118539415.wbwell019>
- Bakker, A. B., & Demerouti, E. (2017). Job demands–resources theory: Taking stock and looking forward. *Journal of Occupational Health Psychology*, 22(3), 273–285. <https://doi.org/10.1037/ocp0000056>
- Bakker, A. B., Demerouti, E., & Sanz-Vergel, A. (2023). Job demands-resources theory: Ten years later. *Annual Review of Organizational Psychology and Organizational Behavior*, 10, 25–53.
- Bakker, A. B., Demerouti, E., & Verbeke, W. (2004). Using the job demands-resources model to predict burnout and performance. *Human Resource Management*, 43(1), 83–104. <https://doi.org/10.1002/hrm.20004>
- Bakker, A. B., vanEmmerik, H., & vanRiet, P. (2008). How job demands, resources, and burnout predict objective performance: A constructive replication. *Anxiety, Stress, and Coping*, 21(3), 309–324. <https://doi.org/10.1080/10615800801958637>
- Bakker, A. B., & vanWoerkom, M. (2018). Strengths use in organizations: A positive approach of occupational health. *Canadian Psychology/Psychologie Canadienne*, 59(1), 38–46. <https://doi.org/10.1037/cap0000120>
- Bakotić, D. (2016). Relationship between job satisfaction and organizational performance. *Economic Research-Ekonomska istraživanja*, 29(1), 118–130. <https://doi.org/10.1080/1331677X.2016.1163946>
- Becker, B., & Gerhart, B. (1996). The impact of human resource management on organizational performance: Progress and prospects. *Academy of Management Journal*, 39(4), 779–801. <https://doi.org/10.5465/256712>
- Biswas-Diener, R., Kashdan, T. B., & Lyubchik, N. (2017). Psychological strengths at work. In L. G. Oades, M. F. Steger, A. D. Fave, & J. Passmore (Eds.), *The Wiley Blackwell handbook of the psychology of positivity and strengths-based approaches at work* (pp. 34–47). John Wiley & Sons, Ltd.
- Borman, W. C., & Motowidlo, S. J. (1997). Task performance and contextual performance: The meaning for personnel selection research. *Human Performance*, 10(2), 99–109. https://doi.org/10.1207/s15327043hup1002_3
- Borst, R. T., Kruyen, P. M., & Lako, C. J. (2019). Exploring the job demands–resources model of work engagement in government: Bringing in a psychological perspective. *Review of Public Personnel Administration*, 39(3), 372–397. <https://doi.org/10.1177/0734371X17729870>
- Botha, C., & Mostert, K. (2014). A structural model of job resources, organisational and individual strengths use and work engagement. *SA Journal of Industrial Psychology*, 40(1), 1–11. <https://doi.org/10.4102/sajip.v40i1.1135>
- Brewer, G. A., & Selden, S. C. (2000). Why elephants gallop: Assessing and predicting organizational performance in federal agencies. *Journal of Public Administration Research and Theory*, 10(4), 685–712. <https://doi.org/10.1093/oxfordjournals.jpart.a024287>
- Cameron, K., Mora, C., Leutscher, T., & Calarco, M. (2011). Effects of positive practices on organizational effectiveness. *The Journal of Applied Behavioral Science*, 47(3), 266–308. <https://doi.org/10.1177/0021886310395514>
- Cammann, C., Fichman, M., Jenkins, D., & Klesh, J. (1979). *The Michigan organizational assessment questionnaire*. [Unpublished manuscript]. University of Michigan, Ann Arbor.

- Campbell, J. P. (1990). Modeling the performance prediction problem in industrial and organizational psychology. In M. D. Dunnette & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (pp. 687–732). Consulting Psychologists Press.
- Carpini, J. A., Parker, S. K., & Griffin, M. A. (2017). A look back and a leap forward: A review and synthesis of the individual work performance literature. *Academy of Management Annals*, *11*(2), 825–885.
