



# Perceived Organizational Support for the Use of Employees' Strengths and Employee Well-Being: A Cross-Country Comparison

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## Abstract

Prior research in Western contexts has pointed to the benefits of supporting employees in the use of their personal strengths at work. This manuscript aims to investigate the invariance of the relationship between employees' perceived organizational support for the use of their strengths and their well-being (work engagement, burnout, and satisfaction with life) across countries. To this end, we collected a cross-sectional sample of  $n = 1894$  working individuals from five different countries (Germany, Indonesia, the Netherlands, Romania, and South Africa). The results of multigroup path analysis indicated that the relationships between support for the use of their strengths at work and the three indicators of well-being did not differ across the five countries. Perceived support for the use of strengths displayed a significant positive relationship with work engagement and satisfaction with life and a significant negative relationship with burnout. Consequently, our findings provide initial evidence for the universal benefits of focusing on individual strengths at work.

**Keywords** Cross-country comparison · Employees · Employee well-being · Individual strengths · Use of strengths

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## 1 Introduction

The positive psychology movement (Seligman and Csikszentmihalyi 2000) has provided organizations with novel insights into fostering well-being among employees. One particularly promising positive approach for organizations is the investment in employees' strengths, that is, their natural capacities to achieve excellence in a certain domain (Quinlan et al. 2012). Whereas organizations have traditionally focused mainly on correcting individual deficits by means of feedback, training, and coaching (Buckingham and Clifton 2001), focusing on strengths is a relatively recent approach. It is promising because individuals who are able to play to their strengths are presumed to experience a range of positive emotions (e.g., joy and excitement; Peterson and Seligman 2004; Quinlan et al. 2012), which contribute to their overall health and well-being (Lyubomirsky and Layous 2013). This presumption has been supported by studies showing that using or applying strengths at work is related to diverse indicators of employee well-being (Botha and Mostert 2014; Forest et al. 2012; Harzer and Ruch 2012, 2013). In addition to studies on the use of strengths, there exists literature that investigates organizational support for these strengths. Perceived organizational support for strengths use (POSSU) is defined as the extent to which employees feel actively supported by their organization to employ their unique strengths at work (van Woerkom et al. 2016a). These studies have delivered further evidence that focusing on employee strengths is beneficial in terms of increased employee health and well-being (Botha and Mostert 2014; van Woerkom et al. 2016a; van Woerkom and Meyers 2015).

While the existing research evidence highlights the positive effects of supporting the use of strengths at work, the bulk of the research has been conducted in Western societies, such as Germany (Harzer and Ruch 2013), the Netherlands (van Woerkom et al. 2016a), and Canada (Forest et al. 2012). Studies conducted in less Westernized contexts, such as Botha and Mostert's (2014) study among South African employees, remain an exception. This is problematic because cross-cultural studies have indicated that predictors of employee well-being are culturally dependent (cf., Deci et al. 2001; Hofstede 1983; Huang and Van De Vliert 2003). In particular, we reason that the benefits of support for the use of strengths are culturally dependent because POSSU mostly plays to values that are prevalent in individualistic (e.g., concern for one's own interests) and/or low power distance (e.g., egalitarian values) cultures (cf. Hofstede 1984; Roberts et al. 2016). Based on the existing cross-cultural studies in the area of individual strengths, we already know that there are only minor cross-cultural differences in the prevalence and desirability of strengths such as kindness, gratitude, and fairness (Biswas-Diener 2006; Park et al. 2006), but we do not yet know whether the effects of fostering the use of individual strengths at work are invariant across cultures.

Consequently, the main aim of this study is to explore the relationship between perceived organizational support for the use of strengths and three indicators of employee well-being (life satisfaction, work engagement, and burnout) in a cross-country sample. To achieve this aim, data have been collected in five countries (Germany, Indonesia, the Netherlands, Romania, and South Africa) with differing cultural values, covering countries that are high (e.g., Germany, the Netherlands, South Africa) and low (e.g., Romania, Indonesia) in individualism and are high (e.g., Indonesia) and low (e.g., the Netherlands) in power distance (cf. Taras et al. 2012). To the best of our knowledge, there are no prior cross-country studies on the relationship between POSSU and employee well-being. Insights from such studies are needed to further our theoretical understanding of contextual factors that influence the effectiveness of promoting strengths use at work. From a practical point of view,

this study is relevant because an increasing number of organizations across the globe adopt strengths-based practices without knowing whether these practices are universally effective or not.

### 1.1 Individual Strengths, Support for the Use of Strengths at Work, and Well-being

Individual strengths have been defined as “ways of behaving, thinking or feeling that an individual has a natural capacity for, enjoys doing, and which allow the individual to achieve optimal functioning while they pursue valued outcomes” (Quinlan et al. 2012, p. 1146). In other words, strengths bring about both great pleasure and performance. Organizations that strive to leverage the potential benefits of individual strengths can make use of so-called strengths interventions, training processes that promote the identification, development, and use of strengths (Meyers and van Woerkom 2017; Quinlan et al. 2012). Another possibility is to invest in more holistic, organization-wide approaches that enable employees to use their strengths as much and as often as possible at work (van Woerkom et al. 2016a; van Woerkom and Meyers 2015). Examples of the latter are performance appraisal and development interviews that focus on strengths rather than deficits, leeway to change the way in which tasks are executed or swap tasks with colleagues, and selection based on the fit between an employee’s strengths and the job role. Such holistic approaches become manifest in an employee’s perceptions of organizational support for the use of their strengths, defined as an employee’s belief that the application of personal strengths is actively facilitated and encouraged by the employer (van Woerkom et al. 2016a, p. 142).

