

Servant leadership and work-related well-being in a construction company



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Orientation: High levels of work-related well-being are imperative to ensure financial stability, competitiveness and sustainability in the construction industry. Leadership plays a fundamental role to enhance work engagement and to decrease burnout. The interrelationships between servant leadership, job demands, job resources, work engagement and burnout are still unknown, especially within the construction industry.

Research purpose: The aim of this study was to explore the interrelationships between servant leadership, job demands, job resources, work engagement and burnout in a construction company.

Motivation for the study: The construction industry is a highly demanding and labour intensive industry, which makes it difficult to sustain high work engagement and low burnout. This industry therefore calls for a people-orientated leadership approach, such as servant leadership, to enhance job resources to ultimately increase work engagement and to decrease burnout levels.

Research design, approach and method: A quantitative research design was applied and four quantitative surveys were used to collect data. Two hundred and twenty-four sets of questionnaires were completed by employees in a South African construction company.

Main findings: The results indicated that job resources mediated a positive relationship between servant leadership and work engagement and a negative relationship between servant leadership and burnout. Servant leadership had a positive significant relationship with job resources and significantly explained a proportion of the variance in job resources. Job resources, in turn, significantly explained a proportion of increase in work engagement levels and a proportion of reduction in burnout levels. An insignificant relationship was found between job demands and servant leadership.

Practical or managerial implications: The findings showed that servant leadership could be used as an effective leadership approach to enhance work engagement and to decrease burnout in the construction industry.

Contribution or value-add: This study makes a theoretical contribution to the body of knowledge on servant leadership and work-related well-being by providing empirical evidence on the interrelationships between servant leadership, job demands, job resources, work engagement and burnout.

Introduction

Work-related well-being is instrumental to ensure operational performance in the construction industry. This industry is characterised by high job demands, long working hours, dangerous working environments, low flexibility, isolated work locations, and stringent safety, health and environment regulations (Lingard, 2003; Lingard & Sublet, 2002). Additional challenges in this industry include labour unrests, skills shortages (SAFCEC, 2014), talent retention issues and project execution problems (Naidoo et al., 2015). These working conditions and challenges could make it difficult to sustain high levels of work engagement in this industry and may enhance the risk of burnout, disengagement and ill health as it places more demands on employees. It is therefore imperative for construction companies to maintain high levels of work-related well-being to ensure financial stability, competitiveness and sustainability.

Work-related well-being focuses primarily on the employee's well-being state while working. The job demands resources theory describes two work-related well-being processes, namely a health impairment process and a motivational process (Bakker, Demerouti & Sanz-Vergel, 2014). The health impairment process is activated by high job demands combined with inadequate job resources that consequently result in a negative employee state called burnout (Bakker &

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Demerouti, 2007). Burnout is generally defined as an individual state of low energy (exhaustion), motivation (cynicism) and lack of perceived competence (professional efficacy) (Schaufeli & Bakker, 2004). Burnout is associated with several non-communicable diseases, for instance, depression, diabetes, hypertension and irritable bowel syndrome (De Beer, Pienaar, & Rothmann, 2016). In the motivational process, adequate job resources buffer the negative effects of challenging job demands, which cause a positive employee state, namely work engagement (Bakker & Demerouti, 2007). Work engagement is an individual state characterised by high energy (vigour), motivation (dedication) and focus (absorption) (Bakker, 2011). Work engagement showed to produce positive employee and organisational outcomes such as higher employee commitment (Field & Buitendach, 2012), organisational citizenship behaviour (Saks, 2006), customer satisfaction, productivity, profitability and safety behaviour (Harter, Schmidt, & Hayes, 2002).

Low work engagement and ill health (because of stress and burnout) are, however, global problems. For example, research showed that only 13% of employees worldwide are highly engaged in their work and that 26% are actively disengaged (Gallup, 2013). In South Africa, the percentage of actively engaged employees is even lower at 9% (Gallup, 2013). In terms of ill health, non-communicable diseases such as cardiovascular diseases, cancers, chronic respiratory diseases and diabetes are responsible for approximately 70% of deaths globally and are highlighted as a leading cause of deaths worldwide (World Health Organization, 2015). These diseases do not only affect individual lives but also have a negative economic impact on society and organisational performance. For instance, the World Health Organization (2014) estimated that non-communicable diseases would cost low- and middle-income countries approximately US\$ 7 trillion over the next 10 years – 14 years. Employee well-being has become imperative to sustain operational and financial performance in organisations.