- Cho, Y. J., & Lewis, G. B. (2012). Turnover intention and turnover behavior: Implications for retaining federal employees. *Review of Public Personnel Administration*, *32*(1), 4–23. <https://doi.org/10.1177/0734371X11408701>
- Clifton, D. O., & Harter, J. K. (2003). Investing in strengths. In A. K. S. Cameron, B. J. E. Dutton, & C. R. E. Quinn (Eds.), *Positive organizational scholarship: Foundations of a new discipline* (pp. 111–121). Berrett-Koehler Publisher, Inc.
- Coomber, B., & Barriball, K. L. (2007). Impact of job satisfaction components on intent to leave and turnover for hospital-based nurses: A review of the research literature. *International Journal of Nursing Studies*, *44*(2), 297–314. <https://doi.org/10.1016/j.ijnurstu.2006.02.004>
- Demerouti, E., Bakker, A. B., Nachreiner, F., & Schaufeli, W. B. (2001). The job demands-resources model of burnout. *Journal of Applied Psychology*, *86*(3), 499–512.
- Demerouti, E., & Cropanzano, R. (2010). From thought to action: Employee work engagement and job performance. In A. B. Bakker & M. P. Leiter (Eds.), *Work engagement: A handbook of essential theory and research* (pp. 147–163). Psychology Press.
- Ding, H., Yu, E., & Li, Y. (2020). Linking perceived organizational support for strengths use to task performance. *Social Behavior and Personality: An International Journal*, *48*(3), 1–10. <https://doi.org/10.2224/sbp.8906>
- Dubreuil, P., & Forest, J. (2017). Choose a job you love, and you will never have to work a day in your life. In E. K. Kelloway, K. Nielsen, & J. K. Dimoff (Eds.), *Leading to occupational health and safety: How leadership behaviours impact organizational safety and well-being* (pp. 281–302). John Wiley & Sons Ltd.
- Dubreuil, P., Forest, J., & Courcy, F. (2014). From strengths use to work performance: The role of harmonious passion, subjective vitality, and concentration. *The Journal of Positive Psychology*, *9*(4), 335–349. <https://doi.org/10.1080/17439760.2014.898318>
- Dubreuil, P., Forest, J., Gillet, N., Fernet, C., Thibault-Landry, A., Crevier-Braud, L., & Girouard, S. (2016). Facilitating well-being and performance through the development of strengths at work: Results from an intervention program. *International Journal of Applied Positive Psychology*, *1*(1), 1–19. <https://doi.org/10.1007/s41042-016-0001-8>
- Els, C., Mostert, K., & vanWoerkom, M. (2018). Investigating the impact of a combined approach of perceived organizational support for strengths use and deficit correction on employee outcomes. *SA Journal of Human Resource Management*, *16*(1), 1–11.
- Fishbein, M., & Ajzen, I. (1975). *Belief, attitude, intention and behavior: An introduction to theory and research*. Addison-Wesley.
- Fishbein, M., & Ajzen, I. (2010). *Predicting and changing behavior: The reasoned action approach*. Taylor & Francis Group.
- Gerbing, D. W., & Anderson, J. C. (1984). On the meaning of within-factor correlated measurement errors. *Journal of Consumer Research*, *11*(1), 572–580. <https://doi.org/10.1086/208993>
- Goodman, S. A., & Svyantek, D. J. (1999). Person-organization fit and contextual performance: Do shared values matter. *Journal of Vocational Behavior*, *55*(2), 254–275. <https://doi.org/10.1006/jvbe.1998.1682>
- Griffith, R. W., Hom, P. W., & Gaertner, S. (2000). A meta-analysis of antecedents and correlates of employee turnover: Update, moderator tests, and research implications for the next millennium. *Journal of Management*, *26*(3), 463–488. <https://doi.org/10.1177/014920630002600305>
- Hair, J., Jr., Black, W. C., Babin, B. J., & Anderson, R. E. (2014). *Multivariate data analysis* (7th ed.). Pearson Education Limited.