POSSU has been conceptualized as a job resource similar to variables such as autonomy and job security because it allows employees to achieve their work goals in a more efficient way and sets individual development processes in motion (Bakker and Demerouti 2007; van Woerkom et al. 2016a). As such, POSSU is supposed to contribute to employee well-being. Well-being entails that individuals are satisfied with their lives overall, as well as with specific life domains (e.g., work) (Diener et al. 1999). To cover overall and work domain-specific well-being, we investigate the following three variables in the present study: satisfaction with life, work engagement, and burnout. Life satisfaction is based on a judgement of whether one’s overall life circumstances meet a self-set standard (Diener et al. 1985). Work engagement is characterized as a positive and fulfilling state of mind that is specific to the work domain and that manifests itself in felt vigor, dedication, and absorption at work (Schaufeli et al. 2002). Finally, burnout is defined as a “prolonged response to chronic emotional and interpersonal stressors on the job” (Maslach et al. 2001, p. 397), characterized by exhaustion, cynicism, and reduced professional efficacy. We study life satisfaction, work engagement, and burnout separately because research evidence shows that different indicators of well-being are typically distinct, albeit moderately correlated (Diener et al. 1999). More specifically, research by Schaufeli et al. (2002) and Hakanen and Schaufeli (2012) demonstrates that work engagement, burnout, and life satisfaction are moderately related to one another but are distinguishable.

The link between POSSU and these different forms of well-being can be explained by the proposition that job resources such as POSSU contribute to the fulfillment of the three basic psychological needs for competence, relatedness, and autonomy (Bakker and Demerouti 2007; Deci and Ryan 1985). In the case of support for the use of strengths, a particularly strong link with the fulfillment of the need for competence can be expected. This results in an internal feeling of worth, which is a powerful driver of optimal human functioning and high well-being (Deci and Ryan 2008). In addition, the literature on positive

psychology classifies using strengths as a positive activity (similar to expressing gratitude and doing a kind deed). Engagement in such activities elicits positive emotions (cf. the positive-activity model by Lyubomirsky and Layous 2013). Therefore, individuals who have the opportunity to draw on their strengths to complete tasks will experience a sense of invigoration, excitement, and pleasure (Peterson and Seligman 2004; Quinlan et al. 2012). Repeated experiences of such positive emotions, in turn, promotes longer-term health and well-being (Lyubomirsky and Layous 2013).

These theoretical assumptions have been supported by studies showing that using or applying strengths at work is related to diverse indicators of well-being, such as work engagement (Botha and Mostert 2014); job satisfaction (Littman-Ovadia and Steger 2010); vitality, life satisfaction, and psychological well-being (Forest et al. 2012); and experiences of pleasure and meaning (Harzer and Ruch 2013). Similarly, it has been found that POSSU helps employees to address multiple work demands (van Woerkom et al. 2016a) and is related to good employee health, well-being, and performance (Botha and Mostert 2014; van Woerkom and Meyers 2015). Building on the theoretical assumptions and empirical evidence, we propose that POSSU is positively related to employee well-being.

**Hypothesis 1a** POSSU is positively related to work engagement and satisfaction with life.

**Hypothesis 1b** POSSU is negatively related to burnout.

## 1.2 Support for the Use of Strengths at Work and Well-Being Across Countries

Prior cross-cultural studies in the area of individual strengths have mainly focused on the existence and desirability of strengths across cultures (Biswas-Diener 2006; Park et al. 2006). Biswas-Diener (2006), for instance, revealed that Americans, Kenyan Maasai, and the Inughuit in northern Greenland displayed and desired very similar character strengths. In line with this finding, Park et al. (2006) provided evidence that the prevalence of character strengths across the U.S. largely corresponded to the prevalence of strengths in 53 other nations. These findings are in line with strengths theory asserting that strengths are prevalent and valued across cultures (Peterson and Seligman 2004). However, the fact that members of different cultural groups possess similar strengths does not necessarily imply that being able to use individual strengths at work is equally desired across cultures and thus equally central to employee well-being. This thought is in line with the work of Roberts et al. (2016) highlighting that strengths-based practices need to be adjusted to fit different cultural contexts.

According to Hofstede (1984), cultural values are defined as the shared mental models that distinguish members of one society from members of other societies. Out of the four cultural value dimensions Hofstede proposed (individualism/collectivism; power distance; uncertainty avoidance; and masculinity/femininity), three can be used to explain why employees from different cultural backgrounds may react differently to POSSU: individualism/collectivism, power distance, and masculinity/femininity.