Leadership plays a fundamental role in sustaining optimum work-related well-being, because leaders can influence the job demands and job resources of employees. Servant leadership might be an effective leadership approach to enhance work engagement and to decrease burnout in the construction industry. Servant leadership is a unique and comprehensive leadership theory in which the leader serves, empowers and supports employees to achieve meaningful outcomes to the benefit of the individual, the organisation and the community (Van Dierendonck, 2011). There seems to be good theoretical alignment between servant leadership and several job resources as per the job demands–resources theory. For example, servant leadership is characterised by authenticity (Laub, 1999), humility (Page & Wong, 2000), accountability, empowerment, courage, forgiveness, standing back (Van Dierendonck & Nuijten, 2011) and stewardship (Barbuto & Wheeler, 2006). This aligns well with job resources such as organisational support, growth opportunities, relationship with colleagues, autonomy (control) and rewards. The primary focus of servant leaders is to serve,

empower and support employees (Greenleaf, 1998). This could make servant leaders more attentive to provide the necessary job resources to buffer the negative effects of high job demands and challenging working conditions in the construction industry.

Limited research is, however, available on the relationship between servant leadership and the constructs of the job demands–resources theory, namely job demands, job resources, work engagement and burnout. The interrelationships between servant leadership, job demands, job resources, work engagement and burnout are still unknown.

Research purpose and objectives

The general aim of this study was to investigate the interrelationships between servant leadership, job demands, job resources, work engagement and burnout in a construction company. The specific objectives of this study were to explore the relationships between servant leadership and (1) work engagement, (2) burnout, (3) job demands and (4) job resources as well as the (5) interrelationships between these variables in a construction company.

Literature review

The relationship between servant leadership and the job demands and job resources of followers

Specific research on the relationships between servant leadership and job demands or job resources is still in need. The dimensions of servant leadership seem to align well with several job resources. Firstly, servant leaders set a compelling vision (Dennis & Bocarnea, 2005) and align individual talent with the requirements of the position (Barbuto & Wheeler, 2006). This could enhance organisational resources such as person–job fit and strategic alignment. Thereafter, servant leaders continuously develop and empower employees to activate individual talent (Van Dierendonck, 2011). This will provide the employee with the job resources of development, talent activation and career path opportunities. Servant leaders furthermore focus on serving the physical, psychological, emotional and spiritual needs of employees (Sendjaya, 2015). This could provide employees with (a) the physical resources required to complete a task; (b) the social resources to feel safe, a sense of belonging and valued; and (c) the spiritual resources to find meaning and fulfilment in work. Servant leaders, in addition, strive to build trustful relationships with their followers (Ehrhart, 2004) and empower employees to become autonomous (Van Dierendonck & Nuijten, 2011). This might enhance leadership trust and supervisory support and provide autonomy to individuals to control their jobs. High levels of integrity and ethical conduct are also part of servant leadership (Liden, Wayne, Zhao & Henderson 2008; Page & Wong, 2000) that can enhance organisational resources such as organisational justice and fair remuneration. Lastly, servant leaders apply good listening and reflection skills (Spears, 2010) that could enhance communication as a job resource to followers.

In terms of job demands, servant leadership characteristics such as compassion, listening, empowerment, accountability and forgiveness could lessen high job demands. For example, servant leaders will actively listen (Spears, 2010) to employees when they experience job overload and apply the required compassion (Van Dierendonck & Patterson, 2014) by helping employees to cope with high job demands. Servant leaders will also empower employees (Page & Wong, 2000) before they transfer accountability to them (Van Dierendonck & Nuijten, 2011). In other words, a servant leader will ensure an employee is adequately trained before he or she is put into a position. This could reduce the level of job demands employees experience when they start a new position or when they accept new responsibilities in a current position. Another servant leadership characteristic that could reduce job demands is forgiveness (Van Dierendonck & Nuijten, 2011). Employees may experience less emotional load when leaders forgive past mistakes without holding any grudges. In general, servant leaders serve the needs of employees (Sendjaya, 2015), which could include the provision of adequate job resources. Adequate job resources will ultimately counteract the negative effects of high job demands (Bakker & Demerouti, 2007).

Although servant leadership seems to correlate well with job resources theoretically, empirical evidence on these relationships is still in need (De Sousa & Van Dierendonck, 2014). The direct influence of servant leadership on job demands has also not yet been explored empirically. This study aimed to address these research needs.

The following hypotheses emerged from the above literature review:

H1: A positive significant relationship exists between servant leadership and the job resources of followers.

H2: A negative significant relationship exists between servant leadership and job demands (overload) of followers.

The relationship between servant leadership and the work engagement of followers

Limited research is available on the relationship between servant leadership and work engagement. Available studies indicated a positive relationship between servant leadership and work engagement (Carter & Baghurst, 2013; De Clercq, Bouckenooghe, Raja, & Matsyborska, 2014) and a negative relationship between servant leadership and disengagement (Hunter et al., 2013). In one study, goal congruence mediated the relationship between servant leadership and work engagement (De Clercq et al., 2014), and in another study, this relationship was mediated by organisational identification and psychological empowerment (De Sousa & Van Dierendonck, 2014).