- Hakanen, J. J., Schaufeli, W. B., & Ahola, K. (2008). The job demands-resources model: A three-year cross-lagged study of burnout, depression, commitment, and work engagement. *Work and Stress*, *22*(3), 224–241. <https://doi.org/10.1080/02678370802379432>
- Harter, J. K., Schmidt, F. L., & Hayes, T. L. (2002). Business-unit-level relationship between employee satisfaction, employee engagement, and business outcomes: A meta-analysis. *Journal of Applied Psychology*, *87*(2), 268–279.
- Harzer, C. (2020). Fostering character strengths to promote thriving and flourishing in organizations. *Organisationsberatung, Supervision Und Coaching*, *27*(1), 37–50. <https://doi.org/10.1007/s11613-020-00636-w>
- Harzer, C., Bezuglova, N., & Weber, M. (2021). Incremental validity of character strengths as predictors of job performance beyond general mental ability and the big five. *Frontiers in Psychology*, *12*, 518369. <https://doi.org/10.3389/fpsyg.2021.518369>
- Harzer, C., Mubashar, T., & Dubreuil, P. (2017). Character strengths and strength-related person-job fit as predictors of work-related wellbeing, job performance, and workplace deviance. *Wirtschaftspsychologie*, *19*(3), 23–38.
- Harzer, C., & Ruch, W. (2013). The application of signature character strengths and positive experiences at work. *Journal of Happiness Studies*, *14*(3), 965–983. <https://doi.org/10.1007/s10902-012-9364-0>
- Harzer, C., & Ruch, W. (2014). The role of character strengths for task performance, job dedication, interpersonal facilitation, and organizational support. *Human Performance*, *27*(3), 183–205. <https://doi.org/10.1080/08959285.2014.913592>
- Harzer, C., & Ruch, W. (2016). Your strengths are calling: Preliminary results of a web-based strengths intervention to increase calling. *Journal of Happiness Studies*, *17*(6), 2237–2256. <https://doi.org/10.1007/s10902-015-9692-y>

- Hayes, A. F. (2012). PROCESS: A versatile computational tool for observed variable mediation, moderation, and conditional process modeling. [White paper]. <http://www.afhayes.com/public/process2012.pdf>
- Hayes, A. F. (2013). *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*. The Guilford Press.
- Hermida, R. (2015). The problem of allowing correlated errors in structural equation modeling: Concerns and considerations. *Computational Methods in Social Sciences*, 3(1), 5–17.
- Hermida, R., Conjar, E. A., Najab, J. A., Kaplan, S. A., & Cortina, J. M. (2010). *On the Practice of Allowing Correlated Residuals in Structural Equation Models*. Unpublished Manuscript, Department of Psychology, George Mason University, Fairfax, Virginia, United States.
- Hobfoll, S. E., Johnson, R. J., Ennis, N., & Jackson, A. P. (2003). Resource loss, resource gain, and emotional outcomes among inner city women. *Journal of Personality and Social Psychology*, 84(3), 632–643. <https://doi.org/10.1037/0022-3514.84.3.632>
- Hodges, T. D., & Asplund, J. (2010). Strengths development in the workplace. In P. A. Linley, S. Harrington, & N. Garcea (Eds.), *Oxford handbook of positive psychology at work* (pp. 213–220). Oxford University Press.
- Hoge, T., Strecker, C., Hausler, M., Huber, A., & Hofer, S. (2020). Perceived socio-moral climate and the applicability of signature character strengths at work: A study among hospital physicians. *Applied Research in Quality of Life*, 15(2), 463–484. <https://doi.org/10.1007/s11482-018-9697-x>
- Hooper, D., Coughlan, J., & Mullen, M. R. (2008). Structural equation modelling: Guidelines for determining model fit. *Electronic Journal of Business Research Methods*, 6(1), 53–60.
- Hu, L. T., & Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling: A Multidisciplinary Journal*, 6(1), 1–55. <https://doi.org/10.1080/10705519909540118>
- Jaros, S. J., Jermier, J. M., Koehler, J. W., & Sincich, T. (1993). Effects of continuance, affective, and moral commitment on the withdrawal process: An evaluation of eight structural equation models. *Academy of Management Journal*, 36(5), 951–995. <https://doi.org/10.5465/256642>
- Jex, S. M., & Britt, T. W. (2008). *Organizational psychology: A scientist-practitioner approach*. John Wiley & Sons.