Individualism is about prioritizing the pursuit of one's own goals and interests over the pursuit of group objectives (Hofstede 1983). With self-interest as a main driver, people will likely value the opportunity to apply their strengths at work because it helps them unlock and realize their full potential (Seligman 2004). Drawing on Aristotle's landmark work *Nicomachean Ethics* and the self-actualization tendency propagated by

Maslow (1954), realizing one's potential can be seen as one of the most basic goals that a person pursues out of self-interest. In line with this view, Hofstede (1983) argues that the idea to fulfill one's obligations towards oneself, that is, to self-actualize, is one of the primary motivators for employees in individualistic countries. Collectivist individuals, by contrast, prioritize the protection of and contribution to the interests of the group(s) they belong to over the protection of own interests, even if collective and own interests are mutually exclusive (Arrindell et al. 1997). In line with this finding, Roberts et al. (2016) report that individuals from collectivistic backgrounds can experience discomfort when faced with strengths-based practices because the emphasis on the self as an independent contributor contradicts their interdependent view of the self. Consequently, a work context that fosters individual strengths may be much more conducive to the well-being of individualists than that of collectivists.

In contrast to individualism, power distance concerns the extent to which social inequalities in terms of wealth, power, and authority are accepted by members of a society (Hofstede 1983; Hofstede and Bond 1984). One central aspect of this cultural dimension is that high power distance cultures respect the fact that the powerful enjoy many privileges, whereas low power distance cultures embrace equal opportunities and rights for everyone (Arrindell et al. 1997). By fostering the idea that everyone—independent of his or her position, status, age, gender, ethnic background, etc.—possesses unique strengths that should be appreciated and used, POSSU is more in line with the egalitarian values of individuals in low power distance cultures than with the elitist values of high power distance individuals. As such, POSSU might play a larger role in promoting well-being among employees in low power distance cultures.

Finally, the masculinity/femininity dimension covers differences in the extent to which 'masculine' qualities, such as ambition, success, assertiveness, and dominance, are valued over 'feminine' qualities, such as sympathy, the ability to relate to others, and a caring attitude (Hofstede 1983; Hofstede and Bond 1984). Considering this cultural dimension, the effects of POSSU on well-being are not entirely straightforward. On the one hand, the emphasis on personal strengths and doing what one does best seems particularly appealing for individuals in masculine cultures because it fuels their striving for achievement and success and creates opportunities for individual performance (Hofstede 1983). Members of feminine societies might feel uncomfortable when individual excellence is stressed given that they attach great value to modesty (Hofstede 1983, 2001). On the other hand, POSSU is also inherently linked to support for and appreciation of all employees, which meets the needs of employees in feminine societies who welcome caring attitudes towards others.

Building on these theoretical arguments, we reason that the effects of POSSU on well-being might be subject to cultural influences. Prior cross-cultural research on predictors of employee well-being supports this reasoning. Deci et al. (2001), for instance, showed that autonomy support displays stronger relationships with need satisfaction and subsequent well-being among US employees than among Bulgarian employees. In addition, Huang and Van De Vliert (2003) examined a 49-country sample and found that intrinsic job characteristics, such as the work itself, perceived autonomy, and recognition, are more strongly related to job satisfaction in countries that score high on individualism and/or low on power distance. As the present research on POSSU is highly explorative and as formulating a clear hypothesis per country is difficult due to varying degrees of different cultural dimensions per country and due to the potential ambiguity of effects in masculine versus feminine societies, we formulate an open research question instead of a directed hypothesis:

**Table 1** Gender, age, educational level, and organizational tenure per country

	South Africa	The Netherlands	Romania	Germany	Indonesia	Total
Sample ( <i>n</i> )	269	504	579	224	319	1894
Gender (% female)	70.1	60.7	62.7	67.4	37	59.5
Age <sup>a</sup>	31.6	37.7	34.8	30.2	31.3	34.02
Educational level (% high) <sup>b</sup>	72	65.7	49.6	45.5	90.6	63.5
Organizational tenure <sup>a</sup>	5.1	9.0	6.0	5.1	7.1	6.7

<sup>a</sup>In years

<sup>b</sup>Percentage of respondents who completed a bachelor degree (or equivalent) at a university/university of applied science or a higher degree

**Research Question 1** Does the effect of POSSU on employee well-being differ across cultures, and, if so, which differences manifest themselves?

## 2 Method

### 2.1 Procedure

The cross-sectional dataset was collected by convenience and snowball sampling. The authors, assisted by graduate students, approached individuals in their surroundings with the request to fill in an online or paper-and-pencil questionnaire.<sup>1</sup> Participants were then asked to further disseminate the questionnaire to people in their circle of acquaintances. The sole requirement for participating in this study was that individuals were holding a job at the moment of participation. All participants were informed that the survey would be conducted confidentially, and they signed an informed consent agreement.

### 2.2 Sample

A sample of  $n=1894$  working individuals from five different countries was collected:  $n=268$  from South Africa,  $n=504$  from the Netherlands,  $n=579$  from Romania,  $n=224$  from Germany, and  $n=319$  from Indonesia. Approximately 59% of respondents ( $n=1126$ ) were female, and their mean age was 34.02 years. The sample was highly educated, with  $n=1202$  participants (63%) who had obtained a bachelor's degree or higher academic title at a university (of applied sciences). Respondents worked in a variety of sectors, with administrative and support services (5.9%), finance and insurance (5.6%), and educational services (5.3%) as the most common sectors. The average organizational tenure of participants was 6.7 years. The demographics for each country can be found in Table 1. To explore whether the countries differed on the demographic variables, we conducted  $\chi^2$  tests for gender [Pearson's  $\chi^2$  (4,  $n=1894$ )=88.23,  $p<.000$ ] and education [Pearson's  $\chi^2$  (8,  $n=1872$ )=422.61,  $p<.000$ ] and one-way analyses of variance (ANOVAs) for age [ $F(4,$

<sup>1</sup> Data from Romania, South Africa, and the Netherlands were gathered by researchers and graduate students who lived and/or worked in the respective countries. Data from Germany and Indonesia were gathered by graduate students in the Netherlands who were nationals of those two countries.