Several studies found significant relationships between work engagement and other leadership styles similar to servant leadership. For example, previous studies showed a positive relationship between work engagement and *transformational leadership* (Bezuidenhout & Schultz, 2013; Kopperud,

Martinsen, & Humborstad, 2014), *authentic leadership* (Alok & Israel, 2012; Penger & Cerne, 2014), *leader-member exchange* (Breevaart, Bakker, Demerouti, & Van Den Heuvel, 2015), *charismatic leadership* (Babcock-Roberson & Strickland, 2010), *empowering leadership* (Albrecht & Andreetta, 2011; Mendes & Stander, 2011; Tuckey, Bakker, & Dollard, 2012) and *engaging leadership* (Schaufeli, 2015). Although servant leadership shares similarities with all these leadership theories, it is much more comprehensive and includes additional leadership dimensions that could be beneficial to enhance work engagement. Servant leadership is also different in the sense that it (1) focuses primarily on people and secondarily on results (Chatury, 2008; Sendjaya, 2015); (2) uses servanthood to enhance performance (Blanchard & Hodges, 2008); and (3) aims to serve multiple stakeholders such as employees, organisations, shareholders and the society (Peterson, Galvin & Lange, 2012). Because of its nature to serve the needs of employees first, servant leadership might offer the required job resources to employees that would ultimately enhance work engagement.

The following hypotheses are thus proposed:

H3: A positive significant relationship exists between servant leadership and the work engagement of followers.

H4: Job resources mediate the relationship between servant leadership and the work engagement of followers.

The relationship between servant leadership and the burnout of followers

Research on the relationship between servant leadership and burnout is still in need. A few studies indicated a negative correlation. For instance, Babakus, Yavas and Ashill, (2011) showed that servant leadership influences burnout negatively and that person-job fit mediates this relationship. Other studies reported a negative relationship between servant leadership and two of the dimensions of burnout, namely cynicism (Bobbio, Van Dierendonck, & Manganelli, 2012) and emotional exhaustion (Tang, Kwan, Zhang, & Zhu, 2016).

Other leadership theories that share common characteristics with servant leadership also correlated negatively with burnout. Hetland, Sandal and Johnsen (2007), for instance, reported that transformational leadership correlated negatively with cynicism and exhaustion and positively with professional efficacy. Other studies found similar results (Salem, 2015; Zopiatis & Constanti, 2010). Authentic leadership was negatively related to both emotional exhaustion and cynicism (Laschinger & Fida, 2014; Laschinger, Wong, & Grau, 2012). In one study, empowerment mediated the relationship between authentic leadership and burnout (Laschinger et al., 2012). In another study, authentic leadership improved work-life areas which enhanced occupational coping and self-efficacy that ultimately decreased burnout (Laschinger, Borgogni, Consiglio, & Read, 2015). Schaufeli (2015) also reported a negative relationship between engaging leadership and burnout that was mediated by job demands and job resources.

Although servant leadership shares similar characteristics with transformational leadership, authentic leadership and engaging leadership, it is more comprehensive. It includes additional dimensions of leadership that are missing from the aforementioned leadership theories. Hence, servant leadership could be a viable leadership theory to reduce burnout either directly or indirectly.

The following hypotheses were proposed:

H5: A negative significant relationship exists between servant leadership and the burnout of followers.

H6: Job demands (overload) mediate a negative relationship between servant leadership and the burnout of followers.

H7: Job resources mediate a negative relationship between servant leadership and the burnout of followers.

Research design

Research approach

A quantitative research design was used to test seven hypotheses. Four surveys were used to collect quantitative data. Descriptive and inferential statistical methods were used to analyse the data.

Research method

Research participants

A non-probability sample of 186 employees was drawn from a construction company in South Africa, which completed 224 sets of surveys (with a 6-month interval). The respondents (186 direct reports) completed a set of four surveys, both before and after their managers attended a leadership development programme. The respondents evaluated their manager's servant leadership behaviour and their own levels of work engagement, burnout, job demands and job resources before and after the intervention. In total, 224 sets of pre- and post-test surveys were completed by direct reports. Some respondents only completed one set of surveys (either before or after the intervention) because of restructuring in the organisation. The data of managers were not used in this study.

The majority of the sample consisted of men (81%) with Afrikaans (35%) or English (27%) as their home language and between the ages of 26 and 35 years (38%). The sample consisted of 53% white employees, 38% black employees, 4% Indian employees and 5% mixed race employees. 1% of the sample was from other race types. Most of the participants had a Grade 12 qualification (32%), worked for the company for between 3 years and 5 years (39%) and were in middle management positions (25%).

Measuring instruments

Data were collected using four surveys, namely, the Servant Leadership Survey (SLS), the Utrecht Work Engagement Scale (UWES), the Maslach Burnout Inventory (MBI) and the Job Demands Resources Scale (JDERS).