- Jordan, M. R., & Rand, D. G. (2018). The role of character strengths in economic decision-making. *Judgment and Decision making*, 13(4), 382–392.
- Keenan, E. M., & Mostert, K. (2013). Perceived organisational support for strengths use: The factorial validity and reliability of a new scale in the banking industry. *SA Journal of Industrial Psychology*, 39(1), 01–12. <https://hdl.handle.net/10520/EJC136765>
- Kim, S. (2005). Individual-level factors and organizational performance in government organizations. *Journal of Public Administration Research and Theory*, 15(2), 245–261. <https://doi.org/10.1093/jopart/mui013>
- Kim, Y., & Ployhart, R. E. (2014). The effects of staffing and training on firm productivity and profit growth before, during, and after the great recession. *Journal of Applied Psychology*, 99(3), 361–389. <https://doi.org/10.1037/a0035408>
- Landis, R., Edwards, B. D., & Cortina, J. (2009). Correlated residuals among items in the estimation of measurement models. In C. E. Lance & R. J. Vandenberg (Eds.), *Statistical and methodological myths and urban legends: Doctrine, verity, and fable in the organizational and social sciences* (pp. 195–214). Routledge.
- Lavy, S., & Littman-Ovadia, H. (2017). My better self: Using strengths at work and work productivity, organizational citizenship behavior, and satisfaction. *Journal of Career Development*, 44(2), 95–109. <https://doi.org/10.1177/0894845316634056>
- Linley, P. A., Garcea, N., Harrington, S., Trenier, E., & Minhas, G. (2011). Organizational applications of positive psychology: Taking stock and a research/practice roadmap for the future. In K. M. Sheldon, K. B. Kashdan, & M. F. Steger (Eds.), *Designing positive psychology: Taking stock and moving forward* (pp. 365–381). Oxford University Press, Inc.
- Maas, C. J., & Hox, J. J. (2005). Sufficient sample sizes for multilevel modeling. *Methodology*, 1(3), 86–92. <https://doi.org/10.1027/1614-2241.1.3.86>
- Mabey, C., & Ramirez, M. (2005). Does management development improve organizational productivity? A six-country analysis of European firms. *The International Journal of Human Resource Management*, 16(7), 1067–1082. <https://doi.org/10.1080/09585190500143931>
- Mahomed, F. E., & Rothmann, S. (2020). Strength use, training and development, thriving, and intention to leave: The mediating effects of psychological need satisfaction. *South Africa Journal of Psychology*, 50(1), 24–38. <https://doi.org/10.1177/0081246319849030>
- Malik, M. E., Ghafoor, M. M., & Naseer, S. (2011). Organizational effectiveness: A case study of telecommunication and banking sector of Pakistan. *Far East Journal of Psychology and Business*, 2(1), 37–48.
- Mazzetti, G., Robledo, E., Vignoli, M., Topa, G., Guglielmi, D., & Schaufeli, W. B. (2021). Work engagement: A meta-analysis using the job demands-resources model. *Psychological Reports*, 126, 1069–1107. <https://doi.org/10.1177/00332941211051988>
- McGivern, M. H., & Tvorik, S. J. (1997). Determinants of organizational performance. *Management Decision*, 35, 417–435.
- McGrath, R. E. (2017). *Technical report: The VIA Assessment Suite for Adults: Development and initial evaluation*. VIA Institute on Character.