1861) = 29.22,  $p < .000$ ] and tenure [ $F(4, 1555) = 17.82, p < .000$ ], revealing that there were significant country differences for all demographics. To determine whether these demographics influenced our study variables, we subsequently conducted a set of multivariate analyses of variance (MANOVAs). Multivariate results revealed that there were significant mean differences regarding the combined study variables (POSSU, work engagement, burnout, and satisfaction with life) for gender ( $F(4/1518) = 5.86, p < .000$ , Wilks'  $\lambda = .99$ , partial eta-squared = .02), and education ( $F(8/3036) = 4.34, p < .000$ , Wilks'  $\lambda = .98$ , partial eta-squared = .01), but not for age or tenure. Building on these findings, we ran the main analyses with and without controlling for, respectively, gender and education. As the overall results remained unchanged when including the controls, we report below the results without the control variables.

## 2.3 Instruments

In this study, we made use of existing measurement instruments that have displayed good reliability and validity in prior research. The questionnaire was available in five languages: English, Dutch, Romanian, German, and Indonesian. Instruments that were not yet available in languages other than English were translated by two independent translators (native speakers) into the respective language. Subsequently, the two translations were compared and, if different from one another, adjusted in mutual agreement and against the background of conveying the meaning of the original scale. All translated scales were then checked by a focus group of three to four individuals who pointed out potential inconsistencies and difficulties in the readability of items.

### 2.3.1 Perceived Organizational Support for the Use of Strengths

This variable was measured by the 8-item POSSU subscale of the Strength Use and Deficit Correction (SUDCO) questionnaire (van Woerkom et al. 2016b). Respondents rated items such as 'This organization gives me the opportunity to do what I am good at' on a 7-point Likert answer scale from one (1 = almost never) to seven (7 = almost always). A principal component analysis (PCA) indicated that the scale had a clear one-factor structure. The first three eigenvalues were 6.25, .51, and .35 and explained 78%, 6%, and 4% of the variance, respectively. Cronbach's alpha was adequate (.96). Similar results were found when checking the factor structure and reliability for each country subsample (.96; .94; .97; .96; .97 for Germany, Indonesia, the Netherlands, Romania, and South Africa, respectively).

### 2.3.2 Work Engagement

Work engagement was measured with the 9-item version of the Utrecht Work Engagement Scale (UWES; Schaufeli et al. 2006). The 7-point Likert answer scale ranged from one (1 = never) to seven (7 = always). A sample item is 'At work, I feel bursting with energy'. Again, PCA indicated a clear one-factor solution. The first three eigenvalues were 5.58, .96, and .67, explaining 62%, 10%, and 7% of variance, respectively. Reliability analysis resulted in a satisfactory Cronbach's alpha (.92). The Cronbach's alphas for each country were comparable (.92, .91, .94, .91, and .94 for Germany, Indonesia, the Netherlands, Romania, and South Africa, respectively).

### 2.3.3 Burnout

We measured burnout with the 5-item exhaustion subscale of the Utrecht Burnout Scale (UBOS; Schaufeli and van Dierendonck 2000). The scale makes use of the same 7-point Likert answer scale as work engagement, and a sample item is 'I feel mentally drained from my work'. The scale displayed a clear one-factor structure. The first three eigenvalues were 3.66, .48, and .34 and explained 73%, 10%, and 7% of the variance, respectively. Cronbach's alphas for the overall sample (.91) and for subsamples of each country (.83, .87, .88, .90, and .91 for Germany, Indonesia, the Netherlands, Romania, and South Africa, respectively) were adequate.

### 2.3.4 Satisfaction with Life

This variable was measured with the 5-item Satisfaction with Life Scale (SWLS) by Diener et al. (1985). Items such as 'In most ways, my life is close to the ideal' were rated on a 7-point Likert answer scale ranging from one (1=strongly disagree) to seven (7=strongly agree). Similar to the other scales, PCA revealed a clear one-factor structure for the SWLS. The first three eigenvalues were 3.21, .64, and .48, explaining 64%, 13%, and 10% of variance, respectively. Cronbach's alphas for the overall sample (.85) and for country subsamples (.81; .82; .87; .87; .84 for Germany, Indonesia, the Netherlands, Romania, and South Africa, respectively) were adequate.

## 2.4 Statistical Analysis

We conducted multigroup path analysis in AMOS 23 to explore the relationship between POSSU and employee well-being across countries. Before conducting the main analysis, we checked the data for missing responses; assessed measurement invariance at configural, metric, and scalar levels for each scale; and investigated scale mean differences for each country. In the main analysis, we assessed four competing, increasingly restrictive path models: (1) an unconstrained model; (2) a structural weights model that constrains the structural relationships to be the same across countries; (3) a structural covariances model also constraining the variance of POSSU to be equal across countries; and (4) a structural residuals model that additionally constrains the error variances to be equal. We assessed model fit based on Hu and Bentler's (1999) cut-off values of close to .90 for acceptable and .95 for good fit for the comparative fit index (CFI) and Tucker–Lewis index (TLI), and close to .06 for the root mean squared error of approximation (RMSEA). Nested models were compared based on the  $\chi^2$  and CFI difference tests (Cheung and Rensvold 2002). As the commonly used  $\chi^2$  difference test is very sensitive to sample size (Brannick 1995), we used the CFI difference test as a decisive criterion. If the CFI is equal to or smaller than .01, both models fit the data equally well, and the more parsimonious model can be accepted (Cheung and Rensvold 2002).