The SLS measures eight characteristics related to servant leadership, namely: (1) standing back, (2) forgiveness, (3) courage, (4) empowerment, (5) accountability, (6) authenticity, (7) humility and (8) stewardship (Van Dierendonck & Nuijten, 2011). The questionnaire uses a six-point Likert type response scale and consists of 30 items. A validation study of Van Dierendonck and Nuijten (2011) found acceptable reliability scores for the sub-scales: standing back ($\alpha = 0.76$), forgiveness ($\alpha = 0.72$), courage ($\alpha = 0.69$), empowerment ($\alpha = 0.89$), accountability ($\alpha = 0.81$), authenticity ($\alpha = 0.82$), humility ($\alpha = 0.91$), and stewardship ($\alpha = 0.74$). Another study showed Cronbach's alpha coefficients of 0.92 for empowerment, 0.74 for accountability, 0.79 for stewardship, 0.94 for humility, 0.71 for standing back, 0.71 for forgiveness, 0.75 for courage and 0.79 for authenticity (De Sousa & Van Dierendonck, 2014).

The UWES measures levels of work engagement and consists of 17 items (Schaufeli & Bakker, 2003). A seven-point Likert type scale is used in this survey. Schaufeli, Salanova, Gonzalez-Roma and Bakker (2002) found the following internal consistency scores for the three sub-scales of work engagement: vigour ($\alpha = 0.80$), dedication ($\alpha = 0.91$) and absorption ($\alpha = 0.75$).

The MBI of Maslach and Jackson (1981) measures burnout experiences. It consists of 22 items and uses a six-point Likert type response scale. Schaufeli et al. (2002) found good reliability scores (Cronbach's alpha coefficients) for the sub-scales: exhaustion ($\alpha = 0.85$), personal accomplishment ($\alpha = 0.84$) and depersonalisation ($\alpha = 0.73$).

The JDERS was developed by Jackson and Rothmann (2005) and measures job demands and job resources. It consists of 43 items and measures seven latent variables, namely: (1) organisational support, (2) growth opportunities, (3) overload, (4) job insecurity, (5) relationship with colleagues, (6) control and (7) rewards. The instrument uses a four-point Likert type scale. Jackson and Rothmann (2005) reported good reliability in terms of internal consistency (Cronbach's alpha coefficients): 0.88 for organisational support, 0.80 for growth opportunities, 0.75 for overload, 0.90 for job insecurity, 0.76 for relationship with colleagues, 0.71 for control and 0.78 for rewards. In this study, five variables were used, namely organisational support, growth opportunities, overload, relationship with colleagues and control. Thirty-three items were used in total.

Research procedure

Surveys were distributed to the participants via an electronic survey platform, namely Survey Monkey. Participants were asked to complete four surveys on two occasions (6 months apart). The purpose of the study as well as confidentiality, voluntary participation and anonymity was explained. After completion, the data were cleaned and prepared for statistical analysis. Various statistical methods were used to analyse the data.

Statistical analysis

Descriptive statistical methods such as mean, median, standard deviation (SD), skewness and kurtosis were used to evaluate

the central tendency, dispersion and distribution of the data (Collis & Hussey, 2009). In addition, the Shapiro–Wilk and Kolmogorov–Smirnov normality tests were used to determine normality (Pallant, 2010). The SPSS statistical software (version 24) was utilised to conduct the descriptive analysis.

Various inferential statistical methods were applied to analyse the data and to test the hypotheses. Spearman's correlation was used to evaluate the linear association between variables (Collis & Hussey, 2009). The reason for using Spearman's correlation was that the descriptive statistical results indicated a non-normal distribution. Practical significance for correlations were accepted at a medium effect when r was between 0.30 and 0.49 or at a large effect when r was above 0.49 (Collis & Hussey, 2009). The SPSS (version 24) statistical software was used to compute the correlation analysis.

Principal component analysis was conducted to determine the number of factors in each measuring instrument. This was done individually for the SLS, the UWES, the MBI and the Job Demands–Resources Scale (JDERS). A promax rotation method was used, and items were retained if the primary loading was higher than 0.50, and also when a secondary loading was smaller than 0.20, in case an item cross-loaded on more than one factor (Matsunaga, 2010). The SPSS (version 24) statistical software was also used to compute the principal component analysis.

Confirmatory factor analysis was applied to determine the factor loadings of the four questionnaires and to evaluate several measurement models (Hox & Bechger, 1998). Structural equation modelling was used to examine how the data fitted various structural models and to test the research model. Absolute and incremental fit indices were used to determine model fit such as chi-square (χ^2), root mean square error of approximation (RMSEA), standardised root mean square residual (SRMR), Comparative Fit Index (CFI) and the Non-Normed Fit Index (NNFI) also known as the Tucker Lewis Index (TLI). A maximum likelihood estimator that estimates with standard errors and a mean-adjusted chi-square test statistic (MLM), also known as the Satorra–Bentler chi-square, was chosen because the data were not normally distributed. This estimator is robust enough to use with non-normal data (Muthén & Muthén, 2010) and is seen as a great method to accommodate non-normality (Hox & Bechger, 1998). The statistical software, Mplus (Muthén & Muthén, 2015), was utilised to conduct the confirmatory factor analysis and structural equation modelling.