- Meyers, M. C., Adams, B. G., Sekaja, L., Buzea, C., Cazan, A. M., Gotea, M., Stefanel, D., & vanWoerkom, M. (2019). Perceived organizational support for the use of Employees' strengths and employee well-being: A cross-country comparison. *Journal of Happiness Studies*, 20(6), 1825–1841. <https://doi.org/10.1007/s10902-018-0026-8>

- Meyers, M. C., Kooij, D., Kroon, B., deReuver, R., & vanWoerkom, M. (2020). Organizational support for strengths use, work engagement, and contextual performance: The moderating role of age. *Applied Research in Quality of Life*, 15(2), 485–502. <https://doi.org/10.1007/s11482-018-9702-4>
- Miglianico, M., Dubreuil, P., Miquelon, P., Bakker, A. B., & Martin-Krumm, C. (2020). Strength use in the workplace: A literature review. *Journal of Happiness Studies*, 21(2), 737–764. <https://doi.org/10.1007/s10902-019-00095-w>
- Mobley, W. H. (1977). Intermediate linkages in the relationship between job satisfaction and employee turnover. *Journal of Applied Psychology*, 62(2), 237–240. <https://doi.org/10.1037/0021-9010.62.2.237>
- Mobley, W. H., Horner, S. O., & Hollingsworth, A. T. (1978). An evaluation of precursors of hospital employee turnover. *Journal of Applied Psychology*, 63(4), 408–414. <https://doi.org/10.1037/0021-9010.63.4.408>
- Motowidlo, S. J. (2003). Job performance. In W. C. Borman, D. R. Ilgen, & R. J. Klimoski (Eds.), *Handbook of psychology: Industrial and organizational psychology* (Vol. 12, pp. 39–53). John Wiley & Sons Inc.
- Muliawan, A. D., Green, P. F., & Robb, D. A. (2009). The turnover intentions of information systems auditors. *International Journal of Accounting Information Systems*, 10(3), 117–136. <https://doi.org/10.1016/j.accinf.2009.03.001>
- Penrose, E., & Penrose, E. T. (2009). *The theory of the growth of the firm*. Oxford University Press.
- Peterson, C., & Seligman, M. E. P. (2004). *Character strengths and virtues: A handbook and classification*. Oxford University Press.
- Peterson, C., Stephens, J. P., Park, N., Lee, F., & Seligman, M. E. P. (2010). Strengths of character and work. In P. A. Linley, S. Harrington, & N. Garcea (Eds.), *Oxford handbook of positive psychology at work* (pp. 221–231). Oxford University Press.
- Ployhart, R. E., & Hale, D., Jr. (2014). The fascinating psychological microfoundations of strategy and competitive advantage. *Annual Review of Organizational Psychology and Organizational Behavior*, 1, 145–172.
- Quintana, S. M., & Maxwell, S. E. (1999). Implications of recent developments in structural equation modeling for counseling psychology. *The Counseling Psychologist*, 27(4), 485–527. <https://doi.org/10.1177/0011000099274002>
- Rahmadani, V. G., Schaufeli, W. B., Stouten, J., Zhang, Z., & Zulkarnain, Z. (2020). Engaging leadership and its implication for work engagement and job outcomes at the individual and team level: A multi-level longitudinal study. *International Journal of Environmental Research and Public Health*, 17(3), 776. <https://doi.org/10.3390/ijerph17030776>
- Saucier, G., Bel-Bahar, T., & Fernandez, C. (2007). What modifies the expression of personality tendencies? Defining basic domains of situation variables. *Journal of Personality*, 75, 479–503. <https://doi.org/10.1111/j.1467-6494.2007.00446.x>
- Schaufeli, W. B., & Bakker, A. B. (2003). *UWES—Utrecht work engagement scale: Test manual*. [Unpublished Manuscript]. Department of Psychology, Utrecht University.