## 3 Results

### 3.1 Preliminary Analyses

Prior to conducting the main analysis, we deleted all respondents who displayed missing values on one or more entire scale(s) ( $n = 547$ ), resulting in a final data set of  $n = 1894$



respondents. To address the remaining missing values, we used Little's MCAR test to investigate whether data were missing completely at random (Little 1988). The test turned out to be significant ( $\chi^2(483) = 789.39, p < .00$ ). However, as  $\chi^2$  is sensitive to sample size, we also assessed the normed  $\chi^2$  ( $\chi^2/df = 1.63$ ), which, at a value smaller than two, indicates that we can nonetheless assume that data are missing completely at random (Bollen 1989). Consequently, data were imputed using the expectation–maximization algorithm (Dempster et al. 1977).

Next, we assessed measurement invariance for all measures across countries at configural, metric, and scalar levels (Milfont and Fischer 2010; van de Schoot et al. 2012). As the primary model, configural invariance evaluates the general factorial structure of the constructs in the different groups. Here, the model is evaluated only on structure similarity (i.e., whether the theoretical factor structure is similar across groups). Next, metric invariance is tested to evaluate whether factor loadings are similar across groups. Here, factor loadings are constrained to be equal for all groups. In cases where certain factors do not load similarly on the latent factor across groups, these factors may be released, and partial invariance is assumed. When (partial) metric invariance is obtained, one is able to evaluate similarities and differences in correlations and regressions across groups. Finally, scalar invariance is used to evaluate similarities in item intercepts across groups. Here, intercepts are constrained to be the same. Similar to metric invariance, intercepts that are found to differ are released, and partial scalar invariance is assumed. (Partial) scalar invariance is required to compare means across different groups (van de Schoot et al. 2012).

Using fit and comparative indices similar to those of the multigroup path analysis, we obtained full configural and metric invariance for all measures, implying that the overall model structures and factor loadings are invariant across groups (Cheung and Rensvold 2002). Partial scalar invariance was obtained for POSSU with the release of the intercepts of two items and for work engagement with the release of the intercepts of six items across countries. No scalar invariance (full or partial) was obtained for the burnout and satisfaction with life measures (see Table 2), indicating that the scale means cannot be meaningfully compared (Cheung and Rensvold 2002). This finding means that we could tentatively compare and interpret mean differences across groups for the latter scales while more confidently evaluating the relationship between variables using correlations and regression analyses.

Finally, a multivariate analysis of variance (MANOVA) with POSSU, work engagement, burnout, and satisfaction with life as dependent variables revealed that there was a significant, multivariate effect of country ( $F(24/5296.9) = 19.93, p < .000$ , Wilks'  $\lambda = .74$ , partial eta-squared = .07). Univariate analyses specified that the means of POSSU ( $F(4, 1889) = 8.43, p < .000$ ), burnout ( $F(4, 1889) = 120.18, p < .000$ ), work engagement ( $F(4, 1889) = 16.34, p < .000$ ), and satisfaction with life ( $F(4, 1889) = 21.79, p < .000$ ) differed for each country. Bonferroni post hoc tests revealed that Germany had a lower mean of POSSU than all other countries ( $p < .001$ ) except for South Africa; that all countries except for Romania and South Africa and, respectively, Germany and Indonesia differed from one another in their burnout means ( $p < .001$ ); that Germany had a lower work engagement mean score than all other countries ( $p < .001$ ), while Indonesia had a higher score than all other countries ( $p < .001$ ) except for South Africa; and that the Netherlands had a higher mean on satisfaction with life than did all other countries ( $p < .001$ ), while at the same time, Romania had a higher mean than Indonesia ( $p < .001$ ). Table 3 displays means and standard deviations for each country, as well as correlations among the four study variables.

**Table 2** Measurement invariance of measures across countries

	$\chi^2/df$	TLI	CFI	$\Delta CFI$	RMSEA	$\Delta\chi^2$	$\Delta df$	AIC	BCC
<i>POSSU</i>									
Configural invariance model	11.81***	.91	.94	–	.08	–	–	1421.41	1428.23
Metric invariance model	9.93***	.93	.93	.004	.07	89.75**	28	1455.16	1460.39
Scalar invariance model	9.83***	.93	.92	.016	.07	301.33***	32	1692.49	1695.90
Partial scalar invariance model	9.67***	.93	.92	.010	.07	102.03**	8	1606.46	1610.32
<i>Burnout</i>									
Configural invariance model	2.97***	.98	.99	–	.03	–	–	224.13	226.96
Metric invariance model	2.66***	.98	.99	.003	.03	34.71**	16	226.84	229.07
Scalar invariance model <sup>a</sup>	13.05***	.88	.86	.127	.08	687.20***	20	874.05	875.52
<i>Work engagement</i>									
Configural invariance model	6.58***	.92	.94	–	.05	–	–	1112.41	1121.58
Metric invariance model	6.23***	.92	.93	.010	.05	160.16***	32	1208.57	1215.72
Scalar invariance model	9.51***	.88	.87	.065	.07	851.87***	36	1988.44	1993.31
Partial scalar invariance model	6.38***	.92	.93	.007	.05	756.67***	24	1279.77	1286.16
<i>Satisfaction with life</i>									
Configural invariance model	6.39***	.94	.97	–	.05	–	–	309.72	312.55
Metric invariance model	5.18***	.95	.96	.009	.05	52.68***	16	330.41	332.63
Scalar invariance model <sup>a</sup>	9.73***	.90	.88	.083	.07	380.99***	20	671.39	672.86