The following combinations of fit criteria were used during the confirmatory factor analysis and structural equation modelling analysis phases to determine acceptable model fit (Hooper, Coughlan & Mullen, 2008; Hu & Bentler, 1999):

- Insignificant chi-square ($p > 0.05$)
- $CFI \geq 0.95$ and $SRMR \leq 0.09$ (and or $WLSMV < 1$)
- $TLI \geq 0.95$ and $SRMR \leq 0.09$ (and or $WLSMV < 1$)
- $RMSEA < 0.08$ and $SRMR \leq 0.09$ (and or $WLSMV < 1$).

The measurement or structural model was accepted when one or more of the above-mentioned combinations were evident.

Reliability was evaluated by means of computing omega coefficients. Various researchers suggest that the McDonald's omega coefficient is a better method to evaluate reliability, especially when using confirmatory factor analysis or structural equation modelling (Revelle & Zinbarg, 2009; Sijtsma, 2009; Zinbarg, Yovel, Revelle, & McDonald, 2006). The lavaan package of RStudio (Rosseel, 2012) was used to compute omega coefficients.

Ethical consideration

Permission was obtained from the General Manager of Human Resources to conduct the research study within the company.

Results

In general, the descriptive statistical outputs indicated that the data were not normally distributed. The Shapiro–Wilk and Kolmogorov–Smirnov normality tests were significant at the $p < 0.05$ level which indicated that the distribution of the scores were not normal (Pallant, 2010). A summary of the descriptive statistical results is provided in Table 1.

The Spearman's correlation analysis indicated a positive significant correlation between job resources and work engagement ($r = 0.59$) and between servant leadership and job resources ($r = 0.58$). Negative significant correlations were also found between work engagement and burnout ($r = -0.43$) and between job resources and burnout ($r = -0.44$). The results also showed a positive significant correlation between servant leadership and work engagement ($r = 0.47$). These

TABLE 1: Descriptive statistics for work engagement, burnout, overload, job resources and servant leadership.

Scale	Mean	Median	SD	Skewness	Kurtosis
Work engagement	78.84	80.00	12.57	-0.55	-0.16
Vigour	27.76	29.00	5.10	-0.50	-0.34
Dedication	24.33	25.00	4.77	-0.70	-0.43
Absorption	26.65	27.00	4.71	-0.34	-0.31
Burnout	52.00	50.00	15.81	0.32	-0.70
Emotional exhaustion	21.41	19.50	9.78	0.68	-0.30
Depersonalisation	9.79	9.00	4.55	0.82	-0.00
Personal accomplishment	20.84	20.00	7.54	0.50	-0.36
Overload	25.69	26.00	2.66	-0.71	0.77
Job resources	81.96	84.00	11.97	-0.85	0.45
Organisational support	58.74	61.00	9.14	-0.81	0.08
Growth opportunities	23.17	23.00	3.45	-0.87	1.05
Servant leadership	132.93	135.00	20.60	-0.92	1.92
Empowerment	33.04	34.00	6.60	-1.10	1.62
Standing back	12.74	13.00	3.15	-0.43	-0.14
Accountability	15.00	15.00	2.29	-1.17	2.13
Forgiveness	11.39	11.00	3.32	-0.15	-0.19
Courage	7.58	8.00	2.50	-0.29	-0.44
Authenticity	16.70	17.00	3.51	-0.51	0.71
Humility	21.96	23.00	4.34	-0.82	1.00
Stewardship	14.52	15.00	2.66	-1.18	2.13

Note: All decimals were rounded to two places.

correlations were significant at the $p < 0.01$ level. Correlation results are depicted in Table 2.

Confirmatory factor analysis was done on four measurement models. The first measurement model (Model 1) included all variables and items as per the principal component analysis. This model consisted of five latent variables, namely burnout, work engagement (defined by vigour, dedication and absorption), job resources (consisting of organisational support, supervisor support, job clarity and colleague support), overload and servant leadership (defined by empowerment, humility, accountability, forgiveness and courage). The second measurement model (Model 2) consisted of four latent variables. In this model, absorption and forgiveness were removed, because of factor loadings lower than 0.40. Courage was also removed, because it showed to be insignificant. Work engagement consisted of vigour and dedication. Job resources consisted of organisational support, supervisor support, job clarity and colleague support. Servant leadership consisted of empowerment, humility and accountability. Burnout was used as a general factor and overload was included. The third measurement model (Model 3) used both work engagement and burnout as general factors. In this model, overload was removed because it showed to be insignificant, and four additional items were removed because they had lower factor loadings than the rest. The fourth measurement model (Model 4) also used work engagement and burnout as general factors, but excluded the vigour items of work engagement, because these showed much lower factor loadings than the rest. Colleague support and accountability were also removed because of lower factor loadings. Four problematic items were in addition removed. This model consisted of four latent variables, namely burnout, work engagement, job resources (consisting of organisational support, supervisory support and job clarity) and servant leadership, which consisted of empowerment and humility. The results indicated that Model 4 fit the data the best, with acceptable incremental fit indices of CFI = 0.966, TLI = 0.959, RMSEA = 0.040, SMRM = 0.051 and WRMR = 0.973. The goodness-of-fit indices of the four measurement models are presented in Table 3.