- Schaufeli, W. B., & Bakker, A. B. (2004). Job demands, job resources, and their relationship with burnout and engagement: A multi-sample study. *Journal of Organizational Behavior*, 25(3), 293–315. <https://doi.org/10.1002/job.248>
- Schaufeli, W. B., Salanova, M., González-Romá, V., & Bakker, A. B. (2002). The measurement of engagement and burnout: A two sample confirmatory factor analytic approach. *Journal of Happiness Studies*, 3(1), 71–92. <https://doi.org/10.1023/A:1015630930326>
- Schaufeli, W. B., & Taris, T. W. (2014). A critical review of the job demands-resources model: Implications for improving work and health. In G. F. Bauer & O. Hämmig (Eds.), *Bridging occupational, organizational and public health*. Springer Science+Business Media Dordrecht. https://doi.org/10.1007/978-94-007-5640-3_4
- Schneider, B., Ehrhart, M. G., & Macey, W. H. (2013). Organizational climate and culture. *Annual Review of Psychology*, 64, 361–388. <https://doi.org/10.1146/annurev-psych-113011-143809>
- Seligman, M. E. P. (2002). Positive psychology, positive prevention and positive therapy. In C. R. Snyder & S. J. Lopez (Eds.), *Handbook of positive psychology* (pp. 3–7). Oxford University Press.
- Seligman, M. E. P., & Csikszentmihalyi, M. (2000). Positive psychology: An introduction. *American Psychologist*, 55(1), 5–14. <https://doi.org/10.1037/0003-066X.55.1.5>
- Shaw, J. D., Delery, J. E., Jenkins, G. D., Jr., & Gupta, N. (1998). An organization-level analysis of voluntary and involuntary turnover. *Academy of Management Journal*, 41(5), 511–525. <https://doi.org/10.5465/256939>
- Shukla, S., & Sinha, A. (2013). Employee turnover in banking sector: Empirical evidence. *IOSR Journal of Humanities and Social Science*, 11(5), 57–61.
- Simbula, S. (2010). Daily fluctuations in teachers' well-being: A diary study using the job demands–resources model. *Anxiety, Stress, and Coping*, 23(5), 563–584. <https://doi.org/10.1080/10615801003728273>
- Sirén, C., Patel, P. C., Örtqvist, D., & Wincent, J. (2018). CEO burnout, managerial discretion, and firm performance: The role of CEO locus of control, structural power, and organizational factors. *Long Range Planning*, 51(6), 953–971. <https://doi.org/10.1016/j.lrp.2018.05.002>
- Stander, F. W., & Mostert, K. (2013). Assessing the organisational and individual strengths use and deficit improvement amongst sport coaches. *SA Journal of Industrial Psychology*, 39(2), 1–13.
- Stander, F. W., Mostert, K., & De Beer, L. T. (2014). Organisational and individual strengths use as predictors of engagement and productivity. *Journal of Psychology in Africa*, 24(5), 403–409. <https://doi.org/10.1080/14330237.2014.997007>
- Steel, R. P., & Ovalle, N. K. (1984). A review and meta-analysis of research on the relationship between behavioral intentions and employee turnover. *Journal of Applied Psychology*, 69(4), 673–686. <https://doi.org/10.1037/0021-9010.69.4.673>
- Strecker, C., Huber, A., Höge, T., Hausler, M., & Höfer, S. (2020). Identifying thriving workplaces in hospitals: Work characteristics and the applicability of character strengths at work. *Applied Research in Quality of Life*, 15(2), 437–461. <https://doi.org/10.1007/s11482-018-9693-1>

- Sun, R., & Wang, W. (2017). Transformational leadership, employee turnover intention, and actual voluntary turnover in public organizations. *Public Management Review*, 19(8), 1124–1141. <https://doi.org/10.1080/14719037.2016.1257063>
- Taris, T. W., & Schaufeli, W. B. (2015). The job demands-resources model. In P. K. Smit, & C. H. Hart (Eds.), *The Wiley blackwell handbook of the psychology of occupational safety and workplace health* (pp. 155–180). John Wiley & Sons.