*POSSU* perceptions of organizational support for strengths use, *TLI* Tucker–Lewis index, *CFI* comparative fit index,  $\Delta CFI$  CFI difference, *RMSEA* root mean square of approximation,  $\Delta\chi^2$   $\chi^2$  difference, *AIC* Akaike information criterion, *BCC* Browne–Cudeck criterion

\* $p < .05$ ; \*\* $p < .01$ ; \*\*\* $p < .001$

<sup>a</sup>Scalar invariance has not been achieved

### 3.2 Main Analyses

Results of the multigroup path analysis are displayed in Table 4.

As the original path model with *POSSU* as a predictor of work engagement, burnout, and satisfaction with life did not achieve an acceptable fit (see Table 4; *Original Model*), we allowed the error variances of work engagement and burnout to covary based on the modification indices. This resulted in a modified unconstrained model with acceptable fit [ $\chi^2(10) = 131.97$ ,  $p < .001$ ; *RMSEA* = .08, *CFI* = .93]. All subsequent model comparisons based on the  $\chi^2$ -difference test are significant, indicating non-invariance across countries. However, as the  $\chi^2$ -difference test is sensitive to sample size, we follow Cheung and Rensvold's (2002) suggestion to compare the nested models based on the CFI difference test. As the difference in CFI between the modified unconstrained (*M1<sup>a</sup>*) and structural weights model (*M2<sup>a</sup>*) is smaller than .01, we can accept *M2<sup>a</sup>* as the most parsimonious model displaying an adequate fit, with  $\chi^2(22) = 159.76$ ,  $p < .001$ ; *RMSEA* = .06, and *CFI* = .92. This finding indicates that we can assume invariance of structural (regression) weights across

**Table 3** Means, standard deviations, and correlations between study variables

	SA	NL	ROM	GER	IND	1.	2.	3.	4.
1. POSSU	4.81 (1.56)	5.05 (1.30)	5.00 (1.39)	4.47 (1.42)	4.97 (1.10)	(.96)			
2. Burnout	3.59 (1.28)	2.28 (.91)	3.69 (1.31)	2.91 (.95)	3.16 (1.04)	-.29**	(.91)		
3. Engagement	4.92 (1.17)	4.80 (1.12)	4.84 (1.11)	4.41 (1.14)	5.17 (.94)	.63**	-.38**	(.92)	
4. SWL	4.91 (1.21)	5.40 (.96)	5.01 (1.11)	4.96 (1.03)	4.75 (1.08)	.33**	-.29**	.35**	(.85)

Cronbach’s alphas for the total sample (in parentheses) can be found on the diagonal

POSSU perceived organizational support for strengths use, SWL satisfaction with life, SA South Africa, NL The Netherlands, ROM Romania, GER Germany, IND Indonesia; Per country, means and standard deviations (in parentheses) are reported

\*\* $p < .01$

**Table 4** Results of the multi-group analysis including fit statistics and model comparisons

Model	$\chi^2$	df	TLI	CFI	$\Delta CFI$	RMSEA	$\Delta \chi^2$	$\Delta df$
<i>Original model</i>								
M1: Unconstrained	396.22	15	.57	.79	–	.12	–	–
M2: Structural weights	423.68	27	.75	.78	.009	.09	27.47**	12
M3: Structural covariance	462.08	31	.77	.76	.019	.09	38.40***	4
M4: Structural residuals	596.58	43	.78	.69	.069	.08	134.49***	12
<i>Modified model<sup>a</sup></i>								
M1 <sup>a</sup> : Unconstrained	131.97	10	.79	.93	–	.08	–	–
M2 <sup>a</sup> : Structural weights	159.76	22	.89	.92	.009	.06	27.79**	12
M3 <sup>a</sup> : Structural covariance	198.16	26	.89	.90	.019	.06	38.40***	4
M4 <sup>a</sup> : Structural residuals	355.41	42	.87	.82	.08	.06	157.24***	16