The reliability coefficients of the variables in the fourth measurement model were all acceptable. The omega coefficients were $\omega = 0.93$ for work engagement, $\omega = 0.88$ for burnout, $\omega = 0.85$ for job resources and $\omega = 0.91$ for servant leadership.

The next step in the inferential statistical analysis was to evaluate three structural models. Model 1 consisted of four

TABLE 2: Correlation matrix of latent variables.

Variable	1	2	3	4	5
1. Burnout	1.00				
2. Work engagement	-0.43*	1.00			
3. Overload	0.12	0.14	1.00		
4. Job resources	-0.44*	0.59**	0.78	1.00	
5. Servant leadership	-0.24	0.47*	0.02	0.58**	1.00

*, Significant correlation at $p < 0.01$; **, Significant correlation at $p < 0.001$.

Note: All decimals were rounded to two places.

latent variables, namely burnout, work engagement, job resources (consisting of organisational support, supervisory support and job clarity) and servant leadership (consisting of empowerment and humility). In this model, servant leadership was used as independent variable, and job resources, work engagement, and burnout as dependent variables. In the second model (Model 2), direct paths were evaluated between servant leadership and burnout and between servant leadership and work engagement. Job resources was removed from this model. In Model 3, servant leadership was used as a generic factor, and humility was removed. Servant leadership was still used as the independent variable, with job resources, work engagement, and burnout as dependent variables. The model fit indices revealed that Model 3 fit the data the best (CFI = 0.976, TLI = 0.970, RMSEA = 0.037, SMRM = 0.046 and WRMR = 0.891). The goodness-of-fit indices of the three structural models are presented in Table 4. The regression coefficients of the latent variables are depicted in Table 5.

The mediation effects of job resources on the relationship between servant leadership and work engagement, and the relationship between servant leadership and burnout were also evaluated. The results indicated that job resources mediated the relationship between servant leadership and work engagement, with a standardised estimate of 0.549 ($p < 0.001$). Job resources also mediated the relationship between servant leadership and burnout, with a standardised estimate of -0.287 ($p < 0.001$). The results of the mediation analysis are presented in Table 6.

TABLE 3: Goodness-of-fit indices of the measurement models.

Measurement model	χ^2	df	p	CFI	TLI	RMSEA	SRMR	WRMR
Model 1	1568.96	967	0.000	0.85	0.83	0.05	0.08	1.48
Model 2	1069.12	646	0.000	0.88	0.86	0.05	0.08	1.48
Model 3	756.34	451	0.000	0.89	0.88	0.06	0.07	1.34
Model 4	192.61	141	0.003	0.97	0.96	0.04	0.05	0.97

df, degrees of freedom, CFI, Comparative Fit Index; TLI, Tucker Lewis Index; RMSEA, root mean square error of approximation; SRMR, standardised root mean square residual, WRMR, weighted root mean square residual.

Note: All decimals were rounded to two places except for the p -value.

TABLE 4: Goodness-of-fit indices of structural models.

Structural model	χ^2	df	p	CFI	TLI	RMSEA	SRMR	WRMR
Model 1	193.05	143	0.003	0.97	0.96	0.04	0.05	0.99
Model 2	209.11	143	0.000	0.96	0.95	0.05	0.06	1.18
Model 3	126.96	97	0.022	0.98	0.97	0.04	0.05	0.89

Significance at $p < 0.05$.

df, Degrees of Freedom, CFI, Comparative Fit Index; TLI, Tucker Lewis Index; RMSEA, root mean square error of approximation; SRMR, standardised root mean square residual, WRMR, Weighted root mean square residual.

Note: All decimals were rounded to two places except for the p -value.

TABLE 5: Standardised regression coefficients of the latent variables.

Variable	Estimate	S.E.	Z	p
Work engagement				
Job resources	0.63	0.06	9.71	0.000*
Burnout				
Job resources	-0.33	0.08	-3.88	0.000*
Job resources				
Servant leadership	0.88	0.04	25.21	0.000*

*, Significance at $p < 0.001$.

Note: All decimals were rounded to two places except for the p -value.

S.E., standard error.

The first hypothesis was supported. The results showed a positive significant relationship between servant leadership and job resources ($r = 0.58$). The structural equation analysis also showed that servant leadership predicted job resources with a standardised estimate of 0.879 ($p < 0.001$). The second hypothesis was rejected. The results showed an insignificant relationship between servant leadership and job demands (overload). The third hypothesis was accepted. The correlation analysis confirmed that a positive significant relationship existed between servant leadership and work engagement ($r = 0.47$). However, the mediation analysis indicated that this relationship was mediated by job resources with a standardised estimate of 0.549 ($p < 0.001$). This confirms the fourth hypothesis. Servant leadership influenced job resources positively (0.879, $p < 0.001$) and job resources influenced work engagement positively (0.625, $p < 0.001$). Hypothesis five was rejected. No direct significant relationship was found between servant leadership and burnout. Hypothesis six could not be tested because overload was removed because of its insignificance in the confirmatory factor analysis stage. Hypothesis seven was confirmed by the results. The mediation analysis showed that job resources mediated the relationship between servant leadership and burnout (-0.287 , $p < 0.001$). Servant leadership influenced job resources positively (0.879, $p < 0.001$) and job resources influenced burnout negatively (-0.326 , $p < 0.001$). Job resources was defined by organisational support (0.842, $p < 0.001$), supervisory support (0.843, $p < 0.001$) and job clarity (0.719, $p < 0.001$). The research model with the standardised estimates of the latent variables is presented in Figure 1.