- Ten Berge, M. A., & De Raad, B. (1999). Taxonomies of situations from a trait psychological perspective. A review. *European Journal of Personality*, 13, 337–360. [https://doi.org/10.1002/\(SICI\)1099-0984\(199909/10\)13:5<337::AID-PER363>3.0.CO;2-F](https://doi.org/10.1002/(SICI)1099-0984(199909/10)13:5<337::AID-PER363>3.0.CO;2-F)
- Tett, R. P., & Meyer, J. P. (1993). Job satisfaction, organizational commitment, turnover intention, and turnover: Path analyses based on meta-analytic findings. *Personnel Psychology*, 46(2), 259–293. <https://doi.org/10.1111/j.1744-6570.1993.tb00874.x>
- Thompson, J. W. (1996). Employee attitudes, organizational performance, and qualitative factors underlying success. *Journal of Business and Psychology*, 11(2), 171–196. <https://doi.org/10.1007/BF02193858>
- Torrente, P., Salanova, M., Llorens, S., & Schaufeli, W. B. (2012). Teams make it work: How teamwork engagement mediates between social resources and performance in teams. *Psicothema*, 24(1), 106–112.
- Ulrich, D. (1997). *Human resource champions: The next agenda for adding value to HR practices*. Harvard Business School Press.
- vanBreukelen, W., van derVlist, R., & Steensma, H. (2004). Voluntary employee turnover: Combining variables from the ‘traditional’ turnover literature with the theory of planned behavior. *Journal of Organizational Behavior*, 25(7), 893–914. <https://doi.org/10.1002/job.281>
- vanWoerkom, M., Bakker, A. B., & Nishii, L. H. (2016). Accumulative job demands and support for strength use: Fine-tuning the job demands-resources model using conservation of resources theory. *Journal of Applied Psychology*, 101(1), 141–150. <https://doi.org/10.1037/apl0000033>
- vanWoerkom, M., & Meyers, M. C. (2015). My strengths count! Effects of a strengths-based psychological climate on positive affect and job performance. *Human Resource Management*, 54(1), 81–103. <https://doi.org/10.1002/hrm.21623>
- vanWoerkom, M., Mostert, K., Els, C., Bakker, A. B., De Beer, L., & Rothmann, S., Jr. (2016). Strengths use and deficit correction in organizations: Development and validation of a questionnaire. *European Journal of Work and Organizational Psychology*, 25(6), 960–975. <https://doi.org/10.1080/1359432X.2016.1193010>
- Vleugels, W., Kilroy, S., Vervoort, L., Put, C., & De Witte, H. (2022). The combined influence of occupational stressors and individual lifestyle behaviors on employee stress complaints: Additive or interactive effects? *International Journal of Stress Management*, 29, 372–378. <https://doi.org/10.1037/str0000269>
- Wall, T. D., & Wood, S. J. (2005). The romance of human resource management and business performance, and the case for big science. *Human Relations*, 58(4), 429–462. <https://doi.org/10.1177/0018726705055032>
- Wang, J., vanWoerkom, M., Breevaart, K., Bakker, A. B., & Xu, S. (2023). Strengths-based leadership and employee work engagement: A multi-source study. *Journal of Vocational Behavior*, 142, 103859. <https://doi.org/10.1016/j.jvb.2023.103859>
- Williams, C. R., & Livingstone, L. P. (1994). Another look at the relationship between performance and voluntary turnover. *Academy of Management Journal*, 37(2), 269–298. <https://doi.org/10.5465/256830>
- Xanthopoulou, D., Baker, A. B., Heuven, E., Demerouti, E., & Schaufeli, W. B. (2008). Working in the sky: A diary study on work engagement among flight attendants. *Journal of Occupational Health Psychology*, 13(4), 345–356. <https://doi.org/10.1037/1076-8998.13.4.345>
- Xanthopoulou, D., Bakker, A. B., Demerouti, E., & Schaufeli, W. B. (2007). The role of personal resources in the job demands-resources model. *International Journal of Stress Management*, 14(2), 121–141. <https://doi.org/10.1037/1072-5245.14.2.121>
- Xanthopoulou, D., Bakker, A. B., Demerouti, E., & Schaufeli, W. B. (2009). Work engagement and financial returns: A diary study on the role of job and personal resources. *Journal of Occupational and Organizational Psychology*, 82(1), 183–200. <https://doi.org/10.1348/096317908x285633>

SUPPORTING INFORMATION

Additional supporting information can be found online in the Supporting Information section at the end of this article.

Table S1.

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