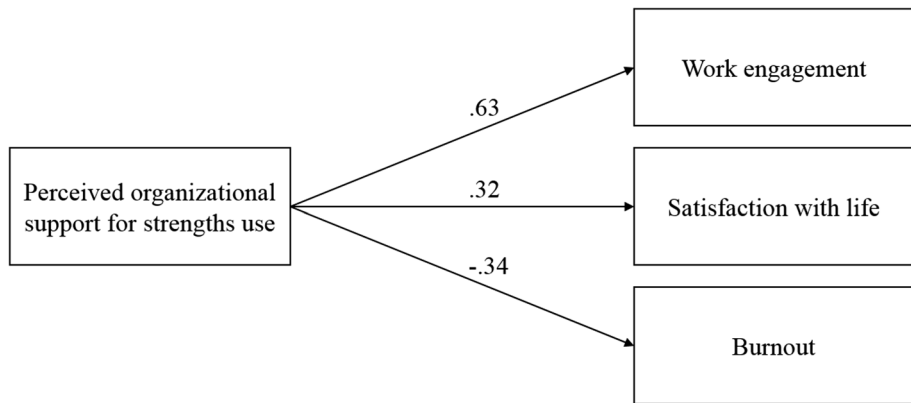
TLI Tucker–Lewis index, CFI comparative fit index, RMSEA root-mean-square error of approximation  $\Delta \chi^2$   $\chi^2$  difference

<sup>a</sup>The modified model allows for the covariation of error variances of work engagement and burnout

countries, meaning that the relationship between POSSU and the three well-being variables does not differ among the countries, which answers Research Question 1. The results indicated that the variance of POSSU and error variances are variant across countries. The average standardized regression weights across groups were  $\beta = .63$  for engagement,  $\beta = .32$  for satisfaction with life,  $\beta = -.34$  for burnout (all regression weights were significant at the  $p < .001$  level; see Fig. 1), thus supporting Hypotheses 1a and 1b.

### 4 Discussion

We conducted a cross-sectional study with respondents from five countries with differing cultural values to investigate whether the positive relationship between being supported to use one’s strengths at work and experiencing well-being differs across countries. Overall, given the significant findings with regard to the relationship between POSSU and all three indicators of well-being, the results of the present study support the idea that support for



**Fig. 1** Average standardized regression weights across all five countries. All regression weights are significant at the  $p < .001$  level

the use of strengths represents a beneficial job resource for employees (Bakker and Demerouti 2007; van Woerkom et al. 2016a). As such, it can potentially trigger a motivational process that fosters engagement and counteracts burnout. Similarly, the encouragement to undertake a positive activity, such as using one's strengths, fosters employee well-being, probably by eliciting positive emotions such as joy, pride, and enthusiasm (Lyubomirsky and Layous 2013). Furthermore, the results of multigroup path analysis show that the positive relationships between POSSU and, respectively, engagement and life satisfaction, as well as the negative relationship between POSSU and burnout, are significant and invariant across the five investigated countries (South Africa, the Netherlands, Romania, Germany, and Indonesia). Based on the data, we cannot assume that either the variance of POSSU or error variances are invariant across countries, but these are seen as overly stringent tests that are only relevant when testing the equivalent reliability of a measure in different groups (Byrne 2004).

Similar to studies that corroborate the universal prevalence of various individual strengths (Biswas-Diener 2006; Park et al. 2006), our findings provide initial evidence for the universal benefits of promoting the use of strengths among employees. Given that the five countries we investigated are located on three continents, encompassing developed countries (Germany, the Netherlands) as well as developing countries (Indonesia, Romania, South Africa), and display considerable differences in predominant cultural values (e.g., Germany (.64) with high masculinity versus the Netherlands (-.91) and Romania (-.54) with low masculinity; the Netherlands (.89) and South Africa (.54) with high individualism versus Indonesia with low (-.58) individualism; and Indonesia (.69) with high power distance versus Germany with low (-.49) power distance (cf. Taras et al. 2012)), we reason that the perception of support for the use of strengths has benefits for employees across a variety of cultural contexts. These findings contrast with those of prior research indicating that predictors of employee well-being, such as autonomy support (Deci et al. 2001) and intrinsic job characteristics (i.e., recognition; Huang and Van De Vliert 2003), are culturally dependent. In light of this finding, uncovering POSSU as a universally beneficial job characteristic is a relevant contribution.

Nonetheless, the findings have yet to be interpreted with some caution for the following three reasons. First, while the countries in our dataset display considerable variance

in different cultural dimensions, there are some countries that display even more extreme values, for instance, Malaysia (1.38) in terms of high power distance and Austria (-1.29) in terms of low power distance; the Philippines (-1.39) in terms of low individualism; and Japan (1.31) in terms of high masculinity and Norway (-1.14) in terms of low masculinity (Taras et al. 2012). It might still be that only highly pronounced cultural values influence the relationship between POSSU and well-being. It might also be that differences in socio-economic characteristics (e.g., national wealth), rather than differences in cultural values, affect the relationship between job characteristics and well-being (Huang and Van De Vliert 2003). It has been argued that employees in poor countries highly value job characteristics that help secure their living (e.g., salary) but do not attach importance to job characteristics that contribute to the fulfillment of other needs (e.g., the need for self-esteem or self-actualization) (Huang and Van De Vliert 2003). While the countries that we have studied display large differences in national wealth, with gross national incomes (GNI) per capita ranging from 3.400\$ in Indonesia to 46.610\$ in the Netherlands (World-Bank 2016), none of the countries is officially classified as a low-income economy (GNI per capita < 1.025\$). It is possible that the need for securing a living will only trump other needs in countries with extremely low income levels. Based on our data, we cannot exclude the possibility that the relationship between POSSU and well-being is weakened in low-income economies.