Discussion

The aim of this study was to explore the interrelationships between servant leadership, job demands, job resources, work engagement and burnout in a construction company. In this section, the role of job resources in the relationships between: (1) servant leadership and work engagement and (2) servant leadership and burnout are discussed.

Servant leadership and work engagement

Although previous studies indicated that servant leadership influenced work engagement directly (Carter & Baghurst,

TABLE 6: The indirect effects of servant leadership on work engagement and burnout via job resources.

Path	Unstandardised estimate	Standardised estimate	<i>p</i>
Servant leadership to work engagement	0.70	0.55	0.000
Servant leadership to burnout	-0.43	-0.29	0.000

Note: All decimals were rounded to two places except for the *p*-value.

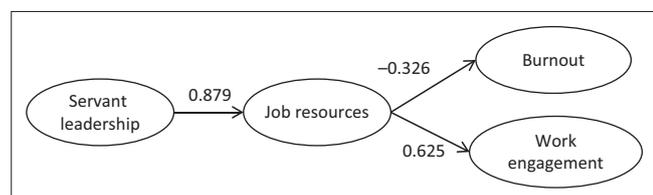


FIGURE 1: Research model with findings

2013; De Clercq et al., 2014), this study found that job resources mediated the relationship between servant leadership and work engagement. This supports the notion that servant leadership can be considered as a separate variable that influences job resources positively to ultimately enhance work engagement (and not necessarily as a job resource in itself). Similar results were reported by Schaufeli (2015) in which job resources mediated the relationship between engaging leadership and work engagement.

It was evident that servant leadership influenced job resources positively and that higher job resources predicted work engagement. This result means that servant leaders provide the necessary job resources to employees that in turn increase the work engagement levels of employees. The type of resources servant leaders offer can be clustered into organisational resources (organisational support), positional resources (job clarity) and social resources (supervisor support).

Servant leaders provide organisational resources in two ways, namely participation in decision-making and providing growth and development opportunities. Servant leaders are humble (Patterson, 2003); they listen well and allow others to contribute options and solutions before choosing an appropriate decision or action (Spears, 2010). In this way, power is shared within the organisation and employees become part of the decision-making process of an organisation. According to Blanchard (2010), shared power and high employee involvement is one of the main factors to sustain a high performing organisation. When employees are allowed to participate and collaborate, they feel more valued and respected, and become more engaged in their work. Increased work engagement levels will enhance organisational commitment, which in return produce better organisational performance.

Another major role of a servant leader is to empower followers (Van Dierendonck, 2011). This is done by means of providing continuous growth and development opportunities to activate individual talent and to make employees more autonomous. Development opportunities might include training and development, coaching, mentoring and even allowing employees to make mistakes in a safe environment. However, empowerment is more than just development. It includes transferring accountability to the employee and activating individual talent towards achieving a higher purpose (Bobbio et al., 2012). Servant leaders portray good stewardship and keep themselves and others accountable. They will develop employees to transfer accountability securely to them. They will provide clear direction and boundaries for employees and develop employees to become more autonomous to control their jobs in line with individual and organisational goals. Servant leaders will ensure employees grow personally, professionally and spiritually (Sendjaya & Cooper, 2011). When employees participate in the decision-making process of an organisation and have opportunities for personal growth and development in the organisation, they will become more engaged in their work.

A servant leader also provides the required positional resources to employees in the form of job clarity. Servant leaders set a higher purpose vision for the organisation and align it with the purpose, skill and talent of an employee (Blanchard, 2010). In this way, the employee understands how he or she is contributing towards achieving a higher purpose. This strategic alignment makes work more meaningful and purposeful, especially when it is aligned with the employee's interest, passion, purpose, talent and skill. Servant leaders build close relationships with their followers and communicate frequently the requirements of a goal or task. This ensures employees know exactly what are expected from them and why it is important. When the expectations and purpose of a job are clear, employees become more engaged in their work.

Servant leaders provide furthermore the social resources employees need in terms of supervisor support. They genuinely care about employees (Van Dierendonck & Patterson, 2014) and built trustful relationships with their followers (Ehrhart, 2004). They practice good listening skills (Spears, 2010) and are authentic, humble and portray high levels of integrity (Laub, 1999; Page & Wong, 2000). These characteristics enable a servant leader to understand the needs of employees better to support them more appropriately. When employees feel they are valued and respected by their leader, receive the necessary supervisory support from their leader and get on well with their leader, they will experience higher employee engagement levels.

Servant leadership and burnout

Another result highlighted by this study was that job resources had a negative significant impact on burnout. This could mean that when employees in this sample receive more job resources, their burnout levels are likely to decrease. Similar results were found in other studies (Hu, Schaufeli, & Taris, 2011; Schaufeli & Bakker, 2004). Although no direct relationship could be found between servant leadership and burnout, servant leadership predicted an increase in job resources and an increase in job resources predicted lower burnout levels. The results confirmed that job resources mediated the relationship between servant leadership and burnout. The explanation of this finding could be twofold. Firstly, it could mean that servant leaders provide the required job resources to buffer the negative effects of high job demands that would normally cause burnout (Bakker, Schaufeli, Leiter & Taris 2008). It could also mean that servant leaders provide the required job resources to help employees recover from burnout. In other words, employees working under servant leaders might be less inclined to experience burnout because they will receive the necessary job resources either to cope with high job demands or to recover from burnout.

The types of job resources servant leaders provide to decrease burnout are organisational resources (organisational support), positional resources (job clarity) and social resources (supervisor support). In this study, organisational

support refers to participating in decision-making as well as personal growth and development opportunities. Job clarity means knowing exactly what the purpose and expectations of a job is. Supervisor support refers to having a good relationship with your supervisor, receiving the necessary support from your supervisor and feeling appreciated by your supervisor. These job resources will ultimately reduce burnout. With less burnout, employers could expect healthier employees (Rothmann & Essenko, 2007; Schaufeli & Bakker, 2004) that work safer (Li, Jiang, Yao, & Li, 2013), perform better (Schaufeli, 2003) and are less inclined to leave the company (Laschinger & Fida, 2014; Schaufeli & Bakker, 2004).

Practical implications

This study indicated that servant leadership could be a viable solution to improve work engagement and decrease burnout in organisations, in particular construction companies. Companies should therefore develop servant leaders internally and create servant leader cultures within organisations to sustain and improve employee engagement. One way to instil servant leadership could be to incorporate it within human capital systems, policies and procedures. For example, psychometric assessments can be aligned to servant leadership attributes and competencies to recruit and select new managers. It can also be used in talent management processes to identify new future leaders. Specific servant leader development programmes can in addition be developed and implemented to equip leaders with servant leader values, attributes, competencies, principles and practices. A performance management system could furthermore include 360 leader reviews and work engagement surveys to evaluate servant leader behaviour in the company. Performance reviews can then be linked to customised remuneration and recognition systems to reward servant leader behaviour in the organisation. All these interventions would assist a company to select, train, review and reward servant leaders within an organisation and in return benefit from a more engaged workforce and better organisational performance.

Limitations and recommendations

A first limitation of this study was that a sample only included employees from the construction industry. The results are therefore limited to this industry and cannot be generalised to other industries or even the general public. The sample also consisted of more males than females of which the majority had Afrikaans and English as home language and were mainly black and white employees. Hence, another limitation can be that the results cannot be generalised to all genders, languages or cultures. A final limitation was that some employees evaluated more than one manager because of a matrix reporting structure. These surveys were combined into one data set. This could have influenced the results either positively or negatively.

Valuable future research may apply longitudinal study designs to examine the relationship between servant leadership and work engagement or burnout over time. This

will provide more information on the sustainability and impact that servant leadership has on job resources, work engagement and burnout over time. The results of this study can also be used to design servant leadership development programmes. The effectiveness of these development programmes can then be evaluated using experimental type studies. This might help practitioners to develop servant leaders effectively in organisations. A final research need is to validate a framework or procedure to implement servant leadership in organisations and to create serving organisations. Such a framework could assist organisational development practitioners to create and sustain serving organisations that leave behind sustainable and positive legacies in society.

Conclusion

The general aim of this study was to investigate the interrelationships between servant leadership, work engagement, burnout, job demands and job resources in a construction company. Four quantitative surveys were used to collect data, and various statistical methods were used to analyse the data. The results indicated that job resources mediated a positive relationship between servant leadership and work engagement and a negative relationship between servant leadership and burnout.

The findings of this study highlighted that servant leadership can be used in the construction industry to enhance work engagement levels and to decrease burnout levels. Servant leaders provide the job resources employees need to become more engaged in their work and to experience less burnout. These job resources are provided in the form of organisational support, job clarity and supervisory support. This study made a theoretical contribution to the body of knowledge on servant leadership and work-related well-being by providing empirical evidence on the interrelationships between servant leadership, job demands, job resources, work engagement and burnout.

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Competing interests

The authors declare that they have no financial or personal relationships which may have inappropriately influenced them in writing this article.

Authors' contributions

M.F.C., M.B. and M.G. co-designed the research study. M.F.C. conducted the research, analysed the data and wrote the manuscript. M.B. and M.G. assisted with the data analysis and contributed to the writing of the manuscript.

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