A second note of caution relates to the idea that cultural differences will not necessarily manifest at the (cultural) group level, but they might be an individual-level phenomenon. In line with the suggestion that the cultural heritage of a society has an enduring and shared impact on all members of that particular society (Inglehart and Baker 2000), we chose the cultural group as the focus of our investigation. Nonetheless, empirical evidence points out that there is not only between- but also within-country variation in cultural values (for a review, see: Kirkman et al. 2006). While we do not have the opportunity to account for individual-level variation in cultural values in the present dataset, we recognize that individually held cultural values are of importance and strongly encourage future research that explores the moderating role of individual instead of societal cultural values. Individual-level power distance, for instance, is worth investigating because high power-distance individuals maintain more depersonalized relationships with their superiors and depend less on being supported by them (Farh et al. 2007). Ideally, future research in this domain should rely on multilevel studies that can take between- and within-country variation in values into account (Kirkman et al. 2006).

A final note of caution when interpreting our findings is that almost two-thirds of our respondents are highly educated. This value is uncommonly high and not even representative of developed countries such as the Netherlands, where approximately 28% of the population is highly educated (CBS 2013). This factor may have affected our findings because highly educated workers are often attracted to work for particular types of successful, large, and often multinational organizations. Against the backdrop of steadily advancing economic globalization, such organizations across the globe develop increasingly similar values and norms and confer them upon their workers. This process implies that there could be little overall between-person variation in cultural values in our dataset, and it may explain why we did not find cross-country differences in this study. It is also important to note that highly educated, white-collar workers might be most likely to benefit from support for the use of strengths (Harzer and Ruch 2013). Given that low-educated, blue-collar workers often have simple, repetitive jobs that must be executed in compliance with strict guidelines and timing, they might not have abundant opportunities to use their strengths at work. In contrast to highly skilled workers who often have a large amount of control over

how they execute tasks, blue-collar workers may have little leeway to make changes to their jobs to achieve a better fit with their strengths.

Overall, while our findings do not indicate any cross-country differences in the relationship between POSSU and employee well-being, we acknowledge that differences in individual cultural values might still alter the strength of this relationship. In addition, following the request to explore what works for whom under which circumstances in organizational research (Nielsen and Miraglia 2017), we suggest that looking into other individual-level factors that might moderate this relationship is useful. In line with research on perceived organizational support (Armeli et al. 1998), we suggest the investigation of individual socioemotional needs (e.g., needs for esteem and approval) as potential moderators. Having access to job resources, such as POS and POSSU, that can potentially fulfill socioemotional needs will be more beneficial if the respective need is high (Armeli et al. 1998). Moreover, we propose that extraversion is a plausible moderator. While low-extraversion individuals who perceive support for their strengths may not take any initiative to actually apply their strengths at work, extraverted individuals are likely to change the way in which they do their job due to their assertive, active, and sociable nature (cf. Ghielen et al. 2017). As such, they are more likely to benefit from POSSU than introverted individuals.

#### 4.1 Limitations and Future Research

This research is subject to three main limitations. First, due to the cross-sectional nature of our data, we cannot draw definite conclusions about cause-and-effect relationships. However, the temporal precedence, which is a necessary condition to establish causality, of (support for) the use of strengths in relation to health and well-being has already been established elsewhere (Wood et al. 2011). Given that our main aim was to explore the cross-country invariance of the relationship between POSSU and well-being, the use of cross-sectional data seems appropriate as a first step. Second, the five countries from which samples were obtained are not entirely comparable in terms of their demographic composition, which can potentially affect our results. However, in an attempt to determine whether and to what extent the demographic variables exert an influence on the four study variables, we found that the demographics only accounted for marginal proportions of variance in POSSU, work engagement, burnout, and satisfaction with life. Third, as has been mentioned already, we did not take individual-level perceptions of cultural values into account, even though there might be within-country differences in experiences of cultural values.

Consequently, we encourage future research using multilevel frameworks to explore whether and to what extent cultural values at the individual or societal level affect the relationship between POSSU or other positively toned practices and relevant work-related outcomes. Similarly, we consider the in-depth exploration of individual factors (e.g., educational level) or contextual factors (e.g., job autonomy) that might alter the relationship between POSSU and well-being as a fruitful avenue for future research.

#### 4.2 Practical Implications

Based on the findings of the present study, we can encourage managers or other organizational decision makers in different cultural contexts to implement strengths-based approaches and to offer customized support for the use of strengths within their organization. Employees' perceptions of support for the use of strengths can be enhanced by several means. First, employers can encourage their employees to identify their strengths

by means of tools such as the VIA character strengths questionnaire (Peterson and Seligman 2004). Second, employers can foster the use of strengths by granting employees sufficient autonomy to make small changes in their tasks or the execution thereof and by communicating openly that the use of strengths is highly valued. The feedback system should consolidate this message and should ideally be more reflective of employee strengths and the use thereof than of employee deficiencies (Bouskila-Yam and Kluger 2011). Fourth, especially for employees who lack the self-confidence to proactively apply their strengths at work, brief training interventions in which employees are supported in the process of identifying, using, and developing their strengths can serve as an additional tool (Meyers and van Woerkom 2017). Finally, it is advisable to incite (line-) managers to emphasize the value of individual strengths because managers convey organizational norms through their own behavior (van Woerkom et al. 2016a). These combined efforts to promote the use of individual strengths at work are likely to increase the general and work-related well-being of employees and, due to the mitigating effects on burnout, can also contribute to the prevention of mental illness among employees.

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